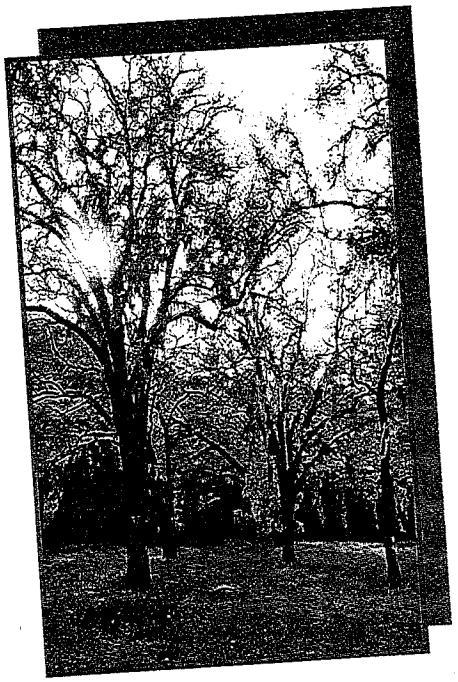
Exhibit C

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Santa Lucia Preserve Project

Final
Environmental Impact Report
Volume I: Response to Comments







Submitted to:

Monterey County
Planning and Building
Inspection Department
Salinas, California

Submitted by:

Jones & Stokes Associates, Inc.
Sacramento, California

September 14, 1995

Santa Lucia Preserve Project
Final
Environmental Impact Report

Volume I: Response to Comments

Assigned EIR No. 94-005
Planning Commission No. PC94067 (SCH 94083019)
Planning Commission No. PC94218 (SCH 95023036)

Project Applicant:

Rancho San Carlos Partnership
P.O. Box 222707
Carmel, CA 93922-2707
Contact: Joel Panzer
408/626-8200

Prepared by:

Jones & Stokes Associates, Inc.
2600 V Street
Sacramento, CA 95818-1914
Contact: David Buehler
916/737-3000

Prepared for:

Monterey County
Planning and Building Inspection Department
240 Church Street
North Wing, Suite 116
Salinas, CA 93901
Contact: Wanda Hickman
408/755-5025

September 14, 1995

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Section A. Purpose and Format of the Final Environmental Impact Report

Section A. Purpose and Format of the Final Environmental Impact Report

Under the California Environmental Quality Act Guidelines (State CEQA Guidelines), lead agencies are required, after completion of a draft environmental impact report (EIR), to consult with and obtain comments from public agencies having jurisdiction by law with respect to the proposed project and to provide the general public with opportunities to comment on the draft EIR. The lead agency is also required to respond to significant environmental issues raised in the review and consultation process.

The final EIR has been prepared to respond to public agency and general public comments received on the draft EIR for the Santa Lucia Preserve Project, which was circulated for public review during May to July 1995.

This document has been prepared in the form of an attachment or addendum to the draft EIR, which has been revised to note corrections, clarifications, or other pertinent information as necessary. This document (Volume I of the final EIR), the corrected EIR (Volume II of the final EIR), and additional comments and responses (Volume III) constitute the complete final EIR. A new appendix (Appendix J) has been added to provide the most recent update of the vesting tentative map (VTM) dated August 15, 1995. Minor revisions to the VTM have been made primarily to reduce grading and visual impacts, to reflect recommendations of the Monterey County Environmental Health Division and Weber, Hayes, & Associates, and to provide conformance with permit requirements. An index to changes in the VTM along with eight 11-inch by 17-inch reduced scale maps is provided in Appendix J.

This volume and Volume III of the final EIR include copies of all written comments received on the draft EIR that raise significant environmental points and responses to significant environmental comments raised in the written comments. Please note that Volume III has been prepared to respond to additional comments that require a response but were not included in Volume I.

Section B. Comments Received and Responses

Section B. Comments Received and Responses

The following agencies and persons submitted written comments (only letters raising significant environmental issues are included) on the draft EIR:

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United States Department of the Interior

FISH AND WILDLIFE SERVICE

Ecological Services
Ventura Field Office
2493 Portola Road, Suite B
Ventura, California 93003

May 31, 1995

Robert Slimmon, Jr.
Monterey County Planning and Building Inspection Department
P.O. Box 1208
Salinas, California 93902

Subject: Draft Environmental Impact Report for the Santa Lucia Preserve, Monterey County, California

Dear Mr. Slimmon:

This letter transmits the comments of the U.S. Fish and Wildlife Service (Service) on the draft environmental impact report (EIR) for the proposed Santa Lucia Preserve, Monterey County, California. The draft EIR was made available for review from May 19, 1995 to July 7, 1995. The Service received the draft EIR on May 30, 1995.

The project applicant seeks "to establish a permanent preserve for native plant and wildlife habitat while pursuing limited development of the least environmentally sensitive land." In so doing, approximately 18,000 acres of Rancho San Carlos would be set aside as the Santa Lucia Preserve while the remaining 2,000 acres would be developed for housing, recreation, and visitor/commercial uses. As part of a comprehensive development plan, a resource management plan (RMP), grazing plan (GP), forest management plan (FMP), and preliminary erosion drainage and erosion control plan (ERO) have been developed.

According to the draft EIR, the proposed project may result in effects to sensitive species and the habitats on which they depend. Effects to biological resources may range from beneficial to significantly adverse. Specific measures proposed by the applicant in the draft EIR and above mentioned plans will mitigate all significant adverse impacts to levels of less-than-significant. No effects to species listed as endangered or threatened are anticipated.

The Service has reviewed pertinent chapters of the draft EIR as well as cited plans and reports provided by the applicant. We recommend that the RMP, GP, FMP, and ERO be implemented in conjunction with the comprehensive development plan and establishment of the Santa Lucia Preserve. Successful implementation 1

of these management plans should adequately protect and effectively conserve the biological resources of Rancho San Carlos.

Monterey County and the project applicant are reminded that section 9 of the Endangered Species Act of 1973, as amended (Act) prohibits "take" of federally listed endangered or threatened species. If take of a listed species may occur incidentally to this project, exemptions from section 9 prohibitions would be necessary. The project applicant could apply for an incidental take permit, pursuant to section 10 of the Act, or enter into formal consultation with the Service, pursuant to section 7, if a Federal nexus exists. At this time, no take of listed species is anticipated. 2

The Service appreciates the opportunity to review and comment upon the draft EIR for the Santa Lucia Preserve. If you should have any questions, please contact Jonathan Hoekstra of my staff at 805/644-1766.

Sincerely,

Judy Hohman

Judy Hohman
Acting Field Supervisor

Response to Comments from the U.S. Fish and Wildlife Service

1. The resources management plan, grazing plan, forest management plan, and erosion control plans are part of the combined development permit application and would be implemented in conjunction with the proposed development and establishment of the preserve.

2. This information is duly noted for future reference in the event that a take of a federally listed species occurs incidentally to this project. However, as noted in the comment, no take of listed species is anticipated.

STATE OF CALIFORNIA—THE RESOURCES AGENCY PETE WILSON, Governor

CALIFORNIA COASTAL COMMISSION
CENTRAL COAST AREA OFFICE
725 FRONT STREET, STE. 300
SANTA CRUZ, CA 95060
(408) 427-4863
HEARING IMPAIRED: (415) 904-5200

June 5, 1995

Wanda Hickman
Monterey County Planning Department
P.O. Box 1208
Salinas, CA 93902

Dear Wanda:

Coastal staff has reviewed the Santa Lucia Preserve Project Draft Environmental Impact Report. The report notes that a portion of the site is in the Coastal Zone. The report further notes that since development is not proposed in the Coastal Zone at this time, it is not analyzed in the draft EIR. The EIR cites some Carmel Area Land Use Plan policies applicable to this area, but not all that are relevant. 1

We recommend that, although addressing any site-specific environmental issues may be appropriately postponed, general planning issues relative to this portion of the preserve be fully addressed in the EIR at this time. In other words, given all resource constraints, environmental impacts, and clustering/concentrating development policies, does the general pattern and density of proposed development in the Coastal Zone make sense? One option may be to tranfer the density credits to outside the Coastal Zone. 2

One additional question relates to the rectangular-shaped, non-contiguous portion of the Preserve in the Coastal Zone (is this a separate parcel?). How is this parcel to be accessed and managed? 3

We hope that these comments prove helpful. Please send us a copy of the final EIR when it is completed.

Sincerely,

David Loomis
Assistant District Director

Rick Hyman
Coastal Planner

DL/RH/cm
cc: AMBAG Clearinghouse
OPR Clearinghouse #95022036
123R

Response to Comments from the California Coastal Commission, Central Coast Area Office

1. The draft EIR on page 2-7 states that the EIR evaluates the entire comprehensive development plan, which includes lands within the coastal zone, and the Carmel Valley Master Plan, but that entitlements are being sought only for lands within the GMPAP. The EIR states further on page 2-12 that these uses will require additional environmental review when specific permit applications are proposed; the uses are evaluated in the EIR at a more general level of detail because there is no application for development for these areas. At the time development is specifically proposed in the coastal zone, all relevant coastal policies will be reviewed.

2. The coastal zone portion of the comprehensive development plan is 730 acres, of which 27 acres are proposed for residential development to accommodate five residential units in the coastal zone. Site planning for the area within the coastal zone is intended to undergo the same resource constraints analysis as was done for GMPAP area. The entitlement application within the coastal zone will include its own resource management plan. Additional environmental review will need to occur to determine if transfer of density will be recommended.

3. This rectangular-shaped area is a separate parcel. Access to this parcel by the property owner is not available because it is surrounded by property owned by another entity. There are no plans for development or resources management of this parcel.

STATE OF CALIFORNIA - THE RESOURCES AGENCY

PETE WILSON, Governor

DEPARTMENT OF FISH AND GAME
POST OFFICE BOX 47
YOUNTVILLE, CALIFORNIA 94599
(707) 944-5500

July 17, 1995

Ms. Wanda Hickman
Monterey County
Planning and Building Inspection Department
240 Church Street
Salinas, California 93901

Dear Ms. Hickman:

Santa Lucia Preserve Project
Draft Environmental Impact Report (DEIR)
Monterey County, SCH# 95023036

Department of Fish and Game personnel have reviewed the DEIR for the Santa Lucia Preserve Project. The project proposes 350 residential units, a lodge, recreational facilities, a golf trail, and open space on 20,000 acres.

We appreciate the amount of biological inventory and other information developed for this project. While a significant amount of data is included, in our opinion, the DEIR needs some additional information to be complete and certifiable as adequate. We provide our comments below. We also recommend all mitigation measures (the applicant's and additional) be made conditions of project approval to ensure all impacts are mitigated to a less than significant level.

Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand

Mitigation for depletion of dry-season base flow (p. 8-43) and potential reduction of fisheries habitat (p. 10-10) due to groundwater pumping is to delay pumping at wells within 1,000 feet of base flow reaches until the combined capacity of other wells is insufficient to meet project demand. Highest project demands will likely occur during summer months when fisheries needs also are most critical. It is unclear whether this mitigation measure will adequately reduce project impacts. 1

Supplemental water may be provided to ensure a minimum October 1990 base flow level in four creeks (p. 8-49 and 10-10). If a 30 gpm maximum is insufficient to maintain objective flows in all four creeks, it may be allocated among the creeks in whatever proportion maximizes benefits for aquatic habitat. If the loss of base flow is project related, and 30 gpm is insufficient to maintain objective base flows, then unmitigated impacts remain. This should be discussed in the document.

The applicant shall use information from monitoring and analysis reports to determine whether a decline in base flow is natural or project related (p. 8-50). If the project causes a decline of less than 20 percent, supplemental water releases are optional. Lower percent reductions in flow during critical months may be significant to the fisheries. We are concerned that fisheries and riparian impacts (p. 8-56) may occur if the project applicant may be required to make a subjective determination regarding the cause of base flow decline and significance of declines in riparian habitat less than 20 percent. We recommend objective criteria be established, if feasible, to determine cause of decline. Also, either the percentage should be reduced and/or consultation with Department fisheries biologists be required to determine significance. 2

The DEIR states Hitchcock Canyon and Robinson Creek were excluded from the monitoring and mitigation program because they are unlikely to support a fishery (p. 8-50). It is our understanding Hitchcock Canyon does support a steelhead population, and this information should be included. 3

We request annual monitoring reports for vegetation restoration also be sent to our Department (p. 8-56). 4

Runoff, Flooding, and Water Quality

Mitigation for increased stormwater runoff is to construct detention basins on- or off-channel (p. 9-19). It is our preference basins be built off-channel to reduce impacts to streams and riparian habitats. This is particularly important where the basin is expected to act as a sediment trap and will need periodic maintenance. If construction of basins will impact riparian habitat, those impacts should be mitigated. 5

Fisheries

Non-native largemouth bass and green sunfish are present in Moore's Lake and Las Garzas Creek (p. 10-1) and may impact steelhead and sensitive species such as red-legged frogs. While these fish are not a project impact, we recommend eradication to reduce impacts to other species on the project site. 6

Appropriate construction practices shall be implemented to mitigate for potential construction-related water quality impacts (p. 10-8). However, practices to prevent or mitigate accidental spills were not outlined as were sediment related issues. Mitigation should include siting equipment storage areas away from creeks and sensitive habitats and identifying procedures to deal with accidental spills. 7

To reduce impacts to fisheries, the applicant proposes no excavation or grading take place during rainfall (p. 10-8). Standard practices generally restrict grading during the rainy season, October 15 - April 15, to provide maximum erosion control and stream protection. We recommend this measure be added. 8

Increased water temperature resulting from loss of riparian vegetation is considered a less-than-significant impact due to the minimal loss of vegetation and mitigation planting (p. 10-9). Where vegetation is lost to road crossings and culverts, this may be true. However, 11 acres of riparian habitat will be lost or degraded, including five for the golf trail. The document does not state which creeks will be impacted or whether the loss will be concentrated in one or two reaches or scattered in smaller patches. Loss of cover could result in significant temperature increases in localized areas, particularly if base flows are reduced. Also, planted trees will not provide shade in the short term and, therefore, mitigation for temperature impacts for many years. 9

Biological Resources

While we recognize CEQA Section 15150 allows incorporation of other documents by reference, it is difficult to appreciate the scope or analyze the impacts and adequacy of mitigation measures when so many other separate documents are involved and many mitigation measures are only summarized in the DEIR in general terms (p. 11-36 and 11-40). At the time this letter is written, our personnel do not have all the referenced documents in hand. Therefore, we apologize if we raise issues that are covered elsewhere.

Discussions of American badgers as a sensitive species may be deleted (Table 11-3 and p. 11-49). The badger was removed from the Species of Special Concern list in September 1993. 10

Table 11-3 Special Status Wildlife (p. 11-32) should be updated to reflect the presence of Monterey dusky-footed woodrats on the study area as discussed in the text on page 11-34. 11

It is unclear whether Table 11-3 includes grazing as a project impact and where on the property grazing will occur. Of particular concern are impacts to Smith's blue butterfly, sensitive salamander, frog and turtle breeding habitat, and Gairdner's yampah. 12

The Golf Trail Use Permit Application (GTUPA) states it is uncertain whether California tiger salamanders breed in the ponds along the golf trail (GTUPA p. 2-17). Mitigation includes surveys to be done in winter 1994-95. It is unclear if those surveys were done and the information incorporated into the DEIR. If 13

salamanders are present, a mitigation plan should be developed and included in the final EIR. This is important because future mitigation designs are not acceptable and mitigation may significantly impact the golf trail design. 13

The GTUPA discusses potential impacts to southwestern pond turtle from decreased water quality due to turfgrass runoff containing biocides (GTUPA p. 2-20). The mitigation measure does not address this issue. 14

For riparian and herbaceous wetland impacts, the DEIR states impacts are not significant and no mitigation measures are necessary since only a small percentage of the habitats will be impacted relative to that preserved (p. 11-44 and 11-45). The document does discuss our Department's "no net loss" policy for wetlands (p. 11-14). Based on that policy, it is our position the loss or disturbance of 17 acres of wetlands and riparian habitat is significant and does require mitigation. 15

The project applicant has proposed mitigation for riparian and wetland habitats at a 3:1 ratio. However, the DEIR does not state how or where the mitigation will occur. The document proposes the applicant prepare a wetland and mitigation monitoring plan before implementing the project (p. 11-45). To determine feasibility of the mitigation and adequacy of the document, that information needs to be included in the final EIR.

Traffic

Mitigation for traffic impacts includes improvements to Carmel Valley Road and Rancho San Carlos Road (p. 13-28). These areas should be surveyed and impacts to habitats and sensitive species assessed, discussed, and mitigated as necessary. 16

Public Services and Utilities

Any impacts which would occur to sensitive species, particularly plants, as a result of a need for fuel modification work should be discussed (p. 16-17). 17

Proposed trails will be licensed to a public agency which will assume responsibility for their construction and maintenance (p. 16-22). Because trail siting and construction may impact sensitive species and habitats, a mitigation measure should be included that the applicant shall determine the location of any trail and all impacts to sensitive species and habitats will be avoided. 18

Alternatives

The Department does not support any one alternative. However, it appears the No-lodge Alternative and No-Golf Trail Alternative significantly reduce impacts to riparian and wetland habitats by retaining an additional seven and nine acres, respectively. 19

Conclusion

If the information requested above is included in the final EIR, we would not object to certification of the document. Again, we recommend all mitigation measures be made conditions of project approval to ensure impacts are mitigated to a less than significant level.

Department personnel are available to address our concerns. For further information, please contact Terry Palmisano, Associate Wildlife Biologist, at (408) 848-2576; or Carl Wilcox, Environmental Services Supervisor, at (707) 944-5525.

Sincerely,

Cindy Catalano
for Ken Aasen
Acting Regional Manager
Region 3

1. If this measure is not sufficient to adequately mitigate project impacts, the mitigation measure "Additional Mitigation Measure: Monitor Base Flow in Creeks and Provide Supplemental Water if Necessary" (discussed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand") is used. This measure is designed to provide water to the protected base flows to protect aquatic habitat. The base flow conditions in October 1990 were selected to define the protected base flow reaches because they were at the end of the dry season after 4 years of drought and consequently represent the lowest flows that the aquatic habitat would probably have to endure in a 20- to 50-year period, totaling approximately 30 gpm. The objective of this mitigation measure is to prevent base flows from decreasing below the October 1990 level except possibly under more extreme and rare droughts than the 1987-1990 period. The flow augmentation would be sufficient to substantially increase the flow under extreme low-flow conditions, and with a recurrence interval of 20-50 years, this would be an unlikely event with impacts so rare that any further mitigation is unnecessary.

2. Two methods for determining whether base flow in creeks has been affected by the project are described on pages 8-48 to 8-49 of the draft EIR. One method uses linear regression of runoff versus rainfall. The other uses a double-mass analysis comparing cumulative runoff in the affected watersheds with cumulative runoff in a control water shed, such as Pine Creek. Other methods might also be suitable and could be tested by hydrologists performing the analysis. These methods will be sufficient. The acceptable percentage loss of riparian habitat is 5% of the overall riparian area, not 20%.

3. The EIR has been amended to state that Hitchcock Canyon does support a steelhead population. Hitchcock Canyon and Robinson Canyon are not included in the monitoring program because of their locations in relation to the existing and proposed well locations.

4. The comment has been noted, and page 8-56 of the draft EIR has been amended to reflect this request.

5. Although it would be preferred that all detention basins be constructed off channel, in some instances topography may limit suitable sites. As described on page 9-19 of the draft EIR, at some locations detention basins may create far more damage to the environment than the potential benefits warrant. Structural BMPs would be located to avoid or minimize impacts on sensitive biological resources.

6. The proposed project will not create conditions that favor non-native species and the proposed project does not include eradication of these species.

7. Additional mitigation measures relating to water quality degradation due to construction activities and hazardous materials spills are described on page 9-27 of the draft EIR.

8. The proposed project includes implementing an erosion control plan. Erosion control measures shall be implemented to minimize the volume of sediment-laden runoff that enters creek bottoms to prevent erosion and sedimentation in creek channels. Temporary berms, sediment trapping basins, and spot grading shall be utilized to avoid unnecessary siltation into creeks during construction activities. Additionally, no excavation or grading activities shall take place during rainfall.

9. The loss of riparian vegetation would occur in smaller scattered reaches. Specific measures to protect riparian areas incorporated in the design of and management of the golf trail include avoidance of riparian areas, where feasible (including modification of golf trail design); provision of buffer zones; minimization of impacts on riparian zones; specific detailed grading plans that align fairways around bordering riparian areas; implementation of sedimentation and erosion control practices; and design features and construction measures that provide for the continued natural hydrology of riparian areas.

10. Since it is no longer considered a species of special concern, the American badger has been deleted from the discussions of special-status species in Table 11-3 and page 11-49 in Chapter 11, "Biological Resources", in the draft EIR.

11. Table 11-3 has been revised to accurately reflect the presence of Monterey dusky-footed woodrats in appropriate habitats throughout the Santa Lucia Preserve.

12. Proposed grazing areas are identified in Figure 2 of the Rancho San Carlos Grazing Plan, prepared by Sage Associates. Selected areas of Potrero Canyon, Robinson Canyon, and Las Garzas watersheds and a small portion of the San Clemente and Hitchcock Canyon watersheds will be lightly grazed from February into June. San Jose watershed will not be grazed. Historically, all of these watersheds were intensively grazed. Impacts on the following species will not occur as a result of implementing the Grazing Plan for the following reasons:

- **Smith's blue butterfly**: Known habitat areas on the Animus and on Chamisal Ridge will no longer be grazed; the Peñon Peak and Touche areas will be seasonally grazed at low intensity (historically these areas were intensively overgrazed on a year-round basis) and elsewhere on the preserve, the butterflies' preferred host plant, buckwheat, is a fair to poor browse plant for cattle. It is unlikely that this species will be used during the short duration of grazing rotation when the cattle prefer the more palatable grasses and forbs that should be available in abundance.

- **Salamander-, frog-, and turtle-breeding habitat**: Selective fencing will exclude cattle and wild boars from all major riparian areas, ponds, and springs. These are the primary habitats for salamanders, frogs, and turtles at the Santa Lucia Preserve.

13. This comment suggests that a mitigation plan should be developed for potential impacts on salamanders resulting from construction of the golf trail. Field surveys conducted at this site, however, did not reveal the presence of salamanders and the background report stated that

no significant impacts on these species were expected (Golf Trail Use Permit Application, page 2-17). Because there is no substantial evidence in the existing record to support a finding of significant impacts on salamanders, no mitigation is required.

14. This comment raises a concern about the potential effects of decreased water quality from the golf trail on southwestern pond turtles and states that the proposed mitigation measure does not address this issue. In fact, the potential impact is addressed and fully avoided by the measures included in the Water Quality Protection Plan for the Santa Lucia Preserve Golf Trail (pages 16 and 17). Potential impacts on southwestern pond turtles and other aquatic wildlife will be avoided by collecting, storing, and reusing storm runoff from chemically-managed turf for irrigation of the golf trail. The small volumes of stored runoff which would be released during very wet years will be below the maximum acceptable concentrations (generally 5% of the no-observed effect level).

15. Refer to the responses to Comment 21 from Parkin & Sugar and Comment 2 from the California Native Plant Society. The Monterey County Board of Supervisors will consider the Department of Fish and Game's position on the significance of the impacts on wetlands and riparian habitat caused by the proposed project.

The mitigation measure that describes compensation for losses to wetland habitat will be modified to incorporate the items specified in the comment related to elements that should be included in the wetland mitigation and monitoring plan. Approximately 16 acres would be required for compensation. Wetland mitigation will likely be performed in the vicinity of Moore's Lake, and scattered locations will be selected for the riparian mitigation. Wetland Research Associates is presently conducting a study to refine the identification of suitable wetland and riparian mitigation sites and a wetland restoration plan is in preparation. Copies of the draft mitigation site maps are available from Michael Josselyn, Ph.D., at Wetland Research Associates (415/454-8868).

16. The only proposed improvement listed in page 11-28 of the draft EIR that could affect sensitive habitats is the widening of Rancho San Carlos Road south of the Quail Meadows subdivision. This area has been surveyed, impacts identified, and mitigation recommended or built into the project (avoidance through not widening certain stretches of the roadway).

17. The EIR has been modified to address the effects of fuel modification on special-status species that occur on the project site.

18. The trail segments provide trail access through Rancho San Carlos as follows:

1) From Snively's Ridge Trail to the Ormsby Lookout and down the west side of Las Garzas Canyon to reconnect with the Garzas Canyon Trail, this trail passes through chaparral, grassland, oak savanna, and riparian areas.

(2) From the Monterey Peninsula Regional Park District (MPRPD) "Fish" parcel road easement through Rancho San Carlos down the east side of Garzas Canyon to reconnect with the Garzas Canyon Trail, this trail passes through oak woodlands, chaparral and riparian areas.

(3) From the upper "Fish" parcel through Rancho San Carlos, just below Lot 251, to the MPRPD property easterly of the property boundary, this trail passes through oak woodland and oak forest.

(4) From upper Garland Park through Rancho San Carlos, just below Lots 253 and 254 to connect with the Vasquez Trail, this trail passes through oak woodland.

(5) From the MPRPD's Kahn Ranch, looping through Rancho San Carlos below Lot 250, and reconnecting with the Kahn Ranch, this trail passes through riparian and some oak woodland areas.

Trail segments would be licensed to the MPRPD for use as hiking trails. Generally, they will be constructed to include a 24-inch tread with a 24-inch clearance on each side of the trail for a total trail width of 6 feet. The overhead clearance will also need to be 6 feet above ground level. In certain instances where there are limitations, slight clearance variations may be warranted. Trails would be constructed and maintained by the MPRPD.

To minimize environmental impacts, Rancho San Carlos Partnership and the MPRPD agree that trails will be cleared by hand labor. To minimize water quality impacts, trails should be constructed using water bars and switchbacks, and outsloping the trail to reduce erosion. Trail segments are now located well away from archaeological resources. Because parking and staging areas, restrooms, and drinking fountains are in place at Garland Ranch Regional Park, there is no need to develop these facilities on Robinson Canyon Road or at the Santa Lucia Preserve.

It is important to note that the precise location and vegetation clearance limitations of these hiking trail alignments will need to be addressed in the field by the representatives of Rancho San Carlos Partnership and MPRPD before construction and vegetation clearing.

The timing of opening trail segments for public use will be scheduled by the MPRPD.

19. The Monterey County Board of Supervisors will consider this comment when it takes action on the proposed project.

DEPARTMENT OF FORESTRY
AND FIRE PROTECTION
San Benito-Monterey Ranger Unit
23685 W.R. Holman Highway
Monterey, California 93940
Telephone: (408) 625-6415

July 4, 1995

Monterey County Planning and Building Department
P.O. Box 1208
Salinas, California 93902

RE: Draft EIR for THE SANTA LUCIA PRESERVE EIR# 94-005

Dear Wanda A. Hickman:

Please include the following comments and corrections in the final EIR.

Comments and corrections are as follows:

- Page # 16-17 states, "community facilities and homes will be located outside identified high fire hazard areas." 1

All of the Santa Lucia Preserve has been designated "high hazard" within the State Responsibility Area (SRA). A correction is requested.

- Page # 16-18 states that the fire district will, before installation or bonding, provide a letter stating that fire flow standards have been meet for the proposed improvements. 2

Fire protection ordinances and standards compliance will be verified in writing for each individual improvement during the planning and building permit process. An addition of this explanation or a revision of the original text to agree with this definition is requested.

- Page # 16-18 gives a definition of fire preventive measures to be taken at residences. 3

The definition given is known as the Public Resource Code (PRC) 4291 and should be stated as such. An addition of the corresponding code number (PRC 4291) is requested.

- Page # 16-18 states that the project will conform to the "Fire Code." 4

The correct code title is the "Uniform Fire Code (California Fire Code)". Request that the correct code name be listed.

Sincerely,

Jackie Scoggin
State Forest Ranger I
Carmel District

cc: Steve Benoit
Reno DiTullio
Joel Panzer

Response to Comments from the California Department of Forestry and Fire Protection

1. The draft EIR has been amended to state that the Santa Lucia Preserve has been designated as "high hazard" within the state responsibility area.

2. The draft EIR has been amended to state that fire protection ordinances and standards compliance will be verified in writing for each individual improvement during the planning and building permit process.

3. The draft EIR has been amended to cite Public Resources Code Section 4291.

4. The draft EIR has been amended to cite the "Uniform Fire Code" instead of the "Fire Code".

State of California

Memorandum

Date : June 29, 1995

7-6-95 E

To : Projects Coordinator
The Resources Agency
c/o Nadell Gayou
1020 Ninth Street, 3rd Floor
Sacramento, CA 95814

From : Department of Parks and Recreation
Monterey District - (408) 649-2836/Calnet 587-2836/FAX (408) 649-2847

Subject : Santa Lucia Preserve Project
Monterey County Planning and Building Inspection Department
Draft Environmental Impact Report, SCH #95023036

The Santa Lucia Preserve Project includes a portion of the upper San Jose Creek watershed. The lower portion of this watershed and creek is within Point Lobos Ranch which is planned for inclusion as a unit of the State Park System through an agreement with the Big Sur Land Trust. The creek discharges to the ocean within Carmel River State Beach. Development in the watershed could affect Point Lobos Ranch and Carmel River State Beach and is therefore of concern to the Department of Parks and Recreation. 1

Our principal concern is the potential for water withdrawals in the upper San Jose Creek watershed to affect stream flow, vegetation, and aquatic life resources along the lower creek. Sixty-four percent of the total annual runoff from this watershed is from the project area (Table 9-1). The EIR identifies the potential of the proposed groundwater extraction to substantially deplete dry season base flows in San Jose Creek decreasing riparian and fisheries habitat.

The water balance analysis described in the EIR seems to overly simplify the complex hydro-geologic system. Flow from springs and seeps is critical for maintaining base stream flow. Relatively small reductions in groundwater levels may decrease these discharges into the creek, significantly decreasing base flows. The large reservoir of groundwater described in the EIR may not be available to maintain base flows. Even if only a very small percentage of the groundwater is removed, the impact on stream flow could be significant. The proposed implementation of the Cattle Management Plan as the principal mitigation measure may be inadequate. Even if the predicted increased infiltration/decreased winter runoff occurs there is no guarantee that this water will be available at the end of summer to the extent that it can overcome

the impacts of groundwater extractions.

San Jose Creek is not included in the base flow monitoring program proposed in the EIR because of impacts of other land management activities inside the watershed but outside the project. We recommend that base flow monitoring be included for San Jose Creek because it possesses significant habitat values; it is the only creek impacted by the project that flows through State Park land, and it is the only creek that directly discharges into the ocean. Although monitoring should not be considered a mitigation measure, it is essential in documenting and quantifying the impacts. If the monitoring documents adverse impacts to stream base flows the practical remedies are quite limited. Discharge of pumped groundwater into the stream may not be effective. If groundwater pumping is what causes the decrease in base flow additional pumping may cause increased infiltration through the creek bed negating the effects of water discharge into the creek. 1

The EIR conclusion on page 8-43 that pumping at wells near creeks does not drastically decrease streamflow is not supported by the information in the EIR. The document itself identifies several reasons why the results of the pumping tests that lead to this conclusion may not be reliable, including the summer base flow was high during the tests, the precision of the measuring instruments may be inadequate to detect the changes, and that affects of the pumping may be masked by natural decreases in the base flow during the tests. Isotopic analysis of water samples is a possible alternative methodology that could better assess the relationship between pumped groundwater and streamflow. Such a testing procedure should be considered as a means of better assessing the impacts of proposed groundwater withdrawals.

DPR recommends that the impacts of the substantial water withdrawals proposed from the San Jose Creek watershed be further investigated, that more realistic mitigating measures be developed, and that alternatives be explored to reduce this project's use of water, especially during the stream's low flow periods. It would be helpful to have the water balance analysis and mitigation measure proposals analyzed by an independent panel of hydrologists to better assess the conclusions in the EIR.

In addition to our concerns about San Jose Creek we are also concerned about public trail access to the Santa Lucia Preserve Project. It may be possible to develop trail connections between the preserve, Point Lobos Ranch, and Garrapata State Park that could have significant public benefits. The potential for development of these connections should be further explored. 2

If you have any questions about these comments please contact Monterey District Ecologist Ken Gray at (408) 649-2862.

Mary R. Wright
District Superintendent

1. San Jose Creek was not recommended for inclusion in the streamflow gaging program. The reason was not because impacts on San Jose Creek are unimportant; rather, they would be difficult to detect through streamflow gaging because of other factors affecting flows in that watershed. A reasonable and possibly more accurate way to estimate the impacts on San Jose Creek is by correlation with effects on the other nearby creeks, where there are fewer confounding factors affecting streamflow.

   In Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", the additional mitigation measure "Monitor Base Flow in Creeks and Provide Supplemental Water if Necessary", which defines and protects "protected base flow reaches" (pages 8-48 to 8-51 of the draft EIR) includes a protected base flow reach on San Jose Creek. This and other mitigation measures would limit groundwater pumping near the reach and, if necessary, augment flow with groundwater to avoid depleting base flow. The groundwater pumped to supplement base flow would not be from wells close to the creek and consequently would not percolate rapidly back through the creekbed as pumping-induced seepage.

   Preventing decreases in the protected base flow reach, which is in the area immediately upstream of the downstream boundary of Rancho San Carlos, would also prevent decreases in base flow farther downstream because those reaches are too distant to be directly affected by groundwater pumping on the project site.

   A slight decline in groundwater levels would not substantially decrease summer base flow. A decline could affect a lake that flows over a spillway, but the groundwater basin does not function like a lake in that regard. The water table in each watershed slopes upward perpendicular to the creek, typically rising several hundred feet before reaching the divide bordering the adjacent watershed. This represents a large volume of water stored at an elevation higher than the creek. Base flow in the creek is sustained by the gradual drainage of this water into the creek. Although large drawdowns close to the creek could intercept or even reverse the seepage into the creek, a widespread decline of a few feet would not appreciably decrease the total volume of groundwater available to sustain base flow or the gradient that causes it to flow into the creek.

   In summary, the monitoring and mitigation measures proposed in the draft EIR will prevent significant depletion of base flow in San Jose Creek and will provide San Jose Creek with the same level of protection given to the other potentially affected creeks.

2. Any public access to the Santa Lucia Preserve must be managed. Currently there is no contiguous ownership between Rancho San Carlos and state parklands, and no publicly owned trails are adjacent to the proposed project area. A trail from Point Lobos and Garrapata State Park would have to cross the intervening privately owned lands to reach the Santa Lucia Preserve. Cooperation would need to be secured from individual landowners before trails could be located on private property.

STATE OF CALIFORNIA PETE WILSON, Governor

GOVERNOR'S OFFICE OF PLANNING AND RESEARCH
1400 TENTH STREET
SACRAMENTO, CA 95814

July 6, 1995

WANDA A. HICKMAN
MONTEREY COUNTY PLANNING AND BUILDING INSPECTION
240 CHURCH STREET
SALINAS, CA 93901

Subject: SANTA LUCIA PRESERVE SCH #: 95023036

Dear WANDA A. HICKMAN:

The State Clearinghouse has submitted the above named draft Environmental Impact Report (EIR) to selected state agencies for review. The review period is now closed and the comments from the responding agency(ies) is(are) enclosed. On the enclosed Notice of Completion form you will note that the Clearinghouse has checked the agencies that have commented. Please review the Notice of Completion to ensure that your comment package is complete. If the comment package is not in order, please notify the State Clearinghouse immediately. Remember to refer to the project's eight-digit State Clearinghouse number so that we may respond promptly. 1

Please note that Section 21104 of the California Public Resources Code required that:

> "a responsible agency or other public agency shall only make substantive comments regarding those activities involved in a project which are within an area of expertise of the agency or which are required to be carried out or approved by the agency."

Commenting agencies are also required by this section to support their comments with specific documentation.

These comments are forwarded for your use in preparing your final EIR. Should you need more information or clarification, we recommend that you contact the commenting agency(ies).

This letter acknowledges that you have complied with the State Clearinghouse review requirements for draft environmental documents, pursuant to the California Environmental Quality Act. Please contact at (916) 445-0613 if you have any questions regarding the environmental review process.

Sincerely,

Michael Chiriatti, Jr.
Chief, State Clearinghouse

Enclosures
cc: Resources Agency

Response to Comments from the Governor's Office of Planning and Research

1. No response required because this letter acknowledges that Monterey County Planning and Building Inspection Department has complied with the state clearinghouse review requirements for draft EIRs pursuant to CEQA.

STATE OF CALIFORNIA

PETE WILSON, Governor

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD —
CENTRAL COAST REGION
81 HIGUERA STREET, SUITE 200
SAN LUIS OBISPO, CA 93401-5427
(805) 549-3147

June 29, 1995

Wanda A. Hickman
Monterey County Building and Planning
240 Church Street
Salinas, CA 93901

Dear Ms. Hickman:

COMMENTS ON THE DRAFT ENVIRONMENTAL IMPACT REPORT, SANTA LUCIA PRESERVE, MONTEREY COUNTY (SCH #94083019)

Thank you for the opportunity to review your May 19, 1995, draft Environmental Impact Report for the proposed project.

Based on document review, we understand the project involves the development of approximately 2000 acres of land, located within the Santa Lucia Preserve, to include housing, golf course and equestrian center, and other uses. The Santa Lucia Preserve is located south of Carmel Valley in an area known as Rancho San Carlos. The following comments, relating to water quality impacts, should be addressed in your document.

1. Your document discussed the proposal for a 70,000 gallon per day tertiary treatment plant for sanitary sewage treatment from the first five phases of project development. Additional phases will be serviced by on-site septic tank/leachfield systems. Proposed use of reclaimed water may initially include wetland and riparian rehabilitation irrigation and sustained use at a proposed golf course. Operation of the treatment plant and wastewater reclamation system will be subject to regulation by the Regional Board. A report of waste discharge must be filed with this office no later than 6 months prior to operation. Permit requirements will be based on disposal methods proposed. For discharge to wetlands/riparian habitat areas, an individual National Pollutant Discharge Elimination System permit, with associated effluent limitations may be required. 1

2. Your document discusses potential wetlands impacts resulting from fill associated with project construction. It also identifies the need for a Clean Water Act Section 404 permit to be issued by the U.S. Army Corps of Engineers. However, your document fails to address the need for a Clean Water Act Section 401 water quality certification, which is required for any federal permit (as specified in our July 6, 1993 letter of comment to the notice of preparation for this project). Regional Board staff has primary responsibility for review of the certification application. Consideration of impacts to water quality will be assessed during application review. In order for the fill activity to be certified, a determination by staff that the project will uphold water quality standards must be made. Failure to uphold water quality standards will result in denial of certification, and no Corps permit will be issued. Water quality standards include water quality objectives, beneficial use designations and 2

consideration of the Anti-degradation policy, all of which are specified in the Water Quality Control Plan, Central Coast Region (Basin Plan).

Wetlands are defined under federal regulations as environmentally sensitive habitats. The reduction in wetlands habitat can result in loss of sediment removal and energy dissipation characteristics of these areas during storm events. Your project is not considered water dependent and under federal law, presumption is made that a less environmentally damaging alternatives exist. Your document should include a discussion regarding avoidance, alternatives, and mitigation.

If you have any questions, please contact **Adam White at (805-549-3694)**.

Sincerely,

FOR Roger W. Briggs
Executive Officer

AW/lucia1.ltr

cc: State Clearinghouse
1400 Tenth Street
Sacramento, CA 95814

Response to Comments from the California Regional Water Quality Control Board, Central Coast Region

1. A discussion of National Pollutant Discharge Elimination System (NPDES) permits is contained on pages 9-12 , 9-13, 9-26, and 9-27 of the draft EIR. The information contained in this comment is noted for future reference when permits for the treatment plant and wastewater reclamation system will be sought. No changes to the EIR are required.

2. The need for Clean Water Act Section 401 certification is discussed on page 9-14 of the draft EIR. The information contained in this comment is noted for future reference when a Section 404 permit will be sought. No changes to the EIR are required.

3. This comment refers to the permitting requirements under the Section 404 of the federal Clean Water Act. The purpose of this EIR is to assist the local and state lead agencies and responsible agencies in decision making. Federal permitting requirements will be addressed when a Section 404 permit (nationwide permit) is sought. No changes to the EIR are required.

STATE OF CALIFORNIA - CALIFORNIA ENVIRONMENTAL PROTECTION AGENCY

PETE WILSON, *Governor*

STATE WATER RESOURCES CONTROL BOARD
PAUL R. BONDERSON BUILDING
901 P STREET
SACRAMENTO, CALIFORNIA 95814
(916) 657-0446
FAX: 657-1485

Mailing Address
DIVISION OF WATER RIGHTS
P.O. BOX 2000, Sacramento, CA 95812-2000

JUNE 28 1995

E
7/6/95

Ms. Wanda A. Hickman
Monterey County Planning &
Building Inspection Department
P.O. Box 1208
Salinas, CA 93902

Dear Ms. Hickman:

COMMENTS ON THE SANTA LUCIA PRESERVE PROJECT DRAFT EIR (SCH# 95023036)

The State Water Resources Control Board (SWRCB), Division of Water Rights, has reviewed the Santa Lucia Preserve Project Draft Environmental Impact Report and provides the following comments.

The SWRCB wishes to note that there are at the present time six pending water right applications for Rancho San Carlos totaling over 12,000 acre-feet per year (afa) for domestic, irrigation, stockwatering, and recreational use. The application Places of Use fall within the area depicted in the Comprehensive Development Plan (Figure 2-3). In brief the applications are: 1

- Application 29281 for winter onstream storage of 6,000 afa in the San Jose Creek watershed (filed 1988).
- Applications 29282 and 29283 for combined winter onstream storage of 6,000 afa in the Las Garzas Creek watershed (filed 1988).
- Applications 30149, 30150, and 30154 for combined year round direct diversion by wells of 386 afa from the Carmel River alluvial aquifer (filed 1992).

It is evident that the applications for winter storage were made at a time when a project far larger in scope than the current Santa Lucia Preserve Project was contemplated. The hydrologic analysis in this EIR indicates that percolating groundwater will be the major source of supply for domestic and irrigation needs, thus eliminating much of the need for Applications 29281-3. The existence of these applications, however, represents a potential future impact which is neither referenced nor addressed in the present document.

Reference to Moore's Lake is made on page 9-6 and elsewhere. Water currently being stored in this lake is done so without a legal basis of right. Therefore, Application 29282 must be pursued in a diligent manner to bring this facility into compliance with Water Code Sections 1200 et seq.. 2

Finally, reference is made on page 8-21 to three new ponds which will be constructed having a total storage capacity of 38 af. The ponds will be used for irrigation of the golf course and store a combination of stormwater runoff, reclaimed water, irrigation return flow, and water produced from wells. As stormwater runoff is potentially jurisdictional in nature, the project proponent must either demonstrate to the satisfaction of the SWRCB that water so collected is not jurisdictional, or file a water right application. 3

If you wish more detailed information on the above referenced water right applications, or have other questions, I may be contacted at (916) 657-0446.

Sincerely

ORIGINAL SIGNED BY:

Nick Wilcox
Environmental Specialist

cc: State Clearinghouse
1400 Tenth Street
Sacramento, CA 95814

Response to Comments from the California State Water Resources Control Board

1. Text has been added to page 2-12 of the final EIR to address existing applications.

2. Refer to response to Comment 1.

3. As described in the Golf Trail Use Permit Application at the Santa Lucia Preserve (Rancho San Carlos Partnership 1994f), overland flow from the managed turf areas would be captured and treated to prevent nutrients and pesticides from adversely affecting surface waters. The EIR preparers do not believe that these waters are jurisdictional because they are not diverted from an identifiable surface stream, water body, or subterranean stream. Consequently, a permit to appropriate water is not required.

MONTEREY BAY
Unified Air Pollution Control District
serving Monterey, San Benito, and Santa Cruz counties

INTERIM AIR POLLUTION CONTROL OFFICER
Doug Quetin

24580 Silver Cloud Court • Monterey, California 93940 • 408/647-9411 • FAX 408/647-8501

June 21, 1995

Wanda A. Hickman
Monterey County
Planning and Building Inspection Department
P.O. Box 1208
Salinas, CA 93902-1208

SUBJECT: DRAFT EIR FOR SANTA LUCIA PRESERVE DEVELOPMENT

Dear Ms. Hickman:

Staff has reviewed the Draft Environmental Impact Report for the proposed Santa Lucia Preserve project, which would include: 350 residential units; 40-room hacienda; 110-room lodge; ranch center with commercial uses (e.g., post office, grocery store, gas station, retail, offices); conservancy (e.g., library, gallery, meeting rooms, multipurpose room, administration); 18,000 acres of open space; sporting center; recreation center; golf trail with 15,000 square foot clubhouse; equestrian center; public trails; and tertiary wastewater treatment facility. Staff has the following comments:

1. Page S-15, Growth Inducement. The project's consistency analysis should include population growth, if any, that could be induced in the surrounding area from developing the golf trail, as well as growth that could be induced south of the project's boundary from widening Rancho San Carlos Road. 1

2. Page 1-4, bullet 6. The EIR should address the applicability of District Rule 216, Permit Requirements for Wastewater and Sewage Treatment Facilities, to the proposed project. If the proposed tertiary treatment facility is subject to Rule 216, the District should be identified as a responsible agency. 2

3. Page 3-5, para. 4. The AQMP does not state that land uses must be consistent with the Plan. Rather, CEQA Guidelines §15125(b) requires that an EIR discuss any inconsistencies between the proposed project and applicable regional plans, such as the applicable Air Quality Management Plan. The District finds that a project that is inconsistent with the AQMP would have a significant cumulative impact on regional air quality (i.e. ozone levels). 3

CHAIR: Alan Styles, Salinas
DISTRICT BOARD MEMBERS
VICE CHAIR: Ruth Kesler, San Benito County
Jack Barlich, Del Rey Oaks
Fred Keeley, Santa Cruz County
Oscar Rios, Watsonville
Larry Cain, San Juan Bautista
John Myers, King City
Simon Salinas, Monterey County
Edith Johnsen, Monterey County
Judy Pennycook, Monterey County
Walt Symons, Santa Cruz County

4. Page 14-6, para. 4. The 1994 AQMP does not recommend adoption of additional controls, since adopted controls, when considered with updated emissions inventory and forecasts, would achieve and go beyond the emissions budget necessary to attain the State ozone standard. 4

5. Page 14-8, para. 4. The second criterion listed applies to unsignalized intersections. However, carbon monoxide modeling should also be undertaken for signalized intersections that operate at LOS E or F if project traffic would increase the V/C ratio by 0.05 or more. 5

6. Page 14-14, Additional Mitigation. Since this mitigation measure calls for preparation of a phased construction plan, the mitigation monitoring program on Page B-11 should identify who is responsible for reviewing and approving the plan prior to commencement of construction and the criteria this entity will use to determine the plan's adequacy in limiting PM_{10} emissions below significance. 6

Thank you for the opportunity to comment on the document. If you have any questions, please do not hesitate to call Douglas Kim of our planning staff.

Sincerely,

Janet Brennan
Senior Planner, Planning and
Air Monitoring Division

cc: Nicolas Papadakis, AMBAG
File: 3442
PAM/dk

Response to Comments from the Monterey Bay Unified Air Pollution Control District

1. As described on page 2-4 of the draft EIR, the Monterey County Board of Supervisors adopted Resolution No. 93-115, amending the GMPAP to designate that portion of the ranch within the GMPAP as a Comprehensive Planned Use area. To carry out that designation, the board required a comprehensive development plan to be prepared for the entire site, which includes lands within the GMPAP area and those portions of land located outside the GMPAP area within the CVMP and coastal zone. Specifically, Board Resolution No. 93-115 states that the total density included in the entire comprehensive development plan shall not exceed 150 visitor accommodation units and 350 single-family dwelling units. The proposed project is consistent with this density limitation. In accordance with Board Resolution No. 93-115, additional growth would not be permitted within the comprehensive development planning area.

   Additionally, the proposed project currently calls for substantial residential development adjacent to the golf trail (see vesting tentative map [VTM] sheet 13).

   In summary, the golf trail is not expected to induce growth because of the land use density maximum imposed by Board Resolution No. 93-115 and because development is already planned for suitable lands adjacent to the proposed golf trail.

   As described on page 13-11 of the draft EIR, Rancho San Carlos Road is paved, private rural road that extends about 10 miles south of Carmel Valley Road. This road is approximately 20-24 feet wide between Carmel Valley Road and Quail Meadows Place, about 18 feet wide between Quail Meadows Place and the Carmel Valley Racquet & Health Club, and 10-12 feet wide south of the racquet club. Rancho San Carlos Road is proposed to be upgraded to include two 10-foot-wide travel lanes to the south of the Quail Meadows subdivision entrance. In addition, the applicant is proposing to reconstruct and realign Rancho San Carlos Road between Quail Meadows Place and the main gate to provide adequate corner sight visibility and to upgrade and widen the bridge across the Carmel River. These upgrades are intended to provide a safe access road through the project site. The roadway will remain a winding, rural roadway even with these improvements. Improving Rancho San Carlos Road would not remove obstacles to growth in the area south of the project site (growth other than the proposed project would not be facilitated by these improvements) and is therefore not considered growth inducing.

2. A paragraph has been added to the EIR stating that the project's wastewater treatment plant would be subject to MBUAPCD Rule 216 and that it would be consistent with the 1994 AQMP. Because the project is subject to Rule 216, MBUAPCD is considered a responsible agency under CEQA.

3. This correction has been made in the final EIR.

4. The local air quality management discussion that starts on page 14-6 of the draft EIR refers to several control measures that have been adopted or are proposed for adoption by the MBUAPCD. Those measures were proposed in the MBUAPCD's 1991 AQMP rather than the 1994 AQMP. The text has been changed accordingly.

5. The significance criteria on page 14-8 have been modified to include this additional criterion for signalized intersections.

6. The mitigation measure requiring phased construction has been revised to identify the Monterey County Planning and Building Inspection Department as the agency responsible for reviewing and approving that plan before the start of construction. The Monterey County Planning and Building Inspection Department will also be responsible for specifying the criteria to be used to determine the adequacy of the phased construction plan.

MONTEREY COUNTY

DEPARTMENT OF HEALTH ROBERT J. MELTON, M.D., M.P.H., Director

FAMILY AND COMMUNITY HEALTH ENVIRONMENTAL HEALTH HEALTH PROMOTION
MENTAL HEALTH ALCOHOL AND DRUG PROGRAMS EMERGENCY MEDICAL SERVICES

1270 NATIVIDAD ROAD, SALINAS, CALIFORNIA 93906-3168 (408) 755-4500
1200 AGUAJITO ROAD, MONTEREY, CALIFORNIA 93940-4696 (408) 647-7650
1180 BROADWAY, KING CITY, CALIFORNIA 93930 (408) 385-8324

PLEASE REPLY TO ADDRESS CHECKED

DATE: July 10, 1995

Wanda Hickman, Project Planner
Planning and Building Inspection Department
P.O. Box 1208
Salinas, CA 93902

RE: Comments on Draft EIR for Santa Lucia Preserve and Golf Trail

We have had the opportunity to review and comment on the Draft EIR. In general the EIR is well written and will serve as a very useful reference in the processing of the application. Below are comments organized by section.

CHAPTER 8: WATER; HYDROLOGY, BASE FLOW, SUPPLY, DEMAND

1. Introduction (and p. 8-17).

The EIR makes reference to the possibility of connection to some other water source in emergency drought conditions. Unless a specific emergency water source is identified and then investigated for feasibility, this language should be deleted or qualified. 1

2. Flow Boundaries and water level contours.

It is acknowledged that there is no clear indication of geological barriers to groundwater flow at this time. It is therefore acceptable that impacts can be addressed on a watershed basis as opposed to a hydrogeological unit basis. Although the watershed analysis in the EIR is valid and acceptable, discussions in the DEIR should be qualified on this issue. Specifically, this Department still has concern with the use of the Groundwater Elevation Map in supporting this conclusion.

The reason for the concern is a combination of the following: 1) the large scale of the map, 2) the large distances between wells, 3) large elevation differences between wells, 4) the five known faults between many wells, and 5) some wells are drilled in two or more formations. Given these variables, it is doubtful that the map is statistically and geologically valid (except for portions of the Las Garzas watershed). The "smooth continuous contours" are the expected result of the computer program used to generate such contours. It is therefore strongly recommended that the Groundwater Elevation Map only be used for very general statements about the flow patterns and groundwater levels under the ranch. 2

3. Water Balance; Project Demand - Viticulture.

RSC has indicated indirectly via the "CC&R's" that viticulture will be allowed. It is not clear what the impacts will be from this since a number of variables are unknown; 1) number of acres in production, 2) number of parcels involved, 3) which watersheds the water demand will be in, and 4) water demand estimates. Specific information should be obtained from the applicant on these variables. Additional demands and potential groundwater impacts should then be addressed. Increased nitrate loading from fertilizers may also have localized impacts on water quality. 3

The CC&R's and this Department's requirements prevent the drilling of individual wells for each parcel. Therefore any additional demands will have to be met by the water system infrastructure which may, in turn, require additional wells/storage, etc.

4. **Water Supply Reliability - Water System Demand. (pp. 8-21/22, 29/30).**

The Health Department and the State Department of Health Services use the source capacity requirements found in Title 22 of the California Code of Regulations, Chapter 16. This Department will be enforcing Title 22 at least until the system reaches 200 connections. In addition, this Department will be responsible for clearing the individual final maps as the project is phased in, and proof of adequate source capacity will have to be in place prior to clearance of each phase.

Chapter 16 takes into account that more water is used in hotter climates. This is accounted for by using different temperature-demand curves. The use of lower temperature curves makes a significant difference in the amount of water demand and therefore could significantly affect the number of wells required in the bedrock aquifers on the ranch. 4

It is unclear why Monterey temperatures were used to justify the use of the 60° demand curve which was then cited in the EIR. Temperatures are clearly higher on the Ranch than in Monterey. Also CIMIS data and weather station data on the Ranch are available and should be used. The use of the 60° curve also appears to be in contrast to the evapotranspiration rates used by the Ranch in the hydrology study and golf course application materials. Therefore the use of the 60° demand curve does not appear to be appropriate unless additional justification is provided on these points.

5. **Additional Potential Impact; 50+ Additional Wells.**

Although it is likely that this issue can be mitigated to a level of insignificance, the completion of at least more 50 wells should be considered as part of the overall impacts for the project. The actual number of wells may be higher assuming that 10% of the wells do not produce practical quantities of water. Grading, spoils, drilling mud, construction noise, and additional conduits for groundwater contamination should be considered as potential impacts. Consideration should be given to establishing minimum setbacks from creeks and minimum depth of well seals. Nearly all the existing wells have the minimum 50' seals. 5

CHAPTER 8: PROPOSED MITIGATION MEASURES

6. **General.**

Please number the mitigation measures in the Final EIR. It is currently difficult to refer to the mitigations by text only. This will also allow the agencies to track changes in the mitigation measures and to develop corresponding conditions as part of the mitigation monitoring plan. 6

7. **General.**

To increase readability and to aide enforcement, many of the mitigation measures should be re-written (if possible) to separate the actual mitigation language from the explanatory language. The mitigations should include more precise and directive language to aide enforcement. The applicant, the public and the decision makers need to be clear on "what" the mitigations are, and "how" and "when" the mitigations will be implemented. The "why" should be described separately from the actual mitigation language. 7

8. Mitigation Measure for New Wells Equal to Water Demand (pp.8-29/30/31).
The previous mitigation proposed in the "Screen Check" copy of the EIR (SC-EIR) was appropriate and was supported by this Department and the third party consultant. This Department will be enforcing the permit requirements for the water system at least until it reaches 200 connections and is involved in the clearance of the final subdivision maps as described above. It is recommended that the earlier version of the mitigation appear in the Final EIR.

It should also be noted that the State Department of Health Services does not conduct annual inspections on water systems.

Our previous comments on the wording of the earlier mitigation measure still apply in that the measure should be separated into two parts or two separate mitigations. The first part should be a "phase 1" testing procedure outlining how to bring a new well on-line and establish a *preliminary* long term well yield. Pump testing methods, time of year of test, and minimum length of test should be recommended. The 72 hour test period proposed seems acceptable.

Based on related discussions in the EIR, it may be appropriate to consider the following three factors when completing a phase 1 pump test; 1) estimate the casing storage effects of the well prior to the test and then add it to the 72 hr minimum. 2) Establish a minimum distance from the well to a stream or otherwise be required to have simultaneous stream gauging for drawdown effects. 3) Adjacent wells within some minimum distance should also be monitored for drawdown. 8

The "phase 2" (on-going) testing procedure was essentially written in the SC-EIR. However reference should be made to how often and when the monitoring results need to be submitted. The enforcement agencies should be named (County Division of Environmental Health and State DHS). The criteria (Title 22-Chapter 16, fire flow, or subsequent engineering considerations) should be stated.

The Health Department will have a condition of approval requiring the applicant to install or bond water system improvements necessary to serve each phase of the subdivision. It will also be a condition that proof of adequate source capacity is provided for each map phase before it is filed. This can be done with "phase 1" testing.

The applicant will need to consider whether the map phases correspond to the 23 pressure zones required to physically serve the project. Furthermore, some of the pressure zones may serve more than one phase of the subdivision. Therefore it is possible that while the "total system" may have adequate well yields, a specific pressure zone may be inadequate. Therefore it is recommended "sufficient total system yield" (as was used in the SC-EIR) be re-defined to allow for the approval of separate pressure zones. The definition should consider that the terminology historically used by this Department when discussing water quantity from wells is "adequate source capacity."

Lastly the newer version of the mitigation that appears in this DEIR is somewhat vague since it is no longer clear what the objective is and how it is tied to the potential impact. Also please see item 7, above.

CHAPTER 9: WATER QUALITY

9. Additional Impact-Discharge from Water Treatment Units.
The water system will require the treatment of large quantities of water to remove minerals from the water to meet secondary drinking water supply standards. At this time it is not clear how the 9

treatment units will be flushed. Typically they are back-washed into trenches. However a number of variables are not known at this time including; 1) the number of units, 2) the location of the units, 3) the volume of discharge, 4) frequency of discharge, and 5) chemical composition of the discharge. 9

It should also be determined if the backwash from the filtration systems (and the water softeners) significantly increases the net groundwater demand that must be pumped from the wells. Gross water pumping versus net deliveries to users should be estimated.

ALTERNATIVES ANALYSIS

10. No Project Alternative; Existing lots of record.

Although the current EIR may have an adequate discussion of this alternative as required by CEQA, we recommend this alternative be evaluated in more detail if the necessary information is available. It is known that a number of the existing lots are not buildable or subdividable. The number of buildable lots and subdividable lots needs to be estimated. Then the actual impacts should be quantified as best possible and compared to the proposed project alternative. The possibility of doing a major lot-line adjustment for the existing lots and have them conform to the newly proposed building sites was not explored. 10

Thank you for the opportunity to review the Draft EIR. Please fell free to call if you have any questions.

Sincerely,

Walter Wong, M.P.H., R.E.H.S.
Director, Division of Environmental Health

Mark Dias, R.E.H.S.
Senior Land Use Specialist
Division of Environmental Health

cc: Walter Wong, Director, Division of Environmental Health
Mary Anne Dennis, Chief, Resource Protection Branch
Lynne Mounday, Supervising Planner
Catherine Ma, SDHS
Owen Stewart, MCWRA
Jay Jones, OGDEN
Darby Fuerst, MPWMD
Joe Oliver, MPWMD

MD/md/RSC-D.EIR

Response to Comments from the Monterey County Department of Health, Division of Environmental Health

1. The language is already qualified by the statement "With the mitigation measures proposed in this EIR, the supply would be reliable and these potential environmental impacts would be avoided." The purpose of the statement was to provide the reason for the groundwater investigation and reflects the concerns of many members of the public and government agencies about the project.

2. The department's concerns regarding the groundwater elevation map are noted.

3. The covenants, conditions, and restrictions (CC&Rs) submitted by applicant with the combined development permit application state:

> In addition to the residential uses specified in Paragraph A of this section 1, Lots ___,___,___, and ___ may be used for viticultural purposes, subject to the provisions of the Conservation Easement pertaining to such lot, and subject to first obtaining all necessary permits from the County of Monterey and any other governmental agency having jurisdiction over viticultural activities.

Thus, the CC&Rs specify that a small number of the larger parcels (perhaps as many as 10, although none have been specifically identified) may be suitable for viticulture. Candidate parcels might include Lot 188 in the Potrero; Lot 225 in the Mesa; and Lots 245, 249, and 250 in the Touche. The intent of this CC&R is to make it clear to potential buyers that hobby viticulture for home winemaking is allowed. Hobby vineyards are typically 1-5 acres in size. In the unlikely event that 10 homeowners each plant 5 acres of grapes, there would be a total of 50 acres of vineyard.

Grapes require relatively little irrigation water. The consumptive use of applied irrigation water during the growing season (April 15 to October 31) in areas with more than 22 inches per year of average annual rainfall is less than 0.7 foot. Thus, the maximum consumptive water use for viticulture would be 35 acre-feet per year, or about 10% of total water demand for the project.

Water demand for grapes and the potential need for additional wells to supply that demand are not addressed in the EIR because the actual amount of hobby viticulture is highly speculative. Possibly, no homeowners will choose to grow grapes. Furthermore, there are no specific limitations imposed on any type or amount of water use by homeowners. Thus, the appropriate question is not how much water they could use, but how much they are likely to use. As described on page 8-18 of the draft EIR, measured water-use data from nearby developments with similarly large single-family homes indicate that the water demand factors used in the draft EIR

appear to be ample, and they include water demand for a representative sample of actual irrigated landscaping.

The effects of water demand for viticulture, if any, would be distributed among the watersheds in the same proportion as the effects of other water uses because the irrigation would be supplied by the main water system.

The impact of groundwater degradation from a possible increase in nitrate loading in groundwater from fertilizers applied for viticulture is less than significant. In the past, for high-usage situations such as those associated with vines experiencing low vigor, 50-100 pounds of nitrogen was applied per acre. Using current recommendations, less than half of that is applied when using furrow irrigation, and only about a quarter is applied when using drip irrigation.

However, irrigation is not the only factor that affects the amount of nitrogen that should be applied to a vineyard; periodicity is also important. In the past, one application of nitrogen typically was made in the dormant season. This increased the potential for groundwater contamination, although the potential remained small. Under new recommendations, split applications are used: two applications in late spring or early summer, and one application after harvest. When split applications are used, 25-30 pounds of nitrogen is applied per acre per season in high-use situations, although frequently only 15-25 pounds per acre is used. If drip irrigation is used, normally 12-20 pounds per acre is used. Another significant factor in determining the potential for groundwater contamination with nitrogen is substrate. The potential is higher if the vines are planted in sandy soil, but it is still low (Verdegaal pers. comm.).

4. The 60° temperature curves were not used to estimate golf trail water demand or peak water requirements. Golf trail water demands were developed based on evapotranspiration requirements for turfgrass and below-average rainfall (18 inches average annual versus estimated 28-30 inches average annual for the golf trail). Estimates of peak golf trail requirements to be met by wells took into consideration the summertime water requirements for the golf trail and the use of storage facilities at the golf trail to meet short-term peak demands.

Title 22 of the California Code of Regulations requires the calculation of maximum day demand to estimate the source capacity required for residential water use. For projects where there is no historical use to determine water demands, Title 22 provides a chart to estimate source capacity requirements. The chart allows the calculation of required source capacity based on the anticipated number of residential service connections and the maximum average monthly air temperature for the area. According to Department of Health Services, these curves are based on empirical data and are considered very conservative.

The maximum average monthly air temperature is the maximum value of long-term monthly average air temperatures. Maximum monthly air temperatures were determined using National Oceanic and Atmospheric Administration Bulletin No. 20, Climatography of the

United States, Climatic Summaries for Selected Sites, 1951-1980. The Monterey station was used for Rancho San Carlos to provide an estimate of the source capacity required for the proposed development. No long-term temperature records are available at Rancho San Carlos to refine this estimate.

Because the water system will be completed in phases, the demand curves will affect only the number of wells required for the early phases of project development. By the time later phases are built, measured water use from the early phases will be available for estimating the necessary source capacity. Title 22 states that "Whenever possible, needed source capacity and needed storage volume shall be determined from existing water use records of the water system" (Section 64564[a][1]), and that the temperature-based demand curves should be used only "when the existing records of the water system are inadequate to determine" actual water use and demand factors (Section 64564[a][2]). Thus, the total source capacity required for the water system at buildout will be determined by actual water use during the early phases of project development.

5. Well construction would involve the activities mentioned in the comment; however, standard practices of stockpiling, erosion control, and careful siting would preclude significant environmental impacts.

6. This request would require a substantial effort because of the extensive number of mitigation measures and cross references that would be referenced; consequently, it has not been implemented.

7. Explanatory language is important in describing a mitigation measure. The mitigation monitoring program in Appendix B identifies the specific details. The mitigation measures were not intended to be used verbatim as conditions of project approval.

8. The previous mitigation proposed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", in the Screen Check EIR was changed to the measure entitled "Additional Mitigation Measure: Maintain a Water Supply Equal to or Greater than Connected Water Demand at All Times" (page 8-29) because it was found to be redundant with the requirements of the State Department of Health Services. This new mitigation measure is consistent with the intent and objectives of the mitigation proposed in the Screen Check EIR.

Section 4039(b) of the State Health and Safety Code does provide for annual inspection of water systems by the state or local health department.

The mitigation measure states that the well test used for new or rehabilitated wells would be measured in conformance with the Title 22 Waterworks Standards using 72-hour pumping tests similar to those performed for the Comprehensive Hydrological Study. Any relevant data thus would be collected, as it was during the study. A time-drawdown plot would show evidence of interference with another well.

The mitigation measure also states that annual inspections are mandated by the Department of Health Services, as stated above, and the criteria tested.

In any year in which a need for additional capacity is identified (using the criteria listed in the mitigation measure), the additional capacity will be provided in accord with the annual review of the Water Supply Permit, which is expected to limit new connections to the water supply system if total system capacity is insufficient to meet demand.

Adequacy of system capacity is based on average operating time for wells in the system. It is believed that this method is sufficient to determine whether sufficient water is available to meet system demands.

As stated before, this new mitigation measure is consistent with the intent and objectives of the mitigation proposed in the Screen Check EIR.

9. Several of the wells for the proposed development will need to be equipped with units to treat water for constituents (e.g., iron and manganese) that exceed Title 22 secondary drinking water standards. As is appropriate for this stage in the planning process, anticipated treatment requirements have been developed at a conceptual level. For wells in the San Francisquito Flat and upper San Clemente watershed, current plans are to dispose of backwash water from treatment units into the sewer collection system. As discussed in the application documents and the EIR, this water would be recycled by treating it and reusing it at the golf trail. For wells in areas where there will be no sewer collection system, recycling backwash water is planned. Washwater would be temporarily held, allowing solids to settle out. The supernatant would be decanted off and blended with the raw water entering the treatment unit. Thus, it would be "retreated" before entering the distribution system. The settled solids would be disposed of as solid waste. With this decanting and recycling process, water losses from backwash of treatment units are not expected to significantly increase net groundwater demand.

10. This alternative is evaluated sufficiently under CEQA. Refer to the response to Comment 6 from Alexander T. Henson regarding the Existing Lots of Record Alternative.

MEMORANDUM

MONTEREY COUNTY PARKS DEPARTMENT

DATE: July 6, 1995

TO: Wanda Hickman, Associate Planner

FROM: Rich Brandau, Planner RICH

SUBJECT: Review of draft EIR for the Santa Lucia Preserve - EIR# 94-005

I have reviewed the section which addresses the issue of public trails in the above referenced Draft EIR and have the following comments:

It is my understanding that representatives for the proponent and the Monterey Peninsula Regional Park District (MPRPD), are nearly in agreement on public trail as they relate to the Santa Lucia Preserve project. The County Parks Department will defer comments on trail issues to the District since any agreed upon trail routes will ultimately link the project to existing District trails. Additionally, the third paragraph on page 16-22 states that *the proposed trails will be licensed to an appropriate public agency who will assume all responsibility for their construction and maintenance as well as satisfying all patrol and liability requirements.* Please be advised that the responsible agency in these matters will be the District and any agreements in this regard will be between the District and the proponent. 1

The County Parks Department fully supports the efforts of the Park District in their ongoing discussions with the project proponent to secure for the residents of Monterey County, a reasonable public trail access plan over portions of the Santa Lucia Preserve. However, on behalf of the County's trail users, it is my opinion that the public trail access plan, as proposed in the Draft EIR, is absolute minimum at best. Hopefully these two entities will give thoughtful consideration to a more meaningful trail system, given the diversity of the project and 17,800+ acres that remain in open space.

Thank you.

cc: Gary Tate, General Manager
Monterey Peninsula Regional Park District

Joel Panzer
c/o: Rancho San Carlos Partnership

Response to Comments from the Monterey County Parks Department

1. The Monterey County Board of Supervisors will consider this comment when it takes action on the proposed project.

DEPARTMENT OF PUBLIC WORKS
COUNTY OF MONTEREY

MEMORANDUM

TO: Planning & Building Inspection Department
Attn: Wanda Hickman

FROM: Development

SUBJECT: **DRAFT EIR #94-005, SANTA LUCIA PRESERVE**

DATE: July 6, 1995

Attached are comments on the draft EIR for the above project from our Traffic Section.

HCN/cw
Attached: Traffic comments

d-22,luc01795.mem
Draft EIR

MONTEREY COUNTY PUBLIC WORKS DEPT.
Engineering Div., Traffic Section

MEMORANDUM

TO: Development Services Section

FROM: Neal Thompson, Traffic Engineer N.E.

SUBJECT: SANTA LUCIA PRESERVE DRAFT EIR COMMENTS

DATE: June 28, 1995

The Traffic Section has finished their review of the draft EIR and we have the following comments.

Rancho San Carlos Road & Carmel Valley Road Intersection

We disagree with the applicant's level of service (LOS) traffic analysis for the intersection of Rancho San Carlos Road and Carmel Valley Road as presented by both the applicant's traffic engineer and the preparer of the EIR document. In both instances the consultants assumed that providing a separate westbound painted lane for northbound Rancho San Carlos traffic to turn left into will provide 100% utilization (no influence from westbound traffic) of the lane. We do not believe that will be the case since many older drivers will hesitate to use it unless traffic is clear in both directions. At a minimum, a physical barrier would have to be provided. We know of no accepted method for calculating improved capacity for painted median acceleration lanes. While some credit should be given for improved capacity, it is unrealistic to assume no influence from westbound traffic on the use of the lane. Therefore, we do not believe the applicant's proposed mitigation to be as beneficial as presented. 1

Also, at this same intersection, we believe more comprehensive improvement plans which include environmental assessment should have been discussed to resolve the traffic impacts of the Santa Lucia Preserve Project over the next 20 years. Since an interchange (grade separated structure) is most likely prohibitive from both a cost and visual impact perspective, since grading of the steep embankment on the north side of Carmel Valley Road to provide such a facility would be extensive, since three signal warrants are presently met, and since Rancho San Carlos Road intersection approach traffic is projected to increase 2.5 times the 1991 volume in the PM peak hour and 6 times the AM peak hour over the 20-year build out period of the project, the Traffic Section requests roadway widening and traffic signal improvements be considered as the minimum project that will mitigate impacts of the Santa Lucia Preserve project. 2

Obviously, from a traffic flow and safety perspective, we have no

problem with a properly designed interchange since it is normally much superior to traffic signal controls. Our main point is either a traffic signal or a grade separated structure must be installed in the near future to mitigate impacts from this project and approved projects under construction. 2

Concept sketches of both traffic signal and grade separation projects are attached.

Rancho San Carlos Road Bridge Over Carmel River

The draft EIR document is not clear on the use and width of the pedestrian bridge to be added to the existing bridge. It should be pointed out that bicycle travel would be extremely hazardous on the existing bridge due to its proposed narrowness of 20 feet (room for passing automobiles only) and the length of the bridge. For safe two-way bicycle travel, a minimum 8-foot wide adjacent structure must be provided. The desirable width is 12 feet. 3

Missing Text

It should be noted that part of the text is missing from the last paragraph on page 13-41. 4

cc: Herb Naslund, Development Services Engineer
Gerald J. Gromko, Public Works Director
George Divine, Transportation & Development Engineer

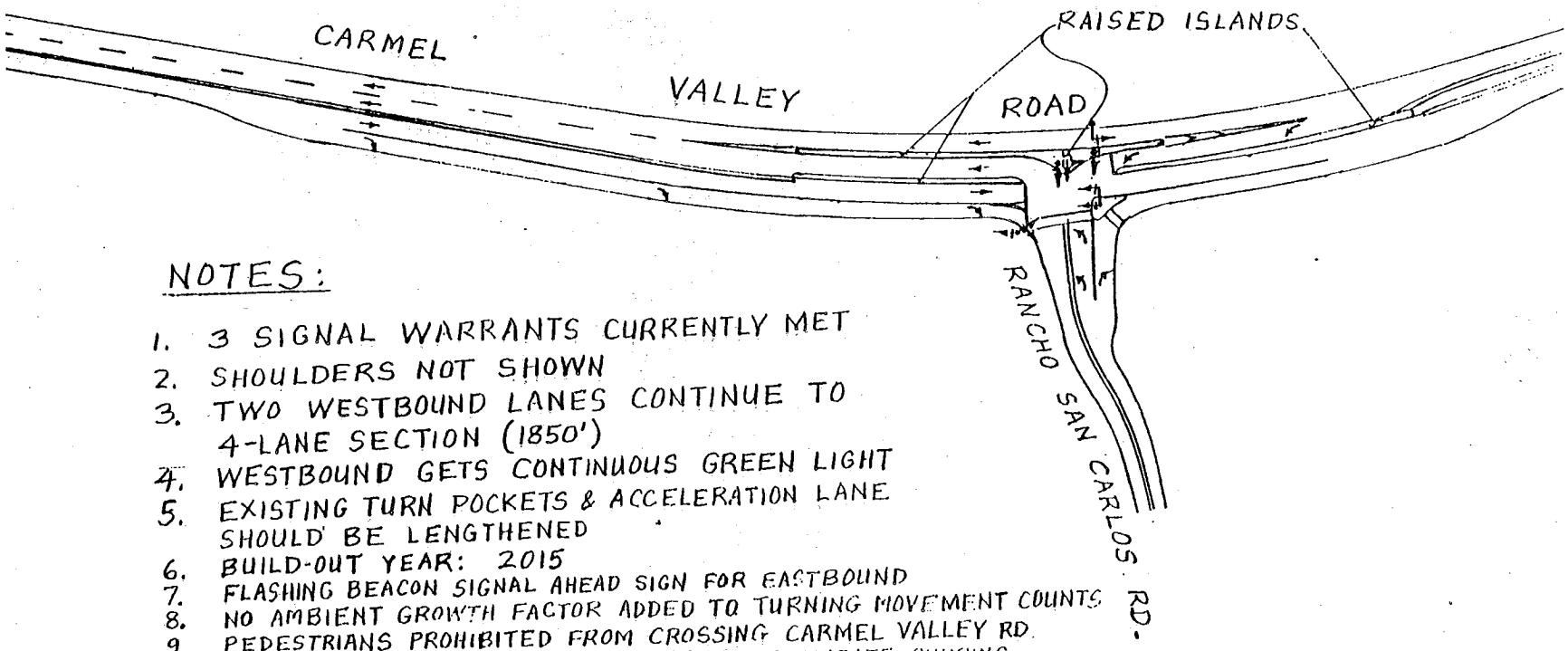
ROAD WIDENING AND TRAFFIC SIGNAL MITIGATION PLAN SANTA LUCIA PRESERVE

HALF SIGNAL CONCEPT

*PM PEAK LOS AT BUILD-OUT: C-, V/C = 0.794
*AM PEAK LOS AT BUILD-OUT: A, V/C = 0.404
PM PEAK LOS '85 HCM AT BUILD-OUT: B- (Critical Movements, 90 Sec. Cycle)

N

SCALE: 1"=100'

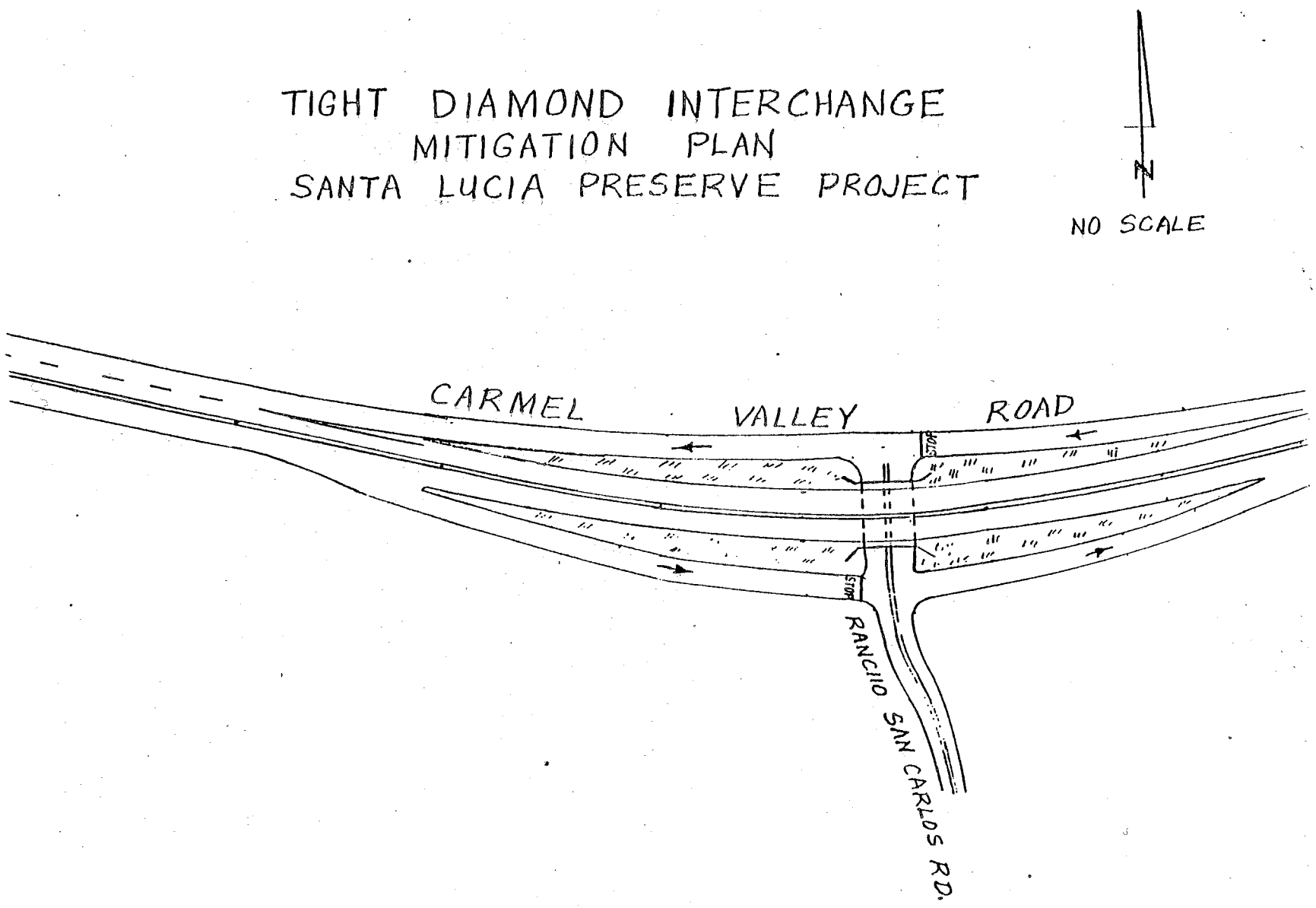


NOTES:

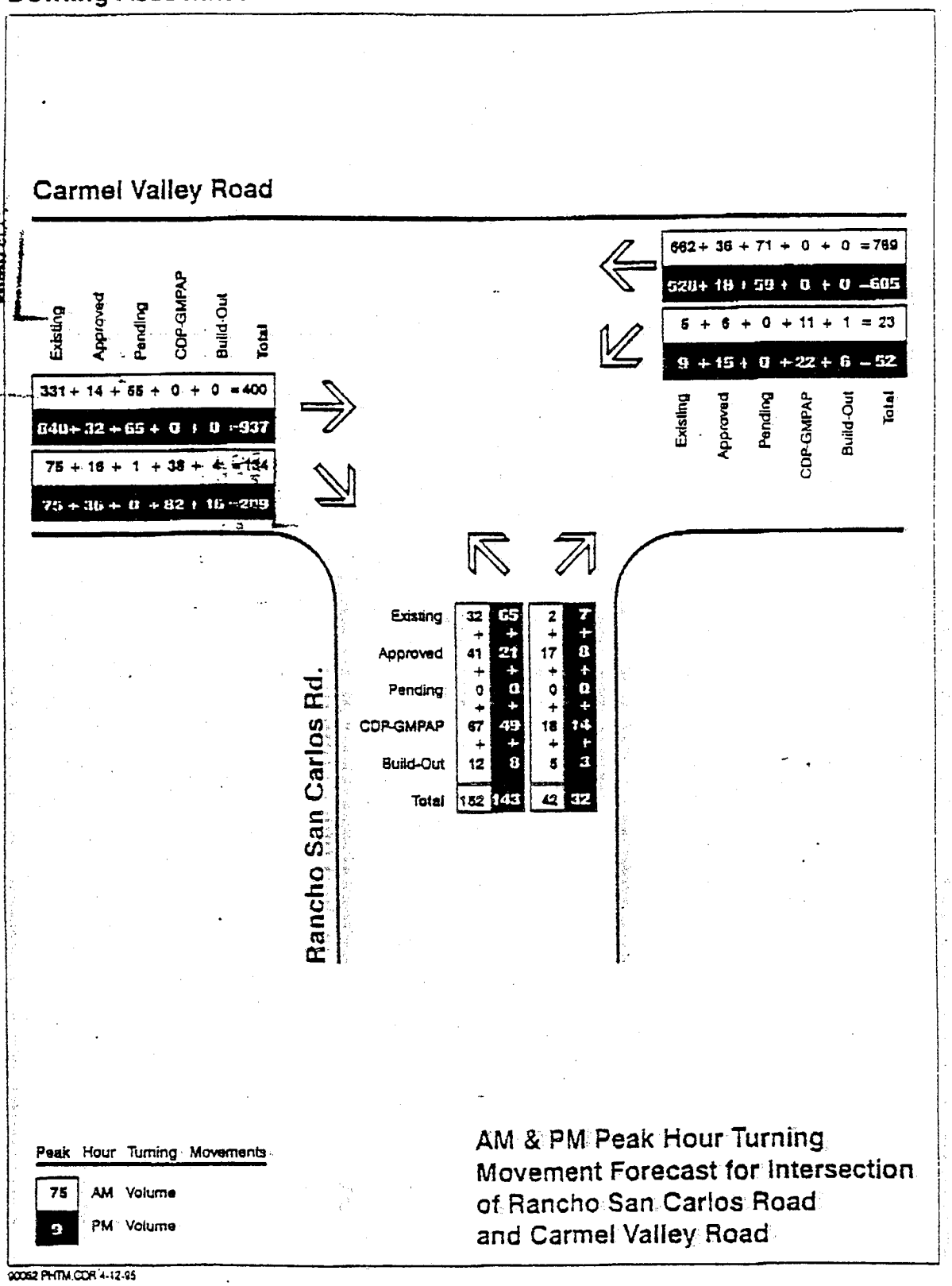
1. 3 SIGNAL WARRANTS CURRENTLY MET
2. SHOULDERS NOT SHOWN
3. TWO WESTBOUND LANES CONTINUE TO 4-LANE SECTION (1850')
4. WESTBOUND GETS CONTINUOUS GREEN LIGHT
5. EXISTING TURN POCKETS & ACCELERATION LANE SHOULD BE LENGTHENED
6. BUILD-OUT YEAR: 2015
7. FLASHING BEACON SIGNAL AHEAD SIGN FOR EASTBOUND
8. NO AMBIENT GROWTH FACTOR ADDED TO TURNING MOVEMENT COUNTS
9. PEDESTRIANS PROHIBITED FROM CROSSING CARMEL VALLEY RD.
10. SAFETY LIGHTS, SIGNS, & WHITE PAINT WILL DELINEATE CURBING

* CRITICAL MOVEMENT ANALYSIS, Circular 212.

TIGHT DIAMOND INTERCHANGE
MITIGATION PLAN
SANTA LUCIA PRESERVE PROJECT



Dowling Associates



90052 PHTM.CDR 4-12-95

Response to Comments from the Monterey County Department of Public Works

1. The methodology for analyzing the left-turn acceleration lane at the intersection of Carmel Valley Road and Rancho San Carlos Road assumes that with the construction of the acceleration lane, the northbound-to-westbound left-turn lane will not be influenced by the westbound through-movement. This methodology assumes the best-case operation of the acceleration lane. Even considering this best-case situation, the EIR concludes that the left-turn acceleration lane will not mitigate the impacts of proposed cumulative buildout, and alternative mitigation measures are recommended.

2. The County Planning Department appreciates the concept sketches of the traffic signal and grade separation project for the intersection of Carmel Valley Road and Rancho San Carlos Road. As mentioned in the comment, the EIR recommends that either a traffic signal be installed at this intersection or an underpass for the northbound left-turn movement be constructed. The EIR discusses the constraints and impacts associated with a grade-separated interchange at this intersection in accordance with CEQA requirements. The Monterey County Board of Supervisors will consider the recommendation by the Monterey County Department of Public Works for a traffic signal at this location as a minimum requirement when it takes action on the proposed project.

3. The width of the pedestrian footpath has not been determined yet. The proposed width and design of this footpath would be presented to Monterey County Department of Public Works for approval. As noted in the comment, the width of this bridge, as well as the remaining portion of Rancho San Carlos Road, is too narrow to safely accommodate bicycle travel.

4. This text has been added to the final EIR.

MONTEREY COUNTY

PLANNING AND BUILDING INSPECTION DEPARTMENT

P.O. BOX 1208 SALINAS, CALIFORNIA 93902 (408) 755-5025

ROBERT SLIMMON, JR.

DIRECTOR OF PLANNING AND BUILDING INSPECTION

July 13, 1995

Wanda A. Hickman, Project Planner
Monterey County Planning & Building Inspection Dept.
P.O. Box 1208
Salinas, CA 93902

SUBJECT: Monterey County Historic Resources Review Board's Comments on Chapter 17 (Historical Analysis) of the Santa Lucia Preserve Project Draft Environmental Impact Report (DEIR #94005 - Rancho San Carlos Partnership)

Dear Wanda:

The Monterey County Historic Resources Review Board (HRRB) met on June 27, 1995, and reviewed Chapter 17 (Historical Analysis) of the Santa Lucia Preserve Project Draft EIR. During the meeting, the Review Board voted unanimously (6 to 0) to support the following comments:

1. Page 17-8, paragraph 3. The first sentence states that five historic resources have been identified which are located in the Greater Monterey Peninsula Area Plan (GMPAP) area. This paragraph should be revised to state that there are actually 3 sites within the GMPAP. County Bridge #523 and the Bradley Sargent adobe are located within the Carmel Valley Master Plan area. 1

2. There are a total of 15 mitigation measures that affect cultural resources identified in Appendix B, i.e., the Mitigation Monitoring program, and Chapter 17 of the DEIR. The language in the mitigations, and subsequent conditions, needs to be changed to delete words such as "should" and "when feasible" and replace the language with "shall." These revisions help to ensure compliance with the mitigations identified in the DEIR. 2

3. A 16th mitigation measure needs to be added to Chapter 17 and the Mitigation Monitoring Program (Appendix B) that requires implementation of an ongoing monitoring program of the 15 mitigations which affect cultural resources. 3

4. On page 17-11 (first full paragraph) the author states that "it has been determined that San Carlos Ranch is most appropriately considered within the framework of an historic district and that the district is significant at the local level representing the broad patterns of California history and cultural heritage." The HRRB recommends that the site be placed within an historic district consistent with comments in the Draft EIR. 4

On behalf of the HRRB, thank you for the opportunity to review and comment on the Draft EIR. For your information, the HRRB is also required to review any subsequent development applications which may affect historic resources on the Santa Lucia Preserve. Should you have any questions, please contact me at 755-5310.

Sincerely,

Ann Towner, Senior Planner

cc: Members, HRRB
Meg Welden, County Parks Department
Joel Panzer, Rancho San Carlos Partnership
RSC - HRRB File

Response to Comments from the Monterey County Planning and Building Inspection Department, Historic Resources Review Board

1. Four sites are within the GMPAP; County Bridge #523 is within the planning area of the GMPAP (where Robinson Canyon Road crosses Las Garzas Creek), but this feature is owned by the county and is technically not part of the project. This correction has been made in the final EIR.

2. The reason the word "should" is used rather than "shall" is because until the Monterey County Board of Supervisors stipulates conditions to the project, the mitigation measures are merely recommendations to reduce impacts to a less-than-significant level. If the word "shall" is used, it implies that the mitigation measures presented in the EIR would definitely be implemented. It is not until the conditions of approval are adopted that the mitigation measures become mandatory.

3. The intent of the mitigation monitoring program is to provide for such monitoring.

4. It was determined that San Carlos Ranch should be *evaluated* as a district for the purposes of assessing the impacts of the project and developing appropriate mitigation measures. This evaluation for CEQA purposes is not directly related to Monterey County's Preservation of Historic Resources Ordinance, which establishes the criteria and process for the designation of historic districts. The only connection between the two determinations occurs when a historic district has already been designated before a CEQA evaluation is done. In such a case, the property would automatically be considered significant for the purposes of CEQA compliance as long as the criteria for listing are consistent with those adopted by the State Historic Resources Commission for the California Register of Historical Resources. The EIR does not recommend that the historic properties be placed in a historic district in accordance with Monterey County's ordinance; the use of the district approach in the EIR was an appropriate way to evaluate impacts.

   The important distinction between the two processes is that for a property to be listed according to the requirements of the Monterey County Preservation of Historic Resources Ordinance, the owner must agree to allow the property to be designated. In contrast, an assessment of a property's significance, which is based on the determination that the property would constitute a district, does not require the landowner's permission. In the latter case, based on the research conducted by others at San Carlos Ranch (Greenwood and Associates 1991, Gil Sanchez 1995), the EIR preparers believe that it would not be appropriate to assess the impacts of the project on individual buildings because their significance is based on the contribution they make to the whole (i.e., the whole is greater than the sum of its parts).

   The Monterey County Board of Supervisors will, however, consider the recommendation by the Historic Resources Review Board for placing the resources in an historic district when it considers the proposed project.

monterey peninsula regional park district
POST OFFICE BOX 935 • CARMEL VALLEY, CALIFORNIA • 93924-0935

BOARD OF DIRECTORS
Mary Dainton
Patricia Hutchins
Zad Leavy
Judi Lehman-Ellis
Ira J. Lively

DISTRICT MANAGER
Gary A. Tate

July 7, 1995

Ms. Wanda A. Hickman, Associate Planner
Monterey County Planning and
Building Inspection Department
P.O. Box 1208
Salinas, CA 93902

Subject: **Review of Draft EIR for the *Santa Lucia Preserve Project* (EIR No. 94-005)**

Dear Ms. Hickman:

The Park District identified two potential areas of concern during the Notice of Intent and Scope of Work for the above referenced project.

Public Trails

The District has had numerous meetings with representatives of the Rancho San Carlos to discuss public trail opportunities on the Preserve. Attached is a letter from Jeff Froke, dated June 26, 1995, which sets forth the trail segments under consideration. I trust that continued, direct discussions with Rancho San Carlos representatives will result in a satisfactory trail system and, therefore, it is not necessary to discuss this issue within the EIR context. 1

Potential Off-Site Ground Water Impacts in Garzas Canyon

District has concerns about potential off-site ground water impacts in the Garzas Canyon. We understand that the Monterey Peninsula Water Management District is reviewing this highly technical hydrological issue. As of this date, we have not received their comments. 2

Suggested Mitigation

Because of the uncertainty of potential long-term impacts on off-site ground water and riparian vegetation from upstream ground water extraction and the fact that this project will be constructed in phases, it is recommended that, if this project is approved, it be approved in phases. As an appropriate mitigation measure, it is also recommended that adequate off-site ground water and riparian vegetation monitoring systems be provided and potential impacts 3

Admin. Office (408) 659-4488 • Ranger Station (408) 659-6063 • Naturalist (408) 659-6062 • Fax (408) 659-5902

reviewed over time before future project phases are approved.

Thank you for the opportunity to comment on this draft EIR.

Sincerely,

Gary A. Tate

Gary A. Tate
District Manager

enc.
cc: Board of Directors

Response to Comments from the Monterey Peninsula Regional Park District

1. Monterey County Planning and Building Inspection Department notes this comment.

2. Comments have been received from the Monterey Peninsula Water Management District and have been responded to in this final EIR.

3. As planned, the project will be constructed in phases over a period of 20 years. Streamflow will be gaged continuously during that period, late-summer base flow conditions will be surveyed annually, and vegetation conditions will be surveyed every 3 years. The monitoring program would detect impacts and require appropriate corrective action before the full project water demand has been realized.

   The base flow reaches and vegetation transects recommended for monitoring are the locations that are expected to be most vulnerable to effects of the project. In four of the five watersheds, the areas are within Rancho San Carlos. In the Las Garzas Creek watershed, the area is downstream of the project site.

MONTEREY PENINSULA
WATER MANAGEMENT DISTRICT
187 ELDORADO STREET • POST OFFICE BOX 85
MONTEREY, CA 93942-0085 • (408) 649-4866
FAX (408) 649-3678

July 14, 1995

Ms. Wanda A. Hickman
Associate Planner
Monterey County Planning and
Building Inspection Department
P.O. Box 1208
Salinas, CA 93902

Subject: **Review of Draft EIR for the *Santa Lucia Preserve Project* (EIR No. 94-005)**

Dear Wanda:

In response to your "Public Review Letter" of May 23, 1995, we are providing this letter to transmit our comments on the Draft Environmental Impact Report (EIR) for the Santa Lucia Preserve Project. The Draft EIR was prepared for your Department by Jones & Stokes Associates, Inc., and is dated May 19, 1995.

Similar to our review of previous documents relating to the Santa Lucia Preserve Project (i.e. Combined Development Permit Application, Preliminary Scope of Work for the EIR), our review of the Draft EIR is focused on the District's concerns about potential off-site impacts to water resources in the Carmel River Basin from the development planned as part of the Santa Lucia Preserve Project. These concerns were initially expressed in our comment letter of June 15, 1994, on the Comprehensive Hydrological Study that was prepared for the proposed Rancho San Carlos development. Our current comments have been expanded to address potential impacts to fisheries and biological resources. Our review comments are divided into general and specific comments, as follows.

GENERAL COMMENTS

1. In our view, the utility of the Draft EIR would be enhanced by the inclusion of section numbering, as well as numbering for each identified impact and proposed mitigation measure. This would make the document easier to follow and would facilitate cross-referencing of specific impacts and mitigation. 1

2. In terms of surface water and ground water hydrology, we believe the document provides a thorough identification, discussion and analysis of potential environmental impacts associated with the proposed Santa Lucia Preserve Project. The authors are to be commended for this effort, as the document exceeds levels achieved in a number of past project EIR's submitted to 2

Monterey County and establishes new standards for future project environmental review documents. Notwithstanding, we feel that all the potential environmental impacts identified are not completely addressed by the proposed mitigations, as described in the Specific Comments section below. 2

SPECIFIC COMMENTS

Chapter 2 -- Project Description

Page 2-17, para. 5 There appears to be a typographical error as the first sentence lists the total number of trees to be removed for the golf trail as 136 and the second sentence identifies a total of 280 trees to be removed. 3

Chapter 7 -- Soils

Page 7-6, para. 4 The first sentence states that topsoil will be removed from areas to be revegetated or landscaped and would be stockpiled until it can be put back in place. We recommend that this mitigation be revised to state that topsoil will be removed from all areas to be disturbed by grading or other earthwork (including new roadbeds, which will not be revegetated or landscaped), so that the reuse of this valuable resource can be maximized. In other words, no usable topsoil should be spoiled or covered by spoils as part of any grading, earthmoving and/or excavation work. This should include the prohibition of sidecasting of spoils on top of topsoil as part of cut-and-fill operations. 4

Page 7-9, para. 1 Regarding the intended continued use of the established Carmel Stone borrow area, we recommend that this discussion be expanded to identify: 5

A) a maximum extraction volume of rock,
B) a sunset date for quarry activity, and
C) follow-up restoration of the site to approximate the original topographic contour.

Chapter 8 -- Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand

Page 8-3, para. 4 The details of the pumping test procedure and drawdown plots are referenced to Chapter 6, "Geology and Minerals", of the Comprehensive Hydrological Study (CHS). It appears that the reference should be to Section 6 of the CHS, titled "Groundwater Resources Evaluation". 6

Page 8-15, para. 1 We recommend that the "Impacts and Mitigation Measures" section include a subsection titled "Approach and Methodology", to be consistent with other chapters of the document that describe impacts. 7

Page 8-16, para. 3 This paragraph describes the proposed significance threshold for riparian vegetation impacts. The impact is considered significant if the project lowers groundwater levels such that "the total **area** [emphasis added] of riparian vegetation on the Santa Lucia Preserve decreases by more than 5% below the 1994 baseline area on a long-term basis (either by direct mortality or impaired regeneration)." We feel that the significance threshold should not be limited to a simple measurement of a reduction in area, but should include a combination of indicators of riparian vigor, natural regeneration and habitat value. 8

Page 8-16, para. 3 It is not clear how the "1994 baseline area" for riparian vegetation has been defined for the purpose of impacts assessment. Please clarify. 9

Page 8-18, para. 4 It is stated that the assumed water demand factor for market rate homes is 0.75 acre-feet per year (AFY) per home and that this factor appears to be "ample". This latter assertion is based on measured water use rates in nearby areas where large single-family homes use slightly less than 0.50 AFY. However, it should be noted that the actual water use for the market rate lots within the Santa Lucia Preserve could exceed 0.75 AFY if caretaker units, or senior units, or both, are constructed on the lots. The possibility of the construction of supplementary housing units and their attendant water demand should be discussed in the EIR. In addition, the impact on the projected water supply from increased water demands should be assessed. 10

Page 8-22, para. 4 It is not clear how the maximum day demand rate of 500 gallons per minute (gpm) that is cited in the last sentence of this paragraph compares to the two maximum day demand estimates of 750 gpm (Page 8-21, para. 9) and 584 gpm (Page 8-22, para. 1). Please clarify. 11

Page 8-44, para. 2 The discussion in this paragraph that compares the combined summer flow rate of springs and creek base flows with the combined well pumping capacity requirement at buildout is not clear. In the third sentence, the effective combined pumping rate of the project water supply wells at buildout (operating as planned in 12-hour pumping cycles) is given as approximately 247 gallons per minute (gpm). However, it is not clear how this rate relates to the two estimates of buildout pumping capacity requirements that appear elsewhere in the EIR document. Specifically, the maximum day demand pumping requirement at buildout is given as 750 gpm in the last paragraph of Page 8-21, and as 584 gpm in the first paragraph on Page 8-22. It is our understanding that in order to meet maximum day demand, the supply wells operating on 12-hour pumping and 12-hour recovery cycles would need to operate at twice the maximum day demand rate. If the maximum day demand rate is assumed at 584 gpm, then the water supply wells would have to produce water at a maximum rate of 1,168 gpm for 12 hours. This should be clarified. 12

Page 8-45, para. 2 We recommend that monitoring of ground water levels at the project water supply wells be monthly rather than quarterly. Monthly monitoring is consistent with other similar-sized water systems in the Peninsula area and allows for better development of seasonal and long-term trends in groundwater levels. Reporting of groundwater levels should be part of an annual water report which would also include the results of precipitation, streamflow and groundwater production monitoring. The annual reports would provide the basis for evaluating longer-term trends in the five-year "evaluation" reports, as described in the fourth paragraph on Page 8-48. 13

Page 8-45, para. 4 To minimize localized impacts caused by drawdown from wells operating in the vicinity of "protected base flow reaches", it is proposed to delay pumping at existing wells within 1,000 feet of protected base flow reaches. Based on the information available in the EIR, it is not clear how many or how often existing wells would be affected by this mitigation measure. For example, if a significant percentage of the existing well capacity is located within 1,000 feet of protected base flow reaches, how often would this mitigation have any material effect during a typical dry season when the combined capacity of other wells in the system may be insufficient to meet project demand? 14

Page 8-45, para. 6 This paragraph discusses an additional mitigation designed to reduce impacts to protected base flow reaches by locating new wells at least 1,000 feet away from protected base flow reaches. Similar to the above comment, it is not clear how many of the future wells (as shown on the map in Figure 8-5), would be affected by this mitigation, and how this mitigation might affect the ability of the future water supply system to meet buildout demand requirements. 15

Page 8-48, para. 4 This paragraph discusses the preparation of five-year "evaluation" reports, and includes analysis of base flow trends at the MPWMD gage on lower Las Garzas Creek. We recommend that the analysis also include trends in base flow at MPWMD gages on the lower reaches of San Clemente, Hitchcock, Robinson, and Potrero Canyon Creeks. The additional information from these gaging stations would help to reduce the uncertainty in the analyses due to the natural factors that are discussed in the first paragraph on Page 8-49. 16

Page 8-49, para. 2 This paragraph defines "protected base flow reaches" in four of the creeks draining from Rancho San Carlos. These creeks are: Potrero Canyon, San Clemente, San Jose, and Las Garzas. However, the actual protected stream reaches are not specifically described or shown on maps in the Draft EIR. Because of the importance of these protected base flow reaches to the proposed mitigation, the locations of the protected reaches should be clearly identified. 17

Page 8-52 to 8-57, "Impacts on Riparian Vegetation and Wetlands" Section The impacts to riparian vegetation that are identified in this section are insufficient to adequately assess environmental damage to riparian and wetland resources resulting from groundwater extraction. 18

The scope of the impacts is too narrow.

A) For example, direct mortality of mature trees (Page 8-53, para. 2) is identified as a possible impact. Lowering the water table several feet may not result in direct or immediate mortality of established riparian vegetation, but it will have a significant effect on streamside habitat conditions, including natural recruitment, seedling survivability, species composition, and habitat structure, over the long-term. The cumulative impacts of lowered groundwater levels should be assessed for a variety of riparian habitat factors. This is a potentially significant impact. 18

B) A possible decrease in area (Page 8-54) is also identified as a possible impact. Reaching the 5% decrease in area threshold could indicate an alarming trend towards severe environmental degradation. The monitoring techniques used to assess habitat conditions are basically sound, but the periodicity of monitoring must be increased to several times per year, particularly during the season of most active pumping, so that trends in habitat conditions can be carefully tracked. Particularly in the vicinity of wells, monitoring should include assessments of vegetative moisture stress and soil moisture.

C) Another possible impact identified is the degradation of wetlands caused by groundwater pumping (Page 8-57). The EIR assumes that wetland areas, including seeps, springs and ponds, will not be affected by groundwater pumping. No assumptions should be made that wetland areas not in the immediate vicinity of wells are not potentially at risk from either localized or regional groundwater drawdown associated with pumping. The EIR should be revised to assess the potential impact to wetland areas as potentially significant. Regular monitoring of wetland areas should be undertaken to determine and document long-term effects of groundwater withdrawal on these valuable habitat areas.

Page 8-58, para. 2 The fifth sentence of this paragraph cites 295 AFY as the net groundwater use for the project. However, 330 AFY is given as the project net use in the third paragraph on Page 8-60. Please clarify. 19

Page 8-59, para. 1 This paragraph provides a comparison of the worst-case estimate of the decrease in surface and subsurface outflow to the Carmel Valley during a critical drought period (180 AFY) with the annual amount of groundwater pumped from the Carmel Valley (approximately 21,000 AFY). This estimate of groundwater pumping from the Carmel Valley is incorrect. The maximum amount of pumping from the Carmel Valley is approximately 12,500 AFY. More to the point, the average production from the Carmel Valley aquifer during the five-year extended drought period of 1987 to 1991 (10,400 AFY) is a more appropriate value for comparing with the decreased outflow estimate. Accordingly, the decreased outflow estimate would have been approximately 2% of Carmel Valley groundwater pumpage during this period. Nonetheless, we concur with the discussion in the following paragraph that the water supply or 20

yield to users within the District with the New Los Padres Reservoir Project would not be particularity sensitive to decreases in tributary inflows during critical drought periods. However, without such a water supply augmentation project, the decreased inflows during a critically dry period could be cumulatively significant. Using the 1987 to 1991 drought period as an example, the worst-case cumulative reduction in surface and subsurface inflows would be approximately 900 AF. This cumulative reduction represents approximately 10% of the usable storage that was available in the lower portion of the Carmel Valley aquifer (i.e. downstream of the Narrows) at the end of this drought period, in March 1991. 20.

Page 8-59, para. 3 This paragraph lists ten reasons why the impact of the Santa Lucia Project should be considered as a less than significant impact on the Carmel Valley water supply. Given the discussion above regarding the cumulative reduction in surface and subsurface flow during critical drought periods, the recognized uncertainty associated with the expected beneficial effects of the Cattle Grazing Plan on groundwater recharge, and the uncertainty associated with the streamflow augmentation mitigation measure, we believe that several additional mitigation measures should be discussed in the EIR. These measures could be considered as contingency mitigation measures in the event that the ongoing mitigation monitoring program detects impacts due to the project that are beyond the expectations described in the EIR. These additional mitigation measures are: 21

A) Reduce ground water production on lands owned by Rancho San Carlos in the Carmel Valley. If needed, this reduction would provide immediate, direct, and complete mitigation.

B) Reduce irrigation on the golf trail during critically dry periods.

C) Develop a water demand management strategy including a water rationing plan to reduce water use within the project area during critically dry periods.

Chapter 9 -- Runoff, Flooding and Water Quality

Page 9-14, para. 4 In the first sentence, reference to "San Juan Creek" should be corrected to "San Jose Creek". 22

Chapter 10 -- Fisheries

Page 10-1, para. 2 Reference to urban development as a cause of degradation should be clarified. Degradation of the watershed quality within creeks draining from the project area has not been affected by urban development during recent decades. Most of the watersheds within the project area have been extensively affected by cattle grazing, some timber harvest, and limited water withdrawals. 23

Page 10-1, para. 3 According to Table 10-1, San Jose Creek contains only native species. Please correct the first sentence of this paragraph to reflect this fact. 24

Page 10-1, para. 3 The text mentions the presence of introduced fish, specifically green sunfish and largemouth bass, in Las Garzas Creek. In sampling the Carmel River, the District has noted movement of these fish into the mainstem. While there are other sources of non-native fish in the drainage, Las Garzas is the only tributary with green sunfish and largemouth that directly flows into the Carmel River. The applicant should include a program to eradicate or control non-native fish, particularly in Moore's Lake, as part of the fisheries mitigation program. 25

Page 10-2, Table 10 This table should be expanded, or another added with additional relevant environmental data (if available from Biosystems, 1992 or others) including: watershed area, miles of stream (permanent and seasonal), number of sites visited (Biosystems,1992), information on habitat types, number of fish sampled per unit area or stream length, and composition of population. 26

Page 10-2, Table 10 This table should be changed to include the presence of steelhead in Hitchcock Creek. Hitchcock Creek is used as spawning habitat by adult steelhead and perhaps resident fish from the Carmel River. This past winter, residents in the area reported observing adult steelhead spawning in several locations. In addition, District staff and volunteers from the Carmel River Steelhead Association have conducted fish rescues in Hitchcock Creek. As of July 1, 1995, District staff have rescued approximately 2,000 steelhead fry from Hitchcock Creek. 27

Page 10-3, para. 1 The descriptions of existing aquatic habitat should be expanded to cover individual watersheds on a case-by-case basis. The descriptions as presently written are too generic. Text on this page makes reference to a specific report by Biosystems, 1992 and references surveys by Balance Hydrologics in 1990. What is the relationship between the 1992 report and 1990 field work by Balance Hydrologics? More specifically, was field work completed in the 1992 field season, or were data from the 1990 field work summarized in 1992? 28

Page 10-3, para. 1 Cited reference should have author names and year. For example, Reconnaissance of Steelhead Resource..... by W.M. Snider (1986). 29

Page 10-3, para. 2 Under Seasonal Hydrology, the first sentence states, "adequate streamflows are necessary year round for fish survival". While it is true that adequate flows are needed for survival of fish in specific reaches or tributaries and specific times of the year for specific life history phases, it is not true that flows must be present at all times, in all years, in order to sustain steelhead and trout populations. For example, many seasonal tributaries in the Sierra Nevada that sustain spawning populations of salmonids and other native fish, dry-up by the end of many summers and the populations of fish produced in these tributaries move downstream to permanent habitat (Erman and Leidy, 1975 and Decker and Erman, 1992). This is important to note for this project EIR, because the tributaries in the project area sometimes dry-up, 30

particularly during extended drought periods. The streams were studied during drought years, so a conclusion as to what constitutes normal or average hydrologic conditions may not be correct. Do estimates of minimum stream flows or persistence of flow referenced in this paragraph reflect authors' opinion of normal flows, or simply their observations during the recent, extended five-year drought? 30

Page 10-4, para. 1 Under Turbidity and Sedimentation, the first sentence states that excess sedimentation occurs within all of the drainages of the project area. Specifically mention is made of Potrero Canyon, San Jose Creek and San Clemente Creek and references Rancho San Carlos Partnership, 1992a. What methods, data and rationale were used to form this opinion about excessive sedimentation? 31

Page 10-4, para. 1 The text concludes that higher turbidity in these streams is due to effects of increased erosion caused by development within the watersheds and as sedimentation increases, fisheries habitat declines. While this may be true, no data in the EIR substantiate the increase in sedimentation, the linkage to fish habitat, or the cause for a decline. How was this linkage made based on available data? This finding needs to be clarified and expanded. 32

Page 10-4, para. 2 The reference to suitability of salmonid spawning habitat with respect to increases in percentage fines needs clarification. The increase in percentage fines primarily affects the suitability of the gravel for incubation. Steelhead will spawn in very sandy habitat, but survival of the embryos and ability of alevins to emerge are overwhelmed by a high percentage of fines. 33

Page 10-4, para. 2 This paragraph should document the importance of substrate conditions on suitability of rearing habitat for juvenile steelhead. The suitability of rearing habitat is strongly influenced by the amount of cobble or larger sized material on the stream bottom and the degree to which the cobble is embedded in sand or finer material. Experiments in a quasi-laboratory setting in Idaho streams and in specific reaches of central California streams have documented the relationship between embeddedness and populations of juvenile steelhead. Typically, as the embeddedness of the cobble increases from 0.2 to 0.8, the number of juvenile steelhead reared through the fall season declines by approximately an order of magnitude. Authors of the EIR may want to review Kelley and Dettman, 1980, and Bjornn et al., 1977 for background information on the impact of sediment on fish habitat. 34

Page 10-5, para. 6 Under Production Limiting Factors, the text identifies a number of changes to aquatic habitat that have reduced steelhead abundance, but makes no reference to specific streams in the project area. For example, where in the project area have low streamflows reduced habitat by altering physical conditions and temperature? What data were analyzed to develop this conclusion for streams in the project area? Further, on Page 10-6, where in the project area have reductions in stream woody debris reduced escape cover and how was this measured? 35

Page 10-6, para. 2 Under Rainbow Trout, which streams in the project area have resident rainbow populations? 36

Page 10-6, para. 4 Under Approach and Methodology, the text says that impacts were assessed based on technical information from CDFG, 1992 surveys by the Habitat Restoration Group, and personal communications. How was this information used to test levels of significance against criteria from CEQA Appendix G on the following page? 37

Page 10-7, para. 3 Under Construction-Related Activities, the text makes reference to accidental spills of concrete, sealants, oil and paint, but the specific mitigation measures outlined on Page 10-8 do not seem directly related to mitigating for acute spills of toxic material. The measures may deal with impact of sediment-laden drainage water, erosion form road construction and limiting construction activities non-rainfall days, but they provide no mitigation for spills of toxic substances. Authors should consult with CDFG, Office of Oil Spill Prevention and Response for a more appropriate set of mitigation measures. At a minimum, the mitigation plan for toxic spills should identify potential toxic substances that will be used in construction and provide means to abate any spills and prevent damage. 38

Page 10-7, para. 3 The third Mitigation Measure, under Implement Appropriate Construction Practices, will help to minimize impact of sediment on stream habitat, but will not result in less-than-significant impact levels. Significance can only be reduced to less-than-significant, if excavation, grading and vehicular traffic on dirt roads is restricted to the dry season only. For slopes in excess of 30% or work on highly erodible soils, the adoption of a May through October window for excavation and grading would be appropriate. 39

Page 10-8, para. 5 Under Impact: Reduced Spawning and Habitat..., the word rearing should be added, i.e. Reduced Spawning and Rearing Habitat...Many of the sediment related impacts directly affected summer rearing conditions. 40

Page 10-8, para. 5 The applicant's proposed mitigation measure may minimize sediment-laden water, but it is highly unlikely to reduce impacts to less-than-significant. A monitoring plan should be adopted to ensure whether goal of less-than-significant is met during and following project construction. 41

Page 10-9, para. 2 Under Increased Water Temperature Resulting from Loss of Riparian Vegetation, the assessment of whether removal of 11.3 acres of riparian vegetation will change water temperatures depends on how the acreage is distributed. While in an absolute sense, 11.3 acres only represents 5% of the total riparian vegetation, this could result in significant temporary on-site impacts. These impacts will depend on the type of mitigation and construction site and where the 34 acres of degraded riparian habitat is located. The EIR should more fully discuss the impact of riparian vegetation removal on aquatic stream habitat, including site-specific descriptions of impacts and mitigation. 42

Please note that Chapter 10 makes reference to 5% of riparian habitat on the Rancho, while Chapter 11, Page 11-44, refers to a percentage reduction of 1%. 43

Page 10-9, para. 3 Under Project-Related Impacts, the text asserts that implementation of mitigation measures, including delay of pumping and drilling of new wells, would reduce impacts to a less-than-significant level, but does not explain how this would occur. Our understanding is that the total project demand is about 400 acre-feet per year. Assuming that peak summer monthly usage is about 15%, then average monthly production will be about 60 acre-feet, or on average, 1 cfs. This is a substantial flow, compared to seasonal low flows in San Clemente, Las Garzas, and San Jose Creeks. For example, the following table lists typical measurements by MPWMD in San Clemente Creek. Low flows ranged below 0.2 cfs during six years out of the last nine years, including 1993, which is characterized as a wet year. Because summer diversions within the project area are larger than many of the lowest seasonal flows in the tributaries, there is a risk of dewatering summer habitat more frequently than now occurs during natural droughts. 44

Typical Low Flow Measurements in San Clemente Creek, 1986-1994.
Source: MPWMD files

Year	Month	Streamflow
1986	Jul	3.33
1987	Nov	0.00
1988	May	1.40
1989	Dec	0.17
1990	May	0.84
1991	Sep	0.09
1992	Sep	0.03
1993	Oct	0.17
1994	Oct	0.03

The applicants propose to reduce this risk to less-than-significant levels, but it is unclear how and to what degree the mitigation will be successful. Of particular concern is the caveat that existing wells within 1,000 feet shall be pumped only when combined capacity of other wells are insufficient to meet demand. Unfortunately, this is most likely to occur at a time when flows are the most critical in the "protected base flow reaches" and when the flows are most important to juvenile steelhead and other aquatic biota. Until better defined, it is considered incorrect to conclude that impacts on aquatic habitat will be reduced to less-than-significant levels. The impacts on aquatic habitat should be listed as potentially significant and unavoidable.

Page 10-10, para. 5 Under discussion of impacts, the text should identify reductions in rearing habitat through increases in embeddedness and reductions in cobble abundance. These physical changes result in the direct impacts noted, i.e. avoidance of biologically important habitat and reduced feeding opportunities. 45

Page 10-10, para. 5 The reduction in habitat from sedimentation is strongly influenced by erosion that occurs outside the location of drainage structures. In many cases, the risk of increased erosion results when drainage structures collect sediment-laden water and discharge it into creeks. The text should clarify this mechanism, as it relates to impacts on spawning and rearing habitat, and mitigation measures should be specified for controlling erosion at potential sources, upstream of outlet structures. These mitigation can be made part of the general erosion control plan. 46

Page 10-11, para. 2 Under the second mitigation, the design feature listed in the last sentence will increase, rather than decrease it. The ending of outlet structures at the edge of the creek banks should be deleted and a more appropriate design for discharge of drainage water should be used. A direct discharge into the creek bottom is acceptable, so long as it is carried over the edge of streambank and into the bottom of the creek. 47

Page 10-11, para. 4 Under the second mitigation, the size and placement of culverts should be designed to provide minimum vertical fall, thereby reducing velocity and eliminating jumps at the ends of culverts. 48

Page 10-11, para. 5 This sentence is redundant.

<u>General Statement Concerning Monitoring Plan for Impacts to Fish Habitat</u> -- Although the mitigation measures outlined in the EIR address impacts of higher erosion potential, sediment deposition, and streamflow reductions, there is no plan for monitoring whether the mitigation measures, once implemented, reduce impacts on steelhead habitat to less than significant levels. Chapter 10 of the EIR needs a monitoring plan to measure the quality and quantity of habitat prior and following completion of construction activities to ensure that impacts are reduced to less-than-significant levels and to highlight additional remedial measures that will be implemented to control erosion and sediment deposition. Baseline levels of cobble embeddedness and abundance should be made at key monitoring sites in Las Garzas Creek, San Clemente Creek, San Jose Creek, and Potrero Canyon. Habitat sampled should include spawning habitat in glides and rearing habitat in riffles. Additionally, pool volumes should be monitored to assess whether sediment is affecting rearing space in pools. The monitoring should be conducted annually during the project construction period, and once every five years for following years. Key monitoring sites should be selected by a professional fisheries biologist and approved by the CDFG. 49

Chapter 11 -- Biological Resources

It is unclear in the draft EIR whether any developments or improvements are proposed in the riparian forest habitat area adjacent to the Carmel River downstream of the Rancho San Carlos Bridge. This riparian habitat area is one of the largest remaining tracts of mature riparian forest in the lower Carmel Valley and should be identified and protected as an important biological resource area. MPWMD has monitored soil moisture, avian species diversity and riparian vegetation conditions in this forest tract for a number of years; the District recommends that any future improvements proposed in the vicinity of the San Carlos riparian tract be noticed with the County of Monterey and other responsible resource agencies. 50

Page 11-51, para 6 Mitigation for the loss of 4 acres of riparian woodland habitat and possible breeding sites for several uncommon bird species should be required at a 3:1 ratio, rather than a voluntary mitigation measure as outlined on Pages 11-44 and 11-45. 51

Page 11-53 Please note previous comments regarding riparian impacts resulting from changes in groundwater hydrology. 52

If there are any questions or clarifications regarding these comments, please do not hesitate to contact our office. We appreciate your cooperation and that of the Santa Lucia Preserve project team in responding to our comments and concerns in past correspondence, and look forward to discussing these comments further when convenient.

Sincerely,

William F. Hurst
Interim General Manager

/wfh/ltr/mcl/wmh.071495

Response to Comments from the Monterey Peninsula Water Management District

1. This request would require substantial effort to revise the document and is not required under CEQA; therefore, the request has not been implemented.

2. Comment noted.

3. The text has been corrected in the final EIR. The total number of trees to be removed for the proposed golf trail is 136 as correctly noted in the first sentence.

4. The mitigation measure has been revised to more specifically state that all suitable topsoil would be used for revegetation purposes.

5. For clarification, it is assumed that the commenter is referring to the proposed borrow area on Chamisal Ridge, not the existing Carmel Stone quarry. The focus of the impact analysis and mitigation measure discussion is on the new borrow area (to be used for aggregate extraction). The third paragraph of the impact discussion relates to the existing Carmel Stone quarry, for which no significant impact was found.

   A maximum of approximately 300,000 cubic yards of material will be taken from the borrow area. The borrow area will be used intermittently throughout buildout of the project, which is expected to require 20 years or more, depending on economic conditions.

   Restoring the borrow area to the *original topographic contour* would be unprecedented and would require that material either be imported from offsite or excavated onsite to fill the area up to the original contour. Accepted practice is to recontour borrow areas to a naturalistic appearance once borrowing operations are complete and then to revegetate the site.

6. This has been corrected in the final EIR.

7. This chapter in its current form does not lend itself readily to the recommendation to include this discussion at the same location it appears for most other chapters in the EIR. The details for approach and methodology are dispersed throughout the impact analysis as appropriate.

8. The section "Additional Mitigation Measure: Monitor Riparian Vegetation and Maintain Total Area of Riparian Vegetation" in Chapter 11, "Biological Resources", addresses these concerns.

9. BioSystems Analysis conducted a survey of the total area of riparian vegetation on Rancho San Carlos in 1990 through 1992.

10. With the exception of guesthouses, all auxiliary units require the issuance of a discretionary permit (either an administrative permit or a conditional use permit). The residential areas of

the proposed project are proposed to be zoned low-density residential; that zoning district requires an administrative permit for any senior citizen or caretaker unit.

Although guesthouses do not require a discretionary permit, they are subject to development standards (21.64.020). Those standards specify that the unit be for limited sleeping and living purposes, but not for independent living purposes, permanent residential use, or rental purposes. They limit the size of the unit to 600 square feet, require that the unit be located close to the principal residence, prohibit any kitchen or cooking facilities in the unit, require that the guesthouse share the same utility connections as the main residence, and prohibit any subdivision from the main house.

The present application does not include any entitlements for auxiliary units, and whether auxiliary units are subsequently applied for by purchasers of the lots is speculative. However, it is likely that at least some purchasers will apply. Because auxiliary units will require future discretionary permits, the units are treated in the final EIR as cumulative development. Refer to Chapter 19, "Cumulative Impacts", of the final EIR.

11. Although these numbers appear to be contradictory, they are not. The demand estimate of 750 gpm was the first maximum day demand rate estimate calculated, based on estimated golf trail acreage. When the final golf trail acreage was obtained, a new demand estimate was calculated that included the use of reclaimed water, diffuse stormwater runoff, and groundwater. This new estimate equaled 584 gpm. When 58 market rate homes and two inclusionary homes were removed from the demand estimate, the result was 524 gpm, or approximately 500 gpm.

12. On page 8-25 of the EIR, paragraph 2 states: "The applicant estimates that 50 additional wells will need to be drilled to meet the maximum day water demand after complete buildout of the project." With the additional water provided by these wells, it will be possible to provide the estimated 584 gpm maximum daily demand while pumping only 12 hours per day. The source of the 584 gpm value is explained in the response to Comment 11.

13. The comment has been noted and revisions made in the final EIR, Volume II. The first paragraph of the section "Additional Mitigation Measure: Monitor Groundwater Levels" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", (page 8-45) now reads as follows:

> The project applicant shall monitor groundwater levels in all of the project water supply wells at least monthly. Wellhead (measuring point) elevations shall be surveyed at all wells so that water levels can be reported as elevation above sea level. The applicant shall produce an annual report containing the results of precipitation, streamflow and groundwater production monitoring, and shall plot water-level hydrography and evaluate the data for trends at least every 3 years. All data, hydrographs, and interpretive reports shall be available to local agencies and the public. This monitoring program shall

continue at least as long as the base flow monitoring program described in mitigation measure "Monitor Base Flow in Creeks and Supply Supplemental Water if Necessary" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand".

14. Wells T-11, T-14, and T-26 with a total estimated 12-hour yield of 30 gpm are within 1,000 feet of protected base flow reaches. Because of their locations, they would not be used as often as other wells. Any more detail is beyond the scope of this EIR.

15. This mitigation measure would not substantially decrease the area available for drilling new wells. Assuming the protected base flow reaches along Potrero Canyon, and San Clemente and San Jose Creeks (the base flow reach on Las Garzas Creek is outside Rancho San Carlos) are each approximately 2 miles long, the area of exclusion for new wells is only 1,455 acres, or 7% of the Rancho San Carlos area. Therefore, there should be sufficient water to satisfy project demands at buildout. Anticipated locations of future wells, shown on Figure 8-5 of the draft EIR, will be adjusted accordingly to conform with this mitigation measure.

16. The comment has been noted. However, the EIR discusses two methods of determining the difference between natural and project-related impacts, and is sufficient.

17. Approximate locations of the protected base flow reaches are shown in Figure 8-4a, Chapter 8, of the final EIR.

18. (a) Refer to the response to Comment 9 above.

(b) Monitoring riparian vegetation more frequently than an average of every 3 years, with no more than 4 years between surveys, is unnecessary because it is difficult to discern changes in habitat over a shorter period. Moreover, riparian vegetation only has one growing season per year. The monitoring regime is sufficient.

(c) As stated in the section "Impact: Degradation of Wetlands Caused by Groundwater Pumping" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", (page 8-57) wet meadow wetlands are formed by rainfall ponding on clay soils rather than by groundwater rising to the land surface, and therefore would not be affected by groundwater pumping and associated declines in the level of the underlying water table. Wetlands associated with springs and seeps on hillsides would not be affected by groundwater pumping because these springs and seeps are perched above the main groundwater system tapped by wells. Wetlands associated with permanent water bodies, such as lakes and base flow reaches in creeks, are considered part of the riparian environment for this discussion of groundwater impacts and would be protected by the mitigation measures recommended to protect riparian vegetation. Therefore, there is no reason to assess the potential impact on wetland areas as potentially significant.

In regard to more frequent monitoring, refer to the response to section (b) above.

19. The value 295 af/yr is the demand met by groundwater at buildout. The value 330 af/yr is the net consumptive use for the GMPAP area only. This is calculated as follows: 272 af/yr (demand met by groundwater for GMPAP) plus 58 af/yr (demand met by diffuse stormwater).

20. The comment has been noted, and the change has been made to page 8-58 in Volume II of the final EIR.

21. The comment has been noted and partially integrated. The first mitigation measure, "Reduce Groundwater Production", was not included because it has already been established that the project will have a less-than-significant impact on the Carmel Valley water supply.

22. This correction has been made in the final EIR.

23. The EIR has been amended to state that watersheds within the project area have been degraded by cattle grazing, some timber harvest, and limited water withdrawal.

24. The EIR has been amended to state that San Jose Creek contains only native fish species.

25. Refer to the response to Comment 6 from the California Department of Fish and Game.

26. The purpose of Table 10-1 (refer to Chapter 10, "Fisheries" in the EIR) is to provide a list of species present in the project area.

27. Table 10-1 has been amended to state that steelhead are present in Hitchcock Creek.

28. Information from the surveys conducted was used to analyze the potential impacts of the proposed project. The study by BioSystems Analysis was conducted in 1990 and 1991. The EIR has been amended to state that the surveys by BioSystems Analysis were conducted in 1990 and 1991. The surveys by Balance Hydrologics were conducted to determine flow persistence, stream conditions, and fisheries resources in the watersheds of the project area.

29. The EIR has been amended to include the author's name and year for the cited references on page 10-3, paragraph 1, in Chapter 10, "Fisheries".

30. The EIR has been amended to state that flows are not necessary all the time in all years to sustain steelhead and rainbow trout populations. Refer to Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Groundwater Supply and Demand", for a discussion of how the base flow was determined.

31. The EIR has been amended to state that sedimentation problems are likely to occur in all drainages of the project area and are attributed to land use practices, specifically in Potrero Canyon, San Jose Creek, and San Clemente Creek. A 1991 study conducted by Balance

Hydrologics on Potrero Creek concluded that a reduction in sedimentation would reduce the extent of pool fill and riffle embeddedness. A 1991 study conducted by Balance Hydrologics on San Jose Creek concluded that the rate of sediment delivery to San Jose Creek is in excess of its ability to transport sediment. In 1993, a survey was conducted (and is referenced in Rancho San Carlos Partnership 1992a) by Hickson and Hecht to assess water quality and sediment sources in the San Clemente watershed.

32. It has been well documented in literature that an increase in sedimentation can cause adverse effects on fisheries. Conclusions in the EIR were based on the results of the surveys conducted in the project area, literature, and professional judgment.

33. The EIR has been amended to state that steelhead will spawn in very sandy habitat, but survival of the embryos and ability of alevins to emerge are overwhelmed by a high percentage of fines.

34. The EIR has been amended to state that optimal rearing habitat depends on the amount of cobble substrate and the degree to which the cobble is embedded in sand or finer material.

35. This information is general setting information on conditions that are production-limiting factors.

36. Rainbow trout are likely found above known barriers; however, resident rainbow trout and steelhead trout will overlap in some areas.

37. Information provided by Habitat Restoration Group, California Department of Fish and Game, and personal communication was used to provide the existing project conditions. Impacts of the proposed project were examined and the level of significance was based on the significance criteria.

38. Refer to the response to Comment 7 from the California Department of Fish and Game.

39. Refer to the response to Comment 8 from the California Department of Fish and Game.

40. The EIR has been amended to include "rearing habitat" under "Impact: Reduced Spawning and Habitat Conditions Resulting from Increased Sedimentation" in Chapter 10, "Fisheries".

41. Refer to the response to Comment 8 from the California Department of Fish and Game.

42. Refer to the response to Comment 9 from the California Department of Fish and Game.

43. The EIR has been amended to state that about 1% of the riparian habitat at the Santa Lucia Preserve will be reduced.

44. The demand met by groundwater at buildout is 295 af/yr. If peak summer monthly usage is about 15% as asserted, then average monthly production will be about 44 af, or on average, 0.06 cfs. This is an insignificant flow compared with the seasonal low flow provided with the comment. Therefore this impact, when coupled with the available mitigation measures, is not considered a significant impact. As described in the response to Comment 13, the mitigation is sufficient.

45. The EIR has been amended to include cobble embeddedness and cobble abundance on page 10-10 (Chapter 10, "Fisheries").

46. The erosion control plan includes measures to prevent erosion at the source before sediment can enter the streams at the Santa Lucia Preserve.

47. The EIR has been amended to state that the outlet structure will discharge directly into the creek bottom and the structure will enter into the edge of the streambank and into the bottom of the creek.

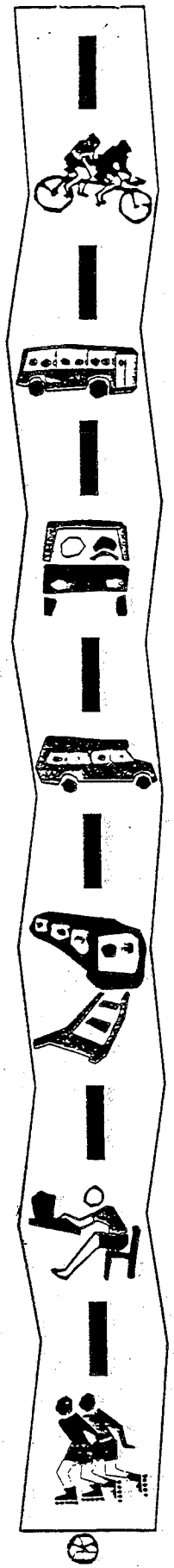
48. The EIR has been amended to state that the size and placement of culverts should be designed to provide minimal vertical fall ,which will reduce the velocity and eliminate jumps at the end of culverts.

49. The EIR has been amended to include mitigation monitoring for sedimentation. Refer to page 10-11 of Volume II of the final EIR for a discussion on monitoring sedimentation.

50. No development is proposed within the riparian forest habitat adjacent to the Carmel River downstream of the Rancho San Carlos Bridge.

51. Because the loss of potential yellow warbler and yellow-breasted chat breeding habitat is considered less than significant, no mitigation is required. However, the project applicant will enhance or restore lost or degraded riparian habitat to preserve the quality of natural habitat on the preserve. This is part of the project and will be implemented.

52. Refer to the response to Comments 8 and 18 concerning impacts on riparian vegetation resulting from changes in groundwater hydrology.



TAMC • TRANSPORTATION AGENCY FOR MONTEREY COUNTY

Regional Transportation Planning Agency • Congestion Management Agency • Local Transportation Commission
312 East Alisal Street, Salinas, California 93901 • (408) 755-4812 / 647-7777 / FAX (408) 755-4957

June 29, 1995

Ms. Wanda A. Hickman
Associate Planner
Monterey County Planning and Building
Inspection Department
P.O. Box 1208
Salinas, California 93902

RE: Draft Environmental Impact Report #94-005 for Santa Lucia Preserve Project

Dear Ms. Hickman:

Thank you for the opportunity to review and comment on the Draft Environmental Impact Report (EIR) for the Santa Lucia Preserve Project. Staff previously submitted the following comments on the Administrative Draft EIR; however, those comments were not incorporated in the Draft EIR. 1

Relevant Plans and Policies (page 3-3): The proposed Santa Lucia Preserve Project should be reviewed against the goals, objectives and policies of the adopted 1994 Regional Transportation Plan (RTP), which includes the Congestion Management Program (CMP). Related policies which should be considered in the Final EIR include: 2

RTP Policy 1.1.1 states that "land use planning shall be coordinated with transportation planning to fully mitigate the traffic impacts of new development."

RTP Policy 1.2.2 states that " ... Improvements must maintain or improve traffic level of service on streets and provide for alternative transportation modes."

Traffic: The impact of the proposed project on LOS standards for the CMP network, which includes Highway 1 and portions of Carmel Valley Road, must be assessed. If the project will result in a decline in LOS standards along links, at interchanges or intersections, the project must mitigate the impacts. Impacts of future traffic circulation patterns, traffic volumes and levels of service, local access road system operations and safety also need to be considered. Impact analysis should be consistent with the CMP model run presented to TAMC on May 23, 1995. 3

Bicycle/Pedestrian Facilities - The DEIR does not include any provision for pedestrian and bicycle facilities in the development. Staff recommends that the following RTP policies should be considered: 4

RTP Policies (1.1.2, 1.1.3) recommend that bicycle and pedestrian facilities should be provided as part of improvements to all major roadways and shall be incorporated into the design of new residential developments. RTP Policy 3.3.1 encourages well-defined pedestrian and bicycle facilities to enhance safety.

TAMC has identified Carmel Valley Road, between Carmel Valley Village and Highway 1, as one of eight gaps in the Regional Bikeway System in the RTP. This unmet need should be included in the list of identified projects in the Carmel Valley area.

The adopted Monterey County Bikeways Plan includes a Carmel Valley Bicycle Facility project to complete this missing link. This currently unfunded project is for construction of Class II bicycle lanes on Valley Greens Drive and a Class I bike path from Valley Greens Drive to Highway 1. This project is also listed as a transportation demand management alternative in the Deficiency Plan. 5

Transportation policies in the Carmel Valley Master Plan also address bicycle needs, emphatically stating that bicycle facilities are to be provided on all existing and new roads to connect developments throughout the area (Policies 37.4.1 - 39.2.6.1).

In addition, bikeways and pedestrian walkways should be included within the development to link with the County bikeways system.

County Trip Reduction Ordinance: The developer should include analysis and commitment to trip reduction facilities and programs consistent with the County's Trip Reduction Ordinance as part of the EIR traffic analysis. 6

Thank you again for the opportunity to comment. If you have any questions on these comments, please do not hesitate to call Wendy Murphy at 755-4835.

Sincerely,

Joe Lopez
Transportation Planning Supervisor

cc: N. Papadakis, AMBAG Areawide Clearinghouse
H. Naslund, Monterey County Public Works Department
R. Slimmon, Monterey County Planning and Building Inspection Department

WAM\MONITOR\STALUCIA.ltr

1. The comments on the administrative draft were addressed in the draft EIR as indicated in the following responses to comments.

2. These policies are addressed on pages 3-30 to 3-31 in Chapter 3, "Land Use", of the draft EIR. No changes to the EIR are required as a result of this comment.

3. The draft EIR analyzes the traffic impacts of the proposed project on Carmel Valley Road, and on critical intersections along Highway 1. Impacts of the proposed project along with the approved and proposed projects have been analyzed on the intersections of Highway 1 with Carpenter Street, Ocean Avenue, Carmel Valley Road, Rio Road, and the intersection of Carmel Valley Road and Carmel Rancho Road, which are included in the CMP. Mitigation measures have been recommended for these intersections when necessary.

   The draft EIR used the Carmel Valley model originally developed for the Carmel Valley Road Improvement Plan EIR for determining the distribution pattern of the offsite project traffic, This model has smaller, more refined zones for the Carmel Valley Road area than the TAMC model and was used only for determining the pattern of traffic distribution. No traffic model was used for the remaining portion of the analysis because the information that can be obtained from a model is not refined enough for intersection analysis.

   At this time, the TAMC model has 1993 and 2000 traffic forecasts available. The 2015 forecasts are currently in preparation and not available. The 2000 model forecasts are available for two future scenarios: one with the Hatton Canyon Freeway and one without that facility.

   A comparison of the traffic projections for Carmel Valley Road produced by the TAMC model with the traffic projections reported in the draft EIR shows agreement, as illustrated by the tabulation shown below:

Intersection	TAMC Model TAMC w/ HCF	Model Draft EIR w/o HCF	Cumulative w/o HCF
Carmel Valley Road/ Highway 1	28,100	26,700	26,500

4. These policies are addressed on pages 3-31 and 3-32 of the draft EIR. No changes to the EIR are required as a result of this comment.

5. Several internal, private trails have been proposed as part of the proposed project. Bikeways and pedestrian walkways have been included within the development where appropriate and where addition of these facilities would not result in significant environmental impacts.

The applicant proposes to provide a segment of the Carmel River Trail as stated on page 3-32 of the EIR under the consistency assessment for policy 3.3.1 of the 1994 Regional Transportation Plan. Refer also to consistency assessments for policies 1.1.2 and 1.2.2. of the 1994 Regional Transportation Plan on pages 3-31 and 3-32 of the draft EIR.

6. The applicant proposes to establish a transportation management association, designate an onsite trip reduction coordinator, and implement a trip reduction program as a means to reduce both onsite and offsite trips. As described on page B-10 of the draft EIR, Monterey County Department of Public Works would review the trip reduction program and request progress reports from the transportation management agency to ensure that the program is being implemented.

City of Carmel-by-the-Sea

COMMUNITY PLANNING AND BUILDING DEPARTMENT
POST OFFICE DRAWER G • CARMEL-BY-THE-SEA, CA 93921
(408) 624-6835

July 7, 1995

Wanda A. Hickman, Associate Planner
Monterey County Planning and Building
Inspection Department
Post Office Box 1208
Salinas CA 93902

Re: Santa Lucia Preserve Draft Environmental Impact Report No. 94-05

Dear Ms. Hickman:

The Department of Community Planning and Building of the City of Carmel-by-the-Sea has reviewed the Santa Lucia Preserve Draft Environmental Impact Report (DEIR). On the basis of its review, this Department has found the document to be well-written, thorough and clear. There are a few areas, however, where additional information and/or clarification is requested. These issues are discussed below by specific topic.

Water - Chapter 8 of the DEIR provides a description of the groundwater hydrology, stream base flow and water supply and demand characteristics in and around the project site. Reductions in surface and subsurface outflow to the Carmel River are estimated to provide impacts considered "less-than-significant". Moreover, the DEIR documents the potential for groundwater overdraft if water demand exceeds groundwater supply and assumes long-term decreases in groundwater levels which could impact water supply in off-site areas. 1

Given the 6 July 1995 ruling by the State Water Resources Control Board, which requires significant reductions in CAL-AM water diversions in the Carmel River, the potential impact this project could have on the Carmel Valley Aquifer is of greater significance. The DEIR needs to be expanded to include an evaluation of the cumulative impact of the SWRCB decision and the proposed impacts of the Santa Lucia Preserve Project. If Cal-Am is unable to replace its diversions before the proposed project commences new water use, this could magnify environmental impacts on public trust resources that already are damaged significantly.

Traffic - Chapter 13 provides a detailed description of the traffic related impacts of the Santa Lucia Preserve Project. The DEIR correctly states that the project will increase traffic volume at the intersections of Highway 1 and Carmel Valley Road, Rio Road, Ocean Avenue, and Carpenter Street. These 2

intersections already operate below desired levels of service, therefore approval of this project will exacerbate an unacceptable situation. As traffic congestion on Highway 1 between Carpenter Street and Rio Road becomes more congested, more vehicles will use local roads which are not designed for high traffic volumes such as Junipero Avenue, Carpenter Street and Hatten Road. 2

The California Environmental Quality Act Statutes and Guidelines (Section 15370) defines a "mitigation" as: a) avoiding an impact by not taking a certain action or parts at an action; b) limiting the degree or magnitude of the action; c) repairing, rehabilitating or restoring the affected environment; d) reducing or eliminating the impact over time; or e) compensating for the impact by replacing or providing substitute resources or environments.

Please describe how the proposed mitigations (i.e., contributing the project's fair share toward improving Highway 1) meets these objectives. Providing financing for projects which have not been, and may never be deemed satisfactory to local/regional agencies does not appear to constitute a "mitigation" as defined by State statutes. The only realistic project that provides improvements to Highway 1 south of Carpenter Street is the Deficiency Plan for Highway 1 and Carmel Valley Road. This plan would provide improvement to levels of service from Rio Road to Ocean Avenue. Contributing funds to a project that reduces traffic impacts from existing development does not constitute a mitigation for adding more traffic to these intersections.

Thank you for the opportunity to review the DEIR. We look forward to reviewing the responses to the aforementioned issues in the Final EIR.

Sincerely,

Rick Tooker
Associate Planner

SLPEIR/1-2

1. The recent California State Water Resources Control Board (SWRCB) decision regarding the Carmel Valley declared that groundwater in the Carmel Valley alluvial groundwater basin shall be considered underflow of the Carmel River for the purposes of administering water rights. The decision does not apply to groundwater in the fractured bedrock uplands adjacent to the alluvial groundwater basin. Groundwater in those areas, including Rancho San Carlos, is still considered percolating groundwater.

   Owners of land overlying a groundwater system containing percolating groundwater are free to drill wells and pump groundwater for reasonable and beneficial uses on their land without obtaining a permit from the SWRCB. The constraints that require water use to be "reasonable and beneficial" are codified in Article X, Section 2, of the California Constitution. Municipal and domestic water supply and golf course irrigation are uses that are normally considered reasonable and beneficial. The right to use percolating groundwater on overlying lands is governed by a principle called "correlative" water rights. Like riparian rights to surface water, correlative groundwater rights are not quantified. All owners of land overlying the groundwater system are entitled to a reasonable share of the groundwater. The overall intensity of water use for the Santa Lucia Preserve project is very low (278 af/yr of consumptive use on 19,900 acres) and certainly would be considered reasonable and beneficial. Thus, the project is considered consistent with water rights law.

   The cutbacks required by SWRCB would not increase the environmental impacts on the Carmel Valley system; rather, they would reduce the relative impact of the project: fewer diversions mean more water would be retained in the system; therefore, the proposed project would have less relative impact on the Carmel Valley system. The EIR found this impact to be less than significant.

2. The proposed project, in addition to other approved and proposed projects in the area, would contribute to additional traffic on Highway 1 and Carmel Valley Road. In the case of cumulative impacts, a project's share of the mitigation is limited to its pro rata share of its contribution to the cumulative impacts. A series of improvements is planned or being studied for these roads. Several of the improvements planned for Highway 1 and Carmel Valley Road are listed on pages 13-20 and 13-22 in Chapter 13, "Traffic", of the draft EIR. Because these are cumulative impacts, Monterey County has adopted a fee ordinance, which establishes development fees to fund mitigation measures. The improvements that will be funded by the applicant's contribution will be determined by Monterey County Department of Public Works.

CARMEL UNIFIED SCHOOL DISTRICT

July 7, 1995

Wanda A. Hickman
Associate Planner
Monterey County Planning and Building Inspection Department
P.O. Box 1028
Monterey, Calif. 93902

Dear Ms. Hickman:

Attached please find our comments relative to the Draft E.I.R. for The Santa Lucia Preserve E.I.R. #94-005.

Sincerely,

Dr. Joe Jaconette
Superintendent

JJ:ksw

P.O. Box 222700
Carmel, CA 93922
(408) 624-1546
FAX: (408) 626-4052

Response to the Santa Lucia Preserve Project
Draft Environmental Impact Report

PAGE 16 - 2

The District owns the Carmelo site and operates the pre-school/child care program. It is not "leased out" as indicated in the E.I.R.. When all programs are combined the facility serves 150-200 children at peak periods. 1

PAGE 16 - 15

Second Paragraph

The District is currently engaged in a study to determine the feasibility of implementing a school impact fee program. Based on the results of the study, and other considerations, the Board of Education will determine whether or not to implement school impact fees. 2

Third Paragraph

A year-round calendar has been considered and may at some point be a viable option. 3

Fourth Paragraph

The pre-school/child care programs at Carmelo currently serves 150-200 children. It is an integral part of the District's educational program. The statement is silent about the relocation of the program if Carmelo is converted to a K-5 elementary school. This is not a feasible mitigation measure unless an alternative location can be found for the Carmelo program. 4

Response to Comments from the Carmel Unified School District

1. The draft EIR has been amended to state that the school district owns the Carmelo School site and operates the preschool/childcare program.

2. The draft EIR has been amended to state that the decision to implement school impact fees is under the jurisdiction of the California Board of Education.

3. Comment noted.

4. The draft EIR has been amended to state that it would be necessary to find an alternative location for the Carmelo School program if the Carmelo School were to reopen as an elementary school.

MID CARMEL VALLEY
FIRE PROTECTION DISTRICT
8455 CARMEL VALLEY RD.
CARMEL, CA 93923
PHONE (408) 624-5907
FAX (408) 625-2941

GARY L. CARMICHAEL
FIRE CHIEF

July 6, 1995

Monterey County
Planning and Building Department
P.O. Box 1208
Salinas, California 93902

Attn Wanda A Hickman, Associate Planner

Dear Ms. Hickman

This letter contains the written comments requested by the County of Monterey concerning "Santa Lucia Preserve Project" draft environmental impact report dated May 19, 1995.

In section 16, page 16-4 "Fire Protection" there are several errors:

1. It states that the Tularcito CDF station would respond from Robinson Canyon to Rancho San Carlos in fifteen minutes. 1

   a. The Tularcito Station is not located at Robinson Canyon and would take fifteen minutes to get to Robinson Canyon. The responding apparatus then would need another fifteen minutes go proceed up Robinson Canyon or any other access to reach the current location of the ranch house.

2. Though it is true that each local fire agency provides Mutual Aid to CDF for wildland fire suppression, the Volunteer Fire Company that is envisioned would have to prove that they can provide Mutual Aid to the local agencies before any true aid can be agreed upon. 2

3. On page 16-5, the response time of three minutes is provided to CVR and Rancho San Carlos. In practice, this has not been true. It average is five to seven minutes, depending on the speed of the dispatch transfer to King City. 3

4. The section on Emergency Medical Response set a 4

response time from the Mid Carmel Valley Fire Station. This time has been developed over the last five years based on actual incidents in many areas of the project. 4

5. On page 16-17 covering "Fire Protection" the project proposes that a Volunteer Fire Company will be expanded by use of residents in the effected area. The type of owners, and the economic class of citizens as a whole will not support this assumption. 5

   a. The normal CDF units committed to this area are seasonal in nature, and will not be available to support their Volunteer Fire Company during half of the year. This works during wildland season, but does not provide proper structure fire protection.

6. The concept provide in the project also has a side effect of requiring other areas next to the project to accept this Fire Protection delivery system, without any input as to who and how they will receive future fire protection for their own homes. 6

The General Plan of Monterey County was developed to handle project of this size so that all citizens effected would receive the same level of services. The concept of a CSA for the benefit of one developer will isolate the other ranch properties, and the individual homes of those living in that area or force them later to join the existing CSA. 7

Sincerely,

Gary Carmichael
Fire Chief

Response to Comments from the Mid-Carmel Valley Fire Protection District

1. The EIR states that the vehicles responding to fires from the Tularcito station would enter Rancho San Carlos via Robinson Canyon Road. The EIR states that the distance from the fire station to the intersection of Robinson Canyon Road and Carmel Valley Road is 9 miles, or a 15-minute response time. The EIR has been amended to clarify that an additional 15-minute response time would be required for responding vehicles to proceed up Robinson Canyon Road to the ranch house.

2. Company 70 is an existing volunteer fire company sanctioned by CDF. The firefighters are trained in wildland and structural firefighting and carry beepers that receive dispatches from the CDF system. The volunteers receive additional training monthly from CDF staff on various topics from radio dispatch to different firefighting techniques.

3. The EIR has been amended to state that the response time is 5-7 minutes to Carmel Valley Road and Rancho San Carlos.

4. Comment noted.

5. In addition to the augmentation of the existing Company 70 with future residents of the Santa Lucia Preserve, the CSA may contract with CDF and one local fire district, such as Mid-Carmel Valley Fire District or Cypress Fire District, to provide year-round firefighting protection.

6. The EIR has been available for public review and comment. Residents surrounding the Santa Lucia Preserve have had the opportunity to comment on the fire protection delivery system.

7. The concept of a CSA is to ensure that there is no significant adverse effect on adjacent property owners.

Monterey Bay Chapter
California Native Plant Society
P. O. Box 381
Carmel Valley, CA 93924
July 13, 1995

Monterey County Planning Dept.
P. O. Box 1208
Salinas, CA 93902

RE: "Santa Lucia Preserve Project" Draft EIR

Gentlepeople:

The Monterey Bay Chapter of CNPS submits the following comments under protest that we were not provided the 45 days required by law because the above DEIR was sent to the wrong address. It reached me only a little over two weeks ago, despite the fact that I was the commentor of record for the society. As a result we have not had time to circulate this material to all those members we wanted to review it; nevertheless, we would like to express the following concerns.

The basic problem with this development is that it proposes to establish a 17,815-acre wildlife preserve that is actually honeycombed with building sites involving many miles of paved road, utility lines, fences, and other accoutrements of development that are inimical to wildlife and which obviate the entire concept of a reserve. We believe this is inconsistent with the Board of Supervisors Resolution #93-115 stating that "development shall be in one or more clusters located in the least environmentally sensitive portions of the property." While commercial development is appropriately clustered at the Rancho San Carlos (RSC) center, the residential development is actually sited in the opposite manner, dispersed throughout the areas of the project that are under 30% slope; that is, on the best agricultural areas of the ranch. Except for the steep fringes of the property, the land is thoroughly fragmented by the development plan as it stands. The importance of wildlife corridors is recognized in the text, but with so much of the land cut by roads, it is difficult to see how corridors are preserved. We urge that an alternative using clustering consistent with the Supervisors resolution be included in the Final EIR. We find it ironic that a "dense cluster" alternative of 425 residential units was omitted from analysis in the DEIR because of the developer's assertion that it would result in "greater environmental impacts" and "lowered revenues." We recommend that a "non-dense cluster" project of no more than 297 units be independently evaluated. 1

VEGETATION: 1) We note that the Botanical Resources Report for the "golf trail" application was prepared in November 1994. If this means that the botanical survey was done at that time of year, it is not an acceptable time to determine the presence or absence of sensitive species. The dates for surveys should always be included. 2) The loss of 229 landmark trees, mostly oaks (and probably more, according to p.11-53) is an appalling impact for a project that purports to preserve approximately 90% of the land. We believe that replacement on a 5 to 1 basis does not reduce to less than significant the impact of cutting down 400-600-year-old oaks . Surely on a project that claims such a high degree of environmental sensitivity avoidance of most of this impact would be possible by resiting some of the development. 3) The Plant Species List in Appendix D is a very cursory list that contains only a small percentage (± 10%) of the plants on the site, those "mentioned in the text." In order to have some idea of the adequacy of the botanical survey, we believe that a complete list should have been included in the DEIR. We ask that it be added to the FEIR. If the list were better organized and the type size reduced, it should not take more than five or six pages. 4) The list of sensitive plants seems fairly complete, although Yadon's piperia (*Piperia yadonii*) is found in Monterey pine forests and therefore could be on the site. Again, the adequacy of the botanical work depends, among other things, on the time of year of the survey(s), and this is not given. 5) In the hot, dry climate of RSC the loss of 5.82 a. of herbaceous wetlands and 11.3 a. of riparian habitat is a very significant impact to the wildlife that depend on these areas for survival. We disagree that because these losses are a "minor adverse effect...(less than 5%)" they are less than significant. We ask that the basis for this conclusion be identified. 2

WATER: As mentioned in the previous paragraph, we are very concerned about the impacts of water withdrawals on wildlife habitat and riparian communities. These impacts are likely to go far beyond the loss of the acreage mentioned above. The water analysis for this project sounds ominously like the non-existent "Tularcitos Aquifer" touted by the consultants for the Carmel Valley Ranch. After promising not to take any water from the Carmel River system, the Ranch applied for and recently received an even greater al- 3

lotment than it was given earlier, despite the fact that its tertiary-treatment plant, supposedly to provide all the water for golf course irrigation, is actually producing only a small fraction of the water needed for the golf course. We mention this project only because it shows how poorly conditions are enforced in Monterey County, and should be cautionary in the case of other large developments that make similar promises. How much less likely is enforcement, for example, in an area as remote as RSC! 3

On a more specific issue, the DEIR on p. 11-53 states that "well pumping along creeks...may...result in lowered groundwater levels...and...modifications in the hydrologic regime of riparian habitats." Who is going to oversee the proposed mitigation on p. 11-54 to monitor the riparian areas and maintain a total area "equal to at least 95% of the existing area"? Does anyone actually think this will be enforced after the development is underway? It would be useful to have more information on how riparian habitat would be increased after lower water tables have adversely affected it. Closing the offending well and drilling new ones seems to be the proposed solution. How can we be sure this will happen? Is bonding feasible? Irrigation has worked to some extent along the Carmel River, but at the price of reduced domestic water availability. The whole concept of taking additional water out of of the Carmel River watershed is questionable when Cal-Am has just been notified by the State Water Board that it must cut its extractions substantially. 4

The bottom line on water is found on p. 8-26: "In spite of the thorough testing program, it remains uncertain whether the yields stated in the Comprehensive Hydrological Study could be achieved reliably on the maximum demand day." This statement cuts through all the optimistic verbiage about water balance, base flow, cattle grazing benefits, etc. Until RSC can prove it has sufficient water, it has no business requesting a golf course that will probably double the water use. Our authorities are convinced that the golf course water use figures in the EIR are far too low considering summer temperatures, the uncertainty of using storm water runoff, and the poor record of reaching tertiary irrigation goals. Please note that the developers original request for 40-acre zoning was approved on the basis of low density development and preservation of the rest of the land. They steadfastly denied that a golf course was part of the plan. It should not be a part of this plan at this time of great water uncertainty. 5

EROSION: We are seriously concerned about the impacts of development on the highly erodible soils of RSC and about the substantially increased surface runoff during the rainy season from impermeable surfaces. These impacts have the potential to damage riparian vegetation and aquatic life on site and ultimately in the three watersheds receiving the runoff: Carmel River, San Clemente Creek (a subwatershed of the Carmel River) and San Jose Creek (which flows through State Park property). We are especially uneasy about the 292,000 cubic yards of earth movement for the "golf trail" and the large number of driveways that are over 30% slope. We note that various erosion control measures would be implemented, but the very existence of detention ponds adequate to hold the silt and stormwater will add to the impermeable surfaces. Also, they fill very rapidly with silt and become useless for the original purpose, as we have seen at other large developments. It's worth remembering that county "experts" approved Merv Griffin's erosion control measures at his vineyard in Carmel Valley, but ultimately the area washed out and damaged the neighbors downstream. Again, we mention this incident to show the fallacy of depending on standard erosion control techniques when dealing with highly erosive soils on massive development projects. A partial solution is to avoid cuts and fills on slopes over 30% and to strictly limit the amount of earth moving to what can be carefully stabilized before the rainy season. 6

HOUSING; While housing is outside the purview of CNPS, the credibility of the entire project is affected when the DEIR states that the impact on the housing market is "beneficial" because "there is a current housing shortage." The shortage is in affordable housing, not multi-million dollar estates for the wealthy. On the contrary, the amount of employee housing provided (53 units) would house only a fraction of the employees estimated to be needed by this project (200, not to mention all the employees at the estates, who undoubtedly would not all be housed on site). We would like to know if all these commuting employees have been factored into the traffic totals and the available affordable housing supply. 7

Thank you for the opportunity to comment on this project. Please print the public comments in the FEIR. We hope to be able to present more thorough comments at the public hearings.

Sincerely yours,

Mary Ann Matthews
Conservation Chairman

FAXED 11:20 a.m. 7-14-95

Response to Comments from the California Native Plant Society

1. The concept of intensive, high-density, clustered development was evaluated extensively during the planning process for the Santa Lucia Preserve (Froke pers. comm.). Traditional, dense concentrations of home sites in a landscape eliminates most natural features from the affected areas and isolates their human inhabitants from their natural surroundings. After extensive consultations with participating and advising biologists, this project was designed to avoid the destruction of intact habitat areas and to maintain existing corridors for wildlife movement. A principal planning objective was to prevent the sacrificing of thousands of acres of wildlife habitat and wildland functions through intensive cluster development. Instead, landscape-oriented siting was implemented, based on empirical biological data and thorough constraint-and-opportunities analyses.

   Planning for this project was guided by the following principles: avoidance of sensitive and special-status species occurrences, habitats, and sensitive vegetation communities; avoidance of ecologically important physiographic features such as riparian corridors, wetlands and steep (greater than 30%) slopes; adherence to existing ranch road alignments; avoidance of ridgeline or other forms of visually or biologically disruptive development (Froke pers. comm.).

   As an alternative to high-density clustered development, a low-density/large-scale clustering was proposed for the Santa Lucia Preserve (Froke pers. comm.). This design approach has been referred to as a "colander" because it would situate home sites and human activities in specific areas, while providing extensive and carefully located perforations that would support uninterrupted and unimpeded movements of wildlife and landscape processes through the developed areas. Using this colander approach to siting home site clusters, the perforations (i.e., wildlands and extensive corridors) amounted to 90% of the total preserve area; and the solid (settled) areas were purposefully aggregated, rather than evenly (or randomly) dispersed, to permit large and diverse throughways and sanctuaries for wildlife, including the more rare and secretive species such as mountain lions and bobcats.

   After 3 or 4 years of intensive field studies and GIS-supported analyses, the colander strategy was refined and designed into a planning framework for the entire 20,000-acre Santa Lucia Preserve. During this process, specialists in the habitat requirements and movements of mountain lions and other wide-ranging species repeatedly visited the preserve and concluded that the colander approach would not appreciably affect these species and would be less disruptive of wildlife populations than the elimination of 2,000 acres from the natural landscape for the purpose of creating a concentrated and thoroughly humanized community.

   Each of the experts consulted has a deep understanding of both the theoretical and applied aspects of conservation biology and landscape ecology. Among others, the consulting experts included Dr. Maurice Hornocker (Professor of Wildlife Ecology, University of Idaho), Dr. Reginald Barrett (Chair and Professor, Department of Environmental Science, Policy and

Management, University of California, Berkeley), Dr. William Shaw (Chair and Professor, Department of Wildlife and Renewable Natural Resources, University of Arizona), Dr. Mark Stromberg (Director, Hastings Natural History Reservation, University of California, Berkeley, Carmel Valley), and Dr. Reed Noss (Editor, Conservation Biology).

2. Special-status plant surveys for the golf course were conducted concurrently with all other areas during ranchwide surveys in 1990-1991. All surveys followed the protocol recommended by the California Department of Fish and Game (DFG) and were conducted during the proper period of identification for special-status plants identified as having the potential to occur on the project site (BioSystems Analysis 1992a, b). The final EIR has been modified to incorporate this information.

The project applicant sought to limit , to the extent feasible, the number of landmark trees that would need to be removed. The number of landmark trees that will be removed is only about 1.5% of all landmark trees on the project site. Refer to the response to Comment 230 from Bruce Dormody.

The 116-page list of vascular plant species present on Rancho San Carlos prepared by BioSystems Analysis can be found in Section 6.1 of the application materials on file with Monterey County Planning and Building Inspection Department). Because species are listed by habitat type and the list is 116 pages long, it was not included in the EIR.

Because DFG protocol was followed when BioSystems Analysis conducted the special-status plant surveys, all species were identified to the taxonomic level necessary to determine if a special-status species occurrence existed. No species in the family Orchidaceae, including Yadon's piperia, were identified during the surveys in Monterey pine forest (BioSystems Analysis 1992a, b).

Appendix G in CEQA states that a project will have an effect on the environment if it will substantially diminish habitat for fish, wildlife, or plants. It is a reasonable assumption that a 5% or greater loss of an important native community would substantially diminish habitat. These criteria were used to assess impacts on wetlands. Although the impact on wetlands is considered less than significant in the EIR, the project applicant has opted to compensate for the loss or degradation of wetland areas through enhancement or replacement at a 3:1 mitigation ratio, thus maintaining the area that is available for use by wildlife.

3. The potential adverse effects on riparian vegetation resulting from changes in groundwater hydrology are discussed on page 11-53 of the draft EIR. The conclusions presented here are supported by the analysis provided in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand". Groundwater levels are not expected to decline substantially in riparian areas and increased groundwater recharge resulting from the Cattle Grazing Plan might prevent declines altogether. Nonetheless, the potential for a significant impact is identified and mitigation measures requiring monitoring of riparian vegetation and maintaining the total area of riparian vegetation are specified.

The draft EIR does not state that the tertiary treatment plant will provide "all of the water for golf course irrigation". Rather, as stated on page 8-20 of the draft EIR, 39% of the estimated irrigation water demand will be met with reclaimed domestic wastewater (from the tertiary treatment plant) and an estimated 28% will come from recycled golf trail irrigation and rainfall. The remainder of the demand, approximately 33%, will be met by pumping from wells. Monterey County will monitor all mitigation measures adopted as conditions of approval.

4. As discussed on page 8-55 of the draft EIR, the applicant (or its successor in natural resources management at the site) will be required to monitor riparian vegetation. The county, as part of the mitigation monitoring program, will be required to ensure that this monitoring is conducted as specified in this mitigation measure and the conditions of project approval. Details on how vegetation shall be restored if significant degradation occurs are provided on page 8-56 of the draft EIR.

   The Conservancy would also be responsible for maintaining the natural environment and would take action should riparian vegetation be substantially degraded.

5. Because it remains uncertain whether the yields stated in the Comprehensive Hydrological Study could be achieved reliably on the maximum demand day, a significant impact has been identified. The additional mitigation measure "Maintain a Water Supply Equal to or Greater than Connected Water Demand at All Times" described in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", (page 8-29) of the draft EIR has been specified to reduce this impact to a less-than-significant level. The commenter states that the water analysis presented in the EIR is inaccurate but provides no evidence; on the contrary, the EIR and Comprehensive Hydrological Study have been reviewed by a third-party consultant retained by Monterey County who has found both documents to provide an accurate assessment of the groundwater conditions and effects of the proposed project.

   The commenter's opinion that a golf course should not be part of the plan is noted. An alternative that does not include the golf trail has been evaluated in the draft EIR (refer to pages 20-18 through 20-20).

6. The project applicant has proposed implementing stormwater best management practices to attenuate increases in peak flows and runoff volumes from impervious surfaces (refer to mitigation measure on page 9-19 of Chapter 9, "Runoff, Flooding, and Water Quality"). If sediment basins and traps and stormwater detention basins are properly designed and maintained, appreciable amounts of sediment will not reach receiving waters. As stated in the mitigation measure described above, the project applicant shall prepare and submit a final drainage plan to the County Planning and Building Inspection Department and Monterey County Water Resources Agency for review and approval.

   Driveway and other cuts on slopes greater than 30% would receive appropriate engineering, such as retaining walls, to control erosion of steep cuts. Cuts into unweathered rock,

although unsightly and subject to high runoff rates, would not produce significant amounts of sediment because of the low erodibility of such rock.

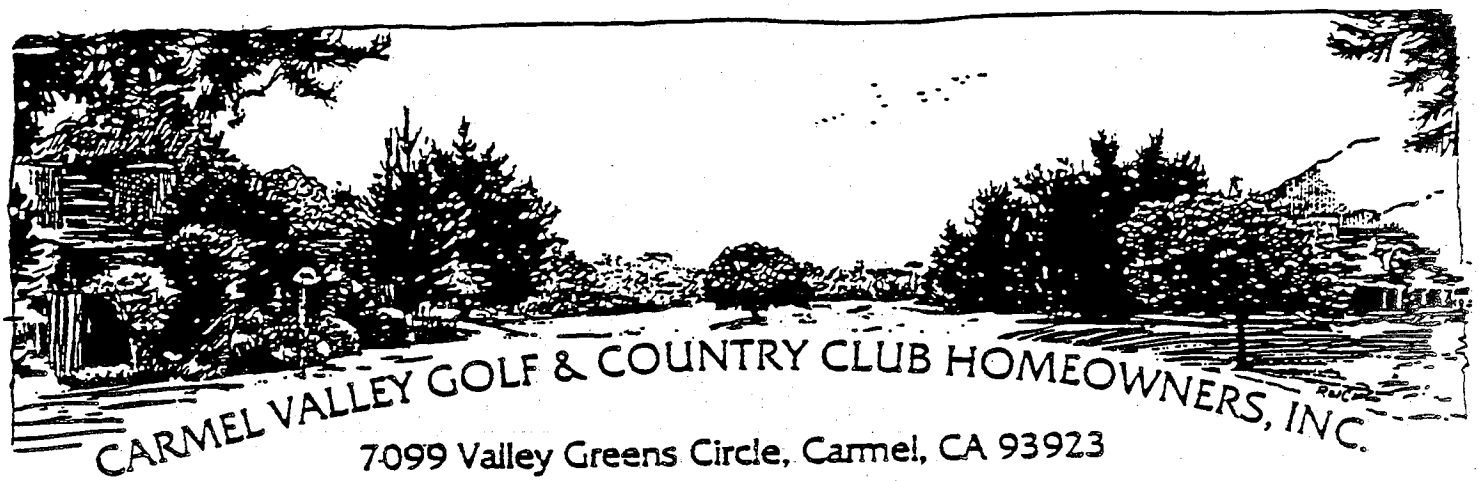
As specified in the preliminary erosion and sedimentation control plan, grading proposed to be constructed during the rainy season would require approval by the County Planning and Building Inspection Department and Monterey County Water Resources Agency.

7. Trips generated by employees residing at the project site and commuting to the project site have been factored into the analysis of the proposed project's traffic impacts.

The comment correctly notes that most of the housing provided by the proposed project would not add to Monterey County's supply of affordable housing. The statement in the draft EIR that the impact of the project on the housing market is "beneficial" has been changed to read that the proposed project would have a "negligible" effect on housing availability within Monterey County. The proposed project would generate an increased demand for affordable housing within the county through the generation of an estimated 258 onsite jobs. The net increase in the demand for additional affordable housing within the county, however, is expected to be relatively small because of the following factors.

- The proposed project would provide 53 employee housing units that would be affordable to low- and moderate-income households, as defined by the Monterey County Inclusionary Housing Ordinance.
- Of the remaining 205 employees requiring housing, a large portion would probably already reside within Monterey County and would not require additional affordable housing.
- Not all of the onsite employees would be in the low- to moderate-income categories and, therefore, would not require affordable housing.

Because of these factors, the residual demand for new affordable housing within Monterey County generated by the proposed project is not considered to be large; therefore, the impact on the housing market is adverse but is less than significant.



June 28, 1995

Ms. Wanda Ann Hickman
Monterey County Planning Dept.
P.O. Box 1208
Salinas, CA 93902

Subject: Comments on the Santa Lucia Preserve Draft EIR, May 19, 1995

Dear Ms. Hickman:

The following are our comments on the draft EIR for the above named project:

Chapter 9 - Runoff, Flooding & Water Quality

Page 9-17 Impact - Increased Storm Water-Runoff
It's noted that the project could result in 173 acres of new impervious area. It is our understanding that the March '95 Carmel River flood was significantly exacerbated by its tributaries. 1

Page 9-20 Impact - Potential for Increased Flooding on the Carmel River
"...implementation of the proposed project would increase flood flows on the Carmel River and subject people and property to flooding, this impact is considered significant." Table 9-3 notes that there would be a 9.58% rate increase in the 10-year runoff for Potrero Canyon. It is our understanding that Potrero Creek, during the March event, came within approximately 2 inches of going over Valley Greens Drive. Further, its runoff waters at the confluence with the Carmel River backed up flooding residents on Valley Greens Circle. That situation would be worsened by the project runoff from the new impervious acreage in the Potrero watershed. 2

Page 9 - 20
An analysis should be made of the potential for flooding from Potrero Creek for a 100 year flood event. This should include an analysis of the potential for flooding from the backup with Carmel River at their confluence. 3

Page 9-20 - Additional Mitigation
Consideration should be given to the construction of detention ponds of such size and number as to substantially contain the water from a single storm. The BMP should then provide for the discharge of these ponds between storms. 4

Page 9-20 Impact - Potential for Increased Flooding on the Carmel River
Refer to comment in 9-17

During the March flood event there appeared to be a significant backup of water at the general location of the Rancho San Carlos Bridge. This suggests that this floodway location is a bottleneck to a free flow of flood water. Proposed bridge improvements are noted in other parts of the EIR. It is requested that an analysis of this location for a 100-year event be made by the MPWMD and the Monterey County Water Resources Agency. Appropriate mitigations should be considered for a 100 year event, as well as insuring that any construction at the bridge site will not further reduce flow. 5

Chapter 13 - Traffic

Page 13-8
It is recommended that an additional scenario of existing conditions plus Rancho San Carlos buildout be analyzed. 6

Additionally it is suggested that 12 hour counts be made at Rancho San Carlos to determine if the traditional traffic peaks of 7:00 - 9:00 A.M. & 4:00 - 6:00 P.M. are the actual peaks at this intersection. It appears that there are significant backups on Rancho San Carlos during other periods during the day. 7

Page 13-22
The status of the four lane improvement between Rancho San Carlos and Robinson Canyon Roads and the passing lane additions in road segment 6 are doubtful since the Board of Supervisors recent acceptance of the report of the Carmel Valley Road Committee. The status of these projects should be clarified, and the traffic impacts and mitigations reanalyzed. 8

Page 13-24 - Footnote "C" RE Quail Meadows 40 Visitor Units.
These units were excluded from trip generation because their trips occured outside the peak hours. As noted, much of the backup on San Carlos Road is at other than the peak hours. Therefore this should be reanalyzed from that perspective. 9

Page 13-28 Applicants Proposed Mitigation Measures - Rancho San Carlos Road

The proposed left turn refuge lane for westbound traffic from Rancho San Carlos Road would still leave traffic vulnerable to eastbound traffic, westbound left turn traffic, and the hazard of high speed westbound traffic on Carmel Valley Road. The geometrics and approach speeds should be analyzed. It is further noted that this mitigation would not provide any relief to traffic entering Carmel Valley Road from Del Mesa and Via Mallora (Hacienda Carmel). These dangerous movements should be analyzed considering the increase in traffic. Thus, this proposed mitigation does not appear to be adequate or acceptable. The traffic signal included as additional mitigation (13-41) would be adequate. 10

Page 13-29 - Traffic Management Association (TMA)

Specific targets and criteria should be established for the TMA traffic reduction programs. The actual results should be measured against that. Specific mitigations should be identified if the TMA efforts do not reach the required targets. 11

13-30 Project Travel Characteristics

We question that the analysis conclusions adequately represent the likely account of traffic actually generated. We feel that it may be more than concluded. It appears that the analysis begins with the use of the lower range of validated, recognized criteria. These are then substantially discounted based on an estimate of likely human behavior hypothecated from other projects elsewhere applied to this project. Considering the long term nature of this project, the potential for significant traffic impacts into an already fragile existing traffic condition, and the uncertainty of human traffic behavior, we urge further analysis. It is requested that projections should be made on a possible reasonable range of traffic generation, with mitigations to meet the range of impacts. 12

Page 13-36 - Mitigation of Impact to Highway 1 and Carmel Valley Road

The mitigation proposal is too uncertain. There is no fee program for Highway 1 improvements. There is no firm schedule for construction of the "planned improvements" for Hwy 1 at Carmel Valley Road, and what improvements will be constructed is uncertain. If Caltrans continues to delay action, local funding should be made available with a pay-back agreement from Caltrans. The local funding could be a combination of County gas tax funds and developer contributions. The improvement in the LOS with the construction of the "planned improvements should be calculated". 13

Page 13-38 - Construction Traffic on Rancho San Carlos Road

A mitigation should be added to prohibit construction traffic on Valley Greens Drive. 14

Page 13-41- Rancho San Carlos Road & Carmel Valley Road

This paragraph describes in detail the ultimate solution to the traffic problem at buildout. It is the installation of a traffic signal at the Rancho San Carlos intersection. It is difficult to understand why the EIR recommends the westbound merging lane as an interim measure. The traffic signal is less expensive, has a more significant effect on the level of service and is recommended by the EIR for buildout conditions. 15

Your serious consideration of these remarks would be greatly appreciated.

Yours very truly,

Bob Page, President
Carmel Valley Golf and Country
Club Homeowners Association

1. Comment noted. All urban development within the Carmel River watershed and its tributaries probably exacerbated the flooding March 1995. Additional development without proper mitigation would further exacerbate the flooding problem. The project applicant is proposing to implement BMPs, such as detention basins, to attenuate peak floodflows.

2. County regulations determine the size of local infrastructure, such as the culverts under Valley Greens Drive. As described on page 9-17 of the draft EIR, culverts under secondary roads are only designed to pass 10- to 25-year floodflows. Both the January and March storms resulted in total precipitation that exceeded the theoretical 100-year 24-hour precipitation. Consequently, it is likely that much of the local storm drain infrastructure would be overwhelmed and localized flooding would occur, which is considered acceptable to the county. Refer to the response to Comment 1 above.

3. It is beyond the scope of this EIR to conduct the detailed engineering that would be required to estimate the 100-year flood event on any of the water bodies affected by the project. The project applicant has retained an engineer to develop a drainage plan that includes the necessary mitigation measures to attenuate peak floodflows, in accordance with county standards. The EIR preparers have suggested additional measures to ensure that BMPs are implemented in a manner so that existing flooding problems on the Carmel River are not exacerbated (page 9-20). Refer to the response to Comment 26 from Finegan and Cling.

4. Monterey County Water Resources Agency regulates the size and operations of the proposed detention basins in the county. Detention basin outlet works are normally designed to drain the basin in a few hours so that space is available for subsequent storms.

5. The FEMA flood insurance study prepared for Monterey County indicates that the 100-year water surface elevation would be 55.9 feet at the Rancho San Carlos Bridge. The width of the floodway is approximately 825 feet at that location, and the velocity would be about 5 feet per second. Approximately 2,000 feet upstream of the bridge, the floodway is constricted to 168 feet, and floodflows would exceed 13 feet per second. It is likely that during the March 1995 floods relatively slow water at the bridge gave the illusion that the bridge was backing up water. The FEMA study also indicates that the bridge would not be overtopped by a 500-year flood.

6. The draft EIR evaluated six scenarios: existing conditions, existing conditions plus approved projects, existing conditions plus approved projects plus CDP-GMPAP, existing conditions plus approved projects plus buildout, existing conditions plus approved and proposed projects, and existing conditions plus approved and proposed projects plus buildout.

   The recommended scenario, existing conditions plus the project buildout, would show fewer traffic impacts than the other scenarios and would not represent a realistic scenario because

The recommended scenario, existing conditions plus the project buildout, would show fewer traffic impacts than the other scenarios and would not represent a realistic scenario because some of the approved projects would be constructed before the Santa Lucia Preserve is built out.

7. Twenty-four hour counts have been made on Rancho San Carlos Road. The peak hourly volume for northbound traffic on Rancho San Carlos Road is 116 vehicles, just after the noon hour. However, the peak hour when drivers on Rancho San Carlos Road have the most difficulty in turning onto Carmel Valley Road is the afternoon peak hour (4:30-5:30 p.m.), when traffic on Carmel Valley Road is heaviest, and it is the most difficult time for drivers on Rancho San Carlos Road to make turns onto Carmel Valley Road. A preliminary analysis of the noon and afternoon peak hours, taking into consideration the different traffic volumes during each period, found that the greatest delays for traffic on Rancho San Carlos Road occurred during the afternoon peak hour.

   This is consistent with analyses of most transportation facilities; generally, the worst operating level is during the p.m. peak hour (an hour between 4 p.m. and 6 p.m.). In addition, the proposed project is predominantly residential with traffic generation that also peaks during the p.m. peak hour. By analyzing an hour between 4 p.m. and 6 p.m., the EIR can assess the impact of the proposed project when it is contributing the most traffic to the roadway system.

8. The draft EIR states the improvements that are proposed for Carmel Valley Road in the CVMP. These improvements were not, however, included in the traffic analysis.

9. The trips generated by the 40 visitor units were considered in the analysis. The traffic generated by the conference center was not considered because many visitors stay onsite or travel outside the peak hour. Backups may occur on Rancho San Carlos Road during off-peak hours; however, the peak hour was analyzed in the traffic study because it presents the worst-case conditions.

10. Two additional alternative mitigation measures have been recommended in the draft EIR for the intersection of Carmel Valley Road and Rancho San Carlos Road: installation of a traffic signal or a grade-separated interchange. The Monterey County Board of Supervisors will consider the recommendation for the traffic signal when it takes action on the proposed project. Also refer to the response to Comment 2 from the Monterey County Department of Public Works.

11. As described on page B-10 (in the draft mitigation monitoring and reporting program) of the draft EIR, the Monterey County Department of Public Works would review the trip reduction program and request progress reports from the transportation management agency to ensure that the program is being implemented.

12. The trip generation analysis uses the best available data obtained from surveys of other similar developments. The rates that are normally used for residential developments do not apply to a community like the proposed project, where residential units are located a significant distance from other developments, and commercial and recreational uses are provided for the residents.

13. Comment noted. Addition of the second southbound left-turn lane at the intersection of Highway 1 and Carmel Valley Road has been approved and funded by Caltrans. The mitigated level of service for this intersection is shown in Table 13-14 in Chapter 13, "Traffic", of the EIR.

14. A traffic control plan would be prepared before project construction to minimize the effects of construction activities on the roadway system. The traffic control plan would restrict the construction traffic from using roads that would be significantly adversely affected by such traffic.

15. The EIR does not recommend the left-turn acceleration lane as an interim measure. This measure is proposed by the applicant. The EIR acknowledges that implementation of this measure would reduce the CDP-GMPAP impacts to a less-than-significant level, but would not reduce the impacts of full buildout of the project to a less-than-significant level.

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To Wanda Hickman	From CVPOA
Co. County of Monterey	Co. Elcene Franks
Dept. Planning	Phone # 659-5623
Fax # 755-5487	Fax # 659-1142

Carmel Valley Property

P.O. Box 157—Carmel Valley,

July 7, 1995

Wanda Hickman, Project Planner
Department of Planning/Building Inspection
COUNTY OF MONTEREY
Fax No. 755-5487

Re: Santa Lucia Preserve Project Draft EIR

Dear Ms. Hickman:

We have reviewed the Santa Lucia Preserve Project Draft EIR and offer the following comments:

Page No:	Comment:	
S-1	It is not possible to evaluate the advisability of lot sizes under 40 acres when no plot plan is included with the document. Although 40-acre minimum zoning is considered a density factor, lot configuration and topography dictates ideal size. Some plan showing proposed lots and evaluation of their size should be included in the EIR.	1
S-4	Alternatives: Distinctions made by the consultant between the No-Lodge and Reduced Lodge alternatives and No Project alternatives are artificial. Some difference is inferred between lodge visitor accommodations and hacienda guest unit visitor accommodations. In actuality, no data is provided to indicate guest units would be utilized any differently than lodge units. In fact, visitor accommodation uses described on page S-2 include both lodge and hacienda units. The No-Lodge alternative is, in essence, a Reduced Lodge scenario. Resolution 93-115 allows for the total 150 visitor accommodation units. If there is some intended difference, then the No-Lodge and Reduced Lodge alternatives would be better labeled Full Visitor Accommodation and Reduced Visitor Accommodation alternatives.	2
S-16	Areas of Known Controversy: No criteria is given for establishing what constitutes an area of known controversy. In addition to the neighbor dispute and water, traffic problems should be added. In Carmel Valley, concern over traffic issues has sparked lawsuits, resulting in years of planning and a court-ordered safeguard "trigger". Opinions about needed improvements vary greatly from person to person and there is no consensus at present.	3
2-13	Project Phasing: In all the time we have spent talking with Rancho San Carlos staff, this is the first we have heard that the conveyance of parcels to the Santa Lucia Conservancy will take place in conjunction with phase-development. The applicant has planned an exemplary project aimed at protecting a large, open, beautiful part of Monterey County. It does not seem suitable they should "choke at the bat" in this implementation method. Best protection and support of the applicant's stated goals would be to record parcels being conveyed by deed to the Santa Lucia Conservancy as part of Phase 1.	4

2-16 There appears to be some sort of discrepancy over impacts to the redwood forest. Page 2-16 states only 2 redwood trees will be removed as part of the project. Page S-7 identifies potential loss or degradation of 5.6 acres of redwood forest. Page S-8 says there may be a loss of 6 acres of redwood forest. Charts listed in Appendix H show no redwood trees removed. 5

2-18 Golf Clubhouse: The EIR discusses the applicant's request to decrease required parking from 87± spaces to 40± spaces, but gives no evaluation of the proposal and provides no data regarding possible special features of the site on which to base a finding. 6

5-7 Employment: Generation of construction-related and operations-related employment are discussed and identified as beneficial impacts on page S-5. However, these effects can only be beneficial to the area of project impact when local people fill these jobs. The applicant and subsequent Stewardship company can effect a benefit to the area if they agree to hire only local workers. If out-of-area workers are hired, employment becomes a negative impact in need of mitigation. Too often local workers find that an "exclusive" development means exclusive of locals. While it is not desirable or practical to regulate individuals who will hire contractors to build their homes, it is necessary to require the applicant to utilize the local work force in order to classify this effect as beneficial. 7

6-2 The Robinson Canyon and Los Tularcitos sedimentary units have never been classed as formations. They are members within the Chamisal formation (Bowen, O.E., 1965). 8

6-8 "Holocene...or later, during the last Pleistocene ice age". The ice age was earlier than the Holocene, not later. 9

6-16 The "Potential increased earthquake activity due to groundwater withdrawal" is a mistaken concept. As the consultant correctly recognizes on this same page, it is increased fluid pressure (the opposite of withdrawal) which may trigger earthquakes. 10

Ch. 8 We are pleased to note that this EIR recommends several mitigations, additional to those in previous studies, to guard against overdrafting of groundwater and consequent environmental damage throughout the life of the project. For example, regular monitoring and evaluation of groundwater levels (8-45), and regular dry-season monitoring of pools and base-flow conditions along the main creeks (8-48), with the results made available to public agencies. These are useful and important mitigation measures. 11

8-2 "None of the faults are presently active..." is imprecise language. Better to say, "Investigation revealed no evidence of fault activity". As correctly pointed out on page 6-7, "lack of evidence of activity does not prove that a fault is inactive" and several characteristics of the area "all tend to obscure evidence of recent fault activity. 12

8-3 Referring to well tests: "Details...are provided in Chapter 6." Not so--well tests are not dealt with in Chapter 6 and the "Comprehensive Hydrological Study" does not accompany this EIR. 13

8-22 "Distribution will interconnect all wells..." It is not clear from this statement whether all interconnections will be underground. 14

8-28 "Wells T-6A and R-11 had a high aluminum content..." perhaps from incomplete well development. It is not clear what is meant by incomplete well development and no information is given to relate incomplete well development to anomalous aluminum levels. 15

8-59 The estimate of a 180 AF/year deficit in outflows to Carmel Valley during a critical drought is considered high because it "assumes no groundwater storage depletions during a drought". Please explain how there could be no groundwater depletion when project demand continues and there is no rainfall. 16

11-49 Construction-Induced Disruption of Nesting Golden Eagles and Cooper's Hawks: The EIR recommends conducting surveys within 60 days of initiation of construction near areas of potential nesting sites and halting construction until you have fledged, if nests are found. This mitigation measure is backwards and could be disastrous. Disruption of habitat prior to nesting (during courtship) may effectively prevent nesting and reproduction of the species. A more efficacious mitigation could be patterned after the Pinnacles nesting area, where construction is not initiated or carried out during the breeding season. The consultant should contact the Predatory Bird Research Group in Santa Cruz for specific guidelines and more information about the golden eagle's habits. 17

13-29 As a means of minimizing traffic, the applicant proposes to designate all inclusionary housing units (53) as employee units. This has become an accepted practice in Monterey County, but we wish to point out two concerns we have with this practice. First, traffic may be decreased when employees do not have to travel off the Preserve to go to work, but their families will still need to leave the area to conduct their activities of daily living (ie. school, shopping, spouse's employment, entertainment, etc.). This factor has not been considered when arriving at the judgment that inclusionary/employee housing would result in decreased traffic impacts. Of course, if all employees are required to be single, this may then be the case. Our second concern is that utilization of inclusionary housing for employee units does not forward the goals of affordable housing in Monterey County. This practice allows only those who have job skills to offer the development to enjoy the benefit of affordable living in a beautiful setting and denies the opportunity to otherwise deserving candidates. The EIR states there will be approximately 200 jobs at the preserve and only 53 inclusionary units. Clearly not all employees will be accommodated on the Preserve. It seems that housing of employees falls under a different use category than that of providing affordable housing. 18 19

13-32 Discussion of use of the golf trail occurs in this section in terms of traffic impacts. 15,000 rounds of golf are expected to be played each year. Half of the use is expected to come from resident members and half from guest and non-resident members. 39% of the total golf-generated trips are expected to come from this guest/non-resident member population. We suggest a limit of 39% of the annual golf rounds, or 5,850 annual rounds, exclusive to golfers whose trips originate outside the Preserve. Should it turn out that useage of 20

the golf trail by resident members be less than that identified in the EIR under this traffic impacts section, the applicant will not be tempted to allow an increase of use (and impact) by out-of-area golfers. 20

Ch.13 Traffic: Contributions of "fair-share" fees do not mitigate impacts if improvements are not constructed. It would be far more effective to have Public Works staff work with the applicant to make specific improvements to the affected roadways. Private enterprise can accomplish far more with funds than governmental agencies. Example: County projected costs of construction of the Rio Road extension = $1.2 to $4 million; private contractor projected costs = $600,000 to $800,000. Collection of impact fees by government necessitates loss of funds to administration costs. Additionally, no mention is made of Congestion Management Plan funding of road improvements to Carmel Valley Road between Carmel Rancho Boulevard and Highway One, which are slated to begin after October of this year. 21

16-15 Schools: Assumptions of demographics of future population have occurred in the Carmel Valley area in the past. Carmel School was closed, with no attempt to maintain or improve the facility to meet changing standards or requirements. It is now prohibitively expensive to do so. There is an assumption made in the EIR that the majority of residents at the Preserve will be retired and without children, just as it was assumed for Carmel Valley. The unplanned change in demographics has caused the current site impaction at local public and private schools in and around the Carmel Valley. One mitigation measure calls for payment of impact fees. The other recommended mitigation measures cannot be accomplished by the applicant; only by the Carmel Unified School District, which is not necessarily compelled to fulfill the mitigation. 22

16-15 Law Enforcement: An assumption that a staffed entrance gate will deter criminal activities completely overlooks the "back door" Robinson Canyon Road access to the Preserve. Perhaps the potential for impact should be monitored, and mitigation fees charged in the future based on actual impact. 23

16-17 Fire Protection Services: CDF does not provide structural firefighting services (as quoted by Panzer). It provides wildland fire protection. It would be more effective if the Stewardship hired a small, full-time professional staff to head up the volunteers, such as has been done in the Carmel Valley Fire Protection District. 24

16-20 Emergency Services: A 25-minute (one-way) ambulance response time is deadly. It would be better planning to provide an emergency vehicle and EMT or RN to transport patients off the Preserve, either to connect with county ambulance services or to go directly to Community Hospital. 25

16-22 Public Trails: In a recent public hearing before the Board of Supervisors, County Counsel identified a requirement for a "needs assessment" to be done prior to consideration of trails dedication or requirement. The Board of Supervisors made it clear that Monterey County would not fund such a study. Two public and several private trails are proposed. However, the EIR states on page 2-11 that "specific 26

alignments have not been identified and would require additional environmental review before they are constructed". The state's Subdivision Map Act allows local jurisdictions to requrie an exaction of recreational trails dedication as a condition to development. Monterey County has a long history of such requirements. Clearly, now is the time such a study be dome. It is very likely such a study will show that proposed recreational facilities and trails will compensate for any increase in need for recreational facilities caused by this proposed development, but it is not possible to reach that conclusion based on this EIR. Therefore, the EIR is unsupported when it states no mitigation measures are required. Also, the EIR says the aproposed public trails will be "licensed" to an appropriate public agency. It is not clear what is meant by "licensed". 26

Finally, we are pleased to see the ongoing studies and data the applicant will be gathering and monitoring as mitigation measures. We are concerned over the many different county departments which will be the final points of checking this information. We recommend that data submitted to county departments as part of required mitigation also be placed in the Carmel and Carmel Valley libraries, with public notice of their availability. This will allow members of the public to review the information as it is made available and to communicate any coucerns they may have to the appropriate authority. 27

Sincerely,

Ileene M. Crane-Franks

Ileene M. Crane-Franks, Co-Chair
Land Use Committee

Lee Rieman

Lee Rieman, Co-Chair
Land Use Committee

/imcf
cc. Tom Gray
Gillian Taylor
Robert Greenwood
CVPOA Land Use Committee members

1. The phasing sheet of the VTM is provided in Figure 2-4; copies of all sheets of the VTM are available for review at the Monterey County Planning and Building Inspection Department and are included in the final EIR, Volume II, Appendix J.

2. Refer to more detailed descriptions of these alternatives in Chapter 20, "Alternatives", of the EIR.

3. Descriptions of these additional areas of controversy have been added to the final EIR.

4. The comprehensive development plan describes the use of preserve lands for "a conservation program of scientific research and education, recreational activities, and managed agricultural program which ensure long-term resource protection." The resource management plan calls for a program of resource and mitigation monitoring, resource management, conservation education, and safety and resource protection. These activities all require funding, and the application provides for these programs to be funded primarily by an endowment generated from home site sales.

   The Conservancy will not have an adequate endowment at the early stages of the project development to fund the management of the entire 18,000-acre preserve. The phased contribution of the preserve lands is intended to correlate the expansion of the Conservancy's management responsibilities with the growth of the endowment, which will fund those expanded management activities.

   As the phased subdivision and development of the project progresses, the lands proposed for wildlands and openlands in the later phases of the project remain zoned Resource Conservation and have no entitlements for uses other than the present ranching use. They will remain essentially as they have been over past years (i.e., as agricultural open space but without the intensified resource management that will occur when they become part of the preserve).

   In addition, there are technical problems with conveying all of the preserve lands at one time. The openlands, for example, are part of the individual lots, and they cannot be legally described until the lots are actually created by recordation of a final map. Thus, creation and conveyance of the openlands would require recordation "up front" of final maps for the entire project. Likewise, creation of the wildland parcels would require surveying the entire 17,000 acres covered by the VTM, and approval and recordation of a parcel map severing those wildland parcels from the lots. Not only is this considered impractical and technically difficult, the costs would be prohibitive.

   In summary, the conveyance of all preserve lands at the same time is not required under CEQA, is legally excessive, and is technically infeasible.

5. Refer to the response to the Comment 1 from George E. Ferguson for a discussion of the relationship between the number of redwood trees planned to be removed and the number of acres of redwood forest habitat with potential for loss or degradation. The figure "6 acres" is a rounding of "5.6 acres".

6. The rural location and limited public access will result in less demand for the golf trail and therefore require less parking than at a similar use located on a public street. In addition, the following project features will serve to reduce the demand for parking:

   - All employees will be required to park at the maintenance facility and ride a shuttle to the clubhouse (no employee parking at the clubhouse).

   - Guests at the hacienda and lodge will be encouraged to ride a shuttle to the golf trail.

7. The employment analysis contained in the "Economics" chapter of the EIR was not able to identify the number of project-related jobs that would be filled by persons already residing within Monterey County or nearby communities; however, the characteristics of the jobs generated by the project indicate that many jobs would likely be filled by county residents. Many of the jobs required to operate the lodging facilities, restaurants, retail businesses, and recreation facilities, and to maintain landscaped open space areas are likely to be low-wage jobs that would not attract large numbers of persons to Monterey County. The county's relatively high unemployment rate indicates that many of these jobs could be filled by persons already residing within the county. Additionally, many of the estimated 436 secondary jobs that would be generated by the project inside and outside of Monterey County would be available by persons already residing within Monterey County.

   Employment effects of a project are generally considered beneficial economic effects because new jobs provide employment opportunities for unemployed and underemployed persons, regardless of the resident location of the employee prior to being employed by the project. The income generated by these jobs, regardless of who fills the jobs, subsequently benefits local businesses through employee spending on retail goods, services, and housing. In the context of CEQA, requiring mitigation (i.e., requiring the project sponsor to hire all employees from the local area) for these beneficial economic effects is not warranted by the probable economic effects of the proposed project. The potential adverse environmental effects of, and mitigation for, project-related employment, such as increased traffic congestion and decreased air quality, have been addressed in other chapters of the draft EIR.

8. The EIR text has been revised to show that the Robinson Canyon and Los Tularcitos units are members of the Temblor (Chamisal) formation.

9. The EIR text has been revised to indicate that the landslides date from the early Holocene or earlier.

10. For the commenter's reference, this issue was raised in the draft EIR to address a comment apparently received in response to the Notice of Preparation. The draft EIR discusses how only a significant *increase* in fluid pressure in the fault plane could increase the potential for fault movement. The EIR text has been revised to clarify the conclusion that no increase in the potential for fault movement from groundwater withdrawal is expected.

11. The Monterey County Board of Supervisors will consider this comment when it takes action on the proposed project.

12. The suggested change has been made in the final EIR.

13. Because of the large number and size of the technical studies done for the Santa Lucia Preserve project, they were not reproduced in the EIR. The sentence was referencing Chapter 6 of the Comprehensive Hydrological Study, a copy of which is available for inspection at the Monterey County Planning and Building Inspection Department.

14. Except for manhole covers at valves, meter boxes, and wellhead plumbing, the water distribution system will be underground.

15. Well development is a process of pumping and surging a newly completed well to agitate and stabilize the gravel pack and flush residual drilling mud from the gravel pack and borehole wall. Drilling mud contains natural clays that can have a high aluminum content. If development is incomplete, residual traces of drilling mud could result in elevated aluminum concentrations in water pumped from the well. The residuum would gradually be flushed out during normal well operation, and the aluminum concentrations would decrease to background levels.

16. The estimate assumes that groundwater pumping will be supplied entirely by intercepted base flow during the drought. In reality, it is likely that some of the groundwater will be supplied by temporary decreases in groundwater storage in areas away from the creek. These decreases would not affect base flow during the drought.

17. As noted in the draft EIR (page 11-49), no active Cooper's hawk or golden eagle nests were identified during intensive surveys conducted in appropriate habitats at the Santa Lucia Preserve (BioSystems Analysis 1994). Suitable breeding habitats, however, are present at the preserve and all proposed home site and road alignments will be surveyed for these species, as well as other sensitive raptors, at least 60 days prior to construction. These procedures were recommended by DFG and USFWS staff to protect active nests of these species. BioSystems Analysis biologists consulted with the Predatory Bird Research Group and they used standardized techniques for conducting raptor surveys and for developing mitigation measures for these species.

18. The EIR does not assume that no external trips would be generated by the inclusionary housing. The trip generation analysis conducted for the proposed project assumes that about 30%

of the trips generated by the inclusionary units would be external to the preserve. It should be noted that the employees' families will be making many of their shopping, entertainment, and other trips to facilities within the proposed project area.

19. Only those employees who qualify for affordable housing would be allowed to reside in the affordable/employee housing of the project. The goal of the affordable housing policy is to provide affordable housing to those who are in need. Many of the employees of the preserve would qualify for affordable housing and, as such, the provision of affordable housing for employees addresses the goal of Monterey County.

20. The golf trail trip generation analysis was based on surveys of other similar facilities and consideration of the setting of the proposed project. The golf trail is not expected or intended to provide for major golfing events; therefore, such a limitation is not warranted by the Monterey County Planning and Building Inspection Department. However, the Monterey County Board of Supervisors will consider this recommended limitation when it takes action on the proposed project.

21. In the case of cumulative impacts where a project is contributing to a significant impact, a project's share of the mitigation is limited to its pro rata share of its contribution to the cumulative impact. CEQA cannot be used to require an applicant to provide mitigation beyond the impacts caused by the proposed project; otherwise, it can be considered an unlawful taking. Therefore, pro rata contributions to funds identified for specific purposes have been upheld in the courts as adequate mitigation for impacts.

    Monterey County has adopted a fee ordinance, which establishes development fees to fund mitigation measures. Several of the improvements planned for Highway 1 and Carmel Valley Road are listed on pages 13-20 and 13-22 of the draft EIR.

22. Mitigation measures set forth in the EIR address the potential increase in demand for schools. To finance the building of new schools or portable classrooms, school impacts fees should be implemented. This mitigation measure is consistent with policy 47.2.1 of the Monterey County General Plan. Additionally, implementing a year-round school and reopening Carmelo School are recommended.

23. Security staff will patrol the Santa Lucia Preserve.

24. The Santa Lucia Preserve is within the state responsibility area of CDF. CDF does provide wildland and structural firefighting for the Santa Lucia Preserve. The volunteer fire company, Company 70, is sanctioned by CDF and has direct communication with CDF via radios.

25. The Stewardship Company will provide first-response life and safety services for residences and the back country. The respondents to emergencies will be trained by the American Red Cross in CPR and first aid. The Red Cross trains employees to stabilize a victim's condition until professional assistance arrives. One of the key elements of Red Cross training is to wait

for the ambulance and "help the victim rest comfortably". The Stewardship Company will follow the Red Cross Guidelines and wait for an ambulance in the case of severe injuries.

26. Page 16-22 of the EIR has been amended to state that mitigation measures may be required in the future after further environmental review. The public trails will be "licensed" to the appropriate agency. "Licensed" means that the appropriate agency will assume responsibility for trail construction and maintenance as well as satisfy all patrol and liability requirements.

27. Mitigation monitoring plans, reports, and future studies will be available for public review at the Monterey County Planning and Building Inspection Department in Salinas.

the
Carmel Valley
Racquet & Health Club

FAX TRANSMITTAL SHEET

DATE: 7-5-95

TO: WANDA HICKMAN FAX # 755-5487

FROM: DENNIS SHEAHEN FAX # 624 8248

NUMBER OF PAGES TO FOLLOW: 2 REPLY REQUESTED NO

COMENTS:

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the
carmel valley
racquet club

27300 Rancho San Carlos Road
Carmel, California 93923
Telephone 408 624 2737

Ms. Wanda Hickman, Planner
Monterey County Planning Department
240 Church street, Suite 116
Salinas, CA 93901

July 5, 1995

FAX No. 755-5487

Re: Santa Lucia Preserve Project, Draft Environmental Impact Report (DEIR)

Dear Ms. Hickman,

I own the Carmel Valley Racquet Club located on the Rancho San Carlos Road and I have followed the application and environmental process for the Rancho San Carlos very closely for the past four years and would like to comment on the DEIR.

The Draft Environmental Impact Report for the Santa Lucia Preserve is incredibly well researched and complete. It's overall conclusion that all potential impacts can be reduced to less than significant level by following the mitigations proposed is very reasonable based on the overwhelming planning effort by the applicant and the small number of lots and [illegible]

number of lots and uses created on the 20,000 acre property. I feel it is a tremendous opportunity for Monterey County to have an area the size of the entire Carmel Valley to be developed with only 350 homes, one private golf course and one 150 unit hotel. As compared to Carmel Valley and other areas of the County, this is truly an exceptional development.

In addition to the small number of homes and other development involved, the uniqueness of the Santa Lucia Preserve's approach to preserving the entire natural habitat is to be commended. I can't imagine another development anywhere putting so much energy, time and other resources into the process of preparing such a unique and special plan.

I would like to comment on a couple of traffic related issues that are the only specific issues which I find relevant to our club's operations. The section of Rancho San Carlos Road just prior to our club is proposed to be widened and made safer than its current configuration. Making this improvement, which is part of the proposed project, has a tremendous positive impact for our club and others traveling the road.

Adding the pedestrian walkway on the bridge on the Rancho San Carlos Road over the Carmel River will also be a positive benefit for everyone in our area. The current bridge is adequate for two cars passing, but not when there are pedestrians walking across the bridge. This is often the case with the many people who enjoy walking in the neighborhood.

The intersection of Rancho San Carlos Road with Carmel Valley Road is an important intersection for our club and everyone in our neighborhood. Although the rate of accidents has dropped (as shown in the table in the DEIR), some level of improvement to the intersection would be very helpful with or without the project. Two of the suggested mitigations, either the additional merging lane solution proposed or the traffic light suggested in the report would increase the ability for our members to move through the intersection safely and easily. We would support whatever the community believes is the best of these solutions. However, the other alternative concept suggested involving construction of an overpass or tunnel at this intersection is definitely not appropriate. I am very much opposed to this proposed solution. I would prefer to see such resources applied to solving other traffic problems along Carmel Valley Road. At any rate, what ever is done at the intersection, I intend to be involved in the public process to determine the best solution.

The project will contribute some traffic to Carmel Valley Road. Given the distance involved in traveling from the center of Rancho San Carlos and the certainty that its

residents would consolidate their trips into Carmel and the Valley because of that distance, the additional traffic level seems acceptable. The report states in Table 13-4 that the project adds 298 vehicles per day (17,012 less 16,714) to the Carmel Valley Road. I assume this would be less than one vehicle per minute during peak commute times. Given this very small number of vehicles added and the recommended mitigation of contributing to the fund that will be used to solve traffic problems on Carmel Valley Road, I find the additional traffic is acceptable.

In summation, I am supportive of the overall concept of the Santa Lucia Preserve and the benefits it will provide to the community for years to come. With the careful planning done to date and the mitigations suggested in the DEIR, I concur that all impacts can be reduced to a level of less than significant.

Thank you for considering my comments.

Yours truly,

Dennis R. Shepherd
Owner

JUL-05-1995 17:52 P.01

Response to Comments from the Carmel Valley Racquet & Health Club

1. The comments provided will be considered by the Monterey County Board of Supervisors when it takes action on the proposed project.

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July 6, 1995

Ms. Wanda Hickman
Monterey County Planning and
Building Inspection Department
Post Office Box 1208
Salinas, California 93902

Re: Draft EIR
Santa Lucia Preserve Project
PC 94-67 and PC 94-218

Dear Ms. Hickman:

Thank you for the opportunity to comment upon the Draft Environmental Impact Report for the Santa Lucia Preserve Project. Overall, we found the document to be a readable, comprehensive assessment of the project. We hope that our comments will help the County and Jones & Stokes complete the task of preparing an analytic, consistent, factually accurate and legally adequate final EIR.

Our comments are in four parts:

- In-depth comments on three major issues in the DEIR.
- Detailed comments on specific items in the DEIR.
- 28 marked-up pages from the DEIR noting typographical errors and minor language corrections or clarifications.
- Detailed water-related comments from the Rancho San Carlos Water Team in a separate memorandum under a cover letter from Polly Boissevain, P.E., of Camp Dresser & McKee, Inc.

I. IN-DEPTH COMMENTS ON SIGNIFICANT AREAS OF THE DEIR.

A. Page S-5. Environmentally Superior Alternative.

1. The DEIR Text.

The DEIR introduces the subject of alternatives analysis with the following statements:

- "All of the impacts of the proposed project could be reduced to a less-than significant level..." 1
- "Through the applicant's resource constraints planning process, the project avoids many of the sensitive biological and cultural resources onsite."
- "Thus, reducing the size of the proposed development is the only meaningful way to reduce impacts."

(DEIR, p. 20-3)

The DEIR does not suggest that the "No-Golf Trail" alternative will result in any qualitative improvement in the project, but rather that a mere reduction in the size of the project (a reduction in quantity) will *ipso facto* result in an environmentally superior project.[1] However, the DEIR neglects to weigh the environmental benefits and "by-products" of the Golf Trail which will be lost if the "No-Golf Trail" alternative is adopted, or to evaluate the impacts of alternative uses of the site, such as agriculture, if the Golf Trail were eliminated.

Monterey County General Plan Objective 5.1 (cited on p. 1-12 of the project application) states:

> "Protect and preserve watersheds and recharge areas, particularly those critical for the replenishment of reservoirs and aquifers."

The San Clemente Flats area is one of four localized sediment sources identified as contributing to the sedimentation of the San Clemente Reservoir (RMP, p. 3-94 *et seq.*). The Golf Trail is a carefully thought-out solution for rehabilitation and enhancement of a watershed badly degraded by generations of farming and grazing. The removal of cattle and wild boar from the Golf Trail

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[1] The DEIR analysis identifies only one impact to be avoided by the "No-Golf Trail" alternative, and another three impacts to be marginally reduced.

area will allow the new generation of native grasslands, oak forest and riparian/wetlands areas established as part of the Golf Trail to survive and flourish.[2] Likewise, the removal of cattle and the implementation of the Stormwater Management Plan (Golf Trail application, Section 7.12) will benefit San Clemente Creek by reducing sediment transport and increasing base reach flows. For these reasons, the Golf Trail is considered the most significant habitat restoration component of the Santa Lucia Preserve plan. 1

2. Other Uses of the Golf Trail Area.

The DEIR overlooks the fact that if the Golf Trail were deleted from the project, the highly adaptable lands of the San Clemente Flats would certainly be put to other productive uses which would have impacts at least as great or greater than the Golf Trail without providing the environmental enhancements inherent in the Golf Trail design. For example, it is reasonable to expect that this land would be put to either its historical use of grazing or farming (e.g., vineyards), or housing. The potential impacts of these alternative uses are not considered in the DEIR's analysis of the "environmentally superior alternative." 2

3. The Golf Trail Is an Integral Component of the Santa Lucia Community Preserve.

The Golf Trail is an integral component of the economic and social model necessary to endow the Conservancy and provide the financial support and community fabric for the perpetual conservation and enhancement of the Preserve. The marketing study prepared for the project, as well as the focus groups conducted by the Rancho San Carlos Partnership, demonstrate that access to a limited play, environmentally compatible golf course within the Preserve is essential in order to attract the community of residents financially able and willing to underwrite long-term resource protection and management. With the Golf Trail deleted, the project will not feasibly attain an essential project objective, namely, a small, vital residential community willing and able to commit the philosophical, cultural and financial support essential to the perpetuation of the Preserve.[3] 3

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[2] The Golf Trail application proposes substantial addition of native grasslands as rough bordering the Trail, replacement of non-reproducing landmark Valley Oak trees on a 5:1 basis, and replacement of wetlands on a 3:1 basis.

[3] The EIR need only examine alternatives that could feasibly attain most of the basic objectives of the project (CEQA Guidelines §15126[d][5]).

Additionally, by reason of the research and scientific orientation of the Preserve, the Golf Trail presents a unique opportunity for Monterey County, one of the "golf capitals of the world," to demonstrate a new paradigm for the resource-oriented and environmentally protective golf course. 3

If the basis for the conclusion of "environmental superiority" is simply "reducing the size of the proposed development" (as stated on page 20-3 of the DEIR), there are other ways to reduce size (such as the "Reduced-Lodge Alternative" or the "No-Lodge Alternative") without eliminating the environmental, economic and social benefits of the Golf Trail that are essential to achieving the basic objective of the project: the successful creation of a sustainable community preserve.

B. Page 17-11. Identification as Historic District.

The text of the DEIR purports to "determine" that Rancho San Carlos is "an historic district" (DEIR page 17-11). This determination is then carried forward and identified as a "significance criterion" (DEIR page 17-15). The determination and significance criterion is then carried forward and used to identify a significant impact, to wit, "Damage to Historic District from New Construction" (DEIR page 17-19) and to support imposition of additional mitigation measures. 4

Monterey County Preservation of Historic Resources Ordinance (Ordinance No. 3795, December 13, 1994) establishes the criteria and procedure for the designation of historic districts in Monterey County, as well as the permit review process for historic districts.[4] That ordinance provides as follows:

> "Designation of historic resources and districts may be initiated by the Board of Supervisors, the Planning Commission, the Review Board, the Secretary, or upon the application of the owner of the property for which designation is requested, or the authorized representatives of the owner. No property shall be designated pursuant to this Chapter without the consent of the property owner."
>
> (Ordinance No. 3795, Section 18.25.060.A, emphasis added.)

[4] Monterey County has been designated as a Certified Local Government, and is therefore qualified to designate or recognize historically significant resources under the State Historic Resources law (PRC §5020 et seq.).

No part of Rancho San Carlos has been designated by the County as an historic district, and the owner of the property has never consented to, and does not now consent to, the designation of any part of Rancho San Carlos as an historic district. This section of the DEIR, including the impact analysis, conclusions and mitigations based thereon, must be deleted from the EIR 4

C. Unnecessary, Redundent and Excessive Mitigations.

In a number of cases, the DEIR recommends additional mitigation measures, over and above those included in the project design or recommended by the project applicant, which are unnecessary, redundent or out of proportion to what is reasonably required or feasible to reduce identified impacts to less-than-significant levels. Usually such mitigation measures require additional studies, frequently redundent studies, or periodic and perpetual monitoring. Examples include the following:

1. Page 8-30. Weekly/Monthly Monitoring of Operating Time and Pumping Water Level of All Active Water Supply Wells; and Page 8-45. Monitor Groundwater Levels At Least Quarterly In Perpetuity. To the best of our knowledge, this level of monitoring is not required of any other private or public water purveyor in Monterey County. Weekly, monthly, and even quarterly monitoring of all operating wells is excessive. The RSC Water Team recommended the following groundwater monitoring programs to detect on-site and off-site groundwater impacts and to evaluate source capacity versus system demand: 5

> "Quarterly water level monitoring in observation wells, as available, complemented by some production wells, is suggested in the following wells as part of an initial perimeter water level monitoring program: T-11A, T-17A, T-20, T-21, and T-29A."
>
> "Semi-annual static and pumping water levels in production wells, complemented by quarterly water levels in selected 'monitoring' wells (cased wells not used for water supply), and semi-annual pumping capacities in all production wells will allow time-series analyses (hydrographs) of basin conditions and individual well performance."
>
> (CHS, Supplement No. 3, pp. 36 and 37, March, 1995)

It should also be possible to establish a conservative determinate date following buildout of the project at which the impact of the project on groundwater levels is stabilized and further monitoring of groundwater is of questionable practical benefit (Cf. provisions for monitoring of base flow in creeks, page 8-50, and monitoring of nitrates, page 9-24).

2. **Page 8-55. Monitor and Maintain Total Area of Riparian Vegetation**. As noted in the Water Team comments, the multi-level transect approach to monitoring mandated by this mitigation is unnecessarily expensive, and is subject to a number of scientific limitations. Other monitoring methods, as suggested by the Water Team (see Water Team Comments, pp. 7-8), which are more advantageous, more amenable to comparison with beyond-project controls, and involve substantially less cost, should be sanctioned by this section of the EIR. 6

3. **Page 9-20. Design and Implement Stormwater Runoff BMPs**. This additional mitigation is predicated upon the DEIR's misinterpretation of the drainage data contained in the project Preliminary Drainage Study and Erosion Control Report (see letter from Bestor Engineers, dated June 19, 1995, attached hereto as Attachment "B"). The DEIR states that "...in areas, such as the Carmel Valley, that are subject to flooding, a few additional inches of flood stage may cause extensive property damage (page 9-17, emphasis added). The additional mitigation is required "...to ensure that flooding in the Carmel Valley is not aggravated by the project." As noted in the Bestor letter, the potential for increased flooding in Carmel Valley from the project without mitigation is not a matter of "a few additional inches," but is 0.11 feet (1.32 inches). Bestor states: 7

> "The mitigation measures suggested by the applicant, addition of detention facilities where the effect will be the greatest, will reduce even this less than significant impact."

There appears to be no factual basis or necessity for the additional mitigation measure, given that the project design and existing County regulations reduce this impact to a less-than-significant level.

4. **Page 9-28. Protection of Riparian Vegetation**. This additional mitigation is designed to mitigate a conjectural impact, i.e., the removal of riparian vegetation not proposed by the applicant. Pages 11-44 and -45 of the DEIR note that although approximately 11 acres, or about 1%, of riparian habitats would be lost or degraded by project implementation[5], this is a less-than-significant impact which nevertheless will be mitigated by a voluntary measure, to wit, enhancement or restoration of degraded 8

[5] See Comment No. AG in Section II below, providing corrected areal estimates of riparian habitat disturbance.

riparian habitat at a 3:1 mitigation ratio. Consequently, there is no CEQA basis for this additional mitigation. 9

Furthermore, the fourth and the fifth bullets of the proposed mitigation appear to address the existing condition, not project impacts. No nexus exists to impose these mitigations as conditions of this project.

The same concerns apply to the same additional mitigation measure recommended on page 11-54.

5. Pages 17-20 and -21. Conduct Research and Prepare Historical Sensitivity Analysis for Unknown Archaeological and Architectural Resources. 90%, or approximately 18,000 acres, of the Santa Lucia Preserve will be set aside as Preserve Lands conserved in perpetuity for open space uses. The 2,000 acres proposed for development, and an additional 7,000 acres adjacent to the development areas[6], have been rigorously examined for archaeological resources over a period of three years. All of the resources identified through those studies are avoided or mitigated. As stated in the background report submitted with the application: "[M]ost of the mitigation has already been accomplished through project redesign, and overall impacts are extremely low for a project of this type" (Breschini and Haversat, p. 41). There is no substantial evidence[7], only speculation, on which to predicate a conclusion that unique but unknown archaeological or architectural resources elsewhere on the property not proposed for development would be damaged or destroyed by this project. In the absence of such substantial evidence, the mitigation measure requiring the entire 20,000 acre ranch to be investigated, visited by a qualified archaeologist, discoveries, if any, recorded, and the preparation of an Historical Sensitivity Analysis for the entire 20,000 acre ranch, is without substantial factual nexus, and should be eliminated. The evidence (and the applicant) would support a mitigation measure requiring further limited site-specific investigation and appropriate related mitigation prior to commencement of construction of facilities such 4

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[6] The areas surveyed included all of "those areas which could reasonably be expected to contain visible prehistoric cultural resources, and which could be viewed without major vegetation removal or excavation" (Breschini and Haversat, February, 1994, p.i).

[7] Argument, speculation, unsubstantiated opinion or narrative are not substantial evidence. "Substantial evidence shall include facts, reasonable assumptions predicated on facts, and expert opinion supported by facts" (PRC §21082.2[c]).

as trails in areas not previously surveyed. 9

6. **Page 17-23. Perpetual Annual Monitoring.** The additional mitigation measure would require a Cultural Resources Management and Monitoring Plan to provide that all known prehistoric and historic sites on the entire 20,000 acre ranch be visited annually by a qualified archaeologist, apparently in perpetuity. There is no factual evidence presented in the DEIR to support either the project-generated need (nexus) for this mitigation or the feasibility of the proposed mitigation. Nor is there any factual evidence presented to demonstrate that such annual visits would be efficacious to prevent or reduce impacts to the resources. This mitigation measure is excessive and ineffectual, and should be eliminated. 10

The foregoing mitigations should be subjected to careful scrutiny to determine their reasonableness, feasibility and effectiveness, and then modified or deleted as appropriate to provide essential mitigation without unnecessarily exacting mitigations at levels of cost or administration out of proportion to the resulting environmental benefits.

II. **DETAILED COMMENTS ON SPECIFIC ITEMS IN THE DEIR.**

A. **Page 1-5.** Add statement that this is a program EIR pursuant to Guidelines Section 15168. 11

B. **Page 2-16, Tertiary Treatment Plant.** The description of the Wastewater Treatment Plant (Application, page 2-47A) which contains the "details" of the plant, is omitted from Appendix "G". It should be included in the Final EIR. 12

C. **Page 2-18, Sixth Line.** The elevations of the clubhouse are missing from Appendix I. 13

D. **Page 6-19, Additional Field Investigations, Lot 194 to 200.** The DEIR identifies a potential landslide at Lots 194 to 200. Subsequent field work performed by Cleary Consultants, Inc., (field mapping of outcrops, review of prior pits and borings for the soil percolation testing, and excavation of two trenches) concludes that the subject area is not a landslide and that the lots are not affected by the Potrero Fault. During a June 20, 1995, site meeting with Jeff Nolan of Nolan Associates and Cleary Consultants, following presentation and review of the additional geologic information for these areas, Mr. Nolan agreed that i) the evidence does not support the existence of a landslide in the Potrero (Lots 194-200); and ii) a minor fault encountered during trenching of the lineament in the San Clemente area is inactive. Accordingly, no other investigation or mitigation measures regarding these features 14

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is planned or required by Mr. Nolan.[8]

E. Page 7-3, Paragraph 6, Lines 3 through 6. Orin Sage requests the following correction: 15

> "Historical cattle grazing consisted of approximately 850 cow-calf pairs grazing year-around (equates to 850 animal units/year) and 250 500-pound yearlings grazing for four months (equates to approximately 42 animal units/year), the total amount of grazing was approximately 892 animal units/year (Sage Associates, pers. comm.).

F. Page 8-4, Third Full Paragraph, Last Sentence. It should be noted that 1992-1993 was a wet year. 16

G. Page 8-8, Last Paragraph, Sixth Sentence. This definition of "base flow" relates to a water balance context. The term "base flow" is used elsewhere in the text (see page 8-10, Paragraph 1; page 8-16, last paragraph; page 8-39, last paragraph; page 8-43, second paragraph, page 8-48, second full paragraph; and page 8-49, first full paragraph), sometimes in a "water balance" context, and other times in the context of "protected base flow reaches." Without careful distinction in the text, this intermingling of the term "base flow" can be very confusing and misleading. It is essential to have a clear definition of "protected base flow reach," and to distinguish that concept from "base flow" in the water balance context. To assist in this definition and distinction, a map is appended as Attachment "C" which shows the locations of "protected base flow reaches" based on the Balance Hydrologics October 1990 base flow survey. This map should be included in the Final EIR, and references to "protected base flow reaches" keyed to the map. 17

H. Page 8-16, Last Paragraph. Reference "short lengths of base flow reaches" to the map attached hereto as Attachment "C". 18

I. Page 8-19, Table 8-1, Footnote C. The Rancho San Carlos Water Team comments are follows: 19

This footnote should be revised to read as follows:

> "Golf Trail irrigation is assumed to have zero return flow to groundwater."

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[8] Because this information results in a decrease in the severity of the identified impact, this information does not trigger recirculation pursuant to Section 15088.5 of the CEQA Guidelines.

The Golf Trail water calculations assumed that water would be replaced and maintained in the root zone only (i.e., no return flow to groundwater), not that the irrigation system would be 100% efficient. 19

J. **Page 8-22, Line 8.** The Rancho San Carlos Water Team comments as follows: 20

The pumping capacity requirement should be 524 gallons per minute, not 526 gpm (584 gpm at buildout minus 58 gpm for market rate homes and 2 gpm for inclusionary homes not within the GMPAP).

K. **Page 8-27, Third Full Paragraph.** The CHS focused on the impacts associated with continuous pumping cycles, using a maximum of 12 hours per day to 3 days for illustration. The CHS did not address the long-term direct impacts of intermittent pumping cycles. 21

L. **Page 8-39, Last Paragraph, "Reach of Persistent Base Flow".** The use of the term "reach of persistent base flow" again raises the confusion between the term "base flow" and "base flow reaches". (See Comment No. G above). Please clarify and where appropriate, reference the map of base flow reaches attached hereto as Attachment "C". 22

M. **Page 8-43, Second Paragraph.** The use in this paragraph of the term "a creek reach with sustained summer base flow" again raises confusion with the term "base flow" and "base flow reaches". (See Comment No. G above). 23

N. **Page 8-48 and 8-49, Base Flow Reaches.** The additional mitigation measures set forth on these pages clearly reference the "base flow reaches" and "the surveyed reaches". This section very definitely needs to identify these "base flow reaches" by reference to the map attached hereto as Attachment "C". 24

O. **Page 9-15, Significance Criteria.** The second bullet, "increased extent or severity of flooding," should be revised to embody a standard. Not every increase in flooding is "significant". The standard for significance should be the regulatory standard set forth in the first paragraph of page 9-19, i.e., that runoff volumes increases are insignificant so long as new development implements the required measures to retain the required runoff volume differential between the pre-development 10-year storm and the post-development 100-year storm. 25

P. **Page 9-17 through 9-20, Increased Runoff and Flooding.** Because of severe flooding that occurred in the Carmel Valley in 26

the spring of 1995, public fears related to flooding are extraordinarily high. Assertions about potential flood risks must be carefully phrased and scrupulously fact-based to avoid causing unnecessary alarm which will unduly prejudice the applicant. The last sentence of this paragraph infers that the project could cause "additional inches of flood stage [which] may cause extensive property damage." There is no factual basis to support this conclusion and, in fact, the information from Bestor Engineers (see Attachment "B" contradicts this inference. The text should be revised to reflect that without mitigation, surface levels will be raised 0.11 feet (1.32 inches), which should be a less than significant impact requiring no mitigation. Nevertheless, as noted, the applicant proposes mitigation measures in accordance with applicable local ordinances which will further reduce this less than significant impact to a *de minimis* level. 26

Q. **Page 10-3, Seasonal Hydrology, Second Paragraph.** It would be helpful to note that the areas surveyed by Balance Hydrologics are the areas previously defined in Chapter 8 as the "protected base flow reaches" as depicted in Attachment "C". This reference is key for mitigation requirement interpretation. 27

R. **Page 10-9, Increased Water Temperature.** The Rancho San Carlos Water Team makes the following comment: 28

The value of 5% appears to be an error and should be changed to the value of 0.7% given on page 11-44 of the DEIR. We concur with the finding in Chapter 10 that "...increased water temperature resulting from the loss of riparian vegetation is considered a less than significant impact."

S. **Page 11-25, Figure 11-4.** This figure shows one location for straggly gooseberry and Lewis' clarkia. Straggly gooseberry is not included in the "potential to occur" table (Table 11-2). This species was initially documented but was delisted during the period of background studies. Consequently, BioSystems ceased recording locations. The inclusion of one occurrence in the figure is misleading. The plant occurs frequently throughout riparian habitats at the Santa Lucia Preserve and elsewhere but it does not have a special status. 29

T. **Page 11-36, Page 11-44 and Table 11-4, Riparian, Wetland and Water Habitats.** By memorandum dated June 14, 1995, Wetlands Research Associates, Inc. (WRA) advised the undersigned that they had made an error in the calculation of impacts to riparian, wetland and water habitats attributable to road construction in the proposed project. WRA estimated the impact based on the entire road width when, in reality, most of the roads currently exist and are only being widened to accommodate anticipated traffic. 30

Similarly, most driveways are planned to occur in places where existing dirt roads are present. WRA has recomputed the impact acreage estimates based on the following revised assumptions:

1. For primary roads, the existing road bed is 12 feet with a 2 foot shoulder on either side for a total of 16 feet of ROW. The proposed ROW is 24 feet. Therefore, the net impact of widening is 8 feet on either side when passing through a riparian, wetland or water areas.

2. Most secondary roads are located on dirt roads with a ROW estimated at 10 feet. The proposed ROW is 22 feet. Therefore, widening will result in 12 feet of new impact when crossing a riparian, wetland or water corridors.

3. Driveways were also located on dirt roads with a ROW estimated at 10 feet. The proposed ROW is 16 feet. Therefore, the impact when crossing riparian, wetland or water habitats is 6 feet.

4. Emergency access roads are 18 feet wide. When located on existing dirt roads, the increased impact is 8 feet.

WRA then reviewed each of the project maps carefully and determined the locations where existing roads are utilized and where new roads are proposed. The revised impact areas for riparian, wetland and water habitats (exclusive of the Golf Trail) due to road crossings are summarized as follows:[9]

Habitat	Previous Area	Corrected Area
Riparian	9.4	4.4
Wetland	1.22	0.82
Waters	0.76	0.56

The total area of riparian, wetlands and water habitats affected by the Golf Trail remains unchanged. Tables detailing the recalculated impacts to riparian, wetland and water zones, as prepared by Wetlands Research Associates, are attached as Attachment "D". These revised calculations should be included in

[9] These re-calculations of the area of impact do not alter the determination by the Corps of Engineers of the jurisdictional "Waters of the United States" as reflected on page 11-17. That determination identifies pre-impact areas, not areas of impact.

30

the Final EIR.[10]

U. **Pages 11-42 through 11-52, Biological Communities.** Throughout this section, title headings and text state that certain acreages of biological communities will be "lost or degraded". In fact, according to the background biological studies, these reported acreages are not proposed for development or removal. They are simply those portions of the various biological communities that are not located within "Wildlands" (i.e., Conservancy-owned open space) parcels, but are located within privately owned parcels. In most cases, these portions of the biological communities are within the conservation easement portions of the privately owned parcels (the "Openlands") and as such are protected by a conservation easement prohibiting development, and are managed by the Conservancy. Therefore, it is factually misleading and a significant distortion of the severity of impact to state that they will be "lost or degraded". For example, on page 11-44, the heading refers to "loss or degradation of 5.1 acres of Redwood forest", an extremely misleading and prejudicial headline. Yet, the biological surveys and GIS plotting reveal that the Redwood communities are not located within any "Homelands", (i.e., the building envelopes) and the Forest Management Plan discloses that only two individual Redwood trees will be removed (for required widening of a narrow portion of Rancho San Carlos Road) in the entire project. The language of this section should be revised or explained so that the reader is not led to believe that the entire acreage of the referenced community is threatened with loss or degradation. In many instances, such revision or explanation will help the public and decisionmakers to understand why the EIR categorizes the impacts of the project on these communities as less than significant. 31

V. **Page 13-24, Table 13-9.** The Pacific Meadows project should now be deleted from the "approved and proposed projects" list. The project is now completed and fully occupied and trips generated by this facility are included in current Monterey County traffic counts on Carmel Valley Road. 32

W. **Page 13-26, Traffic Conditions for Existing Plus Approved and Proposed Projects.** Traffic Engineer Richard Dowling notes that although DEIR traffic analysis is based upon 1992 traffic volumes, Monterey County's latest traffic counts reflect the traffic on Carmel Valley Road dropped 3% between 1992 and 1994. The largest 33

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[10] Because these calculations result in a decrease in the severity of the identified impact, this information does not trigger recirculation pursuant to Section 15088.5 of the CEQA Guidelines.

drops in traffic have been on the most critical segments of Carmel Valley Road (Segment 3- Laureles Grade to Ford Road, and Segments 6 and 7- Rancho San Carlos Road to Robinson Canyon Road). The traffic decrease between 1992 and 1994 for these three critical segments of Carmel Valley Road is greater than the traffic that would be added by full buildout of the Santa Lucia Preserve. This significant information should be reflected in the EIR. 33

X. **Page 13-34, Table 13-12**. This table is missing from the DEIR. 34

Y. **Page 13-36, Third Paragraph**. Traffic Engineer Richard Dowling comments that following five consecutive years of one (1) accident per year at this intersection, the number of accidents "spiked" to eight (8) in 1993 following a realignment and reconstruction of the intersection. However, since that time the number of accidents has dropped off sharply to a level (two per year) equivalent to other intersections on Carmel Valley Road. The drop-off in accidents in 1994 leads Dowling to believe that 1993 may have been an aberration. Based upon a review of the records of the accidents at this intersection, Dowling concludes that the accidents in 1993 were due to driver error and the newness of the intersection improvements rather than any design deficiency at this location. Eight of the eleven accidents recorded since 1992 involved left-turning drivers colliding with eastbound through traffic on Carmel Valley Road where the left-turning drivers either did not see the on-coming traffic or were not looking or saw the on-coming traffic but underestimated its speed. The left-turning drivers involved in the collisions had a mean age of slightly over 70 years, the oldest being 85 years old. Dowling concludes that although this intersection currently meets traffic volume warrants for a traffic signal, the design, construction, signing, striping and sight distance at this intersection meet state standards, and that a left turn acceleration lane at this intersection could significantly reduce accident rates. (Dowling, Traffic Safety Analysis for the Intersection of Rancho San Carlos Road and Carmel Valley Road, November, 1994.) 35

Z. **Page 13-38, First Full Sentence**. The EIR should note that the county has established a precedent for such a "fair share contribution" as feasible mitigations for Highway One traffic impacts in the case of the Coast Ranch (Odello) project and the Cañada Woods (Eastwood) project. Refer to the conditions of approval for these projects. 36

AA. **Page 13-41, Fifth Paragraph, Last Sentence**. Traffic Engineer Richard Dowling comments that this statement neglects the impacts of approved projects on this intersection. Approved projects would reduce the reserve capacity from the existing 42 37

vehicles per hour (LOS E) to 2 vehicles per hour (LOS E). The applicant's proposed mitigation measure would increase the reserve capacity to 18 vehicles (LOS E) as stated in the DEIR. Consequently, the applicant's proposed mitigation measure not only fully mitigates the impacts of the project, but also provides additional capacity at this intersection. 37

AB. **Page 13-41, Last Paragraph.** Traffic Engineer Richard Dowling comments that signalization would remove the need for the applicant's proposed mitigation measure, i.e., the left-turn acceleration lane at the intersection of Rancho San Carlos Road and Carmel Valley Road. Thus, this "additional" mitigation measure is in reality an "alternative" mitigation measure. The DEIR text should also emphasize that the signal is warranted under existing no-project conditions and that if a signal were in place at this intersection, no further mitigations would be required of the project. 38

AC. **Page 13-45, First and Second Lines.** Traffic Engineer Richard Dowling comments that this statement, although correct, overlooks the impacts of approved and proposed projects (excluding the Santa Lucia Preserve) on this intersection. These other approved and proposed projects would reduce the reserve capacity to a negative 18 vehicles per hour (level of service "F"). Thus, the applicant's proposed mitigation measure not only mitigates the impacts of the applicant's project, it also provides additional capacity that partially mitigates the impacts of other approved and proposed projects on this intersection. 39

AD. **Page 13-45, Additional Mitigation Measure, Contribute to Signalization Fund.** Traffic Engineer Richard Dowling comments that signalization would remove the need for the applicant's proposed mitigation measure, i.e., the left-turn acceleration lane at the intersection of Rancho San Carlos Road and Carmel Valley Road. Thus, this "additional" mitigation measure is, in reality, an "alternative" mitigation measure. See Comment No. AC above. 40

AE. **Page 13-48, Third Paragraph, Last Sentence.** Traffic Engineer Richard Dowling comments that the applicant's mitigation measure as stated needs to be clarified by adding the following paragraph: 41

> "The existing reserve capacity at the intersection of Rancho San Carlos Road with Carmel Valley Road is 42 vehicles per hour (level of service "E") for the northbound left turn. Completion of approved and proposed development projects in the Carmel Valley (without the Santa Lucia Preserve) would reduce the reserve capacity to a negative 18 vehicles per hour (level of service "F"). Buildout of the Santa Lucia

> Preserve plus implementation of the applicant's proposed left turn acceleration lane and shuttle would increase the reserve capacity to a positive 2 vehicles per hour (level of service "E"). This mitigation measure thus fully mitigates the impacts of buildout of the Santa Lucia Preserve and provides additional reserve capacity for other previously approved and proposed projects in the area."

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AF. **Page 13-48, Fourth Paragraph.** See Comment Nos. AC and AD above. 42

AG. **Page 13-51, Table 13-14.** Traffic Engineer Richard Dowling recommends that Table 13-14 be clarified with the following additional footnotes: 43

1. Carmel Valley Road/Rancho San Carlos Road with left-turn lane grade separation. The 122 vehicle per hour reserve capacity shown in this table is for the westbound left turn, which becomes the critical movement at this intersection if a left-turn grade separation is built.

2. Highway One/Carpenter Street. The mitigated level of service shown in this table is for the addition of a third northbound through lane on the approach to this intersection. Other mitigations are possible, for example, the proposed shuttle service by the Santa Lucia Preserve which was not included in this particular analysis of mitigation measures.

3. Highway One/Ocean Avenue. The level of service shown in this table assumes no changes at this intersection and assumes no shuttle service by the Santa Lucia Preserve.

4. Highway One/Carmel Road. The mitigated level of service shown in this table is for a second southbound left turn lane and a second westbound right turn lane at this intersection. The proposed Santa Lucia Preserve shuttle service was not included in this analysis.

5. Highway One/Rio Road. The mitigated level of service shown in this table is for a second westbound through lane at this intersection. The proposed Santa Lucia Preserve shuttle service was not included in this analysis.

AH. **Page 16-17, First Full Paragraph.** Clarify that "Homelands" will not be managed by the Conservancy but by the homeowner. Also please include cattle grazing on approximately 3,000 acres as a fuel reduction and fuel modification measure. 44

AI. **Page 16-17, Second to Last Sentence.** Annexation to a 45

local fire district would require LAFCO approval. Contracting with CDF or a local fire district would not require LAFCO approval. 45

AJ. **Page 16-14, Last Paragraph.** Rancho San Carlos is not an historic district. See Comment B in Section I above. 46

AK. **Page 17-8, Third Paragraph.** The Bradley Sargent adobe is not in the GMPAP planning area; it is in the CVMP planning area. While County Bridge #523 is within the GMPAP planning area, it is owned by the County and is technically not part of the project area. 47

AL. **Page 17-12, Table 17-1.** Although several of the structures listed in this table are "Proposed for preservation" (Webster: "Preserve, vt, 1: to keep safe from injury, harm or destruction; 2: to keep or save from decomposition"), it is important to note that several of these structures will be reconstructed for adaptive re-use. For example, a use permit has already been granted by the County for the reconstruction and conversion of the Dairy Barn for employee housing, preserving the basic character of the structure and following the recommendations of the Greenwood report (Application, Section 4.2). It is anticipated that, like the dairy barn, other structures (almost certainly the Horseshoe Barns and the Granary, probably others) will be found to have significant structural deficiencies which will require reconstruction in order to preserve them for adaptive re-use. It should also be noted that both the Ranch House and the Guest House will be modified for visitor accommodation use, as reflected in the General Development Plan application for the Hacienda (see page 2-15 and Appendix G). These modifications will require a conditional use permit and referral to the County's Historical Resources Review Commission. 48

AM. **Page 17-19, Damage to Historic District.** There is no "San Carlos Rancho Historic District". No part of Rancho San Carlos is an historic district. See Comment B in Section I above. This impact and additional mitigation measure should be deleted. 49

AN. **Page 19-3, Table 19-1.** Pacific Meadows is now fully occupied and should be deleted from this table. 50

AO. **Pages 20-7 and 20-8, Groundwater Hydrology, Etc.** The first paragraph of this section should be revised to be consistent with current plans which include using reclaimed water at the Golf Trail rather than at the lodge and other outdoor locations in San Francisquito Flats. The total annual water demand from the lodge is estimated at 43.3 af/yr (Table 4-4, CHS). Of this, 29.7 af/yr is indoor use (Table 4, Golf Trail Water Supply Plan, Lodge + Hacienda), which would be collected by the wastewater collection 51

system and reclaimed for use at the Golf Trail, rather than at the lodge as indicated in the text. As a result, elimination of the lodge would reduce the groundwater demand by 13.6 af/yr (43.3 af/yr - 29.7 af/yr). 51

AP. **Page 21-8.** The Ogden Environmental and Energy Services third party review was prepared for the County of Monterey, not for the Rancho San Carlos Partnership. 52

III. **MARKED-UP PAGES FROM DEIR.** 53

Attached are photocopies of 28 pages of the DEIR marked to indicate typographical corrections and minor corrections and clarifications of text.

Thank you for the opportunity to comment on this DEIR. I hope that our comments are helpful toward the goal of completing an informative and legally adequate final EIR.

Very truly yours,

Brian Finegan

Brian Finegan

BF:pml
cc: Rancho San Carlos Partnership
Denise Duffy
Robert Lamb Hart
Jones and Stokes

Response to Comments from Brian Finegan, Representative of the Applicant

1. The final EIR has been revised to recognize the water quality benefits associated with implementation of the proposed erosion control plan. The EIR still maintains, however, that the No-Golf Trail Alternative is the environmentally superior alternative because of the reduced groundwater demand and effects on biological communities. A table has been prepared in the final EIR that compares the various alternatives to the proposed project.

2. The description of the No-Golf Trail Alternative did not include alternative land uses for the San Clemente Flat area. The purpose of the alternatives evaluation under CEQA is to focus on alternatives capable of reducing the proposed project's significant environmental effects. Replacing the golf trail uses with other more potentially environmentally damaging uses is inconsistent with the intent of alternatives evaluations under CEQA, which states that alternatives that have more adverse environmental impacts need not be evaluated.

3. CEQA states that the discussion of alternatives shall focus on alternatives capable of eliminating any significant dverse environmental effects or reducing them to a level of insignificance, even if these alternatives would impede to some degree the attainment of the project objectives or would be more costly. The No-Golf Trail Alternative would reduce groundwater demand but would also impede to some degree the attainment of the project objectives as noted in this comment. This comment shall be weighed by the decision makers in their review of the alternatives to the proposed project.

4. Refer to the response to Comment 4 from the Monterey County Planning and Building Inspection Department.

   Regarding this comment's footnote, status as a Certified Local Government is not required for a local government to determine a property significant for the purposes of compliance with CEQA. Public Resources Code 5020 et seq. defines a Certified Local Government as an entity certified by the National Park Service to implement the National Historic Preservation Act, which is required for federal (not state) projects.

5. The mitigation measure involving monitoring of operating times and water levels at water supply wells articulates the steps required for the water system operator to carry out a design feature included in the project description. Specifically, the project applicant intends to maintain a total on-line well capacity great enough to meet the peak day water demand with wells operating only 12 hours per day. This design feature was an important assumption in the impact analysis and must be implemented if the analysis and conclusions are to remain valid. This mitigation measure ensures that adequate information will be collected to implement this performance standard and also to meet the source capacity requirements of the Title 22 Waterworks Standards.

As stated on page 8-31 of the draft EIR, "The proposed water system design (Luhdorff & Scalmanini Consulting Engineers 1995b) includes telemetered monitoring and control of all wells from a central control station. Operating time and water levels are among the variables that will be automatically recorded." Thus, this mitigation measure would require little or no additional effort on the part of the project applicant.

6. Refer to the response to Comment 3 from Camp Dresser & McKee (comment letter attached to Brian Finegan letter).

7. The EIR does not include the detention facilities described in the preliminary drainage study prepared by Bestor Engineers. Given that DFG is opposed to on-channel detention facilities, the EIR preparers believed that the drainage would be modified in response to DFG's concerns and other potential impacts identified in the draft EIR. The EIR preparers believe that increased floodflows can be fully mitigated by measures as proposed by the project applicant. Because of the flooding that occurred in January and March 1995 and the controversy surrounding additional development in the watershed, it would be prudent to closely evaluate potential for increased flooding in the Carmel Valley.

8. Because of the potential to dewater or significantly reduce base flows (as stated on pages 8-39 to 8-50 of the EIR), the EIR preparers believe that increased water temperature is a legitimate concern in protecting the anadromous coldwater fishery. The proposed mitigation measures are appropriate and feasible.

9. Regarding the statement that there is no substantial evidence of significant unknown archaeological or architectural resources that could be affected by the project, it is agreed that sufficient research and inventory have been conducted to address impacts on prehistoric resources. The language in this mitigation measure has been modified to reflect the distinction between prehistoric- and historic-period resource mitigation requirements.

However, there is substantial evidence to demonstrate that known and predicted historic-period resources within the area previously surveyed could be affected without conducting additional research and implementing additional mitigation measures because the previous survey was restricted to locating and recording only prehistoric sites. The footnote quoting Breschini regarding the need for additional mitigation does not have bearing on this issue because it only refers to prehistoric resources. His determination of those areas that were sensitive for cultural resources was based solely on factors that affect locating prehistoric sites (Breschini and Haversat 1994).

Although approximately 25 historic-period sites were "noted" during the survey, none were recorded. Because their exact locations and boundaries of the known or suspected sites are not known, mitigation measures to ensure preservation cannot be developed with precision. These sites include some of the most significant site types in the county and should be located and recorded. Additionally, their locational information should be incorporated into project plans. Information about these resources "noted" on maps with very little

locational information is insufficient to ensure that they will not be adversely affected by the project.

Regarding the remaining unsurveyed portion of the project area, the fact that there are 25 unrecorded historic-period resources known or suspected within the area previously surveyed qualified as substantial evidence that other sites are present within the project area. Ground-disturbing activities, such as habitat enhancement and vegetation management associated with the resources management plan, could affect these sites.

The statement that the mitigation measure requires the entire 20,000-acre ranch to be investigated is inaccurate. The mitigation measure recommends that a historical sensitivity analysis be prepared. This step would consist of conducting historical archival research to identify all possible locations of historic sites. Field investigations would be limited to only areas identified as having the potential for historic-period resources. This research should include both the previously surveyed (in case something was missed during the prehistoric survey) and the unsurveyed portions of the project area. All sites found during the limited field investigation would be recorded and the locations of the sites incorporated into project planning documents.

10. This mitigation measure is necessary to ensure that the above mitigation measures will be adequate to protect sites from the impacts of the project.

11. A lead agency should select the appropriate type of EIR based on the particular project and decision-making process. Monterey County counsel has determined that this is a project EIR because the proposed project is a specific project seeking specific entitlements including a VTM, rezoning, general development plans, and use permits. Program EIRs are typically used for agency plans, policies, and regulatory programs. It is acknowledged that many aspects of the project will require subsequent discretionary approvals and the evaluation of those elements of the project would be conducted at a programmatic level of detail.

12. The description of the wastewater treatment plant from the application has been added to Appendix G in the final EIR.

13. The elevations of the clubhouse have been added to Appendix I in the final EIR.

14. Regarding item (I) of the comment, the reference to a potential landslide hazard in the vicinity of Lots 194-200 has been deleted from the EIR text.

Regarding item (ii) of the comment, based on a July 10, 1995 letter to Lisa Larrabee of Jones & Stokes Associates, Jeffrey Nolan of Nolan Associates recommended that an investigation be conducted of the splay of the Potrero Fault, beginning at trench 2 and extending 20° on either side of the fault. Mr. Nolan also recommended that there be a 50-foot habitable structure set back from this fault. Additional text has been included in the EIR

specifying that the investigation be conducted and that setbacks be established from this fault, as required, based on the results of the additional investigation.

Mr. Nolan has indicated the presence of a newly identified fault, provisionally named the San Clemente Ridge fault, that was discovered in Cleary Consultants' trenches 3 and 4. Although evidence provided by Cleary Consultants suggests that the fault movement is pre-Holocene (and therefore not subject to state requirements for active faults), movement could nevertheless occur along this fault in association with the San Clemente thrust fault. Accordingly, Mr. Nolan has recommended that structures not be placed on top of the 100-foot-wide San Clemente Ridge fault zone. New text has been added to the EIR describing these hazards and mitigation measures.

15. The EIR text has been revised according to the suggested correction.

16. The period of dry years referenced in the sentence has been corrected in the final EIR and changed to 1990-1992, instead of 1990-1993.

17. "Protected base flow reaches" are clearly defined on page 8-49 of the draft EIR, although identifying the precise geographic locations of the starting and ending points of the protected base flow reach for each creek requires interpretation of hydrographic survey data. The specific references to "base flow" and "base flow reaches" mentioned in the comment, as well as occurrences on pages 8-16 (fourth bullet), 8-39 (last paragraph), and 8-42 (first paragraph) have been reviewed. The text has been reworded slightly to clarify whether the reference is to base flow reaches in a general sense or protected base flow reaches as defined in the mitigation measure.

The receipt of the map labeled "Location of Protected Base Flow Reaches" is acknowledged. The lengths and locations of the reaches appear reasonable based on the information reviewed to date.

18. The map of protected base flow reaches has been added as a figure in the chapter and referenced on page 8-16 of the EIR. It is entitled "Locations of Protected Base Flow Reaches".

19. The suggested change has been made in the final EIR. If no applied water would percolate past the root zone, then some parts of the irrigated area would be underirrigated (assuming that 100% irrigation uniformity could not be achieved). If irrigation efficiency is calculated as crop evapotranspiration divided by applied water, underirrigated areas can have an efficiency greater than 100%, although at first glance this would appear to be an impossibility. Changing the text to refer directly to return flow avoids any potential confusion regarding the term irrigation efficiency.

20. The suggested change has been made in the final EIR.

21. Refer to the response to Comment 17 above.

22. Refer to the response to Comment 17 above.

23. Refer to the response to Comment 17 above.

24. The map has been added as a figure in the final EIR and a reference added to it on page 8-49.

25. Because of the flooding potential in the Carmel Valley, the EIR preparers believe that any increase in flood elevation is significant. The increased volume of runoff may create significant impacts similar to increased rates of runoff.

26. Refer to the response to Comment 7 above. Because of public fears related to flooding, the project applicant should take extraordinary measures to address these fears. Existing HEC-1 and HEC-2 models have been developed to prepare the FEMA flood insurance study. These models can be easily modified to reflect changes in the watersheds as a result of project implementation. It is technically and financially feasible to perform this analysis and prove that the project will have no effects on flooding.

27. The draft EIR has been amended to state that the areas surveyed by Balance Hydrologics are the areas previously defined in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", as the "protected base flow reaches."

28. The draft EIR has been amended to state that construction activities related to the proposed project would result in the loss of 11.3 acres of riparian vegetation (or 0.7% of the riparian habitat).

29. Reference to the straggly gooseberry occurrence has been removed from Figure 11-4 in Chapter 11, "Biological Resources", in the final EIR.

30. The final EIR has been modified to reflect these changes in the acreage of wetland and riparian habitat that will be affected by the project.

31. Pages 11-1 and 11-2 of the final EIR, volume II, have been modified to clarify the approach taken for determining the effects of the project on biological communities during the impact analysis. Also, refer to the response to the Comment 1 from George E. Ferguson.

32. As indicated on page 13-11 of the draft EIR, the traffic analysis conservatively uses the 1992 traffic volumes on Carmel Valley Road for existing conditions. Pacific Meadows was completed in 1992 but was not fully occupied. Consequently, this development is included in this table, and the trips generated by this development have been added to the traffic counts for Carmel Valley Road for 1992.

33. This information is acknowledged. It should be noted that even though the traffic volume on Carmel Valley Road has dropped by 3% between 1992 and 1994, the traffic generated by the

CDP-GMPAP or the project buildout would still result in significant impacts on some segments of Carmel Valley Road.

34. The commenter is correct. This table is included in the final EIR.

35. As shown on Figure 13-4 in Chapter 13, "Traffic", of the final EIR, there were three accidents in 1994. The draft EIR acknowledges that a left-turn acceleration lane may result in a reduction of the number of accidents at this location. Additional mitigation measures that have been proposed in the draft EIR are for the purpose of improving the level of service at this intersection.

36. Refer to the response to Comment 21 from Carmel Valley Property Owners.

37. CEQA requires that cumulative impacts and mitigation measures to reduce these impacts be discussed in an EIR. The proposed project, in conjunction with other approved projects, results in degradation of the existing level of service at the intersection of Carmel Valley Road and Rancho San Carlos Road. The applicant's proposed mitigation measure would mitigate the project impact, but it is not an effective measure for mitigating the cumulative impacts, and the intersection would continue operating at the existing LOS E. The alternative mitigation measures recommended in the draft EIR would mitigate the impacts of the proposed project and other approved projects. Because the other projects would also affect this intersection, it is recommended that the applicant contribute to a fund for implementing the alternative measures. Refer also to the response to Comment 21 from Carmel Valley Property Owners.

38. The commenter is correct. No further mitigation would be required at the intersection of Carmel Valley Road and Rancho San Carlos if this intersection is signalized. It is stated on page 13-36 of the EIR and shown on Table 13-13 of Chapter 13, "Traffic", that a signal is warranted at this intersection under existing conditions.

39. Refer to the response to Comment 37 above. The proposed project, in conjunction with other approved and proposed projects, results in degradation of the existing level of service at the intersection of Carmel Valley Road and Rancho San Carlos Road. The applicant's proposed mitigation measure would mitigate the project impact, but it is not an effective measure for mitigating the cumulative impacts, and the intersection would continue operating at the existing LOS E. The alternative mitigation measures recommended in the draft EIR would mitigate the impacts of the proposed project and other approved and proposed projects. Because the other projects would also affect this intersection, it is recommended that the applicant contribute to a fund for implementing the alternative measures. Refer also to the response to Comment 21 from Carmel Valley Property Owners.

40. The commenter is correct. No further mitigation would be required at the intersection of Carmel Valley Road and Rancho San Carlos Road if this intersection is signalized.

41. Refer to the response to Comments 37 and 39 above. The suggested language has not been included for the reasons described in response to Comments 37 and 39.

42. Refer to the response to Comments 39 and 40 above.

43. Table 13-14 has been revised to include the recommended notes in the final EIR.

44. The draft EIR has been amended to clarify that "homelands" will be managed by the home-owner and not the Conservancy, and that cattle grazing on approximately 3,000 acres will occur as a fuel reduction and fuel modification measure.

45. The draft EIR has been amended to state that annexation to a local fire district would require LAFCO approval and that contracting with a local fire district or CDF would not require LAFCO approval.

46. Refer to the response to Comment 4 from the Monterey County Planning and Building Inspection Department.

47. The text in the final EIR has been revised to reflect this change.

48. Reconstruction of historical buildings to ensure structural integrity would not be an impact as long as the reconstruction is conducted in keeping with the architectural style of the ranch buildings as outlined in Gil Sanchez 1995.

49. Refer to the response to Comment 4 from the Monterey County Planning and Building Inspection Department.

50. These projects (Monterra Ranch, Bishop Ranch, Evenson Oaks, and the Pebble Beach Lot program) are pending, and proposed projects in the regional vicinity of the proposed project were reviewed to determine cumulative impacts. It was found that the only resource that they shared with the proposed project includes the Monterey Bay air basin; Highway 1, and some public services (e.g., law enforcement, schools, and solid waste disposal) would also be cumulatively affected by the proposed project and these other projects. Because these projects and the others in the table represent the scope of the review of the cumulative impacts analysis, they have not been deleted from the table.

51. This correction has been made to the discussion on water demand for the lodge in the final EIR.

52. This correction has been made in the bibliography in the final EIR.

53. These corrections have been made in the final EIR.

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June 28, 1995

Mr. Brian Finegan
Finegan and Cling
60 West Alisal Street
Salinas, CA 93902

Subject: Rancho San Carlos Water Team Comments on the Santa Lucia Preserve Draft Environmental Impact Report

Enclosed are the water-related comments on the draft EIR for your inclusion with the Rancho San Carlos Partnership comment letter. In general, we thought the EIR was well-written. Comments are included from the following individuals and firms: Barry Hecht, Balance Hydrologics; Polly Boissevain, Camp Dresser & McKee; Peter Leffler and Iris Priestaf, David Keith Todd Consulting Engineers; Anne Schneider, Ellison & Schneider; Joseph Scalmanini and Vicki Kretsinger, Luhdorff & Scalmanini Consulting Engineers.

Very truly yours,

Polly Boissevain

CAMP DRESSER & McKEE, Inc.
Polly Boissevain, P.E.

cc:
Barry Hecht, Balance Hydrologics
Peter Leffler, David Keith Todd Consulting Engineers
Iris Priestaf, David Keith Todd Consulting Engineers
Anne Schneider, Ellison & Schneider
Joseph Scalmanini, Luhdorff & Scalmanini
File: 2363-110-RT-11.13

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Page 8-45.
"Applicant's Proposed/ Additional Mitigation Measure: Delay Pumping at Wells near Base Flow Reaches. Existing wells located within 1,000 feet of a protected base flow reach...shall be used only when the combined capacity of other wells connected to the water supply system is insufficient to meet project demand...."

Applicant's Proposed/ Additional Mitigation Measure: Drill New Wells Away from Base Flow Reaches. New wells shall be located at least 1,000 feet away from protected base flow reaches....This measure will further protect these reaches from flow depletions cause by relatively large seasonal drawdowns around project supply wells."

Page 8-16 establishes the significance criteria used for the evaluation of groundwater levels near creeks. These criteria establish thresholds for project-related declines in riparian vegetation and for fishery habitat, stating that impacts "are considered significant if ... the following thresholds apply:

- The project lowers groundwater levels near creeks that support phreatophytic vegetation such that the total area of riparian vegetation on the Santa Lucia Preserve decreases by more than 5% below the 1994 baseline area on a long-term basis (either by direct mortality or impaired regeneration).

- Groundwater pumping for the project induces seepage that depletes pool volume and base flow in local creeks during summer by more than 10%, or to the point that resident fish populations are substantially decreased or substantially more vulnerable to severe impacts caused by natural fluctuations in flow and other environmental factors."

1

The mitigation measures for operation of existing wells and siting of new wells near protected base flow reaches are based on the concept of no allowable impact, which is inconsistent with the significance criteria which were established for the evaluation.

We would recommend mitigation measures which take into account the following: 1) the significance criteria listed above which allow for some impacts below a specified threshold; 2) measures which consider specific well characteristics and/or other operational modes besides operating for an average of 8 hours per day over a six month dry period; 3) criteria which consider other factors besides the 1000-foot threshold in siting future wells and provide for performance standards if future wells are located within this zone; and, 4) the possibility that base flow will increase due to the proposed changes in grazing. Each of these issues is discussed below.

1) Significance criteria

Riparian vegetation
The Monterey Peninsula Water Management District developed criteria for limiting drawdown surrounding pumping wells to limit significant impacts to nearby riparian vegetation (McNiesh, 1986). These criteria have been applied in several settings, including for proposed water supply wells adjacent to San Jose Creek as part of the Point Lobos Estates project. The criteria (attached) provide a useful means of guiding pumping in the vicinity of protected base flow reaches. They show a progressive increase in anticipated effects beginning with little or no discernible effect at 2 feet drawdown sustained over a season to relatively severe effects when groundwater is drawn down 4 to 8 feet deeper than it would be without pumping. These values coincide with those adopted by the Monterey County Water Conservation and Flood Control District (now MCWRA), and those recommended for the region by state agencies.

Fisheries
Significance criteria recommended by the DEIR are: less than 10 percent depletion of base flow or pool volume. These criteria indicate that while reductions of base flow are not desirable nor recommended, the streams can accommodate a small amount of depletion without significant harm, if, for example, a well is temporarily operated in a manner exerting a small draft on the pre-project base flow. These criteria are especially constructive in that they link flow and bed sedimentation – if sedimentation is reduced as expected (through the erosion-control efforts, bank restoration, or the grazing-management plan), additional base flows will be measured and the volume of pools will increase dramatically.

2) Specific well characteristics or operational modes

First, it is uncertain whether or not "under cyclic pumping conditions, the radius of influence created by pumping during the 'on' cycle continues to propagate outward during the 'off' cycle" (pg. 8-38, Paragraph 1). However, regardless of such debate, it should be made clear in the DEIR that the expansion of direct pumping impacts in an aquifer is dependent on continuous pumping (mentioned on pg. 8-33) and as long as no recharge and/or no head-dependent recharge boundary is encountered (not mentioned in the text). Otherwise, it can be independently concluded that, if one subscribes to the conclusion that cyclic pumping impacts propagate during "off" cycles, cones of depression expand indefinitely under all conditions, which is not the case. Furthermore, it should be noted that return flow occurs regardless of the season, and will essentially impact groundwater levels in the same manner as rainfall recharge. Thus, the assumption of no recharge during the dry season is overly conservative.

Regarding the expansion of pumping cones of depression during non-pumping, i.e. "off", periods, it is not logical to conclude that the radius of influence (defined as the limit of the cone of depression in water levels around a well directly caused by pumping) continues to expand an equal distance whether a well is pumping or not. Taken to the extreme, that conclusion would also extend to pumping periods as short as a few minutes or a few hours per day; it could also extend to irregular cyclic pumping where "on" cycles were only a few minutes or hours every few days. The DEIR implies that the areal extent of pumping impacts will radially extend the same distance, based on elapsed time since the start of the first cyclic pumping cycle, under all such pumping scenarios.

Ultimately, the conclusion that pumping impacts continually expand during both "on" and "off" pumping cycles is used in the DEIR as the basis for establishing a distance beyond which there would be no direct impacts of pumping after six months of daily cyclic (eight hours per day) pumping. The six month period was presumably chosen as representative of an average annual dry period, i.e. the non-rainy season when no recharge would be occurring. And the limit of the pumping impacts, the radius of influence, is calculated in the conventional manner for such calculations as if pumping were continuous; the resultant value of 960 feet is rounded in the proposed mitigation measures to approximately 1,000 feet. 1

The mitigation measures to protect base flow reaches by delaying pumping from existing wells within a 1,000 foot distance and by not constructing any new wells within that distance are overly conservative because they tacitly imply that any pumping within those distances will impact base flow reaches. In other words, the distance is based on assumed six month pumping cycles, but the mitigation is designed to fully exclude pumping of any duration, except when all other wells cannot meet demand. Even if one accepts the DEIR premise that the cyclic pumping radius of influence extends as far as it does in continuous pumping, the mitigation measures fail to recognize, for example, that pumping for a shorter duration will limit the radius of influence. For example, wells located 750 feet from a protected base flow reach could be pumped for 110 days with no direct impacts of pumping at the stream; wells located 500 feet from a protected base flow reach could be pumped for 50 days with no direct impacts of pumping at the stream. Intermittent operation of such wells for 50 to 110 days could benefit the overall water supply, and still be well within the significance criteria by causing no direct pumping impact. Perhaps, if the conservative approach of the DEIR is to be adopted to assume that cyclic pumping impacts extend as far as continuous pumping impacts, the mitigation measures could be graded: 1) to allow additional well construction beyond 500 feet of protected base flow reaches, and 2) to limit pumping periods during the six month dry season, except when needed to meet maximum demand, to maintain zero drawdown at the stream, i.e. 50 days for 500 foot spacing, 110 days for 750 foot spacing, 180 days for 1,000 foot or greater spacing.

3) Consideration of other criteria.

An extension of the above considerations could be made to consider actual aquifer response to land use and to pumping, i.e. whether groundwater levels near a stream actually increase or whether they respond (decrease) directly to nearby pumping. Rather than establish absolute perpetual conditions which limit pumping and/or new well construction based exclusively on average aquifer characteristics and assumed propagation of pumping impacts during non-pumping periods, future well siting could be considered in light of actual monitored groundwater levels and local aquifer characteristics. If groundwater levels increase as a result of cattle grazing, for example, actual pumping impacts, if they occur, may not affect base flow when compared to no-project conditions. Similarly, if near-stream groundwater monitoring shows no pumping-related impacts (as observed during the tests to date), or if local (versus ranch-wide average) aquifer characteristics result in water level impacts which are more localized to the pumped well, the well spacing criteria and the well operating rules could be modified to increase use of the aquifer system without significant impact on base flow, and well within the DEIR significance criteria. 1

4) Possibility of increased base flow.

The DEIR notes that "increased base flow ... will fully mitigate most of the potential effects of groundwater pumping on aquatic habitat." (page 8-47). It also notes the high value of the resources at risk and the uncertainty regarding the magnitude of additional base flows. It recognizes mitigation measures as contingencies in event that these additional flows do not materialize, but does not provide for relaxation of a setback in event that they do, or in event that other watershed-management practices result in additional base flows. Criteria and provisions guiding pumping near protected base flow reaches under increased base flow conditions could usefully be added to the DEIR.

Page 8-54
"Impact: Long-term decreases in the total area of riparian vegetation caused by decreased reproductive stress."

The DEIR would more usefully reflect likely future conditions if a paragraph containing the following were added at the end of this section: 2

> *Of the two general settings where effects on the extent of riparian vegetation might be expected, they are more likely at the outer fringes of riparian corridors than at the heads of baseflow reaches. It is more difficult to anticipate effects in the latter case, because:*

- *water levels at the heads of baseflow reaches respond to changes in all upstream portions of a watershed, and not just those occurring in the immediate vicinity.*

- *these are the settings in which increased base flows as a result of improved range-management practices are most commonly observed, and where the sustaining effects of the grazing program proposed by the Santa Lucia Preserve are most likely to be manifest.*

- *these are the areas in which cattle preferentially congregate during the dry months, and where reproductive success or the vigor of mature individual riparian trees are likely to be disproportionately affected by the much-heightened grazing intensity typical of these settings; since the Preserve will sharply reduce stocking rates and will remove cattle in early June, these seasonal pressures will no longer dominate establishment and vigor.*

- *a greater amount of water will be available in the soil in these settings because rainfall infiltration rates and soil-moisture storage in the immediate vicinity of the head-of-baseflow riparian vegetation will both increase quickly once the intense seasonal use by cattle is eased by the grazing management plan.*

2

Hence, in many, or perhaps most cases, riparian vegetation may expand upstream in response to these changes, but in others -- those where seasonal baseflows fall well below the rooting depth as a result of concentrated project changes -- downstream retreat of the upstream riparian limit could potentially occur.

The DEIR raises a possible secondary impact of possible increases in water temperature caused by the potential effects on the extent of riparian vegetation. A summary of various related statements in the DEIR is that the primary mechanism of this secondary impact is direct insolation on the water surface, with a much subordinate auxiliary influence of the slightly cooler microclimate which often prevails in riparian woodlands. These factors and their relative importance seem consistent both with the literature and with observed conditions at Rancho San Carlos. It is quite unlikely that realistic impacts on baseflows could indirectly significantly raise water temperatures in the baseflow reaches, because:

- most such effects (if they occur) would be expected at the outer edge of the riparian woodland, and would not affect isolation on the water surface; additionally, nearly all such potentially-affected areas are north of the protected baseflow reaches, and physically could not possibly affect insolation onto the water surface.

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- the upstream edge of riparian woodland may be expected to remain immobile or move upstream in most cases, so that the temperature of water entering the riparian corridor will not be adversely affected; in those cases where the upstream limit of riparian woodland is likely to move downstream, flows are likely to be several feet below ground surface, and would not be affected by insolation or by secondary air temperature effects.

- there are numerous physical factors other than the distribution of riparian vegetation which affect water temperature in the protected baseflow reaches.

2

The possibility of adverse effects on stream temperature associated with physical disruption of near-stream riparian vegetation is a different matter, and is considered in comments on Chapter 9, where the issue is discussed in the DEIR. Regional influences which also mitigate potential effects on water temperature are discussed in that section, as are field data which indicate that adverse effects on beneficial uses are quite unlikely to occur.

p. 8-55
"Additional Mitigation Measure: Monitor Riparian Vegetation and Maintain Total Area of Riparian Vegetation."

The DEIR has identified one way in which effects of baseflow on riparian vegetation vigor might be monitored. The objective outlined in the title could probably be accomplished in the manner described.[1] Other approaches which might also be considered include:

3

1. Direct measurement of riparian water demand in the stream corridor upstream of the stream gages. Measurement is accomplished by analyzing the daily variations in streamflow, which are electronically recorded by the stream gage (see Figure 6-10 in the CHS for an example of how these 'diurnal' variations caused by plant uptake during the daylight hours are recorded by the gage). Computations can be cross-checked and calibrated to a standard degree-day relationship using difference in plant use during very hot and foggy days. A decline in water use compared with analogous weeks or

1. Usefulness of this monitoring approach would be fairly limited during the conditions and episodic events such as those which the DEIR (with foresight) has identified in the last bullet on page 8-56. If multiple events or conditions occur at the same time, the transect-based monitoring program might need to be fundamentally modified. As one example of multiple events likely to constrain the utility of this approach, consider the flood/heavy snowfall/moth infestation/drought/Marble-Cone fire sequence which actually affected this area during the mid-1970s (described in Griffin, 1978 and in other concurrent reports).

months during the pre-project period can be quantified and used as a decision criterion.

2. Plant stress, as measured by dawn-hour osmotic pressures, a method used quite effectively for monitoring adverse effects of water-level declines in Carmel Valley studies by David Groeneveld and others.

3. Mapping the outer extent of key riparian vegetation types in specified areas within or upstream from one or more of the baseflow reaches, using conventional aerial photography and with evaluation by GIS.

4. Identifying areas of vegetative stress from standard false-color infrared photography, also with evaluation including GIS.

3

Each of these methods has certain advantages, depending upon the type of impact expected. They are also somewhat more amenable to comparison with beyond-project controls (such as the Pine Creek concept usefully advanced in the DEIR p. 8-49). Several are likely to involve substantially less cost (both to the applicant and the reviewing agencies) than the multi-level transect approach suggested in this section, unless the latter has critical applications to other anticipated impacts.

The DEIR's suggestion of a three-year monitoring interval seems to be appropriate. Because year-to-year differences can be so great in Central Coastal riparian systems, some flexibility in timing may be warranted to avoid collecting data during very wet, very dry, or otherwise anomalous years.

Pages 9-27 through 9-28
"Impact: Degradation of surface water quality due to removal of riparian vegetation"

The water-quality impact associated with removal of riparian vegetation which the DEIR raises is possible warming of stream channels to an extent which might affect beneficial uses. The DEIR does not explicitly find that the project will affect near-stream riparian vegetation significantly, nor that the project-related effects are likely to increase temperatures to levels meeting its definition of significance. Rather, the DEIR presents the possibility of an impact and makes several suggestions for ways that this possible impact might be reduced to less-than-significant levels.

4

Leaving for a moment the complex question as to whether the project will increase or diminish the near-stream riparian canopy, existing temperature measurements in streams at the ranch make it doubtful that coldwater habitat will be lost. While no numeric criteria are cited in the DEIR, coldwater habitat is generally considered to be lost when the tolerances of trout, salmon, or other salmonids are exceeded. For

salmonid life stages prevailing in summer, maximum daily temperatures acceptable for such fish in coastal streams are commonly taken to be 21°C to 24°C, depending upon the sustained duration of exposure[2]. The sustained duration of exposure depends in part on whether there are cool pools to which fish can retreat, and quite a number of such pools are found, particularly in Potrero and San Clemente Creeks.

Measurements made in the main flows of protected baseflow reaches during the summers of 1991-1994 have generally been about 15°C (as noted elsewhere in the DEIR), with a maximum of about 17°C. More specifically, for measurements made between May 20 and October 31, mean water temperatures have been about 14.1°C, with a standard deviation of 1.6°C. It is highly likely that temperatures in these reaches will remain 4 to 5°C below significant thresholds, even if a reduction in near-stream riparian woodland does occur.

Summer water temperatures are low in the protected baseflow reaches of the Santa Lucia Preserve, as they are in nearly all coastal and near-coastal streams in the region. While hot days or hot spells do occur, they are very seldom of sufficient magnitude or duration to bring water temperatures to levels unacceptable to young trout or (presumably) other native organisms. Two sets of observations may usefully illustrate this point.

4

1. A minimax thermometer (one which records the minimum and maximum temperature) was placed in San Jose Creek just above Van Winkley's Creek during the drought. At the time of placement, flow in San Jose Creek was less than measurable, and was estimated to be about 3 to 4 gallons per minute. The thermometer was placed on September 6, 1990 and removed on October 27, 1990. A maximum temperature of 17.1°C was recorded during the seven-week interval.

2. Even a large, fully-exposed body of water such as Moore's Lake does not become very warm in summer. Over 30 measurements of surface water temperatures in Moore's Lake have been made, mainly in late afternoon during summer months when daily maxima might be expected, with the maximum being 24.2°C.

While factors affecting water temperatures in the protected baseflow reaches are complex, it is clear that only very extensive loss of riparian vegetation could lead to

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2 The lower limit of this range is the maximum temperature at which the Department of Fish and Game will plant salmonid fry, because the addition of fish may exhaust the available food supply: at 24 °C, initial loss of carrying capacity is found in food-limited coastal streams, more so where water temperatures are constant during the day than in those with natural diurnal temperature variations. Water temperatures in excess of 26 °C limit populations even in settings with abundant food supplies, among which area ponds and lagoons (Prof. Jerry Smith, pers. comm.)

measurable increases in water temperature, and that impacts meeting the level of significance presented in the DEIR are highly unlikely.

We suggest that this section be re-phrased, retaining the existing first paragraph and concluding:

In other areas of the state, loss of riparian woodland vegetation adjoining stream channels has led to significant warming during the summer months, with resultant significant loss of coldwater habitat and other aquatic-habitat values. Although existing data and patterns typical of small coastal streams suggest that impacts of comparable magnitude are not likely to occur at this site, the value of the aquatic resource calls for a heightened level of care. Further data bearing on this question will soon become available, if the specific mitigation measures for monitoring streamflow and temperature (see baseflow reaches) are implemented. If it appears likely that the project includes elements likely to raise maximum daily water temperatures above 21 °C to 24 °C following two years of monitoring, the applicant shall prepare a plan to reduce these temperatures, and obtain concurrence with this plan from MPWMD and the California Department of Fish and Game. This plan may include measures such as:

- *further in-kind replacement of riparian vegetation adjacent to protected baseflow reaches*
- *(if along reaches which will still be grazed), temporary or permanent measures to limit access of cattle to the near-stream riparian zone*
- *consideration of removing one or more of several very small ponds in non-protected baseflow tributaries, with its small concomitant loss of pond habitat, if these are shown to significantly increase water temperatures in the protected baseflow reaches."*

4

Finally, the final two bullets on p. 9-28 are probably not appropriate as mitigation measures for the conjectural impacts on temperature, in that (a) they seek mitigation for the no-project alternative, and (b) they would have potential impacts on grazing and wild boar, both of which merit integrated, overall management programs unencumbered by single-purpose management mandates of this type. It should be noted that Rancho San Carlos Partnership has already selectively implemented these two recommendations and will probably continue to expand on these efforts; the link to the DEIR's conjectural impacts is quite weak, and is possibly counterproductive to overall wildland management, as well as being seemingly inconsistent with the letter and spirit of CEQA.

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Additional Minor Water-Related Comments

Page 8-4, Paragraph 1.
"The test results probably slightly overestimate the average permeability of the bedrock because five boreholes with very low initial yields were not completed as wells and included in the testing program." In some respects, the test results probably slightly underestimate the average permeability. For example, the pumping of unconfined aquifers causes a decreasing saturated thickness, which results in underestimating the transmissitivity value from time-drawdown plots. Therefore, the effects of not including the five uncased boreholes in average permeability estimates is likely minimal. 5

Page 8-4, Paragraph 3.
"Although this type of delayed yield effect is common in deep, layered alluvial aquifer systems, the physical mechanism for causing those types of delays in fractured bedrock aquifers is not as obvious." The discussion in the CHS was not intended to imply a delayed yield effect or an easily defined relationship between depth to water and water level fluctuations. The intention of the CHS discussion on storativity estimates was to demonstrate that results are consistent with the concept of a general decrease in storativity with depth. A general relationship implies that there will be some variation from one location to the next; however, results from several locations will show an overall trend. The concept of decreasing storativity with depth is documented in literature (Bedinger et. al, 1986) and would be expected in a fractured rock environment. 6

Page 8-7, Paragraph 2.
"The water levels in the shallow and deep wells remained constantly at or near the ground surface, indicating that the water levels were constrained by seepage into the adjacent creek." It should be noted that wells T-11 and T-14 are often flowing artesian. While groundwater at these locations may seep into the adjacent creek, the reason that water levels at these wells cannot rise above the top of casing is due to water leaking out of the casing, not because they are constrained by seepage into the adjacent creek. 7

Page 8-7, last paragraph, last sentence.
".... and subsurface outflow (assumed equal to groundwater recharge) were the outflows." The parenthetical comment is confusing and subject to misinterpretation. The CHS did not assume that subsurface outflow is equal to groundwater recharge in the CHS water balance. The parenthetical remark also could be misconstrued to apply to the DEIR water balance, which is illustrated on page 8-9. 8

Page 8-8, Last Paragraph (See also Page 8-39, Last Paragraph, Page 8-43, Paragraph 2).
"Base flow consists of groundwater discharge that occurs where groundwater levels adjacent to a creek channel are higher than the surface elevation of the creek." This definition relates to the water balance discussion. This use of the term "base flow" here and elsewhere in the text (see Page 8-10, Paragraph 1) introduces confusion if the reader is looking for a definition of "protected base flow reach." To avoid confusion, a map is attached which shows the locations of protected base flow reaches, based on the Balance Hydrologics October 1990 base flow survey. 9

Page 8-10, Paragraph 2.
This paragraph indicates that the five-foot rooting depth used in the CHS water balance is unrealistically small, and could result in an underestimation of evapotranspiration losses and overestimation of groundwater recharge. It should be noted that many assumptions in the CHS water balance are conservative, i.e., resulting in an overestimation of evapotranspiration and underestimation of recharge. First, it was assumed that *all* soil moisture within this rooting depth was available to plants prior to runoff and groundwater recharge. This is a conservative assumption. In addition, the phreatophytes were assumed in the CHS to have unlimited access to groundwater; in other words, the root zone of phreatophytes is unlimited. This again is a conservative assumption. Finally, the overall evapotranspiration rates, based on the water demands of a well-water turf, are conservative and would tend to result in an overestimation of evapotranspiration. 10

Page 8-10, Paragraph 4.
"An independent indication that groundwater recharge may have been overestimated in the original water balance is the discrepancy between the storativity estimate derived from well tests and the estimate derived from recharge and seasonal water-level fluctuations." As discussed in the comment on page 8-4, paragraph 3, the discrepancies between storativity estimates are consistent with the concept of decreasing storativity with depth. 11

Page 8-21, Last Paragraph.
"This resulted in pumping capacity estimates of 353 gpm for the combined development permit (excluding the golf trail) and 750 gpm at buildout. A subsequent analysis... used the California Administrative Code Title 22 requirements...." Title 22 requirements were used both for the CHS and subsequent calculations of peak demands. The primary difference between the CHS and later demand calculations was the refinement of the golf trail water demands and the development of the conceptual golf trail water supply system, which uses other supplies in addition to wells, so that the pumping capacity required for wells is lower than originally estimated. 12

Page 8-29, Paragraph 2.
The conclusion that "the foregoing review of the well yield analysis demonstrates that the wells may not be able to supply the reported yields throughout the peak demand season" is speculative and inconsistent with the immediately preceding discussion that the combination of planned well operating criteria and conservative available drawdown criteria create a safety factor of 3, which enhances the reliability of the water supply facilities. The safety factor cited in the DEIR provides the opportunity for continued operation of water supply wells under lower water level conditions. For example, typical small horsepower submersible pumps such as will be installed in all the wells have "steep" characteristic curves, i.e. they discharge nearly constant capacity over a wide range of discharge head (pumping water level plus surface discharge pressure). As a result, they are able to continue water supply pumping over a wide range of ground-water conditions, including discharge of capacities at the various wells' yields even if pumping water levels decline, during dry periods, into the "safety factor" area below two-thirds of maximum available drawdown. This should be recognized in the text, although the subsequent mitigation measure to maintain an adequate water supply is obviously still required. 13

Page 8-43, Paragraph 5.
The statement that "the water level recorder used to monitor changes in flow might not have been precise enough to detect changes caused by pumping" is negatively speculative in light of the acknowledged lack of response of pumping water level during the test, such as would have occurred if surface water had been intercepted during pumping. Also, the water level measurement device used during the testing and observation of stream flow was accurate to 0.001 feet, much more sensitive than the noted water level change of 0.02 feet at the staff gage (for a 15 gpm change in flow). 14

Page 8-44, Paragraph 2.
"Further evidence of a hydraulic connection between certain wells and nearby creeks is apparent in the water-level hydrographs presented in Appendix F of the Comprehensive Hydrological Study." The concept of denoting a stream-aquifer connection based on the shape of groundwater hydrographs is not necessarily widely known, documented, or accepted in the field of hydrogeology. In addition, there may be other explanations for the different shapes of groundwater hydrographs. We would be interested in obtaining some references documenting the groundwater hydrograph/stream-aquifer connection concept. 15

Page 20-19, Paragraph 4.
"This [no golf trail] alternative would reduce the project net demand by 210 af/yr." Since this calculation is intended to show the effect on the project demand for groundwater, both demands and other supplies besides groundwater need to be included in the calculation. Although the golf trail demand would be eliminated, the diffuse stormwater supply would also not be developed. The reclaimed 16

wastewater supply would still be developed and would be used for irrigation needs in the San Francisquito Flat area, rather than at the golf trail. Therefore, the overall impact to demands on groundwater would be to reduce demands by 210 af/yr (golf trail demand) - 58 af/yr (diffuse stormwater supply), or 152 af/yr. 16

DEIR Text Corrections/ Clarifications

Chapter 8

Page 8-3, Paragraph 4.
Suggested edit: "Details of the testing procedure and plots of the drawdown data are provided in Chapter ~~6, 'Geology and Minerals'~~ and Appendix E of the Comprehensive Hydrological Study...". The reference to "Geology and Minerals" is incorrect - it should be referring to Chapter 6 of the CHS.

Page 8-4, Paragraph 4.
"Also, the recharge rate during the relatively dry years included in the water-level records (1990-1993) could have been substantially less than the average recharge rate used in the storativity calculation." It should be noted that 1992-1993 was a wet year.

Page 8-19, Table 8-1, Footnote C.
Suggested edit: "Golf course irrigation is assumed ~~to be 100% efficient~~ *to have zero return flow to groundwater.*" The golf trail water calculations assumed that water would be replaced and maintained in the root zone only (i.e. no return flow to groundwater), not that the irrigation system would be 100% efficient.

Page 8-21, Paragraph 2.
The text should be revised as follows: "collected, mixed and stored in ~~three~~ *four* new ponds capable of *storing 58* ~~38~~ af.

Page 8-22, Paragraph 1
The pumping capacity requirement should be 524 gpm, not 526 gpm (584 gpm at buildout minus 58 gpm for market rate homes and 2 gpm for inclusionary homes not within the GMPAP).

Page 8-27, Paragraph 4
"As explained in the Comprehensive Hydrological Study, the long-term drawdown rate associated with cyclic pumping...is the same as the drawdown rate that would result if the well were pumped continuously at half the pumping rate."

The CHS focused on the impacts associated with continuous pumping cycles, using a maximum of 12 hours per day to 3 days for illustration. The CHS did not address the long-term direct impacts of intermittent pumping cycles.

Page 8-33, Paragraph 1.
"Thus, over a 6-month dry season, the radius of influence would increase to 960".
Suggested edit: " increase to 960 *feet, if continuously pumped.*"

Page 8-42, Paragraph 4.
The text should be corrected as follows: "...baseflow during summer and fall 1993 was higher *than* ~~during~~ 1989-1993 for the gages...".

Chapter 9

Page 9-22, Paragraph 1.
The text should be corrected as follows: "The increase in nitrogen loading would not exceed the maximum allowable loading rate of 40 grams per *half* acre per day set forth in the Base Plan for community subsurface disposal systems."

Page 9-30, Paragraph 1.
The text should be corrected as follows: "The ~~largest~~ *lowest* annual rainfall estimated..."

Chapter 10

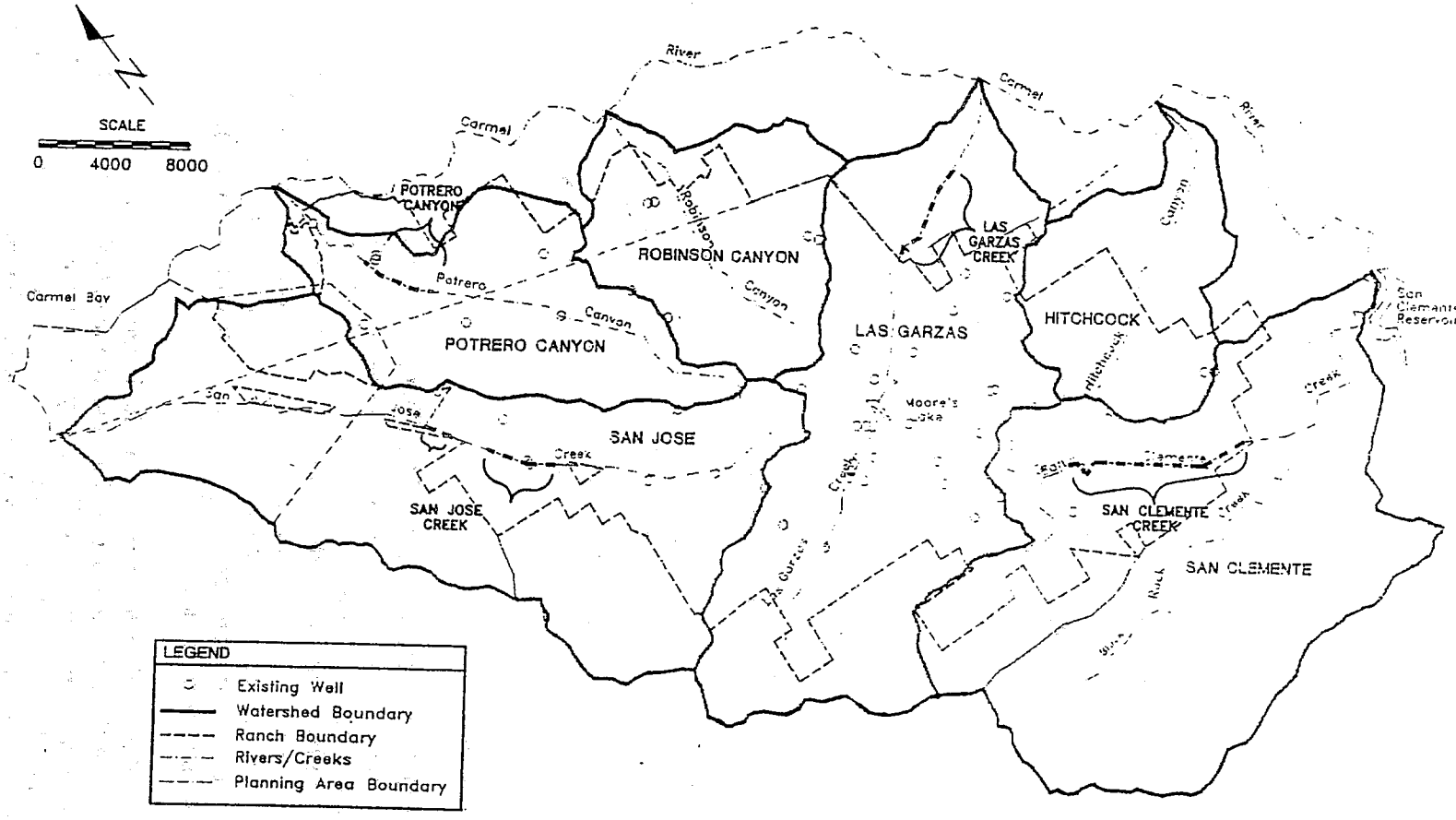
Page 10-3, Paragraph 3.
"Balance Hydrologies performed surveys..." It would be helpful to note that the areas surveyed have been previously defined in Chapter 8 as the protected baseflow reaches, which are key for mitigation requirement interpretation.

Page 10-9, Third Impact Discussion
"Construction activities related to the proposed project would result in the loss of approximately 11.3 acres of riparian vegetation (or 5% of the riparian habitat)..." The value of 5% appears to be in error, and should be changed to the value of 0.7% given on page 11-44 of the DEIR.

Chapter 20

Page 20-7, Last Paragraph and 20-8, First Paragraph.
"The lodge would have an estimated gross annual water demand of 41.31 acre-feet per year (af/yr) of which 15.15 af/yr would be for irrigation uses that would be supplied by reclaimed water. The lodge would generate approximately 20.93 af/yr of wastewater, which would be treated at the wastewater treatment plant." This paragraph needs to be revised to be consistent with current plans, which include using reclaimed water at the golf trail, rather than at the lodge and other outdoor locations in San Francisquito Flat.

The total annual water demand for the lodge is estimated at 43.3 af/yr (table 4-4, CHS). Of this, 29.7 af/yr is indoor use (table 4, Golf Trail Water Supply Plan, lodge + hacienda), which would collected by the wastewater collection system and reclaimed for use at the golf trail, not at the lodge as indicated in the text. As a result, elimination of the lodge would reduce the groundwater demand by 13.6 af/yr (43.3 af/yr - 29.7 af/yr).



RANCHO SAN CARLOS
LOCATION OF PROTECTED BASEFLOW REACHES

ATTACHMENT "C"

Responses to Comments from Camp Dresser & McKee (attached to Letter from Brian Finegan)

1. This comment raises a number of points, each of which are addressed below.

The mitigation measure is not designed to achieve zero impact on base flow reaches. It is designed so that average well use would have no impact. Wells with greater-than-average pumping rates or in areas of above-average transmissivity could have larger seasonal cones of depression and/or larger induced infiltration rates. These wells could affect base flow. Designing the measure according to average well and aquifer characteristics was assumed to be sufficient to prevent streamflow depletion of greater than 10%.

MPWMD's criteria for avoiding water stress on phreatophytic vegetation (McNiesh 1986) does indicate that established vegetation can tolerate drawdown of several feet. The mitigation measure could be elaborated to include a maximum drawdown at the outer edge of the band of riparian vegetation. It is worth noting that the criteria address only impacts on established plants and only mention in passing the decreased long-term probability of successful seedling recruitment if water levels are consistently drawn down to levels lower than existing levels.

It is interesting that the propagation of cyclic pumping effects remains controversial. The pumping creates a depression in the water-table or piezometric surface that constitutes a localized head gradient that necessarily must propagate outward. The "ripples" would not stop during the "off" periods of the pumping cycle any more than the ripples in a puddle created by a dripping faucet stop propagating between drips. In this respect, a body of surface water is essentially equivalent to an aquifer with extremely high diffusivity, much like a "ringing" aquifer. Theoretically, even a 1-hour-per-day pumping cycle would create a water-table ripple that would propagate outward at the same rate as a 12-hour-per-day cycle. The equivalent continuous pumping rate would be only 1/12 as large, however, so that the drawdown would become unmeasurable from a practical standpoint at a smaller radial distance.

Nonhead-dependent recharge (from rainfall infiltrating through the unsaturated zone, for example) occurs independently of well pumping and is one of the factors that creates the existing or reference groundwater level. The drawdown created by the well drawdown with respect to this reference surface. In other words, the effects of these independent processes (recharge and pumping) are added by superposition. Thus, the occurrence of this type of recharge does offset or retard the amount of drawdown or the rate of expansion of the cone of depression.

Head-dependent recharge boundaries, such as streams hydraulically coupled to the groundwater system, would tend to halt the spread of a cone of depression or at least diminish its magnitude in distal areas. This caveat has been added to the first paragraph on page 8-33.

The concept of customizing well operation restrictions to match the yield and aquifer characteristics at individual wells has merit. From a practical standpoint, however, yields and aquifer characteristics are highly variable on Rancho San Carlos, and cannot be predicted ahead of time for a proposed well location. However, drawdown impacts of a new well could be avoided by limiting the number of days of pumping during the dry season or the total volume extracted during the dry season, based on data obtained from well tests.

In response to this comment, the following text to the mitigation measure to allow greater flexibility based on actual site conditions has been added:

> New wells may be installed less than 1,000 feet from a protected base flow reach. However, pumping at these wells during the dry season shall be limited to avoid adverse impacts on nearby riparian vegetation or flow in the protected base flow reach. Specifically, pumping shall be limited so that drawdown calculated using measured transmissivity at the well and the average pumping rate since April 1 does not exceed 2 feet in any nearby riparian vegetation areas or 1 foot at any point along the protected base flow reach at any time.

2. It is unclear whether the information presented in the comment is sufficient to conclude that outer fringes of riparian areas are more likely to be adversely affected than the upstream ends of riparian areas. However, the information regarding the direct effects of cattle grazing on riparian areas is worth noting in this discussion. The following sentences have been added after the impact discussion on page 8-54 of the final EIR, Volume II.

> The Cattle Grazing Plan will also benefit riparian vegetation by greatly decreasing livestock access to riparian areas. This will decrease browsing and trampling of vegetation and will improve infiltration of rainfall, which will promote successful seedling establishment.

The only reference to stream temperature in this section of the EIR is in the introductory paragraph on the bottom of page 8-52, which notes that one of the benefits of riparian vegetation is shading of streams. The impact discussion did not mention decreased stream temperatures as a likely result of riparian vegetation impacts. The EIR preparers agree that vegetation impacts would be most likely along the fringes of the riparian area, not near the streambank, and consequently would not affect shading of the stream.

3. The diurnal fluctuations in streamflow could be useful supporting information, but it is questionable whether a change of as little as 5% could be detected, given the numerous factors affecting evapotranspiration. Osmotic potential is a good indicator of plant water status. However, it varies substantially on an hourly and daily basis. Measurements would need to be considerably more frequent than once every 3 years to be able to detect a statistically significant trend in the time series of fluctuating values, and consequently, this approach would probably cost more than the one proposed in the EIR.

The draft EIR allows some flexibility in the monitoring program pending local agency approval. It was expected that two transects of 100-200 yards each (one along the upslope lateral fringe and one along or across the upstream end of the protected base flow reach area) would be monitored at each protected base flow reach, for a total of eight transects and 800-1,600 yards of transect length. This did not seem excessively burdensome or expensive.

It is agreed that long-term trends might be easier to detect if extreme years are omitted from the monitoring time series. The first part of the fourth paragraph on page 8-55 has been changed to read:

> The project applicant shall monitor riparian vegetation along selected transects on average every 3 years, with no periods of more than 4 years between surveys. This allows atypical years with extreme conditions (wet, dry, or impacted by fire, pests, or diseases) to be skipped.

4. These suggestions have been partially incorporated. Pages 9-27 and 9-28 of the draft EIR have been revised to reflect this.

5. The comment correctly points out a potential bias toward overestimation in the test results. Mention of this point has been added on page 8-4 of the EIR to balance the discussion.

6. The clarification provided in the comment is helpful. Conceptually, it makes sense that storativity would decrease with depth, because deeper fractures do not have immediate access to storage capacity associated with draining and filling processes near the water table. This difference should be more pronounced for short-term stresses, such as pumping, than for longer-term stresses such as seasonal recharge and discharge, so that in deep zones there would be an apparent delayed yield effect. A possible mechanism for this (which was discounted in the original analysis) is simply that low vertical hydraulic conductivity greatly retards the response of the water table to pumping at depths substantially below the water table. The final three sentences of the third paragraph have been replaced on page 8-4 with the following:

> Decreasing storativity with depth has been documented in other fractured rock systems (Bedinger et al. 1986) and could result from decreasing fracture porosity with depth. Also, seasonal storage responses would be expected to be larger than responses to short-term stresses such as well tests because the water-table response to pumping at depth is delayed by the low vertical permeability of the intervening depth interval. It should be noted, however, that the amplitude of seasonal hydrographs does not appear to correlate with depth to water.

7. The sentence addressed in the comment was intended to be a general description of groundwater conditions at the well location. In the well itself, the water level obviously cannot rise

above the top of the casing. In a more general sense for the surrounding area, the stream effectively serves as the top of the "casing" for the aquifer, and water levels do not rise substantially above the level of the creek surface (assuming no confining layers impede groundwater flow into the creek). The sentence has been rewritten as follows:

> The water levels remained constantly at or near the ground surface, indicating that the water levels were higher than the level of the creek and that groundwater probably discharges into the creek.

8. The parenthetical phrase has been deleted; it was not essential to the discussion.

9. Refer to the response to Comment 17 from Brian Finegan.

10. The following sentences have been added to the paragraph to balance the discussion:

> It should be noted, however, that other assumptions in the original water balance might have tended to underestimate recharge. For example, native vegetation was assumed to transpire at the same rate as well-watered turf.

11. Decreasing storativity with depth is one possible explanation for the discrepancy in storativity estimates. Other possible explanations are:

- delayed-yield processes that result in relatively small storage responses to short-duration stresses such as well tests and relatively large storage responses to long-duration stresses such as seasonal recharge, and
- overestimation of seasonal recharge.

12. The reference to Title 22 has been moved to the first sentence of the paragraph, to avoid the implication that the first demand estimate was inconsistent with Title 22.

13. When the limits of the proposed operating criteria are reached (i.e., all wells operating 12 hours per day and water levels at two-thirds of the maximum drawdown), the wells will still be capable of producing additional water by operating more hours per day and/or allowing more drawdown. This type of operation should be reserved for exceptional circumstances. New wells should be drilled and connected to the water system on a timely basis (as described in the additional mitigation measure) to avoid this type of operation on a routine basis. Text has been added to page 8-29 of the final EIR, Volume II, to reflect this.

14. The bullet has been deleted.

15. Water levels in groundwater systems where recharge is principally from intermittent streams commonly recover rapidly at the beginning of the streamflow season and abruptly cease

recovering when the water level reaches the approximate level of the creek surface. Water-level data for wells in the Santa Rosa and San Simeon Creek valleys in San Luis Obispo County demonstrate this phenomenon. The concept is basically a common-sense application of hydraulic principles that seems obvious when the patterns are strongly apparent in hydrographs.

16. It is correct that 58 acre-feet (af) of diffuse stormwater are to be used as an irrigation source for the golf trail. This would create a net water demand reduction of 152 af (210 af-58 af) in an average year if the golf trail is eliminated. The number 210 has been changed to 152 on page 20-19 of the draft EIR.

ALEXANDER T. HENSON
ATTORNEY AND COUNSELOR AT LAW

July 10, 1995

Monterey County Planning Dept.
240 Church St.
Salinas, Calif. 93901

Re: Comments on

Draft EIR For "Rancho Lucia Preserve
Project

Dear Sirs:

On Behalf of my client, the Carmel Valley Environmental Defense Fund I offer the following comments on the above-referenced draft EIR:

The traffic mitigation measures for the intersection of Carmel Valley Rd. and Rancho San Carlos Rd. should address the feasibility of putting in an underpass a la' Robinson Canyon Road. The rejection of the feasibility of this alternative due to the potential problem of the hillside to the north is unjustified unless someone examines whether there is sufficient room on the south side of the existing alignment of Carmel Valley Road to accommodate an underpass. To the uninformed observer it appears there is sufficient room to accommodate an underpass and approach without disturbing the hillside to the north nor the houses to the south. 1

The analysis of water use needs more elucidation. It is suggested at page 8-34 that the reduction in cattle grazing will alone provide sufficient additional infiltration as to equal the increased consumptive use of the project. It is unclear upon what information the statement is based that a reduction of cattle grazing could increase infiltration from 2 to 3 times. See page 8-37. Certainly it does not appear that the statistics in Figure 8-6 indicate that a reduction to one-fifth the previous rate of grazing will be rewarded with a doubling or tripling of the rate of infiltration. Further, it is unclear whether this assertion contemplates the decreased 2

25 E. Carmel Valley Road, P.O. Box 1381, CARMEL VALLEY, CA 93924 (408) 659-5334 FAX (408) 659-2131

rate of infiltration as a result of the increase in impervious surfaces from new construction. 2

Regarding the maintenance of water flow levels in the monitored streams it is unclear how the determination will be made as to whether a decrease in base flow is from the project or from natural causes. See page 8-50. The manner in which this determination will be made needs to be explained. 3

The water demand figure for the visitor rooms of .31 acre feet per year seems low if the associated landscaping and pool and laundry are all included. Compare Table 8-1. From whence was this figure derived? This is further obfuscated by the statement on page 20-17 that annual water demand is .204 acre feet per visitor serving unit. 4

The information regarding fire protection is very scanty. It is indicated a response time of approximately 10 minutes can be expected from the nearest fire stations to Rancho San Carlos Road and Carmel Valley Road. What is the response time to the Hacienda when everyone there is trying to leave? Has there ever been a wildland fire on the ranch? If so, what was the response time and how many acres burned? It is indicated a fire station will be built in the project area and staffed by the stewardship Company. See page 16-17. How is it known the Stewardship Company will remain available to do this and how will they be paid? How many, if any, qualified firemen will be available and what kind of equipment will be available at the firehouse? 5

The discussion of the "no-project alternative" reads like an apologia for the project. The commentary asserts without any support that further subdividing could occur without resource protection. The assertion of the mean of possible units of 323 units can only be justified due to its proximity to the number of units proposed by the applicant. Due to the lack of water availability or the lack of adequate access or the wildland fire danger or many other reasons development could be restricted to construction on existing lots of record. The analysis of the impact of that scenario should be discussed in the "no-project alternative". 6

Regarding the "no golf trail alternative" what would be the impact if the reclaimed wastewater were made available for landscaping at each of the homesites and for fire flows? It is noted the Table 8-1 indicates the net groundwater demand for the entire project is 272.11 acre feet per year. Of this net annual demand, which includes credit for reclaimed water, evidently 210 acre feet are for the golf trial. Thus, 7

elimination of the golf trail will reduce net water consumption of the project by 77% if there is an alternative use of the reclaimed wastewater. Alternatively it should be acknowledged in the discussion of this alternative that the golf trail increases water consumption of the project over 3 fold. It is suggested that given the vagaries of predicting the impact of this project on the water supply in Carmel Valley that approval of the golf course should be contingent upon a new dam or other comparable water supply for the Monterey Peninsula. This should be addressed as a feasible mitigation measure.

Thank you for your consideration of the foregoing comments.

Sincerely

Alexander T. Henson

Response to Comments from Alexander T. Henson, Representative of the Carmel Valley Environmental Defense Fund

1. The EIR does not reject the feasibility of the underpass at the intersection of Carmel Valley Road and Rancho San Carlos Road; rather, it recommends it as one possibility for a mitigation measure for this intersection. The constraints and environmental impacts associated with the underpass are generally described in accordance with CEQA.

2. As stated on page 8-34 of the draft EIR, infiltration would need to increase by an amount equal to less than 2% of gross rainfall to increase groundwater recharge by an amount equal to the project's consumptive water use. For an average annual rainfall of 25 inches, this is equivalent to an increase in infiltration of less than 0.5 inch over the area of the rancho. Figure 8-6 in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", shows that increases of 1-2 inches are commonly associated with substantial decreases in grazing intensity.

   Impervious surfaces would cover less than 1% of the project area (page 9-17) and consequently would have little effect on the total area available for infiltration. In cases where small impervious surfaces such as driveways and sidewalks drain to adjacent unpaved soils, infiltration is usually increased because rainfall is effectively concentrated on a smaller area of soil and is able to saturate the soil profile and initiate deep percolation more readily.

3. Two methods for determining whether base flow in creeks has been affected by the project are described on pages 8-48 to 8-49 of the draft EIR. One method uses linear regression of runoff versus rainfall. The other uses a double-mass analysis comparing cumulative runoff in the affected watersheds with cumulative runoff in a control watershed such as Pine Creek. Other methods might also be suitable and could be tested by hydrologists performing the analysis.

4. It is not clear where the commenter obtained a water demand factor of 0.31 af/yr for visitor rooms. The water demand listed in Table 8-1 of the draft EIR for visitor rooms was 47.31 af/yr gross demand (or 44.28 af/yr net demand). This number was taken directly from Table 4-4 of the Comprehensive Hydrological Study and is the sum of itemized water demands for the lodge (including 110 rooms, a dining room and commercial kitchen, laundry, and landscape irrigation) and the hacienda (26 additional rooms and a restaurant).

5. The onsite fire department will provide first-response fire protection. The Stewardship Company will be paid by the Conservancy. Since 1990, there have been two accidental vegetation fires: One was completely suppressed by the existing Company 70, and in the other CDF was assisted by Company 70 with water tankers and heavy equipment manned by Company 70. In addition to augmenting Company 70, 13 individuals are available for firefighting. Firefighting equipment includes personal gear, hand tools (i.e., backpumps, shovels, and rakes), pumps and generators, hoses and fittings, tractors, a backhoe, a diesel trailer, chain saws,

4X4 vehicles, radios, and other miscellaneous equipment. The Fire Safety Management Plan discusses the road network created on the vesting tentative map (VTM) that provides safe ingress for firefighting personnel and equipment and also identifies safe egress for residents. An emergency evacuation plan will be created for the homeowners living in various regions of the property on a lot-by-lot basis, as well as those using or working in the commercial and recreational areas of the Santa Lucia Preserve.

6. It is important to remember that the Existing Lots of Record Alternative is a No-Project Alternative. That is, the EIR attempts to speculate about what would happen if the proposed project were not approved and existing conditions not maintained. The assumptions that are provided for this alternative are rational. It is not a typical project alternative that is formulated to reduce or avoid significant impacts.

   The existing lots of record could be sold and developed by individuals who would not be regulated by a comprehensive development plan. Under this scenario, even if only 125 lots would be developed, which would reduce water demand, there could be other more adverse impacts compared to the proposed project. Sensitive resources could not be substantially avoided because of the requirements of roadway and utility line extensions and the constraints on many of the lots. Additionally, under this scenario onsite supporting uses (commercial, recreational, and visitor-serving units) would not be part of this alternative, which would necessitate extensive offsite travel to meet residents' demands.

7. If the golf trail is not developed, the diffuse stormwater supply would also not be developed. Thus, the revised amount of water that would be reduced by the No-Golf Trail Alternative is 152 af/yr. This has been corrected in the final EIR. The reclaimed wastewater could be used in the San Francisquito Flat area (79 af/yr would be available from the wastewater treatment plant), thereby reducing demand for landscape irrigation. The EIR concludes that there is an adequate water supply for the project and such a recommendation to approve the golf trail contingent upon a new dam or other comparable water supply for the Monterey Peninsula is not considered necessary.

THE LEAGUE
OF WOMEN VOTERS
OF THE MONTEREY PENINSULA

July 3, 1995

Wanda Hickman
P.O. Box 1208
Salinas, CA 93902

Subject: DEIR for The Santa Lucia Preserve

Dear Ms. Hickman:

We wish to submit the following comments on the DEIR:

Traffic: The applicant proposes to contribute to various traffic mitigation funds to mitigate traffic impacts; however, no time frame is provided in the DEIR for completion of projects to mitigate these impacts. The FEIR should describe the status for proposed improvements to Carmel Valley Road and Highway 1 including the source of funding and estimated time of completion. 1

Jobs/Housing Balance: The DEIR includes a discussion of the jobs/housing balance for Monterey County and concludes that the project would have little effect on the existing ratio. This discussion would have more relevance if it addressed the jobs/housing balance for the Monterey Peninsula rather than for the county as a whole. Given the remote location and the type of jobs generated by the project, the FEIR should include a finding that the project will exacerbate the existing imbalance between housing and jobs on the Monterey Peninsula. 2

Thank you for the opportunity to review the DEIR.

Sincerely,

Janice O'Brien

Janice O'Brien
President

BOX 1995, MONTEREY, CALIFORNIA 93942 408-648-VOTE

Response to Comments from the League of Women Voters

1. Several projects on Highway 1 have recently been approved and funded. These projects are listed on page 13-21 of the final EIR, Volume II.

   The exact timing for construction of these projects is not known, but they are anticipated to be constructed in the near future.

   Monterey County Department of Public Works has initiated preparation of plans and specifications for improvements to Carmel Valley Road between Schulte Road and Robinson Canyon Road. The timing of the construction of these improvements is not known and will depend on funding availability. These improvements are planned to be implemented between 1996 and 2015.

2. The draft EIR concluded that the addition of project-related jobs and housing would have little effect on Monterey County's overall jobs/housing ratio. Similarly, the addition of the project's 350 housing units and estimated 227 jobs would slightly improve the ratio of jobs to housing within the Monterey Peninsula; however, as the comment correctly suggests, the proposed project could have an adverse effect on the availability of housing within the Monterey Peninsula area. The draft EIR addresses this potentially adverse effect by concluding that only 53 of the 350 housing units that would be constructed onsite would likely be affordable for most of the estimated 258 onsite workers, likely requiring many onsite employees to commute from other areas of Monterey County. As the draft EIR concludes, the *economic* effects of this imbalance in onsite jobs and housing would likely be minor. The *environmental* effects (i.e., air quality impacts and traffic impacts) of this imbalance and resulting increase in commute trips were addressed in other chapters of the draft EIR (refer to Chapter 13, "Traffic", and Chapter 14, "Climate and Air Quality").

M · C · S · I

WATER SYSTEMS MANAGEMENT

11552 Hidden Hills Rd. Carmel Valley, CA 93924

(408) 659-5360 Fax (408) 659-3166

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- meeting minutes
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- operational analysis

June 30, 1995

Wanda Hickman, Project Planner
Monterey County Planning
& Building Inspection Dept.
P.O. Box 1208
Salinas, CA 93902

Dear Ms. Hickman:

Recently I had an opportunity to review the Santa Lucia Preserve Draft EIR. I was interested in the residential water demand factors estimated by Jones & Stokes Assoc. as 0.75 acre feet per year per home.

Over the past 12 years I have managed several rural water systems here in Monterey County - among them CVMWCo. serving the Hidden Hills/Bay Ridge community, CRMWCo. serving Carmel Riviera, Yankee Point, and Otter Cove, and CSA 75 serving the community of Chualar. Development in Hidden Hills and Riviera is similar to that planned for Rancho San Carlos with large properties, expensive homes and a probable penchant for extensive landscaping. In reviewing my records I find that per meter demand has averaged from 0.35 acre feet to a maximum of 0.60 acre feet per year. The lower figures coincide with an inverse rate structure that encourages maximum conservation. 1

It appears to me that a water demand number of 0.75 acre feet per meter per year is very conservative and would certainly compensate for other considerations such as senior citizen's units and caretaker's quarters. In addition the way in which the rates are structured for the new system will allow for some control of future water demand by encouraging maximum conservation efforts.

Thank you for considering these observations from actual experience when determining the completeness of this document.

Sincerely,

Russell L. Hatch
MCSI Water Systems Management

CC: Board of Supervisors

1. The county appreciates the additional water demand data for deluxe residential areas in the Monterey Peninsula area. Data for this type of development are scarce. The water demand factor of 0.75 af/yr for the market rate homes was developed for the hydrological studies prior to initiation of the EIR process. The factor was reviewed and found to be conservatively high. Because the factor seemed very conservative, it was also used in the EIR. The data provided in the comment indicate that the assumed water demand factor could be high by a factor of 2. The Monterey County Board of Supervisors and others concerned with the potential impact of the project on water supplies in the Carmel Valley area should find that the EIR provides conservative analysis based on thes data. based on these data. If the measured water demand factor (0.35 af/yr per dwelling unit) provided in the comment were used in the EIR, most of the hydrologic impacts would have been half as large as reported in the draft EIR.

OGDEN ENVIRONMENTAL AND ENERGY SERVICES

5510 Morehouse Drive San Diego, CA 92121 (619) 458-9044 Fax Number (619) 458-0943

FACSIMILE TRANSMITTAL

We have _6_ pages to send, including this page

Date: 13 July 95

To: Walter Wong
Wanda Hickman

Location: Monterey County Dept of Health
Monterey County Planning Department

FAX Number: 408 755-4880 (DoH))
408 755-5487 (Planning)

From: Jay Jones

Enclosed is a copy of the third party review for DEIR for the Santa Lucia Preserve Project (EIR # 94-005). A copy will also be mailed to you.

Thank you for your time and attention.

OGDEN ENVIRONMENTAL AND ENERGY SERVICES

5510 Morehouse Drive
San Diego, CA 92121
619 458 9044
Fax 619 458 0943

July 13, 1995

Mr. Walter Wong
Monterey County Department of Health
1270 Natividad Road
Salinas, California 93906-3198

RE: Third Party Review for the Santa Lucia Preserve Project (Rancho San Carlos): Review of the Draft EIR impacts analysis and mitigation measures with respect to water supply issues

Dear Walter:

Enclosed is a summary of the Santa Lucia Preserve water supply and water use issues pursuant to the requirements of the third party review (Tasks C-6, -7, and -8). These comments are based upon review of the Draft Environmental Impact Report (DEIR) prepared for Rancho San Carlos (RSC), now referred to as the Santa Lucia Preserve Project.

Introduction

Previous third party review comments have been prepared for the supporting documents to the DEIR that address the technical water supply issues in more detail than included in the DEIR. The main focus of the technical review was the Comprehensive Hydrologic Study (CHS) (dated March 1994) and the three Supplements to the CHS (dated July, 1994; January, 1995; and March, 1995; respectively). Third party review comments have also been submitted for the Administrative Draft EIR (ADEIR), dated March 7, 1995. A separate review was also prepared March 28, 1995, for the CHS, the CHS Supplements, and ADEIR with respect to Resolution No. 93-115. Because both the CHS and the ADEIR address impacts, and the CHS was incorporated into the ADEIR by reference, the review considered both documents where appropriate.

This review is focused upon the impacts analysis and mitigation measures provided in the (DEIR) with respect to water supply issues. During the course of the third party review of the CHS and CHS addenda, a number of technical issues were raised that reflect the general uncertainty inherent in the evaluation of a low-permeability fractured-rock groundwater system and the varying approaches that are used to evaluate hydrologic systems. Refer to prior third party reviews for specific details. The overall impacts of these uncertainties to the evaluation of water supply concerns; however, can be treated within the proposed mitigation measures and project activities to be conducted during the development and operation of the Santa Lucia Preserve.

As noted in the General Scope of Services for the third party review, "The ultimate purpose . . . is to determine, within the accuracy limits of standard hydrogeologic practices, whether the level of development proposed for the Project as proposed by the Applicant is consistent with safe yield of the proven water resources without adverse impact on off-site water resources" (Resolution No. 93-115). Additional technical analysis is not required to satisfy the purposes of the third party review because the proposed DEIR mitigation measures are generally sufficient to allow for the uncertainties associated with the characterization and evaluation of the ground-water supply. Specific comments regarding the DEIR analysis follow.

Review of the Impacts Analysis, Chapter 8

A total of 12 impacts are identified in the DEIR. Of these, five are deemed significant, one is deemed beneficial, and the remaining six are seen to be less than significant. The significant impacts can be segregated into two general categories. The first category is the impact of a water supply shortage that could ultimately create the need to import water. The second is related to the impact of ground water use upon stream flow and riparian habitats (potentially creating both short term and long term impacts).

The cattle management plan is included as a beneficial project impact. In many ways the cattle plan will act as a mitigation and the statements in the DEIR stating that the effective rate of recharge will increase and that the potential for flooding will decrease as a consequence of the cattle plan are fully supported. From a water supply viewpoint the cattle plan is a key element to maintaining and likely improving the water balance in the project area.

The range of impacts identified in the DEIR appears to be well discussed and the overall project description is very complete. The impacts as outlined in the DEIR appear sufficient for the EIR analysis; however, clarification or additional discussion is suggested. In particular, the stream base flow conditions are not explained in sufficient detail for evaluation of the proposed mitigation measures, potential offsite impacts to areas not directly included in the Carmel Valley River system are not detailed, and the potential impact of privately owned wells within the project area has not been addressed. The suggested revisions are as follows:

1. The stream base flow analysis is not specific in terms of the stream reaches that are supported by base flow. The observed base flow measurements should be presented in the EIR for reference. As noted by Figure 8-2, approximately 25 percent of the ground-water recharge becomes base flow in the long term average, so the base flow analysis is important to evaluating the magnitude of potential impacts. A map depicting the location of the gaining portions of the streams where ground water enters as base flow should be included in the EIR. 1

2. In the discussion of offsite impacts, the bulk of the text is properly centered around the Carmel River due to its relative importance to the region. However, some additional discussion is warranted regarding the potential impacts to offsite areas from project-related changes within the San Jose, Las Garzas, and San Clemente watersheds. At a minimum this would include a review of existing conditions within the watersheds immediately outside of the project boundaries and a discussion of the potential impacts that could occur. 2

3. One potential impact to the water supply that has not been discussed is the potential for privately owned water wells that are not included in the community water supply network. These would then not be included under the water supply regulations of California Code of Regulations (CCR) Title 22 or subject to the water management program provided by the community water supply program. If private or independent wells are installed and operated a mechanism is required to include these wells under the EIR mitigation program. 3

Review of the Proposed Mitigation Measures, Chapter 8

All of the significant impacts are viewed by the EIR to be mitigable. A total of seven mitigation measures are incorporated into the DEIR. All of the proposed measures are relevant and appropriate. As noted in the previous section, the analysis of impacts requires some additional details that will in turn support the discussion of the proposed mitigation measures.

The proposed mitigation measures are key to accounting for the uncertainty inherent to the analysis of the hydrologic system at the site and for providing that the goals of Resolution 93-115 are met. The following is a discussion of those mitigation measures that require additional discussion or clarification.

Mitigation: Maintain a water supply equal to or greater than connected water demand at all times. The DEIR is based upon a large-scale closed loop system that spans the watersheds of the project. It would be reasonable to assume that subsystems will initially be constructed owing to the large scale of the project. For some of the residences, individual wells may also be more appropriate if the homes are remote to the initial phases of the water supply system. Additional clarification is required to account for the phasing of the system prior to project build-out and to explain how the various components will be monitored and regulated. 4

Mitigation: Monitor ground-water levels. It is proposed that the existing and proposed water supply wells will be used to monitor water levels in the project. Clarification is requested regarding how the data from actively pumping wells will be used to evaluate the status of the aquifer. The text suggests that the long term trends can be identified from the hydrographs; however, due to the potential for seasonal and operational variations in pumping rates, localized drawdowns measured at actively pumping wells may not be representative of water levels across the site. The most critical areas for monitoring will 5

be in the base flow stream reaches. It is suggested that a refinement to this mitigation measure would be to install a limited number of shallow piezometer wells in key areas of stream valleys for purposes of aquifer monitoring.

Mitigations: Delay pumping at wells near base flow reaches; Drill new wells away from base flow reaches; Monitor base flow in creeks and provide supplemental water if necessary. As previously noted, additional detail is required regarding base flow conditions. The proposed mitigations are reasonable, but can not be critically evaluated without data discussing the magnitude and location of base flows. The delay of pumping of wells near base flow reaches as discussed on page 8-45 is based upon average pumping rates and conditions. Owing to the relative variation in hydrologic properties in the fractured rock mass, a wide variation in the rate of drawdown effects is expected. The increase in the effective distance from 50 to 250 feet (as noted in HYD-1) to 1,000 feet is reasonable and prudent. It is suggested that in those locations where base flow reaches of streams may be impacted by pumping that a companion piezometer be installed near the stream for purposes of ground-water monitoring. 6

Summary

Overall, the DEIR impact analysis and proposed mitigation measures substantially provide for the requirements of the water supply per Resolution 93-115. The four key issues of the Resolution include the following:

Level of Development The DEIR provides for an adequate analysis of the proposed development with respect to water supply and the impacts of withdrawing water from the site.

Safe Yield A safe yield is demonstrated where the project can obtain sufficient water from onsite water resources and have the water replenished by recharge. A safe yield results when the amount of water obtained from ground water is balanced by the amount of recharge and that a long-term net water loss in the aquifer does not occur. In this instance, seasonal (winter) recharge will typically provide for the resupply of water to the aquifer system. The cattle plan will likely enhance the ability of the aquifer to be recharged and support the ability of the project to maintain a viable aquifer system.

Proven Water Resources The question of whether a viable (proven) water resource exists for the project is based upon two issues. The first is whether a sufficient volume of water is available for use in the ground-water system. The second is the ability of the well system to extract the water from the fractured rock ground-water system. Based upon the projected water uses, the volume of available water substantially exceeds the project demands. The ability of the wells to produce water will be less certain on an individual well basis as demonstrated by the number of low producing wells installed during the hydrological evaluation of the site. However, given a sufficient number of wells, the project demands can be met.

Adverse Offsite Impacts The offsite impact of project water use can be minimized through the proposed mitigation measures. Of main concern here is the reduction of base flow in streams, both onsite and offsite, and the reduction in the flow of ground water offsite. Adequate measures can be taken to avoid adverse impacts from project activities. Some additional detail is required in the DEIR to discuss those portions of the site that are not tributary to the Carmel Valley. An additional component to the site mitigation program of ground-water level monitoring is suggested where a limited number of shallow wells (piezometers) are installed in areas of base flow that could be impacted by adjacent water well operations.

Overall, the DEIR is well written and prepared and reflects many of the initial review comments provided to the Applicant by the water agencies that have been involved in the CHS and ADEIR. The third party review issues should not result in an extensive modification of the DEIR. I look forward to reviewing the Applicant's response to the DEIR comments.

Thank you for your time and attention.

Jay W. Jones, RG, Ph.D.
Senior Hydrogeologist

cc: Wanda Hickman, Monterey County Planning and Building Inspection Dept.
File

1. Protected base flow reaches occur in Potrero Canyon and San Clemente, San Jose, and Las Garzas Creeks, and the approximate locations of these protected base flow reaches are shown in Figure 8-5. Because mitigation measures have been provided for all of the perceived impacts, additional maps and informaiton are not required.

2. Impacts of the project on those outside the project area are discussed in the section "Impacts on Offsite Water Users" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the EIR. On a long-term average annual basis, any increase in consumptive use of groundwater on the ranch is most likely to be compensated for by a decrease in surface outflow in the creeks. This can be deduced from information presented in the preceding sections dealing with effects on each of the outflows. Subsurface outflow was estimated to decrease by no more than 17 af/yr. Based on the estimated distribution of groundwater yield among the watersheds on the ranch, approximately 24% of the total streamflow depletion would occur in the San Jose Creek watershed, leaving approximately 211 af/yr of depletion to be obtained from the creeks tributary to the Carmel River. Surface outflow would not decrease below 48 af/yr, which is the amount of groundwater that would be pumped into protected base flow reaches to maintain instream habitat.

   The EIR also states that cumulative impacts from the watersheds on Carmel Valley are insignificant. Therefore, potential offsite impacts on individual watersheds, which are in between the areas discussed in detail in the EIR, are either insignificant or accounted for in the mitigation measures. Furthermore, groundwater pumpage in Santa Lucia Preserve will be distributed approximately in accordance with the proportion of recharge occurring in each watershed so that undue stress will not be placed on any given watershed.

3. As stated in the covenants, conditions, and restrictions submitted with the combined development permit by the applicant, privately owned water wells would not be allowed.

4. As stated above, privately owned water wells would not be allowed. Because the mitigation measure states that the water supply will be equal to or greater than connected water demand at all times, clarification beyond that provided in Chapter 8 of the EIR in the section "Additional Mitigation Measure: Maintain a Water Supply Equal to or Greater than Connected Water Demand at all Times" is unnecessary.

5. The most recent description of the water system design indicates that all wells would be connected by telemetry to a central control office and that static and pumping water levels would be monitored and included in the telemetered data.

In response to this comment, the project applicant has proposed that several shallow monitoring wells be placed near the protected base flow reaches to determine the impacts that pumping would have on them. They will be located as follows:

Creek	Well Location	Completion Depth
San Clemente	Existing T26A	125 ft
San Jose	New well near T14/T14A	Approximately 50 ft
Potrero	New well north of T8, near creek	Multiple completion: approximately 50 ft and approximately 100 ft
Las Garzas	New well below R3/R33 as far as possible; above protected base flow reach	Multiple completion: 25-30 feet and approximately 100 feet

6. See the responses to Comments 1 and 5 above.

PARKIN & SUGAR

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July 7, 1995

Ms. Wanda Hickman
Planning and Building Inspection Department
County of Monterey
204 Church Street
North Wing, Suite 116
Salinas, CA 92901

Re: Santa Lucia Preserve Project (EIR No. 94-005).

Dear Ms. Hickman:

I represent the Ventana Chapter of the Sierra Club in the matter of Rancho San Carlos. This document are comments on the Draft Environmental Impact Report (DEIR) of the Chapter, which are to be considered in addition to those submitted directly by the Chapter and its members. Attached to these comments are further comments by eminent biologists at the University of California at Santa Cruz. We request that these comments also be specifically answered and addressed.

Yesterday evening, I attended a public forum on the Santa Lucia Preserve. In that meeting, it was understood that your office has given those that attended the meeting had until 5:00 p.m., Monday, July 10, to submit comments on the proposed project. This letter also confirms with your office that in fact those members of the public have until that time to submit comments, and that those comments will be formally answered by the County and the consultant.

It has also come to my attention that the EIR has not been made available at the Harrison Memorial Library in the City of Carmel. I would suggest that this has hindered

public availability and squelched potential response.

Also note, that a number of requests for extensions to the comment period have been made. There are numerous documents, with relevant information in the EIR, which need review. And, given the large size of the project and the volumes of materials and studies necessary for proper review, these requests should be honored.

I am sending the following comments via fax by the deadline of July 7, 1995. Also note however, that I am sending a mailed version as well to ensure clarity and because one of our graphics are in color. Please replace the comments received by fax when you receive the copies by mail.

As a general comment I have concluded that the DEIR is inadequate and that its analysis of impacts and mitigations is incomplete given the unusually large size of this project. The Sierra Club has many concerns regarding the DEIR for this project including general questions regarding the absence of what is deem essential analysis and specific problems with regards to the impacts and mitigations discussed. The nature of these errors and omissions is significant and I feel that they should be corrected and the DEIR recirculated for a public comment period once they are corrected.

1) On page S-5, the DEIR identifies the No-Golf Trail Alternative as the environmentally superior alternative. However, there is no supporting basis for this conclusion given anywhere in the EIR. Chapter 20 (Alternatives) discusses the alternatives, but fails to evaluate the "comparative merits" as required by CEQA Guidelines sec. 15126 (d). The EIR must give the public the clear reasons for choosing the No-Golf Alternative. 1

2) On page S-5, Chapter 20, and Chapter 5 make assumptions about economic impacts and assert them as beneficial impacts. The EIR improperly gives greater weight to these "beneficial" impacts than the other negative impacts associated with this project. The result is that the EIR downplays the environmental impacts of this project. 2

3) There are an abundance of environmental reports, management plans, etc., cited and incorporated by reference in the EIR. There is no clue in any portion of the EIR that indicates where these documents are located. The public is not able to decipher the full nature of this project form the EIR alone as is required by CEQA. A dearth of information is lacking in the EIR. Therefore, the information cited should be summarized in the EIR or provided at a convenient place (such as in the proximity of the project), with notice that it is there, so it is available for public review. While Sierra Club members were able to get some of these materials from your office, they were at horrendous expense. This effectively thwarted the informational purposes of CEQA and 3

the EIR—with more detail—recirculated for public review.

4) Page 2-11 of the DEIR states with regards to public trails that "specific alignments have not been identified and would require additional environmental review before they are constructed." This is improper project segmentation. Full environmental review must occur in this EIR. Otherwise, piecemeal environmental review will thwart the comprehensive nature of CEQA. Conveniently deferring review is a violation of CEQA. Moreover, this approach is disingenuous since the proponent is selling this as a "preserve" with limited public access. By not disclosing intentions and environmental considerations for a public trail, these promises are illusory. 4

5) Page 2-13 states that the project will be phased over a number of years. The 24 phases will result in conveyance of different pieces of the preserve. This is misleading, then, if in fact the preserve will not be created immediately. The possibility exists that the applicant will not proceed with certain project components and later seek amendment to increase uses. This must be disclosed in the EIR. 5

6) Page 2-14 states with regards to the first subdivision map of 16, 541 acres, that 9,300 acres will be set aside as open space "wildlands." This suggests that the 18,000 acre preserve is in fact illusory. If only a little over half of the first 16,541 acres will be preserved, then how in fact will only 2,000 be considered developed? While the project provides for conservation easements over private lands, the public is under the belief that an 18,000 acre preserve will be created, when in fact a preserve linked through conservation easements is the appropriate description. The EIR is misleading and fails to set forth an adequate project description. This project is then hiding behind the preserve concept in order to prevent full public disclosure and to sway public opinion, or squelch opposition. Therefore, the EIR must be corrected and an adequate project description properly laid forth. These errors also need to be corrected to prevent further disinformation by the proponent to the public and fully inform the public as to the ramifications of this project. 6

7) Page 3-8 shows that project is nearly surrounded by open space, park and recreation uses. Moreover, the Los Padres National forest and Ventan Wilderness are just a short distance to the south. Page 3-11 considers the incompatibility of proposed uses with existing uses to be insignificant. However, given the huge recreation and open space lands all around the parcel, this is a significant impact that is unavoidable. The project will result in the conversion of valuable or large amounts of open space." An island of private land or potentially developed land in the middle of open space, parks and wildlands is nearly always considered valuable by users and those entrusted with a parks care. Moreover, the proposed development may conflict with "established recreational ... uses" as set forth in the CEQA guidelines. The EIR should be changed to reflect land use inconsistencies and state that these are in fact significant impacts. 7

8) On page 3-12, the DEIR uses the Dormody residences and cabins as a means of showing land use compatibilities. However, the Dormody property is a much less intensive use than environs in the Santa Lucia Preserve. The Dormody property has merely vacation cabins and a small area of amenities, such as a swimming pool. It is not to the scale of the Santa Lucia Preserve with large luxury homes, clubhouse, lodge and golf course. 8

9) Table 3-1, beginning on page 3-13, analyzes inconsistencies of the proposed project with plans and policies for Monterey County. This table is incomplete. It does not analyze the consistency of all the policies and plans listed. It must do so. Full disclosure of consistency with land use polices is required under CEQA. 9

10) Page 7-8, identifies the potential impact of septic systems. According to the DEIR on that page, the Monterey County Division of Environmental Health has already approved these lots for septics. If that is true, then an EIR must have been prepared for such an action. Such approval would violate CEQA since the County is segmenting the approval process. 10

11) Page 8-58, refers to the water allocations and the Carmel River. Does the recent decision by the State Water Resources Control Board with respect to groundwater withdrawals and the Carmel River (per the California American Water Company) change the parameters of discussion with respect to groundwater withdrawal and Rancho San Carlos? If so, the EIR needs to reflect this new information. 11

12) Page 9-24, describes a nitrate monitoring program as a mitigation measure. However, specifics as to what will be done in the event elevated nitrate levels occur are not included. It merely states that the applicant should "describe management activities that are being implemented." The public has no way of knowing whether such management activities will be successful. Specific mitigation measures must be included in the EIR. Under CEQA, monitoring alone is an insufficient mitigation measure. 12

13) Pages 9-26 & 27 of the DEIR describes mitigation measures for a stormwater pollution prevention plan. A prohibition on excavation or grading during the rainy season should be included in the EIR. 13

14) On page 11-3, the DEIR states that only 20% of the site is non-native plants. Given the high number of natives onsite, the impacts associated with he introduction of nonnative species and proposed mitigations must be included in the EIR. The current discussion in the DEIR is inadequate. Control of invasive species of plants will be done through establishment of "guidelines." However, these guidelines could be ignored. This is not an adequate mitigation measure. There should be deed restrictions or 14

covenants. The preserve manager should also have the ability to enforce such covenants if individual home owners are violating these covenants. 14

15) Page 19-9 of the DEIR states that the Santa Lucia Preserve is currently one of the largest blocks of undeveloped native habitat in the region. Page 11-3 states that the site contains intact watersheds, offers habitat for wide-ranging species and movement corridors between watersheds and forest that provide linkages, and offers suitable breeding habitat for sensitive species with large home range requirements. However, the DEIR is completely deficient as to the impacts this project will have on large home range species, migration corridors of animals, and fragmentation of habitat with respect to these species. This project will spread development throughout the project impacting corridors and fragmentating habitats into islands. The impacts of the development must be addressed in the EIR. The only reference to the such a problem is on page 11-35. However, the DEIR merely states that "The project was also evaluated to determine whether it would result in a substantial loss, degradation, or fragmentation of important native communities and associated sensitive wildlife habitat, such as wetlands, riparian corridors, coastal terrace prairie, oak woodlands and savannas, redwood forests, and Monterey pine forest." However, the results of this evaluation are not included in the EIR as they must be. The EIR merely examines each of these habitats in isolation. 15

16) The DEIR states on page 11-39 that free roaming dogs and feral cats will cause indirect impacts to the native wildlife. However, the only mitigation proposed is enforcement of leash laws, which by itself is very ineffective. This should be considered an unmitigated significant impact. 16

17) With respect to domestic and feral cats, there are no proposals to restrict domestic cats. This is a significant unavoidable impact. Domestic cats are successful hunters of birds and other wildlife. As stated elsewhere in these comments, the San Francisquito Flat area of this site has the largest diversity of breeding birds in all of Monterey County. This is a significant unavoidable impact that must be addressed in the EIR. 17

18) To minimize road kills on the project site, enforcement of speed laws is contended as a mitigation measure. However, such enforcement will certainly be spotty on such a large land area. Will the preserve have it own police force? If not, the project proponent is relying on an already overtaxed police department. 18

19) Covenants should be used as mitigation measures. The use of covenants and deed restrictions are essential to enforcement of many conditions in the project. Mitigation measures should incorporated into these deed restrictions, such as, for example, a policy on free-roaming domestic cats and dogs. 19

20) On page 11-9, the DEIR states that there is an abundance of coastal scrub found 20

on the project site. It then states that "Because of its limited range and current threats posed by a variety of factors, especially development, coastal scrub is considered an important native community." However, the DEIR does not directly discuss the impacts of this project on the coastal scrub community and mitigation measures necessary to reduce impacts to a threatened biological community. 20

21) There is a great deal of riparian and wetland habitat, and streams and watercourses throughout the project that are intact as evidenced in the EIR and shown in Figures 9-1 & 11-12. However, the EIR examines these habitats and waterways in a vacuum by stating that only a small percentage of these habitats will be affected. However, given the fact that the EIR admits that these riparian areas are "intact" and that riparian areas and waterways have been threatened throughout the region, there is significant widespread fragmentation and associated impacts that are not addressed in this project. 21

22) The DEIR in Chapter 11 states that only minor loss (<10%) of the numerous different habitats are being lost. However, the use of percentages to determine whether a loss is significant is misleading with respect to this project. The project is unusually immense. But, yet a loss of 574.7 acres of valuable oak woodland and savanna is not considered significant because it is less than 10% of the total. However, the loss is substantial in acreage. Therefore, this should be considered a significant impact. 22

23) Page 11-45, states that loss of 5.82 acres of wetlands is not a significant impact. However, given the value of wetlands and their scarcity of existence in California, this is a significant impact. Again, given the parcel size, the percentages (i.e., , 10%) are misleading. Moreover, mitigations are required for filling wetlands under the Clean Water Act. Therefore, the fact that the EIR states that mitigations are not required is misleading. 23

24) Page 11-48, the DEIR states that special status habitat will be avoided. However, the public has no basis for believing this. There are no locations or maps included to show that they are in fact being avoided. This must be included in the EIR. The public should not be required to ferret out the truth of the matter asserted. The DEIR merely makes grandiose assertions. 24

25) According to the DEIR on pages 11-48 through 11-52, less than 10% percent loss of habitat for special status species will be lost. This is again misleading. The loss of 601 acres of Golden Eagle and American Badger habitat is significant. 25

26) Page 12-25 of the DEIR states that because trails in the adjacent parkland are lightly used, that views of the development are less than significant. However, 26

additional land that is being purchased (but is not yet open to the public) and the addition of trails in the proposed project will increase use. Moreover, as recreational opportunities continue to expand and the human population grows, use will increase. Therefore, the conclusion that views form the trail are less than significant is erroneous and must be changed in the DEIR. Given that the project site is surrounded by the open space, recreation sites and park land, the utmost scrutiny must be given to the visual impacts. 26

27) With respect to trail users on page 12-25, park hikers and recreationalists are sensitive receptors. Hikers do not want to cross wildlands to stumble on views of development. The number of people using a trail does not excuse preservation of vistas from parks. Therefore, the conclusion that views form the trail are less than significant is erroneous and must be changed in the DEIR. 27

28) Also with respect to trail users on page 12-25, the public has no basis to believe the DEIR's conclusions. There is no data supporting the assertion that there are not a number of trail users. Only a subjective notion of low numbers of users is provided. Unsubstantiated claims in an EIR are improper. The public must be able to analyze for itself the conclusions made in an EIR. Without supporting evidence, the conclusion that there are not a large number of hikers in the region is erroneous and must be deleted from the EIR. 28

29) With respect to page 19-5, and 19-6 of the DEIR, the decision by the State Water Resources Control Board decision with regards to California American Water Company may change the analysis as to use of the Carmel Valley Aquifer. Are there any changes anticipated here? If so, they need to be included in the EIR. 29

30) A number of mitigations in the DEIR are mixed in with the discussion of impacts. Then the DEIR concludes that no mitigations are required. This is misleading. The Summary of Impacts and Mitigations beginning on page S-17 then also concludes that no mitigations are required for certain impacts when in fact mitigations are being employed. Whether or not mitigations are proposed by the applicant or the County, the mitigations must be set forth after discussion of impacts. Not woven in with the discussion of the impacts so that then the EIR can conclude that particular impacts are less than significant. Below are just a few examples of this erroneous analysis that must be corrected in the EIR. 30

a) Page 7-8, identifies the potential impact of septic systems. Compliance with Environmental Health requirements is the mitigation measure. The EIR is improperly stating that this is an insignificant impact.

b) Page 8-54 & 55 identifies impacts associated with "long-term decrease in the total

area of riparian vegetation caused by decreased reproductive success." In that impact discussion, the Cattle Grazing Plan is provided as mitigation. This is a mitigation and should properly be discussed and included as such

c) Page 9-20, the discussion of impacts associated with "Potential for Increased Flooding on the Carmel River" includes reference to proposed land stewardship practices that will reduce runoff, this should be included in the mitigation measures just below. 30

d) Page 11-44, states that no mitigation measures are required for loss or degradation of riparian habitats. Then the EIR explains restoration plans. Therefore, the mitigation measures are to be implemented. The EIR should not state that no mitigation is required.

e) Page 11-47, the DEIR states that no mitigation measures are required. However, it then sets forth the applicants proposed mitigation measures.

f) The Silvery Legless Lizard, no mitigations are required on page 11-52. However, the EIR states that it will be the focus of continuous, long range surveys, monitoring and management. If so, this is a mitigation measure.

g) Mitigations are proposed to ameliorate viewshed impacts on page 12-15. It is clear that there are mitigations are being employed. Then the Mitigation measure should not say "no mitigations required."

h) Mitigations are proposed on page 12-21 for viewshed impacts. Yet it states at the outset that "no mitigation measures are required."

i) Mitigations are proposed on page 12-25 for viewshed impacts. Yet it states at the outset that "no mitigation measures are required."

j) Mitigation measures are set forth in the impact discussion on pages 12-25 & 26 with regards to the Gold Trail Clubhouse. However, it states again that no mitigation measures are required.

k) Page 11-45, mitigations are required for filling wetlands under the Clean Water Act. Therefore, the fact that the EIR states that mitigations are not required is misleading.

31) With regards to the Chapter 12 (Aesthetics), additional computer simulations should be incorporated to aid the public and the decisionmakers in deciphering the impacts on the viewshed. Only very limited computer generated pictures are provided. However, many views of the parcel will be impacted. Since a few computer generated pictures 31

were presented, others can certainly be included.

32) The DEIR lacks a discussion of general wildlife impacts animals in and around the parcel. Much of the wildlife analysis focuses on special status species. But, many other types of wildlife exist in and around the project site. The DEIR fails to adequately analyze the impacts on these animals. 32

33) In the list of alternatives, including reduced housing or more clustered development should be considered. According to state CEQA guidelines, the discussion must focus on alternatives capable of eliminating any significant adverse environmental effects or reducing them to a level of insignificance, even if such alternatives would be more costly or to some degree would impede the project's objectives. *See* CEQA Guidelines, sec. 15126(d)(3). In other words, alternatives that achieve the projects "basic" objectives are required, even if they impede to some degree the proposed objectives. Therefore, another alternative must be considered. A reasonable range of alternatives are not considered. The project objectives on page 20-2 ar narrowly tailored to prevent further consideration of alternatives under CEQA. Moreover, the screening criteria considers revenues as essential to the analysis. this has squelched consideration of truly environmental alternatives. 33

34) The project description and disclosure of the project is inadequate. The name of the EIR alone conjures up images of a vast preserve. The realities contradict this. Members of the public believe that an 18,00 acre preserve is being created. However, as stated in earlier comments, this is illusory. The project objectives must more aptly describe the project as a development, rather than a preserve. Without major project description changes, the EIR fails as an informational document and is more aptly described as propaganda. 34

35) The actual project description must be more adequately described. The lots and their conservation easements and the "wildlands must be properly mapped out. The inclusion of maps with "settled lands" and preserved lands does not include the individual homeowners property boundaries that will have conservation easements. 35

36) No where in the EIR are human/animal conflicts discussed. Homeowners will not want to live among mountain lions. Therefore, there may be more depredation permits issued by the Department of Fish and Game to eradicate what are perceived as animal pests or hazardous situations. As another example, people who lose there roses to the first wandering deer will want deer populations controlled. The EIR must address these and other similar issues. 36

37) The DEIR needs to address the fact that in the event of wildfire raging out of control, that there will be inadequate fire and evacuation services. 37

38) The EIR needs to state more clearly what type of development is being permitted within building envelopes. Could a large home, guest cottage and other accessory living quarters be built? The Board of Supervisors Resolution with respect to this project speaks of "units." However, this is unclear from the current plans as to whether this project will be in compliance with that resolution. 38

39) The DEIR fails to adequately address the water quality problems associated with pesticide runoff from the proposed golf course. The DEIR must address this issue in its entirety. 39

40) The proposed project could hardly be considered clustered development with parcels as huge as those that are proposed (i.e., 100 acre parcels). This is inconsistent with the Board of Supervisors resolution and must be stated in the EIR as an inconsistency. 40

41) Chapter 11 is one of the poorest biological analyses I have seen for a project of this magnitude. A dearth of information is buried in reports not included with the EIR. Total reliance on the consultant is necessary. The public, however, is entitled to scrutinize the analysis that forms the basis for the conclusions. This chapter needs major revisions, and recirculation among the public, in order to comply with CEQA. 41

42) Other conclusions in the EIR are unsupported by analysis. These corrections must be made in order to comply with CEQA. 42

43) Page 20-13, the No Project alternative would not fragment habitat and riparian areas as the proposed project would. Therefore, this discussion must be included in this analysis. 43

44) Page 20-14, the Existing Lots of Record alternative is skewed heavily toward the high side to justify this project. Given that the majority of the project is greater than 30% slope, terrain makes development on the high side (522) unrealistic. (The DEIR also states on page 20-15 that many existing lots of record are in the steepest areas of Rancho San Carlos). The result is that the DEIR is using a higher mean than is necessary. This should reflect the realities of how the existing lots of record are plotted and the realities of access given roads and infrastructure. The DEIR needs to lower the mean to do proper analysis. 44

45) Page 20-14, assume that no resource management plans will be implemented. However, there will be other additional environmental protection measures implemented to meet county and state regulations as with any subdivision. So to state that no measures will be taken would be disingenuous. Therefore, the DEIR must reflect what would be required for subdivision and development of the existing lots of record. 45

46) Page 20-16 states that the existing lots of record alternative does not assume architectural controls. This is faulty analysis. The existing lots of record are not exempt from subdivision and development regulations. Therefore, the analysis cannot assume no controls at all. This type of analysis must be deleted and replaced with the correct analysis. 46

47) Finally, the Sierra Club insists that the project address the loss of bird habitat in the San Francisquito Flat region of the project. According to the Atlas of the Breeding Birds of Monterey County, (Roberson and Teney 1993), this region of the project has the highest diversity of actual breeding birds in the entire County of Monterey. Therefore, the DEIR, by failing to address this fact, leaves out critical scientific information and associated impacts of development in the San Francisquito Flat area. The EIR must address these impacts and that fact that much of the development proposed is in this area. 47

Thank you for your consideration of our comments. We appreciate the opportunity for input with regards to this project.

Sincerely,

William Parkin
Attorney at Law

1. Refer to the response to Comment 1 from Brian Finegan.

2. The county disagrees with this assertion. The EIR identifies beneficial, less-than-significant, and significant impacts and does not give greater weight to these beneficial impacts. Beneficial impacts are impacts of the project that would be beneficial to the environment. Less-than-significant impacts are adverse impacts that do not exceed thresholds of significance. Significant impacts are impacts that exceed thresholds of significance.

3. The EIR does contain summaries of the information that is incorporated by reference as required by CEQA (Guidelines Section 15150). The information incorporated by reference is available for public review at the Monterey County Planning and Building Inspection Department. Full bibliographic citations were also provided for all cited material in the EIR. Furthermore, State CEQA Guidelines Section 15006 states that public agencies should reduce the length of EIRs, prepare analytic rather than encyclopedic EIRs; Section 15147 states that the information contained in an EIR shall include summarized technical data; Section 15148 states that preparation of EIRs is dependent on information from many sources, including engineering and scientific reports, but such documents should be cited but not included in the EIR.

4. The vesting tentative map (VTM) indicates two public trails. One is the Carmel River Trail (proposed by Monterey County Department of Public Works) and the other is proposed by the project applicant to link two public areas (Robinson Canyon Road and Garland Park) via Peñon Peak/Sid Ormsby Lookout Tower. The applicant is supportive of the county's proposed Carmel River Trail, but the timing of funding, implementation, and precise location of the alignment remain to be resolved.

   The VTM shows a second proposed trail connecting Garland Park and Robinson Canyon Road via Peñon Peak and Ormsby Lookout. However, due to potential impacts on archaeological resources and increased traffic on Robinson Canyon Road, other trail opportunities are being explored with the Monterey Peninsula Regional Park District (MPRPD) and the conceptual alignment on the VTM is no longer current.

   Recently, the applicant and MPRPD have concurred on the approximate alignment of five trail segments that would connect dead-end trail segments that originate in Garland Ranch Regional Park through the project site and connect back with other dead-end segments in the park. The proposed trail segments provide trail access through the project site as follows:

   - Fom the Snively's Ridge Trail to the Ormsby Lookout and down the west side of Las Garzas Canyon to connect with the Garzas Canyon Trail, this trail would pass through chaparral, grassland, oak savanna, and riparian areas.

- From the MPRPD "Fish" parcel road easement through the project site down the east side of Garzas Canyon to reconnect with the Garzas Canyon Trail, this trail would pass through oak woodlands, chaparral, and riparian areas. Half of this trail would follow an existing road easement.

- From the upper "Fish" parcel through the project site, just below Lot 251 to the MPRPD property easterly of the project site, this trail passes through oak woodland and oak forest.
- From upper Garland Park through the project site, just below Lots 253 and 254 to connect with the Vasquez Trail, this trail would pass through oak woodland.

- From the MPRPD's Kahn Ranch, looping through Rancho San Carlos below Lot 250 and reconnecting with the Kahn Ranch, this trail passes through riparian and some oak woodland areas.

The primary impacts associated with trail construction include loss of habitat and increased erosion potential. However, through appropriate construction and siting techniques these impacts would not be significant. To minimize environmental impacts for the five alignments discussed above, the applicant and MPRPD agree that trails will be surveyed for special-status species, cleared by hand labor, would be constructed with water bars, and switchbacked and outsloped in areas of steep topography. No known archaeological sites are located along the proposed alignments.

These techniques would also be employed by the applicant for the Carmel Valley Trail if and when funding and implementation occurs.

5. The description of phasing clearly identifies the process of establishing the preserve. There is no basis for evaluating a possibility that the applicant will not proceed with certain project components and later seek an amendment to increase uses. State CEQA Guidelines Sections 15144 and 15145 on forecasting and speculation state that a lead agency is not required to predict the unforeseeable. Refer to the response to Comment 4 from the Carmel Valley Property Owners.

6. The description of the preserve is accurate and not misleading.

7. The proposed project will not conflict with an established recreational use of the surrounding areas; there are no roads or other elements of the proposed project that would cross or otherwise pose land use conflicts with Los Padres National Forest, Ventana Wilderness, or Garland Ranch Regional Park. The Santa Lucia Preserve will convert approximately 2,000 acres of land and leave approximately 18,000 acres of land in open space. This open space will involve limited public recreational and educational access and intensive resource management; these uses are consistent and highly compatible with the surrounding parklands.

8. Although this observation is true, no significant land use conflicts are anticipated for the reasons stated in the EIR.

9. The EIR analyzes only the policies that apply to the proposed project and fully discloses its consistency with those policies.

10. This approval was not for the septic systems themselves; rather, the approval was for suitability. The County Division of Environmental Health approved the suitability of the lots for septic systems. No discretionary action occurred, and therefore no violation of CEQA occurred.

11. The recent decision by the California State Water Resources Control Board (SWRCB) does not affect the area to be occupied by the Rancho San Carlos development. The SWRCB decision affects the groundwater in the alluvium under the river, as delineated in the figures provided with the decision. Rancho San Carlos will be pumping percolating groundwater, which is only regulated to the extent that it must be put to a reasonable and beneficial use, and this development qualifies for that.

12. The mitigation measure described on page 9-24 of the EIR includes monitoring water quality and identifying sources and modifying turf or other management activities if standards are exceeded. Mitigation measures cannot be proposed without an understanding of the specific mechanism causing exceedance of standards. Oversight by the regional water quality control board (RWQCB) and the county will ensure that the water resources are protected.

13. It may be overly restrictive to limit construction during the rainy season, typically October through April. If the project applicant can develop a plan to prevent stormwater pollution in accordance with the requirements of the RWQCB and the county, construction during the rainy season may be allowed.

14. The proposed project includes the implementation of all applicant proposed mitigation measures, including the control of invasive exotics, a measure which was voluntarily proposed by the applicant. The conditions of project approval will be determined by the Monterey County Board of Supervisors.

15. Please refer to response to Comment 1 from CNPS.

16. The draft EIR (page 11-39) does not ". . . state that free roaming dogs and feral cats will cause indirect impacts to the native wildlife. . . ." Free-roaming dogs and feral cats are identified as a potential indirect impact mechanism that, if left unmitigated, could have adverse impacts on native wildlife. Mitigation measures for this potential impact were identified as "enforcing strict leash laws that would confine dogs to areas immediately adjacent to developed sites, or the direct leash control of their owners . . . ." Thus, free-roaming dogs and feral cats will be captured and taken from the preserve if they are observed there (Froke pers. comm.).

17. Wandering feral and domestic cats will not be permitted at the preserve. Homeowners will be obliged to control their cats with leashes or other appropriate constraints when the animals are outside the building envelope, and must agree to this requirement as a condition of joining the Conservancy. This rule will be enforced by removal of free-ranging cats after their owners have been warned. In reality, however, cats that roam from protected home sites into wildland settings have extremely low survival rates due to predation by bobcats and coyotes. Thus, natural predators should have the effect of controlling unwanted populations of wandering cats at the preserve.

18. The Stewardship Company will be responsible for providing security service for the proposed project.

19. The Monterey County Board of Supervisors will consider this method to enforce mitigation measures when it takes action on the project.

20. The loss of scrub community is addressed on page 11-43 of the draft EIR. Approximately 1% of scrubs on the project site may be lost or degraded by implementation of the project. Most of the coastal scrub occurs in the coastal zone in the northwestern portion of the project site, where very little area is designated as settled lands.

21. Riparian and wetland habitats were recognized as important native communities by the project applicant during the planning process and were largely avoided. The impacts on riparian habitats largely result from road crossings. Relative to the entire project site, only a small percentage of wetland and riparian areas may be lost or degraded, and the greater majority of these habitats will remain preserved intact and contiguous. Additionally, the applicant has opted to fully compensate for the loss or degradation of any riparian and wetland habitats, even though the loss is considered less than significant and no mitigation is required under CEQA (refer to pages 11-45 and 11-46 of the draft EIR).

22. The benefit of a project of this size that will develop only a small percentage of the natural habitat available is that a very large expanse (almost 18,000 acres) will be preserved in perpetuity. It must also be taken into account that a worst-case scenario approach was taken for the impact analysis such that it was assumed all settled lands could be lost or degraded. In reality, however, it is unlikely that future property owners would have such an impact on their lands.

23. Refer to the responses to the Comment 227 from Bruce Dormody and Comment 2 from the California Native Plant Society. The impacts on wetlands were considered less than significant for the reasons stated in the EIR. However, the mitigation proposed by the applicant may satisfy the U.S. Army Corps of Engineers (Corps) requirements for the fill of wetlands under Section 404 of the Clean Water Act, but this issue will be addressed when the applicant applies to the Corps for a permit to initiate such activities.

24. The draft EIR accurately states the basis for determining whether special-status species will be affected by project implementation. BioSystems Analysis (1994) provided information on the occurrence of special-status species and impacts that would result from the project.

25. Please refer to the responses to Comments 4 from Lunt and 220 from Bruce Dormody. Badgers are no longer considered species of special concern, according to DFG (Comment 10 from Aasen).

26. The future use of these trails is not known and CEQA states that lead agencies are not required to predict the unforeseeable. However, it is likely that trail use will increase in the future for the factors raised in the comment. The visual impact of the project on trail users is considered adverse but still less than significant because the proposed development would be in the middle and background distance viewing zones, would only be visible from portions of the trail, and includes large amounts of area visible from these trails that would remain in open space.

27. The EIR states that views from recreational trails are generally assessed as having high visual sensitivity. However, the EIR also considered the distance of the proposed project from the trail, the use of the trail, the duration of views, and the amount of open space that would be visible and concluded that the impact would be less than significant.

28. The EIR concludes that the impact on views from trails in Garland Ranch Regional Park was less than significant for the reasons stated in the EIR and summarized in response to Comment 26. To reach stretches of trail that have a view of the project site would involve long, strenuous hiking on Vasquez Trail or Snively Ridge. The commenter is correct that the actual number of hikers is not known.

29. Refer to the response to Comment 1 from the City of Carmel-by-the-Sea.

30. Because the application for the project included the resource management plan, erosion control plans, and forest management plan, many typical mitigation measures were already built into the project design. The EIR distinguishes those mitigation measures that were part of the application and part of the project from those that were determined to be proposed for implementation and those recommended in the EIR. This is the case for all specific references made in this comment.

31. CEQA does not require the use of computer-aided visual simulations or therefore any specific number of simulations. This tool is relatively expensive to employ and was used to demonstrate impacts at key public viewing areas.

32. This comment incorrectly states that the draft EIR lacks a discussion of general wildlife impacts. Discussions of wildlife use of all major habitats at the preserve are provided in the "Setting" section of Chapter 11 in the draft EIR (pages 11-2 to 11-16). Potential impacts on

these species and appropriate mitigation measures are evaluated on pages 11-35 to 11-47 of the draft EIR.

33. A reasonable range of alternatives has been considered. The range of alternatives must have substantial advantages over the proposed project and be feasibly accomplished in a successful manner considering *economic*, environmental, social, technological, and legal factors. The only reduced housing alternative that would substantially reduce environmental impacts would be considered infeasible in light of the financial relationship between the preserve and the residential development. In other words, a substantially reduced housing alternative would not provide the economic engine required to support the preserve. A dense cluster alternative was considered in the screening of alternatives.

34. The applicant is entitled to name the project as it desires. The proposed project would result in 18,000 acres in open space owned and managed by the proposed Conservancy. The fact that part of the open space would be accomplished through conservation easements does not diminish the value of the open space or cause adverse environmental impacts.

35. Homelands and lot lines are shown on Figure 2-4 in Chapter 2, "Project Description", of the EIR. The full set of VTMs are available for public review at the Monterey County Planning and Building Inspection Department.

36. Homeowners will be living in mountain lion habitat and requests for depredation permits could increase. Home sites, however, may be fenced and pets will not be permitted outside confined areas. Because the lions will not be attracted to the home sites for potential prey, they will probably avoid settled areas in favor of the remaining open space areas. Homeowners will be provided with information on avoiding conflicts with mountain lions.

37. The proposed project is consistent with CDF and county standards for wildfire prevention and road design. The Fire Safety Management Plan discusses the road network created on the VTM that provides safe ingress for firefighting personnel and equipment and also identifies safe egress for residents. An emergency evacuation plan will be created for the homeowners living in various regions of the property on a lot-by-lot basis, as well as those using or working in the commercial and recreational areas of the Santa Lucia Preserve.

38. Refer to the response to Comment 9 from Monterey Peninsula Water Management District.

39. Refer to the response to Comment 56 of David Dilworth (July 1-7, 1995).

40. Refer to the response to Comment 5 from the Sierra Club, Ventana Chapter.

41. Refer to the response to Comment 3 above.

42. The comment is not specific, so a specific response is not possible.

43. The EIR states that no impacts on biological resources would occur under the No-Project Alternative.

44. The rationale for selecting the mean was provided in the EIR and not skewed heavily to justify this project. Refer to the response to Comment 6 from Alexander T. Henson.

45. It was not assumed that the existing lots of record would be developed as one subdivision. Rather, the existing lots of record could be developed on individual ownership basis. Refer to the response to Comment 6 from Alexander T. Henson.

46. Refer to the response to Comment 45 above.

47. It is true that the San Francisquito Flat area is a prime bird habitat area (Roberson and Tenney 1993). The proposed project, however, will protect most of the important bird habitat areas. Current management has reduced grazing pressure and selective fencing of sensitive wetland areas such as Moore's Lake. Thus, potential bird habitats could actually increase in this area if the project is implemented.

SIERRA CLUB ~ VENTANA CHAPTER

P O BOX 5667 CARMEL CALIFORNIA 93921

CHAPTER OFFICE ENVIRONMENTAL CENTER (408) 624-8032

Monterey County Planning Department
Wanda Hickman

RE: EIR No 94-005

Summary: *We find the EIR astoundingly understates and under analyzes the potential impacts of the proposed development. We request a thorough supplemental EIR so the public is properly informed of the magnitude of impacts this project would impose upon the land and the community, if implemented.* 1

Figure 2-3: Notes three and four incorrectly state," not to exceed 350 Acres..." "Acres" should read " Units." 2

Pge 2-7, Project Characteristics: Para. 2 points out that the EIR evaluates the entire development plan, although the current application is only for the GMPAP Please answer the following, which are not evaluated by the EIR: 3

- What are the environmental implications of splitting the permitting?
- For example, does this make it more likely that the density of the Carmel Valley Master Plan and Coastal Zone areas could be increased beyond the numbers stated in the current plan, application and evaluated in this EIR?
- What steps would be required under current law for this to occur (e.g. public hearing, new EIR, supervisor's approval, etc.)?
- In fact, let's apply that question to the GMPAP: With what process can any of the significant restrictions of the Board of Supervisor's Resolution 93-115 (Limit on units, #s of acres in preserve, etc.) be lifted, removed or modified? Can such changes be made at any point in the "phasing? "What are the environmental implications and potential impacts of such ease or difficulty of change?

Figure 2-4 shows the project **phasing**, which is further discussed on page 2-13. Presumably the phasing would follow the numbers in sequence. Is that mandatory? If not, what are the implications, environmental, socio-economic, etc. of the phasing occurring in some other order than the one shown? 4

Page 3-24, para d. It is stated that the project as proposed is consistent with the resolution of the Board of Supervisors that mandates "**clustering.**" We believe the intention of the Board was that the project would only minimally break apart 5

To explore, enjoy, and preserve the nation's forests, waters, wildlife and wilderness

the animal corridors, plant stands and large expanses of lands that are the beauty of the Rancho. Referring to Figure 3-2 and other figures throughout the EIR, we observe that while some of what may be seen as clustering occurs in the vicinity of Robinson Canyon and Rancho San Carlos Road, most if not all of the remaining units of housing are quite distant one from another, and are not "clustered" at all. 5

- How does this meet the definition of "Clustering?"
- Recognizing that this is not clustered development, what is the impact upon animal, scenic, traffic, water , etc. resources and upon infrastructure requirements?

More importantly, perhaps, we observe with great dismay that the various units of the Rancho stretch widely to most of the corners of the property.

- How can this possibly meet the criterion of "clustering?"
- As it obviously does not, what are the impacts on wildlife, scenic resources, traffic, air quality, neighboring properties, etc.?
- What is the definition of "clustering?"

We believe, as should be obvious from the above questions, that the intentions of the Board of Supervisors in imposing the restrictions to clustering of development is being egregiously ignored. Barring satisfactory response to those questions, we request the following **mitigation:**

- **All development be restricted to areas of the Rancho west of Robinson Canyon Road.**
- **All development occur in true clusters near already developed areas , which would be close to Carmel Valley in the CV Master Plan area, and near the current ranch house.**

Page 3-25, para g. Use of Robinson Canyon Road. Project is said to be consistent with Supervisor's ruling 93-115. The ruling states, "Robinson Canyon Road should be used for emergency access and agricultural ranch operations on Rancho San Carlos." Further, use of Robinson Canyon Road shall be "minimized." 6

- How many units of housing and other facilities are east of Robinson Canyon Road?
- How many trips per day are generated by those components of the proposed project?

We presume, not seeing any indication to the contrary, that all this traffic must enter **Robinson Canyon Road** in order to access Rancho San Carlos Road and exit the Rancho.

- That being so, how do the writers of the EIR conclude that the project is consistent with the stated desire of the Board to "minimize" use of this road, and that its function will be for emergency and ag uses?

- **No development, including commercial, facilities and inclusionary housing, that exits onto Robinson Canyon Road, except for emergency purposes, as intended by the Supervisor's Resolution.** 7
- **In the event the first mitigation above is not implemented, internal roads that abut Robinson Canyon road shall be provided with an underpass to the west side of Robinson Canyon to feeder roads to Rancho San Carlos Road.**

General Comment on EIR Traffic Mitigations:

The EIR concludes that all traffic impacts are reduced to a less than significant level through implementation of a variety of mitigation measures that require a payment of a fee by the applicant to a public entity. CEQA does not acknowledge that a payment of a fee for a future mitigation with no reasonable timeframe for implementation will reduce an impact to a less-than-significant level. CEQA would instead conclude that the payment of the fee would be appropriate but that a statement of overriding consideration will be required because of the uncertainty associated with the timing of the mitigation. This applies to all mitigations in the EIR with no reasonable and foreseeable implementation timeframe. 8

In addition, the EIR must discuss, based on current payment frequency and amount paid by applicants to fulfill County Resolution No. 92-395, when CV Road segments will receive adequate funding to accommodate road work (3 years, 5 years, 15 years?).

Traffic:

Page 13-4 Table 13-1

Please explain in more detail what Percent Time Delay means and what Density or Volume to Capacity means. 9

Page 13-15: Second full paragraph

The author must refrain from stating an opinion about the construction of passing lanes in Segments 6 and 7. The author states in this paragraph, "construction of passing lanes on segments 6 and 7 would improve their operating conditions". It is at best nebulous that providing passing lanes will improve service. It is most likely that passing lanes will make collisions on CV Road more common and more violent due to increased speeds on Carmel Valley Road. 10

It is an equally valid claim to state in the EIR that the construction of passing lanes in segment 6 will not result in an improvement of operating conditions, but will instead increase vehicle conflicts and worsen traffic conditions.

Sierra Club, Rancho San Carlos 5

Segment 6 contains two high traffic generators which are separated by a relatively short length of curving two-lane road (i.e., mid-valley shopping center on one end of segment 6 and the Carmelo School, Carmel Valley Manor and Mid-Valley Fire Department on the other end of segment 6). Furthermore, there is a posted speed limit in the area of Carmel Valley Manor (45 mph). Adding passing lanes to segment 6 will encourage some drivers who currently can travel at a high rate of speed (50 - 60 mph during the peak hour; faster during other hours of the day),to travel at a higher rate of speed in an area absolutely inappropriate for high rates of speed because of the land uses, the posted 45 mph speed limit and the curves in the road which limit site distance. 10

For example, drivers traveling west at 55 mph in the area of mid-valley shopping center who want to pass a vehicle also traveling west will have to increase their speed to overtake the platoon of cars ahead and quickly decrease their speed as they enter the 45 mph zone in the area of Carmel Valley Manor. This action will increase the probability of accidents in Segment 6. Segment 6 also has curves that decrease visibility for both CV Road travelers and those entering CV Road from private driveways. Providing passing lanes will encourage an even higher rate of speed on a roadway and increase the frequency of vehicle collisions and their severity.

Passing lanes would accommodate unnecessary passing on CV Road and would increase the severity of vehicle collisions at the shopping center and Carmel Valley Manor areas, as well as increase the severity of collisions between CV Road traffic and those local residents trying to get on and off CV Road.

In conclusion, We request that all reference in the EIR that passing lanes on CV Road will improve operating conditions be omitted.

Regarding water, the Board of Supervisors Resolution on page 3-25 states that the development shall have no adverse impact on the off-site water resources.. Well E-3, on page 8-24 accounts for the largest flow of water of all the wells on the ranch. This well is not a deep groundwater well, but taps the alluvial flow of Garzas Creek, which is part of the Carmel watershed. 11

- Why is the hydrology still "consistent" with the Order? The extraction of water from Garzas Creek obviously impacts the flow of water to the Carmel River adversely. Please explain.

Aesthetics, General Comment:

The discussion must include the impacts the project will have on the viewshed of Laureles Grade, Carmel Valley Road and Highway 1. What future lots will impact the viewshed of these roadways? 12

Sierra Club, Rancho San Carlos 6

Page 13-32: Golf Trail ;It must be stated why 374 rounds per weekday was selected relative to a higher or lower number. What is the maximum number of rounds per day the golf course could possibly attain if operated at maximum play? Also, it is reasonable to conclude that the rounds of play per day will increase over time due to interest by avid golfers and/or because the operators of the golf trail may require additional income at some future date. To facilitate an increase in income, the operator will encourage additional rounds per day. This would result in increased traffic flows on area roadways that currently are not reflected in the EIR. 13

Page 13-33: Last paragraph 14

There is no Table 13-12

Air Quality, General Comment: The MBUAPCD estimates that grading and excavation activities generate 70 pounds per day per acre of PM10 emissions and watering down graded areas reduces PM10 emissions by as much as 50 percent. Also, the District's significance threshold for PM10 is 82 pounds per day. Therefore, the applicant will be restricted to grading, quarrying, or transporting over dirt roads whereby no more than approximately 2.5 acres may be disturbed per day, or a detailed analysis of PM10 emissions by activity may be provided by the applicant to the District based on current EPA accepted methodologies and models, indicating the project will not exceed the 82 lb/day threshold. 15

Mitigation Monitoring Program: It is a fact that the County Planning Department personnel are stretched to the maximum limit relative to their work load. A work load, that, to date, excludes a regular mitigation oversight program for all the projects in the County with mitigation monitoring programs.

1. How does the County Planning Department currently operate its mitigation monitoring program for the numerous projects currently operating in Monterey County? Evidence of the County's current program must be submitted to this commenter (c/o Sierra Club, Ventana Chpt.) as part of the response to comment to this EIR. 16

2. Who is the primary County employee responsible for existing monitoring? Who at the county will be responsible for monitoring the project for conformance to the mitigations?

3. What is the County's program for assuring that mitigations are implemented throughout the lifetime of the mitigations?

4. I request that the county's records be compiled immediately relating to current monitoring procedures and made available to this commenter for review.

Sierra Club, Rancho San Carlos 7

Alternatives: What is the "Environmentally Superior Alternative"(ESA)? If the "No Project" alternative is the ESA, then what is the ESA among the other alternatives? 17

General, and additionally:

We request that the Board of Supervisors require all preserve lands from all phasing segments be dedicated immediately upon initiation of the construction of the phase, whatever number that phase may have. 18

We find it difficult to believe that the EIR finds so few impacts and potential impacts, and so easily accepts mitigation's that hardly respond to the evident problems posed by so large and preposterous a proposal as this. The potential adverse impact upon the community is large and obvious, yet received a perfunctory and cursory scrutiny in this EIR. We request a supplemental EIR that addresses the problems thoroughly, and truly exposes to the community what is faces in such a project. 19

Please respond to: Don Gruber, 765 Palm Ave, Seaside, CA 93955

Sincerely,

Don Gruber

Don Gruber, Vice-Chair

DG/JF

1. The EIR adequately discloses environmental impacts consistent with CEQA.

2. This correction has been made in the final EIR.

3. Development within the Carmel Valley Master Plan and Coastal Zone area are contemplated at some future unknown time by the applicant. Development within these areas is also regulated by Monterey County Board Resolution No. 93-115 and no increase in density is contemplated or allowed. This EIR evaluates development within the Carmel Valley Master Plan and coastal zone in accordance with State CEQA Guidelines Section 15165. The county does not believe that the applications for just those portions of the project within the GMPAP will make it more likely that densities would increase in the other planning areas. There is no basis for such a conclusion. To increase densities in these other planning areas would require general plan amendments, rezonings, environmental review, public hearings, and board of supervisors approval. To increase densities within the GMPAP, a similar process would need to occur.

4. The EIR evaluates the project based on full buildout of GMPAP, Carmel Valley Master Plan, and coastal zone. Therefore, juxtaposition of the phasing would not cause new significant environmental impacts.

5. Monterey County Board of Supervisors will consider the consistency of the project with Resolution No. 93-115 and whether the proposed development meets the intent of the policy, which states:

> development shall be located in one or more clusters located in the least environmentally sensitive portions of the property.

It does not state that all development is to be located in one or two areas. In addition, the EIR considers a dense cluster alternative (refer to Chapter 20, "Alternatives"). Refer to Comment 1 from the California Native Plant Society for descriptions of low-density clusters and their probable effects on wildlife.

6. There are about 130 home sites proposed for the lands to the east of Robinson Canyon Road. These units are expected to generate about 870 daily trips. As specified in Resolution No. 93-115, the proposed project proposes to improve Rancho San Carlos Road as the main access for the project. The design and proposed improvement of the project will minimize use of Robinson Canyon Road by dedicating access rights along Robinson Canyon Road, avoiding development that would provide access on substandard sections of Robinson Canyon Road, developing interior roads that limit access to Robinson Canyon Road to east-west links through established ranch gates, improving Rancho San Carlos Road as a faster and

safer link to Carmel Valley, and the establishing a Traffic Management Association to manage onsite and offsite trip patterns.

7. The applicant's proposed measures listed in response to Comment 6 would minimize the project traffic on Robinson Canyon Road. An underpass of Robinson Canyon Road is not recommended because this connection is needed for emergency access. Furthermore, because no significant impact has been identified for Robinson Canyon Road, mitigation in the form of an underpass is not required.

8. Refer to the response to Comment 21 from Carmel Valley Property Owners.

9. "Percent Time Delay" is the average percent of the total travel time that all motorists are delayed in platoons while traveling a given section of road. Motorists are defined to be delayed when traveling behind a platoon leader at speeds less than their desired speed, and when vehicles are following another vehicle by less than 5 seconds.

   "Density" represents the number of vehicles occupying a given length of lane or roadway averaged over time, usually expressed as vehicles per mile per lane.

   "Volume/Capacity (V/C)" represents the ratio of demand flow rate to capacity for a traffic facility.

10. This sentence has been modified to indicate that studies conducted by the county support these conclusions.

11. This impact is evaluated on pages 8-57 through 8-60 of the draft EIR.

12. These areas are described in the "Regional Visual Resources" and "Visual Resources of the Project Area and Site" section in the draft EIR on page 12-7. Laureles Grade, Carmel Valley Road, and Highway 1 are located at distances and/or elevations that lead to the conclusion that visual impacts from these areas are not significant.

13. The number cited in the comment is incorrect; a decimal point is missing. The correct number is 37.4 rounds/weekday was determined based on the desired intensity of play at 15,000 rounds/year. Based on experience at other similar private clubs on the Monterey Peninsula, weekday golf would represent approximately 65% of total play (i.e., 9,750 rounds). Assuming 261 weekdays in a year, an average of 37.4 rounds/weekday was determined. The maximum number of rounds per day the golf course could possibly handle is not useful for the EIR analysis and is not provided. There is no evidence to support the assertion that golf play would increase over the desired 15,000 rounds/year.

14. Table 13-12 in Chapter 13, "Traffic", is included in the final EIR.

15. Comment noted.

16. Mitigation monitoring programs are generally prepared by the project planner or consultant during the environmental review process. Monitoring programs are specific to a project and contain the following elements consistent with State CEQA Guidelines:

- monitoring program timetable - identifies those measures that need short-term monitoring (program does not exceed 1 year beyond the completion of the project) and those that are long term (measures that will need monitoring well beyond the completion of the project). The timetable must be specific for each measure and identify specific dates or time intervals for inspection/reporting;

- reporting methods/forms - divides the measures into different but specific types of inspection/reporting programs;

- responsible party - indicates a responsible party and financial provisions for the monitoring-inspection-reporting program; and

- responsible/concerned agencies/departments/institutions - identifies entities concerned with a particular issue area.

Public Resources Code Section 21081.6 stipulates that a public agency, in approving a project for which feasible mitigation measures have been adopted, shall provide that such measures are fully enforceable through permit conditions, agreements, or other measures.

Monterey County enforces mitigation measures through permit conditions, agreements, or project design.

17. The environmentally superior alternative is considered the No-Golf Trail Alternative.

18. The board of supervisors will consider this recommendation when it takes action on the proposed project.

19. The Monterey County Board of Supervisors will consider the certification of the EIR as legally adequate at a public hearing.

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Ms. Wanda Hickman
Monterey County Planning, Building, and Inspection Department
240 Church St.
North Wing Suite 116
Salinas, Ca. 93901

July 6, 1995

Dear Ms. Hickman,

We would like to submit for the Monterey Planning Department's consideration, our comments on the draft EIR for the Santa Lucia Preserve. The general concept of the Preserve, where land preservation is a central feature of a development plan, is laudable. While the concept is commendable, and we should feel fortunate that the Monterey County Board of Supervisors have given explicit guidelines in the GMPAP for development of this region, we believe the Rancho San Carlos Partnership has fallen far short in proposing a development plan that accomplishes true habitat preservation. The Santa Lucia Property is very large, and presents an opportunity to create a preserve that truly benefits the flora and fauna of the region. Unfortunately, the Rancho San Carlos Partnership has apparently failed to incorporate into the project design basic concepts of Conservation Biology which can be found in introductory textbooks (e.g. Primack 1993), and more specific guidelines in planning and preserve design (e.g. Soulé, M.E. 1991. Land Use Planning and Wildlife Maintenance. Journal of the American Planning Association 57(3):313-323. Copy attached). As a result, the project as proposed will likely lead to significant habitat degradation and fragmentation of the Santa Lucia region. The end result will be a substantial decline of the biodiversity of the region, particularly in certain habitat types. We would like to raise two general concept and design concerns: 1) habitat isolation and fragmentation, and 2) increase in introduced non-native and human-associated pest species. We then follow up with a few specific points raised in our review of the EIR, and some general suggestions that could be used as guidelines in the modification of the plan.

Habitat Isolation and Fragmentation

The impact of habitat fragmentation has become more familiar to the general public as we have learned about the effects of the clearing of tropical forests for human habitation and agriculture. Habitat loss or fragmentation are some of the leading causes of the reduction in the number of individuals and diversity of species today (e.g. Norton 1986), and a large number of field studies have shown that habitat fragmentation from urban development and other human activities results in significant declines in species richness (e.g. Whitcomb et al. 1981; Wilcove et al. 1986; Soulé et al. 1988; Wilcove 1988; Robbins et al. 1989; Terborgh 1989). Fragmentation leads to significant changes in original habitats through: 1) an increase in the amount of edge

habitat which alters habitat microclimate and is generally preferred by introduced non-native and pest species, 2) decreasing the proximity of all areas of the habitat from the edge, 3) limiting the dispersal and colonization of species, 4) decreasing the foraging ability of widely ranging animals through restriction of access to widely distributed resources, 5) division of populations into subpopulations more vulnerable to extinction, 6) increasing the proximity of wild and domestic populations leading to disease transfer.

Fragmentation can occur at different spatial scales, and the proposed plan will, we believe, lead to significant fragmentation of all of the habitats on the scale of the Santa Lucia Property. As proposed, the development will intersperse significant human development throughout the property. In addition to the dwellings and buildings themselves, roads and driveways will be constructed throughout. The end result of this type of development and criss-crossing of roads is the fragmentation of what was once a continuous habitat without barriers to dispersal (Figure 1). Fragmentation degrades the quality of the habitat from what it once was, and we expect a decline in the number of individuals and diversity of species in the entire property as a result. Species with limited abilities to disperse (e.g. reptiles and amphibians), or species that are restricted to certain habitat types (e.g. willow flycatcher) would be faced with unsurmountable barriers and thus have sub-populations doomed to extinction. Large carnivores (e.g. mountain lions and bears) must range over large areas in search of dispersed prey. Fragmentation through the construction of barriers (e.g. roads, development) to these movements effectively reduces the available habitat for these species, and limits the ability of the habitat to support them. In addition, significant mortality of large carnivores results from road kills. For example, urbanization in Southern California fragmented and isolated mountain lion habitat in the San Joaquin Hills in the late 1970's, and mountain lions were extinct in this fragment by June 1990 (Beier and Barret 1990). Mapping the movement corridors of key species found on the property would be a logical first step in understanding the potential impacts of fragmention through the construction of barriers.

If habitats are surrounded by human development, they essentially become habitat islands in a sea of altered habitat. Such isolated patches of habitat are unable to sustain the diversity and abundance of species prior to isolation, and the populations within are more susceptible to extinction (Soulé and Simberloff 1986). Due to slope restrictions, a limited amount of acreage on the Rancho San Carlos property may be developed. Thus, development is concentrated in regions of less than 30% slope; the same regions that water aggregates to create wetland and riparian habitats. One of the major problems with the overall development plan is that the proposed development will effectively encircle and isolate most of the wetland and riparian habitats on the property (Figure 1). The surrounding development will serve as a barrier to access and dispersal to and from the wetland/riparian habitat. In some instances, it is proposed that the wetland areas will actually be fenced off. This will ultimately lead to a decrease in the number and diversity of species that inhabit the area. In addition, close proximity to human development will lead to habitat degradation from human presence, non-point source pollution, human encroachment, and introduction of non-native and pest species (see below). Loss of riparian habitat is of particular concern because approximately 90% of the original riparian habitat of California has been destroyed (Jensen et al. 1990).

Such fragmentation and isolation cannot be mitigated except by efforts to avoid scattering human development throughout a preserve. To avoid this fragmentation problem, the San Carlos development should be redesigned to concentrate all of the human development and activities in a

much more limited geographical area, rather than throughout the property as has been proposed.

Introduction of Non-native Species and Increase of Pest Species

The introduction of non-native species is responsible for 39% of all recorded animal extinctions since 1600 for which a cause could be attributed (Tershy and Croll 1994). Both introduced species and increases of human-associated pest species can lead to severe declines and local extinction of native species of both plants and animals. For example, introduced Red Foxes (*Volpes volpes*) and Rats (*Rattus spp.)* have decimated populations of Snowy Plovers (*Charadrius alexandrinus*) and California Clapper Rails (*Rallus longirostris*) in California (Biosystems 1994). The introduction of the prickly pear cactus (*Opuntia sp.*) into Australia from South America (initially as an ornamental plant) has led to its spread over tens of thousands of hectares of grazing land (Primack 1993).

House Sparrows (*Passer domesticus*) and Starlings (*Sturnus vulgaris*) competitively exclude native species for nest sites and foraging areas (Terborgh 1989). Human associated habitat edge species such as raccoons (*Procyon lotor*), opossums (*Didelphis marsupialis*), skunks (*Mephitus mephitus*), and some corvids are significant predators of native bird nests, and can contribute to the decline of song bird populations (Engels and Sexton 1994, Terborgh 1989). Brown-headed Cowbirds (*Molothrus ater*), which are nest parasites, flourish in suburban habitat, especially in combination with backyard bird feeding and the presence of cattle or horses (Trail and Babtista 1993). They are one of the most serious threats to native songbirds (Trail and Babtista 1993, Terborgh 1989). All of these species are found in higher densities in habitat that is fragmented and mixed suburban/semi rural; precisely the type of modification proposed for the property.

Because of their close association with humans or human modified suburban habitat, the proposed development will increase the densities of some or all of these species on the property in question. This is a significant unavoidable impact which is not addressed by the EIR. Increased densities of any of these species on the property may also lead to increased densities of these species on adjacent land which is managed for wildlife. This significant unavoidable impact should also be addressed in the EIR. Specifically: 1) how will the development affect populations of each of the above listed species; 2) how can this impact be decreased by clumping development and therefore decreasing fragmentation; 3) how can other management actions such as significant cattle free areas, landscaping regulations, and guidelines against bird feeding reduce these impacts.

Additional Considerations

Domestic Pets

Domestic dogs and cats have been shown to have significant adverse impacts on native species of animal via both direct predation and excluding animals from foraging and traveling areas (e.g. Spencer and Goldsmith (1994). The proposed development would increase the density of domestic dogs and cats on the property leading to a significant unavoidable impact. The proposed mitigation measures are untested, not enforceable, and inadequate. Even a complete ban on dogs and cats in the development would be problematic due to enforcement difficulties. Thus, this significant unavoidable impact should be mitigated in other ways. Most logically by clustering any development and the associated negative impacts on a smaller portion of the

property.

Mesopredator Release

Factors associated with rural development such as fragmentation, roads, dogs, human activity, lighting, fences, and automobile traffic can decrease the abundance of large predators such as mountain lions (*Felis concolor*), and bobcats (*Lynx rufus)* (Beier 1993). These and other carnivores play an important role in structuring ecosystems because they regulate the numbers of small predatory species such as raccoons and foxes (Soulé 1988). In the absence of these large predators, smaller predators can increase in numbers and cause the local extinction of prey species (Soulé 1988). When these local extinctions take place in habitat fragments they are often permanent.

Increased numbers of small predators caused by decreased numbers of the large predators which control them, is a significant unavoidable impact which is not addressed in the proposed EIR.

Mitigation Efficacy

Many of the proposed mitigations are either too vague to evaluate, based on untested assumptions, or dependent on long-term, laborious maintenance and follow through. For example, it is impossible to evaluate the effectiveness of measures based on Best Management Practices when no additional information is given. There is no indication that mature trees can be replaced by newly planted saplings, even at a 5:1 ratio. Since these trees will be planted on sites where they do not now occur there is no indication that they will grow to maturity and viably reproduce. Leash laws, landscaping guidelines, and maintenance procedures must be effective and continued for at least 100 years. No provisions are made for long-term follow through, funding, or enforcement.

Statements of Minimal or No Impact

Tables 11-2 and 11-3 have statements of minimal or no impact which we consider questionable as they are based upon no supporting data. Such statements must be clearly substantiated by appropriate site-specific data, or else they cannot be considered valid.

Impacts of Roads

The direct and indirect negative impacts of roads on wildlife have been well documented (e.g. Eddington and Eddington 1986, Noss 1993). As a result, many conservationists feel that one of the primary proximate causes of biodiversity loss is the construction of new roads. Roads create easy access to formerly pristine areas for hunters, poachers, mushroom collectors, birdwatchers, and other visitors whose presence may decrease the use of an area by wildlife, cause trampling of sensitive vegetation, or erosion of stream banks. Roads can serve as significant barriers to dispersal for many small animals (Mader 1984), and more directly as a significant source of mortality to larger predators such as badgers and mountain lions. These well documented effects of roads are significant negative impacts which the EIR does not address. Mitigation measures such as designing a plan which minimize total road surface, avoiding crossing important migration corridors with roads, and avoiding bisecting sensitive habitats with roads are

not discussed. Most importantly, the EIR does not consider the edge effects of roads. To do so, roads, whether paved or not, should be concentrated so that 90% of the site shall be essentially *roadless*. Operationally, this means that 90% of quarter sections should be at least one mile from a road, and that roads should be concentrated in one or two areas. This is the simplest and perhaps the only way to satisfy the criteria of Board Resolution No. 93-115.

Residential Use of Pesticides and Herbicides

The EIR does not address the impact of runoff from residential gardens. Agricultural pesticide and herbicide use are well regulated, but there are no enforceable regulation on the frequency, timing, and volume of commercially available pesticides and herbicides used in residential gardens. Pesticide and herbicide use in residential gardens frequently exceeds that on commercial agricultural lands. The effects of pesticides alone can cause significant groundwater and surface water contamination, fishery losses, and losses of birds and other wildlife (Pimentel, et al. 1992).

Methods

In general, the methods used to survey wildlife and much of the wildlife data upon which the EIR is based were either inadequate, not readily available, or difficult to evaluate. This is particularly problematic for amphibian populations which are notorious for large fluctuations in abundance, episodic emergence, and long periods of estivation (Balaustein et al. 1994, Poubnds and Crump 1994). To more effectively evaluate the scientific merit of the statements made, the EIR should be based more on peer reviewed literature, and unpublished reports should be more easily available. We contacted Biosystems Co. in an effort to evaluate the wildlife evaluation methods. Unfortunately, they would not release any of their reports which were cited in the EIR (BioSystems 1992a, 1992b, 1994a, 1994b) because they were property of the Rancho San Carlos Partnership.

Suggestions

Unfortunately, we feel that the Rancho San Carlos Partnership has proposed a fairly typical development which barely exceeds the minimum requirements under zoning and planning guidelines, places profit above biological integrity, and is attempting to claim habitat preservation. As proposed, the development will likely lead to significant and irretrievable habitat loss and degradation. This is unfortunate, as the size of this property presents the opportunity to achieve significant conservation, given appropriate planning. If development is to take place, we believe that it is our responsibility as a community to completely redesign the development so that it truly preserves the biological integrity and diversity of the area. To do this we should proceed by attempting to: 1) represent all ecosystems (from small habitats to large landscape mosaics), 2) maintain viable populations of all native species (plant and animal, big and small), 3) maintain ecological and evolutionary processes, and 4) accommodate natural cycles of fluctuation and change (Noss 1993). It is a difficult challenge to meet these objectives while allowing some kinds of human development, but most conservation biologists agree that compatible human uses of the landscape can be included and encouraged in large-scale conservation planning. It is our opinion that most of the proposed mitigations are doomed to long term, large scale failure. The Rancho

San Carlos Property is a large and ecologically diverse system, and presents a unique opportunity to serve as an example of how human development and conservation can take place while minimizing destruction of nature. To realize this potential, we hope that the board of supervisors will ask the Rancho San Carlos Partnership to consider these comments as an opportunity to modify their plans to achieve true conservation. We thank you for the opportunity to review this important project, and ask for specific responses to our comments.

We are happy to provide a literature cited section upon request.

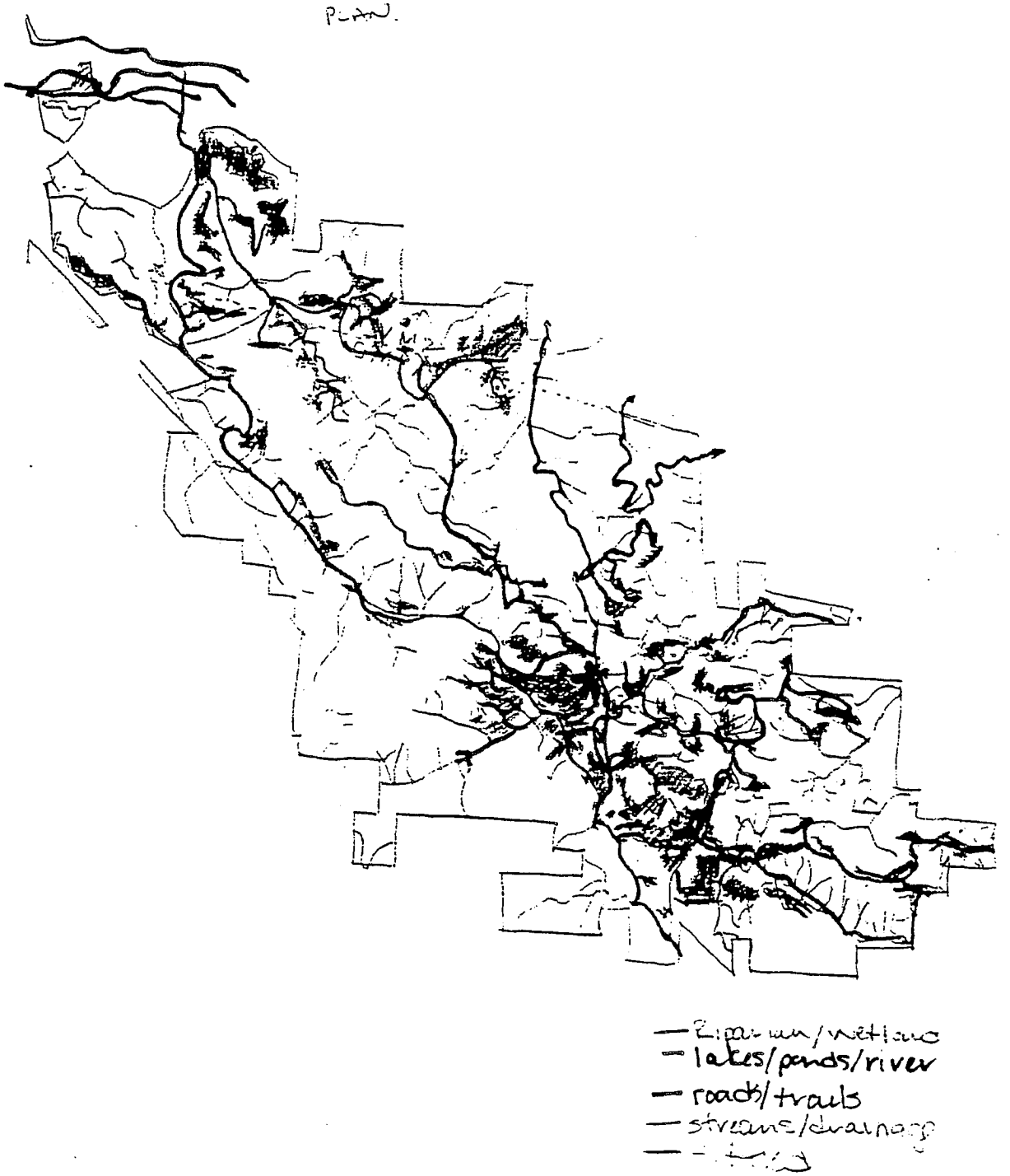
Sincerely,

Donald A. Croll, Ph.D.
Assistant Research Biologist

Bernie R. Tershy
Postgraduate Researcher

Michael E. Soulé, Ph.D.
Professor
Chair, Board of Environmental Studies

FIGURE 1: HABITAT FRAGMENTATION AND ISOLATION IN THE PROPOSED SANTA LUCIA PRESERVE DEVELOPMENT PLAN.



Land Use Planning and Wildlife Maintenance

Guidelines for Conserving Wildlife in an Urban Landscape

Michael E. Soulé

The study of plants and animals on islands, both natural and artificial, has produced a body of generalizations immediately useful to land use planners concerned with minimizing the impacts of habitat destruction on the environment. A case study of 37 isolated chaparral fragments in San Diego, California, demonstrates the consequences of habitat fragmentation, including rapid and predictable extinctions of native birds in isolated canyons. This study and others can be used to generate planning guidelines for the prevention of such disappearances. Among the most important measures that can be taken are consolidation of open space set-asides and the provision of corridors linking habitat patches. Corridors can mitigate some of the negative effects of development on wildlife, especially where they facilitate the movement of large predators.

Soulé received his doctorate from Stanford University and was founder and first president of the Society for Conservation Biology. He is the author or editor of five books in this field, including *Viable Populations for Conservation*, (Cambridge University Press, 1987) and *Conservation Biology: Science of Scarcity and Diversity* (Sinauer Associates, 1986). He is at the University of California, Santa Cruz, as chair of environmental studies. He was chairman of the Planning Commission for the city of Del Mar, California.

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The public concern about environmental issues will continue to increase as the planetary environment deteriorates under the weight of a rapidly growing human population and accelerating discharges of toxic chemicals, solid and organic wastes, greenhouse gases, and other by-products of human activities. Since the publication of *Design with Nature* (McHarg 1971), an environmental perspective has gained prominence in land use planning. This interest is exemplified by the attention given to physical factors, such as soil hydrology (Dearden 1980; Dunne and Leopold 1978), geologic hazards (Griggs and Gilchrist 1983), and visual amenities (Elsner and Smadon 1979), and by the integration of planning and landscape architecture (McBride 1977).

Currently, many environmentalists and the public at large are asking that planners give more attention to the impact of development on native animal species (wildlife values). For example, there is growing concern among environmentalists that laws such as the Endangered Species Act, though they provide for the short-term needs of certain critically threatened, "flagship" species, do not address the fundamental issues of the deterioration of entire ecosystems or regions. The worrisome if slow decline of songbirds and amphibians, and the steady disappearance of wetlands in the United States (Terborgh 1989; McKibben 1989) exemplify this gradual environmental deterioration. Surveys (Kellert 1980) have shown that most city people appreciate natural amenities, including native wildlife, and that citizens are willing to pay for a more authentic environment.

Just as the 1970s was the decade when land use planning and landscape architecture were integrated, the 1990s might be the decade when planners recognize the relevance of conservation biology, landscape ecology, and restoration ecology. An integration of principles and guidelines from these modern biological disciplines would provide planners with additional tools to deal with the effects of development on biological diversity in general, and the viability of native species in particular.

The principles of modern island biogeography, one of the core disciplines of conservation biology and landscape ecology, can provide useful guidelines for planners wishing to assist communities in maintaining a rich environmental mosaic that complements other components of human welfare. To demonstrate this point, this article opens with an overview of conservation biology, followed by a case study from San Diego showing how the results of such research are relevant to the issue of cumulative impacts of development[1] on environmental quality. Guidelines that might promote the maintenance of wildlife in the suburban situation are then suggested, and the limits of extrapolation from the San Diego system to those in other regions are explored.

Island Biogeography and Conservation Biology

We live in a world in which natural habitat is increasingly confined to isolated patches. For some time it has

been observed that isolation increases the risk of extinction, and in the last quarter-century the rules governing species extinction in isolated patches of habitat have been clarified by practitioners of the scientific discipline known as island biogeography (MacArthur and Wilson 1967). Though some controversies linger, there is sufficient agreement (Soulé and Simberloff 1986) among these practitioners to warrant a system of guidelines for land use planners. Similar guidelines have been discussed for over two decades in the literatures of applied island biogeography and conservation biology (Diamond 1975).

Island biogeography is one of the cornerstones of conservation biology (Soulé and Wilcox 1980; Soulé 1986; the journals *Conservation Biology, Biological Conservation,* and *Biogeography*), a field dedicated to the application of science to the protection of genetic resources, species diversity (the prevention of extinction), and ecological diversity (the maintenance of ecosystem processes and habitat diversity). Island biogeography overlaps considerably with landscape ecology (Turner 1989); both areas are concerned, in part, with the loss of species from habitat fragments, and with the disappearance of wildlife in the vicinity of human settlements.

One of the established principles of island biogeography is that the rate of species extinction in an isolated patch of habitat is inversely related to its size (MacArthur and Wilson 1967); this is one aspect of a more general phenomenon known as the *area effect*, a term referring to the deleterious effects on biotic systems of decreasing patch size, per se. Even quite large habitat islands have observable rates of extinction. For instance, it is now recognized that most national parks in the western United States are too small to prevent the extinction of many medium-sized and large mammals (Newmark 1987). On a local scale, isolated patches of habitat the size of most open space "set-asides" are often much too small to prevent catastrophic rates of habitat disturbance and the loss of many species of animals (as described below). Unfortunately, by the time the disappearance of wildlife is noticed by the human residents in a new subdivision, it is too late to do anything about it.

Edge effects are also associated with habitat fragmentation. Because the ratio of edge habitat to interior habitat increases as fragment size decreases (Figure 1), it is important to understand how edges affect wildlife. Edges (or ecotones, as habitat interfaces are called in wildlife biology) occur where a habitat, such as a forest, meets a road, a clear-cut, or some other element, natural or artificial. Edges benefit certain species, such as deer. But most conservationists believe that edges, overall, are detrimental to the maintenance of species diversity (see *Conservation Biology* 1988). Among some of the major categories of deleterious edge effects are (1) higher frequency and increased severity of fire, (2) higher rates of hunting and poaching, (3) higher intensities of predation, (4) higher probability of nest parasitism on bird nests by brown-headed cowbirds, and (5) higher intensities of browsing and other forms of disturbance that favor weedy species.

As habitat destruction spreads and the distance between remnant patches increases, animals find it more difficult to disperse between patches. The relation between isolation and movement frequency is inverse, and is known as the *distance effect*. A corollary of this principle is that endangered populations in isolated patches are more likely to be "rescued" by dispersing individuals from other patches if the patches are close together (Brown and Kodric-Brown 1977). Dispersal of individuals between patches can help protect against demographic "accidents," such as an episode of unusually high mortality. Immigrants can also "rescue" a population that is in jeopardy because of inbreeding or an unbalanced sex ratio. Generally, therefore, compact archipelagos comprising islands that are close together have more species per island than do archipelagoes comprised of remote islands. This is because proximity facilitates both the rescue of endangered populations and the recolonization of habitat islands where local extinctions have occurred.

Another relevant generalization—from the discipline of community ecology rather than island biogeography—is that large predators help to maintain the diversity of species within an ecosystem because they suppress the

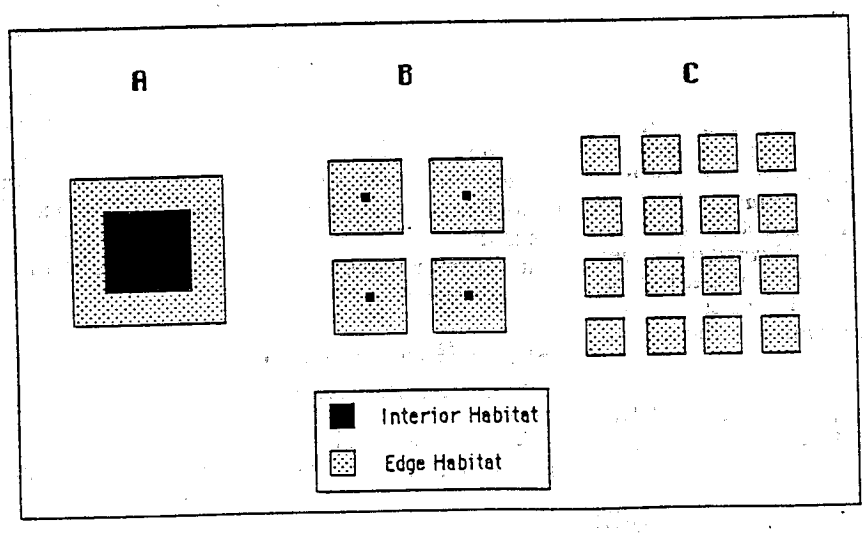


FIGURE 1: Diagram of the relationship between edge effects and the amount of interior (unaffected) habitat as a function of the area of a habitat fragment. Note that the edge effects penetrate a constant distance, regardless of the size of the fragment. A represents a large fragment; B, four fragments that together equal the area of the A fragment; and C, 16 small fragments that together equal the area of the A fragment.

numbers of destructive smaller predators, the depredations of which can be disastrous for species such as ground-nesting birds. A common myth is that large predators (such as wolves, coyotes, and cougars) are bad for wildlife. But this is true only if one uses a very restricted definition of wildlife, and if one means by "bad" that there are, say, fewer deer where predators are abundant. In most parts of the United States, it is deer, not predators, that damage natural and artificial ecosystems.

None of the above problems occurs instantaneously; as fragmentation increases, the area of individual patches gradually decreases, the distance between patches increases, and edge effects creep inward. It is expected, therefore, that extinctions of species within isolates will be cumulative. In those rare situations where the ages of the isolates are known, one might expect to detect such an *age effect*; namely, the older the isolated patch, the more altered it should be, and the fewer species it should contain.

A San Diego Case Study: The Fate of Birds in Chaparral Fragments

The consequences of fragmentation have been studied in deciduous forests in the eastern United States (see Wilcove et al. 1986 for a review), in the tropics (Terborgh and Winter 1980; Lovejoy et al. 1986), and elsewhere, but there have been few systematic analyses of fragmentation in the western United States (Newmark 1987). The case described below is an analysis of fragmentation in sage scrub and chaparral habitats in coastal Southern California. This example focuses on a particular group of bird species living in remnant habitat islands left after denaturation and development in San Diego County. In general, the results of this study are typical of those in forest habitats, except that the relative immobility of many of the birds in chaparral may lead to a higher rate of extinction than would be expected on the basis of results from temperate forests. Chaparral[2] is a form of dense scrub vegetation. Among botanists, chaparral is celebrated for its extraordinary diversity of plant species (Raven and Axlerod 1978). Among fire fighters and planners, it is often vilified for its flammability, especially during the rainless summer and fall typical of Mediterranean climates. Even though the dominant shrubs in coastal chaparral are rarely more than three meters high, and often less than one or two, this habitat supports a very rich fauna, including mountain lions, bobcats, coyote, deer, diverse birds, reptiles, and insects.

Only a fraction of coastal scrub vegetation remains in Southern California (Westman 1987; Jensen et al. 1990), and most of the remnants of chaparral habitat in the coastal section of San Diego County are limited to steep-sided canyons that dissect the coastal mesas. Until recently, these interconnecting canyons constituted a network of natural open space. They also served as neighborhood boundaries. Historically, people, especially children, have used the canyons for the same purposes that people everywhere use open space, namely visual relief, exercise, walking dogs, and other forms of spontaneous recreation and play. Recently, the coastal canyons have been serving another function—shelter for the homeless. Other socioeconomic conditions and technological innovations, including escalating land values, the perceived need for a dense system of freeways, and the availability of efficient earth-moving machinery, have led to the denaturation of most canyon habitat and thus to the physical isolation of the remaining fragments of chaparral. This case study, therefore, addresses a common dilemma in land use—the conflicts arising from pressures for short-term economic gain, on the one hand, and for long-term environmental quality, on the other.

A Summary of Methods and Results

The San Diego study (Soulé et al. 1988; Bolger et al. 1991) focused on species of birds that require natural scrub habitat for breeding and shelter. These were the black-tailed gnatcatcher, roadrunner, California quail, California thrasher, rufous-sided towhee, Bewick's wren, and wrentit. Censuses to determine the presence/absence of these chaparral-requiring bird species (CR birds) were conducted in 37 isolated canyons (Figure 2). The biogeographic variables that are typically considered in such research (habitat area, isolation, island age) were used, and simple, partial, and multiple regressions were performed to determine the possible influence of these variables on the persistence of the CR bird species in fragmented habitat. Only the results relevant to planning are discussed here.

The variables in this study included the sizes of canyons (AREA), the total area of natural chaparral cover in the canyons (CHAP), the "ages" (time elapsed since they became isolated from adjacent chaparral habitat by denaturation and development—AGE) of canyons (Table 1), various measures of disturbance, and several variables estimating the degree of isolation of canyons from each other and from the closest unfragmented habitat. Much of the information was obtained from aerial photographs, subdivision maps, and city planning maps and records. Besides using these standard variables and sources, we included variables (such as FOXCOY) that represent the distribution of potential predators (see Table 1), and we tested for interactions. We also took a census of birds in unfragmented, "mainland" habitat (Bolger et al. 1991) in nearby, relatively undenatured, areas in southern California, including Camp Pendleton and Tecolote Canyon. The following points summarize the most relevant results (nonsignificant effects are not discussed here):

1. Most canyons lose at least half of their CR birds within 20 to 40 years after isolation, though the larger canyons retain from two to six species (Figure 3). For canyons less than 50 hectares (about 123 acres), the average number of surviving CR species after 40 years is 0.5. The attrition of habitat due to mechanical disturbance, fire (Westman et al. 1981), and invasion by exotics (Macdonald et al. 1988) must account for some of this loss of bird species. A statistically significant proportion of these local (within canyon) extirpations, however, is independent of the amount of chaparral cover (as shown by partial correlation analysis), and can be attributed to

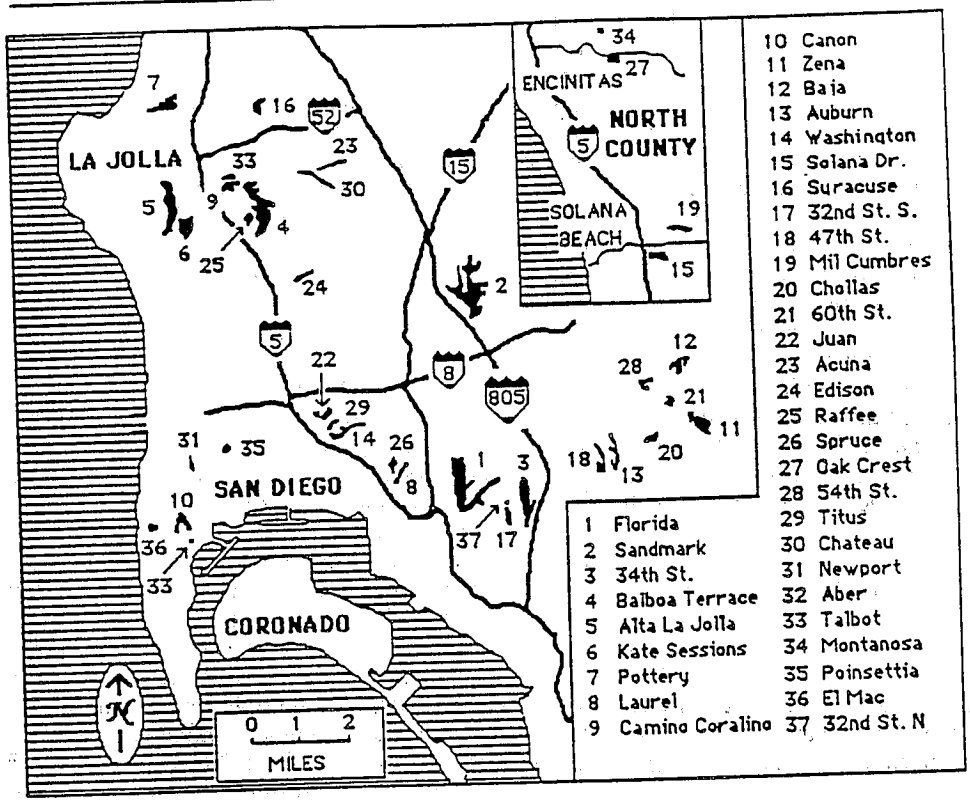


FIGURE 2: Location of the study sites (canyon fragments) in the vicinity of San Diego, California. Site 37 was considered a satellite of site 17, and was not included in the analyses described here.

the number of years since the canyon was isolated from a larger tract. Soulé et al. (1988) refer to this temporal component of the extinction process as the "age effect."

It is likely that the underlying cause of this age effect is the small population sizes of most species in the isolated canyon fragments. Small populations are chronically vulnerable. Theoretical studies (e.g., MacArthur and Wilson 1967; Goodman 1987) and modeling results (Shaffer 1983) have shown that the probability of extinction of small isolated populations increases exponentially below a population size of 75 because of the randomness inherent in demographic (birth and death) processes. Unmanaged populations under 10 or 20 individuals cannot normally be expected to persist for more than a few generations. Empirical studies also establish that population size is the best predictor of local extirpation (Terborgh and Winter 1980; Soulé et al. 1988; Pimm et al. 1988).

2. As shown in Figure 4, there is also an area effect. That is, the number of CR birds persisting in canyons is correlated with the area of undisturbed, natural habitat (CHAP) in the canyons. This effect persists after removing, statistically, the age effect. Our interpretation of this area effect is that the amount of chaparral habitat that actually exists in a fragment at some point in time limits the number of species that can live in that patch at that time. This result is typical in that an area effect is the statistically strongest interaction in most island biogeographic studies.

3. A third, statistically independant factor, FOXCOY, remained after removing (by partial and multiple correlation and regression) the age and area effects. Canyons frequented by coyotes and lacking grey foxes retain more species of CR birds than canyons without coyotes but inhabited by foxes. We attributed this result to the frequently observed inhibitory effects of coyote predation on smaller predators, especially foxes, opossums, skunks, and domestic cats. These smaller "mesopredators" are more likely to prey on birds and bird nests than are coyotes. Foxes, for example, frequently forage by climbing bushes and small trees.

4. There was no statistically significant distance effect. In other words, the persistence of bird species in isolated fragments appears to be unaffected by the proximity of canyons to each other or by the distance to the closest unfragmented "mainland" habitat. Our interpretation of this finding is that the CR birds are virtually unable to cross barriers (streets, freeways, subdivisions), and thus are unlikely to benefit from proximity of other habitat islands. This is not to say that they are unable to fly the necessary distances, though many are indeed weak flyers. Rather, the poor dispersal ability of CR birds probably represents an intrinsic aversion to abandoning cover. In any case, recolonization of canyons following local extirpations appears to be rare (Soulé et al. 1988).

The dramatic loss of species in canyons is not limited to birds. The attrition of native mammals, such as rodents, rabbits, and hares, occurs even more rapidly. These native mammal species are replaced in the canyons by nonnative (alien) species, notably house mice (*Mus musculus*), black rats (*Rattus rattus*), and opossums, a relatively recent invader from the east. Anecdotal evidence from

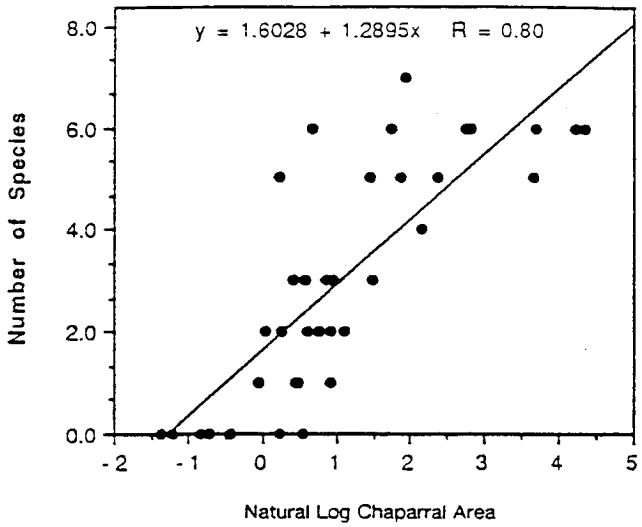


FIGURE 4: Species-area relationship for chaparral-requiring bird species in 36 isolated canyons in western San Diego County. Area is actual chaparral cover in the canyons in hectares (natural logs); it does not include disturbed habitat or habitats dominated by alien species.

Island biogeographic studies can provide a basis for guidelines on maintaining wildlife and ecosystem values in areas subject to habitat fragmentation. For the planning field, the most important conclusion from this entire body of investigations is that *the best way to maintain wildlife and ecosystem values is to minimize habitat fragmentation.* Where urbanization is occurring, however, habitat fragmentation is virtually inevitable, and one of the only practical mitigation measures is the establishment of corridors of natural habitat or linkages, such as underpasses, that permit dispersal across barriers. There has been some debate about the utility of corridors (Soulé and Simberloff 1985; Simberloff and Cox 1987; Noss 1987), and acknowledgment of their disadvantages in some situations. But this author believes that corridors are the best solution, especially where species are disappearing from small, local fragments in a predictable order, producing nested species distributions based on habitat area (Patterson and Atmar 1986), and where the target species do not disperse well across barriers.

Other caveats may apply, however, especially for plants. Small and isolated habitat fragments might be adequate to protect certain kinds of plants, including endangered or threatened species, assuming that such plants (1) are not suppressed by or dependant on fire, (2) are not subject to inbreeding depression or the loss of genetic variability (Ledig 1986; Shaffer 1981; Frankel and Soulé 1981; Schonewald-Cox et al. 1983), (3) do not depend on animal pollinators or seed dispersers, and (4) compete well in the absence of habitat disturbance caused by large animals and fire. On the other hand, plants that are subject to the above forces, or to the various kinds of edge effects, such as trampling, dessication, wind, over-collecting, competition from weedy species, and cropping by domesticated animals, will not fare well in small fragments unless managed intensively. Vulnerability must be examined on a case-by-case and species-by-species basis.

Figure 5 illustrates the planning guidelines for animals suggested by the San Diego results and those of most other studies. Part A of Figure 5 illustrates the superiority of large over small habitat fragments. Wherever possible, natural open space elements should be as large as possible and should be made contiguous. As shown in Figure 4, retention of CR birds is highly correlated with the amount of habitat. One reason for the superiority of large fragments is that they can support a larger number of individuals for a particular species. As already mentioned, the probability of extinction is inversely proportional to population size.

Large fragments also minimize edge effects (see Figure 1). Some species will never breed in small habitat fragments, even if they use them for foraging. These organisms include those species that require undisturbed (interior, non-edge, old growth) habitats, as well as those

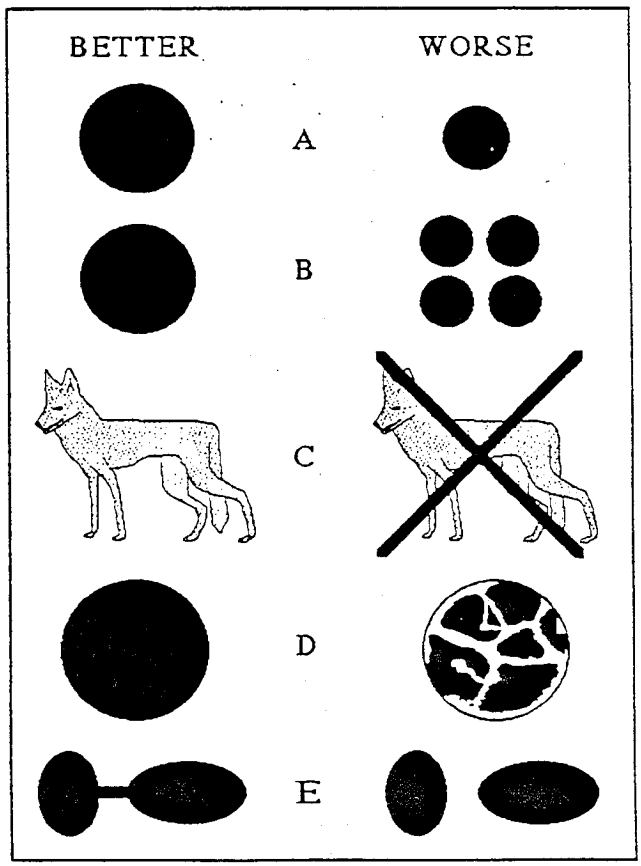


FIGURE 5: Summary of planning guidelines based in part on studies of faunal extinctions in fragments of chaparral habitat in San Diego County.

that may need a variety of habitats. In the Midwest, many bird species that require forest interior habitat cannot be found breeding in patches of forest that are less than 25 hectares in area (Blake and Karr 1984). For some animals, roads produce formidable edge effects (see, e.g., McLellan and Shackleton 1988). The degree to which these negative effects of edges will diminish the value of a particular site depends on the habitat, the region, and the species under consideration. When in doubt, experts should be consulted.

Part B of Figure 5 illustrates a more controversial guideline—a single large habitat fragment is superior to several small fragments, at least for vertebrate animals. This principle does not apply to all biological systems, although the canyon data strongly support it, as do data from virtually all studies of vertebrate animals. Our mammal surveys (unpublished data) lead to the same conclusion. The empirical basis for this guideline is the observation that extinctions of vertebrate species in fragments of similar habitat nearly always occur in a regular and predictable order (Patterson and Atmar 1986). In our study, for example, the roadrunner and the black-tailed gnatcatcher always disappear first. At the other extreme are the wrentit and Bewick's wren; they are always the last survivors in older and smaller canyons. On the other hand, if extinctions were random with respect to species, then several small fragments would, collectively, have as many or more species than a single large fragment equal in area to the sum of the small fragments.

Another caveat pertains to some highly mobile animals, including many species of temperate forest birds. For these animals, a multiplicity of habitat (forest) types may be more important than area per se (see, e.g., Beissinger and Osborne 1982). One must bear in mind, however, that attempts to breed by such birds in small habitat fragments often fail (Terborgh 1989) because of nest parasitism by cowbirds (Brittingham and Temple 1983) and nest predation by edge species, such as jays, crows, raccoons, house cats, rats, dogs, skunks, and opossums (Wilcove et al. 1986).

Part C of Figure 5 symbolizes the advantage of retaining the large carnivores in a system. In the San Diego case (Soulé et al. 1988) and in others (Terborgh 1988), there is indirect evidence that large predators prevent abnormally high population densities of smaller mesopredators (including domestic and feral house cats) that are likely to prey on birds. Unless there are compelling reasons to do otherwise, planners should oppose the "control" of coyotes, bobcats, badgers, and mountain lions (cougars, panthers). An analogous guideline from the ecology field is equally important: manage the system in order to maintain habitat-modifying animals such as tortoises, alligators, moose, beaver, muskrat, and pocket gophers; such animals create and maintain a mosaic of habitats that facilitate the persistence of many other species of plants and animals (Harris 1988).

Part D of Figure 5 shows the problem of human disturbance. Chaparral is a rather brittle habitat; it is easily and permanently destroyed by trampling, bushwhacking, frequent fires (Westman et al. 1981), or grading. Other sensitive habitats include heaths, wetlands, sand dunes, and some forests that, when "opened up" or "cleaned up," drained, or "improved" by trail or road development, are exposed to accelerating or cumulative changes, including the invasion of weeds and mesopredators. A corollary of this guideline is that development configurations should minimize adverse edge effects. Trails, roads, and similar facilities increase the frequency of human contact, and may eventually lead to the disappearance of sensitive species. In addition, such improvements increase the amount of edge. Deleterious edge effects, such as predation, nest parasitism (from cowbirds), fire, dessication, noise, and invasion of introduced plants and animals, are often mutually exacerbating. Their impacts also increase as patch size decreases.

The apparent contradiction between this anti-disturbance recommendation and the previous mention of the benefits provided by animals that produce extensive habitat disturbance (alligators, beavers, pocket gophers, etc.) is real, and illustrates the contextual nature of all guidelines. Whether disturbance is beneficial depends on many factors, including scale (e.g., the size of the fragment), the habitat type, the likely longevity and objectives of the project, and the kind and degree of disturbance (Pickett and White 1985). Local ecologists should be consulted if there is a question about disturbance dynamics.

Part E of the guidelines demonstrates the corridor principle—maintain continuity and flow between patches of chaparral and other habitats. Corridors, including under-road links, can mitigate some of the deleterious effects of fragmentation (Forman and Godron 1986). Wildlife corridors can be viewed as a kind of landscape health insurance policy—they maximize the chances that biological connectivity will persist, despite changing political and economic conditions. The design of wildlife corridors, however, is a new branch of conservation biology. For this reason and others, there are few, if any specific guidelines. Potential corridors must be analyzed and designed by teams of planners, engineers, and biologists on a case-by-case basis. Admittedly, wildlife linkages involve capital investment up front; but it is considerably less expensive to construct underpasses and other linkage elements for wildlife during the construction of facilities than to attempt to retrofit existing "improvements."

This corridor guideline stems from the inevitability of local extinctions in isolated habitat fragments. Though there has been little research on optimum corridor design (but see Fahrig and Merriam 1985; Fahrig and Paloheimo 1988; Soulé and Gilpin 1991), particularly as it affects the movement of different kinds of organisms, many of the CR birds have been seen moving and feeding in strips of chaparral only a few meters wide (Soulé et al. 1988). Planners should bear in mind, however, that species differ markedly in habitat needs and tolerances, and that the utility of particular corridors for wildlife (Harris and Gallagher 1989) depends on the behavior of the targeted species.

For some highly mobile species, the distance between fragments will be relevant. For the CR birds it is not. Our results suggest that close proximity of fragments does not retard the rate of species loss, unless the patches are separated by less than a few dozen meters (Soulé et al. 1988). The reason is that the CR birds disperse poorly, if at all, through non-native habitat. Our results (unpublished) for rodents, rabbits, and hares, on the other hand, suggest a minor distance effect, indicating a slight benefit of patch proximity for these mammals. For most non-flying animals in most places, however, proximity of habitat remnants will not retard species loss unless the patches are connected by corridors.

Other Recommendations

The preceding observations suggest that the best way to fight the deleterious effects of fragmentation is to prevent it. Wherever possible, therefore, planners should insist on the linking of habitat elements by habitat corridors. This suggestion obviously assumes that it is possible to do planning on a scale that is larger than the individual housing or commercial development.

Where corridors are not practical, there are other ways to mitigate fragmentation. One is to ensure that open space set-asides are contiguous. Such aggregation of open space is implicit in guidelines A and B above. Even if such open space aggregation is accomplished, however, corridors between these larger aggregates are highly recommended. A second possibility, where both landscape linkages and juxtaposition of open space elements are impractical, is "mitigation banking"—the developer, instead of setting aside tiny parcels that will deteriorate rapidly, deposits money into an account for future open space acquisition.

A third alternative is a permanent committment to the artificial transport of organisms on a schedule that precludes the extinction of isolated populations. Translocation requires less capital investment than highway underpasses dedicated to wildlife, but assumes that jurisdictions and management agencies will commit funds indefinitely for the capture and release of animals. In many cases, however, the infrastructure does not exist to routinely translocate animals, or the procedure is prohibitively expensive. In addition, translocated animals usually do not survive, and expensive monitoring programs are necessary. For these and other reasons, there are few if any programs that routinely transfer wildlife for the purposes of maintaining population viability.

Land use planning involves many variables that are not in the province of the natural scientist. Nevertheless, scientists can assist planners in the analysis of the available land-use options. For example, depending on the stage of development and the kind of habitat, many "improvements," including highway shoulders, the edges of bicycle and foot paths, streams on golf courses and in parks, and utility rights of way may facilitate animal movements. In addition, some species, including large predators, can take advantage of culverts and underpasses, especially if these facilities are designed with animal dispersal in mind. Biologists should be consulted when such alternatives are being considered.

Some conflicts between recreational uses and wildlife values in corridor design are inevitable. For example, cover is important for chaparral birds and other small vertebrates. The public would have to tolerate a certain "untidiness" in open space systems designed for both wildlife and people. Public education about such matters is a perennial requirement.

A question not addressed here is how large is large enough to maintain a population of a species? Questions of this genre can only be answered probabilistically—the larger the population (or the patch size in most cases), the higher the chance that the species will persist over a given interval. Such answers may not be satisfying, but the question of population viability is extremely complex (Shaffer 1981; Gilpin and Soulé 1986; Soulé 1987), and good answers to complex questions are contextual. In practical terms there are no magic thresholds of population or ecosystem viability.

Planners are increasingly called upon and held accountable for the present and future quality of the human environment. One body of information that could help planners ensure a more interesting, more diverse, and more natural environment is that provided by island biogeography. This field, as well as other aspects of ecology, become increasingly relevant where the landscape is usurped and fragmented by humans, and where the remnants of natural habitats are isolated. The preceding results and discussion constitute an attempt to begin a dialogue between planners and conservation biologists.

AUTHOR'S NOTE

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NOTES

1. The term "development" usually describes a two-step process: (1) the destruction of natural systems or habitat: and (2) the replacement of natural systems by artificial ones that increase the welfare or wealth of some humans. It is more appropriate to refer to the first step as "denaturation" (Soulé 1990). Denaturation, if sufficiently extensive, not only reduces the amount of natural habitat, but also causes the fragmentation of the habitat that remains.
2. The term chaparral, as used here, includes coastal scrub plant associations.
3. The regression equation is for this bivariate relationship only and should not be used for predictive pur-

poses when other biogeographic information is available.

4. This species was not included in our analyses because it only occurred in one canyon.

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Response to Comments from the University of California, Santa Cruz

1. The commenters complain that basic conservation biology concepts were ignored in planning for the proposed project and proceed to offer numerous textbook examples to make their points. Unfortunately, this letter lacks any site-specific empirical data and it reveals that the commenters failed to consult the project proposal or any of the extensive background documents on the biological resources of the Santa Lucia Preserve.

   The commenters have two primary concerns: 1) habitat isolation and fragmentation, and 2) increase in non-native and human-associated pest species. They conclude that the proposed project will increase habitat fragmentation and result in a decline of overall species richness of the preserve, compared to preproject conditions. They also conclude that large predators, such as mountain lions, will be lost and that introduced and pest species will increase. Many of the citations (no bibliography included) are not necessarily germane to the Santa Lucia Preserve project.

   As noted above, all of these conclusions were formed without the commenters' review of either the biogeographic references and data, or the plan and application materials which were thoroughly referenced in the draft EIR. Absent first-hand knowledge of the resources and specifics of the proposal, the commenters' language appears subjective.

   In contrast to the commenters' statements, the concepts of conservation biology, island biogeography, and landscape ecology were incorporated into the plans for the preserve. Project designs incorporate two biogeographical concerns: 1) habitat isolation and fragmentation, and 2) management of introduced and non-native species. The commenters' statements appear to be an oversimplification of the complex issue of habitat fragmentation, as it applies to this project. In contrast, a technical evaluation of the colander development approach could be invaluable to refining the final design for this project. Please refer to Comment 1 from CNPS for additional information on the possible effects of this project on fragmenting wildlife habitat and on wide-ranging carnivores such as mountain lions.

   The comment letter states that species that are restricted to certain habitat types (e.g., willow flycatcher) would be faced with insurmountable barriers and thus would have subpopulations doomed to extinction. This species may occur at the preserve during migration, when it frequents a variety of riparian habitats, but it no longer breeds in Monterey County due to predation and nest-parasitism from brown-headed cowbirds (Roberson and Tenney 1993). The willow flycatcher example illustrates the need for careful review of the background documents and published literature before generalizations can be made about the project's effects on specific species.

   The commenters highlighted Drs. Paul Beier and Reg Barrett's study of mountain lions in southern California, particularly the impacts on populations that have resulted from extensive urban residential and highway development, and fragmentation and isolation of the cat's

habitat. The proposed development at the Santa Lucia Preserve is not directly comparable with the Santa Ana Mountains and San Joaquin Hills landscapes. Dr. Barrett and Dr. Maurice Hornocker have both provided input to the proposed plan and each has predicted that the level and character of this development would not adversely affect mountain lions, bobcats, or deer. These experts based their conclusions on field studies and familiarity with the proposed plan.

The commenters cited "concentration" of development in areas of less than 30% slope and stated that in so doing, the development will "encircle and isolate most of the wetland and riparian habitats on the property". In fact, the plan restricts development on slopes greater than 30% and does not encircle or in other way frustrate the use of wetlands and riparian sites by wildlife (except for selective fencing for cattle and wild boars). Selective fencing will be constructed to curtail/deter cattle and pig access and to allow unimpeded access by deer. No other wildlife species would be excluded from these habitats.

The commenters reported that BioSystems Analysis denied them access to biological resources documents that were prepared for the preserve. All materials referenced in the draft EIR are available to the public through the Monterey County planning offices.

JULY 7, 1995

WANDA HICKMAN 8:30 A.M.
MONTEREY COUNTY PLANNER
FAX 755-5487

RE: SANTA LUCIA PROJECT
EIR 94-005

THE PRELIMINARY DEIR PROPOSAL ON CONSTRUCTION OF A GOLF COURSE EAST OF ROBINSON CANYON AS PART OF RANCHO SAN CARLOS DOES NOT ADEQUATELY ADDRESS WATER AVAILABILITY AND USAGE.

THE DEIR "MUST" PROVIDE COMPLETE HYDROLOGICAL DATA FOR ADDITIONAL WATER RESOURCES IN THE EVENT UNDER GROUND SOURCES PROVE TO BE INADEQUATE. 1

THE FOLLOWING QUOTE FROM THE MONTEREY COUNTY HERALD THIS DATE, "IT IS APPARENT THAT FUTURE GROWTH CAN'T BE PREDICATED ON ADDITIONAL DIVERSION FROM THE CARMEL RIVER," SAID KATHY MROWKA, THE PROJECT MANAGER FOR THE STATE BOARD.

THE FOREGOING COMPELS MY CITY PLANNER TO INSIST THAT RANCHO CARLOS INCLUDE A DISCLAIMER FOR ANY FUTURE USE OF CARMEL RIVER WATER.

R.J. ABBA
PO BOX 5711, CARMEL, CA. 93921

1. The EIR (refer to Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand") and referenced hydrologic studies provide complete hydrologic data regarding the proposed water supply system. Additional water other than groundwater is not anticipated to be required for the proposed project. The Monterey County Board of Supervisors will consider the comment regarding a disclaimer when it makes a decision on the proposed project.

TO: WANDA HICKMAN
Monterey County Planning & Bldg.
DEIR 94-005
RANCHO SAN CARLOS

Wildlife:

without leaving Robinson Canyon Road
I have observed the following animals
on the area proposed for development:

Wild Boar (imported originally by Spanish)
Deer
Mountain Lion
Bob Cat
Canada Goose
Great Blue Heron
Mallard Duck

I would like to see how the wildlife can
survive the increase in traffic, human
habitation etc etc
and how the people living in the
proposed development will be protected
without eradicating the animals.

Charlotte Clark 124 4101
P.O. Box 41 P.B. 93953

1

1. It is true that wildlife will be displaced from localized home sites and road corridors under the proposed project. Overall, however, less wildlife habitat destruction would occur under the colander approach than under concentrated high-density developments that would eliminate thousands of acres of habitat. Please refer to the response to Comment 1 from California Native Plant Society for further information on this topic.

24 JUNE 1995
25400 BOOTS ROAD
MONTEREY, CA 93940
408-655-4723
(away from area;
27 June - 15 July)

WANDA A. HICKMAN, ASSOCIATE PLANNER
MONTEREY COUNTY
PLANNING AND BUILDING INSPECTION DEPARTMENT
PO BOX 1208
SALINAS, CA 93902

SUBJECT: REVIEW OF DRAFT EIR #94-005, THE SANTA LUCIA PRESERVE

THANK YOU FOR THE OPPORTUNITY TO REVIEW THE SUBJECT DRAFT EIR. THE PROJECT APPLICANT SHOULD BE COMMENDED FOR THE EFFORT TO BALANCE PRIVATE PROPERTY DEVELOPMENT GOALS WITH THE MANY REQUIREMENTS AND DESIRES FOR RESOURCE PRESERVATION AND MAINTENANCE.

HAVE INPUTS RELATED TO THE FOLLOWING CHAPTERS OF THE EIR:
CHAPTER 11, BIOLOGICAL RESOURCES,
CHAPTER 12, AESTHETICS, and
CHAPTER 13, TRAFFIC

BACKGROUND

I MAKE FREQUENT VISITS TO THE AREA (est. 25/year) BY WAY OF ROBINSON CANYON ROAD. I NORMALLY PARK NEAR PENON PEAK TRAIL AND THEN WALK SOUTH TO THE INTERSECTION OF ROBINSON CANYON ROAD AND RANCHO SAN CARLOS ROAD, AND RETURN. THESE ARE LEISURELY WALKS FOR THE PURPOSE OF ENJOYING THE BEAUTY AND WILDLIFE THAT ARE WITHIN VIEW FROM ROBINSON CANYON ROAD. THE ROUND TRIP WALK IS A LITTLE OVER 3 MILES, AND MAY TAKE 2 TO 3 HOURS. WE THEN FREQUENTLY DRIVE SOUTH FROM THE PENON PEAK AREA, EVENTUALLY TURNING AROUND AT THE REDWOOD GROVE WHICH IS ABOUT A QUARTER MILE BEFORE THE WHITE ROCK AREA.

I HAVE ALSO WALKED ROBINSON CANYON ROAD AT NIGHT THROUGH THE AREA WHICH COVERS TWO TO THREE MILES SOUTH OF THE CARMEL RIVER BRIDGE. THIS AREA IS PRIME OWL HABITAT AND IT AFFORDS EXCELLENT VIEWING AND LISTENING OPPORTUNITIES.

CHAPTER 11, BIOLOGICAL RESOURCES

PAGE 11-28, OCCURRENCE OF THE WHITE-TAILED KITE

I HAVE OBSERVED AT LEAST ONE PAIR OF WHITE-TAILED KITES (a.k.a. BLACK SHOULDERED KITE) ON MOST EVERY ROUND-TRIP HIKE FROM PENON PEAK TRAIL TO THE INTERSECTION OF ROBINSON CANYON ROAD AND RANCHO SAN CARLOS ROAD. ONE BIRD IS USUALLY HOVERING IN-FLIGHT, HUNTING OVER AN OPEN AREA. MY LATEST SIGHTING WAS ON 10 JUNE 1995, ABOVE THE MEADOW AREA TO THE RIGHT OF THE HACIENDA, WHEN VIEWING WEST FROM ROBINSON CANYON ROAD. WHEN A PASSING RED-TAILED HAWK CAME NEAR THIS HOVERING KITE, THE KITE BROKE-OFF HOVERING AND AGGRESSIVELY WENT AFTER THE HAWK. A SECOND KITE THEN FLEW UP FROM THE CANOPY, AND BOTH BIRDS DROVE THE HAWK OUT OF THE HUNTING AREA. 1

KITE HABITAT INCLUDES A FRESH WATER MARSH ENVIRONMENT NEAR OPEN COUNTRY AND GRASSLANDS. THE KITE DOES NOT MIGRATE. THE KITE FULLY PROTECTED UNDER CALIFORNIA DEPARTMENT OF FISH AND GAME REGULATIONS. WHERE ARE THE NESTING SITE(S) FOR THIS AND POSSIBLY OTHER PAIRS OF KITES?

PAGE 11-30, OCCURRENCE OF THE CALIFORNIA SPOTTED OWL

THE LOWER PORTION OF ROBINSON CANYON ROAD, ONE AND ONE-HALF MILE TO THREE PLUS MILES FROM THE CARMEL RIVER BRIDGE, IS PRIME OWL HABITAT. THE UNIVERSITY OF CALIFORNIA OFFERS A CLASS ON "OWLS OF THE CENTRAL COAST". THE LATEST CLASS WAS HELD 11 MARCH 1995. AFTER CLASS INSTRUCTION AND AFTER DINNER, A FIELD TRIP WAS TAKEN TO ROBINSON CANYON.

THE ENTIRE CLASS SAW, WITH THE COMBINED LIGHT OF THEIR FLASHLIGHTS, A CALIFORNIA SPOTTED OWL. THIS OWL WAS CALLED TO OUR LOCATION, BY THE INSTRUCTOR, BY MIMICKING THE CALL OF A GREAT-HORNED OWL. THE SPOTTED OWL WAS "FLYING IN TO PROTECT IT'S TERRITORY FROM INTRUSION BY AN APPARENT GREAT HORN OWL", THE INSTRUCTOR EXPLAINED. THIS LOCATION WAS AT APPROXIMATELY 2.6 MILES SOUTH ON ROBINSON CANYON ROAD FROM THE CARMEL RIVER BRIDGE. THE OWL APPROACHED US FROM THE WEST. THIS SPECIES OF OWL IS LISTED AS A CALIFORNIA SPECIES OF CONCERN AND IT IS A LISTED CANDIDATE AS A FEDERAL ENDANGERED SPECIES. 2

WHERE ARE NEST SITES, ESPECIALLY IN RELATION TO LOTS 223,224,225, AND 226. ALSO, FROM THE VTM, SHEET 8 OF 14, AND ON-SITE OBSERVATIONS, IT APPEARS AS THOUGH THE PROPOSED ROAD FROM LOT 226 TO ROBINSON CANYON ROAD CUTS *THROUGH* A REDWOOD GROVE, ASSUMING THAT THE ROBINSON CANYON ROAD INTERSECTION IS PROPERLY MARKED ON THE VTM.

I BELIEVE THAT TRAINED OBSERVERS WITH ACCESS TO THE PRIVATE PROPERTY, COULD QUANTIFY THE BREEDING POPULATION DENSITY AND SPECIFIC NEST SITES. IN ADDITION, ROBINSON CANYON ROAD PROVIDES THE ONLY PUBLIC ACCESS TO SPOTTED OWL HABITAT, EVEN THOUGH OTHER POSSIBLE HABITAT IS WITHIN THE PROPOSED PRESERVE.

PAGE 11-31 OCCURRENCE OF THE TRI-COLORED BLACKBIRD

ON 17 JUNE 1995, I OBSERVED A NUMBER OF TRI-COLORED BLACKBIRDS FORAGING AT THE LIVESTOCK PEN AREA TO THE EAST OF ROBINSON CANYON ROAD WHERE VASQUEZ TRAIL INTERSECTS ROBINSON CANYON ROAD. AFTER FEEDING, SMALL GROUPS OF BIRDS MADE LINE-SIGHT FLIGHTS TO THE EMERGENT MARSH AREA ON THE SOUTH END OF MOORE'S LAKE. THE HABITAT NEAR THE LAKE IS CONSISTENT WITH THAT NEEDED BY THE BIRD (TALL GROWTH OF WATER PLANTS BORDERING OPEN WATER). THE GENERAL AREA THAT THE BIRDS LANDED IS CONSISTENT WITH THE PROBABLE NEST LOCATIONS; THAT IS, ALMOST AT GROUND LEVEL. THESE BIRDS HAD THE CHARACTERISTIC WHITE TRACE ON THE WING OF TRI-COLORED BLACKBIRDS. 3

TRAINED OBSERVERS WITH ACCESS TO CLOSER VIEWING COULD VERIFY THIS ON-SITE PRESENCE OF BREEDING TRI-COLORED BLACKBIRDS. OTHER AREAS IN THE PROJECT WITH SIMILAR HABITAT, BUT NOT ACCESSIBLE TO THE PUBLIC EYE COULD ALSO BE SURVEYED.

THIS SPECIES OF BLACKBIRD IS A CANDIDATE FOR FEDERAL LISTING ON THE ENDANGERED SPECIES LIST AND IT IS ALSO LISTED AS A CALIFORNIA SPECIES OF CONCERN.

PAGE 11-27 OCCURRENCE OF THE DOUBLE CRESTED CORMORANT

I OBSERVED AND PHOTOGRAPHED A PAIR OF CORMORANTS AT MOORE LAKE ON NUMEROUS OCCASIONS EARLY THIS YEAR (1995). CORMORANTS DO NEST AT INLAND SITES. A STATE OF CALIFORNIA LISTED SPECIES OF CONCERN. 4

PAGE 11-31, OCCURRENCE OF THE PURPLE MARTIN

EARLIER THIS YEAR, I SAW AND PHOTOGRAPHED A PAIR OF PURPLE MARTINS WHO WERE USING A NEST BOX MOUNTED ON A FENCE POST WEST OF ROBINSON CANYON ROAD NEAR MOORE LAKE. THE HIGHLY IRIDESCENT BLUE COLORS DISTINGUISH THIS BIRD FROM THE MORE COMMON BLUE BIRD WHICH IS ABUNDANT ON THE PROPOSED PROJECT. IN THE WESTERN U.S., PURPLE MARTINS ARE MORE LIKELY TO NEST IN PAIRS RATHER THEN IN COLONIES. A LISTED SPECIES OF CONCERN IN THE STATE OF CALIFORNIA. 5

PAGE 11-32, OCCURRENCE OF THE MONTEREY DUSKY-FOOTED WOODRAT

THE ENTRY IN THE TABLE INDICATES THAT THIS MAMMAL WAS NOT OBSERVED DURING 1991 SURVEYS. WAS THE SURVEY DONE DURING THE DAY ? IN THE TEXT ON PAGES 11-8 AND 11-48, HOWEVER, THERE ARE INDICATIONS THAT "THEIR CHARACTERISTIC STICK HOUSES ARE PRESENT THROUGHOUT THE PROPOSED PRESERVE" AGAIN, THE TABLE ON PAGE 11-32, WHICH SERVES AS A SUMMARY TABLE AND A JUNCTURE FOR THE DEFINITION OF PROPOSED MITIGATION PLANS, INDICATES NO OBSERVED WOODRATS. 6

IN DIFFERENCE TO THE RAT IMAGE BROUGHT TO MIND BY ITS NAME , THIS NOCTURNAL MAMMAL, LISTED AS CANDIDATE ENDANGERED SPECIES UNDER FEDERAL GUIDELINES, IS A VERY.BEAUTIFUL ANIMAL.

PAGE 11-32, OMISSION OF A MAMMAL (THE MOUNTAIN LION)

WHERE IS THE LISTING FOR THE MOUNTAIN LION, WHICH HAS A SPECIAL PROTECTED MAMMAL LISTING STATUS IN CALIFORNIA? 7

ACTIONS RELATED TO CHAPTER 11 , BIOLOGICAL RESOURCES

STARTING ON PAGES 11-47 AND CONTINUING ON PAGE 11-48, THE APPLICANT PROPOSES MITIGATION RATIONALE FOR SPECIAL STATUS WILDLIFE. THE SPECIES DISCUSSED ARE THOSE LISTED IN TABLE 11-3, WITH THE FOLLOWING EXCEPTIONS: THERE IS NO MENTION OF MITIGATION RATIONALE FOR EITHER THE WHITE-TAILED KITE OR THE TRI-COLORED BLACKBIRD. 8

ACTION: RAB 11-1 UP-DATE THE DATA BASE AND OCCURRENCE STATEMENTS WITH RESPECT TO THE WHITE-TAILED KITE AND THE TRI-COLORED BLACKBIRD. IDENTIFY THE KITE NEST LOCATIONS AND DETERMINE APPROPRIATE AVOIDANCE/MITIGATION MEASURES. 9

ACTION: RAB 11-2 DETERMINE A MITIGATION PLAN FOR THE TRI-COLORED BLACKBIRD. WILL THE LIVESTOCK PENS (FOOD FORAGING AREAS) STILL BE IN USE AFTER DEVELOPMENT ? ARE THERE OTHER NEST SITES ? DO THEY NEED PROTECTION? PROVIDE A MITIGATION PLAN FOR THE LOCATIONS AT THE SOUTH END OF MOORE LAKE IF REQUIRED. 10

THE SPOTTED OWL HABITAT ALONG THE LOWER PORTION OF ROBINSON CANYON ROAD (THE FIRST THREE PLUS MILES SOUTH FROM CARMEL RIVER BRIDGE) REPRESENTS THE ONLY PORTION OF SUCH HABITAT WITHIN THE PROPOSED DEVELOPMENT THAT IS ACCESSIBLE TO THE PUBLIC. THIS AREA IS A HISTORIC AND VALUABLE OWL HABITAT AND VIEWING AREA FOR 11

BOTH PUBLIC AND EDUCATIONAL PURPOSES. AND IT IS ALSO KNOWN AND VISITED BY PEOPLE FROM OUTSIDE OF MONTEREY COUNTY.

ACTION: RAB 1 1 - 3 VERIFY THE USE, INCLUDING NESTING SITES, OF THE HABITAT ALONG LOWER ROBINSON CANYON ROAD (THE FIRST THREE PLUS MILES SOUTH OF THE CARMEL RIVER BRIDGE) BY THE SPOTTED OWL. DEFINE APPROPRIATE MITIGATION MEASURES. 12

ACTION: RAB 1 1 - 4 THE PROPOSED ACCESS ROAD FROM ROBINSON CANYON ROAD TO LOTS 223,224,225, AND 226 DIRECTLY CUTS THROUGH, OR DIRECTLY FRONTS A REDWOOD GROVE NEAR ROBINSON CANYON ROAD IN THE SPOTTED OWL HABITAT. THE SPECIFIC LOCATION OF THIS CUT IS HIGHLY DEPENDENT ON THE FIDELITY OF THE PLANNING AS SHOWN ON THE VTM SHEET #8. THIS PROPOSED ACCESS ROAD SHOULD BE ABANDONED. 13

THE PURPLE MARTIN IS A RARE AND VALUED RESOURCE WHICH IS PRESENT IN NESTING LOCATIONS WITHIN THE PROPOSED DEVELOPMENT.

ACTION: RAB 1 1 - 5 PROVIDE FOR REPLACEMENT NEST BOXES FOR THOSE LOST AS A RESULT OF CONSTRUCTION, INCLUDING THOSE IN GOLF TRAIL RELATED DEVELOPED AREAS. AVOID DISRUPTION DURING THE BREEDING SEASON. 14

THE CORMORANT IS AN EXTREMELY SHY BIRD AND VERY SENSITIVE TO HUMAN ACTIVITY.

ACTION: RAB 1 1 - 6 IDENTIFY THE NESTING AREA FOR THE CORMORANTS THAT CONTINUE TO BE OBSERVED AT MOORE LAKE. DEFINE APPROPRIATE MITIGATION. 15

THE LIVES OF WOODRAT INDIVIDUALS NEED TO BE PROTECTED WHEN THEIR SPECIFIC HOME SITES ARE DESTROYED AS A PART OF CONSTRUCTION ACTIVITY. 16

ACTION: RAB 1 1 - 7 SURVEY A PROPOSED BUILDING SITE BEFORE CONSTRUCTION COMMENCES. IF WOODRAT MIDDEN IS PRESENT, HAVE QUALIFIED INDIVIDUAL(S) EXCAVATE THE MIDDEN IN SUCH A MANNER THAT THE WOODRATS ARE EXPATRIATED FROM THAT LOCATION WITHOUT HARM.

WITH REGARD TO THE ABOVE ACTION, I SUGGEST THAT A UNIVERSITY BASED BIOLOGICAL/ARCHEOLOGICAL EXCAVATION OF MIDDEN SITES COULD YIELD VALUABLE INFORMATION ON THE BIOLOGICAL AND HUMAN HISTORY OF THE AREA AROUND A SPECIFIC SITE. I ALSO SUGGEST THAT, MOST LIKELY, MIDDEN TEAR DOWN COULD BE PERFORMED AT NO COST TO THE APPLICANT, AND SHOULD NOT HINDER CONSTRUCTION SCHEDULES IF EXCAVATIONS ARE PLANNED WELL IN ADVANCE. 17

THE MOUNTAIN LION IS NOT ADDRESSED ANYWHERE IN SECTION 11, OTHER THAN A SHORT STATEMENT THAT LION HABITAT IS ON THE PROPOSED PRESERVE. 18

ACTION RAB 1 1 - 8 PRESENT A MOUNTAIN LION POPULATION ESTIMATE. PRESENT A MANAGEMENT PLAN, INCLUDING PROPOSED ACTIONS TO MAKE PROSPECTIVE SITE BUYERS (AND PRESERVE VISITING GUESTS) AWARE THAT THEY ARE IN LION COUNTY, THAT IT IS THE INTENT OF THE PRESERVE MANAGEMENT TO PROTECT THE LION AND LION HABITAT, AND THAT SIGHTINGS MAY OCCUR. MAKE ALL SITE BUYERS AND PRESERVE VISITORS AWARE OF

UNACCEPTABLE PRACTICES.

THE INTENT OF THE ABOVE ACTION IS TO AVOID THE PERCEPTION IN THE FUTURE, THAT THE MOUNTAIN LION IS MIGRATING INTO THE PRESERVE. RATHER, THE PRESERVE OCCUPANTS HAVE ELECTED TO MOVE INTO MOUNTAIN LION HABITAT AND OCCUPANTS CAN EXPECT SIGHTINGS FROM HOMES, ROADS, HIKING TRAILS, RUNNING TRAILS, HORSE TRAILS, AND GOLFER TRAILS. 18

A GENERAL COMMENT ON SECTION 11: THE APPLICANTS OBSERVATIONS OF THE OCCURRENCE OF CERTAIN SPECIAL STATUS SPECIES DIFFERS IN IMPORTANT RESPECTS FROM MY OBSERVATIONS. THE APPLICANT UNDERESTIMATES THE OCCURRENCE OF IMPORTANT SPECIES. MY OBSERVATIONS ARE ONLY ALONG ROBINSON CANYON ROAD. THIS BRINGS INTO QUESTION THE ACCURACY OF THE SURVEY RESULTS ON OTHER AREAS OF THE PRESERVE. 19

ACTION: RAB 11 - 9 CONTACT SPECIALISTS WHO HAVE SIGHTED MARBLED MURRELETS, IDENTIFIED NESTING LOCATIONS, AND DOCUMENTED THESE FINDINGS. HAVE THESE INDIVIDUALS APPLY PROVEN SURVEY TECHNIQUES AND METHODOLOGIES AND REPEAT THE MARBLED MURRELET SURVEY IN THE PROPOSED PRESERVE WITHIN EXPECTED HABITATS. DOCUMENT THE APPROACHES AND RESULTS AND MAKE THE REPORT AVAILABLE FOR REVIEW. 20

THE FOLLOWING ACTIONS RELATE TO THE GOLF TRAIL

ACTION: RAB 11-10, WILD BOAR EXCLUSION FENCE

DESCRIBE THE SPECIFIC FENCE DESIGN THAT IS PROPOSED TO BE USED TO EXCLUDE THE EURASIAN WILD BOAR FROM THE GOLF TRAIL AREA. DOCUMENT FIELD STUDIES WHICH CONFIRM THAT THE FENCE IS EFFICIENT FOR BOAR EXCLUSION, WHILE SIMULTANEOUSLY ALLOWING "UNINTERRUPTED" PASSAGE FOR ALL OTHER SPECIES OF WILDLIFE WHICH INHABIT THE AREA. 21

THE APPLICANT IS TO BE COMMENDED ON THE EMPHASIS ON INDIRECT, NON-LETHAL METHODS OF CONTROLLING CERTAIN ANIMALS IN THE GOLF TRAIL AREA. THE FOLLOWING TWO STATEMENTS NEED TO BE ADDED TO THE EIR:

ACTION: RAB 11-11, NON-LETHAL METHODS

THE EIR SHOULD STATE THAT ***ONLY*** " INDIRECT, NON-LETHAL METHODS OF CONTROL WILL BE USED FOR RODENT MANAGEMENT, AS RELATED TO THE GOLF TRAIL AREA". 22

ACTION RAB 11-10, PASSIVE-PHYSICAL AND SPECIES SPECIFIC

THE EIR SHOULD CONTAIN A STATEMENT: ***ONLY*** PASSIVE-PHYSICAL AND SPECIFIC METHODS OF CONTROL WILL BE USED FOR EXCLUSION OF THE WILD BOAR FROM THE GOLF AREA. TRAPPING OR LETHAL METHODS WILL NOT BE EMPLOYED. 23

CHAPTER 12. AESTHETICS

MY MANY VISITS TO THE ROBINSON CANYON ROAD AREA OVER THE YEARS HAVE ALLOWED FOR SIGNIFICANT TIME TO BE SPENT ENJOYING THE VIEWS AND THE WILDLIFE. I HAVE READ THE EIR, CHAPTER 12, AND I HAVE ALSO READ THE SANTA LUCIA PRESERVE, THE GOLF TRAIL, A VISUAL ANALYSIS, DATED NOVEMBER 1994. I HAVE OBTAINED COPIES OF THE VTM'S THAT CONTAIN ROBINSON CANYON ROAD AND I HAVE RE-VISITED THE SITE FREQUENTLY, LATELY, FOR PURPOSES OF ASSESSING THE EIR, AND I HAVE PHOTOGRAPHED AREAS OF INTEREST. 24

VIEWS FROM THE INTERSECTION OF ROBINSON CANYON ROAD WITH RANCHO SAN CARLOS ROAD, TO A POINT APPROXIMATELY 600 FEET NORTH ON ROBINSON CANYON ROAD.

SEE FIGURE 12-7a, PAGE 12-19 OF THE SUBJECT EIR FOR THE CURRENT VIEW WHEN LOOKING NORTHWEST FROM THE INTERSECTION OF ROBINSON CANYON ROAD AND RANCHO SAN CARLOS ROAD.

* * TO THE LEFT, JUST OUT OF VIEW IN FIGURE 12-7a, ARE SIGNIFICANT VIEWS OF OAK WOODLAND.

* * SHOWN IN THE PICTURE ARE ANNUAL AND PERENNIAL WILDFLOWERLANDS AND GRASSLANDS IN THE FOREGROUND. JURISDICTIONAL WETLANDS ARE JUST PAST THE FENCE AT THE CENTER VIEW IN THE PICTURE. IN THE BACKGROUND ARE THE FORESTED, ROLLING HILLS OF CHAMISAL RIDGE. THE CURRENT VIEW EXTENDS UNINTERRUPTED, FROM ONE'S FEET TO THE HORIZON. THERE IS A MOST SIGNIFICANT LANDMARK OAK IN THE LEFT CENTER PORTION OF THE PICTURE.

* * IN THE AREA IMMEDIATELY TO THE RIGHT OF THE PICTURE ARE EXTENSIVE JURISDICTIONAL AND RIPARIAN WETLANDS, WHICH I BELIEVE CONTAIN WATER ALL YEAR, FEEDING INTO MOORE LAKE.

* * LOOKING TO THE REAR, EAST AND SOUTH FROM ROBINSON CANYON ROAD, THERE ARE DENSE AREAS OF RIPARIAN HABITAT.

24

THE AREA UNDER DISCUSSION PROVIDES BOUNDARY LANDS BETWEEN MANY DIVERSE HABITATS. THESE BOUNDARIES ARE SOMETIMES ABRUPT, SOMETIMES SMOOTH, OR SOMETIMES GENTLE. THESE HABITATS AND THE BOUNDARIES AND JUNCTURES OF THESE HABITATS SUPPORT VERY DIVERSE WILDLIFE POPULATIONS. THERE ARE DISTINCT WILDLIFE CORRIDORS (TRAILS) THAT CRISS-CROSS THE OPEN LANDS, LINKING OTHER HABITAT TYPES.

A ONE WORD DESCRIPTION FOR THE VIEWS AND THE WILDLIFE IN THIS GENERAL ROBINSON CANYON ROAD/RANCHO SAN CARLOS ROAD AREA IS, **PRICELESS !**

THE ORIGINAL PLAN CALLED FOR THE 12.54 ACRE LOT 262, THE EMPLOYEE RECREATION CENTER, AND THE 5.23 ACRE LOT 263, THE RANCH OPERATIONS CENTER TO BE PLACED IN THE GRASSLAND AREA: SEE VTM SHEET 13 OF 14. THE OPERATIONS CENTER WAS PLACED ~100 FEET FROM ROBINSON CANYON ROAD AND HEAVY SCREENING WITH NATIVE PLANTS WAS PROPOSED. THE EMPLOYEE CENTER WAS TO BE TO THE REAR OF THE RANCH CENTER, AS VIEWED FROM ROBINSON CANYON ROAD.

25

THE OPERATIONS CENTER IS PROPOSED TO BE THE FOCUS OF PEOPLE AND EQUIPMENT (STORAGE/REPAIR) FOR SERVICE OF THE GOLF TRAIL PORTION OF THE DEVELOPMENT, AND WAS PLACED AT THE ROBINSON CANYON ROAD / RANCHO SAN CARLOS ROAD INTERSECTION SO AS TO BE NEAR THE GOLF TRAIL, WHICH IS TO THE EAST OF ROBINSON CANYON ROAD IN THIS AREA.

RECOGNIZING THAT THE INITIAL APPROACH TO PLACEMENT WOULD , QUITE LITERALLY, OBLITERATE THE VIEW FROM ROBINSON CANYON ROAD (SEE PHOTO-SIMULATION, FIGURE 12-7b, PAGE 12-20), THE APPLICANT PROPOSED MITIGATION AS FOLLOWS:

> THE CENTERS DESIGNED TO BE LOCATED ON LOTS 262 AND 263 COULD BE "RELOCATED TO THE NORTH APPROXIMATELY 300 FEET OR REDESIGNED TO ALLOW SCREENING VEGETATION PLANTED NEAR THE STRUCTURES TO BE

LOCATED A MINIMUM OF 300 FEET FROM THE SCENIC ROAD EDGE."

NO MAP OR VISUAL ANALYSIS IS PRESENTED TO DEMONSTRATE WHAT IS MEANT BY, " RELOCATE TO THE NORTH APPROXIMATELY 300 FEET". THREE HUNDRED FEET NORTH OF THE CURRENT SITE OF THE RANCH OPERATIONS CENTER PUTS ONE IN THE MIDDLE OF JURISDICTIONAL WETLANDS / RIPARIAN WETLAND. DOES THE APPLICANT MEAN 300 FEET NORTHEAST OF RANCHO SAN CARLOS ROAD, OR 300 FEET NORTHWEST OF ROBINSON CANYON ROAD, OR MOVE THE BUILDINGS 300 FEET NORTH, OR SOME OTHER INTERPRETATION? 25

AN ACCEPTABLE ACTION FOR LOTS 262 AND 263 CAN BE DERIVED FROM THE FOLLOWING FIVE ITEMS:

1. THE GMPAP, SECTION 1.1.3, DEFINES THE ROBINSON CANYON ROAD AREA UNDER CONSIDERATION AS A SENSITIVE VISUAL RESOURCE AREA HAVING LOCAL AND COMMUNITY SIGNIFICANCE.

2. THE GMPAP POLICY 40.2.9 INDICATES THAT PROPOSED NEW DEVELOPMENT PROPOSED FOR SUCH AREAS, AND WHICH ARE VISIBLE FROM THE ROAD, SHALL MAINTAIN THE VISUAL CHARACTER OF THE AREA. BUT MORE SPECIFICALLY, POLICY 40.2.9 GOES ON TO STATE : " IN ORDER TO ADEQUATELY MITIGATE THE VISUAL IMPACTS IN SUCH AREAS, THE FOLLOWING SHALL BE REQUIRED: .....g) NEW DEVELOPMENT IN OPEN GRASSLAND AREAS SHOWN AS "SENSITIVE" SHOULD MINIMIZE ITS IMPACT ON THE UNINTERRUPTED VIEWSHED" 26

3. THE APPLICANT " SEEKS TO ESTABLISH A PERMANENT PRESERVE FOR NATIVE PLANT AND WILDLIFE HABITAT WHILE PURSUING LIMITED DEVELOPMENT OF THE LEAST ENVIRONMENTALLY SENSITIVE LAND"

4. THE MONTEREY COUNTY GENERAL PLAN, POLICY 40.2.2 STATES: "LAND USE CONTROLS SHALL BE APPLIED OR RETAINED TO PROTECT THE SCENIC CORRIDOR AND ENCOURAGE SENSITIVE SELECTION OF SITES AND OPEN SPACE PRESERVATION. WHERE LAND DESIGNATED FOR DEVELOPMENT AT A DENSITY WHICH, SHOULD MAXIMUM PERMISSIBLE DEVELOPMENT OCCUR, WOULD DIMINISH SCENIC QUALITY, THE LAND OWNER SHALL BE ENCOURAGED TO VOLUNTARILY DEDICATE A SCENIC EASEMENT TO PROTECT THE SCENIC CORRIDOR."

5. THE PROPOSED TOTAL DEVELOPMENT WOULD USE 235.4 ACRES OF GRASSLAND, OUT OF AN ESTIMATED TOTAL OF 2615.6 ACRES OF GRASSLAND WITHIN THE PRESERVE.

BASED ON THE ABOVE:

ACTION RAB 12-1, RELOCATE THE RANCH AND EMPLOYEE RECREATION CENTERS RELOCATE THESE CENTERS, WHOSE LOTS TOTAL LESS THAN 18 ACRES, TO LESS SENSITIVE LAND AREA(S) AND DEDICATE THE CURRENT LOT 262 AND LOT 263 AS SCENIC EASEMENTS.

THE FOLLOWING DEALS WITH OTHER AREAS IN CHAPTER 12, AESTHETICS AND VISUAL IMPACTS.

THE COMPUTER-BASED VISUAL SIMULATIONS FOR THE HOLE # 2 OF THE GOLF TRAIL, AS VIEWED FROM ROBINSON CANYON ROAD (PAGE 11 AND 12 OF VISUAL ANALYSIS, GOLF TRAIL 27

PERMIT) DOES NOT SHOW THE ACTUAL WALKING TRAIL, OR TYPICAL SIMULATED SCENES WITH GOLFERS WALKING THE TRAIL. (VISUAL IMPACT OF THE GOLF TRAIL IN OPERATION) ALSO, IT APPEARS THAT SOME DEVELOPMENT, (THE WALKING TRAIL) ARE < 100 FEET FROM ROBINSON CANYON ROAD. 27

ACTION: RAB, 12-2 PROVIDE FOR THE ADDITIONAL VISUAL ANALYSIS OF GOLF HOLE #2, AND RECOMMEND ADDITIONAL MITIGATION, IF REQUIRED.

THE LOT 134 HOME SITE ENVELOPS A HILL. WHEN LOT #134 IS VIEWED FROM ROBINSON CANYON ROAD, LOOKING EAST FROM ROBINSON CANYON ROAD FROM A POINT WHICH IS JUST NORTH OF WHERE THE DRAINAGE CHANNEL GOES UNDER ROBINSON CANYON ROAD, THE HILL BECOMES THE VISUAL RIDGELINE.

ACTION: RAB 12-3 ASSURE THAT THE BUILDING SITE FOR LOT # 134 DOES NOT VIOLATE VISUAL RIDGELINE DEVELOPMENT REQUIREMENTS.

FOLLOWING THE DETAILS SHOWN ON THE VTM, SHEET 10 OF 14, THE DRIVEWAY TO LOT 133, WHICH LEADS EASTWARD FROM ROBINSON CANYON ROAD, APPEARS TO REQUIRE A MAJOR EXCAVATION (AND SCARRING) OF THE EXISTING ROAD CUT TO THE EAST OF ROBINSON CANYON ROAD. 28

ACTION: RAB 12-4 RE-ASSESS THE PROPOSED ENTRY TO LOT 133 AND RELOCATE AS REQUIRED.

WILL THE PROPOSED UTILITY AND/OR EMERGENCY EGRESS EASEMENTS SERVICING LOTS 223, # 224, 225, AND 226 GENERATE VISIBLE SCARRING AS SEEN FROM THE UPPER REACHES OF ROBINSON CANYON ROAD, THAT IS, FROM AS SEEN FROM ROBINSON CANYON ROAD WHILE DRIVING NORTH FROM PENON PEAK TRAIL ?

ACTION: RAB 12-4 PROVIDE A VISUAL ANALYSIS OF THE ROAD CUTS PROPOSED FOR LOTS 223, 224, 225, AND 226. PROPOSE MITIGATION MEASURES, IF REQUIRED.

CHAPTER 13. TRAFFIC

THE PUBLIC USES ROBINSON CANYON ROAD FOR SCENIC DRIVES, FOR WALKING AND HIKING RIGHT-OF WAY, FOR BICYCLING, AND FOR ENTRANCE AND EXIT TO THE TWO PRIVATE DEVELOPMENTS AT AND NEAR THE END OF THE ROAD .CURRENTLY THERE ARE THREE ONE LANE BRIDGES NORTH OF PENON PEAK TRAIL. THE ROAD IS EXTREMELY STEEP IN AREAS, WITH BLIND, HAIRPIN TURNS SUPERIMPOSED ON THE STEEPNESS. FOR THE FIRST APPROXIMATELY FIVE MILES SOUTH FROM CARMEL RIVER BRIDGE, THE ROAD CANNOT SUPPORT TWO CARS PASSING EACH OTHER FROM OPPOSITE DIRECTIONS, WITHOUT BOTH CARS SLOWING DOWN, BECAUSE THE ROAD IS SO NARROW. 29

ROBINSON CANYON ROAD IS A NARROW, SCENIC, BEAUTIFUL COUNTY ROAD, AND IT SHOULD REMAIN SO.

A QUANTITATIVE ASSESSMENT OF THE IMPACT ON TRAFFIC FLOW ON ROBINSON CANYON ROAD AS A RESULT OF THE PROPOSED DEVELOPMENT IS DIFFICULT, BUT CONSIDER THE FOLLOWING

INFORMATION AND POSSIBLE ACTIONS.

THERE ARE ~ 130 HOME SITES PROPOSED FOR THE AREA EAST OF ROBINSON CANYON ROAD. THE PROPOSED GOLF DEVELOPMENT IS TO THE EAST OF ROBINSON CANYON ROAD. ASSUME THAT YOU ARE A CURRENT HOMEOWNER, LIVING EAST OF ROBINSON CANYON ROAD, AND ARE AWARE OF THE FOLLOWING: 29

* ROBINSON CANYON ROAD PRESENTS A VERY SCENIC DRIVE. DRIVING NORTH ON ROBINSON CANYON ROAD FROM THE INTERSECTION OF ROBINSON CANYON ROAD AND RANCHO SAN CARLOS ROAD , THERE ARE VIEWS OF OPEN GRASSLAND, MOORE LAKE, AND CHAMISAL RIDGE. ONCE PAST PENON PEAK INTERSECTION, THE VIEW WHEN DRIVING NORTH INCLUDES MONTEREY BAY WATERS WITH THE SANTA CRUS AREA MOUNTAINS IN THE DISTANCE. FURTHER DOWN THE ROAD YOU DRIVE THROUGH QUIET REDWOOD GROVES.

* FROM ROBINSON CANYON ROAD / RANCHO SAN CARLOS ROAD INTERSECTION TO THE NEAREST SUPERMARKET IS ONLY A LITTLE OVER 7 MILES USING ROBINSON CANYON ROAD, BUT OVER 11 MILES USING RANCHO SAN CARLOS ROAD.

* VISITING OR COMMUTING TO SALINAS IS 6 MILES SHORTER VIA ROBINSON CANYON ROAD TO CARMEL VALLEY, AND LAURELAS GRADE TO HYWY 68 , THAN IT IS USING RANCHO SAN CARLOS ROAD TO CARMEL VALLEY, TO ROUTE 1, TO HYWY 68.

NOW, NOTWITHSTANDING THE DESIRE OF THE PRESERVE MANAGEMENT TO HAVE YOU USE ONLY RANCHO SAN CARLOS ROAD, THEY CANNOT FORCE YOU TO NOT USE THE COUNTY ROBINSON CANYON ROAD TO DRIVE UPON IT OR TO USE IT TO ENTER AND EXIT YOUR PROPERTY.

FOR SOME OF THE REASONS GIVEN ABOVE, MANY HOMEOWNERS WILL *DISCOVER* AND USE ROBINSON CANYON ROAD.

ACTION: RAB 13 - 1 RE-ASSESS THE IMPACT OF THE DEVELOPMENT ON THE FUTURE TRAFFIC DENSITY ON ROBINSON CANYON ROAD. DERIVE AN ACCEPTABLE SOLUTION TO MINIMIZE PROJECTED TRAFFIC ON ROBINSON CANYON ROAD, SO THAT THE PUBLIC CAN CONTINUE TO SAFELY USE THE ROAD, AND SO THAT MODIFICATIONS AND MAJOR IMPROVEMENTS AND REALIGNMENTS ARE NOT REQUIRED BECAUSE OF THE PROPOSED PROJECT.

THERE ARE A NUMBER OF VEHICLE TURN-OFFS ON ROBINSON CANYON ROAD. MANY OF THESE CURRENT TURN-OFFS APPEAR TO BE ON PRESERVE PROPERTY AND ARE NOT COUNTY RIGHT-OF-WAY, AT LEAST AS PERCEIVED FROM THE VTM'S. THESE TURN-OFFS ARE ESSENTIAL TO THE PUBLIC SO THAT THERE CAN BE USE OF THE ROAD AREAS FOR RECREATIONAL AND EDUCATIONAL PURPOSES.

ACTION: RAB 13 - 2 PROVIDE FOR CONTINUED USE OF EXISTING HISTORICAL MOTOR VEHICLE TURN-OFFS ON ROBINSON CANYON ROAD. ASSURE THAT PARKING BY THE PUBLIC IN THESE AREAS REMAINS UNRESTRICTED.

THE SANTA LUCIA PRESERVE, GOLF TRAIL USE PERMIT APPLICATION, DECEMBER 1994, TRAFFIC, SECTION 4 , "TRAFFIC MINIMIZATION MEASURES FOR ROBINSON CANYON ROAD, PAGE 5 , INDICATES: " 6. IMPROVEMENTS TO THE WIDTH AND SIGHT LINES OF ROBINSON CANYON ROAD WITHIN THE SAN FRANCISQUITO FLAT AREA OF THE SANTA LUCIA PRESERVE WILL BE MADE TO ACCOMMODATE CROSS TRAFFIC AND CIRCULATION"

ACTION: RAB 1 3 - 3 PROVIDE THE SPECIFICS OF PROPOSED CONSTRUCTION, REALIGNMENTS, GRADING, VIEWSHED ALTERATION, SPEED LIMITS, PEDESTRIAN SAFETY, ANIMAL CROSSING SAFETY, ETC., FOR THE APPLICANT'S PROPOSED ALTERATIONS TO THE SCENIC *COUNTY* ROBINSON CANYON ROAD.

THE PROPOSED SPEED LIMIT OF 3 5 MPH WITHIN THE PRESERVE PROPERTY IS TOO FAST. TRY DRIVING ANY PORTION OF THE ROAD FROM THE INTERSECTION FROM ROBINSON CANYON ROAD / RANCHO SAN CARLOS ROAD TO THE WHITE ROCK ENTRANCE AT 3 5 MPH. THIRTY FIVE MPH IS TOO FAST BOTH FROM A SAFETY POINT OF VIEW , AND FROM A ANIMAL LETHALITY POINT OF VIEW. MOST ALL HOMEOWNERS ASSOCIATIONS, IN SIMILAR GEOGRAPHICAL SETTINGS, POST AND ENFORCE 2 5 MPH SPEED LIMITS. THIS IS ESPECIALLY IMPORTANT AT NIGHT, WHEN ANIMAL MOVEMENTS AND SIGHTINGS ARE MOST FREQUENT, AND VISIBILITY IS HIGHLY REDUCED. THIRTY FIVE MPH WOULD NOT ALLOW ENOUGH REACTION TIME TO AVOID STRIKING AN ANIMAL CROSSING THE ROAD OR WALKING ON THE ROAD.

ACTION: RAB 1 3 - 4 CHANGE THE PROPOSED VEHICLE SPEED LIMIT TO 2 5 MPH ON ALL ROADS WITHIN THE PRESERVE.

THANK YOU AGAIN FOR THE OPPORTUNITY TO REVIEW THE SANTA LUCIA PRESERVE ENVIRONMENTAL IMPACT REPORT. IF I CAN BE OF ASSISTANCE IN ANY CLARIFICATIONS OR DISCUSSIONS ON ACTION RESOLUTION, PLEASE FEEL FREE TO CONTACT ME.

R. A. Breuch

RONALD A. BREUCH

General Response

This letter contains the details of many wildlife observations that provide useful background information but require no response in the final EIR. Further, it should be noted that much of the information contained in this letter, including the legal status designations for all of the special-status species referenced, was presented in the draft EIR (Table 11-3).

1. In general, Jones & Stokes Associates refrains from publishing exact raptor nest locations in draft EIRs to avoid subsequent human disturbance of these sensitive resources. General locations of white-tailed (no longer referred to as "black-shouldered", according to the American Ornithologists Union, Auk 1993, 110[3]:675-682) kite nests observed by BioSystems Analysis (1994) were summarized in Table 11-3 of the draft EIR. Potential nesting pairs were noted near building envelopes PN-01 and SF-33 in 1992 and 1993, respectively.

   Although no evidence of nesting was observed during 1991 surveys (drought period), observations made during 1992 and 1993 suggested that "the woodlands adjacent to San Francisquito Flat may provide suitable nesting cover" (BioSystems Analysis 1994). Following the end of the drought, and subsequent to extensive modification of grazing patterns (including removing cattle from wetlands), white-tailed kites have appeared and are regularly observed in this area. Nesting has not been confirmed, but a pair could become established there soon.

   The proposed plan specifically avoids development of the wetlands and grasslands of the San Francisquito Flat area, and riparian habitats will be maintained and restored as part of the long-term management of the Santa Lucia Preserve. The areal extent of herbaceous wetlands and perennial grasslands also would be enlarged in this area. As stated in the project applications, management of these and other sensitive habitats and ecosystems will focus on enhancing biodiversity and sustainability, conditions which have improved already since new agricultural practices were instituted in 1992 (Froke pers. comm.).

2. BioSystems Analysis' evaluation of owl populations, including California spotted owls, was based on studies by Dr. Stephen Laymon. California spotted owls was the subject of Dr. Laymon's dissertation at the University of California, Berkeley. In addition to Dr. Laymon's detailed studies, there are plentiful records of the subspecies' occurrence (but no confirmation of breeding) collected by qualified, local field ornithologists (e.g., Don Roberson), especially in portions of the ranch bisected by Robinson Canyon Road.

   Dr. Laymon searched for California spotted owls in Robinson Canyon but did not find them there. These surveys, however, were conducted during a drought, when the owls may not have been breeding. For this reason and because of the canyon's well-documented history as owl habitat (Roberson 1985), this area can be assumed to be regularly occupied by this

subspecies. Other known spotted owl habitat areas at the Santa Lucia Preserve are listed in Table 11-3 of the draft EIR.

The presence of an active spotted owl nest at a building or road construction alignment would require site-specific analysis to prevent a nesting failure. As noted in the draft EIR (page 11-50), however, all known spotted owl nesting sites were avoided in the project's design; only about 6 acres of potentially suitable spotted owl habitat would be removed, representing less than 1% of the breeding habitat available for this species that would remain at the Santa Lucia Preserve after project implementation.

3. As summarized in the draft EIR (Table 11-3), tricolored blackbirds are regular, nonbreeding visitors to Moore's Lake and Cienega Pond and they forage in suitable pastures and wetlands of the Santa Lucia Preserve. This species, however, has not been recorded nesting at the preserve (Beedy et al. 1991, Roberson and Tenney 1993). This letter incorrectly states that emergent wetlands at Moore's Lake constitute suitable tricolored blackbird nesting habitat and that "trained observers" could verify breeding there.

   Beedy et al. (1991) summarized the key habitat requirements of tricolored blackbirds, including a productive source of insect food, water at or near the nesting colony, and a protected nesting substrate. Onsite inspections of the emergent wetlands at Moore's Lake and Cienega Pond by Dr. Beedy, a Jones & Stokes Associates wildlife biologist, revealed that they are continuous with upland habitats (i.e., they are not protected islands) and thus are vulnerable to predation by terrestrial mammals such as raccoons and coyotes. Tricolored blackbird colonies attempting to nest in these habitats in the past may have been excluded by predation. It is likely that suitable nesting habitats could be created by revegetating existing islands with cattails and tules and by fencing lakeshore wetlands from cattle, as recommended in the Grazing Management Plan.

4. As noted in Table 11-3 of the EIR, nonbreeding double-crested cormorants have been observed previously at the Santa Lucia Preserve. The comment letter indicates that a pair of cormorants was observed at Moore's Lake in 1995, but it offers no evidence that these birds were nesting there. Moore's Lake does provide suitable nesting habitat for this species, and fencing lakeshore wetlands should enhance the future potential for double-crested cormorants to nest at the Santa Lucia Preserve.

5. As noted in Table 11-3 of the EIR, purple martins were considered probable breeders (adults feeding fledged young) at the Santa Lucia Preserve. Based on extensive observation and monitoring nest boxes that have been placed at the preserve (numbering more than 1,000; established 1992-1995), however, none have supported nesting martins (Froke pers. comm.). A variety of other wildlife species have been observed using the nest boxes, however, including tree swallows and violet-green swallows. Both of these swallows have iridescent plumage and superficially resemble martins in flight. It is possible that the commenter misidentified these birds. A detailed description would be required to validate his sighting.

More than 96% of the potential martin habitat at the Santa Lucia Preserve will be protected by this project. Unfortunately, in the western United States, purple martins rarely respond to nest boxes; preservation of snags on coastal ridges is still the best strategy. Large snags will be protected to provide nest sites for martins and other cavity-nesting species. Focused management will include the retention of snags at specified (minimum) densities and with minimum trunk/cavity diameters. Effective 1991, the historical practice of felling snags and standing senescent conifers was reversed, and these trees have been retained for the express purpose of maintaining diversity and numbers of cavity-nesting species.

6. Table 11-3 of the EIR was revised to include the information on the Monterey dusky-footed woodrat on page 11-48.

7. Until recently, the mountain lion was considered a "harvest" species by DFG. Although it is no longer legal to take mountain lions by sport hunting in California, this species has no state-listed, federally listed, or candidate status, as incorrectly stated in this letter.

8. Mitigation measures were not proposed for white-tailed kites or tricolored blackbirds because no adverse impacts on these species were identified in the draft EIR. No known white-tailed kite nest site or habitual foraging area would be lost due to home site or road construction. As discussed under response to Comment 3 above, suitable nesting habitat for tricolored blackbirds is not currently present at the Santa Lucia Preserve. Nonbreeding tricolored blackbirds move nomadically through the landscape, and the loss of 235 acres of annual grassland foraging habitat would have a less-than-significant impact on this species. Implementation of the proposed project could actually increase potential tricolored blackbird foraging habitat at the preserve because overall grazing pressure would be reduced; this species prefers to forage in ungrazed pasturelands (Beedy et al. 1991).

9. Please refer to the response to Comment 8 above.

10. As stated in the responses to Comments 3 and 8, no mitigation is required for tricolored blackbirds because no adverse impacts on this nonbreeding species are likely to occur. As noted in the response to Comment 8 above, implementation of the proposed project could improve overall habitat conditions for this species.

11. Implementation of the proposed project will not prevent public access to the lower portions of Robinson Canyon Road. Historically occupied California spotted owl habitat areas that can be viewed from this road will continue to be available for public use and for bird watching and bird listening.

12. Please refer to the response to Comment 2 above. If no impacts on this subspecies or its habitats occur, no mitigation is required.

13. The referenced road from Robinson Canyon Road to proposed Lot 226 is an existing, long-established ranch access road; it has been designated exclusively as an emergency access road.

14. No known purple martin nesting sites would be destroyed or disturbed by implementation of the proposed project, including along the golf trail.

15. As noted in the response to Comment 4 above, nesting by double-crested cormorants at Moore's Lake has not been confirmed. The presence of a "pair" of birds "early this year (1995)" does not imply successful breeding. Moore's Lake would be protected and enhanced by fencing to exclude cattle under the proposed plan, and potential nesting habitat for double-crested cormorants would be likely to increase. Because no impacts on this species are likely to occur, no mitigation is required.

16. Typically, Monterey dusky-footed woodrat nests are situated in densely vegetated areas such as oak woodlands and chaparral with abundant dead wood for nest construction (Table 11-3). In general, home sites are situated in forest clearings and at forest-grassland edges to avoid fire danger. Thus, home site construction would probably not occur in areas with high woodrat densities. If, however, active nest sites are found prior to construction, the nests will be excavated and moved to avoid harm to the woodrats.

17. The concept of biological/archaeological excavations of woodrat middens has scientific merit and will be considered by the project applicant.

18. Because of the wide-ranging habits of mountain lions, no precise estimates of mountain lion population densities are available for the Santa Lucia Preserve. As described in the response to Comment 1 from CNPS, implementation of the colander approach to home site clustering would retain extensive areas of open space for the movement of mountain lions and other large carnivores. Mountain lion experts were consulted extensively in the development of this planning approach and concluded that this project would have no appreciable effects on mountain lion populations at the Santa Lucia Preserve. The suggestion of an educational program on the habits and habitat requirements of mountain lions will be conveyed to the project applicant.

19. This general comment states that "the applicants' observations of certain special-status species differs in important respects from my observations". These differences, however, are not specified and require no response in the final EIR. As discussed in the draft EIR (pages 11-1 and 11-2 and elsewhere), BioSystems Analysis and other consultants have conducted intensive habitat and species inventories at the Santa Lucia Preserve since 1990. These inventories were supplemented with focused surveys for targeted special-status species (including owls) that were supported by GIS-based analyses. The implication that the accuracy of survey results is questionable for the remainder of the preserve, compared to casual observations in a few locations, was not supported by any evidence. Further, this commenter apparently did not review any of the background biological reports prepared by BioSystems Analysis and other consultants.

20. Focused surveys for marbled murrelets were conducted in suitable habitats (i.e., mature, coastal coniferous forests) by trained observers using accepted USFWS protocols (Froke

pers. comm. and Suddjian 1991). The results of these intensive surveys indicate that no marbled murrelets were present. It should be further noted that all of the suitable marbled murrelet nesting habitats at the Santa Lucia Preserve would be protected under the proposed plan.

21. Species-specific exclusion of wildlife, feral animals, and livestock is a mainstay of wildlife management, and its effective use for wild pig management is increasingly common in California (e.g., Pinnacles National Monument, Annadel State Park). Plans and designs for pig management, including the use of species-specific fencing, were advised by Dr. Reg Barrett of U.C. Berkeley, the leading expert on the species' biology and management in the state.

The key issue for fencing is to reduce or constrict movements of pigs while permitting unrestricted movement of deer, including fawns. Fence height, mesh size, and provision and proper placement of breaks and gaps are the principal variables in fence construction. The fence at the preserve is a well-anchored, heavy gauge, open-mesh hogwire 4 feet high. In practice, all other species of native wildlife (i.e., jumpers, climbers, hoppers, crawlers, and burrowers) are unaffected by such fencing. This type of fencing is the second most common type found throughout farms and ranches of Monterey County and California and is commonly used along highways and public roads where control of calves and sheep is critical.

The project applicant has focused on fencing as a protection measure for the golf trail, but the technique has substantial and positive implications for protecting sensitive aquatic, riparian, and wetland sites and ecosystems. Local evidence is present at the ranch, where a similar type of fencing has restricted cattle grazing in the vicinity of San Francisquito Flat and at Moore's Lake. At these sites, lakeside emergents and riparian woodlands and bottomlands have become reestablished. As a secondary result, pig damage to the wetlands has become more localized rather than widespread. Also, deer movements are not affected by the fencing here.

22. Only nonchemical and nontoxic methods of rodent control will be used at the golf trail area. Some lethal trapping will be employed in problem areas (Froke pers. comm.).

23. Passive physical exclusion of wild boars will be employed to prevent these animals from destroying sensitive wetland areas at the preserve. Trapping will be employed, under the terms of a depredation permit issued by DFG, and any meat from sacrificed animals will be donated to a suitable charity (Froke pers. comm.).

24. The views to the site are vivid and provide sensitive views from various locations in the area.

25. This mitigation measure specifies relocation of the larger structure of the operations center to the northeast of the proposed location. This would be about 300 feet from the intersection of Robinson Canyon Road and Rancho San Carlos Road.

26. The proposed development for Lots 262 and 263 is addressed in the EIR as an impact that needs mitigation (draft EIR on page 12-18).

27. The visual impact of the golf trail is evaluated in The Santa Lucia Preserve: The Golf Trail, A Visual Analysis (Rancho San Carlos Partnership1994d) and provides information on the golf course. Areas of the golf trail may be visible but will not substantially reduce the intactness, vividness, or unity of the area from a public viewing area and ridgelines would not be visually affected.

Lot 134 is sited to maintain county policies, avoid sensitive ridgelines, and not create a substantially adverse visual impact when viewed from a common public viewing area.

28. Changes in views caused by development of roadways are addressed in the draft EIR on page 12-26. Views to the road would not be visible from a common public viewing area because of proposed screening and the intervening topography.

29. As described in the draft EIR, 9.3% of offsite traffic is anticipated to use Robinson Canyon Road. The applicant is proposing a series of mitigation measures to minimize the use of Robinson Canyon Road. These measures are shown on page 13-29 of the draft EIR.

Turnoffs on Robinson Canyon Road are not expected to be significantly affected by the proposed project with the mitigation measures designed to minimize use of this roadway.

The applicant is not proposing any alterations to Robinson Canyon Road.

The posted speed limit for Rancho San Carlos Road will be determined based on its design after it is improved and would be approved by the county. The posted speed limit would not be set at 35 mph if this road is not designed for that speed.

Tim Condon
36 West Garzas Road,
Carmel Valley, CA 93924

Wanda Hickman
Monterey County
Planning and Building Inspection Dept.
240 Church Street,
P.O. Box 1208, Salinas, CA 93902

June 28, 1995

Dear Ms. Hickman:

I have reviewed the Draft EIR for the Santa Lucia Preserve (94-005) and have the following general comments:

I recommend tentative approval of the project under the "No Golf Trail Alternative".

The Rancho San Carlos watershed is essential to the annual recharge of the Carmel Valley aquifer. Notwithstanding the elaborate systems for recovery of irrigation and waste water and other proposed mitigations and the finding of "less than significant" impact, an upstream golf course which requires 210 af/yr or 77% of the 272 af/yr total net groundwater demand estimated for this project is inadvisable in light of the recent findings by the State Water Resources Board. 1

Without a clear long term solution of the Carmel River overdraft by Cal-Am, an upstream golf course is an unacceptable risk which should be denied at this time.

Sincerely,

Tim Condon

1. The Monterey County Board of Supervisors will consider this recommendation regarding the approval of the No-Golf Trail Alternative. The golf course would make use of stormwater (58 acre-feet per year [af/yr]) and reclaimed water (79 af/yr) that would otherwise not be used. Thus, the true net water demand for the golf course (including 3 af/yr for the clubhouse) would be 73 af/yr (210 - 58 - 79 = 73), or 27% of the total consumptive use for the project.

   For reasons described in detail on pages 8-57 to 8-60 of the draft EIR, the project would have a less-than-significant impact on water supply in the Carmel Valley. In this regard, it is worth noting that the net consumptive use for the golf course represents 0.3% of annual pumping in the Carmel Valley and 0.2% as much water as would be pumped if the 19,900-acre project area were used for irrigated agriculture instead of the proposed project.

Monterey County
Planning Department
Wanda Hickman - Associate Planner

July 1-7, 1995

Re: Rancho San Carlos Project (aka Santa Lucia Preserve)
- Draft EIR Comments

All the following comments are significant.

This DEIR is inadequate in its present form based on a variey of reasons including the following: 1

* The Draft EIR must be re-written and resubmitted as a new Draft EIR for public comment.

When a Public Benefit Assessment Area is set up as described on pages 16-7 and 16-10, a Fiscal Impact report must be included in and AT THE SAME TIME as the Project DEIR. 2

There is no fiscal impact discussed in this EIR regarding the Benefit Assessment

Please refer to the issue between Aptos and Santa Cruz County for the details of the court decision.

At 20,000 plus acres - this is probably the largest development project in the United States today. 3

*Please discuss and confirm or deny this concern.

Comment Period Extension:

The comment period for the DEIR must be extended because the library closest to the project (Harrison Library in Carmel-by-the-Sea) has not had the EIR available. We found out last night several people had requested it over the past 3 weeks and been told the Library did not have it. I just called the Harrison Library to confirm this and after quite a search - it was found - but it was neither unpacked or catalogued. Thus unavailable for the public. Always helpful they offered to change their procedures to notify all librarians where to find unpacked new EIRs when they arrive. 4

Pacific Grove Library does not have it at all.
Monterey Library could not find one after searching for 20 minutes.
Monterey Library called back and could not find it.

In light of the previous point "this is probably the largest development project in the United States today" it seems powerfully remiss to press forward with a project where the EIR was not available in 3 of the closest public libraries.

*Please extend the Comment period for 30 days and put out new public notice of its availability.

Executive Summary:

*Please include the word "Executive" before "Summary" in the title for this section. 5

*Please don't use brown paper - it is very hard to read due to low contrast. 6

S-1, under "Comprehensive Plan" states "90% of the land ... would be set aside..." I find that most if not all that land is legally unbuildable anyway. 7

*Please state in the Executive Summary how much of the "90%" is unbuildable for various reasons - over 30% slope, visual viewshed, endangerd species habitat. 8

*Please state in the Executive Summary how much of the "90%" will be affected by "Edge effects". 9

Under "Open Space" S-2 "18,000 acres will be "set aside". 10

*Please describe whether this will go in the deed or something less legally binding.

*Please describe on page 1 of the Executive Summary how the proposed project would actually allow (297 x 4) + 53 dwelling units - not the 350 as described. 11

*Please describe on page 1 of the Executive Summary how the Construction impacts, noise including and dust, will go on for 20 years. 12

The term "Golf Trail" is doublespeak. Doublespeak is - "Words used to avoid harsh distasteful reality." 13

*Please do not describe the Golf Course as a "Golf Trail" in the Executive Summary.

15,000 square feet seems quite a large Clubhouse to service only 41 rounds of golf a day. 14

*Please list nearby GCs and their clubhouse size in square feet - specifically Pacific Grove's.

*Please describe in the Executive Summary whether the Golf Course is a Membership golf course and whether tournements will be prohibited there. 15

*Please describe in the Executive Summary where the tertiary sewage treatment plant will be located. 16

*Please do not use ACRONYMS in the Executive Summary. GMPAP, PC94218 " are unnecessarily intimidating and not useful to those unfamiliar with planning jargon. 17

*Please describe in the Executive Summary in acres how much "limited development" is proposed to occur on slopes over 30%. 18

*Please map in the Executive Summary the areas proposed for tree removal and ridgeline development. 19

*Please state in the Executive Summary how the Monterey Peninsula drinking water supply is downstream from the proposed Golf Course (San Clemente Dam). 20

*Please state in the Executive Summary how a homes in a Redwood forest are downstream from the proposed Golf Course. 21

*Please state in the Executive Summary that toxic chemicals are to be used on the proposed Golf Course on lands upstream from the Monterey Peninsula drinking water supply. 22

Alternatives:

Lack of Reasonable Alternatives.
There is no discussion of the economics associated with the differences between the various alternatives. Such a discussion is needed as determined 23

in (Burger vs Mendocino County 1975), a famous court case setting a precedent for CEQA and EIR adequacy. 23

*Please prepare and evaluate an alternative that reduces the total number of dwelling units to the 350 restriction by County Supervisors - Resolution No. 93-115. 24

*Please prepare and evaluate an alternative that genuinely clusters the dwellings. Not like the shotgun scattered effect of the proposal. 25

*Please prepare and evaluate an alternative that does not in any way disrupt or destroy any paleontological or archeological resources. 26

*Please prepare and evaluate an alternative that does not allow a Quarry or mining operations. 27

*Please describe how this is compatible with the "social characteristics of "Carmel-by-the-Sea". 28

*Please prepare and evaluate an alternative that does not allow Grazing. 29

*Please prepare and evaluate an alternative that actually does prevent project traffic fromusing Robinson Canyon Road except in emergencies. 30

Index:

The EIR does not have an index.
Planning Commissioners and County Supervisors can not lay their hands on information at will.

An Index is vital to the proper understanding of the EIR by the lead agency, the public and decision making public officials.

Because Environmental Impact Reports are necessarily large documents and the time given to respond to them is small, the lead agency and the public need an index, a THOROUGH index, to find the many items of interest in a timely fashion. 31

Without an index, how else can one find all references to items of interest such as: Which of the areas contain Redwood trees?

Example: "Where is that other reference to dusky footed wood rats? Where is that traffic reference to golf course traffic? It isn't in the sections on traffic or air quality."

A modern word processor can create an excellent index with the press of a button in just minutes. A hours worth of effort makes an excellent index.

If some of my comments ask for items that are already in the EIR, it is because I couldn't find them in a timely fashion without an index.

On a technical document costing more than a quarter of a million dollars it is unacceptable that it does not contain an index.

* Please include a THOROUGH index.

Jargon:

Because Environmental Impact Reports are getting large and often complex and use an incredible array of insider jargon: 32

* Please do not allow any use of planning jargon, building jargon or any other jargon.

* Please include the legal definition of "Mitigation".

* Please clearly explain in the Executive Summary how mitigation does not mean "equal replacement" but only means "to minimize damage". 32

For example: "Mitigating" a broken drinking glass might mean gluing the glass back together - NOT replacing it with a new glass.

Glossary:

There is some sort of Glossary scattered throughout the document. It is neither identified or easy to use by busy Planning Commissioners or County supervisors. 33

* Please include a Glossary. In the glossary, include all terms and acronyms not known to the general public: such as BMPs, CZ, NOP, MCWRA.

Golf Course Section:

The Golf Course (aka Golf Links) information is extremely hard to find.

*Please rewrite and re-submit as a Draft EIR a new version that includes the Golf Course as a separate section - not patched in as the current one is. 34

* Please describe the NEED for yet another Golf Course. 35

Mitigation in General:

General Douglas MacArthur said "In war there is no substitute for victory." Similarly for preserving species "There is no substitute for leaving it alone."

* For each mitigation measure, please identify and describe the non-subjective method of measuring:

1) the name of the criteria and the baseline (existing or current) number (or numbers) for whatever criteria is used to measure the impact;

2) the degree, in both percent and amount to which the impact would raise or lower that baseline number; 36

3) the threshold number at which the impact changes from significant to less than significant;

4) the amount of reduction for each individual mitigation measure suggested;

5) the new total number after the suggested mitigation;

6) the total change from baseline to maximum impact;

7) the total change from baseline to maximum impact if all mitigation is implemented;

8) at least one real world example of a successful implementation of each proposed mitigation measure that is in place and has been self-sustaining for a minimum of 3-5 years;

9) detail how and how often the mitigation will be monitored.

10) list all legal remedies for complaints about any mitigation implementation and identify it as none if there are no legal remedies.

Monterey County has demonstrated an inability to enforce compliance with mitigation measures at the Spanish Bay project.

So the public can determine the track record of the ability of the County to follow-up:

* Please list all mitigation of types similar to those proposed by this Plan that Monterey County has been responsible for following up on implementation. Include descriptions of mitigation measures and where in the process the mitigation is now, and what percentage of mitigation has been successful

* Please describe all mechanisms the County and the public have to enforce the mitigation described.

* Please document all instances and complaints in the past ten years where the County has failed to enforce mitigation.

* Considering the track record of both applicant and mitigation monitoring authority described above, please explain how and why any mitigation measures other than "avoidance" can be responsibly recommended.

* Please describe how preservation of a few individuals from populations of each of the special status species (Monterey pine, Hickman's Onion, Yadon's Piperia, Monterey Clover, Sandmat Manzanita etc.) can ever serve as a mitigation measure when their habitat is destroyed.

36

Understandability:

With a few exceptions, in general I do find the DEIR written in a fashion understandable by non-technical people, in "newspaper english", as required by CEQA. Thank you.

However I find the structure of the order "Setting, Impact/Mitigation measures" to be inadequate, confusing and lacking information needed to make proper decisions.

A much clearer order would be: Baseline (Setting), list of activities generating impacts, THEN list the Impact/Mitigation measures.

The way it is currently, the impacts are presented too briefly often without either quantitative or qualitative information.

*Please use the format suggested above and in all cases include quantitative and qualitative information.

37

Sentence Complexity & Clarity:

* Please remove all complexity from documents. Merely avoiding complexity whenever possible is not enough.

A standard measure of sentence complexity is 17 words per sentence. Documents with an abundance of sentences longer than 17 words are considered complex.

* Please shorten sentences whenever possible to increase clarity.

* Please run the EIR through a grammar or style checking program such as "Rightwriter" or "Grammatic" to identify and breakup or simplify lengthy sentences.

There are many mis-spellings, some inconsequential, others such as "100 cubic years" on page 4.1-3 can be very confusing to non-technical readers.

38

* Please use a Spell checking program on the EIR.

*Please contact each EIR response preparer by phone if any question is unclear. 39

Including vs Excluding Issues
It is requested that no issue be deleted for evaluation by this EIR. Several requests made during the scoping process remain unaddressed.

* Please do NOT delete discussion of ANY issue. The County and the public will decide the significance of each issue.

* Please address EACH comment submitted during or for the scoping and EIR process. So that the public does not have to repeat its requests. 40

* Please list all the comments submitted during the scoping process that were not addressed in the EIR.

Environmental Impact Reports were originally created because of public outrage at being kept in the dark about significant issues. Omitting issues requested by the public recommends a return to those "dark ages" by taking some decisions of significance away from the public.

In acreage, this proposal is probably the biggest development ever in the United States.

* Please compare and contrast (using a table) each alternative with the 5 other largest developments ever to occur on the Monterey Peninsula in terms of homes, water use, traffic impacts and wild lands lost. 41

This will establish the historical importance of the size and impacts of each alternative to the community.

COMPLETE DISCLOSURE OF STUDIES

* Please VERY FULLY and SPECIFICALLY identify all sources of forecast data for population and traffic forecast data, methods, evidence & reasons.

* Please include a complete list of references and sources. 42

* For each study (i.e. Forest, Air, Traffic, Water & Sewerage) please include all data, evidence, assumptions, methods and complete reasoning. Conclusions alone are NOT sufficient.

Reason: Very often conclusions are presented as fact, that could have an equally compelling argument that draws the exact opposite conclusion. The County and the public need to have a complete understanding of all the components of a conclusion.

Margin of Error:

* Please use a "Margin of error" to describe a confidence level on all numbers that are not directly measured "hard data".

For each data set and assumption please include a confidence level. Reason: If two items are both presented as fact, without a confidence level an everyday citizen may never understand that fact 1 is beyond dispute, such as "the Moon orbits the Earth"; and that fact 2 is highly disputed, only slightly possible or is based on a complex chain of evidence and reason - like global warming. 43

* Please include the range of estimates used for any conclusion; the high,

low and any mean or median estimates for any forecasts; and describe which estimate is used for each conclusion.

* Please use graphs, diagrams and charts whenever data is presented. Tables of data don't mean much to the general public. According to the best selling book "Innumeracy", numbers and math intimidate most people. Graphs and charts allow those people intimidated by numbers and math to understand. 44

Computer Models Misleading:
"Because computer models are so poorly understood by most people, it is easy for them to be misused, accidentally or intentionally."
- From: A Skeptics Guide to Computer Models by Dr. John D. Sterman 45

* Please avoid computer models unless the models are made fully, and without charge, available to the public with specific hearing time set aside for a discussion of each model's value.

Facts Before Conclusions:

* Please insure and describe how you insure that conclusions are not allowed to be established before facts are investigated. 46

Doublespeak:

Doublespeak is - "Words used to avoid harsh distasteful reality."
- Doublespeak by Prof Bill Lutz

Thank you for an effort to avoid Doublespeak. Unfortunately several instances of it remain. Doublespeak is misleading whether deliberate or accidental. President Bush received the 1990 Doublespeak award for proposing a 1991 budget containing "no new taxes", even though it did contain $21.7 billion in "receipts proposals". 47

* Please remove all Doublespeak.

Golf Course:

"Golf Trail" is Doublespeak.

* Please do not use applicant's jargon Golf "Trail" - use plain language.

By my count there are 17 golf courses already on the peninsula.

*Please describe the number, acreage and water use of Golf Courses already on the peninsula. 48

I understand several new Golf Courses are proposed for the peninsula - in Pebble Beach, Here RSC, Bishop Ranch, Tarpey Flats, even County

*Please list and describe all recent and proposed golf courses for the peninsula.

Golf Course Water vs Rationing for Homes
According to the Water Board 10% of Peninsula's water is used by Golf Courses.

Apparently the Golf Course water requirements were determined using 60 degree weather. Rancho San Carlos is over 100 degrees many days of the summer until late fall.

*Please recalculate the Golf Course water requirements using more appropriate temperature data.

*Please state in the Executive Summary how the Monterey Peninsula and Rancho San Carlos areas are technically described as a semi-desert with rainfall 18"/year. | 49

*Please describe the percentage and total amount of water in acre feet which existing Monterey Peninsula golf courses use related to the CalAm service area. | 50

*Please describe the percentage and total amount of water in acre feet which existing Monterey Peninsula golf courses use related to the Monterey Peninsula Water District service area. | 51

Golf Courses are "Green Graveyards". They support no other kind of life - no trees, no birds, no insects - only turfgrass. | 52

*Please list and describe the species (plant, animal, insects) typically found on Golf Courses.

*Please list and describe the species (plant, animal, insects) expected to be found on the proposed Golf Course.

Page 9-22 leaves Toxic Runoff (Pesticides and fertilizers) undescribed. | 53

*Please state in the Executive Summary how the Monterey Peninsula drinking water supply is downstream from the proposed Golf Course (San Clemente Dam). | 54

*Please state in the Executive Summary how a homes in a Redwood forest are downstream from the proposed Golf Course. | 55

According to the Wall Street Journal (May 2 1994) about 18 pounds pesticides are applied per acre of GC.

*Please list, describe all chemicals (chemical name and Brand name) and the yearly amounts (in pounds) to be applied as a result of the Golf Course. | 56

*Please describe the toxicity limits to humans for each chemical described above in terms of Carcinogenic, hazardous, poisonous, and lethal doses.

*If there are no studies of toxicity for a specific chemical - please explicitly note that.

*Please include an Material Data Safety Sheet (MSDS) for each chemical to be applied to the Golf Course, just as required for every chemical used in a school laboratory.

Typical Poisons used in GCs are Phosporus, Mercury, Arsenic, Diazanon insecticide, Nemacur (phenamiphos), ethelyene dibromide and Chlorothanlonil.

*Please describe whether Hydrogen Peroxide will be used to prepare the ground.

*Please describe how this is a membership only Golf Course - The kind the Coastal Commission rejected in PB recently. | 57

Golf Tournaments are a huge traffic and parking problem in Pebble Beach. Are tournaments planned or prohibited on this golf course? | 58

Water:

*Please prepare an Alternative which would reduce the size of Project so Water impacts are less than Significant. | 59

*Please prepare Mitigation measures which would reduce the size of Project so Water impacts are less than Significant. 60

Wildlife Corridors

This project will result in the loss of thousands of acres of wildlife corridors 61

*Please map current Wildlife Corridors and describe what will be lost.

Edge Effect:

*Please prepare a map that shows the entire footprint of edge effects.

* Please study and detail how the health of each Wild area in the proposal area, and the health of each animal species residing within, degrades as it lives closer to each of the following man-made items:

1. Dirt path
2. Dirt roadway
3. Asphalt roadway
4. Home
5. Subdivision
6. Power lines
7. Septic system
8. Underground water system
9. Underground sewer system

62

* Please provide complete documentation to determine the minimum distance from any man-made item, including roads and any infrastructure, like underground water, sewerage, and power lines, needed to insure an area of un-impacted wildland and its wildlife habitat is self sustaining.

* Please examine and describe how far from each of the above man-made items that each species of native wildlife (from a real wildlife inventory) ceases to inhabit.

We need to know how far from human habitation wildlife are able and willing to live, in order to protect sufficient habitat for them to remain as healthy residents of our area. After all, they were here first.

If a minimum distance is not agreed upon, please use 300' as the minimum needed to insure any un-impacted Native Monterey Pine forest.

* Please cite and describe studies that describe the how edge effect changes over years. (Whether damage to environment grows in area.)

* Please describe the three types of edges in edge effect where urban impact is the greatest impact.

* Please include color coded maps to show the habitat of each wildlife species.

* Please identify potential habitat for the Sharp shinned hawk.

* Please report all sightings in the past ten years of the Sharp shinned hawk in the proposal area.

Edge Effects & Weather
"Edge effect" describes how trees at a new edge of a forest, where trees have been cut for timber or roads or subdivisions, are exposed to much higher wind gusts - which knocks them over prematurely, and erosion which exposes roots, and loss of wildlife and biodiversity necessary to sustain a healthy forest.

"Forests near induced edges, for example, may have a higher density but lower diversity of birds than the interior forest. A number of studies have shown increased predation of songbird and quail eggs near forest edges. The predation is worst near developed areas (which might have unnaturally high populations of cats, raccoons, skunks, jays an crows)." - Mitch Lansky "Beyond the Beauty Strip"

62

Please describe the "Edge effects" of rain and heightened erosion on the remaining trees after the forest is cut down.

Please describe the "Edge effects" of wind on the remaining trees after the proposed forest cutting is finished.

* Please identify the length of each edge of forest and the amount of forest affected by different impacts such as barking dogs, dogs running loose, lights from homes, noise from roads.

* Please identify the length of the new edge for each subdivision after the proposed development and map and detail the number of acres that have been lost that were previously unaffected by edge.

* Please detail any proposed mitigation of micro-climate (tiny and very local weather) changes near roads and homes.

* Please describe the health of wildlands when they are reduced to "Islands"

There are three kinds of edge effect simply described: 1) trees cut in a forest, 2) roads cut in a forest, 3) Urban development next to a forest.

* Please identify by mapping which of each of these effect exist now and how they will change if the project is approved.

* Please include the "Three tree height rule for wind penetration".

Sound:

* Please Map and detail the sound levels at most distant residences where the noise of construction could be heard. 63

* Please explain the quantity and rate of tree removal. Include expected start date related to final project approval. 64

Traffic:

Segment 6 traffic is worse than 1986. Now at LOS "E" (page S-13) 65
*Please describe how the Fire Station is in the middle of Segment 6.

* Please describe in the Executive Summary how Fire Response to Existing Carmel Valley Residents will Slow as a result of the traffic increase from this project. 66

*Please eliminate all use of Carmel Valley road section numbers. At the EIR workshop on July 6 we found that not one of the 30+ participants knew what "Section 6" of Carmel Valley road was - and these are among the most active people in the Valley. 67

*Please use the road designations instead ("Shulte to Robinson Cnyn Road").

The assertion that residents and visitors to the project will only use Robinson Canyon road minimally is ludicrous. 68

*Please present evidence and reasoning to support such a conclusion.

*Please describe whether there will be entrance gates on both sides of Robinson Canyon Road - or a bridge over it? 69

•Please prepare and evaluate an alternative that actually does prevent project traffic fromusing Robinson Canyon Road except in emergencies. 69

All the above comments are significant.

...More to come in Chapter 2

Thank you for your attention to my comments,
David Dilworth
408-624-6500, Box 1495, Carmel 93921

1. The Monterey County Board of Supervisors will consider the certification of the EIR as legally adequate at a public hearing.

2. A fiscal impact report was not prepared for the formation of the County Service Area, nor does CEQA require that a fiscal impact report be included with the EIR.

3. The Monterey County Planning and Building Inspection Department is not aware of any projects that encompass a larger area than the proposed project; the Fort Ord reuse area, at approximately 18,000 acres, is nearly as large.

4. A notice of completion was filed with the Governor's Office of Planning and Research on May 19, 1995. On May 23, 1995, the notice of availability (NOA) was mailed to all persons who attended the public scoping meeting, adjacent property owners, and those who expressed an interest in receiving notification. The NOA included a brief description of the project, its location, significant effects, and identified where the draft EIR was available and the period during which comments could be received. EIRs were also mailed on May 23, 1995 to responsible and trustee agencies and all persons who had requested a copy of the draft EIR. The NOA was published in the Monterey Herald, and articles on the availability of the EIR appeared in the Pine Cone and Coast Weekly. Copies of the draft EIR were available at the Monterey County Planning and Building Inspection Department in Monterey and Salinas; the Harrison Memorial Library, Carmel; and Carmel Valley Branch Library, Carmel Valley. These copies were hand delivered by Monterey County Planning and Building Inspection Department staff. According to staff (at Harrison and Carmel Valley Libraries), the draft EIR was logged in May 1995.

   Loan copies of the applications, maps, technical reports, and draft EIR are and have been available at the Monterey County Planning and Building Inspection Department in Salinas.

   Although Monterey County received several requests for an extension of the comment review period for the draft EIR, the request was denied. Notice of the 45-day review period, which started on May 24, 1995 and ended on July 7, 1995, was published in accordance with State CEQA Guidelines and state land use planning law. The NOA was sent to all interested parties and also published in local newspapers. Applications, maps, and technical reports have been available to the public since April 26, 1994. The public has participated in scoping meetings for the EIR. It is the county position that everyone has been given an equal opportunity and reasonable time to review the draft EIR. Based on the aforementioned facts, the county denied the request for additional time for the review period.

   A list of all persons receiving copies of the draft EIR is with the Monterey County Planning and Building Inspection Department in the Santa Lucia Preserve EIR file.

5. CEQA requires summaries to be prepared, not executive summaries.

6. The final EIR uses a lighter paper as requested.

7. The open land is proposed to be set aside due to a variety of environmental constraints and the density limitations imposed by Board Resolution No. 93-115.

8. The information requested is not relevant to a legally adequate EIR.

9. Refer to the response to Comment 62 below.

10. The wildlands will be owned and managed by the Conservancy. The Conservancy will be organized as an independent nonprofit corporation that will oversee, govern, and control the resource management of the Santa Lucia Preserve. In addition, outside prescribed homelands, the remaining portions of lots generally will be left in open space except for drives, trails, and utilities, subject to a conservation easement owned and managed by the Conservancy. This information is in Chapter 2, "Project Description", of the draft EIR.

11. Refer to the response to Comment 10 from the Monterey Peninsula Water Management District.

12. The summary identifies the major project components and is not intended to replace the main text of the EIR. CEQA states that the summary should be clear and concise and no longer than 15 pages. It must identify each significant effect, proposed mitigation measures, areas of controversy, and unresolved issues. Project phasing is discussed on page 2-13 of the draft EIR.

13. An applicant has the right to name a project or project components as he/she sees fit. The name of the proposed project used in this EIR is consistent with the application. The golf trail is designed to provide an aesthetic experience beyond the normal physical challenges of the game of golf. A low volume of play, the avoidance of cart usage, and minimization of the area of irrigated/high-maintenance turf combine to provide opportunities for challenging yet leisurely golf and at the same time, a walking trail through many of the natural resources.

14. The information requested is not relevant to a legally adequate EIR.

15. Refer to the response to Comment 12 above. Membership tournaments are a common operational characteristic of any golf club; however, the golf trail is not anticipated to be used for tournament play at a level that would result in any significant level of spectator attraction.

16. Refer to the response to Comment 12 above. The location of the tertiary treatment plant is described on page 2-16 in the draft EIR, and the site plan is provided in Appendix G of the draft EIR. The final EIR in Appendix G also contains a summary of features of the tertiary treatment plant.

17. All acronyms are defined after the first appearance.

18. Refer to the response to Comment 12 above. The discussion of development on slopes over 30% is provided on page 2-17 of the draft EIR and in Appendix H.

19. Refer to the response to Comment 12 above.. Tree removal is described in Chapter 11, "Biological Resources", and ridgeline development is described in Chapter 12, "Aesthetics", of the EIR.

20. Refer to the response to Comment 12 above. Water quality is evaluated in Chapter 9, "Run-off, Flooding, and Water Quality", of the EIR.

21. Refer to the response to Comment 12 above.

22. Refer to the response to Comment 12 above. Water quality is evaluated in Chapter 9 of the EIR.

23. There is no such requirement in CEQA. The case cited in the comment primarily dealt with findings by a lead agency and does not seem applicable to the issue of economics raised in this comment. The issue of feasibility will be determined by the Monterey County Board of Supervisors when it reviews the EIR and the administrative record.

24. The proposed alternative is the proposed project, as described in Chapter 2, "Project Description", of the EIR.

25. The alternative suggested is not sufficiently defined in the comment to be evaluated. A dense-cluster alternative was considered in the screening of alternatives on page 20-5 of the draft EIR.

26. The alternative recommended in this comment, at a minimum, would eliminate construction in the hacienda area, avoid some road improvements, eliminate or relocate the golf trail, and modify the proposed grazing plan. The EIR already contains mitigation measures for avoidance of significant archaeological deposits. As for roadway improvements and the grazing plan, the EIR already contains an alternative that would avoid cultural resource impacts in the area of the golf trail (i.e., the No-Golf Trail Alternative) and considers a relocated golf trail concept. An alternative that avoids development in the hacienda area was not considered because development of the uses in this area is an integral part of the proposed project. Not developing the uses proposed (i.e., sporting center, expanded hacienda, ranch center, equestrian center) for this area would be contrary to the project objectives. Relocating the uses to other parts of the ranch would likely have other significant adverse effects depending on the relocation site. No other more suitable areas exist on the project site for development of uses proposed in the hacienda area. Alternatives that are remote and speculative or whose effects cannot be reasonably predicted or would not have a substantial advantage over the proposed project need not be considered. Because the EIR considers a reasonable range of alternatives

and the recommended alternative is remote and speculative and would not have a substantial advantage over the proposed project, this alternative is not evaluated in the EIR.

27. The quarry is an existing one. Elimination of the quarry would require the importation of materials from offsite, which would require additional truck traffic on both onsite and offsite roads. For this reason, a no-quarry alternative is not evaluated.

28. This issue is explained sufficiently in Chapter 18, "Social Effects", of the EIR.

29. The proposed project calls for a substantial reduction in grazing from historical conditions, which will result in substantial environmental benefits over existing conditions. CEQA does not require the identification and evaluation of alternatives that result in additional benefits over those that would already occur under a proposed project. The focus is to reduce or avoid significant impacts of the proposed project. Therefore, a no-grazing alternative is not required to be evaluated in the EIR.

30. The proposed project contains measures to minimize traffic on Robinson Canyon Road consistent with Board Resolution No. 93-115.

31. CEQA does not require EIRs to contain an index.

32. Mitigation is defined in Section 15170 in the State CEQA Guidelines, which states that mitigation includes:

    a. avoiding impacts altogether by not taking a certain action or parts of an action,

    b. minimizing impacts by limiting the degree or magnitude of the action and its implementation,

    c. rectifying the impact by repairing, rehabilitating, or restoring the impacted environment,

    d. reducing or eliminating the impact over time by preservation and maintenance during the life of the action, or

    e. compensating for the impact by replacing or providing substitute resources or environments.

33. CEQA does not require EIRs to contain a glossary.

34. The EIR is organized around issue areas, not project components.

35. CEQA does not require a needs or market analysis to be included in an EIR.

36. The Monterey County Board of Supervisors will determine the adequacy of the EIR at public hearings based upon public testimony and recommendations by staff. The board will also consider the adequacy of the mitigation monitoring and reporting program. The Monterey County Board of Supervisors will adopt the mitigation monitoring and reporting program if it approves the project and mitigation measures.

37. The Monterey County Board of Supervisors will determine the adequacy of the EIR at public hearings based upon public testimony and recommendations by staff. The EIR follows a format required by the scope of work prepared by Monterey County. The structure of the EIR is standard in the industry.

38. Typographical errors noted by reviewers have been corrected in the final EIR. Clarifications have been provided to commenters when requested.

39. CEQA does not require contacting individual commenters.

40. CEQA states that EIRs should focus on the project's significant environmental effects. Discussions should be proportionate to the severity and probability of these effects. EIRs should be analytic rather than encyclopedic (State CEQA Guidelines Section 15006[o], 15143).

41. The requested information is not required for a legally adequate EIR.

42. The sources of information are cited within the text of the EIR, and Chapter 21, "Citations", of the EIR contains a bibliography.

43. The requested information is not required for a legally adequate EIR.

44. The requested style of presentation of the information is not required for a legally adequate EIR.

45. CEQA requires lead agencies to use their best efforts to predict impacts; models help in this regard. The comment does not provide any specific model or problem; therefore, a more specific response is not possible.

46. The comment is not sufficiently specific for a response to be made.

47. The comment is not sufficiently specific for a response to be made.

48. The term "golf trail" is a descriptive term that suggests the layout of the golf course. It is not considered "double speak". The requested information is not required for a legally adequate EIR. Golf course water demand figures are explained in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the EIR and in the Comprehensive Hydrological Study for the proposed project.

49. Refer to the response to Comment 12 above.

50. The requested information is not relevant to the EIR or required for a legally adequate EIR.

51. The requested information is not relevant to the EIR or required for a legally adequate EIR.

52. The biological impacts of the golf trail are described in Chapter 11, "Biological Resources", of the EIR.

53. Nitrates, the most common fertilizer and urban pollutant, and potential impacts from nitrate pollution are described in detail on pages 9-20 to 9-24 of the draft EIR. All pesticides are assumed to be approved for their proposed uses and applied in accordance with the label instructions, as required by federal law. Consequently, pesticide use on the managed areas of the golf trail is not considered an adverse impact. Page 9-21 of Volume II of the final EIR has been amended to clarify the discussion and respond to this comment.

54. CEQA requires summaries to be prepared, not executive summaries. This statement is not required in the summary. As described in Chapter 15 of Title 22 of the California Code of Regulations, each water supplier is responsible for providing water that continually meets primary and secondary drinking water standards.

55. CEQA requires summaries to be prepared, not executive summaries. This statement is not required in the summary. The relevance of homes in a redwood forest being downstream from the proposed golf course is not clear.

56. The golf trail use permit application identifies pesticides that are commonly used in the region for turf management. The project applicant has developed an integrated pest management program, included in the permit application, that specifies irrigation, fertilization, and other cultural methods as well as pesticide use to control pests in the managed turf areas. Specific pesticides and quantities are not identified. However, for each potential pest, various cultural treatment methods are identified, as well as potential pesticides that could be used. Pesticides are identified by generic and brand names. Material Data Safety Sheets are available from the manufacturers.

57. The proposed golf trail would be a private club as described in Chapter 2, "Project Description", of the EIR.

58. Refer to the response to Comment 15 above.

59. Such an alternative does not appear to be feasible. An alternative would almost have to have a de minimus water demand to have a less-than-significant impact on water resources at the project site. Such an alternative would not be feasible in light of the project objectives. It should be noted that impacts on water resources would be reduced to a less-than-significant-level with the adoption of mitigation measures recommended in this EIR.

60. The EIR contains mitigation measures to reduce groundwater impacts to a less-than-significant-level. Refer to the response to Comment 59 above.

61. The significant impacts on wildlife are described in Chapter 11, "Biological Resources", of the EIR. The project will not result in the loss of thousands of acres of wildlife corridors. The description of existing conditions provided in the draft EIR is adequate.

62. The significant impacts on vegetation and wildlife are described in Chapter 11, "Biological Resources", of the EIR. The information requested is not required for a legally adequate EIR. This lengthy comment offers an assortment of ideas and questions regarding edge effects; most of the specific data requested are not available and/or not required for the final EIR. In general, however, most wildlife species would continue to use all habitat areas outside the developed home sites. For example, oak woodland and chaparral birds, including raptors, often nest and forage in proximity to human habitations if they are not harassed. No single, minimum distance from human habitations is appropriate for all wildlife species, especially for wide-ranging species like deer and mountain lions. For further discussion of the possible effects of this project on mountain lions, please refer to the response to Comment 1 from CNPS.

Some edge-dwelling species would be affected by home site construction in edge habitats. However, 18,000 acres of open space will remain after the project is constructed that will include extensive edge habitats. As noted in Table 11-3 of the draft EIR, nonbreeding sharp-shinned hawks are often observed at the Santa Lucia Preserve. Abundant foraging and roosting habitat will remain for this species if the project is implemented; potential nesting habitats in evergreen forests would also be protected. It is not possible to "list all sightings in the past ten years of the sharp-shinned hawk . . .", but the species is an uncommon but regular nonbreeding visitor to the preserve. Providing further information on the effects of forest edges and microclimates is beyond the scope of the final EIR.

63. Noise impacts are described on pages 15-10 to 15-12 in Chapter 15, "Noise", of the EIR.

64. Significant vegetation impacts are described in Chapter 11 of the EIR.

65. The comment is not clear.

66. With the implementation of the proposed mitigation measures for the traffic impacts, the fire response time would not be significantly affected.

67. The segments are described on page 13-11 in Chapter 13, "Traffic", of the draft EIR.

68. The EIR does not claim that residents and visitors use only Robinson Canyon Road. About 9.3% of the trips are expected to be made using Robinson Canyon Road. The applicant's proposed measures would minimize the use of Robinson Canyon Road. The visitors can enter the preserve only through the main gate located on Rancho San Carlos Road. In

addition, because the improvements proposed for Rancho San Carlos Road will make travel on this road much faster than travel on Robinson Canyon Road, it will be a more attractive route for residents and travelers.

69. There will be gates on Rancho San Carlos Road at its intersection with Robinson Canyon Road.

Monterey County
Planning Department
Wanda Hickman - Associate Planner

July 10, 1995

Re: Rancho San Carlos Project (aka Santa Lucia Preserve)
- Draft EIR Comments (Part 2)

All the following comments are significant.

This DEIR is inadequate in its present form based on a variey of reasons including the following:

Bias:

The document shows its bias by BEGINNING its description of the project as a "PRESERVE", and continuing with "limited development".

This is doublespeak as well as bias.

*Please re-write this initial paragraph to properly reflect:

1) The applicant is not proposing this out of benevolence. 1

2) The project as proposed has huge detrimental losses to existing residents.

3) The project requests development in excess of their legal, let alone fair share, of resource such as water and traffic.

4) This is not limited development.

5) This is not a preserve - in any sense except that the applicant does not ask for (much) development in areas that are illegal. They do ask for development in EVERY POSSIBLE AREA they think they can get away with. What the developer can't legally develop - they ask you to believe is their philanthropic good will to leave alone.

---

*Please describe how this project is compatible with the "social characteristics of "Carmel-by-the-Sea". 2

Table S-1

*Please define Potential 3

*Please define Possible

*Please explain how removal of 292,000 cubic yards of material is "less than significant"

Grazing:

The wild assertion of increased groundwater recharge because of cattle grazing is without basis in evidence or reason. 4

*Please define "Infiltration". 5

The graphs you include refute your own claim. They show REDUCED, not increased, INFILTRATION RATE with an increase in animal density. They show INCREASED, not decreased, RUNOFF with an increase in animal density.

Below I include an article that disputes every benefit claimed.

*If you with to differ from the points made in the article, present solid evidence of testing done on the project site over a period of years.

Subject: Paper on why we should end western public lands grazing

Denzel Ferguson.
HCR 85 Box 13
Bates, OR 97817
(503) 421-3721 Phone/Fax

Society
Advocating
Natural
Ecosystems

6

The environmental community tends to be less combative with the livestock industry than with other despoilers of our public lands. Irrational assumptions, faulty thinking, and glaring untruths too often go unchallenged. The following is the text of a seminar I presented at Portland State University in April (1994). I believe it summarizes grazing issues.

Sacred Cows and Science: Why all the fuss?

Little more than a century ago, we were signing treaties with native American tribes that were binding "so long as the rivers shall flow." That flowery euphemism was mistakenly thought to be synonymous with the word "forever".

But today, the Umatilla River is a shameful trickle where it reaches the Columbia, the upper Grande Ronde disappears in most years soon after leaving the mountains, and the Lostine River fails to reach its confluence with the Wallowa. Thousands of headwater streams are now intermittent or mere dry gullies, including many of the trout streams I fished as a youngster. Similar examples are plentiful throughout the West.

In 1990, The U.S. Environmental Protection Agency declared that riparian areas in the West were in the worst condition in history. A year later, the U.S. Forest Service (USFS) revealed that 60% of the large fishing and spawning holes in several major rivers in the Northwest had disappeared in the last 50 years.

Strange it is a $10,000 fine and/or 10 years in prison for vandalizing a USFS sign, but there doesn't seem to be a penalty for trashing an entire river system.

Bad mining, irresponsible logging practices, and cows are the main culprits. And cows are by far the worst. I know clearcuts and the falling of trees several centuries old are emotional events, but they take place at intervals measured in decades. Cows, on the other hand, do a clearcut every year on an area twice the size of France in the West primarily on fragile, arid lands. The song Home on the Range doesn't even mention cows.

Today, only 3% of Arizona's original riparian zones persist and of 32 species of native fishes, 5 are extinct, 21 are threatened, endangered, or are being considered for listing. That leaves 6 that are O.K.? Grazing is credited with putting more species on the R & E list than any other human activity (a recent report states that livestock grazing in the U.S. has

contributed directly or indirectly to the decline of over 340 listed or candidate species plants and animals).

Closer to home, peak harvests of steelhead and all other species of salmon in the Columbia River occurred well before or right around 1900. By 1920, all species were in precipitous decline. Rock Island (the first dam) was built in 1933, Bonneville in 1938, and Grand Coulee in 1941. Of course, overharvesting and dams have been disasters, but habitat destruction came first and has not abated. In Idaho, on the same stream, salmon production was 450% higher on ungrazed segments than on grazed segments.

Cows evolved in humid parts of the Old World and were introduced into the New World capriciously and without scientific forethought. God did not put cows in the West Spaniards did. It is not surprising that Florida, where a cow can exist year-long on a single acre, produces more beef than five western states, where more than 200 acres are sometimes required to feed a cow for a single month.

6

In most of the West, cows spend nearly all of their time at streamside an environment most closely resembling that to which they were accustomed in the Old World. Because riparian zones tend to be very narrow in the arid West, ranchers end up paying less than 50 cents a month to graze a mile of riparian zone on public land.

But once there, cows stomp, chomp, and lounge setting off a long chain of disastrous events!

1. Woody and herbaceous riparian vegetation becomes sparse or disappears as it is devoured, broken over, or suffers root damage from trampling. Shade disappears, vital filtering of runoff water is impaired, and aquatic organisms suffer losses of terrestrial food sources.

2. Soil is compacted, reducing plant growth, hindering moisture penetration, increasing rapid runoff, and lowering water tables.

3. Stream banks collapse, adding huge sediment loads to stream channels, and in steeper terrain, channels cut down to form gullies. Urine and feces pollute the stream.

4. As shade disappears and streams become excessively wide and shallow, water temperatures climb, and evaporative losses increase dramatically. At the same time, levels of dissolved oxygen drop.

Much more could be said, but let is suffice to say that these conditions lead to violent spring runoff, vastly diminished watershed capacities, little or no flow during warm seasons, water that is too hot for most aquatic life, and a short-changing of all users of water downstream.

But matters get worse!

84% of all water used in the U.S. is used in the 17 western states primarily to grow cow fodder. For example, 97.5% of all irrigation water in Montana, and probably 80% in Oregon.

The California Extension Service reports that it takes 5,218 gallons of water to produce a pound of beef in that state. Other studies show that cows use more water than the state's 27 million people, while accounting for less than 1% of the state's

economic income.

Once a stream has been ravaged, the perpetrators and their bureaucratic colleagues turn the problem over to the rest of us taxpayers, recreationists, (e.g., Oregon anglers pay a $2 stream restoration fee with purchase of a license), and other innocents (e.g., BPA ratepayers pay a surcharge).

Millions upon millions of dollars have been squandered upon voodoo stream restoration projects sponsored (but not paid for) by ranchers and agencies such as the BLM and USFS the very parties at blame for the problem in the first place.

These so-called restoration or rehabilitation projects involve extensive rip-rapping with rock that is usually foreign to the system, tossing logs, rootwads, stumps, and refrigerator-size rocks into the channel, and the construction of in-stream weirs. Most of this is limited to main channels, while springs, feeder tributaries, and watersheds continue to be abused and destroyed. These smoke-and-mirror projects are extremely expensive, labor intensive, and require putting heavy machinery in stream channels. They serve only one function to give the public a false impression that something useful is being done!

6

Remember, the problem is too high temperatures and too little flow. Neither of these are helped and in fact are aggravated. For example:

Big rocks collect solar radiation and transfer heat to the water day and night. The same effect applies to cold in the winter, causing shallow streams to freeze to the bottom.

Weirs prevent narrowing, sediment accumulation on banks, and re-establishment of woody riparian growth (needed for shade).

All of these artificial, hard structures foster abnormal channel development, prevent natural stream dynamics, and usually end up being washed away by high water.

When a team of outside experts examined many of these projects in several river basins in eastern Oregon, they reported them to be mainly worthless and frequently detrimental actually making matters worse by preventing natural stream recovery processes. Bureaucrats are a poor substitute for Mother Nature when it comes to stream repair.

The obvious solution to stream damage is incredibly simple-all you have to do is protect the stream from the abuse that caused the damage in the first place! The simple act of fencing both sides of a stream or dry gully has restored water flow and led to recovery of fish, beaver, and other organisms in demonstration projects. Water from barbed-wire the old alchemists would have been amazed! Streams will mend themselves correctly and naturally with little or no cost to anyone. A cow-proof fence is vastly superior to the engineering mayhem that now passes for stream rehabilitation, but it too fails to protect entire watersheds.

In the final analysis, there is but one solution the removal of all cows from public lands only then will the damage stop, the streams and riparian zones return to a healthy condition, and water supplies increase sufficiently to meet the myriad demands.

The same team of experts that was so critical of

current stream rehabilitation efforts in eastern Oregon noted: "Unquestionably, complete exclusion of livestock was the most effective habitat restoration management strategy observed in the Grande Ronde and John Day Basins."

So far, I have emphasized effects on streams, but that is just the tip of the iceberg!

In the 11 western states, 42% of all the land is controlled by the BLM and USFS, and 82% (nearly everything except rock and ice) is grazed every year. These lands account for only 2% of the nation's livestock forage and are used by only 22,000 livestock owners 1.5% of the nation's livestock owners. Today, just 10% of the grazing permittees using public land (including Union Oil, Getty Oil, and many other corporations) do 91.7% of the grazing (in Oregon, J. R. Simplot has the largest public land allotment). They pay only 20% of the cost of letting them graze our public lands. Clearly, it would be in the national interest to give them the boot! 6

1. Livestock grazing is the leading impediment to game production in the American West. Today, cattle alone devour more vegetation than did all native grazing animals before Columbus. In Idaho, the BLM allots 95% of its forage to livestock and only 5% to wildlife. On western public lands, big game animals live in a barbed-wire maze 600,000 miles of fences, enough to circle the Earth 24 times. Meanwhile, ranchers want to shoot Yellowstone bison to protect their cows from brucellosis and are objecting to wolf reintroductions.

2. In 1992, the Animal Damage Control Agency (Dept. of Agriculture) spent more than 45 million dollars of taxpayer's money, mainly to protect privately owned livestock. States and counties also spend huge sums. That year, they killed 109,000 predatory mammals; including 96,158 coyotes, 8,232 foxes, 1,589 bobcats, 234 mountain lions, 206 black bears, 141 wolves, and God only knows what else! Notice that grizzlies and wolves are extinct in Oregon, and ask yourself why?

3. Millions of acres of bunchgrass and other native vegetation have been converted into exotic species and less desirable plants by grazing abuses cheatgrass, Russian thistle, tumble mustard, and many obnoxious shrubs are examples. In Idaho, where cheatgrass has taken over much of the southern half of the state since 1900, because cheatgrass is 500 times more flammable than the native grasses it supplanted, the fire season is now two months longer than it once was. Thanks to cows, many native plants are extinct or in an endangered status.

4. Domestic livestock grazing is the leading cause of soil erosion in the West both by water and wind. Today, an area larger that the original 13 states has undergone or is currently suffering from desertification. Just the effects of soil compaction constitute a disaster, as new data show it to cause a large reduction in rate of tree growth.

I could go on and on, but it should be clear by now that we are not just talking about esthetics. Cows are creating monumental changes in the West disturbances that will alter the pathways of future evolution (as native species adapt or become extinct) and as gene pools are impacted.

Some examples: 1) On the Middle Fork of the John Day

River, where Forest Service signs proclaim "Entering Salmon Country-Healthy Streams Keep 'Em Coming Back", water temperatures surpass 80 degrees (F) nearly every summer. Adult and smolt salmon, trout, and whitefish perish in large numbers, while chubs, dace, squawfish, and suckers survive; 2) Today, Columbia River Chinook salmon are 50 percent smaller in size than originally; 3) While Westerners dare not drink surface waters (because of fear of Giardia a cow-transmitted protozoan). Easterners hiking the Appalachian Trail still drink at stream crossings and have dippers hanging on trees for that purpose.

Cows are an antiquated tradition, yet even today when we zoom down public highways in computer-enhanced cars in the black of night hit a cow and most state laws (including Oregon s) say that you, your insurance company, or your heirs must pay for the cow, which has the right-of-way. obviously these laws date back to times when the horse and buggy were in-vogue.

6

The tradition survives, as Edward Abbey pointed out in 1986 in Harpers: "The rancher (with a few honorable exceptions) is a man who strings barbed wire all over the range; drills wells and bulldozes stock ponds; drives off elk and antelope and bighorn sheep; poisons coyotes and prairie dogs; shoots eagles, bears, and cougars on sight; supplants the native grasses with tumbleweed, snakeweed, povertyweed, cowshit, anthills, mud, dust, and flies. And then leans back and grins at the TV cameras and talks about how much he loves the American West."

Paul and Anne Ehrlich said it best. "The western rancher and their government cronies are destroying a gigantic portion of the United States to add a few percentage points to the production of a commodity that the industry is now desperately trying to promote in an era of declining demand."

Indeed, the industry went out and hired Cybill Shepherd and James Garner to tell us that beef was real food for real people. The problem was that Cybill later confessed to being a vegetarian, and Garner had to go in for a quintuple bypass when his arteries became clogged with fat,

Just a few years ago, each American in a lifetime was devouring 2900 pounds of beef, which included 500 pounds of fat. But between 1974 and 1989, per capita consumption fell from 80.6 pounds to 63.9 pounds per year. Today, 4% of American beef is exported (even the Japanese are now getting bypass operations) , the industry is pushing 3-ounce servings (with the fat surgically trimmed) , and broccoli consumption is up 600%, despite George Bush's protestations.

In his book, Livestock Pillage of our Western Public Lands, Ed Dimick analyzed the economic benefits of minerals, timber, water, wildlife, recreation, and grazing on public lands. Grazing came in flat last, accounting for only 1% of the economic return.

Now, the American public is catching on recent university conducted polls showed that on a scale of 1 to 10, the public ranked recreation as a 9 and grazing as a 3.8 on public lands. A more recent poll showed that 34% of the nationwide respondents actually favored. taking all cows off public land.

Removing all livestock from public lands would not even register in the national economy. In the West, it would reduce

employment by 0.1 percent and reduce the western economy by 0.5 percent. Growth of employment and income in other industries and sectors would rapidly offset these losses. 6

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*Please remove the grazing "Improvement" of groundwater - or prepare an alternative which has proportionally fewer lots and other water uses. 7

*Please prepare and evaluate an alternative that does not allow Grazing. 8

*Please thoroughly discuss grazing in the section on runoff. 9

Water:

*Please compare this water situation to the Carmel Valley Ranch. Where the applicant promised they would never use water from Carmel valley river, then they did. 10

*Please clearly describe in the Executive Summary how the proposed project would never use water from the Carmel Valley Aquifer - other than its own. 11

*Please explain if this restriction will be written into the project's deed.

*Please create a mitigation measure where this restriction is written into the project's deed. 12

*Please call me immediately (408-624-6500) if you have even the slightest trouble understanding my meaning or intent.

Page S-6 states "Potential groundwater overdraft". 13

*Please explain this in plain english.

*Please very specifically quantify this in a worst case possibility IN THE EXECUTIVE SUMMARY. 14

*Please quantify all of the assertions in the executive summary, especially those under "Groundwater Hydrology, ..."

Page S-7 re-write the "Fisheries" section in plain english. 15

*Please explain if there is a potential loss (death) of fish.

*Please explain if there will be a loss of fish in the Garzas creek and Carmel Valley river. 16

Traffic:

Hazards Increase from Construction Traffic

*Please prepare Mitigation measures which would reduce the size of Project so Traffic impacts are less than Significant. 17

*Please prepare an Alternative which would reduce the size of Project so Traffic impacts are less than Significant.

All the above comments are significant.

...More to come in Chapter 3

As you might imagine - I still have not had enough time to finish studying the document. I respectfully request an extension of 30 days for the remainder of my comments.

o: County Planning, Wanda Hickman From:

Thank you for your attention to my comments.
David Dilworth
408-624-6500, Box 1495, Carmel 93921

JUL-10-1995 08:00 P.03

Response to Comments from David Dilworth (July 10, 1995)

1. The Monterey County Board of Supervisors will determine the legal adequacy of the EIR at public hearings based upon public testimony and recommendations by staff.

2. This issue is evaluated in Chapter 18, "Social Effects", of the EIR.

3. "Potential" means existing in possibility or something that can develop or become actual. "Possible" means being within limits of ability, capacity, or realization. Grading impacts are evaluated in Chapter 5, "Economics", and Chapter 6, "Geology and Minerals", of the EIR.

4. The proposed project involves a reduction in grazing, which would result in improved groundwater infiltration as described in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the EIR.

   The commenter read the graphs correctly. Increased animal density is associated with a reduced infiltration rate (which refers to the percolation of rainfall into the soil). Because the Cattle Grazing Plan would decrease the animal density relative to the existing grazing program, infiltration (and groundwater recharge) would be expected to increase.

5. Infiltration means to permeate something by penetrating its pores or interstices. "Infiltration", as used in the draft EIR, is the rate at which water enters the soil surface, expressed in inches per hour. "Infiltration capacity" is the maximum rate at which given soil can accept water in a moistened condition. "Infiltration rate" is the measured rate at which water enters a particular soil during a given rainstorm.

6. Figure 8-6 shows that, for the example years, the lower the animal density, the greater the infiltration rate. Figure 8-7 shows that the lower the animal density, the lower the annual runoff.

   The EIR preparers concur with the commenter that overgrazing by domestic livestock has caused severe and widespread degradation of native plant communities, wildlife, soils, streams, and water quality in the western United States. However, the impact assessment in the draft EIR compares existing conditions to proposed project area conditions and land uses and was not intended to analyze the advantages or disadvantages of grazing in general. The impact assessment on the project found that a reduction in the area being grazed and better grazing management practices would have a beneficial effect on overall watershed conditions on the project site.

7. Refer to the response to Comment 4 above.

8. Refer to the response to Comment 29 of the same author (July 1-7, 1995).

9. Grazing is adequately discussed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", and Chapter 9, "Runoff, Flooding, and Water Quality", of the EIR.

10. The proposed water supply system and impacts are evaluated in Chapter 8 of the EIR. The circumstances surrounding the Carmel Valley Ranch project are not relevant to the proposed project.

11. Refer to the response to Comment 10 above.

12. Refer to the response to Comment 10 above.

13. This issue is explained in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the EIR.

14. Refer to the response to Comment 12 of the same author (July 1-7, 1995).

15. The EIR is written in plain English.

16. The EIR states that there could be significant adverse effects on fisheries (or "loss of fish" as noted in the comment). The EIR also recommends mitigation to prevent the significant loss of fish.

17. The EIR contains adequate mitigation measures.

Monterey County
Planning Department
Wanda Hickman - Associate Planner

July 12, 1995

Re: Rancho San Carlos Project (aka Santa Lucia Preserve)
- Draft EIR Comments (Part 3)

All the following comments are significant.

This DEIR is inadequate in its present form based on a variety of reasons including the following:

Water:

The Executive Summary takes great pains to quantify loss of Oak woodlands (574.7 acres) yet gives no information on the amount of legal water is available from the ranch creeks and groundwater. | 1

Neither does the DEIR state how much is required for the proposed project and the alternatives. | 2

*Please include IN THE EXECUTIVE SUMMARY the amount of water (in acre feet) which would be required by each alternative proposed.

*Please include IN THE EXECUTIVE SUMMARY the amount of guaranteed, SUSTAINABLE water the Ranch has available for its own use. | 3

*Please include IN THE EXECUTIVE SUMMARY the amount of 100% guaranteed, 100% SUSTAINABLE water the Ranch has available for its own use.

*Please quantify the loss of living natural resources (such as further Oak Woodland and wildlife habitat loss) due to probable drawdown of the San Francisquito and other aquifers. | 4

I hope the DEIR preparers are aware that recent findings show that Central California has experienced at least two one-hundred year droughts in the past 1000 years. | 5

*Please take the 100 year droughts that could recur in the project area, into account for all water use calculations. And explain how and where you have taken them into account. | 6

Especially after reading items such as "Sudden and complete loss of yield after 2 days." and "Erratic drawdown." I am fairly concerned that this project will follow Carmel Valley Ranch into using our Carmel Valley Water. | 7

I would like something very similar to the following to appear in the Executive Summary: (The numbers are for illustration only)

Water requirements for Proposed Project	377 acre feet per year.
Reliable Sustainable Water Available	125 acre feet per year.

Water amount Project can not provide itself	252 acre feet per year.

8

*Please prepare an Alternative that would not exceed the Reliable, Sustainable Water Available in worst case drought years (at the end of summer at the end of the last year of a 100 year drought). | 9

*Please establish the maximum and minimum amounts of reliable sustainable water which is available for the project from its own resources and put it in the Executive Summary. | 10

Without an established number you can not claim a "Less than Significant" impact for "Potential Groundwater Overdraft" and others, when in fact it may be a "Significant and un-mitigatable" impact. 11

A "Nitrate monitoring plan" is insufficient to detect other toxics and chemicals in runoff from the Golf Course, equestrian and other facilities. 12

*Please prepare mitigation that prohibits the use of all chemicals on the Golf Course (Remember - they are selling this as a "Natural" course); and independently monitors for all toxics and chemicals that could be used. 13

*Please prepare Alternatives an mitigation that will prohibit all further development when any toxics are found in the water leading to our Peninsula drinking water supply.

Preserve:

The DEIR says phasing of the "Preserve" is to take place over 20 years. This gives greater credence to those who say the preserve is a sham. 14

NO Phasing Alternative
*Please create an alternative where there is no phasing of the "Preserve"; where all the lands for the preserve are dedicated immediately. 15

*Please include IN THE EXECUTIVE SUMMARY the fact that the proposed "Preserve" will not be complete for 20 years due to phasing. 16

Forests / Biology:

Monterey pine is listed as endangered by the United Nations 17

* Please discuss, quantify and map the impacts on Monterey pine and its habitat.

Fisheries:
"Acute and Chronic Toxicity to Fisheries"

*Please prepare alternatives that prohibit the use of toxics and chemicals upstream from any water course that flows into drinking water supplies or fish habitat. 18

Social Economics:

Fire:
Page 16-16 says "Will Result in an increase of risk for fire hazards." 19

*Please include this phrase IN THE EXECUTIVE SUMMARY.

*Please describe what the minimum water pressure can be expected at the home or building with worst case water pressure. 20

*Please describe whether that is sufficient by fire fighting standards.

Police:

Page 19-11 says "Increased Demand for law enforcement from County Sheriff" and "Which is experiencing an increased caseload and reduction in staff". 21

ease include IN THE EXECUTIVE SUMMARY the phrase "Police Protection for
sting residents will be diluted."

21

ease include IN THE EXECUTIVE SUMMARY the phrase "Police Protection for
sting residents will be diluted at the same time the Sheriff's office
experiencing an increased caseload and reduction in staff."

DEIR says it will take "5-7 minutes to ranch gate" on page 16-4

ease discuss how long it will take a Sheriff to get to the existing
ch house.

22

re are studies which show Crime increases in rural areas when
ulation increases.

ease cite such studies and prepare mitigation which would eliminate
se impacts.
--

All the above comments are significant.

.More to come in Chapter 4

you might imagine - I still have not had enough time to finish
dying the document. I respectfully request an extension of 30 days
the remainder of my comments.

nk you for your attention to my comments,
id Dilworth
-624-6500, Box 1495, Carmel 93921

JUL-13-1995 12:14 P.03

General Response

This letter makes numerous requests for information to be provided in the "Executive Summary". The EIR does not contain an executive summary. CEQA requires that a summary (not an executive summary) be provided identifying each significant impact, proposed mitigation measures, areas of controversy, and unresolved issues. The summary chapter provided in the EIR is considered adequate under the requirements of CEQA and no additional information is required.

1. The summary chapter contains all information required under CEQA.

2. Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", discussed water demand and supply associated with the proposed project. Water demand and supply for each alternative is discussed in Chapter 20, "Alternatives."

3. Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", in the draft EIR discusses water demand and supply associated with the proposed project. The summary provided in the EIR is adequate.

4. The effects on biological resources resulting from changes in groundwater hydrology are discussed in Chapter 11, "Biological Resources."

5. Comment noted.

6. This information is not required in the EIR. Groundwater supply and demand is discussed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the draft EIR.

7. The commenter's concerns are noted and will be considered.

8. This information is not required in the summary chapter. Groundwater supply and demand is discussed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the draft EIR.

9. The draft EIR evaluates a reasonable range of alternatives. No additional alternatives are required.

10. Refer to the response to Comment 3 above.

11. The draft EIR concludes that long-term lowering of the groundwater levels through much of the project area would not cause any adverse impact on the groundwater system, such as subsidence or water quality degradation. Other impacts on stream base flow and riparian

vegetation are considered potentially significant. These impacts and associated mitigation measures are discussed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the draft EIR.

12. The nitrate monitoring program described on page 9-24 of the draft EIR is an additional mitigation measure recommended by the EIR preparers and is considered adequate.

13. The applicant's proposed mitigation measures and additional mitigation measures presented in the draft EIR adequately address potential impacts associated with the chemicals. No additional alternatives must be analyzed and no additional mitigation measures are required.

14. Comment noted.

15. Refer to the response to Comment 9 above.

16. This information is not required in the summary chapter.

17. The discussion of Monterey pines on page 11-11 of the draft EIR is considered adequate. Figure 11-4 shows known distributions of Monterey pine. No adverse impacts on Monterey pines are identified in the draft EIR.

18. Refer to the response to Comment 13 above.

19. This information is not required in the summary chapter.

20. As discussed on page 16-18 of the draft EIR, the water system will be designed and constructed to appropriate standards.

21. This information is not required in the summary chapter.

22. The Stewardship Company will be responsible for providing security for the Santa Lucia Preserve. Security staff will be trained to patrol residential areas, monitor the security alarms, and staff the entrance gate. The proposed project will be a gated community with residences equipped with security alarms monitored by onsite security, criminal activity will be minimized, and the need for police assistance will be minimal. The response time for the sheriff to reach the ranch house is not relevant.

Monterey County
Planning Department
Wanda Hickman - Associate Planner

July 14, 1995

Re: Rancho San Carlos Project (aka Santa Lucia Preserve)
- Draft EIR Comments (Part 4)

All the following comments are significant.

This DEIR is inadequate in its present form based on a variey of reasons including the following:

Biology:

Page 11-34 refers to Table 10-3. 1
There is no Table 10-3.
*Please fix this.

There is no map of Smith's Blue Butterfly habitat - just text references to places unknown to readers. 2

*Please map the locations of Smith's Blue butterfly and its habitat.

I find no discussion of California Black Bears or California Mountain Lion which both frequent the project area. Neither did I find discussion of how this was habitat for California Condor (sighted as recently as the early 1980's) and the Grizzly bear. Both of which are recovering from reduced populations and may someday return to this area. 3

*Please describe the impacts this project would have on these bears, condors, lions and their habitats.

*Please describe the number of Black Bears and mountain lions both killed and observed on the ranch in the past 30 years and how this may be expected to continue or change in the future.

*Please describe the approximate populations of Grizzly bear and California Condor before their extirpation from the area of the proposed project.

Air Quality

*Please state in the Executive Summary that there will be 80 miles of roads paved with asphalt. (Page 16-16) 4

Propose Electric vehicles - How many do they use now? 14-10

Air Quality:

** Thank you including the air quality report in the main document, not as a separate technical report. I find the air quality section the only one that approaches a responsible quantification of the values of significance. 5

Considering a 1990 EPA report by Tom Addison which states: "Despite the toughest air pollution regulations in the U.S., most Californians are still forced to breathe unhealthy air. Countless studies have documented that this sorry state of affairs is largely a result of motor vehicle use."

* Please provide a table and include baseline numbers, and total numbers

for all the following air pollutants in the project area.

* Please include studies for the following pollutants, all of which are known to harm health: 5

CO Carbon Monoxide
Nox Nitrogen Oxides
HC Hydrocarbons
ROG Reactive Organic Gases
PM10 Particulates (i.e. from woodstoves)
PB Lead
SO2 Sulfur Dioxide
O3 Ozone & SMOG from cars
Radioactive Matter (i.e. from woodstoves)
Poisons & Pesticides
CO2 Carbon Dioxide
Methyl Bromide (used in fumigating homes)

Although particulates from woodsmoke are identified as a respiratory risk, its extreme health hazard, other than a cancer risk, in the role of lung diseases is not discussed. 6

* Please include a reference to the article which states "60,000 U.S. residents per year die from breathing particulates at or below legally allowed levels" - written by Joel Schwartz EPA 7

* Please discuss the cancer risk from particulates. 8

* Please recommend as mitigation measures that wood stoves be prohibited, including certified wood stoves. 9

* Please identify complete Federal & State Air Quality standards. Methyl Bromide (used in home fumigation) was not included. 10

Because families living near the proposal need to know the risks to their children's health is much higher than air quality standards suggest. The American Lung Association would be happy to help furnish such information. 11

* Please request comments from either the local or National American Lung Association. 12

** It is important for the public to understand how the health of senior citizens, children, babies and sensitive people are harmed more by air pollution than the general public. 13

* Please describe how Federal and State Air quality standards are health risk guidelines for healthy male adults - not for less robust humans such as the elderly or asthmatic children. 14

* Please explain that the amount of air pollution allowed by Federal and State Air quality standards is enough to cause serious respiratory problems in senior citizens, children, babies and sensitive people. 15

* Please clearly explain the detrimental health effects of the project on children and babies with lung problems because of the air toxins. Especially downwind of the asphalt plant.

* Please explain how this area already exceeds federal and state levels for Safe air. Please describe how this proposal will make the air quality here worse (not better) - even more of a health hazard. 16

* Please include full page color photographic examples to illustrate existing air quality problem. Because far more people understand a photo than an explanation; and most people are not familiar with our air quality problem here. The Ozone violations of Carmel Valley or smog over the City of Monterey would be good examples. 17

* Please identify the quantities and persistence of all air pollutants to be generated by the proposed project. If the County and the public does not have a complete inventory of pollutants and how long they remain hazardous, they can not make intelligent decisions. | 18

* Please identify the human health risks related to the toxicity and cumulative effects of all air pollutants to be generated by the proposed project. If the public does not understand the long and short term health risks of the various pollutants, they can not make intelligent decisions. | 19

According to a report done in 1990 for the EPA by Tom Addison: "Analyzing the effects of only one pollutant often was justified by the inaccurate conclusion that CO serves as an 'indication of the full range of pollutants'. The effects of a project on the full range of air pollutants, however, can NOT be estimated by CO emissions. In general, increasing the average travel speed on a freeway from a congested, stop-and-go condition to a steady flow decreases the emissions of both CO and total HC (hydrocarbons), but INCREASES the emissions of NO (oxides of nitrogen). Furthermore, the impacts of CO are localized, but the formation of ozone from HC and NO affects the larger air basin". | 20

* Please describe the worst case possibility of the synergetic (combined) effects of the air pollutants from the project. | 21

* Please describe worst case human health hazards from the air pollution generated by the project. Not just ambient air, but breathing level air by a sensitive person walking in the vicinity of the proposed project. | 22

* Please discuss the health impacts of increased air pollution on the Vegetation including Monterey Pine Forest and all the wildlife life within. | 23

* Please specifically describe the effects of the increased air pollution on BABY wildlife - like birds, squirrels and deer. | 24

* Please chart the cancer and poison risks from each air pollutant and their expected volume. Use Sax's Manual "Dangerous Properties of Chemicals. | 25

* Please include a copy of a Material Data Safety Sheet (MSDS) for each of the air pollutants identified on pages 14-3. | 26

Cumulative Health Risk Standard

* Please get the American Lung association to comment on whether they support the acceptable risk "less than significant" of "10 in one million" (pg 4.8-18) There are about 1/10 of a million people living on the Monterey Peninsula. That means the standard of 10 / million equates to 1 person per Monterey Peninsula. Is a murderer allowed to kill one person with a gun to achieve a profit in his business without paying any penalty to Society? Absolutely not. Yet the EIR argues that allowing one person to die of air pollution is an acceptable risk if you are developing Pebble Beach. * Please affirm or deny and supply supporting arguments and of furnish counter arguments. | 27

Asphalt Plant:

Asphalt produces cancer causing air pollution as well as toxics. | 28

*Please describe in plain language the cancer causing potential of the asphalt plant. | 29

*Please describe in plain language the toxic potential of the asphalt plant. | 30

The adverse health effects of PM10 as a physical/mechanical substance is not evaluated, it is only treated as cancer causing and a toxic (poison). | 31

* Please affirm or deny and supply supporting arguments and furnish counter arguments. | 32

Page 14-9 gives criteria for CEQA significant adverse air quality impacts. Included is the 82 pounds per day of PM10. Page 14-13 says the asphalt plant and Rock crusher operations together will produce 82 pounds per day of PM10. What an interesting concidence. This means that if there is no construction vehicle activity at all - the asphalt and rock crusher will be at the maximum allowed by state law. | 33

*Please prepare an alternative that does not include an asphalt operation or a Rock crusher operation. | 34

or:

*Please prepare an alternative that does not include any construction vehicle operations. | 35

*Please detail how the County will respond if the Asphalt operation exceeds its expected air pollution. | 36

* Please include an explanation of how cars pollute most in the first few miles before they are warmed up - how short trips pollute unproportionally more than long trips. | 37

The understanding of the health risks from Diesel exhaust fumes is growing almost daily. The health hazards are significantly greater than ever suspected. The leading experts in this field are the group at the Health Effects Institute, 141 Portland St, Suite 7300, Cambridge Ma, 02139. | 38

* Please have the construction vehicle (Diesel air pollution) portion of the Air Quality section reviewed by the Health Effects Institute. | 39

* Please include the statement "Diesel exhaust is instantly sickening to some people." where discussing construction equipment impacts on page 14-7 | 40

* Please detail which chemicals are in the "chemical dust stabilizer". | 41

* Please include the MSDS for "Latex Acrylic Copolymer" or any other "chemical dust stabilizer" Page 14-14. | 42

There is no legal recourse to the lack of implementation of this mitigation measure. | 43

* Please affirm or deny and supply supporting arguments and furnish counter arguments. | 44

Using Electric vehicles (EVs) to reduce pollution and noise is desireable. (page 14-10) | 45

*Please, since this mitigation is not mandatory, disclose how many EVs the Ranch has in use currently. | 46

Noise & Sound:

*** Excellent job identifying the nearby areas to be impacted by noise which are noise sensitive! | 47

*Please discuss the amount and frequency of dynamiting that will take place on the project. If none - please create a prohibition on such | 48

activity.

Page 15-4 "Rancho San Carlos is generally quiet". 49

*Please quantify this.

Table 15-2 identifies a road as having a noise (or silence) level of 22 decibels. Please describe how rare this is in suburban or rural environment. 50

* Please disclose the noise of the chainsaws to be used for the tree cutting. 51

* Please disclose the noise of the bulldozers to be used for the tree cutting.

* Please disclose the noise of the industrial chippers to be used.

* Please disclose the noise of the Rock Crusher Operation.

* Please disclose the vehicle noise impacts for the entire tree cutting, chipping and movement of the chips. Specifically the noise, the type of vehicle, the roads used to transport the trees and chips, the risks to other drivers when a slow moving, heavily loaded truck pulls onto Carmel Valley Road. 52

Silence:

Silence Impacts not addressed in the DEIR include the loss of silence as a resource within the San Francisquito Flats Area. Silence is a very different issue than noise. Silence is a valuable resource. It is extremely rare on the Monterey Peninsula. This proposal would greatly diminish the acreage of silent forest. The minimum continuous sound in San Francisquito Flats you identify as below 30 decibels. I can personally testify that it is quieter than a soft whisper. 53

* Please provide a map of current maximum daily sound levels with 10 decibel "topographical" lines for the project area and the entire peninsula. Please map down to 20 decibels. 54

* Please provide a map of current minimum daily sound levels with 10 decibel "topographical" lines for the project area and the entire peninsula. Please map down to 20 decibels. 55

* Please map the change in maximum and minimum sound levels in the project area after the different phases of the project are completed. 56

* Please discuss the change in current sound levels on existing trails in the project area and the difference after the project would be completed. 57

* Please detail the aesthetic values that would be lost from the existing trails. 58

* Propose mitigation that prohibits gasoline powered leaf blowers and wood chippers in residential areas. 59

There is no identification of the effects of noise on residents outside the project boundaries. To illustrate, I live in Carmel Woods. Since the beginning of construction on the "Macomber Project" I live with the constant, daily annoyance of bulldozers and wood chippers. The noise causes me to close my windows when I would prefer to have them open. 60

* Please rewrite the noise section to identify impacts of noise on existing residents identified on page 15-4. - Include the impacts of weekly (or even more frequent) leaf blower operation in residential areas 61

and normal wood chippers and especially any industrial wood chipper for tree cutting and wood processing operations.

* Please map table 15-2. It is far more meaningful to the few non-noise experts who actually read this section as a map. 62

Wildlife are affected by noise in contrast to the study cited on page 15-11. 63

*Please include the study cited in the EIR.

*Please map the noise on a topographic map of the borrow pit and asphalt plant.

Energy:

Energy I am concerned that an undisclosed impact is the additional load on the power grid in the Monterey Peninsula area.

* Please list the times, dates duration and coverage of all electrical Power outages on the Monterey Peninsula in the previous 10 years.

* Please describe the criteria used to determine a local electrical service area's frequency of power outages.

* Please describe how power outages increase in frequency and duration as the number of customers increases. 64

* Please describe and graph the capacity of our local (Peninsula) electrical service area in load carrying ability and number of customers it is able to serve.

* Please propose mitigation that any new subdivisions be prohibited from including electrical heating, electrical stoves and electrical dryers.

* Please quantify golf cart energy requirements and the number of golf carts expected to be in service at the proposed golf course.

* Please chart the electrical; and gas consumption -

1) baseline (existing or current) number or numbers,

2) the degree, in both percent and amount to which the impact would raise or lower that baseline number;

3) the threshold number at which the impact changes from significant to less than significant;

4) the amount of reduction for each individual mitigation measure suggested;

5) the new total number after the suggested mitigation;

6) the total change from baseline to maximum impact;

7) the total change from baseline to maximum impact if all mitigation is implemented;

8) at least one real world example of a successful implementation of each proposed mitigation measure that is in place and has been self-sustaining for a minimum of 3-5 years;

9) list all legal remedies if there are complaints about the mitigation implementation and identify none if there are no legal remedies.

Visual & Aesthetic

Map the amount of forest that would be lost or degraded. 65
* Please color code areas for species, age and size of trees.

Glare from light at night can be an enormous nuisance. For example: The Spanish Bay parking lot lights up the entire Asilomar Beach, and glares all night long, along the entire western seafront of Pacific Grove. The glare shines in the windows of homes and cars. It shines in the eyes of beachwalkers. The glare can be seen distinctly for 20 miles out to sea. The glare can be seen distinctly from the air, flying over Santa Cruz, Carmel Valley and Big Sur. 66

* Please detail the visual pollution from light sources at night and its impact on neighbors and wildlife.

* Please detail the visual impacts of the proposal from the air - from aircraft - for both day and night. Please provide aerial color photographs of the project now; and depict how it would change with the proposal. 67

* Please include references by and about Robert Louis Stevenson regarding their impressions of the project area. 68

*Please note that Robert Louis Stevenson stayed on the proposed ranch area in a cabin and explain the plans for the remains of the cabin.

To me personally, the beauty, the natural undamaged by human design - serenity of the existing San Francisquito Flat is an astounding natural resource.

* Please describe the visual and aural conditions now existing in the San Francisquito Flat Area, before any construction. 69

* Please describe the 360 degree views through the Flat that extend for enormous distances without few signs of human impact. 70

* Please include the "Visual Resources Map" identified in County Policy 51. I suspect that parts of the proposed project area would be eligible for designation on the map. 71

* Please define "Public viewing area" as described in Coastal Implementation Plan Section 20.147.070.C3 I suspect that much of the proposed project is ridgeline development. 72

Given that the photos can not be taken from every angle, to depict before and after thoroughly.

* Please include aerial photographs of each subdivision (before) with computer enhancement to depict the buildout(after). 73

Mitigation Measure 4.11-14 Does not reduce the impact to a less than significant level. 74

Cultural and Historical Resources

* Please include a map of all areas surveyed.

* Please explain if construction vehicle operators (or whoever is likely to uncover resources) are to be trained or certified to identify archeological resources. 75

Population, Employment & Housing:

Table 4.13-1 * Please chart this information so it easier to understand. * Please identify source and explain the "1.85 residents per household" assumption. 76

Jobs:

Golf Course construction jobs are short term. 77

* Please list the number and duration of jobs the Golf Course will generate during construction. 78

* Please detail the number, type and amount of training and wage rate and expected benefits of the permanent jobs the Golf Course will generate for the long term. 79

High Pay vs Low Pay Jobs:

* Please identify and describe the number of permanent positions that the golf course will generate that would pay a high enough salary to allow the employee to qualify for a loan to buy a family house on the Monterey Peninsula. 80

* Please identify and describe the number of permanent positions that the golf course will generate that would pay a high enough salary to allow the employee to buy one of the "inclusionary housing units" that are a part of this plan.

* Please identify the amount of income necessary to qualify for a loan of $265,900 - the median home value in the p[roject area, which is used to determine the amount of "inclusionary housing".

County Employment Goals

Policy 24.1.3 states "promote growth of industry on sites designated for industry and commerce." The golf course is not proposed for a "site designated for industry and commerce." The golf course is proposed for a site designated residential - not commercial. Thus the golf course violates Policy 24.1.3 81

* Please affirm or deny and supply supporting arguments and furnish counter arguments.

All impacts are from the point of view (hearing) of new (proposed) residents. Almost completely ignored are noise impacts on existing residents. The sole exceptions are golf course activities. There are far more and greater noise impacts than that on existing residents. * Please rewrite the noise section to identify impacts of noise on existing residents. - Include the impacts of weekly (or even more frequent) leaf blower operation from the new subdivisions in existing residential areas and normal wood chippers and especially the industrial wood chipper for the "Tree cutting and wood processing operation". 82

All the above comments are significant.

As you might imagine - I still have not had enough time to finish studying the document. I respectfully request an extension of 30 days for the remainder of my comments.

Thank you for your attention to my comments,

David Dilworth
408-624-6500, Box 1495, Carmel 93921

Monterey County
Planning Department
Wanda Hickman - Associate Planner

July 14, 1995

Re: Rancho San Carlos Project (aka Santa Lucia Preserve)
- Draft EIR Comments (Misc)

Dear Wanda:

I want you to be aware of a document written in JUly 1991 by the Attorney General (Dennis C. Vacco) of New York State called "Toxic Fairways". It a survey about toxics and carcinogenic pesticides used on golf courses on Long Island.

It documents the 49 most common pesticides (fungicides, herbicides and insecticides) active ingredients, trade names, number of users and pounds applied per year on Long Island Golf Courses.

It describes how 6 of the pesticides "are already known to be capable of contaminating groundwater after normal applications following label directions."

83

David Dilworth
408-624-6500, Box 1495, Carmel 93921

1. The Table 10-3 in Chapter 10, "Fisheries", referred to on page 11-34 of the draft EIR, is in the report prepared by BioSystems Analysis and is not presented in the draft EIR.

2. To protect listed species from human disturbance, Jones & Stokes Associates does not publish their exact locations in its reports. As noted in Table 11-3, however, general locations where the Smith's blue butterfly has been observed include the Animus, Chamisal Ridge, Peñon Peak, and the Touche. Most of these locations are indicated on the topographic map of the project area (Figure 6-1) and the remaining locations can be found on U.S. Geological Survey 7.5-minute topographic maps.

3. As noted in this comment, black bears and mountain lions are uncommon residents of the Santa Lucia Preserve. Neither species has special-status, according to the definitions provided in the draft EIR (pages 11-17 and 11-20), and there was is no specific reason to discuss them. Several commenters, however, have raised concerns about the possible effects of this project on mountain lion populations. For further discussion of the possible effects of this project on mountain lions, please consult the response to Comment 1 from CNPS.

   There was no reason to discuss the status of California condors or grizzly bears in the draft EIR. Free-flying condors have not been observed in Monterey County since about 1980 (Roberson 1985); the last wild pairs were captured in southern California in the early 1980s. Monterey is within the historical range of the species, however, and remote portions of the Santa Lucia Preserve could provide suitable foraging habitat for this species if captive-bred birds recolonize the coast range in the future. The last California grizzly bear was killed in the southern Sierra Nevada in the early 1920s (Storer and Tevis 1955), so this subspecies could not be affected by this, or any other, project.

4. CEQA does not require an executive summary but rather a summary, which is provided in Chapter 1 of the draft EIR. Information on the mileage of road that will be paved is not required in this summary. The number of electric vehicles currently used is not relevant.

5. Table 14-2 in Chapter 14, "Climate and Air Quality", of the EIR lists monitoring data for pollutants of concern in the project area: ozone and PM10. Stations in Salinas and King City also monitor for carbon monoxide and nitrogen dioxide. However, neither of these stations has shown any violations of either the CO or nitrogen dioxide ambient standards during the past 5 years. The MBUPACD does not currently monitor for ambient concentrations of hydrocarbons, reactive organic gases, lead, sulfur dioxide, radioactive matter, carbon dioxide, or methyl bromide. Consequently, it is not possible to compile a table showing the ambient concentrations of these pollutants.

6. The discussion of the PM10 ambient air quality standards that begins near the bottom of page 14-2 in the EIR states that the inhalation of particles small enough to reach the lungs can

interfere with the functioning of the lungs and may result in respiratory illness. The state and federal ambient air quality standards for PM10 have been established to protect human health and welfare. As shown in Table 14-2, neither the state nor the federal standards have been violated at the Carmel Valley and Monterey monitoring stations in 1992 and 1993.

7. The commenter does not provide enough information regarding the article name, publication, and date that would allow a review and/or inclusion of this reference in the draft EIR. However, since the commenter of this statement appears to be an EPA employee, he is most likely referring to EPA's PM10 ambient standards, which are less stringent than the California PM10 ambient standards. As shown in Table 14-2, the PM10 monitoring data show that Monterey County has met the state PM10 ambient standards during the two most recent years of record.

8. As mentioned in the response to Comment 6, the PM10 ambient air quality standards discussion identifies PM10 as a threat to respiratory health. No additional discussion is necessary.

9. A mitigation measure has been proposed that would limit the number of fireplaces and encourage the use of wood-burning stoves. No additional mitigation measures appear necessary because the low density of residential units would not create a significant air quality impact from the use of such devices.

10. The state and federal ambient air quality standards are summarized in Table 14-1. There are no existing state or federal ambient standards for methyl bromide.

11. The ambient air quality standards summarized in Table 14-1 are designed to protect the respiratory health of those individuals most susceptible to air pollution, particularly children and the elderly. As for air quality, the proposed project does not appear to pose a substantial health risk to children. The draft EIR is available for public review and comment. Any member of the public and any organization (including the American Lung Association) are welcome to submit comments.

12. Refer to the response to Comment 11 above.

13. Generally, children and the elderly are more susceptible to air pollution as compared with the general population. However, the state and federal ambient air quality standards have been developed to protect the health of susceptible individuals, including children and the elderly.

14. Refer to the response to Comment 13 above.

15. The response to Comment 13 explains that the state and federal ambient air quality standards are designed to protect the health of susceptible individuals, including children and the elderly.

A mitigation measure has been included in the air quality section of the EIR that will prevent operation of the portable asphalt plant within 0.25 mile of any sensitive receptors. This mitigation measure will provide enough space to allow dispersal of pollutants, including any odors produced by the asphalt plant. In addition, it is generally not possible to produce "before" and "after" pictures that show what air pollution would look like before and after project implementation.

16. No violations of the state and federal PM10 standards nor the federal ambient ozone standards have occurred at monitoring stations near the proposed project during the most recent 5 years for which data are available. Violations of the state ozone standard have occurred only once at the Monterey monitoring station and five times at the Carmel Valley station during the past 5 years. No other violations of the state or federal ambient standards have been monitored at Monterey County stations during the past 5 years.

17. The purpose of the air quality section of the draft EIR is to evaluate the direct and cumulative air quality impacts of the proposed project. It is generally not possible to produce pictures that show what air pollution would look like before and after project implementation.

18. The quantities of criteria pollutants that would be produced during construction and operation of the project are summarized in Tables 14-3, 14-4, and 14-5 of the EIR. Generally, the persistence of pollutants is a function of wind speed. The higher the wind speed, the faster those pollutants are dispersed.

19. The chapter focuses on the health risks of the air pollution associated with the project. The MBUAPCD has established emission thresholds to be used to evaluate the significance of a project's emissions. Projects with emissions exceeding those thresholds are required to mitigate those emissions to eliminate potential health risks. The air quality section of the draft EIR contains mitigation measures to reduce the emissions of all air pollutants that would exceed the emission thresholds. And, in certain cases, mitigation measures were included to reduce emissions even when emission levels are less than significant.

20. The commenter is correct in stating that the full range of a project's air quality impacts cannot be estimated by CO emissions alone. The air quality chapter of the draft EIR did not examine CO alone, but instead evaluated the air quality impacts of each pollutant that would be emitted by the project.

21. The worst-case estimate of total combined emissions from construction is shown in Tables 14-3 and 14-4. The worst-case estimate of operational emissions is shown in Table 14-5. The state and federal ambient air quality standards are based on individual pollutants. No standards currently exist to evaluate combined or synergistic effects of pollutant concentrations.

22. The commenter appears to confuse breathing-level air with ambient air. Ambient air is the air that people breathe. Air quality monitoring stations are generally placed in locations believed to represent worst-case ambient air. The air quality section of the draft EIR summarizes the reasonable worst-case air quality conditions that would result from the project. For example, the CO modeling analysis assumed worst-case meteorology, including low wind speeds and inversion conditions.

23. The largest number of air pollution studies on species other than humans have focused on vegetation (primarily crops and harvestable tree species). Few, if any studies, have analyzed the effects of air pollution on animals. As shown in Table 14-5, the proposed project would result in a net increase of ROG, NOx, and PM10 of 55, 74, and 7 pounds per day, respectively, compared to future no-project conditions. These increases are unlikely to have a significant impact on wildlife or vegetation, including the Monterey pine forest.

24. Refer to the response to Comment 23 above.

25. Page 14-2 of the draft EIR includes a discussion of ambient air quality standards and the health impacts of violating those standards (for the pollutants of concern produced by the proposed project).

26. Refer to the response to Comment 25 above.

27. The section on cumulative air quality impacts does not include a discussion of the acceptable risk numbers mentioned by the commenter. The discussion of cumulative air quality impacts begins on page 19-10 of the draft EIR, not page 4.8-18 as identified by the commenter.

28. The primary pollutant of concern from asphaltic concrete plants is PM10. PM10 is generated by the handling of aggregate that is mixed with the liquid asphalt. The U.S. Environmental Protection Agency (EPA) has established new source performance standards, which consist of PM10 emission limits, for asphaltic concrete plants. Volatile organic compound emissions can also be produced from asphalt plants as the asphalt cures and from incomplete fuel combustion. NOx and CO are also released as byproducts of fuel combustion.

29. Refer to the response to Comment 28 above.

30. Refer to the response to Comment 28 above.

31. The commenter asks that the EIR affirm or deny arguments but does not reveal the basis of the argument(s) he would like to see made.

32. Refer to the response to Comment 31 above.

33. The commenter must have made a mistake in adding the numbers shown in Table 14-3. The asphalt plant and rock crusher emissions total 78 pounds per day of PM10. PM10 emissions

from asphalt production and truck traffic plus rock crusher operations in Table 14-4 equal 82 pounds per day. The 82 pounds per day, however, is a CEQA significance threshold established by the MBUAPCD and is not the maximum allowed by state law.

34. Any alternative designed to meet the project's objectives would have to include the use of asphalt and crushed rock. If the asphalt and rock is not produced onsite, it would have to be processed elsewhere and trucked to the site, which would generate air emissions from heavy-duty trucks. Meeting the project's objectives is not possible without the use of any construction vehicles.

35. Refer to the response to Comment 34 above.

36. The portable asphalt plant will be required to meet new source performance standards for these types of plants as established by EPA. In addition, operations of the portable asphalt plant will have to meet emission limits and criteria established by the MBUAPCD. For example, MBUAPCD Rule 403 prohibits the discharge from any source particulate matter in excess of 0.15 grain per standard dry cubic foot of exhaust gas. MBUAPCD Rule 400 will ensure that the opacity of emissions released by the asphalt plant does not exceed that allowed by the rule. Also, MBUAPCD's Rule 402 prohibits the plant from posing a nuisance to the public. Consequently, the MBUAPCD has several rules it can enforce to ensure that the asphalt plant is run responsibly.

37. The commenter is correct that cars tend to produce more CO in the cold start mode than after they have warmed up. Consequently, short trips lasting less than 8 minutes pollute disproportionately more than longer trips.

38. Diesel exhaust would be produced by construction equipment. Operation of the project would produce minimal amounts of diesel exhaust.

39. Refer to the response to Comment 11. Any member of the public, including organizations, is welcome to submit comments on the draft EIR.

40. The statement that "Diesel is instantly sickening to some people" may be true, but it is not based on any scientifically measurable data. Some individuals may enjoy the smell of diesel exhaust, but such a statement does not add any information that can be used to quantify the impacts of the proposed project.

41. Generally, most chemical dust stabilizers are cellulose-based compounds that are nontoxic to plants and animals, including fish.

42. Refer to the response to Comment 41 above.

43. It is unclear from the comment which mitigation measure the commenter is referring to when he states that there is no legal recourse to the lack of implementation of this mitigation measure. The commenter is advised to consult an attorney on legal questions that he may have.

44. Refer to the response to Comment 43 above.

45. The use of electric vehicles will reduce air emissions if they are used to replace vehicles that operate on fossil fuels. However, the electricity generated to charge electric batteries will result in the emission of air pollutants from electric utility generating sources. Also, electric vehicles have a high battery turnover rate. The lead contained in lead acid batteries is classified as a toxic substance and must be either disposed of or recycled. Improper disposal can result in toxic contamination of soils and/or bodies of water. Recycling facilities are available that process the lead for reuse. However, such facilities often are associated with elevated levels of lead concentrations in the surrounding neighborhoods. Consequently, electric vehicles do not represent an environmental panacea.

46. No electric vehicles are currently in use on the ranch.

47. Comment noted.

48. The project applicant indicates that blasting at the quarry will not be needed because of the decomposed state of the material being mined.

49. Table 15-2 in Chapter 15, "Noise", of the EIR summarizes the results of sound monitoring conducted in the plan area. These data quantify the sound environment in the area. The relatively low sound levels, in many cases in the range of 20-30 dB, are consistent with the statement that "Rancho San Carlos is generally quiet."

50. The measurement taken at Site 1, 50 feet west of Robinson Canyon Road, resulted in a measured L90 value of 22 dB. L90 is the sound level that was exceeded 90% of the time over the 24-hour period that sound levels were monitored. The 22-dB value does not represent the sound level that typically occurred during that period but rather is more representative of minimum sound levels in the area. The fact that the 24-hour average sound level (Leq) at this location was 44 dB indicates that sound levels were typically higher. These measured sound levels are not considered unusual for an isolated rural setting such as this.

51. The specific equipment that will be used to cut trees, grade soil, chip wood, and crush rocks has not been identified at this time. However, maximum A-weighted sound levels produced by typical equipment used for these purposes are available and are as follows:

- chain saw - 88 dB at 50 feet
- bulldozer - 90 dB at 50 feet
- wood chipper - 96 dB at 50 feet
- concrete crusher (similar to a rock crusher) - 90 dB at 50 feet

52. A large truck that might be used to transport construction materials would produce a maximum sound level of about 87 dB as measured at 50 feet. As discussed on page 15-12 of the draft EIR, the transportation of personnel, materials, and equipment associated with construction (which would include tree removal) will increase traffic on Carmel Valley Road and other local roadways. Because of the requirement to minimize project-related traffic on Robinson Canyon Road, most construction-related traffic would occur on Rancho San Carlos Road.

A total of approximately 1,480 trees will be removed (451 to provide home sites and 1,029 for road and driveway construction). Removal of trees is associated with construction noise and is discussed on page 15-10 of the draft EIR. Noise impacts associated with construction, including tree removal, are considered less than significant for the following reasons:

- The number of facilities and residences to be constructed and the number of trees to be removed is relatively small and noise will be intermittent and short term.
- Construction will be spread out over several years, avoiding a high concentration of noise.
- The areas where construction will occur are isolated from surrounding inhabited areas.

Hazards associated with construction trucks traveling on San Carlos Road are discussed on page 13-38 in Chapter 13, "Traffic", of the draft EIR.

53. Silence is the complete absence of sound and is absolute; there are not varying degrees of silence. As a practical matter, silence in an outdoor environment does not occur. Even in the most remote setting, there are many sources of sound: rustling leaves, a stream, wildlife, occasional aircraft. Sound pressure levels are used to assess varying degrees of loudness. Sound pressure levels are an appropriate and common measure used to quantify sound and assess sound impacts. Although the term "noise" is generally considered to mean unwanted sound, in the context of an environmental document the term "noise" is generally synonymous with the term "sound". The draft EIR assesses changes in sound that would occur with implementation of the proposed project.

54. The data provided in the draft EIR are considered adequate for characterizing the sound environment in and around the plan area. No additional mapping of sound levels is required.

55. Refer to the response to Comment 54 above.

56. The analysis of changes in sound levels under the development conditions identified in Table 15-3 is considered adequate. No additional mapping is required.

57. Sound levels reported in Tables 15-2 and 15-3 of the draft EIR are considered sufficient for characterizing typical sound levels in the project area and changes in sound levels associated with implementation of the proposed project.

58. Aesthetics are discussed in Chapter 12, "Aesthetics", of the draft EIR.

59. Because leaf blowers and wood chippers would be used intermittently and because home sites are substantially isolated from areas outside the plan area, restrictions on the use of such equipment will be a matter for the Conservancy and the homeowners association to address. Refer to the discussion on page 15-15 of the draft EIR.

60. The exposure of existing residents (i.e., those who live outside the project boundaries) to project-related noise is discussed on pages 15-10, 15-12, 15-13 of the draft EIR. No changes to the draft EIR are required.

61. Noise impacts on existing residences from landscape maintenance activities are discussed on page 15-15 of the draft EIR.

62. The data presented in Table 15-2 represent a reasonable sampling of sound levels in and around the plan area. A table rather than a contour map is considered the best form of presentation for these data.

63. It is impractical to include complete copies of all cited studies in a document such as this. The discussion of noise from the aggregate mining operations presented on page 15-11 is considered adequate. No additional graphic presentation of this information is required.

64. As stated on page 16-6 in Chapter 16, "Public Services and Utilities", of the draft EIR, natural gas is not distributed on the property and is not an element of the proposed project. There will therefore be no increased demand for natural gas.

The increased demand for electricity associated with implementation of the comprehensive development plan is discussed on page 16-20 of the draft EIR. As stated in the draft EIR, the increased demand can be accommodated by the capacity of existing and planned improvements. The evaluation of electricity demand presented in the draft EIR is considered sufficient and the additional detail requested is unnecessary. No changes to the draft EIR are required.

65. The approach used for this visual assessment relies on the FHWA's visual impact assessment system (1983). Assessment of forest species, age, and size is not necessary to evaluate visual impact of this project. Impacts on vegetation are addressed in Chapter 11, "Biological Resources", of the EIR.

66. Increased light from the development would occur mostly at night. Because most of the project site would be developed at a low density, impacts from light and glare on surrounding areas would be low. Minimum night lighting is proposed and few sensitive viewers (i.e.,

recreationists and people driving for pleasure) would be present to notice the increased light and glare from the project. For these reasons, visual impacts of increased light and glare from the project would be less than significant.

67. Aerial views were not used for this assessment of the draft EIR. Because of the small number of people that fly over the project area and the brevity of their views, aerial views were not evaluated as part of this visual analysis.

68. Although a historical description of the area may provide some context, the existing visual conditions provide the basis for describing changes from the proposed project. The existing visual character and features of the project region and site are described in the draft EIR. The approach used for this visual assessment is adapted from the FHWA's visual impact assessment system (1983) in combination with direct observation from public trails, roads, and review of site plans and visual resource maps.

69. The existing visual conditions for the San Francisquito Flat area are described in the "Setting" section in Chapter 12, "Aesthetics". Chapter 15, "Noise", addresses aural conditions.

70. Views within San Francisquito Flat are described in Chapter 12 of the draft EIR.

71. Figure 12-1 of the draft EIR shows the visual resources in the project area as identified by the county.

72. "Common public viewing area" is defined in Chapter 12 of the EIR section, "Policies Pertaining to Ridgeline Development".

73. Refer to the response to Comment 67 above.

74. Mitigation Measure 4.11-14 for visual impacts does not exist.

75. A map identifying all areas that have been surveyed is provided in the report titled Inventory of Prehistoric Cultural Resources and Preliminary Mitigation Plan for Rancho San Carlos (Archaeological Consulting 1994a).

The draft EIR specifies that a cultural resources management and monitoring plan (CRMMP) be prepared and incorporated into the project's implementation plan(s). This plan would specify, on a site-by-site basis, what measures will be implemented to prevent damage. One of the recommended requirements in the CRMMP is that training be provided to staff regarding the importance of cultural resources and the need to protect them. "Staff" as used here would include contractors on the site who might operate construction vehicles.

76. The draft EIR clearly states in Chapter 4, "Population and Housing", that the average number of persons per household ranges from approximately 1.82 persons in the City of Carmel to 2.79 persons in Monterey County. These data came from the 1990 U.S. Census Bureau and

were used to estimate the potential range in population growth generated by housing development proposed as part of the project. As stated in the draft EIR, the project is expected to generate a population of approximately 637-977 persons at buildout, which was estimated by applying the average household size range of 1.82-2.79 persons to the 350 housing units that would be constructed under the proposed project.

77. Similar to most of the construction jobs generated by the proposed project, golf course construction jobs would be temporary and would exist only during the period needed to construct the golf course. Construction of the golf course would probably be completed over a 1- to 2-year period.

78. Construction employment generated by construction of project facilities, including the golf course, was not estimated in the draft EIR because of lack of sufficient detail and information to prepare sufficiently accurate estimates. Employment generated by golf course construction would be relatively short term and would represent a small proportion of total construction-related employment generated by overall project construction over the expected 20-year buildout period.

79. The level of detail requested by this comment is not required in an EIR. The draft EIR estimated that operation and maintenance of the golf course, clubhouse, and practice range would generate 19 permanent full-time jobs (refer to Table 5-1 in Chapter 5, "Economics", of the EIR). These jobs would include both low-paying and high-paying jobs, including golf course management and maintenance jobs.

80. The level of detail requested by this comment is not required in an EIR. Because future wages of golf course workers and the future cost of housing within Monterey County are not known, it is not possible to estimate how many golf course employees could afford to buy a home within the county. The ability of an employee to purchase a home depends not only on income levels, but also on the cost and availability of mortgage funds and the ability of an employee to make an adequate down payment on the purchase of housing. Not all employees would require new housing because some would already reside within the county. For those requiring housing, employees could either purchase or rent an affordable housing unit being constructed onsite as part of the project's inclusionary housing, purchase an offsite housing unit, or rent an offsite housing unit. The 53 inclusionary housing units included as part of the proposed project would be affordable to low- and moderate-income onsite employees and may be available to lower-wage golf course workers. (Other onsite workers may compete with golf course workers to purchase these housing units.) Lower-wage golf course workers may also purchase or rent affordable housing offsite. Of the estimated 19 golf course workers, only a small number would likely require new affordable housing.

The original purchase price of inclusionary housing units constructed onsite will be determined by the Monterey County Director of Planning and Building Inspection Department, according to the county's Inclusionary Housing Ordinance. The purchase price will be based on affordability to a four-person household earning up to 100% of the Monterey County

median income as defined by the U.S. Department of Housing and Urban Development; therefore, the purchase price of the project's inclusionary housing will be determined by median household income rather than on the median price of housing within Monterey County. The number of inclusionary housing units included within the proposed project (53) was determined by the requirements of the Inclusionary Housing Ordinance, which stipulates that 15% of total housing constructed as part of the project must be affordable to low- and moderate-income households.

82. Refer to the responses to Comments 60 and 61 above.

83. Comment noted.

onterey County
lanning Department
anda Hickman - Associate Planner

Aug 1, 1995

e: Rancho San Carlos Project (aka Santa Lucia Preserve)
- Draft EIR Comments (Part 4 correction)

lease change from this:

Cumulative Health Risk Standard

* Please get the American Lung association to comment on whether they support the acceptable risk "less than significant" of "10 in one million" (pg 4.8-18) There are about 1/10 of a million people living on the Monterey Peninsula. That means the standard of 10 / million equates to 1 person per Monterey Peninsula. Is a murderer allowed to kill one person with a gun to achieve a profit in his business without paying any penalty to Society? Absolutely not. Yet the EIR argues that allowing one person to die of air pollution is an acceptable risk if you are developing Rancho San Carlos.

* Please affirm or deny and supply supporting arguments and or furnish counter arguments.

lease change to this:

Cumulative Health Risk Standard

* Please get the American Lung association to comment on whether they support the assertion that the acceptable risk of PM10 @ 29 ppd is "less than significant" (pg 19-10) | 1

Page 14-9 says the PM10 threshold is 82ppd.
Page 19-10 says the PM10 threshold is 86ppd.
*Please explain which is correct | 2

*Please convert "ppd" to milligrams/centimeter so we can directly compare it to Calif and Federal regulations. | 3
*Please also include the human life risk assessment in number of additional risk of human death from the impacts per 1 million people; | 4

*Please explain how the pollution quantity from construction vehicles calculated? | 5

ank you for your attention to my comments and this correction,
avid Dilworth
08-624-6500, Box 1495, Carmel 93921

AUG-01-1995 15:49 P.01

Response to Comments from David Dilworth (August 1, 1995)

1. Refer to the response to the original Comment 27 from David Dilworth (July 14, 1995).

2. Page of 19-10 of the EIR has been revised to change 86 ppd to 82 ppd. This does not change any conclusions.

3. There is no direct conversion between pounds per day (ppd) and milligrams per centimeter. The Monterey Bay Unified Air Pollution Control District has determined that emissions below the ppd threshold will be below the concentration standards.

4. This type of evaluation is beyond the scope of this EIR and is typically not conducted for projects of this type.

5. Procedures for calculating emission from construction activities are discussed on page 14-7 of the EIR.

Bruce Dormody
36945 Dormody Rd.
Carmel, CA 93923

July 13, 1995

Monterey County Planning Dept.
c/o Wanda Hickman
re. Santa Lucia Preserve Development
P.O. Box 1208
Salinas, CA 93902

Dear Wanda:

The following is my response to the Santa Lucia Preserve Development (SLP) Draft Environmental Impact Report (EIR). Comments will come in the same chronological order that the items appear in the EIR.

To begin I would like to give some general comments and concerns. After reviewing the EIR and other responses to it, the EIR obviously has some inadequacies. Many of the comments will change the whole direction of a particular topic. Instead of just commenting on the individual letters as an appendix to this EIR, I request that a new or subsequent EIR be drafted. This can then be reviewed by all interested parties with the new impacts, mitigation's and information fully incorporated into the new text. The new document should be indexed so readers can quickly flip to the proper chapters.

The subsequent EIR must refer wherever applicable to mitigate an impact by selecting the environmentally superior alternative of no golf course, e.g. water use, traffic, runoff, habitat, and viewshed.

The EIR must wherever appropriate refer to the FEIR on the Rancho San Carlos land-use density, EIR (87-013). Many good ideas and specific mitigation's are in that document, all of them were to be used to guide development of this property.

While acknowledging and appreciating the opportunity to comment on this EIR, I would still have to complain that the 45 day review period is inadequate and has caused comments to be rushed, without thorough understanding of the document. My family has studied this EIR everyday, and everyday we have a new, warranted concern to comment on. Staff has had two drafts to review and comment on, yet they missed many impacts. This is a huge development that impacts the whole Monterey Peninsula, the process should not be rushed. Originally I was going to provide maps, plans, photographs, and supplemental information to help express my concerns, but I did not have the time to organize such material.

SUMMARY

The Executive summary should contain a brief water demand analysis for the development. It should then be followed by the estimated proven safe water yield for the rancho. This will quickly show the reader that more water is needed then they can currently provide. 1

The Environmentally Superior Alternative should have a short paragraph explaining the reduced impacts the development would have with this alternative. 2

2. PROJECT DESCRIPTION

2-1 Site location. It should be noted that both White Rock and San Clemente cabins occur in a single cluster with the majority of their property that borders the Rancho San Carlos(RSC) being completely undeveloped. 3

2-3 The EIR must also show the phasing component of the development. Two separate maps should be used. One could be similar to figure 2-14 of the comprehensive Development plan (CDP) showing phasing of the buildings. The other should show the phasing of the two types of proposed openlands and wildlands. 4

2-4 Board Resolution 93-115 mandated that the project be located on the least environmentally sensitive lands. Upon review of both the project application and the DEIR I find wetlands that need to be filled, 30% sloped lands that need to be cut, Archeological sites used as golfing tees, and on and on. I would like for the EIR to comment on whether the development is truly clustered on the least sensitive lands. The EIR needs to provide the criteria for designating an area "least sensitive" and provide a map out lining these areas. 5

The Background section is mistaken when it asserts that a conceptual plan followed the many studies performed. News paper articles five years old basically describe what they have presently applied for. 6

The Development as proposed does not comply with Board Resolution 93-115. The EIR needs to point this out. The project is not compatible with surrounding land uses (lots on Long Ridge are located too close to the property line where hunting exists) 14,467 acres of land are not being retained as open space. The 9,400 + that are being proposed have roads, utilities, wells, and quarries. Hardly appropriate uses for open space. The remaining pseudo preserved 8,000 acres is a patchwork of private lots in which their back yards are considered open space. To my knowledge this definition of openspace has not been accepted anywhere else in the County. For example the recently approved Canada Woods Project does not include this type of development as openspace. The water was to be independent of the Carmel River and its tributaries. This has not been met most notably with well E-3. This is a substandard well in Garzas Creek Alluvium pumping underflow. The resolution also states that Robinson Canyon Road use should be minimized, yet approximately 3 miles of this substandard road will be used as an inter-ranch road with the remaining section also undoubtedly used. I will go into much greater detail on all these 7

items further down in the response. If the resolution is not complied with then the land use Density is reduced to 1 unit per 160 acres. The EIR must describe whether the EIR complies or not with Resolution 93-115. 7

2-5 Again 18,000 acres is not being set aside as preserved lands. For example Long Ridge Road is approximately 2.25 mile long. It will be 21 feet wide, so with no value given to cut or filled lands, 6 acres of the "preserved openlands and wildlands" will be paved for just this one road. The EIR need to add up all building envelopes, roads, watertanks, wells quarries and any improvements plus factor in an adequate setback (in other words a preserve should not start 1 inch away from a home, or road.. The EIR must disclose how much of the land is being developed and how much is being "preserved" 8

The EIR needs to show that the proposed development standards do not comply with county standards(e.g. development on 30% sloped lands) 9

2-6 the EIR needs to explain the need and use for 16 acres of commercial land in the CVMP as shown in Figure 2-3 10

2-8 describes the openlands will generally left in open space. The EIR needs to point out that uses such as vineyards, stables, and fences will be allowed. 11

2-11 The reclaimed irrigation water from the sewage treatment facility needs to be used only once. In other words the same water can not water the grass at the hotel and the golf coarse. To the best of my knowledge the Golf course will use all of the reclaimed water produced by the project. Irrigation for landscaping in and around the ranch center will all be potable water. 12

It should be noted that instead of "some of the lots will be served by the Treatment plant," that 150 hotel units plus 94 residential lots plus the ranch center will all be served by the treatment plan(over 50% of the development. 13

2-12 All road improvements should be constructed prior to issuing building permits. When funds are just guaranteed sometimes the improvements do not get done promptly or the wrong improvements are constructed first. 14

2-13 the EIR needs to determine the pros and cons of phasing the preserve. Could the development be sold and the new owners not dedicate the land? Does each phase give the developer the opportunity to go to the County and ask for changes? Is the total openspace component 9,300 acres, or are individual lots now accepted by the County as openspace? What is the problem with dedicating all 9400 acres on day one? The EIR needs to look as an alternative to the proposed development, new lot configurations which have the same building envelopes, and retain the mandated 14,900 acres in openspace owned by the conservancy 15

2-15 Discusses General Development plans. The EIR needs to say what other uses the zoning designations could be used for once they are established, in other words if an area is zoned heavy commercial what uses could be applied for later on down the road. 16

2-16 The term "limited development on slopes in excess of 30%" needs to be defined. If the EIR is referring to the over 4 miles of 20 to 25 ft. wide roads that need to be excavated, the wording in the EIR should be changed to "Major Development". 17

The EIR needs to provide a topo type map as well as a enhanced photo of the new sewage treatment facility with the three holding ponds(Appendix G is outdated and does not include all wastewater storage facilities. Will wetlands be effected by the additional ponds? How will odor, stagnation, insects and the like be controlled from these ponds? Will vegetation screening effect the aesthetics and views from Robinson Canyon Road? 18

The tree removal number for homesites seems ridiculously low. The EIR needs to justify this low number when certain lots (for example 104 - 115) are located in densely forested areas where their 23 acres of combined building envelope have hundreds of trees on them. 19

2-17 is mistaken when it discusses roads crossing 30% sloped lands. Many completely new alignments of the major(over 20 ft. wide) roads will be constructed. Not all proposed roads follow the existing 10 ft wide dirt ranch roads. The EIR needs to show the size of the cut to be made with each segment. For example the many segments along Rancho San Carlos road which are visible from many residences in Carmel Valley will have 30 to 50 ft cuts that will not revegetate due to there steepness. 20

In the next paragraph in the EIR discusses the golf course. The EIR needs to define it as an extremely low volume play or in the industries own terms, "under utilized". At only 15,000 rounds per year it will have less then half of other private courses use which consider themselves under utilized(e.g. MPCC). The EIR needs to determine the feasibility of running a course at such a low volume That 125 acres of the golf course will be mowed, yet only 71 acres will be watered. Anyone who maintains a yard in California knows that if you mow dry grass more then once it turns to dirt, not very attractive, yet weeds still grow during the year forcing more mowing, and more exposed dirt. The EIR needs to determine if these additional 50 acres of mowed playing area will be possibly irrigated in the future, are they to be fertilized, weed and animal controlled? Will they be lined like the rest of the course? 21

Tree Removal, The EIR needs to discuss the removal of large trees in greater detail, Landmark trees are ones over 24 inches in diameter. The EIR needs to point out that the golf Course will remove trees in the 50 to 60 inch in diameter range. These are historic trees which should not be removed. Compensating their removal with 5 two inch in diameter trees is totally unacceptable. The EIR needs to determine how many trees will be adversely effected by watering the golf course. many greens flow around the old valley oaks which traditionally do not tolerate irrigation because they have developed in a summer time dry climate. 22

2-18 discusses parking. the EIR should recommend that if reduced parking spaces are allowed then the as part of the permit the clubhouse should not be allowed to have special events commonly found at these facilities such as dinners, weddings, tournaments and the like which would generate more vehicles then planned for. 23

2-19 the EIR needs to discuss if the CVMP land use designation has been changed from the 1 unit per 10 acre density. If it hasn't then could the developer sell off these lands to be developed at that density? 24

LAND USE

3-1 needs clarification that both White Rock and San Clemente Rancho have single clusters (approx. 125 acres each) of small (500 to 1200 sq. ft) cabins on large (over 2,000 acres) relatively undisturbed ranches. 25

3-5 The EIR needs to discuss who owns the inclusionary housing?, Is there a not to exceed value to their cost? Can they be sold over time to non employees, or not low income? Who gets to live in them? Lots 63, 64, 67, 83, 84, and 92 with their gated entrances, large lots and proximity to the golf course look pretty nice for regular employees, what prevents a maid from buying a house for $200,000 quitting and selling it for $500,000? 26

3-11 discusses grazing on site. Although they are not delineated in the project application, the development clearly allows large animal grazing on particular lots within the development. The question then becomes can the cattle get out? Will these lots be individually fenced creating dozens of 20 to 60 acre pastures fragmenting the environment. What if the cows get onto the golf course, or into someone's vineyard? This needs to be discussed and an appropriate mitigation measure developed. 27

The rezoning specifically called for the siting of the development to be clustered and situated on the least sensitive lands. The EIR completely missed evaluating this requirement and must do so. Many homes are proposed to be widespread over the currently pristine eastern sections of the ranch. These homes need to be eliminated and clustered more towards the existing development near Carmel Valley. The EIR needs to require this mitigation. 28

3-12 I don't understand how the EIR can correctly identify conflicting land uses that are major (hunting vs. housing) which would result in a loss of our property rights. Then considered the impact less then significant. This is a significant impact. The EIR needs to establish buffer zones to development from nearby property lines which would resolve these types of conflicts. 29

3-13, policy 5.1.3 in no location in the EIR does it discuss the development's impact on wildlife's water use. The water balance which will be discussed later totally omits the 30

water requirements for the thousands of deer and other animals on the property? will they be fenced from the 8 ponds that store water for the golf course and Sewage Treatment Facility? 30

Policy 5.1 the project will eliminate several hundred acres of recharge areas particularly in the San Clemente flats(through lining of the golf course) and in the San Francisquito where several hundreds of acres will also be paved or build upon creating an impenetrable area. Also the approximately 100 miles of paved roads not including driveways will create approximately 250 acres of paved surfaces which will dramatically change runoff patterns. The EIR needs to acknowledge this and comment on its effects. 31

Policy 3.1.1.2 & 26.1.10.1 assessment of consistency is again incorrect. Allowing for the areas to be cut and filled around the 21,000 feet of major roads that cross steep slopes account for approximately 50 acres of these lands to be disturbed, on any other development this would be considered a major impact, why is it not here? These areas are being dedicated to openspace, yet the needed improvements will still be built through them. Is this truly openspace? 32

I have not seen any map which delineates drainage for the site, nor is their provisions to slow release all runoff. The EIR needs to provide this information. For example how is runoff going to be slowed during it's 1400 foot elevation fall from the Long Ridge road through the many culverts, into the canyons down to San Clemente Creek? 33

The EIR needs to require all major creek crossings be designed for the 100 year flow. Currently the developers has chosen to have culverts sized for the ten year event. Last winters storms enlightened us to the fact that not only is volume a problem during flooding but debris. Trees, branches, and brush all snag on culverts. Large over built bridges with no obstructions to the creek channels are much more care free. The EIR needs to require that the crossings of San Clemente Creek by Arroyo Sequoia and Steelhead run be by bridges. The same holds true for the other drainage's. This will insure safe passage for homeowners during high water events. 34

3-16 what does the EIR mean when it states that traditional wildlife corridors are not found? There are dozens of natural trails leading from the wilderness area to the south, over San Clemente and White Rock Ridges into the San Clemente And San Francisquito Flats. I will provide photographic evidence if necessary. The development in and around these areas will totally destroy this movement. The smaller lots of #34 through 115 (90% of which are under 6 acres) plus the golf course create an almost impenetrable building envelope to the traditional free flow of animal movements from the mountains to the flats. The EIR totally fails to recognize this and until it does and suggests the appropriate mitigation measures must be considered inadequate. 35

The preserve does not keep together large pieces of contiguous habitat. Quite the contrary. Look at the typical size of each phase of the preserve and one finds that it is 36

approx. 100 to 300 acres. There are a few large pieces to be sure but most (lots A, B, C, D, CC, DD, EE, F, G, H, J, GG, P, Q, R, T, U, V, W, Y, Z, AA, BB) all fall within this small, fragmented range. 3

Policy 7.1.5, 93-115, and 7.1.1.1 all strive to avoid development of wetlands. The EIR is mistaken when it states that the development is consistent. The project clearly fills in wetlands that could easily be avoided and requires are 404 permit. The EIR needs to make this clear, and that avoidance is an alternative. The EIR must recommend throughout the document (not just in the summary) that the San Clemente Flats should not have a golf course developed on it's wetlands and should be incorporated into openspace. 37

3-17, Policy 7.1.4 The project is not consistent with this policy. The four miles of roads required to be constructed though the steep slopes are almost exclusively in chaparral habitat. This type of terrain commonly has severe landsliding problems when disturbed. This project will experience these same impacts. The EIR needs to acknowledge this and recommend avoidance and alternative site locations so not as many cuts have to be made. 38

3-19 The development is not consistent with the ridge line development policy. The Golf Clubhouse is clearly visible from Robinson Canyon road (especially in winter when the oaks loose their leaves) lot 134, 130, 80, 129, 128, 127, 238 249 - 254 and a water tank near lot 93 all are rigde line development. The EIR must discuss this impact. 39

Policy 40.2.6 is not complied with. The EIR need to clearly locate on a detailed map whether the quarry can be seen from Robinson Canyon Road or Carmel Valley. The map that is given is inadequate and one must presume such a large feature will be clearly visible. The EIR needs to suggest that the location of the five duplex employee housing units along Robinson Canyon road should be moved. Although they are beyond the suggested 100 foot setback, they clearly are visible driving both directions of the County Scenic Route. Hiding them behind vegetation would take away from the continuity of the view. Moving them out of sight is the only solution. 40

3-20 (g) the maintenance facility, sewage treatment plant, employee housing, golf course, sports center, Vasquez and Pronghorn roads all fall under this policy and are not consistent with it. Again the EIR needs to recommend alternative locations, completely out of view of the County road(with 20,00 acres this should be easy). 41

3-21 policy 17.2.1.1 are clearly not consistent. The developer is asking for exemptions to the steepness of roads (17% grade on Long Ridge), is asking to have extremely long dead end roads(Long Ridge), asking for narrow roads and or classifying them as driveways (the road to lots 184-186). Clearly the rancho is in an extremely high fire danger area. The EIR needs to acknowledge this and hold the developers to the most stringent standards that the law requires with no exemptions. 42

3-22 Policy 3.2.2 again I see many driveways and roads which cross 30% sloped lands. The EIR and the Erosion Control Plan do not describe any specific measures for 43

controlling the runoff created from culverts that drain these roads, which then have to travel many thousands of feet to intersect a larger stream or canyon. This is unacceptable and inconsistent. The culverts will channels water into small rivulets moving 10 to 100 gpm into areas simply not use to such volumes. This will cause erosion of a new channel in the steep side hills until the runoff reaches an established waterway. The silt created by the erosion will travel downstream causing turbidity and siltation. The EIR is inadequate in it's review of erosion problems associated with this project. This must be addressed. We requested an onsite visit late last year but were refused. Such a visit would have given everyone an opportunity to physically see this problem. 44

Policy 15.1.1.1 is addressed in Appendix C. Pages C 6-7 addresses the landsliding issue very well, yet I do not see where this information is implemented in this section of the EIR. The EIR should state all landsliding hazards and recommend which lots should be moved in order to avoid the hazard. 45

3-23 Policy 26.1.2. the EIR is in error. The project scatters development throughout the 20,000 acres of the Rancho. **the EIR needs to identify the least sensitive lands and recommend development be clustered in these areas.** 46

The next paragraph is incorrect when assuming that the project is compatible with surrounding uses. Literally fifty yards from lot 234 is an active hunting and cattle ranch. I can just see homeowners complaining of the smell and noise of the cows and the danger of the hunting. The EIR must recommend measures to avoid this impact. 47

Policy 26.1.9.1 Is not complied with because development occurs right up to property that borders undeveloped ranches, and regional parks. Lots 215 - 217, 230 - 241, and 245 - 254, all are on hilltops, and/or on the canyon edge where they will create a significant visual impact to surrounding properties including Garland Park. 48

3-24 c. (3) it is unclear whether the project complies with board resolution # 93-115, let alone if each property owner will be bound by it. The resolution clearly states that a total of 350 units are to be allowed on the entire 20,000 acres. the EIR needs to determine whether the secondary units (ie the Senior, guest and caretaker units) are included in the 350 total, restricting each owner from every building any more housing units on their property, or are the secondary units above and beyond that number? 49

d. As stated many times the development is not all located in clusters. The EIR must give a definition of clustering. Then, for example it must determine if lots 245-254 adhere to the definition. These ten lots cover 615.65 acres. For comparison lots 32 - 41 cover only 38.8 acres. This is approximately a twenty times difference in the developers definition of clustering. The EIR must do the same determination for at least lots 227 -241, 201 - 210, 211 - 219, 223 - 226, and 163 - 169. The EIR should recommend that if these units where located in much smaller clusters, away from the far reaches of the rancho, that the open space component of the development would be much more contiguous, less roads would need to be built, with a resulting less impact to the environment. 50

3-25 e. The EIR fails to recognize that relatively flat oak savannas are quickly becoming a unique and valuable habitat in California. Much of the development takes place in this disappearing habitat. The FEIR 87 - 013 on the Rancho San Carlos Land use designation, page 5D 30-31 sets out specific mitigation's and guidelines for development in the grasslands and oak woodland as recommended by the dept. of fish and game. The Project application does not follow these guidelines. The EIR must incorporate these guidelines and determine if the project is having a significant effect to this habitat. 51

e. (1) The EIR must acknowledge that wetlands, especially those in the golf course will be significantly effected. The EIR must make clear throughout the document that the project without the golf course will have much less impact on the environment. 52

g. The EIR makes a major illegal, misleading, and incorrect interpretation of resolution 93-115. the Resolution clearly state that Robinson canyon road should be used for **EMERGENCY ACCESS AND AGRICULTURAL OPERATIONS** only. The EIR'S assessment interprets this to mean only substandard sections of Robinson Canyon Road. This is false and must be corrected. Fully three miles of the substandard County Road, (a section having blind curves, one lane bridges, cattle guards, substandard widths is proposed to be used by over 150 residences and the golf course. This is unacceptable and must be changed. The EIR is completely inadequate until it addresses this problem.. 53

h. (1) consistent. This is a premature statement for the EIR because the proven safe yield of the project currently is about 50% of needed demand. We do not know what impacts the 50 additional wells will have, if they can find water at all. The EIR needs to state that between 10% and 20% of all well drilled were basically dry. There is a high probability that this percentage will increase as more and more less desirable/reliable sites are chosen in the future. Remember the geologist chose the sites initially where they thought they would have the highest probability of finding large amounts of water. 54

3-26 h. (3-4) It is my understanding of the process that in order to recommend the formation of a CSA an EIR needs to do a fiscal impact analysis. This would determine the cost and assessment to support the water system, wastewater, fire protection and such. Questions about the phasing in of these services, how to pay for their operation when build-out has not occurred? Would outside sources of revenue need to be generated to supplement any shortfall? Does the dedication of such a large percent of the property to preserve lower the expected tax revenues? Who is responsible for the operation of the CSA if the project fails financially? The EIR needs to address this fiscal issue if it is to recommend the formation of the CSA 55

3-27 i (1-2) the EIR should acknowledge the communities need for specific improvements to both Carmel Valley Road and Highway 1. The EIR needs to refer to FEIR 87-013 where Cal Trans states that they "...are not in favor of any development that will add traffic to routes 1 and 68 in the Carmel Valley Area". To date not a single improvement has occurred to change this statement. The EIR needs to define specific improvements to 56

the Camel Valley Road and Highway One that this project would be responsible to construct to reduce the current traffic problem.

3-28 The commercial services area also includes the heavy commercial designation for the employee recreational center. The EIR needs to determine a more appropriate zoning designation for this lot. In addition the EIR needs to evaluate the true trip reductions and effectiveness of the proposed commercial center. Will the prices of the small gas station and grocery store deter the residents from shopping there over the lower prices of the supermarkets a few minutes away in town? 57

3-30 Policy 27.2.1 The EIR needs to discuss and mitigate the fact that almost all the proposed development is not located with convenient access to employment. Residents who live on the rancho will most likely commute to their offices in Carmel, Monterey and Salinas. The developers profile includes younger adults (in their 30's) who even if they are very wealthy will most likely have some sort of business off the property to keep them occupied. There is no way to justify that this proposed residential development complies with the county policy, it is leapfrog development.. 58

Policy 41.1.2.1 There are no walking or biking trails between the employee housing located along Robinson Canyon road and the ranch center. Employees living on lots #93 are almost 2 miles away from the ranch center, a good hike to take every morning and night. The EIR must reconsider this statement and determine the true significance on the number of car trips per day on Robinson Canyon Road. 59

3-31 (2) The EIR is mistaken not to call the RSC road a major road. Be that as it may the real concern is bicycles. Currently Robinson Canyon Road is a major biking road. There is no reason not to assume that Rancho San Carlos road(unless specifically prohibited) will not have the same activity from the new residents. Currently Rancho San Carlos provides bicycles for their guest that stay at the Hacienda. They bike Robinson Canyon road, Dormody Road, and Rancho San Carlos road. It is a very popular activity and will increase as the size of the lodges increase. The EIR must recommend that all new roads especially in the San Francisquito and San Clemente flat and San Jose regions should include bike and pedestrian pathways. 60

Policy 1.1.4 is not consistent. The EIR should point out that the main hotel is located almost a mile away from the ranch center and almost two miles away from the golf course. With the golf course having a 5.5 mile length plus walking back to the hotel I find it hard to believe that a hotel guest will walk close to ten miles in a day. The proposed shuttle to transport the approximately 25% of the 40 players per day, results in an employee for just these ten guests. High ratios of employees to guests is not representative in the employment calculations. 61

3-32 Policy 62.1.14 The EIR needs to determine if the individual, privately gated, with views of the golf course employee housing units(#'s 63-67, 83,84) conform with this 62

policy, or can they be occupied by someone making a 6 figure salary, or sold off over time.

POPULATI0N AND HOUSING

4-2 The EIR uses an unrealistically low figure of 200 employees to operate the project. Many of the positions will require three shifts (hotel, security, fire, water,) One definition of a world class development that this project is striving to be is service. Service equals employees. The EIR needs to research and determine the true amount of employees that the project will generate. Are caretakers who reside at the individual estates considered into this number? 63

The other term for "estates" that the developers uses is "Compound" These lots will include multiple housing units consisting of the principle residence, senior unit, care taker unit and guest house, (p. 5 of C. C. & R's). If these are allowed, the EIR needs to change many of its impact information (e.g. water demand, traffic, schools impact, and the like) 64

4-3 the EIR needs to develop an enforceable mitigation measure to make sure that only low to moderate income employees live in the inclusionary housing. 65

Population. I find it hard to believe that if one takes a conservative tally of residents, employees, and hotel guest of 1250 people at build out, that the traffic generated by the development amounts to one round trip per day, something is wrong. The EIR needs to justify the low traffic figures. 66

ECONOMICS

5-2 discusses property taxes generated by the project. The EIR needs to determine with the help of the County Tax Assessor the effect of the preserve, Both the properties deeded to the conservancy and the private lots with the conservation easements. These will undoubtedly lower the overall taxes generated by the project. The question the EIR needs to address will these tax saving mechanisms place a burden on other County residents to help provide police, fire, and school services. 67

Table 5 -1 I see no allotment for security (24 hours), the hotel numbers are incredible low, e.g. only 5 people to provide dining for over 200 guests for three meals a day? hard working indeed. Does this include waiters, busboys, hostess's, dishwashers, cooks, management? Will the equestrian center with its 72 stalls have any employees? What about the small equestrian facility in the hotel (lot 256)? Who will run the Quarry for twenty years? The cafe is small but two people to order, cook, serve, bus, clean, run the register, for at least two meals per day is impressive.(I think there was a *Laverne and Shirely* episode about this) The EIR must rework this table to more accurate numbers then use those revised numbers consistently through out the document (just 5 pages earlier {4-3} employees were calculated to be 20 % lower at 200 total.) The EIR must place some estimate on the number of employees the housing will generate. I suggest that the Pebble 68

Beach estate area would be comparable to find out how many gardener, maids, cooks, butlers, and the like the larger compounds have.

5-7 The EIR must place a estimate on the numbers of construction jobs to be generated because this has a direct impact on the traffic generated as a result of the project for the next twenty years. For example on average 25 units per year will be built (500 units/20 year buildout). This alone would probably generate on average 100 construction workers on site at any given period of time. The EIR needs to include this figure in the traffic impact analysis. 69

GEOLOGY AND MINERALS

6-2 The EIR needs to provide an actual acreage total in addition to figure 6-2 to better comprehend the amount of land in excess of 30% slope. The EIR then must provide the amount of land with slopes between 10% and 30% slope to get a better feel for exactly how much flat(less then 10% sloped) land exist on the rancho. Somewhere later in the document the EIR must take Figure 6-2, place a map documenting the landslides, redwood forests, wetland, fire hazard, sensitive species habitat and archeological sites to determine where the least sensitive lands truly are. Then factor in ease of access (e.g. if a road has to cut across a steep mountain to get to a small flat area) to show were clusters of development should exist. Then using the example of lots 32-41 cluster the housing units on approximately 4 acre sites in these areas. 70

6-7 The EIR needs to clarify it's position, are the faults active, potentially active or inactive. 71

6-8 & 6-17 it needs to be pointed out that heavy rain in combination with shallow, poor soils found on the ranch, landsliding can result even on the most gentle of slopes $\leq$10% even when the terrain is not crossed by a road. Adding these features, plus excavations for home sites will dramatically increase land movements in these areas. The EIR needs to develop mitigation measures to insure homeowners will not have mud oozing down upon them when they were under an assumption of relative safety from this hazard. The EIR needs to recommend setbacks, retaining walls and other measures to insure stability. 72

6-12 The Quarry, the exact amount of material and therefore the actual size of the facility needs to be determined in the EIR. I have never seen a quarry 1.5 feet deep by 176 acres. This corresponds to a 22 foot deep hole over the entire 12 acre site. Most likely it will be deeper because there will be a substantial amount of overburden removed (5 to 20 feet, until clean/hard bedrock is encountered) prior to any blasting for aggregate. With the potential removal of 425,000 cu. yds. The quarry will most assuredly change the topography in the area. 73

The golf course with its almost 300,000 cu yds of excavation will undoubtedly change the topography in that area. The EIR needs to address this impact. Some cuts for the various holes will be in excess of 40 feet(p. 4-17 golf app.) Hydroseeding has been tried at Tierra 74

Grande, Quail meadows, and most recently on the huge cut at Carmel Valley Ranch, none have been successful. The EIR must get into much greater detail on how each 30% slope exemption will be handled. Maps and plans need to show in detail the proposed cut heights for each section, how much shoring will be required, how steep the cut will be above the cribbing, and whether it can be expected to be revegetated? Also the EIR must determine the visual impact of each of these slope exemptions, and how they will form a barrier to animal movement. 75

6-13 why are the dozens of lots that lie between lots 206 and 157 not effected by the San Clemente Thrust? 76

6-16 The EIR also pointed out just ten pages earlier, the faults are not inactive either, so potential ground water pumping could help reactivate them. Wells are located extremely close to lots with faults nearby; # 206(R-2), 93(T-2), 157(two future wells) in fact many of the wells were purposely placed near faults because they are known to act as conduits or barriers to water. The EIR needs to discuss this potential impact in greater detail to determine if pumping along these fault features could activate them and suggest appropriate mitigation measures(well setbacks). 77

6 -19 The EIR fails to mitigate any of the significant impacts caused by building more then four miles of 20+ ft. wide roads. These roads will slide. The EIR must recognize this and suggest alternative locations to roads to avoid the impact. The EIR should also recommend that roads not be built at all and the few homes that are served by these roads are clustered in less sensitive locations (lots 227 -241). When roads must be built (such as Rancho San Carlos Road) then the EIR must establish mitigation measures to insure rapid runoff does not reach nearby creaks. That the channelization of runoff does not erode new gullies as it flows down to established channels. That road oils, brake dusts, anti freezes and other roadside pollutant do not get into the local watercourses. This is necessary so the EIR can adequately assess the cumulative impacts that the road construction will have on all biotic, aquatic organisms, and on the topography of the environment and on the viewshed. 78

The EIR needs to understand that in severe storm situations(1982-83) both Robinson Canyon and Rancho San Carlos roads were closed due to landslides for many days. The EIR needs to develop a emergency plan in the likely event that the Rancho will be cut off from the rest of the Peninsula for an extended period of time. The EIR should require as part of this plan that the ranch have on permanent standby large pieces of heavy equipment and dump trucks to clear these hazards as quickly as possible. As part of the plan the EIR must prohibit the standard practice of dumping slides over the edge of roads into the local canyons. Temporary slide deposition sites should be located on a map (similar to the ones located on highway 17) with the plan explaining what to do with the material after the winter. 79

6-20 The geologic hazard of liquefaction needs to be determined prior to the adoption of the VTM. The EIR must specifically recommend which lots are to be relocated. Lots 84 80

and 94 are obvious candidates. What other lots need to be moved? What about some of the larger facilities in the San Fransiscito Flats? The Sewage Treatment plant? Commercial center? These need to be investigated. They seem all to be near the unstable and saturated soils found in most of the local wetlands. 80

6-21 The golf course clubhouse and it's parking lot look to have substantial grading involved. (4-2 GTP) The parking lots has an approximate 20 ft. cut. How does the EIR propose to mitigate the potential landslide threat from such a cut? 81

Figure 6-4 is totally inadequate for locating the borrow site. A clear map showing nearby lot configurations, access roads and their widths must be provided. A thorough description must also be included which discusses potential views and size of the site, whether its on a lot or in the preserve, water demand (most aggregate requires thorough cleaning, labor demand, dust and noise control, hours of operation, runoff collection, a reclamation plan for areas that are no longer in use, and the like. This will have a significant impact on the environment whether a permit is required or not and the EIR is inadequate until it addresses these impacts 82

SOILS

7-2 through 3 describes an interesting phenomena. The Santa Lucia, San Andreas, and Pfeiffer and other soils have a low suitability for sewage disposal, this resulted in many of the lots in the San Francisquito and San Clemente flats being sewered. These are also the regions of wetlands that can't drain through the clays, Then why is it stated in the Hydrologic report that these same areas are the areas of greatest infiltration for the supposed aquifer? The fact is that the clays prohibit infiltration and result in the rapid runoff and overland flows associated with most heavy rainfall events. The EIR needs to determine which conflicting supposition is correct. Do these areas have high permeability leading to ground water recharge or do they have low permeability, which will not drain septic systems and has standing water on them for at least part of the year? One result has been proven, the requirement of sewerage, and the other is an unprovable theory to support an unreliable water source. 83

7-3 historically 17,000 acres of the ranch may have had cattle on them for a period of time but very rarely were the steep, brushy sloped (approx. 12,000 acres)regions of the ranch grazed. The EIR needs to state that no more then 8,000 acres of the rancho were historically intensively grazed, and of this the overgrazing probably took place on less then 2,000 acres. 84

7-4 The cause of the gullying is uncertain in the San Clemente. The cause could not have been solely cultivation because the age of some of the larger oaks found in the bottom of the gullies are at least one hundred years old. The area, despite the change of grazing practices, still is eroding because much of the turbid water found in San Clemente creek this year originated from this area. There seems to be a yet undetermined natural phenomenon which is supporting the on going gullying. One possibility which the EIR 85

needs to study is that the San Clemente thrust is slowly raising the elevation in the flats and the runoff is correspondingly cutting a new channel. The Sandstone outcroppings which ring the flats also seem to be getting larger every year. The EIR needs to acknowledge that placing the golf course in this region will only make matters worse, especially in conjunction with the almost 300,000 cu. yds. of dirt being moved. 85

The EIR must recognize that it is impossible to prevent sliding with almost any construction techniques when building roads on steep slopes (Highway 1, 17, and 80 are all examples of highly engineered roads which experience slides every winter. The EIR must state this as an impact which can not be reduced to less then significant especially with the existing erosion control plan. 86

7-5 The impact is stated as potential, it must read that it is significant and unavoidable as proposed.

Erosion, landslides, and sedimentation are not reduced significantly over time. The area has many roads such as Robinson Canyon Road which slide every year even though these roads are over 50 years old. Sliding increases dramatically with wet winters, which results in much more erosion then a dry year following construction. Landslides across roads in steep terrain commonly include thick vegetation with large trees. The land simply can not absorb all the water and fails. The EIR needs to understand that this problem will not go away once the roads are in place. This is why it can't be fully mitigated. A long term maintenance plan is necessary, but no matter what, landslides will occur on these roads. We can and will provide documented photographic and video taped evidence to support our conclusions. 87

Changing grazing practices while encouraging will not significantly change existing erosion problems. All ranches should be managed to enhance the land whether they are slated for development or not, it's called pride and responsibility of ownership. 88

The EIR must acknowledge that steep slopes do not revegetate. Investigate Robinson Canyon (over 50 years old), Tierra Grande (30+years), Los Laureles Grade (40 years since major improvements). These cuts are too steep to support vegetation. This is a permanent unmitigable result of crossing steep slopes with large roads. Rancho San Carlos road at 24 feet, and secondary roads at 21 ft wide will have the same result. 89

The EIR is unclear on exactly how much acreage will be eliminated from grazing. The C.C. & R's. clearly state that grazing will be allowed on the larger private lots. The EIR must also consider the alternative to grazing, a mowed field may have the same or worse impacts. The soils will be compacted by the tractor, small animals will be run over, mowed or exposed to prey. Currently in order to lower fire hazards the Rancho is mowing large fields which used to be grazed. Certainly the Golf Course will be mowed. Homes in the grasslands will indubitable mow around their building envelopes. The EIR must summarize all lands that will be switched from grazed to mowed to truly evaluate the impact that the grazing management plan will have on the environment. 90

The EIR needs to determine where erosion control measures will be infusible to implement. The areas might be too steep or brushy to have access. The resulting construction access might make matters worse. Long Ridge road needs to be thoroughly studied by the EIR to determine the effectiveness of suggested erosion control measures in preventing sedimentation into San Clemente Creek. 91

7-6 first paragraph. The same comments from 7-5 apply. The EIR has to make clear that a 2:1 slope will not be stable in the Ranchos environment. 92

Driveway pose a major erosion, landslide and runoff problem not adequately addressed in the EIR. For example the 1600 ft. long driveway to lot 241 has an elevation change of over 300 feet. This is extremely steep. The proposed driveway to lots 184-6 is about a mile and a half long with a 500 elevation change. Steepness of grades are not listed on the VTM nor are any cross slopes. These, plus dozens of other driveways will have a significant effect on the environment and the EIR must list them all and their corresponding impact. Where will the runoff go? Who is responsible for maintaining these extended driveways? Are they being proposed as driveways to avoid County building standards? What is the maximum number of houses a driveway can serve? What is the maximum one-way length for fire standards? Can a driveway have a 20% grade (lot 241)? 93

The EIR must mandate that only dire emergencies would warrant an exemption to grading earth between October 15 and April 15. Page 3-1 of the Golf Course Erosion and Sedimentation plan allows some wet season grading. The EIR must specifically prohibit this. 94

7-7 The EIR is incorrect to suggest that cut and fill requirements will balance on site. This gives the reader the impression of the site being the golf course. The golf course plan clearly states that top soil will be brought in from other regions of the preserve. Where? the quarry will not supply this type of top soil, so it must be from some other source. Will this source be in a private lot? or a wildland preserve? The EIR must locate all sources of fill for the golf course. 95

The Golf trail Erosion and Sedimentation Control plan will not mitigate impacts to a less then significant effect. In fact they may very well make them worse. The plan totally fails to identify the large amount of overland flow that accompanies rainfall event. The EIR must acknowledge that if these flows could be successfully captured, they could not be prevented from concentrating flows at their outlets in a greater volume when compared to pre-construction levels. This will increase downstream erosion. The EIR must also look at the effects these berms/drains will have on down slope wetlands. Without the natural overland flow will they dry? The rip rap as proposed is most certainly not native to the golf course area. The Carmel Stone is a highly erodable rock and could change the mineral content in the local streams. This could in turn effect the stealhead run because their creek no longer "smells" the same. 96

7-8 The EIR must study the impact of water quality degradation if the sewage treatment system fails and untreated or partially treated sewage flows into the creeks. No system is foolproof, accidents happen, human error may be to blame.. Storms might overload the system or overflow the holding ponds. Power failures at the plant or the many pumping stations could result in a spill. The EIR fails to acknowledge this highly probable threat to the environment. 97

The EIR must clearly locate on what lot does the 12 acre quarry reside. How will it be accessed? What is the width, grade and cross slope of that road? What drainage will runoff be channeled to? How will ponding in the quarry be avoided? Dust controlled? The suggested control plan must be evaluated for its adequacy by this EIR. 98

7-9 The EIR does not fully assess the impact for development on slopes in excess of 30%. The proposed mitigation measure will not reduce impact to less then significant. The EIR must look at alternative road locations, more clustering of development and reduced #'s of lots to reduce the significance of this impact. 99

GROUNDWATER HYDROLOGY

8-2 The EIR makes a critical mistake in reviewing the geology as it relates to the hydrology of the Rancho. This error renders the EIR inadequate. The highly permeable and transmisive alluvium which underlies all major creeks on the Rancho can and do carry a significant(majority) of the ranchos groundwater flow in the form of channel underflow off the property. It is fact these deposits which have to be full in order for stream flow to occur. 100

I will use San Clemente creek for my example, but the information is applicable to San Jose, Las Garzas, Potrero, Robinson and Hitchcock creeks. Much of the information for this conclusion has been gain from 50 years of observation of my family studying the watershed. The most recent information comes from having to excavate deep holes in the alluvium and pumping this underflow. The underflow is obviously moving in a single direction governed by gravity. One excavated pit (approximately 100 feet from the creek) has water entering the pit parallel to the creek, moving down stream to a low spot where it was being pumped out at approximately 40 to 50 gallons per minute. Using the EIR's depth of not more than 100 feet. and an average canyon width of 100 feet (many places San Clemente canyon is over 300 feet wide) gives us a value of 7,500 sq. ft of alluvium to transport groundwater. Using a very conservative hydraulic conductivity of 100 gallons per Sq. ft per day[1], this would give a 750,000 gallon movement of water off the rancho. The Las Garzas and San Jose creeks would have a similar value with the other three creeks being less. these subsurface alluvial conduits can and do move a significant amount of ground water. With a ranch wide aggregate total of 9 acre feet of shallow alluvial ground water per day moving off the ranch a total of 3318 acre feet. The EIR must

[1]Ground Water & Wells, F. Driscoll p. 75

investigate this resource. This significantly lowers the available ground water recharge to the deep aquifer.

8-3 & 8-5 contain conflicting information. 8-3 suggests that not all the ground water may be readily accessible, while 8-5 just gives an estimated aquifer volume. To the best of my knowledge the EIR does not go into significant detail on this matter. 20 some pages later in the water demand/reliability section the discussion seems to be missing. The EIR must answer the question on how much of the 64,000 acre foot is accessible? Are there physical constraints to pumping it out? Are their topographic constraints? It is my belief that due to 30% slope constraints over 60% of the aquifer is inaccessible. The remaining 40% can only be pumped to a particular efficiency (in other words wells can not completely drain it). Between these two factors the accessible aquifer is more in the 10,000 acre foot range. Recharge to this 10,000 acre foot potion must be determined by the EIR in order to discover if more water is being taken out then percolates back in. 101

8-4 The EIR must state that the average permeability was more then "slightly" overestimated. 5 wells out of 50 drilled is 10% that were dry. upwards of 20% of all wells drilled were dry or nearly dry holes. The EIR must point out that extreme care went into locating these wells sites, yet they were still dry. A higher percentage of dry wells will be encountered as less desirable sites are developed (e.g. away from the creeks, away from faults). The likelihood of constructing additional successful wells is an important topic which must be complete covered in the EIR. . Figure 8-5 shows ten more wells proposed for the San Clemente Flats area. This area has produced extremely low flow wells from the first choice, best sites, (E-2, S-2, T-2, T-7, R-2, and R-15 had a combined pumping rate of 7gpm{Table5-3 CHS} giving an average of just 1.2 gallons per minute for the wells which ring the flats. Well T-26 had a higher estimated yield, but the EIR correctly points out it could be influenced by San Clemente Creek. What is the anticipated average productions from these ten new locations? How is this estimate justified? 102

The EIR is confusing when it discusses storativity. It must make clear exactly what's going on at the rancho, The well tests and recovery observations(Appendix E CHS) clearly show recoveries were mostly in the 79 - 90% range with some being lower and some higher. It is interesting to note the highest recovery occurred at well T-11, the well which was thought to be influenced be the Potrero Creek(6-35 CHS) The EIR must discuss the relationship if delayed recovery to well yields and its impact on the reliability of the water supply. 103

8-5 The study in Maine probably has no relationship to fractured bedrock in California because it most likely has substantially less recent faulting events which could act as a barrier to or conduit for groundwater. The EIR must discuss the ability of groundwater to flow from one geologic formation to another. Many of the wells are located in Chamisal and Monterey formations in addition to the fractured granite. What are these rock's transmisivity, storage values, and are they being averaged in with the granite? 104

The EIR must answer the question about the reliability of the Chamisal formation. The Carmel Valley Ranch proposed to have the same type of independent, deep groundwater in this formation. They referred to it as the Tularcitos Aquifer. It proved inadequate to supply that development. What has changed which has made the formation more reliable? 105

The last sentence of page 8-5 is incorrect in assuming that all the groundwater becomes stream flow. As pointed out above a significant portion remains underground as underflow (which does support the stream) but has not been adequately measured for the EIR. This last sentence indirectly, and accurately implies that the pumping of this groundwater will reduce the amount of water available as stream or underflow. The EIR must make this point perfectly clear. Page 8-7 reaffirms this finding, that groundwater supports dry season flow in the creeks. How is it possible to pump this groundwater and not over the long haul have a significant effect on the creeks? 106

The EIR states that for wells near creeks, water levels remained at the level of the creek throughout the year. This brings up the point that they are tied directly or indirectly to these creeks. Rancho San Carlos does not have the water rights to pump directly (e.g. E-3) or indirectly (T-11) water from the creeks into a ranch-wide water system which freely transports water from one watershed to another. They also do not have the right to pump a creek dry, which would happen if well E-3 is operated at the proposed 65 gpm level. The EIR must investigate and reply to these concerns, especially in light of the State Water Resources Agency recent ruling fully appropriating Carmel River waters. A letter to the State Board has been sent requesting an investigation into the Developers water rights. 107

The EIR must make clear the Water Balance is purely an estimate that is off in several areas. The Water balance for the Rancho is too complex and variable to ever be accurate. First Rainfall. The ranch is immense and only had one rain gauge for any significant portion of time(ranch house) When new gauges were installed and when the actual information did not jive with speculative estimates, the real data was eliminated(Chamisal Ridge) and the higher estimates were used. It is also interesting to note that two rain gauges located only a few hundred yards apart, one manually read, one automated recorded a 25% difference in 1993 rainfall with the manually operated devise being higher(appendix A CHS). 108

8-8 & Figure 8-2 are not consistent. The literature states that ground water recharge is 6,800 acre feet, the Figure uses 5,900 acft. This must be corrected. The EIR must evaluate the accuracy of the baseline information. For every inch the average rainfall is off, the water balance has approximately 2000 acre feet less of water. The EIR over states the average annual rainfall for the watershed. The EIR must focus only on the average annual recharge to the deep aquifer. Phreatophyte use is 3,100 acre feet of ground water, that is shallow water (in the root zone <50 feet) then if 1,500 acft. go to support stream flow and another minimum of 1,300 acre feet goes to subsurface outflow which I contend is underflow in the stream corridors, that leaves zero to 900 acre feet of groundwater recharging the deep fractured aquifer. The development proposes to take 50% to 100% or more of the total recharge in normal to wet years and in Fact they very well might be 109

mining the groundwater in normal to dry years and overtime will run out. THIS IS A SIGNIFICANT EFFECT NOT ADDRESSED BY THIS EIR. IT IS INADEQUATE UNTIL IT EVALUATES THIS IMPACT. 109

To further lambaste the water balance, interception is ridiculously low. Interception in the heavily forested regions(approx. 50%) runs as high as 100% of storms under 0.25 of an inch. The land surfaces inside the redwood groves are commonly dry during lighter rainfall events. The EIR must revise this figure up. 110

8-10 root depth commonly can reach as deep as 30'. the coarser the soil, the deeper the roots can go. 111

8-11 I have never found a redwood tree on a hillside away from a creek that is not directly relying on shallow groundwater in the form of a spring. San Clemente Ridge is full of such examples. There is no way for a redwood to survive in its southern boundary without groundwater. Therefor, groundwater phreatophtes use is underestimated in the EIR. It can be as high as 10 acre feet per acre of riparian vegetation.[2] There are at least 1000 acres of uplands redwoods and evergreen forest which redwoods constitute a large chunk of. This vegetation alone can conservatively transpire 7,500 acre feet of ground water per year. A more realistic water balance has 500 and 1000 acre feet flowing into deep groundwater in normal to wetter years. During dry periods this groundwater is draining into the creeks providing very minimal flow. This is confirmed when comparing yearly natural fluctuations in groundwater levels(10 ft.) times the area of the ranch and storativity you get a volume of less then 1000 acre feet change per year. The EIR must address the significant impact of pumping 50 to 100% of all ground water percolation every year. What will happen during extended droughts? How much will the local watershed be dewatered? Will this subject riparian habitat to dryer conditions? 112

Storage of water in Phreatophites has no representation. It has been conservatively estimated that large Phreatophites store 2.3 acre ft of water per acre of redwood trees[3]. The rancho has approximately 1400 acres of pure and mixed redwood forests giving a total of 3220 acre ft of water stored in redwood trees alone. To confirm this phenomena one just has to observe any type of tree being cut down. They almost immediately start flowing water from the fresh cut. As the forests grow and increase their biomass the amount of water in this type of storage will increase. It takes a fire to lower the value. This is why many streams and springs increase their discharge after an area is burned. 113

8-11to14 Again as noted before much of the groundwater exits under the creeks as underflow in the cobble alluvium and should not be measured as stream flow. The Water Management estimate is not too high. The water Balance figure used in the EIR is too low and must be revised upwards. The EIR must differentiate between shallow groundwater recharge and any recharge that reaches the deep aquifer. If almost 6,000 acre feet was 114

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[2]Watershed hydrology, Peter Black, 1991 p. 127

[3]Watershed Hydrolgy, P. Black, p. 129

recharging the aquifer we would see a approximately 60' variation in groundwater levels over the year. More in dry years. This is not happening so the EIR must produce a lower deep aquifer recharge figure. 114

8-16 in order to adhere to Resolution 93-115 the project can result in no lowering of the base flow in the local creeks. 10% is too much, the project will result in more than 10% anywise. This must be mitigated by pumping the aquifer less. 115

8-17 The EIR needs to remind the reader that correlative rights do not apply to this project because resolution 93-115 gave special consideration to the property if they can meet certain water requirements, ie no adverse impacts to offsite users. If they do have impact(minor as it may be to the authors) as the EIR suggests then the resolution is quite clear that a lower zoning density is required. The EIR must address this issue. 116

The EIR must also include the consequences on the environment that the Project could result in depletion of off-site water supplies if ground water pumping was intersecting the natural off-site movement of water, forcing the downstream water user to find new sources of water. 117

8-18 contains misinformation which has direct baring on the estimated demand of water this development will require. The EIR states that the largest measured metered use was slightly less then 0.50 acre feet. This is simply not true and must be changed or the EIR is inadequate. The estate portion of Pebble Beach (a 600+ unit development that averages 30 degree lower summer temperatures then the rancho) used on average, prior to the most recent drought, 0.85 acre ft. (1986,1987 Cal Am service water reports) The drought came and rationing followed. Water demand fell dramatically averaging 0.50 for the period 1988 through 1992. As the drought ended and rationing was lifted the area immediately started using more water. In 1994, the most recent year available for comparison, the 650 Pebble Beach Estates averaged 0.72 acre feet per unit. 118

Additionally there is a metered development in Carmel Valley. It is gated and features large houses on large lots (Sleepy Hollow). For the period of 1989 through 1994 this development averaged 2.25 acre feet per unit.(MPWMD water use summaries). The water demand for this has been grossly underestimated. THE EIR MUST DETERMINE A REALISTIC PER UNIT WATER DEMAND TO BE DETERMINED TO BE ADEQUATE. For buildout of 300 market rate homes(not including any secondary units) demand will be 450 acre feet higher then studied in the EIR. The change in impacts will be substantial and must be addressed. 119

Table 8-1 In the EIR has many omissions. Total golf course demand from wells (e) should be 128 acre feet as expected in dry years (p. 5 GTWSP). This is 58 acft. higher then the table lists. It is prudent for the EIR to take a conservative approach to determining overall demand, especially in California where we have had more dry years lately then wet). 120

As stated above total market rate use would be 675 acre feet annually, provided that the secondary units are not build (this would raise the demand even higher). The EIR and the application seem to not allocate any water demand for irrigation around the ranch center. The development plan clearly shows lush green landscaping around the sports center, the lodge, and the Hacienda. The Hacienda's irrigation use would probably be covered by existing uses, but there needs to be an additional 25 af. of demand for this project (10 acres at 2.5 acft. per acre). 121

The Quarry will have a substantial water demand. All aggregate it traditionally washed and cleaned. The EIR must develop an estimated use for this demand. 120

(c) How can any sprinkler system operate at 100 % efficiency? The hole county can be very windy as the local fog moves in or out. Even if the fog is nowhere near your particular area. The wind quickly evaporates the mist coming from the sprinkler or blows it onto an area that doesn't need to be watered. The overall demand for the course must be raised by 10 acre feet (<5 %) to compensate for this loss. 123

8-20 Starts with a misleading statement. Not all return flows become groundwater. This is evident in the fact that so many (94 + 150) units will be sewered. The ground does not drain well, many return flows will pool near the surface, enhancing local vegetation, (resulting in green grass over the drain field) and evaporate away. 124

The EIR assumes that a sewage treatment plant runs at complete efficiency. What % of the 70,300 gallons per day are solids that will be removed? What happens to water used to backflush the filters? How much water evaporates from the settling/holding ponds? How much leaks through the ground? The EIR also assumes there will be no loss in the system. The water distribution and wastewater treatment system will have well over 100 miles of plumbing. Cal Am records losses (leaks) in their systems from insignificant to 36%! most are in the 5 to 10% range. The EIR needs to establish the expected loss inherent with large delivery systems and place that in the demand column. 125

8-22 The EIR needs to investigate whether the spirit of Board Resolution 93-115 is satisfied with a project that only has proven reliable water for the early phases of the project. This gets the developers foot in the door. They get their entitlements, zoning changes and special use permits up front, eliminating the threat to reduce their density if they can't provide independent water. The EIR must implement a mitigation measure that all wells are drilled and tested and comply with the conditions set forth in resolution 93-115 before the development can proceed with building. 126

The EIR must explain that well E-3 is only 30 feet deep, sub-standard and not permitted by the State Water Resources Control Board to export water out of the watershed. The EIR must also discuss the impact that this well will have on Garzas Creek. The well is slated to be pumped at a rate several times higher then flows naturally in the creek during the summer. It will dry up the creek. What will the impact be to the aquatic habitat? To Moores Lake? The EIR must discuss the impact that well T-11 will have on the Potrero 127

Creek. When this well was tested the creek went down the corresponding amount. The EIR must not recommend pumping this well at over twice the level that it was tested at. What will the resulting impact be then to Potrero Creek? 127

8-25 describes the construction of the Water distribution system. The EIR description will not work. Phase one and two of the project have no new wells proposed for it yet the closest wells R-11 and T-1 have a combined estimated yield of 4 gpm. The EIR must determine if this is sufficient to provide adequate flow for these phases. 128

It should be noted that during severe storm periods electricity can be out for many days. Relying on stored water in these situations could create low pressure zones, backflow problems, and eventual rationing if the power was out like it was in 1995. The EIR needs to suggest mitigation measure to avoid this impact. 129

8-26 The EIR should have the first sentence of this page in the Summary section of areas of Known controversy, because this is it. 130

8-27 If the well yields are uncertain for wells T-4, 12, 14, 20, and R-27 then the EIR must require retesting before adopting their yields into the CHS. The EIR needs to have all wells tested for over three days to insure their estimated yields are accurate. If the fact remains that the longer the test, the lower the yield then the EIR needs to recommend longer tests. 131

The EIR must determine that if the wells never achieve a flat drawdown curve, then even on cyclical pumping schedules, the wells will pump out and require long term recovery periods. The EIR needs to determine the loss of capacity while these wells recover. The EIR needs to determine how many wells can exist on the rancho without interfering each other? Of these how many can be constructed on slopes less then 30%? 132

8-29 to 30 The EIR must justify the use of the 60 degree curve. The temperature in Monterey has nothing to do with this project, just as the temperature in San Francisco has nothing to do with the temperature in Sacramento. 133

8-31 the EIR must discuss the impact that after a majority of the building is completed, that some of the larger production wells (over 30gpm) start to fail at a more rapid rate then new low production (5 to 10 gpm) wells can be developed. In other words the development experiences a water shortfall it can't deal with on site. What happens then? 134

The EIR must reconfirm that deep Groundwater recharge is the same or less then expected deepwater extraction. 135

8-32 The EIR misses the whole point of resolution 93-115 that the County wanted to avoid at least the last three listed bullets. The EIR is completely incorrect when it estimates that the development could sustain a water supply for 219 years. There isn't a aquifer in the world which can be completely drained. the EIR also fails to assume that the 136

aquifer is draining naturally, if it is not, then all rainwater must runoff each year. Which is it going to be? 136

The last paragraph also makes the wrong point. If wells are only located on 5% of the aquifer then a severe drought poses a serious threat to its reliability. 137

8-33 The EIR states that no mitigation is required for the impact. All these figures are based on estimates and can be off by several factors of 10. The EIR must state a mitigation measure if overdraft occurs. 138

There will be much more then 173 acres of impervious surfaces created with this development. 500 units with roads, parking, patios, decks lined golf courses and ponds create at least 350+ acres that are essentially impervious surfaces, or 1.75% of the rancho. 139

8-34 The EIR must point out that grazing will still exist on a concentrated intermittent basis which will not significantly reduce it's impacts to runoff. There are many factors which affect runoff and infiltration of the Rancho. First are the poor clayey soils which are impervious to infiltration. Second are the soils relative shallowness which quickly saturate and produce overland flow. Much of the land which is grazed will now be mowed. For example all of lots 262-3 (18 acres) have been mowed.. As competition for grassland is reduced with cattle, the deer population will correspondingly increase in size. The Longer grasses will evapotranspire more water in springtime and live longer into summer (a unmowed field in spring is green but once it's mowed it turns brown) The grazing plan may be a good thing but it will not significantly impact the groundwater hydrology of the ranch. 140

The example used on the top of page 8-36 would cause a 500 year flood event to the local watersheds, even if the grass was ten feet tall! This statement should be eliminated from the EIR. 141

Grazing was and still is concentrated in a few areas of the rancho. San Clemente Flats is one of those areas. Exchanging grazing for a golf course and many dozens of homes will have a significant impact to the grasslands, creating over 175 acres of impervious acres just in this one field. The Camp Dresser and McKee project in Colusa is not comparable to this development plan. The EIR must either include the Colusa plan as an appendix for public review or delete it from reference. 142

8-37 The EIR must point out that private lots will be allowed to graze cattle and or horses. Many horse pastures throughout the Carmel Valley are severely denuded. This same type of result will happen on the Rancho, again offsetting many of the beneficial impacts of the grazing plan. The effect of the grazing plan would is not significant and the EIR must change its closing sentence. 143

Impacts to groundwater levels will be significant. Wells E-3, T-11, R-26 have direct connection to the creeks. The EIR is inadequate until it recognizes this impact and fully mitigates it by not allowing those wells to be pumped as part of the development. 144

The EIR must list all existing wells currently within the one thousand foot radial influence from the rancho's creeks. Looking at the maps, a large percent of the wells are directly along or above the creeks. Most of these wells have solid casing only 50 feet deep, then they are screened. This is shallow enough to connect with the creeks, or ground water which supports the creeks. This impact needs to be further discussed in the EIR. 145

8-38 the EIR misses the point that the three foot increase drawdown would be in addition to the eight foot that is natural. Many shallow rooted trees which have adapted to this regime would suffer when their deepest roots are allowed to dry for the first time. The EIR must investigate the impact the groundwater pumping will have to the surrounding vegetation. 146

8-39 The EIR supports the notion that pumping will intercept spring flow and ground water flow which supports the creeks and riparian vegetation. Yet this impact is later ignored by suggesting to pump more water into the creek. This is a conflicting mitigation which will have substantial impact to the local springs and their oasis vegetation regimes. The EIR can not mitigate one problem be creating another. The EIR must state that this is a significant impact associated with this project which is unmitigable during drought conditions which will cause increased mortality to surrounding vegetation. A established tree can not have its roots dried without dying. The Carmel River riparian corridor is a perfect example of this. 147

8-42 The permeability of the bedrock is large enough that base flow is different from year to year depending directly on rainfall, so as a percent of flow it fluctuates close to the same as direct runoff. For Example this year we probably had three times the normal rapid runoff, and today, July 9, San Clemente Creek is still running over three times as high, solely on increased base flow. 148

The point the EIR must make if the creeks base flow is just a few gallons per minute during summers of droughts, then how will pumping 10 to 100 times the base flow not effect the creeks? 149

8-43 Impact. The EIR and CHS clearly indicate that these three wells can and in one case are effected by the local stream. The wells will either intercept this base flow before reaching the creek or directly feed from the creek. Any statements to the contrary in the EIR need to be removed or quantified. The fact is that the creeks, groundwater, and wells systems are all part of a single hydraulic unit. All three effect one another. 150

8-44 the pumping rate for buildout during a drought is low it does not include the extra demand for the golf course (58 af.), and the increased irrigation needs all over the property. The cattle grazing plan will have no effect on base flow during a drought. 151

Grasses will be short, interception and evaportranspiration account for most of a droughts rainfall, and base flows decline dramatically. This is not a acceptable mitigation. 151

8-45 Monitoring this impact is not an adequate Mitigation measure. It does nothing to insure quick response in times of droughts. Many organisms and vegetation can suffer in the suggested three year reporting period. These reports should be continually available to the public on a monthly updated form. (As MPWMD does for much of the Carmel River) 152

Delaying use of wells will not change the impact during long term droughts. The wells will be pumped and baseflows will decline. Whether it happens in March or August of a particular year means very little during a two to five year drought. 153

Drilling new wells away from the creeks will have no baring on the impact from the existing wells. The listed mitigation measures are not adequate and the impact has not been reduced to a less then significant effect. The EIR must state that as long as wells can tap into groundwater, which is supported by or supports the creeks, this is a unavoidable impact associated with the development. 154

8-46 The EIR must point out that droughts are long term shortages of water. Deferring the effects from pumping to the wet season assumes that there will be a wet season. 155

8-47 The EIR is generally correct about winter irrigation except drought periods. Then there is significant winter irrigation required. About five winters ago I remember 80 degree days around Christmas and a 100 Degree day in February. Droughts significantly increase winter irrigation. 156

The EIR is inadequate until it states that the cattle grazing plan will not mitigate any of the depletion to stream flow during long term drought periods. Monitoring the stream flows and reporting it every five years will not mitigate this impact. Severe environmental impacts can occur in a few minutes to aquatic life(the drying of a pool) Base flow reaches can retreat many feet per day if pumping is intercepting flow. The EIR must recommend some other mitigation to insure quick response if stream flows are declining. 157

The EIR makes an appalling judgment on the significance of the aquatic habitat in the upper San Jose creek. There are native land locked trout located in this these reaches that are very important. What about Red legged frogs, three spined sticklebacks and western pond turtles in this section of San Jose Creek? 158

8-49 The down stream portions of the San Jose and San Clemente Creeks must be monitored because the Rancho's property extends several miles down these watersheds. They may not own the property around the creeks but they have a significant influence on it. For Example, on Long Ridge well T-29 radius of influence is well within San Clemente Creeks watershed. The houses will significantly and adversely effect runoff to the creek and it must be included in this EIR. Above the San Jose watershed are many homes, wells and roads which will adversely effect this creek. 159

The EIR suggests discharging water into the creeks. The EIR must map protected base flow reaches so they can be studied, verified and commented on by the public. The temperature and exact location of releases of the discharge must be discussed. 160

The EIR must make it clear that establishing base flows based on the most extreme drought of record is fine when comparing effects of pumping during future drought, but unacceptable if the creeks are allowed to reach these critical levels during normal rainfall years. During 1990 many habitats were stressed to their limits. Redwoods died in the San Clemente and Robinson Canyon Drainage's. These conditions must not be allowed to become the new base flow. The EIR must establish recommended base flows for normal years also. 161

8-50 The EIR suggests allocating water to best maximize benefits, while not maintaining adequate flows. This means there will be an impact to the aquatic habitat. Who decides what creeks to supplement? What recourse is there if one suffers more degradation then the other? This is not an adequate mitigation measure. It is either not feasible or the releases should be increased. What happens if the releases are just being intercepted by creekside wells. 162

How did the EIR determine that a 20% proportion of the decline is considered significant. The EIR must read that any decline in stream flow that is attributed to the project is significant and must be dealt with. First and primarily by prohibiting any future phase construction and second by reducing pumping by eliminating water intensive uses such as the golf course. 163

The 30 gpm augmentation is not enough because it does not address the reason for the lower baseflow. If pumping is reducing stream flow, and the development is pumping 65 gpm from a particular creekside well. then it will take 65 + 30 gpm to compensate for the impact. The EIR would be better off establishing minimum flows and requiring whatever releases it takes to fully achieve those minimum flows. This is the approach taken by the State recently to protect the Carmel River. This may require 200 gpm releases though. 164

The EIR must fully address where this water will come from. All reclaimed water is accounted for with the golf course irrigation requirements. There are specific water rights which have to be obtained in order to transfer water from one watershed to another. Have these permits been applied for? Releases from Moores Lake and other impoundment's will have a significant adverse impact to all life currently using those waters (migrating ducks, fish, turtles, frogs, salamanders, and all the wildlife which use the ponds for drinking. What would be the esthetic impact of lowering Moores Lake? What water rights are needed for this? What would be the impact on the local riparian habitats? To the local wetlands? How will stream flow be affected downstream of these reservoirs? The EIR is suggesting an unrealistic/infeasible mitigation measure which can not be properly implemented. The EIR must state that the original impact of decreased stream flow is an unavoidable significant impact associated with this project. 165

The EIR is incorrect when it asserts that there is no fishery in Robinson Canyon Creek. Where is the EIR getting some of its ludicrous information? Impact to this resource must be thoroughly studied and discussed. 166

The EIR must require all mitigation's pertaining to water quantity and quality be performed for the life of the project. 167

8-51 The Impact must read without the word "minor". Any change to this resource in the Carmel Valley is significant. The EIR fails to differentiate between shallow and deep ground water movements. The majority of the 1000+ acre ft of groundwater movement is moving directly under the creeks. The Pumping as proposed by the developer will have a significant effect (much greater then 5 af) the EIR must address this impact and not get it confused with deep water reduction which might very well be 5 af. Mitigation measures are necessary. 168

8-52 The EIR makes a interesting assumption that a decrease of up to 80 acres of riparian Habitat is not significant. Where does it get such criteria? This is equivalent to eliminating 117 football fields worth of habitat. Losing 80 acres of the worlds most Southern and inland redwoods is significant indeed. The Rancho is large, but that does not give it the right to impact huge amounts of habitat. The EIR must consider it significant to decrease any amounts of riparian habitat. The EIR should map the expected areas where these losses will occur. What species will be effected? 169

8-54 The proposed mitigation's will not reduce the stated impact during droughts. This is a significant impact that must be addressed. Is it an unavoidable impact during droughts? MPWMD has had to irrigate much of the Carmel River during the latest drought to keep the habitat healthy. Where would the development get such water? When would it be implemented? 170

Again the EIR should express the loss in habitat in acreage rather then a percent. Over 80 acres of dead trees makes a greater impact to the reader then 5% of 8%. 171

8-55 The suggested monitoring plan is unknown to the reader. It must be referred to as an appendix to the EIR for public review of it's adequacy. 172

8-56 What? the reader must be a math major to understand the revegetation thresholds spelled out in the EIR. It should be made plain and simple. If any riparian habitat suffers from pumping in the aquifer, the pumping should stop and the impacted area revegetated. No 1/4 of 10% on every other Tuesday that falls on a leap year. More then one whole page of the EIR could be eliminated with the above simple sentence. 173

8-57 the first sentence of the Impact should read: "Wetlands occupy about 200 acres on the Rancho..." By implying that it is **only 1%** readers are lulled into accepting significant impacts. The EIR then describes the types of wetlands. This description conflicts with the 174

CHS's conclusion that a large amount of groundwater recharge occurs in these Flats (p.6-18 CHS). With the natural clay barrier how can this be? If these 200 acres commonly have ponded water on them, how will the grazing management plan increase infiltration. Water runs off water. Taller green grass evapotranspires more than short dead grass. The VTM sheet 10 clearly shows well T-9, the largest of the deep water wells(50 gpm), right in the middle of a large wetland. Pumping the well will either drain this wetland, or the well is not being refilled from overhead rainfall. Which is it? The EIR can't have it both ways. Where does recharge come from? What is the total acreage of the recharge area? 174

The EIR is incorrect in its assumption that the springs will not be effected by pumping. Many of the springs lie not only at or near the base of the many ridges of the rancho, but all up and down the hillside. The brushy slopes dotted with dozens of sycamore oasis's are an easily identifiable indication of these springs. These springs represent where the fractures of the bedrock daylight through the steep hillsides. These seeps are fully a part of the mountainous aquifer. The springs which drain Long Ridge for example have up to 1400 feet of elevated mountain mass feeding them. Wells constructed on top of these mountains (T-29) intercept these fractures that would otherwise feed the springs. The EIR fails to quantify how much of the groundwater drains out of these springs (individual output is as high as 5gpm), which is normally completely consumed by local lush vegetation (ferns sycamore trees, and willows) The EIR is inadequate until it addresses this significant impact. Many thousands of animals visit these springs for water. What will the impact be to them with the loss of this habitat? What will be the offsite impacts to neighboring properties who rely on these springs? The EIR must address and mitigate these concerns. 175

The last sentence should read that all water is fully appropriated for the Carmel River(recent State Water ruling). I believe that this includes all tributaries. 176

8-58 The 211 af. figure does not include the 58 af. needed during droughts to supply the Golf Course. The EIR must acknowledge that the Project could consume all stream flow during a drought because the pumped protected baseflow mitigation is infeasible. 177

8-59 I believe the EIR is overestimating groundwater pumping in the Carmel Valley. First their is a major return flow eliminate(septic systems, agriculture, turf) I think the gross demand including all private pumpers is in the 12,000 af. range. The EIR needs to confirm its numbers. The EIR then lists reasons it feels there will be no impact to the Carmel Valley Aquifer. Many of these reasons are estimates or not relevant (reasonable use, intensity) to the assessment of environmental impacts and need to be eliminated. 178

The EIR fails to discuss offsite impacts to the individual watersheds. The Impacts to lower San Clemente, Las Garzas, Robinson, Potrero and San Jose Creeks all of which have downstream users, must be discussed. The project will have a much greater impact on these creeks then to the Carmel River. 179

RUNOFF

9-2 Underflow needs to be added. It is this shallow groundwater directly under or to the sides of streams in the alluvium which supports surface flow. Base flow dramatically changes over the course of the year, and from year to year. It is directly related to the previous year or two's rainfall. 180

9-3 Elevations in the Carmel River watershed goes up to 5000 feet above sea level. 181

9-7 The EIR needs to discuss less traditional types of flooding associated with this project, overland flow. This could produce significant structural damage and a general nuisance over a long period of time. Lot 88 for example has a several cfs. flow during the typical winter storm. This flow concentrates in a low spot in the middle of the lot and then flows onto San Clemente Flats. 182

Table 9-2 The ten year flood event seems low for San Clemente creek. Is this at the location where the creek exists the property, or enters the Carmel River? Where the creek enters the Carmel River we had a peak flow of 1400 to 1500 cfs in both the January and March Floods. For this creek, those figures represent a 15 to 20 year flow. A ten year flow would be 800 to 1000 cfs. 183

9-9 The Bay Area is now including brake shoe dust as a major pollutant which is showing up in concentrated amounts in the bay. With all the steep hills associated with this development, this will be a significant impact. 184

9-15 The EIR needs to discuss the impact of reduction of flood flow conveyance with the many mainstream road crossings with just culverts (Steelhead, Vasquez and Arroyo Sequoia Roads). These culverts will not be able to handle the flows because they can easily get clogged. Bridges with no structures located in the channel would be the best mitigation. 185

9-16 San Clemente Creek had about a two mile reach of continuous flow throughout the drought. 186

9-17 A mitigation measure is needed to assure cool temperatures if base flow is supplemented from storage ponds. These ponds commonly get quite warm in the Summer. 18

Table 9-3 As stated previously the project will develop more then the stated 173 acres of impervious surface. This figure must be raised. For San Clemente watershed for example there will be about 8 miles of 21' wide roads, 60 driveways and building envelopes totaling more then 100 acres. This watershed will have much more then the stated impervious acreage. Page 14 of the C. C. & R's say that there is no limitation to the sizes of the residential compound. The EIR must assume that the majority of each building envelope will be an impervious surface. The EIR must determine new, more accurate values. 188

9-19 The EIR must provide a map showing where these detention basins would be constructed. The EIR must further discuss what happens to water in these basins in a wet year? Will they overflow into the local streams? Will stormwater continue to be collected despite their being full? What size pumping and delivery system is needed to collect all the storm runoff? What happens if the power goes out? Once it is full it could potentially overflow even in small storms, increasing the concentration into the creek. What will be the effect on Garzas Creek water quality if these ponds flow into the creek? 189

9-20 The grazing plan will not have a significant effect on the local flood flows for the ten year or larger event. These events occur when the ground is saturated and you have significant overland flow. The depth of the soil, and intensity of the rainfall event are the governing factors here. Most of the rancho has shallow soils, and is susceptible to intense rainfall. 190

To properly mitigate this impact specific detention facilities will have to be constructed. These should be outlined and reviewed as part of this EIR 191

ADDITIONAL MITIGATION All larger homes (over 2000 sq. feet must construct a drainage system to capture all roof, driveway, patio and other improvement runoff. This storage facility could then provide private irrigation needs throughout the year. 192

9-22 What will be the impact to the local drainage's from the loss of 81 acres of watershed to the golf course stormwater collection facility? What is the likelihood that the diversion for natural runoff will get clogged an non operable? What state permits are required to collect and store such runoff? What is the likelihood of obtaining these permits? 193

Table 9-4 Why does project buildout have more nitrogen loading then the CDP which fully covers these two drainage's? 194

9-24 The suggested mitigation measure is just a plan. The EIR must spell out specific measures to be implemented to reduce the nitrogen, e.g. stop fertilizing the golf course, do not use treated waste water for irrigation. What would be the impacts to the environment if these are implemented. This is why the EIR must use the environmentally superior alternative as a mitigation throughout the document. 195

9-29 The Suggested mitigation measure must spell out specific measures and facilities and their locations in the EIR. Just recommending BMP is not adequate. The reader needs to know how feasible those practices will be. The point the EIR must make is the Golf Course will recycle the storm water, which will recycle the salts back into the land. With a lined golf course and recycled waters, the salts will buildup over time. Mitigation's are necessary, one being not to build the golf course. 196

9-30 This is a supposition that has not been specifically studied on the Rancho and should not be a part of the EIR. 197

The EIR must address the impact that the loss of wetlands will be to water quality. Where will the replacement wetlands be made? What are the alternatives to filling these wetlands? 197

FISHERIES

10-1 The description of the projects watershed should be included. There has been almost no urbanization, very little timber harvesting, and although locally significant, only concentrated areas of erosion and overgrazing. In other words the 20,000 acres is in far better shape then most of California. 198

10 -3 Wetted sections were also present in at least the San Clemente and San Jose Creeks during that period. 199

10-4 Las Garzas creek (especially the tributaries below Moore's Lake) also has a sedimentation/erosion problem. 200

10-6 At least at one time there were land locked resident trout in the upper portions of Las Garzas creek. 201

10-8 The EIR must discuss the impact of the quarry to the fisheries. What drainage will runoff go into? The EIR should include the additional mitigation of individual lot detention pond mention previously. 202

10-9 The EIR must locate on a map where the proposed 33 acres of new riparian habitat will be. 203

10-10 These three mitigation's will not protect the fisheries. The wells exist, they will be pumped and the creeks will dry. Supplemental water is not a reliable mitigation. The EIR must suggest lower pumping rates associated with the no golf course alternative. 204

The Impact from turbidity does not include runoff from roads away from creeks. Long Ridge road will produce significant turbidity as project related runoff travels down the slopes of the mountain. The EIR must address this impact. 205

BIOLOGICAL RESOURCES

The EIR fails to address any impacts that a new development will have in a undisturbed area. What will the human/animal relations be? What happens to the Mountain lions when the eat a homeowners dog? (This has happened on the rancho before.) What will the deer do to homeowners gardens? How will the ground squirrels be kept off the golf course? what will be the resulting effect to Golden Eagles? How will the coyotes respond to the scattered development? What about the Black Bears that are moving into the region? What about Rattle Snakes? There is a significant Tarantula migration each year, will more 206

roads and traffic effect their movement? All these animals will be effected by the project and the EIR must address this impact. 206

11-1 For this application only 9,400 acres of non contiguous openspace will supposedly be preserved permanently. This is being phased over 20+ years. The remaining 5,800 acres will only be contractual easements. Contracts can be changed. The EIR must mandate that all the preserve be dedicated in phase one. The EIR must further recommend that all the preserve must be 100% owned by the independent conservancy. Currently in Carmel valley a 400 acre scenic easement was sold or exchanged by the Big Sur Land Trust to Clint Eastwood. This land is now slated for 20 units of development. The EIR must state that scenic easements are not adequate protection, and offer alternatives. 207

11-3 Is heterogeneous the right word for describing the fog? The last paragraph is confusing to the reader. Is the EIR referring to the current habitat found on the rancho, or after the "Preserve" is implemented? Such questions are common when a developments name is manipulated to mean preserve. 208

11-4 It would be helpful for the reader in determining the projects impacts to the listed communities if the EIR would state how many acres of each community will be effected as we read their individual descriptions. Table 11-4 is a good summary but 37 pages too late. 209

11-10 Somewhere and I apologize for not remembering my source, I remember from reviewing a previous report that the rancho contains the largest undisturbed acreage of Coastal Prairie in the State. The EIR needs to comment on its significance. 210

11-11 This would be an appropriate place for the EIR to comment on San Clemente Creek's redwood community which is the largest most southerly inland grove in the World. 211

11-12 What about evergreen forests distribution from Monterey County south? 212

11-16 The "small 3 acre stand of Ponderosa Pine" is very significant because it contains a Golden Eagle nest. 213

Figure 11-3 is confusing to the reader and must be corrected. There is no San Clemente Road. There is an officially named Dormody Road (County Ordinance 3579) following that alignment. The EIR must refer to this name throughout the report and all printed maps. 214

The EIR needs one more map in this section which overlays all the development onto the wetlands. 215

11-27 The Rancho San Carlos has many California Horned Lizards. The region of Long Ridge is full of them and getting more. The EIR must consider the accuracy of the 216

biologic surveys when such a common species is not observed. What about something truly rare? | 216

The Southwestern Pond Turtle will be impacted by this development. They are the shyest species I have ever observed. Houses equals kids, creeks equals playgrounds. The turtles will not be comfortable hanging around people and will move. The EIR must recognize that habitat will be lost. | 217

11-28 There are many houses and roads that will be built in the Kites primary habitat (Pinyon Peak and Robinson Canyon road). The EIR must acknowledge that they will be significantly impacted by this project. | 218

11-29 There will be hundreds of acres of prime Eagle habitat lost. The 336 acres of Golf course is just one example. The EIR must address this impact with more seriousness. | 219

A summary of comments to Table 11-3 is, that it is ridiculous. The EIR has hardly an impact associated with the development effecting these animals. The Fact is that this project, with its scattered development will have a dramatic effect on the animals. They will leave. You don't see this type of diversity in Carmel Valley? What developed area in California has such diversity? | 220

Table 11-4 all 336+ acres of the golf trail should be eliminated as eagle habitat, or do eagles know the proper setback etiquette? | 221

11-39 If there are fenced areas around or adjacent to the developed areas, will this further fragment the environment? | 222

11-42 Loss of Oak woodland is not mitigated to State Fish and Game Standards. | 223

11-43 The EIR needs to map were the 27 acres of new coastal prairie will be created. | 224

11-44 The EIR must include the potential loss of 80 acres of riparian community due to the lowering of the groundwater table. A required mitigation measure would be lowered pumping demand by not building the golf course. | 225

11-45 There is a significant loss of wetlands as a direct result of the golf course. The no golf course alternative should be the recommended alternative. EIR 87-013 specifically recommends these areas be placed in a openspace designation (5D-31, mitigation 5). | 226

11-50 The suggested mitigation measure for the loss of Eagle habitat must be the no Golf Course alternative, and place the San Clemente Flats in openspace. | 227

The EIR must get off this 18,000 acre preserve kick. It has scattered large estates throughout, and resides mostly in the steepest regions of the ranch. Many animals are territorial, they can not just move from a nice oak savanna to a steep chaparral sidehill. | 228

The loss of habitat is just that, a loss. There are no specifically located habitats being created with this project. It will result in a net loss of at least 2000 acres. The EIR must recognize this significant impact, And recommend specific mitigation measures to lower that total acreage. 229

11-53 As stated earlier you can not replace a 48 inch, 450 year old oak with five seedlings. The EIR must mitigate avoidance, and the No Golf Course alternative. 230

Figure 11-1 severely under represents the redwood community in the San Clemente Watershed. 231

AESTHETICS

12-2 Discusses viewer groups and their sensitivity. The EIR must acknowledge that Robinson Canyon road is a popular scenic drive. Local citizens purposely drive up the road for the piece and tranquillity. The undisturbed views are very important. The few residents who do live up the road are unbelievably aware of even the slightest change in the viewshed (e.g. the three employee units that have been built stick out like sore thumbs). The result being the views are extremely important. 232

12-5 The EIR must take into consideration Ridgline views from Dormody Road. Although this is a private road, more than one hundred families and their guests drive this road. The development proposes many lots (81, 82, 127, 128, 129, 106, 108, 109, 110, 118, 234, 238, 239, 240) which are ridgeline development. The County policies do allow consideration from private viewing areas. The EIR must consider these views for the sake of the 100 families who see them. Lots 80 and 81 are ridgeline which are visible from Robinson Canyon road . This impact must be addressed in the EIR. 233

12-7 The EIR must point out that the cabins nearest to the project are small and blend in with the views. From the air it would be difficult to locate many of the cabins. The Project is proposing a development which is significantly different then adjacent visual resources. The development has no limit to the size of any residence. The EIR must recommend an appropriate building size limit for this sensitive scenic area. 234

As stated before the local mountains go up to 5000 ft. There are not too many Douglas Fir trees in the area, Sycamores would be a better descriptive choice. The project site is known as the Rancho San Carlos. The Developers propose to change this historic name. 235

12-8 Robinson Canyon Road is used by the non permanent residents who own the cabins at white Rock and San Clemente Rancho. The EIR is confusing. Is Vasquez Trial a traditional trail or a dirt road connected to the rancho? Does the public have access to this trail? 236

12-13 The EIR must supplement the private views with information about the dozen or so private ranches that border the rancho. Jones, Dormody II, Culp 1,2,3, Selbecky, Vasquez, 237

Big Sur Land Trust, Fish, and I'm sure a few others. Portions of the proposed Long Ridge phase will be clearly visible from Sky Ranch region of the Cachagua, and other regions of Carmel Valley from the Village east. 237

The Views were objectively evaluated by whom? A person from the city, or the country? Remember aesthetics are a criticism based on taste. Some people like to look at Ansel Adams, other enjoy Robert Cameron. Both photograph nature, one is usually without human interference, the other is glorifying mans handy work on the environment. 238

12-24 Height limits should be reduced to 18 feet. This is plenty high for a single story low profile structure which is appropriate for this area. 239

12-25 The Clubhouse is clearly visible from Robinson Canyon road in the Winter when the Oaks have lost their leaves. This is a significant impact that must be addressed in the EIR. I do not believe "Flash" is a subdued earthtone. The EIR must comment on the roofing colors of the project. Many of the artist renderings of the project in the CDP show whitewashed Spanish type buildings. While white might be appropriate for this style of architecture, it will certainly make all buildings standout and reflect light. The EIR needs to comment on the color of the Ranch Center and the Lodges. 240

The EIR is mistaken when it assumes there will be no change to the viewshed from the development of the five employee housing units. They stand out like sore thumbs. The rancho has 20,000 acres to hide this type of housing. The EIR must acknowledge that the duplexes along a scenic road are not located in the least sensitive regions of the property. 241

12-18 The EIR is halfway there when requiring the Maintenance Center to move away from the County road. The best mitigation is to relocate the facility completely out of this field. It is a very scenic corridor. Setting the building back 300 feet will reduce the impact, but not eliminate it. 242

Figure 12-7b is ridiculous. It would take decades and lots of water to establish such a thick vegetation cover. Many of the plants to be used, like the buckeye, loose there leaves in the winter thus exposing the structure to full view. 243

12-21 The EIR is incorrect when it says the barns would have earth tone roofs. The CDP (Figure 2-40) shows red Tierra cota roofs, hardly subtle. Constructing 346,880 sq. ft of buildings and parking structures in the ranch center will have a permanent, dramatic visually degrading impact to the San Francisquito Flats. For the EIR to say anything else, is wrong. The EIR must require specific earth tones that are not indicated on the CDP. 244

Figure 12-8b Is dramatically wrong. Where is Vasquez and Pronghorn Roads? Where is the Sewer Treatment Plant? Where is the improved Rancho San Carlos Road? 245

12-24 The EIR needs to be assured that the other private parcels have complete views of the development. This will have a significant impact. The EIR forgets that the quarry will 246

one of the first things developed. There will be no time to establish enough vegetation to screen it. This will be a significant impact to the viewshed. 246

12-25 The views of the Golf Clubhouse are wide open during the winter. This year it was easy to pick out the location netting. The Golf course will dramatically change the undeveloped views along Robinson Canyon Road. There will be about 300,000 cu yds. of excavation associated with this project. This will also have an effect on the views as the local topography is changed. The EIR must recommend that the best way to avoid this impact is to not have the golf course, in accordance with environmentally superior alternative. 247

TRAFFIC

As a general comment the whole traffic chapter is confusing to follow. The main impacts of the project need to be summarized. These would include total traffic increase, where these cars go and the effects to the local roads. Where are specific improvements needed? 248

The EIR must fully analysis, give project use, and mitigate the three mile section of the substandard Robinson Canyon road. This section has many blind curves, and narrow widths (only 14 feet wide between Rancho San Carlos road and Dormody Road). What is the capacity of this section of the road? what specific improvements are being planned for this road? What are the alternatives to those improvements? The EIR is inadequate until it fully addresses the true impact this development will have on Robinson Canyon Road. This section of road has a speed limit of 55 miles per hour. what are the site distances required for the thirteen new or improved gated enterances to the County road? What will prevent traffic from continuing down this road to Carmel Valley, when it's the shorter, quicker route? Safety is not always a drivers first concern. 249

Figure 13-2 is incorrect. The Correct name for the third road named on the property is Dormody Road. This name is correctly cited in the document, but trying to find it on the map is difficult without the official name (ordinance 3579). 250

13-12 Robinson Canyon ranges from 12 to 22 feet wide. The bridges are from 9.5 to 16 feet wide, and non can handle two way traffic. 251

Figure 13-3 is incorrect see comments on Figure 13-2. 252

13-20 There have been numerous small accidents on Robinson Canyon road. Examples are fender-benders around blind curves, car/bicycle accidents, cars going off the cliffs in suicide attempts. Drunks running off the road is solo accidents and on and on. The average rate of accidents is probably four per year. 253

13-23 The EIR needs to point out as stated much earlier that Cal Trans is against any development which increases the traffic on Highway One. 254

Figure 13-5 is incorrect. See comments about Figure 13-2. 255

The EIR must go into the background of the expected traffic increases. The figures listed throughout are very low and need to be justified. The EIR assumes that the proposed commercial center will alleviate many traffic trips. This is not true. Lots 1 - 25 and 187 - 199 are much closer to Carmel valley then the ranch center. They will generate the same traffic counts as any local development. The EIR is inadequate until it develops new, more accurate traffic counts based on the realistic use. For example the hotel guests will drive to town often to dine in the world famous restaurants, golf, shop, and go to the aquarium. They are not much farther away (about 2 miles) from Carmel then Carmel Valley Ranch's hotel is. This hotel generates significant traffic to the local roads. The same will be true for The Rancho San Carlos. 256

13-28 The EIR must locate on a map where the narrow segments of Rancho San Carlos Road will be. How many sections will be narrowed? For how long of distance? How will this effect emergency access? Evacuations? 257

The EIR then must address and locate each exemption to county road standards that the project is proposing for the entire project. Locate all steep grades (over 15%). Locate all dead end roads over County length requirements. How will these exemptions effect emergency access? emergency evacuation? Winter (icy, wet, safety) conditions? How is snow removal going to be handled? What happens if roads slide-out and are impassable for extended periods of time? 258

13-29 The EIR is incorrect when it states that Rancho San Carlos Road as proposed will be a faster route to Carmel Valley. Robinson Canyon is shorter and can be driven faster then 35 miles per hour. The consultants Traffic Report almost doubles the true time it takes to travel Robinson Canyon Road. The EIR must suggest specific physical barriers to deter project traffic from using Robinson canyon Road as stated in resolution 93-115.Rural wooden bridges could be used at Vasquez and Pronghorn run intersections so there would not be any access to the County road. 259

As stated earlier the three mile segment that is proposed for use has many substandard segments. The EIR has not adequately studied this impact.

There is no existing San Clemente Road. Is the EIR referring to Dormody Road? Furthermore the development proposes to use Robinson Canyon road approximately one mile further south then this intersection. All the way to lots 99 and 100. The majority of the new roads/driveways/gates have no history of intersecting Robinson Canyon road. The EIR is supporting developers inaccuracies. The EIR does not address the historic use of the existing roads. It is one thing to have a four wheel drive dirt ranch road intersect the County road. It is quite another to have a 21 foot wide security entranced road that serves dozens of houses and a golf course. The EIR is misleading the public as to the impact the development will have on Robinson Canyon Road. It is an Inadequate document until it more fully discusses the impact and provides mitigation measures. 261

13-30 The Los Tulares development is only comparable to lots 230 to 254. Quail Meadows trip generation is comparable to lots 1 - 25 & 87 - 99. Carmel Valley Ranch trip generation is comparable to the ranch center. The EIR must acknowledge that these people are not going to live in isolation. 262

Table 13-10 I am a single person who works and lives on the neighboring ranch. I have gone to town everyday this week. I get mail delivery, parcel deliver, and many friends come to visit. I live much further way from town then any proposed homesite on the development. Why is the EIR justifying these low traffic projections? The employee units create less then one round trip per day. Won't they have kids who drive? Maybe a spouse will want to work in town? Won't they have friends and family visit? Won't they have deliveries? Want to go shopping? Go to the Doctor? This projection is a joke. 263

Many of the proposed estates will have caretakers. This is not a common use at Los Tulares. Won't these employees increase the traffic? or will they be prevented from going to town.

13-35 To contribute to a traffic fund is no longer acceptable to the community. The EIR must recommend specific improvements that the project should construct as their fair share to the Carmel Valley Road problem. 265

13-38 The project is not in compliance with Resolution 93-115. Adding almost 1200 vehicle trips per day that use some portion of this scenic road is a significant impact that the EIR fails to address, (150 units times 6.7 trips plus the golf course, employee units, and maintenance facility are all to the east of or will use the County road). Mitigation measures are needed. One is to not build the golf course with access to Robinson Canyon road. Another is to prevent access by building grade separated intersections on ranch roads which cross the County road. A third is to cluster more homes to the west of Robinson canyon road. 266

13-39 The EIR states that Rancho San Carlos road will still have numerous blind turns. This makes it comparable to Robinson Canyon road. People will not choose one road over the other if they are both not safe. Rancho San Carlos road was to be improved to be completely safe was it not? The road (steep grades, tight turning radius's, narrowness) does not comply with county standards for a road that handles 2000+ vehicle trips per day. 267

13-40 the EIR must identify all driveways that don't comply with CDF standards and suggest alternative site locations that do conform. The EIR should provide a diagram of what the improved bridge across the Carmel River, it is hard to visualize the pedestrian portion. 268

13-41 The Suggested additional mitigation measure of contributing to a fund for intersection improvement is unacceptable. The improvements must be built as pert of this 269

project. There is strong community resistance to signals. The EIR needs to recommend the underpass as the preferred alternative. 269

13-43 The proposed mitigation measures do not reduce the 1200 vehicle trips per day on Robinson Canyon Road. 270

13-44 The EIR fails to address the cumulative traffic impacts when the Los Padres Dam is concurrently being constructed. 271

13-46. The Impacts of 1200 vehicle trips per day on portions of Robinson Canyon road are not significantly mitigated. The EIR is inadequate until it does this. What about the impacts of construction traffic on Robinson Canyon Road? 272

What will the impact to local public roads be from heavy truck construction traffic? Even if a aggregate quarry is located on site, asphalt fines, oil and sand will have to be trucked to the site. How will this impact Carmel Valley Road? The truckers will still have to drive their rigs up to the site each day from their homes in Salinas and Watsonville. 273

CLIMATE AND AIR QUALITY

14-1 The EIR needs to describe the air sub-basin that exists on the rancho in the San Francisquito Flats area, especially in the winter. The EIR should also discuss the impact of low fog levels over some on the passes on the development during the Summer. This will have an impact on traffic safety. The EIR must discuss the occasional snows storms that the property has, how will the steep road grades add to this problem? How will the roads be constructed to avoid the common icing problem that Robinson canyon has during the winter? 274

14-11 There is no asphalt plant anymore in Monterey and never was one in Marina. 275

14-15 The applicants suggested mitigation's give an option to have low numbers of fireplaces or EPA approved stoves. The EIR must say that all fireplaces meet EPA criteria.(EIR 87-013, 5I-16) 276

NOISE

15-4 Although not nearly as heavily used as the Sportsmen Club, San Clemente Rancho and White Rock have target ranges which occasionally create gun noise that could be heard on the development. 277

15-11 The EIR states that the Quarry is within 2000 to 4000ft. of these lots. When looking at a topo map, this places the quarry closer to many other lots. The EIR must provide an accurate site map which shows proposed lots, access and the like. 278

15-15 The Impact is not adequately addressed. As a result of the project, surrounding land owners will loose much of the tranquillity that currently exists. This is an unmitigable impact. There will no longer just be the sound of the wind, but barking dogs, cars, gas engines and everything else associated with progress and change. 279

The Stated impact to animals is significant. this will reduce the amount of habitat available. The EIR must address this impact as significant and unmitigable. 280

15-16 Another occasional noise that the new residents must know about is the occasional small plane which lands at the San Clemente Airfield. The property owners along Long Ridge should be notified about the potential sound impact. 281

PUBLIC SERVICES

16-5 The EIR should give an estimated maximum response time to the furthest regions of the ranch. Is it over 30 minutes? 282

16-8 If the project is not as successful in generating CSA fees, will outside sources of revenue be needed to supplement any shortfalls? Can the County loan money to a CSA? 283

16-13 3,300 acre feet of water from the Los Padres Dam has not been specifically allocated. The Rancho San Carlos does have private wells in the Carmel Valley Aquifer. Could these wells be used at some future date to supply water to the development if the proposed groundwater source proves to be inadequate? 284

16-14 Is the EIR stating that retired persons produce less garbage then working people? What about caretakers when the homes are unoccupied? 285

16-15 I sure glad the EIR did not govern my school district. I enjoyed long summer vacations. Was CUSD consulted prior to drafting these mitigation's? 286

There will be a significant loss of police protection to the Valley every time an officer is called to the development. 287

16-16 The development asks for exemptions to ordnance 3900(3600). The exemptions are allowed only after no other reasonable alternative sites are located for the individual lots. The EIR must point out that this procedure was not followed for this development. There are many locations closer to the ranch center where lots 239-254 could be located. these are all far away from the main development and require long dead end roads to be constructed. This is a significant impact that the EIR must address. 288

16-17 I did not think there were any structures to protect in wildlands? Will the fire station have full time staff? what if the volunteers are 15 minutes away from the station? Total response time would then be 30 minutes. 289

16-18 The water demand analysis did not consider individual swimming pools that are suggested here. Will they be allowed? what will be their water demand? 290

16-19 Can the small wells located nearest to phase one supply the needed storage and fire flow requirements? It would take 88 gpm to achieve this demand. 291

Can the CSA annex new properties into it's service area? What if they are not part of the development? 292

CULTURAL RESOURCES

17-18 The EIR must recommend avoidance of this site as the best mitigation measure as recommended with the least damaging alternative of the project, No Golf Course. 293

SOCIAL EFFECTS

18-5 The EIR must acknowledge that the nearby cabin areas are used primarily by local middle-class working families. There will be some social friction between the development and the neighbors as the project is built. Construction inconveniences, the loss of the pristine habitat and viewsheds will focus this friction. The EIR can not mitigate this, it will be a unavoidable result of approval. 294

CUMULATIVE IMPACTS

Somewhere in this chapter the EIR must address the cumulative impacts of construction of this project at the same time of the construction of the New Los Padres Dam. 295

296

Figure 19-1 is incorrect. See above discussion of Figure13-2.

19-9 The EIR must recognize that dedicating what already exists does not compensate for a loss of 2000 acres of land. If the developer was purchasing 2000 acres of developed Carmel Valley lands, tearing down all the houses and replanting oak trees, that would be adequate compensation. The preserve is just another name for the rancho that already exists. The Land is the same, no roads are going to be eliminated, quite the contrary larger new roads will be built all through the preserve. It is a bogus proposition, pure salesmanship. The EIR is at fault and inadequate not pointing out the many misconceptions about the preserve. 297

ALTERNATIVES

20-2 the EIR leaves out the word Clustering on the least environmentally sensitive lands, as required by resolution 93-115. 298

20-4 The EIR must consider an alternative which reduces the number of lots, for example total build out is 150 units. At 1 million dollars a piece this would double the developers 299

money, be less expensive to build, and have significantly lower impacts to water, traffic and the environment. 299

The EIR must study as an alternative the amount of development which could be sustained by the current proven water supply. The developers propose to drill 50 more wells, it is unknown what the impacts will be from their construction. The EIR has a good idea of the impacts from what has been drilled. An alternative approximately 50% less (250 units), which lives within the proven water supply is necessary.

20-5 (1) The EIR can only look at 125 lots of record. further subdivision is speculative and unknown without details studying each lot. Any further subdivision would have to comply with most of the conditions placed on this project. Many lots could not be sold because of no access. Many more lots could not be further subdivided <u>because of slope constraints.</u> There would not be a massive road way extenuation because a special use permit to allow this development would probably not be allowed. The EIR fails to think that one owner, similar to the Oppenhiemers or Pacific Union for that matter would purchase the property for a large private rancho, There still are billionaires in this world. <u>This alternative would have significantly less environmental impact then the proposed project.</u> 300

(2) Currently this project is proposing to have clusters of homes that average 4 acres in size (lots 32-41) This would accomplish the clustering of the proposed alternative on 1700 acres of land. This includes a 1116.9 acre open space component and 700 acres of wildlands. This sounds great to me. Why does the EIR not like this alternative? The protection of openspace does not cost a lot once the property is owned. The land usually takes care of itself for free. The US government operates millions of acres of wilderness lands for pennies an acre. Why does this land need so much money? A Sewer Treatment plant has to be built anyway. It will not significantly reduce traffic flow to and from the property. This alternative closely approximates the alternative which is mandated by resolution 93-115 and must be evaluated by the EIR. 301

(3) The Ranch Center is not a viable alternative to town. This commercial area will have little impact to the overall traffic impacts. How many Pebble Beach residents use the small commercial facility near the Pebble Beach Lodge? Does this reduce off site trips, or just a profit oriented convenience area? The EIR should include this alternative as part of the no lodge alternative. 302

(4) This is a insignificant reduction to be studied. The current lodge has 38 separate cottages (2-35 CDP) plus the main building. Is this an actual increase in use alternative? 303

(7) Why would access to the Golf Course on the Mesa, have to be from Robinson Canyon Road? The Potrero site is a suitable site. The developers at one point had three golf courses associated with this project. These sites still exist. What is the likelihood that over time the developer will apply for one of these other sites? 304

20-9 There would be a significant improvement in the viewshed without the lodge. About 82 acres of visually sensitive habitat would be retained. This is a significant improvement over the projects proposed 133,550 sq. ft. of buildings. 305

20-12 Why can't the present grazing practices simply be changed to improve the existing erosion conditions? Don't the owners care for the land? Does well managed grazing cause more environmental impacts then a housing development? If this is true the State is a lot better off environmentally today then it was one hundred years ago. But the main point is if the cattle grazing plan is so beneficial, it could and should still be implemented in one form or another no matter what happens to the development. 306

20-14 There is no way the developer could subdivide the lots of records and comply with resolution 93-115. this would prohibit the clustering on the least sensitive lands portion. The density will be 160 acres per unit. Thus there is no way to obtain a 522 lot total9 it would be impossible to ever go over 500 as part of the resolution) 307

If full subdivision was permitted and 265 units were possible this would have a significantly lower environmental impact. But the fact remains that the EIR must use the 125 lot figure for this discussion. Impacts on pages 20-14 through16 must be adjusted to reflect this number. The EIR must discuss the feasibility of developing all 125 lots. many are inaccessible and would probably be sold as part of another lot, further reducing environmental impacts. Before the EIR assumes anything the lot locations are known, a clearly legible map must be provided showing all legally certified lots of record. 308

20-17 This "reduced lodge" alternative has more individual units then the project, and does not belong in this chapter. 309

20-20 This alternative would result in a significantly improved viewshed. The blatant waste of water and 125+ acres of artificial landscaping would be illuminated. This would dramatically improve the aesthetics of the project. This Alternative would also dramatically reduce the need to drill more wells, eliminating a significant unknown to the project. 310

There would also be a corresponding improvement in the social effects because this truly wouldn't be the typical development with a golf course. This would result in less neighbor animosity. 311

This alternative must be identified in this chapter and throughout the document where appropriate as the environmentally superior alternative. 312

Appendix G must be updated to show the additional stormwater storage ponds associated with the golf course. 313

Appendix H. A clearer map must be provided which just shows the roads and the areas that cross 30% slopes. A cumulative Summary should be included to show the total impact. 314

Appendix I -3 mistakenly shows the name of the road crossing the golf Course. The site plan must identify the road as Dormody Road to avoid confusion on the location of the course. 315

Thank you for the opportunity to comment on this project. Although it is long winded, I hope this reply offers alternatives and information that is helpful to the overall process.

Sincerely,

Bruce Dormody

Response to Comments from Bruce Dormody (July 13, 1995)

1. Refer to the response to Comment 12 from David Dilworth (July 1-7, 1995) regarding the intent of summaries in EIRs. The EIR concludes that there is a safe water yield for the proposed project.

2. The additional information has been included in the final EIR. Also, refer to the response to Comment 1 from Brian Finegan regarding the environmentally superior alternative.

3. Surrounding land uses are described in Chapter 3, "Land Use", of the EIR.

4. The phasing is described in the text on page 2-13 in Chapter 2, "Project Description", of the draft EIR. Also, refer to the response to Comment 4 from Carmel Valley Property Owners.

5. Based on a review of the environmental constraints at Rancho San Carlos, the proposed project is clustered in areas that pose the fewest environmental constraints. That should not be construed to mean that the project avoids all important habitats or constraints or would not result in significant impacts without mitigation. The EIR accurately depicts the environmental impacts of the project. The application contained a resources constraints analysis that provided the requested map. In summary, the environmental constraints mapping included overlays that mapped watersheds, habitat (riparian, wetlands, redwoods, and others), slope, cultural resources, sensitive species, high fire hazards, flood hazards, viewsheds, and geologic and seismic hazards. The EIR then recommended additional mitigation measures to reduce or avoid the noted significant impacts.

6. The applicant disagrees with this comment and states that the planning for the project was in fact based on numerous technical studies.

7. The consistency assessment of the project with Board Resolution No. 93-115 is provided in Table 3-1 in Chapter 3, "Land Use", of the EIR. The EIR concludes that the proposed project is consistent with the resolution.

8. The limited improvements proposed for the open space areas of the preserve include improved trails, roads, driveways, septic systems, wells or well monitoring stations, and underground utilities. These types of uses are allowed under the Title 21 open space category.

   The 2,000 acres of development cited in the EIR covers built and improved areas, including structures, roads, water tanks, and the borrow site. It is unlikely that all of the building envelopes will be completely built out; thus, the 2,000 acres of development is really an overestimation of the amount of land that would be developed under the proposed project.

9. The conditional use permit for development on slopes over 30% is identified on page 2-17 of the draft EIR.

10. These 16 acres are leased by the Carmel Valley Racquet & Health Club. See Figure 3-2 for the location of this facility.

11. The draft covenants, conditions, and restrictions (CC&Rs) contemplate that a small specific number of the larger parcels may be suitable for continued agricultural use. Refer to the response to Comment 3 from Monterey County Department of Health regarding viticulture. Subsection D of Article III, Section 1 of the CC&Rs, provides spaces to identify those suitable parcels where continued grazing would be allowed in keeping with the Resources Management Plan and the Cattle Grazing Plan. Subsection J of Article III, Section 1 of these CC&Rs, provides spaces to identify those suitable parcels on which raising of horses or other large animals would be allowed. Except for those few identified parcels, the keeping, maintenance, raising, breeding of horses, cattle, and other large or hoofed animals for private or commercial purposes are prohibited.

    Stables would be allowed only on those lots that might be identified for the keeping of large animals. Fencing of homelands is allowed subject to the regulations contained in the draft CC&Rs, which provide that private fences may not extend beyond the boundary of the building envelope and shall not compromise the basic dominance of the natural landscape. Fencing of grazing area is allowed subject to the restrictions contained in Section 3.3.6.2 of the Resource Management Plan and Sections 1.3 and 2.2.4 of the Cattle Grazing Plan.

12. This correction has been made in the final EIR.

13. This correction has been made in the final EIR.

14. The County Board of Supervisors will consider this recommendation when it takes action on the proposed project.

15. The EIR is not required to evaluate "pros and cons" of a project; rather, it evaluates the environmental impacts of a proposed project. Refer to the response to Comment 4 from Carmel Valley Property Owners regarding dedication of open space.

16. The EIR evaluates the proposed project and does not speculate on unforeseeable impacts.

17. The term "limited" was intended to suggest that not a major portion of the project would be developed on slopes over 30%. The word "limited", however, has been deleted to reflect the concerns of this comment.

18. Appendix G contains an updated site plan of the wastewater treatment plant that shows topography. Peripheral facilities to the plant include a 3-day emergency raw sewage storage facility and a 120-day treated water storage pond. The treatment system contains a fully

automated three-pass trickling filter system with rapid sand filters, chlorination, full redundancy, odor control, and standby power. Consequently, odor is not expected to be a problem for the proposed project. Also, refer to the impact analysis in Chapter 14, "Climate and Air Quality". The three new ponds (actually, it will be four) that are mentioned in the comment probably refer to the irrigation system proposed for the golf trail where water from the wastewater treatment plant, recycled golf trail irrigation water and rainfall, and well water will be collected, mixed, and stored in ponds capable of holding approximately 58 af adjacent to the golf trail. The wetland and visual impacts of the golf trail are described in Chapter 11, "Biological Resources", and Chapter 12, "Aesthetics", respectively, in the EIR. The proposed ponds would not affect wetlands. Dense riparian vegetation exists on the east side of the road in the area of the proposed storage ponds, which would block views of the storage ponds from views along Robinson Canyon Road.

19. The forest management plan involved a site-by-site review of all proposed construction areas. All trees proposed to be removed were measured and identified throughout the project area. The siting of homelands, drives, and roadways involved minimizing the number of trees that would have to be removed.

20. The description of development on slopes in excess of 30% is accurate. A description of all cuts to be made for the roads is beyond the scope of the EIR and is not required. It is likely that roads will be laid out to avoid large cuts wherever possible. All cuts will be revegetated as specified on pages 3-102 and 3-103 of the Resource Management Plan.

21. The question regarding feasibility is one directly related to economics of the golf trail. CEQA does not require such information to be included in the EIR. The additional 50 acres of mown grass will not receive irrigation water. This area will be mowed as often as necessary and would not normally be subject to fertilizers, weeding, or animal control. This area would not be lined because this area would not be irrigated.

22. The EIR evaluates the loss of landmark trees in Chapter 11, "Biological Resources", of the EIR. The Monterey County Board of Supervisors will consider the comment regarding the mitigation when it takes action on the project. Also, refer to the response to Comment 19 above. All surface runoff from the land surrounding the golf trail would be intercepted before it reaches the trail. This may result in some change to the established soil moisture regimes of the trees on the trail. However, irrigation for the greens and fairways will likely offset this impact. A greater concern is grading changes that could cause ponding of water around the base of trees, which will encourage the development of root rot if allowed to remain. Positive drainage away from the base of the tree must be provided either through drains or sloping the ground away from the base of the tree. These requirements have been included in the design of the golf trail.

23. The rural location and limited public access will result in less demand for the golf trail and therefore require less parking than at a similar use located on a public street. In addition, the following project features will serve to reduce the demand for parking:

- All employees will be required to park at the maintenance facility and ride a shuttle to the clubhouse (no employee parking at the clubhouse).

- Guests at the hacienda and lodge will be encouraged to ride a shuttle to the golf trail.

Special events beyond the capacity of the facility are not anticipated. The Monterey County Board of Supervisors may consider such a limitation, however, when it takes action on the proposed project.

24. The CVMP land use designations have not been changed. The property owner could sell these lands but has no intention of doing so. It is purely speculative what a future developer would do with the property if the lands were sold.

25. This information has been included in the final EIR.

26. The Monterey County Board of Supervisors would impose certain conditions of approval on the ownership and occupancy of the affordable housing proposed by the project to ensure that it is occupied exclusively by individuals meeting the criterion of low income.

27. Refer to the response to Comment 11 above. In summary, a few suitable lots could allow for continued grazing; such areas would be fenced to prevent the occurrences mentioned in this comment.

28. Refer to the response to Comment 5 above.

29. Refer to the response to Comment 7 above.

30. The impacts on fisheries of the proposed project's water use was evaluated in Chapter 10, "Fisheries", of the EIR. With the mitigation measures recommended in this EIR, the proposed project is not expected to significantly affect the water needs of wildlife because there would be minimal impact on streams and wetlands, the primary sources of drinking water for animals. Those ponds will be fenced.

31. Only the tree and green areas of the golf trail will be lined. Other areas will be contoured to collect surface runoff so that it can be treated and reapplied to the golf trail. Less than 1% of the area will be paved; consequently, recharge will not be appreciably reduced.

32. The proposed project is consistent with these policies because the project includes measures for erosion control, and applications for use permits that are required for development on slopes in excess of 30% were included in the combined development permit application for the Santa Lucia Preserve. Also refer to the response to Comment 8 above.

33. Figure 9-1 in Chapter 9, "Runoff, Flooding, and Water Quality", in the EIR delineates the watersheds, identifies streams and other water bodies, and identifies floodplains. Attenuation of peak floodflows is required by the county and Monterey County Water Resources Agency (page 9-7 of the draft EIR). The project applicant has retained an engineering firm to properly size detention structures to meet all county and local requirements (page 9-17 of the draft EIR). Erosion control BMPs include energy dissipaters at culvert outlets (page 7-6 of the draft EIR).

34. As described on page 9-17 of the draft EIR, culverts under secondary roads are only designed to pass 10- to 25-year floodflows. Both the January and March 1995 storms resulted in total precipitation that exceeded the theoretical 100-year 24-hour precipitation. Consequently, it is likely that much of the local storm drain infrastructure would be overwhelmed and localized flooding would occur, which is considered acceptable by the county. Large "over built" bridges require more extensive clearing of adjacent riparian vegetation and the costs rise with complexity of the structure. Such bridges are generally not necessary if there is an alternative route.

35. In this context, "traditional wildlife corridors" are defined to mean habitually used pathways for directional, long-distance wildlife movements. Resident wildlife, such as deer, certainly use traditional trails for making local movements. Such movements of nonmigratory species, however, typically occur along many different trails and are not used on a predictable, seasonal basis. Wildlife experts consulted for this project concluded that the large and carefully situated open space areas between home site clusters would be sufficient even for secretive and wide-ranging species like mountain lions. Further discussion of this colander development approach and its potential effects on wildlife movements is provided in the response to Comment 1 from CNPS.

36. It is true that the lots proposed for this project are large, but the areas proposed for home site construction occupy only a small fraction of the lots. GIS-based calculations indicate that about 90% of the land area in developed portions of the property will remain in permanent open space and be available for use by wildlife.

37. The proposed project is consistent with the policies listed because the project applicant has avoided wetland resources to the extent feasible and will mitigate the potential loss of wetlands as summarized on pages 3-16 and 3-17 in Chapter 3, "Land Use", of the draft EIR.

38. The proposed project includes measures for erosion control, and applications for use permits that are required for development on slopes in excess of 30% were included in the combined development permit application for the Santa Lucia Preserve. Additionally, landsliding is not a problem associated with the removal of chaparral habitat. Surface erosion is a problem associated with removal of chaparral habitat and mitigation measures to reduce surface erosion are included in the EIR.

39. Proposed development has height limits to avoid potential visual impacts for views from Robinson Canyon Road. Structures will be screened by vegetation and located to minimize their visibility. Proposed changes in views are consistent with county policies for protecting visual resources. The proposed lots are sited to comply with county policies, avoid sensitive ridgelines, and not create a substantially adverse visual impact when viewed from a common public viewing area.

40. Potential visual impacts associated with the borrow site are addressed on page 12-24 in Chapter 12, "Aesthetics", of the draft EIR.

Proposed development is subject to height limits that avoid the potential for visual impact on the area. Structures may be visible but will be screened by vegetation and located to minimize visibility of structures. Proposed changes in views are consistent with county policies for protecting visual resources.

41. The Monterey County Planning and Building Inspection Department will make a recommendation to the Monterey Board of Supervisors on the consistency of the project with applicable policies. The board will then consider the recommendations, findings, public testimony, and EIR at public hearings.

42. The proposed project is consistent with this policy because use permits are included in the project to develop roads on slopes in excess of 30%, and the proposed project conforms with the Public Resources Code 4291, the Uniform Fire Code, and other current standards of the county and California Department of Forestry and Fire Protection for all new and upgraded roads and driveways. The Santa Lucia Preserve Fire Safety Management Plan includes mitigation for the cul-de-sac road at Long Ridge Trail. Attempting to add a loop road system to this cul-de-sac would be extremely difficult because the difficult topography would necessitate massive quantities of grading and tree removal. To mitigate the effect of this cul-de-sac, fire safety zones have been created adjacent to the road at approximately 0.5-mile intervals.

43/44. The EIR preparers agree with the commenter that construction of roads and driveways will tend to cause an increase in runoff. However, site-specific stormwater drainage and erosion control improvements will later be designed for specific aspects of the project. Such improvements could include outsloping roads and driveways (thereby eliminating the need for roadside drainage ditches and culverts), using pervious pavement (thereby reducing runoff), constructing stormwater detention basins, and other measures. The Monterey County Water Resource Agency will review and approve plans for stormwater drainage and erosion control and sediment control measures.

45. The EIR adequately describes landsliding, debris flow, and other hazards at the site (refer to Chapter 6, "Geology and Minerals"). The recommendations of the third-party review by Weber, Hayes & Associates will be reflected in revisions to the VTM.

46. Refer to the response to Comment 5 above.

47. Refer to the response to Comment 5 above.

48. The proposed project is consistent with this policy because measures are included in the project to reduce and prevent aesthetic impacts. Refer to Chapter 12, "Aesthetics", for a discussion of visual resources.

49. Refer to the response to Comment 8 from the Monterey Peninsula Water Management District regarding auxiliary units.

50. Refer to the response to Comment 5 from the Sierra Club, Ventana Chapter.

51. The significance criteria described on pages 11-39 and 11-40 in Chapter 11, "Biological Resources", of the draft EIR are adequate for evaluating the significance of impacts on oak savannas under CEQA.

52. Impacts on wetlands, including those in the footprint of the proposed golf course, are discussed on page 11-45 of the draft EIR. The acreage of wetlands that would be affected by construction of the golf course is shown in Table 11-4.

53. The Monterey County Planning and Building Inspection Department will make a recommendation to the Monterey County Board of Supervisors on the consistency of the project with applicable policies. The board will then consider the recommendation, findings, public testimony, and EIR at public hearings.

54. As stated in the Comprehensive Hydrological Study,

> To date, 51 wells have been constructed throughout the ranch to depths which range from 200 to 1,500 feet (one well was constructed to 2,135 feet). The wells are completed in all geologic formations beneath the ranch (granite, sandstone, etc.), and have been tested at capacities up to 50 gallons per minute typically for durations of 24 to 72 hours. Five of the wells have been tested for 30 days to ascertain their dependability, to verify test results from other wells, and to investigate impacts of pumping. Based on the exploration and testing efforts, it is concluded that groundwater can be developed for planned uses from all geologic units beneath the ranch; it is further concluded that pumping capacities from individual wells will typically be in the range of three to 50 gpm.

Therefore, it can be safely stated that there will be access to a sufficient volume of water to satisfy the demand.

55. A fiscal analysis and a plan for providing services are components required for the formation of a County Service Area (CSA); however, an EIR does not have to conduct a fiscal analysis to recommend a CSA. CSAs have been used successfully for many years as a means to provide and finance public services in unincorporated areas. According to the 1994 Inventory of Local Agencies (Monterey County LAFCO, June 1994), Monterey County presently operates 43 CSAs dating back as far as 1959. A CSA generates its funding by levying a "special tax" on all real properties within the CSA. This special tax is levied each year by the board of supervisors based on the budget presented by the Director of Public Works.

Because local government fiscal years begin on July 1 and the first increment of property taxes is not collected until December, it is not uncommon for special districts to run out of funds during the first 5 months of their fiscal year. The board of supervisors frequently advances funds to such districts over this time by what are commonly called "dry-period loans". Government Code 25210.9a provides for both "dry-period loans" and a "revolving fund" to finance activities of CSAs. In both cases, the CSA must reimburse the county from its special tax proceeds, with interest at the current rate.

56. The proposed project, in addition to other approved and proposed projects in the area, contributes to the addition of traffic volumes on Highway 1 and Carmel Valley Road. A series of improvements is planned or being studied for these roads. Several of the improvements planned for Highway 1 and Carmel Valley Road are listed on pages 13-20 and 13-22 in Chapter 13, "Traffic", of the draft EIR. In some cases, it is more beneficial to pool the developer contributions together and apply them where improvements are needed. Therefore, Monterey County has adopted a fee ordinance, which establishes development fees to fund mitigation measures. The improvements that will be funded by the applicant's contribution will be determined by Monterey County Department of Public Works.

57. This comment does not pertain to the proposed project's consistency with the Monterey County General Plan policies on commercial land use.

58. The assessment of consistency for this policy states that employment opportunities are available in Carmel Valley and Monterey. The proposed project does not constitute leapfrog development.

59. This employee-generated traffic would only use Robinson Canyon Road as an east-west link, and would be limited to segments that have adequate width, gradient, and sight distance.

60. Many of the roads within the project site, including Rancho San Carlos Road, cannot be widened enough to accommodate bikeways and walkways without significant impacts on existing trees or other landscape features. Therefore, these measures are not recommended in the EIR.

61. These facilities have been designed to encourage use of alternative modes of transportation to driving single-occupant vehicles, which is consistent with Policy 1.1.4.

62. The 53 housing units designated for employee housing are being included in the project to comply with the Monterey County Inclusionary Housing Ordinance and would be subject to conditions and restrictions set forth in that ordinance. According to the Inclusionary Housing Ordinance, deed restrictions shall be placed on inclusionary housing units by the developer at the time of recordation of subdivision maps or prior to the issuance of building permits. Deed restrictions shall be in effect for a 30-year period and shall be renewed for 30 years each time an inclusionary unit is purchased. The initial maximum sales price, to be determined by the County Director of the Planning and Building Inspection Department, shall be based on a four-person household earning 100% of the Monterey County median income, as defined by the U.S. Department of Housing and Urban Development. Upon resale of the unit by the owner, the inclusionary unit shall be resold to a low- (i.e., a household with an annual income less than 80% of the county median income) or moderate- (i.e., a household with an annual income of 80% to 120% of the county median income) income household only. These restrictions should ensure that all onsite employee housing, including those with views of the golf course, would be occupied in the future by low- or moderate-income households and would not be available to high-income individuals or households.

63. Employment estimates were developed based on employment estimates prepared by the project applicant and on average employee densities for various commercial and industrial uses prepared by the Association of Bay Area Governments (ABAG). Based on comments received on the draft EIR, the employment estimates have been reviewed and slightly revised. These revisions have been incorporated into Table 5-1 in Chapter 5, "Economics", of the final EIR, Volume II.

64. Employment associated with property caretakers who could reside on individual estates was not considered within the draft EIR. The Monterey County Zoning Ordinance would allow caretaker units to be constructed on estates with issuance of discretionary permits by Monterey County. The present project application does not include entitlements for auxiliary caretaker units; however, units may be eventually constructed on individual estates, generating onsite employment associated with caretaker activities. Based on an assessment prepared by the project applicant, an estimated 50% of the market rate housing units, or 149 units, would likely include auxiliary units occupied by caretakers or relatives of the primary owner. Based on this estimate, an estimated 149 additional onsite jobs could be generated by employment provided by estate owners. Because onsite housing would be provided for these employees, this additional employment would have no adverse effect on the local or regional jobs/housing balance.

65. No mitigation measures would be needed to ensure that only low- to moderate-income households reside in inclusionary housing units because the Inclusionary Housing Ordinance restricts ownership of these units to low- to moderate-income households. Refer to the response to Comment 62 above.

66. The EIR preparers do not claim that the project generates one round trip per day. As shown in Table 13-10 in Chapter 13, "Traffic", of the EIR, the project would generate 2,267 daily trips per day at buildout.

67. Under the provisions of CEQA, the fiscal effects of a proposed project need not be discussed within an EIR. The fiscal information included in the draft EIR was included for information purposes only and does not include an assessment of the net fiscal effects of the proposed project.

68. The comment correctly points out that employment for certain land uses may have been underestimated through the use of ABAG's average employee density factors and through the omission of minor employment-generating land uses (i.e., equestrian facilities). Table 5-1 and the text of Chapter 4, "Population and Housing", and Chapter 5, "Economics", have been revised to more realistically describe employment potentially generated by the proposed project. The commenter should acknowledge, however, that onsite employment actually generated by operation of project facilities is unknown at this time and may vary from the estimates presented in the EIR. The analysis in the EIR has attempted to produce reasonable estimates of direct and secondary employment potentially generated by the proposed project based on employment-generating uses included in the project application.

As the comment suggests, increased quarry operations could generate a small amount of additional employment; however, according to the project applicant, employees currently employed by the existing dimension stone quarry would likely absorb the intermittent additional work generated by the project at the borrow site and dimension stone quarry. Both sites probably would not be in operation at the same time. Operation of the temporary asphalt plant that would be operated for an estimated 4 months during the construction of Rancho San Carlos Road would likely generate new employment during that 4-month period.

As discussed in the response to Comment 63 above, an estimated 149 additional full-time jobs could be directly generated by the employment of gardeners, maids, cooks, and other domestic help that would reside on estates. This employment is viewed as part of the cumulative employment growth that would occur in Monterey County following construction of estate residences and has not been included in Table 5-1 of the draft EIR as part of direct employment generated by the proposed project.

69. The traffic generated at full buildout is much higher than the traffic generated during the construction phase. The EIR evaluates the traffic impacts at full buildout, which signifies a worst-case condition.

70. More information on the breakdown of slope classes has been added to the "Topography" subsection of Chapter 6, "Geology and Minerals", of the EIR. The slope classes provided are based on slope density ranges required by Monterey County.

The commenter essentially is requesting that an additional project alternative be analyzed. Because the project alternatives were selected by the Monterey County Planning and Building Inspection Department, it would be outside the scope of this EIR to analyze additional alternatives.

Detailed baseline information on site resources is available to the commenter at the Monterey County Planning and Building Inspection Department.

71. No evidence was found during the geologic investigations that would indicate that the faults are active or inactive. Therefore, the faults are considered potentially active according to California Division of Mines and Geology guidelines. Because of this designation, measures to mitigate potential ground surface displacement at certain lots, such as setbacks and special foundations, have been incorporated into the project design.

More text has been added to the EIR to indicate explicitly that the faults are potentially active.

72. Erosion and sediment control measures would be selected, implemented, and monitored for each home site in the project. If properly selected, implemented, and maintained, the measures should result in no appreciable increase in surface soil erosion caused by development. Refer to Chapter 6, "Geology and Minerals", and Chapter 7, "Soils", of the EIR for erosion control, setback, and slope support measures proposed by the applicant and additional measures stipulated by the EIR preparer that would mitigate potential accelerated soil erosion, sedimentation, and mass movement hazards.

73. A maximum of approximately 300,000 cubic yards of material will be taken from the borrow area, which will extend over 12 acres.

The dimensions of 1.5 feet deep by 156 acres were indicated only to provide the reader a mental picture of the volume of material that will be excavated, not to suggest that the borrow area will extend over 176 acres.

Please refer to the discussion of visual impacts and mitigation measures for the borrow site in Chapter 12, "Aesthetics", of the EIR. Impacts on visual resources from private residences are also discussed in this chapter.

74/75. Excavation of soil and rock in and of itself is not an impact. Only if it would cause an adverse effect, such as accelerated erosion or slope instability, would there be an significant impact. Hydroseeding is an accepted practice and is effective at controlling accelerated erosion if executed properly. Slopes steeper than approximately 2:1 are typically stabilized using erosion control blankets. The preliminary drainage and erosion control report indicates that, where practicable, surface flow over cutslopes will be intercepted by swales or other features (e.g., "brow ditches") and diverted to stable areas. Detailed erosion and sediment control plans will be prepared for specific elements of the project. It is beyond the scope of this EIR

to describe in further detail the types of erosion and sediment control measures and slope support features that will be implemented.

Potential visual impacts caused by grading the golf trail are discussed in Chapter 12, "Aesthetics", of the EIR.

The cutslopes are not expected to constitute a significant barrier to wildlife species because the species expected to use the golf trail should be capable of easily negotiating such slopes.

76. Although faults do pass through many proposed lots on the site, setbacks from building envelopes have been established to ensure that no ground surface displacement would occur in areas approved for habitable structures.

77. The final EIR text has ben clarified to indicate that the onsite faults are potentially active, because there is no evidence to indicate that the faults are active or inactive. New text has been added to the final EIR to indicate more clearly that only a very high increase in fluid pressure could cause an increased potential for fault movement. Groundwater withdrawal, such as from water supply wells, would tend to decrease the fluid pressure. Text has also been deleted from the EIR to eliminate confusion on this issue.

78. It would be beyond the scope of this EIR to analyze alternative road alignments. Alternatives to the proposed project, such as clustered housing, have already been addressed in the EIR.

New roads would be aligned and properly engineered to mitigate potential mass failure of the slopes on which the roads are constructed.

Increased runoff from the roads and water quality effects are discussed in Chapter 9, "Runoff, Flooding, and Water Quality", of the EIR. The applicant's Preliminary Drainage and Erosion Control Report describes the general types of erosion and sediment control measures that will be implemented for all components of the project. A detailed erosion and sediment control plan will be prepared for specific components, such as roads. The erosion and sediment control measures, if properly selected, installed, and maintained, should mitigate erosion and sedimentation impacts to a less-than-significant level.

79. Although it would be outside the scope of the EIR to prepare an emergency evacuation or property access plan, the EIR already contains a mitigation measure that a contingency plan be prepared and submitted to the Monterey County Planning and Building Inspection Department for approval. New text has been added to this mitigation measure in the final EIR to stipulate that the contingency plan should require the proper disposal of excavated landslide debris.

80. New text has been added to the final EIR to require that additional liquefaction and lateral spreading hazard assessments be conducted and the VTM amended, as required, prior to approval of the final VTM. It would be outside the scope of this EIR to specify which lots

should be relocated or adjusted. The aforementioned assessments will provide the basis for any lot adjustments.

81. Any unstable slope conditions will be properly engineered. All proposed cuts at the project site will be reviewed by an engineering geologist or geotechnical engineer and approved by the County Planning and Building Inspection Department.

82. A new map (Figure 6-5 in Chapter 6, "Geology and Minerals") has been included in the EIR text that provides more detail on the siting of the proposed borrow area. The borrow area is located at the intersection of parcels P-CE, R-CE, and K-CE. An existing dirt road passes through the area and connects to both west and east of the borrow area with existing paved roads on the site. It is assumed that this road will be used to haul the borrow material.

The borrow area is expected to be used intermittently during buildout of the project. The hours of operation will usually be 7 a.m. to 7 p.m., a maximum of 6 days a week. During construction of Rancho San Carlos Road (which is expected to require 4 months), the borrow area will be in operation nearly full time. Equipment expected to be used at the borrow area include bulldozers with ripping attachments and front-end loaders; no blasting is expected.

Chapter 12, "Aesthetics", of the EIR describes possible visual impacts of the borrow area.

An EIR mitigation measure requires that an erosion control/revegetation plan for the borrow area be prepared before project approval. Extraction of rock at the borrow area could be conducted so that there would be no net increase in the rate or volume of runoff during borrow operations and after operations are complete.

83. The Soil Survey of Monterey County, California (U.S. Soil Conservation Service 1978) identifies Santa Lucia soils as having moderate permeability, and San Andreas and Pfeiffer soils as having moderately rapid permeability, indicating that the soils are sufficiently permeable to allow groundwater recharge.

Wetlands in San Francisquito and San Clemente Flats are present because of localized high groundwater levels and localized flooding. The commenter is correct in stating that these areas probably do not contribute to significant groundwater recharge. However, most of the areas identified in the EIR as having high infiltration are not in wetland areas and consist of the upland (i.e., nonwetland) soils described above.

Lots not meeting county requirements for onsite wastewater disposal failed because of any one or a combination of characteristics, such as excessive slope, shallow depth over bedrock, high clay content, or other factor. For reference, soils that are considered medium textured (e.g., loam textural class) by the U.S. Department of Agriculture Natural Resources Conservation Service (formerly the Soil Conservation Service) may contain as much as 27% clay. This textural class is considered desirable for onsite wastewater disposal.

84. Based on information supplied by the applicant's livestock grazing consultant, approximately 2,000 acres of Rancho San Carlos were probably never grazed, because of unsuitable forage or very steep slopes. Approximately 8,000 acres of annual grassland, oak savanna, riparian woodland, redwood forest, and chaparral habitats were severely overgrazed by overstocking of cattle and by grazing during June through October. Intensive browsing and grazing occurred on another 9,000 acres when cattle were moved into areas less suitable for grazing.

The grazing consultant cites aerial photographs taken in the 1940s as showing extensive cattle trails and less dense foliage, suggesting the rancho was more accessible to livestock than at the present. Old perimeter fencing that is now completely covered by chaparral vegetation also suggests that cattle once penetrated areas that are presently inaccessible. In the past, stock water ponds were constructed in swales near ridgetops to improve cattle distribution over most of the rancho. The grazing consultant's interviews with a former ranch foreman indicate that the rancho's management practice was to encourage movement of cattle to more mountainous areas of the site by using horsemen.

85. The presence of 100-year old oaks in the gullies north of San Clemente Road indicates that gullying may be due to past cultivation. Increased runoff from upslope cultivated areas could have caused gully erosion downslope of the area actually being farmed. Past overgrazing of the area, combined with erodible soils and rocky areas of high runoff, also could have caused erosion.

The presence of turbid water in San Clemente Creek during the past rainy season, which was characterized by much greater-than-average storm intensities and rainfall amounts, could indeed indicate that the area is still eroding. However, unless the project causes a substantial increase in the gully erosion, for example, there would be no significant impact.

The EIR preparers concur with the comment that uplift along the San Clemente fault thrust could have contributed to channel downcutting in the area. However, it is academic and would be outside the scope of an EIR to determine whether the gullying is being caused by uplift of the thrust.

Provided that the erosion and sediment control measures are properly executed, monitored, and continued, the golf course should cause no net increase in erosion and sedimentation, compared to existing rates. The EIR preparers' experience with other golf courses suggests that fairway turf and rough areas of golf courses, once vegetation is established, appear to generate less sediment than the same areas before construction of the golf course.

86. Most of the roads for the project would follow existing dirt and paved road alignments. The EIR preparers agree with the comment that slope failures along road alignments could occur, even those roads constructed according to accepted engineering practices. However, the number of such roads that could fail is probably low. Accordingly, the impact is considered less than significant.

87. The EIR preparers concur with the commenter that the project area is subject to considerable slope instability, because of both naturally unstable terrain in many areas and existing development, such as roads. However, the EIR compares expected increases in erosion and mass movement caused by the project to existing conditions. Only if the project would result in a substantial increase in instability over existing conditions would there be a significant effect. The EIR preparers concur with the commenter that development of new roads and other structures in relatively natural areas raises the potential for new forms of instability to occur. Appropriate slope support and drainage, erosion control, and sediment control measures should reduce the potential impact of increased hazard of slope stability to a less-than-significant level. Additional reductions in sedimentation caused by road runoff will be achieved by paving existing unimproved roads.

88. The project would result in a significant impact only if it would cause a substantial increase in the rate of erosion and sedimentation, compared to existing rates.

89. Slopes graded to approximately 1.5:1 or steeper may be difficult to revegetate; however, the number of such slopes and areal extent of the exposed soil or rock is not expected to have a significant impact. Slopes graded to approximately 2:1 or flatter will be amenable to revegetation if topsoil remains on the slope or is reapplied after cutting and filling is complete.

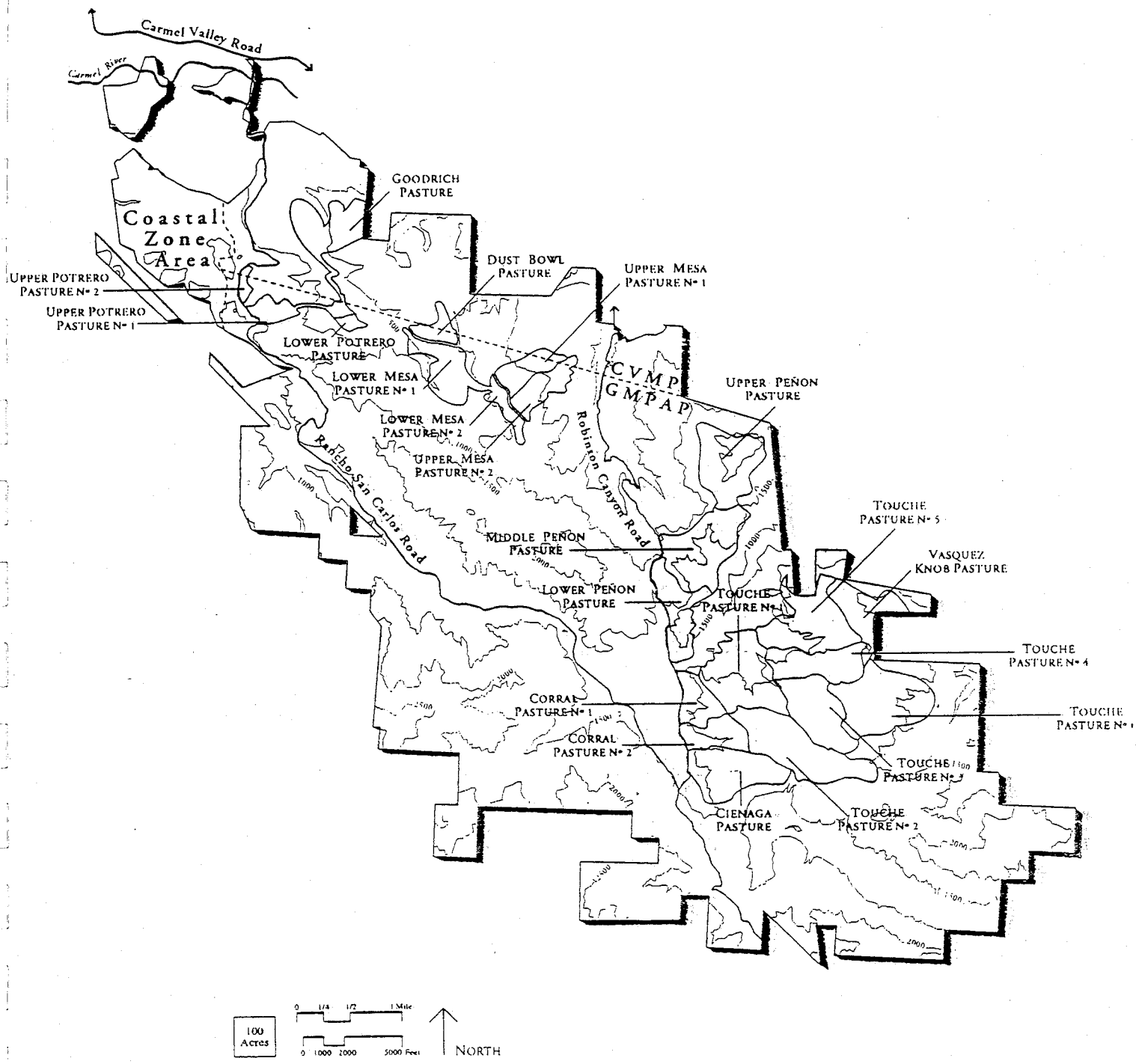
90. Approximately 3,000 acres of the site, divided among approximately 21 pastures (refer to Figure 1), would be seasonally grazed, as indicated in the Cattle Grazing Plan (on file for public review at the Monterey County Planning and Building Inspection Department). Additionally, part of the San Francisquito Flat area would be grazed year round by a small cow-calf operation. Grazing has been identified as being permitted for only selected private lots by the CC&Rs. The Santa Lucia Conservancy will determine additional lots where grazing will be permitted. Areas supporting sensitive resources would not be grazed to comply with habitat protection, enhancement, and mitigation requirements of the EIR.

    In support of the wildfire fuel reduction measures described in the Cattle Grazing Plan, mowing using small rubber-tired tractors or hand mowers would probably be performed adjacent to some of the residences to meet fire district requirements. No significant soil compaction is expected, because the soils will generally be too dry to compact.

91. It is outside the scope of the EIR to determine the feasibility or infeasibility of erosion control measures in specific areas.

92. Slopes graded to 2:1 will be amenable to revegetation if topsoil remains on the slope or is reapplied after cutting and filling is complete.

93. The driveway to Lot 241 is indeed on a very steep gradient (approximately 19%). Proposed stormwater drainage, maintenance, gradients, and other design aspects of roads and driveways will be subject to review and approval by the county.



Jones & Stokes Associates, Inc.

Figure 1
Grazing Plan

94. Limitation of all grading to the period April 15 to October 15 is unnecessary. As indicated in the EIR, the County Erosion Control Ordinance allows certain types of soil-disturbing activities with prior approval by the county. The preliminary erosion control report and the Santa Lucia Preserve Golf Trail Erosion and Sediment Control Plan already specify that proposed grading outside this period must be authorized by the Monterey County Planning and Building Inspection Department and Monterey County Water Resources Agency. There is no practical or regulatory basis for prohibiting all grading outright during the rainy season.

95. The EIR text has been revised to clarify that cutting and filling will balance within the project site. Some topsoil is expected to be brought to the golf trail; this topsoil is expected to be generated from underneath roads, parking lots, and other areas that will not be subsequently revegetated. It is expected that topsoil at the borrow area will be stripped and stockpiled for later use in revegetating the borrow area once borrow operations are complete.

96. The wetland and riparian habitat management plan for the golf trail describes the measures that will be implemented to ensure that protection of the wetlands will not be directly affected by the golf trail. The measures include construction of interception dikes and curtain drains to collect upslope runoff and discharge it in a diffuse manner below the golf course. Such measures, along with the erosion control measures described in the erosion and sediment control plan, are expected to mitigate potential impacts to a less-than-significant level.

The type of riprap that will be used is unknown. Carmel Stone consists primarily of silica, an inert mineral that is resistant to weathering. Dissolution of the Carmel Stone over hundreds of years is not expected to appreciably affect the water quality of downstream receiving waters.

97. As required by the Monterey County Health Department, the wastewater storage ponds will be designed to contain the 120-day storage, or such lesser amount as the department may require. Additionally, treated wastewater can be stored in the golf trail storage facilities which provide several months' holdover storage during the winter when irrigation is not required and storage for direct precipitation and runoff from the golf trail for normal water conditions. In heavy storm events, runoff from the golf trail will be routed to the natural drainages. The EIR preparers believe that the system as proposed meets applicable rules and regulations and that proposed holdover storage would provide necessary storage in the event of a power outage.

98. A new map (Figure 6-5) has been included in the final EIR that provides more detail on the siting of the proposed borrow area. The borrow area is located at the intersection of parcels P-CE, R-CE, and K-CE. An existing dirt road passes through the borrow area and connects to paved roads within the site, both west and east of the borrow area. It is assumed that this road will be used to haul the borrow material. It is assumed that the road will be watered or a dust-suppressant will be applied to control dust. Proposed operations, access road drainage improvements, and the erosion control/revegetation plan will be submitted and approved by the county before borrowing operations are initiated.

99. It would be beyond the scope of the EIR to analyze alternative road alignments other than those that would result from the project alternatives already described in the EIR. The applicant would need county approval for any roads constructed on slopes greater than 30%.

100. In response to the first statement, the discussion of the water balance shows that only 60% of the groundwater originally assumed to move off the project site as subsurface flow actually remains subsurface flow. The other 40% of the water becomes base flow in creeks.

The numbers supplied in the comment that were used to calculate subsurface outflow are insufficient to verify the assertion of the volume of water moving off the property. The volume of groundwater that flows as subsurface outflow is discussed as part of the water balance and is illustrated in Figures 8-2 and 8-3 of the EIR. This volume of outflow was considered when determining the available groundwater recharge. The extensive research, field investigation, and technical analysis conducted in connection with the preparation and review of the Comprehensive Hydrological Study do not support the limited and anecdotal conclusions reflected in this comment.

101. Not all of the water stored in the aquifer would be readily available, because of the low permeability of the fractured bedrock of the aquifer. However, the calculation on page 8-5 of the EIR is not limited by that fact because it is not an estimated aquifer volume, but a calculation of estimated available groundwater in storage. This storage volume is based on the amount of water actually yielded to wells. Therefore, the budget calculated is for usable storage, or storage that can be depleted. The only physical constraint is having wells suitably placed so that the water can be all pumped out.

102. Although the removal of the five low yielding wells from the calculations may have over-estimated the average permeability of the bedrock, that bias was somewhat offset by the tendency for tests of wells with large drawdowns in unconfined aquifers to underestimate hydraulic conductivity.

As to the likelihood of drilling new wells with adequate production levels, the Comprehensive Hydrological Study states:

> To date, 51 wells have been constructed throughout the ranch to depths which range from 200 to 1,500 feet (one well was constructed to 2,135 feet). The wells are completed in all geologic formations beneath the ranch (granite, sandstone, etc.), and have been tested at capacities up to 50 gallons per minute typically for durations of 24 to 72 hours. Five of the wells have been tested for 30 days to ascertain their dependability, to verify test results from other wells, and to investigate impacts of pumping. Based on the exploration and testing efforts, it is included that groundwater can be developed for planned uses from all geologic units beneath the ranch; it is further concluded that pumping capacities from individual wells will typically be in the range of 3 to 50 gpm.

It is unnecessary to provide the estimated production values from any proposed wells at this time.

103. Storativity is a measurement of the volume of water that can be removed from an aquifer per unit surface area, per unit change in hydraulic head. Analysis of test results at the two wells with suitable data indicate storativities between 0.5% and 1.2%, including the uncertainty created by effects of partial penetration of wells. These estimates were merely given as a way of estimating the radius of influence of pumping wells and the volume of water stored beneath Rancho San Carlos. Conservative storativity values were used because of their range.

The Comprehensive Hydrological Study and EIR provide sufficient information about the yield of the aquifer beneath Rancho San Carlos to satisfy the scope of this EIR.

104. The study in Maine was used to confirm what the data for Rancho San Carlos were already indicating: For temporal and spatial scales of interest for this impact analysis, it is reasonable to assume that the fractured bedrock aquifer is equivalent to a porous medium. The Comprehensive Hydrological Study confirms that the flow of water across geologic formations and fault lines is not inhibited. Therefore, the values determined from the pumping tests are for the entire bedrock aquifer, not just for the fractured granite.

105. Without study of the work that was done previously, it is unknown why the Tularcitos Aquifer was found to be inadequate to supply the Carmel Valley Ranch development. However, the Chamisal formation is only one part of the aquifer below Rancho San Carlos. The discussion of the water balance explains in detail why the fractured bedrock aquifer provides sufficient water to supply this development. Furthermore, the Comprehensive Hydrological Study states, "Based on the exploration and testing efforts, it is included that groundwater can be developed for planned uses from all geologic units beneath the ranch; it is further concluded that pumping capacities from individual wells will typically be in the range of three to 50 gpm."

106. The sentence says that groundwater that is at a higher elevation than the streambed tends to flow toward the nearest creek and seep into it. However, flow lines drawn perpendicular to the water level contours in Figure 8-3 of the EIR indicate that some direct subsurface outflow to the Carmel Valley alluvium does occur at the ends of the ridges separating the creek valleys. All of these values are considered in the water balance. The impacts of pumping on creeks is addressed in the sections "Impacts on Groundwater Levels" and "Impacts on Base Flow in Creeks" in Chapter 8, "Groundwater Hydrology, Storm Base Flow, and Water Supply and Demand", of the EIR.

107. In California, wells that intercept percolating groundwater can be developed for beneficial uses on the overlying lands without a water permit. Domestic use is a beneficial use that has weight equal to environmental uses. The EIR properly identifies potential impacts of groundwater development and proposes measures to mitigate these impacts: reduced base flow,

dewatering or otherwise reducing the extent of riparian habitat or wetlands, degradation of water quality, and reduction of fisheries habitat.

108. The fact that the water balance is an estimate is not disputed. However, educated estimates are frequently used in planning projects because a precise forecast of the water balance is impossible. The items in the water budget calculated for the EIR reflect a balanced long-term average budget, and any errors accrued by using estimates will probably cancel themselves out. In regard to rainfall, the annual rainfall was estimated using an isohyetal map developed from several rain gage records and is accepted as reasonably accurate.

109. The 6,800-acre-foot value is for the original water balance done for the Comprehensive Hydrological Study. The 5,900-acre-foot value is for the revised water balance done for the EIR. The volume of water that recharges the groundwater is 5,900 acre-feet: 3,100 acre-feet of that water goes to phreatophytes, 1,500 acre-feet goes to streamflow, and 1,300 acre-feet goes to subsurface outflow. These values are accepted as reasonably accurate and are discussed in the section "Water Balance" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand" of the EIR. As discussed above in response to Comment 105, the aquifer is being considered as a single hydrogeologic unit.

The volume of water required by the development is 295 acre-feet per year at buildout, which is significantly less than the volume that recharges the groundwater.

110. Average annual interception was assumed to equal 6% of annual rainfall based on data from studies in other areas. Although its accuracy for the Rancho San Carlos area is unknown, it is assumed acceptable. Though the land surfaces may be dry inside the redwood groves during storms of less than 0.25 inch, that is a very small storm and would not be expected to supply significant recharge. Heavier storms would have a significantly lower interception rate, resulting in a norm closer to what was used.

111. This root depth is in reference to that used in the Comprehensive Hydrological Study. In the section "Impacts on Riparian Vegetation and Wetlands", the root length used is 8 meters.

112. Redwood trees rely on fog for a significant portion of the moisture they require.

With a water demand of only 295 acre-feet per year at buildout, it is unlikely that 100% of groundwater recharge will be pumped. The impacts of lowered water table and drought conditions are discussed in the sections "Impacts on Groundwater Levels", "Impacts on Base Flow in Creeks", "Impacts on Offsite Water Users", "Impacts on Subsurface Outflow", and "Impacts on Riparian Vegetation and Wetlands" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the EIR.

113. Unless there are significant changes in total vegetation, type, and cover, storage of water in phreatophytes would remain essentially unchanged and therefore need not be accounted for in the water balance.

114. The opinion about underflow has already been addressed in Comments 100 and 106 above, as has the concept of deep and shallow aquifers in Comment 104 above. Although 5,900 acre-feet of water recharges the aquifer, it is lost to phreatophytes, base flow to streams, and subsurface outflow. The aquifer does not have an infinite capacity to keep accepting water.

115. The significance threshold for decreases in stream base flow is based on professional judgment. Given the small flows and short lengths of protected base flow reaches under existing conditions, a decrease of 10% is considered a reasonable upper limit of acceptable decline. If the limit were to be exceeded, mitigation, as discussed in the section "Impacts on Base Flow in Creeks" in Chapter 8 of the EIR would be necessary.

116. Board Resolution No. 93-115 states: "Determine within the accuracy of standard hydro-geologic practices, whether the level of development proposed by the applicant is consistent with safe yield of the proven water resources without adverse impacts on off-site water resources." As discussed in "Impacts on Subsurface Outflow" in Chapter 8 of the EIR, the impacts are minor, requiring no mitigation. As considered in the EIR, it is unlikely that these impacts would become significant and adversely affect offsite users.

117. Refer to the section "Impacts on Offsite Water Users" in Chapter 8 of the EIR.

118. Unit water demand of 0.75 af per dwelling unit was used in the water demand evaluation. The estimate was based on a review of actual water use, water use estimates used for other proposed projects in Monterey County, and demand information from local agencies. The 0.75 af/yr number was higher than numbers reviewed, which typically ranged from 0.2 to 0.5 af/yr. Therefore, 0.75 af/yr was selected as a conservative estimate. This value does exceed the value cited. The data indicating that the values in the EIR are in error are almost 10 years old and are not indicative of current water use trends. While there will always be extreme examples at both the high and low ends, the most recent Cal-Am water use figures (June 30,1995) show average single-family use in Carmel Valley to be 0.20 af/yr, a 6.26% reduction from the prior year.

119. Refer to the response to Comment 118 above.

120. The 58-af difference is attributable to the average yearly volume of diffuse stormwater runoff from the golf trail and will be collected and stored in ponds for use during the irrigation season. Table 8-1 of the EIR is a table of "Estimated Average Annual Groundwater Demand for the GMPAP Part of the Santa Lucia Preserve Project, by Watershed" and is correct and sufficient for an average runoff value to be used.

121. The EIR preparers do not agree with the assessment in this comment. The 675-af demand is not supported. Residential and other water demand figures used in the EIR include allowance for irrigation.

122. Water or nontoxic chemical dust suppressants will be used at the quarry to control dust on an as-needed basis. Dust control can consume up to about 10 gallons per minute (gpm) during hot, windy days if chemical suppressants are not used. Use of chemical suppressants will reduce water consumption considerably. Other water uses will include approximately 20 gpm during operational hours for processing, if necessary to increase the moisture level in the base rock. Water used for aggregate processing will be recycled, which will substantially reduce the water demand. Any water use at the site will occur only during project development and therefore would be used in lieu of, and not in addition to, overall project water demand.

123. Table 8-1 has been revised to state "Golf course irrigation is assumed to have zero return flow". A computerized irrigation system linked to an onsite weather station will automatically control daily water usage to achieve efficient water replacement within the turf root zone.

124. The term "return flow" refers to that part of groundwater that, once it has been used, returns to the groundwater basin. This includes, for example, deep percolation of a fraction of applied irrigation water below the root zone and percolation of septic system leachate from the disposal leach field. Because the return flow becomes available for future withdrawal by wells, it is subtracted from the original pumping estimate to obtain the net depletion of groundwater.

125. There would be water losses at the sewage treatment plant associated with solids handling and evaporation. Typically, very high water efficiencies (on the order of 99%) can be achieved. Therefore, losses were assumed to be negligible for the planning-level evaluation.

Typically, water supply distribution system losses are not included in planning-level estimates of demands. Losses associated with the water distribution system (typically on the order of 5% or less for new systems) could be attributable either to measurement error or to actual leakage in the system. Assuming losses are related to actual leakage, they would affect the amount of production capacity required to meet demand. Five percent of the total required GMPAP production capacity of 524 gpm is approximately 26 gpm, or the equivalent of two additional wells, based on the average well capacity of wells installed to date. Therefore, the ability to site new wells would not be significantly affected by the consideration of system losses.

The net effect on demand for groundwater is expected to be negligible, because leakage would primarily percolate to groundwater.

126. Refer to the response to Comment 116 above. The hydrologic analyses have shown that adequate water supply is available. The specific number, location, or depth of wells is not necessary to assess potential impacts of the project.

127. Refer to the response to Comment 107 above.

128. Construction of the water distribution system will proceed in phases corresponding to the phasing of overall project construction. At any time during the development process, the amount of on-line well yield and storage tank capacity will be adequate to serve the on-line water demand.

129. Power outages are not impacts of the project. Physical storage for firefighting flow and supplying limited domestic water during power outages is included as part of the project.

130. The areas of known controversy already state that the impacts of the proposed project on water supplies is an area of known controversy.

131. Uncertainty in well yields is addressed by the additional mitigation measure specified on page 8-29 of the draft EIR, which states that the water supply will be equal to or greater than the connected water demand at all times.

132. Refer to the response to Comment 131 above. The requested level of analysis is beyond the scope of this EIR. The details on how the wells will be specifically constructed and operated will be determined during the engineering process.

133. The maximum average monthly air temperature in Monterey was 62.4°F for the 1951-1980 period. In consultation with the Department of Health Services, the applicant chose the 60° curve. The Monterey station was used for Rancho San Carlos to provide an estimate of the source capacity required for the proposed development. No long-term temperature records are available at Rancho San Carlos to refine this estimate. The curve was used as a guide to estimate source capacity requirements, and the actual source capacity required will be based on actual water use.

134. Water conservation methods could be put into place.

135. The water balance calculation described in the "Setting" section of Chapter 8 in the EIR indicated that average annual groundwater recharge is on the order of 5,900 af/yr. Although this estimate is approximate, it is much larger than the average annual consumptive use of groundwater by the project (272 af/yr for the GMPAP part and 295 af/yr at buildout).

136. This issue is discussed on page 8-32 of the EIR under "Usable Groundwater Storage Capacity". This discussion does not imply that this aquifer would be completely drained. Rather, it identifies the volume of usable water that is available. The aquifer does drain naturally, but there is also infiltration replacing the water that drains.

137. Wells would only need to be on 5% of the aquifer area because the volume of water pumped from these wells would be sufficient to meet the demands of the development. A severe drought would not pose a serious threat to the water system's reliability because the wells will be operated only 12 hours per day, or effectively at half of the reported 24-hour yield rate. Also, the available drawdown used in the yield calculations was only two-thirds of the

maximum drawdown that could occur before adversely affecting well operation. Together, these criteria create a safety factor of about 3. That is, if wells were pumped continuously at a drawdown equal to the maximum drawdown, the yield would be about three times the yield credited to the wells under the planned operating criteria.

If the capacity of the water production system is exhausted during a drought, measures can be taken to extend the water supply, including rationing. If it is so decided, another well(s) can be drilled to meet demands.

138. The water demand factors were carefully reviewed and are discussed in the section "Impact: Potential Groundwater Overdraft if Water Demand Exceeds Groundwater Supply" in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the EIR. The likelihood of overdraft occurring is remote enough to be an insignificant impact. Therefore, mitigation is unnecessary.

139. The value of 173 acres comes from the preliminary drainage report completed by Bestor Engineers and is considered correct.

140. See "Impact: Increased Groundwater Recharge through Implementation of the Cattle Grazing Plan" in Chapter 8 of the EIR. The Cattle Grazing Plan calls for a reduction in historical grazing to grazing 500 steers on 2,800 acres for 100 days per year, which corresponds to a grazing intensity of 0.023 animal unit per acre (au-yr/ac), or one-fifth of the historical rate. Frequent rotation of the herd through a large number of relatively small pastures would also help to ensure grazing uniformity and prevent localized overgrazing. The data in Figure 8-6 indicate that a decrease in grazing intensity from 0.112 to 0.023 au-yr/ac could increase infiltration rates by a factor of 2-3, and a decrease to 0.0 au-yr/ac would increase infiltration rates by an even larger factor.

There is no clear evidence that reducing the livestock population will cause the deer population to change.

141. These values were used to illustrate the correlation between rainfall and runoff, not to replicate a realistic situation.

142. Refer to the response to Comment 140 above regarding concentrated grazing.

Exchanging grazing for a golf course and homes will have an impact, but the Cattle Grazing Plan is expected to result in increased groundwater recharge and increased base flow that will fully mitigate most of the potential impact of groundwater pumping.

The reference to Colusa is an example of the impacts that can be expected from implementing a cattle grazing plan. In several small watersheds in the interior Coast Ranges west of Colusa in northern California, where decreased animal densities and rotational grazing were implemented beginning in the early 1990s, there have been some beneficial effects. The timing and

duration of grazing were managed to favor perennial rather than annual grasses, similar to the proposed management objective of the Ranch San Carlos Cattle Grazing Plan. Beginning in 1993, small creeks in the affected watersheds began flowing year round, which had not ever occurred during the previous several decades of intense grazing. Runoff during storms simultaneously decreased. On January 6, 1995, after the first several days of a major storm event, the creeks were barely starting to flow and stock pond impoundments on the creeks were still almost empty. Similar creeks on neighboring ranches were flowing in torrents and the impoundments were spilling. Including the Colusa plan as an appendix is unnecessary.

143. Any grazing that is allowed to continue must be on suitable parcels identified on the CC&Rs and would be in keeping with the Resource Management Plan and the Cattle Grazing Plan. Except for a few identified parcels on the CC&Rs, the keeping, maintenance, raising, and breeding of horses, cattle, and other large or hoofed animals for private or commercial purposes are prohibited. Therefore, the assertion that the grazing plan will have a significant beneficial impact is sustained.

144. There is no well R-26. In regard to wells that affect creeks, refer to the section under "Impacts on Base Flow in Creeks" in Chapter 8 of the EIR. This mitigation is sufficient.

145. Listing all wells within the 1,000-foot radial influence is not required in the EIR. This information is available for review at the Monterey County Planning and Building Inspection Department.

Of the wells listed in Table 6-2 of the Comprehensive Hydrological Study, "Rancho San Carlos Pumping Test Parameters and Screen Configuration", there is one well with a screened interval less than 30 feet deep, with the rest at least 100 feet deep, with an average depth of 360 feet.

As for any impacts due to interception of recharge, refer to the section under "Impacts on Base Flow in Creeks" in Chapter 8 of the EIR.

146 Refer to the section "Impacts on Riparian Vegetation and Wetlands" in Chapter 8 of the EIR where issues regarding riparian vegetation and phreatophytes are addressed.

147. Groundwater pumping might interrupt subsurface outflow, stream base flow, and/or phreatophyte transpiration. Springs are fed by water perched above the main groundwater body where wells are being pumped. Therefore, springs will not be affected by the project.

The entire process of replacing base flow with groundwater is addressed in the section "Additional Mitigation Measure: Monitor Base Flow in Creeks and Provide Supplemental Water if Necessary". This measure can mitigate the problem, as indicated, and does not create another problem.

As for drought-related impacts, the project applicant is only responsible for mitigating impacts caused by the project, not natural phenomena such as droughts.

148. The comment has been noted.

149. Pumping could potentially affect the base flow as discussed on page 8-39 of the draft EIR. A significant impact is identified and mitigation is specified on page 8-48.

150. The commenter incorrectly asserts that the Comprehensive Hydrological Study and draft EIR clearly indicate that these three wells can be affected by the creek. As noted in the draft EIR, the study concluded that there was no observable effect at two wells and the results were conflicting at the third well. A well will only affect a creek if or when the groundwater and surface water are hydraulically connected. Potential impacts and their mitigation measures are addressed in the section "Impacts on Base Flow in Creeks" in Chapter 8 of the EIR.

151. In response to Comment 21 from the Monterey Peninsula Water Management District, adjustments to irrigation patterns during drought conditions have been suggested. Cattle grazing in the long term will be reduced so as to allow greater infiltration to the groundwater basin. This will provide a larger amount of stored water to base flow portions of creeks during the dry season.

152. The comment has been noted and revisions made in the final EIR, Volume II. The monitoring interval has been changed from quarterly to monthly, and the reporting interval has been changed to annually. This mitigation measure is included simply to ensure that the monitoring is implemented and the results are made available to interested parties. Furthermore, the most recent description of the water system design indicates that all wells would be connected by telemetry to a central control office and that static and pumping water levels would be monitored and included in the telemetered data. Used with the Cattle Grazing Plan and the two other suggested mitigation measures, the mitigation is sufficient.

Actions to preserve base flows in case of drought are described in the section "Impact: Decreased Long-Term or Drought-Period Base Flow in Creeks" in Chapter 8 of the EIR.

153. Actions to preserve base flows in case of drought are described in the section "Impact: Decreased Long-Term or Drought-Period Base Flow in Creeks" in Chapter 8 of the EIR. Refer to response to Comment 154 below.

154. The mitigation measure "Delay Pumping at Wells near Protected Base Flow Reaches" in Chapter 8 of the EIR addresses the issue of base flow reduction due to pumping wells near streams. The mitigation it discusses is sufficient to mitigate the impacts of existing wells. If base flows are decreased by drought or the project, mitigation measures are discussed following "Impact: Decreased Long-Term or Drought-Period Base Flow in Creeks".

155. The comment has been noted.

156. The comment has been noted.

157. Implementation of the Cattle Grazing Plan will have a beneficial impact. The effect of potentially greatest significance to this project is the seasonal shift in rainfall runoff, which would manifest itself as a flattening of the flow duration curve. Increasing the infiltration rate decreases the direct runoff rate during rainstorms. Much of the infiltrated water becomes groundwater recharge that later emerges as base flow in nearby creeks. Thus, the effect of grazing management has the double benefit of decreasing floodflows while increasing summer base flow. This will provide more stored water for dry and drought periods, reducing the magnitude of streamflow depletion.

During dry years when winter rainfall and spring and summer streamflow data indicate that base flow could decline below the October 1990 levels by the end of the dry season, the applicant shall monitor base flow conditions at least monthly beginning in July and continue until surface runoff resumes the following winter. If base flow in any of the four creeks drops below the October 1990 level as a result of the project, the applicant shall supplement flow by discharging water into the creek near the upstream end of the protected base flow reach.

158. The EIR states that steelhead trout are present in San Jose Creek. Additionally, the proposed project includes mitigation measures to protect the fisheries in San Jose Creek. The presence of California red-legged frogs in upper San Jose Creek was suspected, but not confirmed, by BioSystems Analysis (1992); similarly, southwestern pond turtles were not observed in upper San Jose Creek. These studies, however, were conducted during drought conditions and suitable habitats were not available for these species. If the commenter has specific, documented records of these species in San Jose Creek, the records should be submitted for review and incorporation into the final EIR.

Upper San Jose Creek is currently in improved condition, compared to past years of intensive grazing pressure. Because potentially suitable habitat is available along upper San Jose Creek for red-legged frogs and southwestern pond turtles, these areas will be treated if they were occupied habitat for these species. (Froke pers. comm.)

159. The monitoring program specified in the draft EIR is considered adequate to address this concern.

160. Figure 8-5 contains the estimated locations of the protected base flow reaches. Discharges of groundwater will be made near the upstream end of the protected flows. Any further details are superfluous at this time.

161. Base flow conditions in October 1990 should not occur in normal years. These conditions were chosen to define the protected base flow reaches because those flows occurred at the end of the dry season after 4 years of drought and consequently represent the lowest flows that the aquatic habitat would probably have to endure in a 20- to 50-year period. These flows are used here to represent the minimum-flow management objective. The Cattle

Grazing Plan is expected to result in increased groundwater recharge and increased base flow that will fully mitigate most of the potential impacts of groundwater pumping. See the section "Impact: Induced Seepage Losses from Creeks and Substantial Depletion of Dry-Season Base Flow" in Chapter 8 of the EIR.

162. The maximum flow augmentation rate approximately equals the sum of the summer base flows observed in the creeks in the late summer of 1990 and thus would be sufficient to substantially increase the flow under extreme low-flow conditions. The direct discharge to the creeks would greatly exceed the increase in seepage loss for the duration of the dry season, and thus the net effect of pumping groundwater into the creeks would still be substantially beneficial.

The applicant decides which creeks(s) to supplement, if the flow is insufficient for all. The mitigation measure specifies that the augmentation be allocated among the creeks in whatever proportion maximizes the overall benefit for aquatic habitat. There is no recourse for a drought impact, with or without the project.

163. The 20% threshold is based on professional judgment and is considered reasonable. As discussed on page 8-50 of the draft EIR, if the project appears to have caused a substantial (20% or more) proportion of the decline in base flow, augmentation is required.

164. Because of the low aquifer permeability and fairly large distance of wells from the creeks, the effect of increased seepage would be gradual and spread out over a long period (probably years). Therefore, the direct discharge would greatly exceed the increase in seepage loss. The assumption that the entire well pumping rate must be replaced is incorrect because only a portion of the wells' impact will be felt by the protected base flow region of a creek. The resulting flows are the minimum flow permissible and are the response to violating the October 1990 minimum flow management standard. Using "whatever releases it takes", as suggested by the commenter, is unrealistic when there is already a water shortage.

165. The source of base flow augmentation water is discussed on page 8-50 of the draft EIR. Please refer to the response to Comment 2 from the California State Water Resources Control Board concerning appropriative water rights. Mitigation measures specified on pages 11-45 and 11-54 in Chapter 11, "Biological Resources", of the draft EIR address impacts related to the loss or degradation of riparian habitat and loss or disturbance of wetlands. As stated on page 8-50 of the EIR, supplemental releases from Moore's Lake would be done in a manner that avoids adverse effects on aquatic biota. Given this restriction, it is unlikely the lake would be drawn down to the extent that an adverse aesthetic impact would occur. The discussion of project effects on streamflow is considered adequate, and the associated mitigation measures are considered reasonable and feasible.

166. The comment has been noted and a change has been made to page 8-50 of Volume II of the final EIR. Additionally, measures have been included in the EIR to protect base flows and fisheries resources.

167. Groundwater monitoring will occur as a standard practice as long as the water system is in use.

168. The word "minor" is appropriate for a calculated change of approximately 1.3% under worst-case conditions.

Page 6-7 of the Comprehensive Hydrological Study states that "The mean hydraulic conductivity values are within one order of magnitude of each other and the overall average, which support the concept of a single hydrogeologic unit beneath and immediately surrounding the ranch." Page 6-14 further states that "it appears that groundwater is hydraulically continuous and able to move across geologic contacts and faults lines." Therefore, there is no differentiation between shallow water and deep groundwater movements.

Consequently, the calculations are valid, and no mitigation is necessary.

169. The commenter misquotes the draft EIR (page 8-52) by stating that "...a decrease of up to 80 acres of riparian habitat is not significant...". Page 8-52 of the draft EIR does not reference any specific acreage loss of riparian habitat, and the same paragraph continued on page 8-53 directs the reader to Chapter 11, "Biological Resources" for a discussion of riparian impacts.

In reality, construction activities related to the proposed project would result in the loss or degradation of only about 11 acres of habitat, or about 0.7% of the remaining habitat at the preserve (draft EIR, page 11-44). Although this impact was considered less than significant, the applicant will restore all degraded riparian habitats at a 3:1 mitigation ratio. Details of this mitigation measure can be found in the comprehensive development plan (Rancho San Carlos Partnership 1994a).

170. The second mitigation measure on page 8-54 will address the impact during drought conditions. Conditions in the plan area are not comparable to those in the Carmel Valley.

171. It is important that the numbers be taken in context.

172. The Monterey County Water Resources Agency and DFG will review the monitoring plan for adequacy.

173. The mitigation measure had to be specific to be implemented properly.

174. As explained in the EIR, the wetland area in San Francisquito Flat is likely a result of a shallow clay zone, which serves to create a perched groundwater zone. However, most of San Francisquito Flat consists of nonwetland areas. Therefore, most of the direct recharge in San Francisquito Flat occurs in nonwetland areas through more permeable soil zones.

Pumping from well T-9 will not dry up the wetland, because the well does not tap near-surface perched water. As explained above, recharge to the well occurs through surrounding nonwetland areas. In addition, indirect recharge to San Francisquito Flat (and well T-9) occurs from subsurface water flowing in from surrounding upland areas. The grazing management plan will increase infiltration primarily in nonwetland areas.

175. The discussion referred to by the comment relates to wetlands that are associated with springs and seeps on hillsides. These springs are perched above the main groundwater system tapped by wells and therefore will not be affected by groundwater pumping.

176. This information is not needed in the context of the impact discussion.

177. This calculation is based on long-term average values, when the 58 af would be available as stored surface water. In a drought, the project would not consume all streamflow for two reasons: first, because streamflow would only be reduced in creeks that have a hydraulic connection to groundwater; and second, because of the reasons indicated in the section "Impacts on Base Flow in Creeks" in Chapter 8 of the EIR.

178. According to the Monterey Peninsula Water Management District, the pumping rate should be 12,500 af/yr. The EIR will be changed to reflect this observation. However, this change still does not bring the level of this impact to significant: Instead of the decrease in surface and subsurface outflow to the Carmel Valley during a critical drought period being less than 1%, it is now a little more than 1%.

The reasons for considering the impact less than significant are all reasonable and relevant, even if some of the numbers cited are estimates. It is fundamental to all planning processes to anticipate future resource conditions and public resource neeeds. Given the extensive testing and research that have been included in this project, the EIR preparers are confident that their conclusions regarding the significance of the project impacts on the Carmel Valley water supply are reasonable and well founded.

179. The EIR describes how impacts on watersheds in Santa Lucia Preserve are either insignificant or can be mitigated. The EIR also states that cumulative impacts from the watersheds on Carmel Valley are insignificant. Therefore, potential offsite impacts on individual watersheds, which are in between the areas discussed in detail in the EIR, are either insignificant or accounted for in the mitigation measures. Furthermore, groundwater pumpage in Santa Lucia Preserve will be distributed approximately in accordance with the proportion of recharge occurring in each watershed such that undue stress will not be placed on any given watershed.

180. Underflow is part of streamflow and is regulated as such by the California State Water Resources Control Board.

181. Comment noted. The draft EIR identifies elevations being over 3,000 feet.

182. It is assumed that home builders would not plan structures in natural depressions or drainageways and that appropriate drainage facilities would be constructed. Plans are checked by county staff before grading or building permits are issued to ensure this. It is beyond the scope of this EIR to prepare individual hydrological analyses for each potential building parcel.

183. The 10-year floodflow was estimated by the project applicant's engineering consultant, Bestor Engineers, using the Rational Method. This is a commonly used method that provides conservative estimates of peak floodflows. It is beyond the scope of the EIR to independently determine floodflows. However, the work of Bestor Engineers was reviewed, and its methods and assumptions were consistent with good engineering practices. The county does not know the peak floodflows or the recurrence interval for the floods of 1995 storms in San Clemente Creek. Our conversations with USGS and county staff indicated that the Carmel River flows represented approximately a 25-year flood (page 9-6 of the EIR). Local precipitation exceeded 100-year rates and it is possible that San Clemente Creek or other drainages within the project area received very heavy precipitation rates and flooding consistent with greater return intervals.

184. Although brake shoe dust may be a major pollutant in San Francisco Bay, the population density and the traffic in that region are not comparable to the traffic that is expected as a result of this project. Brake dust may contribute particulate matter to urban runoff, which is described on page 9-28 of the draft EIR.

185. See response to Comment 2 from Patrick Dormody. It is true that open spans may be superior in some instances, especially when fish passage is considered. However, creating large spans may require significant disturbance to the surrounding riparian habitat, which is not offset by the benefits of using an open span. Properly sized culverts may also provide some flood control benefits during flood events by providing detention.

186. Comment noted. Based on the information provided by the project applicant, continuous flow in San Clemente Creek within the project boundaries could not be verified. It is possible that there was continuous flow downstream of the project.

187. Base flow is to be supplemented from groundwater. The storage ponds would store reclaimed wastewater that would be inappropriate for supplemental water because of high levels of nutrients and temperature.

188. Each building envelope consists of approximately 5 acres, depending on slope and other site limitations. It is unreasonable to assume that the entire area would be paved. The EIR preparers believe that the preliminary drainage report developed by the project applicant's engineering consultant used reasonable assumptions in estimating the size of homes and associated facilities.

189. It is not known precisely where each detention basin would be located at this time. The basins will be designed to meet county standards and sited to minimize impacts on the environment. Impacts related to their construction must be mitigated. Detention basins are designed to store water only for a few hours to attenuate peak floodflows. It is unlikely that any stormwater infrastructure would be designed that requires pumps or other active components. Detention basins are typically passive. The wastewater storage ponds will be designed to contain the day-to-day wastewater loads, to provide several months' holdover storage during the winter when irrigation is not required, and to provide storage for direct precipitation and runoff from the golf trail for normal water conditions. In heavy storm events, runoff from the golf trail will be diverted to the natural drainages.

190. The condition and density of groundcover also have a significant effect on runoff rates. Assuming that a 10-year, 24-hour storm produces approximately 5 inches of rain, according to Urban Hydrology for Small Watersheds (U.S. Soil Conservation Service 1986), improving the range condition from poor to good on a Hydrologic Group C soil would result in a runoff reduction of 25%.

191. See page 9-17 in Chapter 9, "Runoff, Flooding, and Water Quality", of the draft EIR for a discussion of impacts relating to increased stormwater runoff and mitigation measures.

192. Comment noted. This mitigation would not be reasonable. To capture the rainfall from an average water year (30 inches), a 2,000-sf home would need a tank that could store 5,000 cubic feet of water (37,400 gallons).

193. The managed areas of the golf trail amount to less than 1% of the Las Garzas Creek watershed. Therefore, the county does not believe that there would be a significant effect on the local hydrology. The county cannot estimate the likelihood of the infrastructure failing. The county believes that all infrastructure will need routine maintenance to function as designed. The county does not believe that an appropriative right to divert water is unnecessary to capture overland flow (refer to the response to Comment 3 of the California State Water Regional Control Board).

194. The comprehensive development plan does not include the golf trail and associated improvements. These features are included in the buildout scenario.

195. Refer to the response to Comment 12 of Parkin & Sugar.

196. Comment noted. As stated on page 9-30 of the draft EIR, the county believes that normal winter precipitation will prevent accumulation of salts in soils at the golf trail.

197. Comment noted.

198. Information used to prepare the EIR included technical information from DFG, a 1992 survey conducted in the proposed project area, and personal communications with public agency

representatives. This information concluded that erosion problems occur in every drainage in the project area.

199. The draft EIR has been amended to state that wetted sections were also present in San Clemente Creek and San Jose Creek.

200. The EIR states that erosion problems occur in all drainages of the proposed project area.

201. The draft EIR states on page 10-4 in Chapter 10, "Fisheries", under "Distribution and Abundance of Steelhead Trout" that rainbow trout exist in Las Garzas Creek.

202. As described on pages 6-10 and 6-11 in Chapter 6, "Geology and Minerals", of the EIR, onsite quarry or borrow areas do not require conditional use permits from the county or compliance with the Surface Mining and Reclamation Act. However, these quarries and borrow areas may require grading permits from the county and they will require either an individual or general industrial activity stormwater National Pollutant Discharge Elimination System (NPDES) permit.

The NPDES permit sets effluent limitations and requires development of a stormwater pollution prevention plan and a monitoring program.

Because of the stringent requirements set forth by the Clean Water Act and the California Water Code to protect human and environmental resources, no significant impacts on fisheries resources would result.

No additional measures are required to protect fisheries or water resources.

203. Refer to the response to Comment 15 from the California Department of Fish and Game.

204. These mitigation measures are intended to avoid and minimize flow reduction. If a reduction in base flow occurs, then supplemental water will be provided. Refer to Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply Demand", of the EIR for a discussion of base flows.

205. The proposed project includes an erosion control plan that will prevent erosion from reaching the drainages of the proposed project area.

206. A discussion of the effects of the proposed project on undisturbed areas is provided in the response to Comment 1 from CNPS. Domestic dogs and cats will be confined within homesites, as will all gardens. Please refer to Comments 16 and 17 from Parkin &Sugar for a more complete discussion of this issue.

Ground squirrel control will be conducted entirely with nonchemical and nontoxic methods, such as selective trapping in problem areas (Froke pers. comm.). For a discussion of the

potential impacts of the proposed golf trail on golden eagles, please refer to response to Comment 4 from Patricia Lunt. Black bears are known to live in the region but are uncommon residents of the preserve. Rattlesnakes are already resident in appropriate habitats throughout the preserve. The effects of the proposed project on tarantula migrations are unknown; if specific migration routes are known, this information will be incorporated into the final EIR. Refer to response to Comment 3 from David Dilworth (July 14, 1995) for additional discussion.

207. As discussed on page 2-54 of the draft EIR, 90% of the land, or approximately 18,000 acres, is proposed to be set aside as "preserve lands". Ten percent of the land, or approximately 2,000 acres, is proposed to be developed as "settled lands". Residential development will be restricted to a building envelope called a "homeland". All improvements related to a house other than the supporting infrastructure would be constructed within the homeland. Homelands would range in size from 1 to 5 acres within a range of lot sizes from 2 to approximately 100 acres.. Land within each lot that is outside the building envelope (called openland) will be generally left open except for drives, trails, and utilities and will be subject to a conservation easement owned and managed by the Santa Lucia Conservancy. Therefore, a small portion of the preserve will be privately owned but managed by the conservancy. The commenter's suggestions about how preserve lands should be owned and managed are noted and will be considered.

208. Heterogeneous applies to the word "influence", not fog. This is a discussion of the existing setting.

209. The comment is asking for impact information to be presented in the "Setting" section of the EIR. The table summarizing impacts is presented very early in the impacts discussion of the section and has not been relocated.

210. The extent of coastal terrace prairie remaining in California has not been quantified, but the California Department of Fish and Game's California Natural Diversity Data Base estimates that there are between 2,000 and 10,000 acres (BioSystems Analysis 1994). Thus, the 535 acres of coastal terrace prairie present on the Santa Lucia Preserve does represent a significant portion of this habitat type in the state, but is not necessarily the largest undisturbed area existing. Coastal terrace prairie, however, is identified as an important native community in the draft EIR.

211. In Monterey County, redwood forest is found in the coastal canyons south of Monterey almost to the San Luis Obispo County line. In Carmel Valley, this community is still found throughout the region (BioSystems Analysis 1994). BioSystems Analysis (1994) states that on the Santa Lucia Preserve, most of the redwood forest occurs on the northern half of the ranch, although it is also found near San Clemente Creek. No documentation is available that validates San Clemente Creek's redwood community as the largest most southerly inland grove in the world.

212. The draft EIR has been modified to describe the southern distribution of mixed evergreen forest in the state.

213. This comment suggests that the 3-acre stand of ponderosa pines referenced on page 11-16 of the draft EIR contains a golden eagle nest. Unfortunately, no details of this important observation were provided for review (i.e., who saw the nest, when, whether it was active and occupied by this species). As summarized in Table 11-3, golden eagles were consistently present at Peñon Peak and at Hall's Ridge during BioSystems Analysis' 1991 surveys of the Santa Lucia Preserve.

214. Figure 11-3 reflects the roadway names indicated in the VTM. Refer to response to comment 250.

215. The location of wetland habitat that coincides with proposed development can be identified by comparing Figure 11-2, "Jurisdictional Waters of the United States at Rancho San Carlos" in Chapter 11, "Biological Resources", with Figure 2-3, "Comprehensive Development Plan" in Chapter 2, "Project Description".

216. All observations of special-status species made by BioSystems Analysis (1994) were summarized in Table 11-3. Jones & Stokes Associates biologists suspected that California horned lizards were present in suitable grassland, brushland, and woodland habitats of the Santa Lucia Preserve, but they lacked confirmed observations of this subspecies. The statement that "The region of Long Ridge is full of them and getting more . . ." is the first definite record that has come to the EIR preparers' attention.

The applicant would appreciate any additional data on California horned lizards at the preserve (i.e., who saw the lizards, when, and habitat conditions) so that they can be incorporated into the final EIR and the GIS database. These observations could provide a basis for preconstruction surveys and possible avoidance in home site placement at Long Ridge. Similarly, data gathered during preconstruction surveys could be used to identify possible release sites for horned lizards that may be displaced or captured during construction (Froke pers. comm.).

217. As summarized in Table 11-2, BioSystems Analysis detected southwestern pond turtles at three farm ponds at the Santa Lucia Preserve in 1991. Potentially suitable habitat for this subspecies also exists at Moore's Lake and at Cienega Pond. All of these areas will be protected from development and will be fenced to prevent the intrusion of cattle and wild boars. These protective measures should improve the overall habitat for this subspecies, compared to existing, unfenced conditions.

218. Please refer to the response to Comment 1 from Ronald A. Breuch for a discussion of the possible impacts of the proposed project on white-tailed kites.

219. Possible golden eagle nest sites at Peñon Peak and Hall's Ridge (Table 11-3) would be protected from development under the proposed project. It is true that about 600 acres of suitable foraging habitat for this species could be lost to development, including more than 300 acres for the golf trail. However, this loss represents less than 10% of the remaining golden eagle foraging habitat at the preserve. Similarly, as noted in the draft EIR (page 11-50), some of these losses would be temporary, and foraging habitat conditions could improve on the remainder of the preserve through improved grazing, sediment control, and erosion control plans for the preserve (BioSystems Analysis 1994).

220. This comment states that this project will have a dramatic effect on wildlife and will cause them to leave, similar to Carmel Valley. This comment is nonspecific but reveals that the commenter has not reviewed the extensive biological background reports that were prepared for this project (e.g., BioSystems 1992; 1994). Even a cursory review of the draft EIR reveals that the proposed project is fundamentally different from what has occurred in Carmel Valley (i.e., complete elimination of most wildlife habitat areas). In the proposed project, more than 90% of the land area in the home site areas will remain in permanent open space, with large and strategically located corridors throughout.

221. Refer to the response to Comment 220 above.

222. Refer to the response to Comment 1 from CNPS.

223. The mitigation recommended to compensate for the loss or degradation of oak woodlands is sufficient to reduce the impact to a less-than-significant level under CEQA.

224. Coastal terrace prairie will not be created. Some areas of historically overgrazed annual grassland are expected to undergo conversion to native grass stands by implementing the Cattle Grazing Plan prepared by Sage Associates (1994a). Less than 5.5 acres (1% of the total coastal terrace prairie) is necessary to reduce this impact to a less-than-significant level.

225. The effects of groundwater-level changes on riparian vegetation, and appropriate mitigation measures, are discussed on pages 8-52 to 8-57 of the draft EIR.

226. The loss of wetlands resulting from the entire project amounts to approximately 3% of the total present on the Santa Lucia Preserve. This loss is considered less than significant under CEQA. The project applicant, however, will compensate for the loss of wetland habitat that would be incurred as a result of project implementation (refer to pages 11-45 to 11-46 of the draft EIR).

227. Refer to the response to Comment 220 above.

228. Less than 10% of any biological community will be lost or degraded by the project. Ample areas of each community will remain to provide sufficient habitat for wildlife.

229. Losses to biological communities were addressed on pages 11-42 to 11-46 of the draft EIR in accordance with State CEQA Guidelines. A determination of the level of significance of these losses was made based on federal, state, and local laws, regulations, and policies. Appropriate mitigation is recommended where impacts are determined to be significant.

230. It is recognized that landmark trees cannot be replaced by trees of the same age. However, the loss can be reduced to a less-than-significant level by compensating at a 5:1 replacement ratio. Landmark trees were avoided to the greatest extent possible by the project applicant during the design phase of the project.

231. Intensive surveys were conducted by BioSystems Analysis to describe and document the location of biological communities on the project site. Figure 11-1 is an accurate representation of the results of those surveys, including the location of redwood forest stands.

232. The views, sensitivity of views, and visual impacts of the project as viewed from Robinson Canyon Road are described in Chapter 12, "Aesthetics", of the draft EIR.

233. Travel along San Clemente Road (Dormody Road) to and from Robinson Canyon Road may provide views of several proposed lots. Lots most likely to be visible from Dormody Road include Lots 80, 81, 109, and 110. Views of these lots generally would be intermittent and brief because of existing vegetation and intervening topography. Also, the proposed development has height limits that would reduce the potential for views of structures on the lots. Structures will be generally screened by vegetation and located on the lots to minimize their visibility. Because county policies do not specifically address protecting views from private property, visual impacts of development on these lots would be less than significant for views from the private Dormody Road.

234. The acres of lots to be developed and proposed uses are described on page 5-1 in the draft EIR. Evaluation of the exact dimensions of structures is not specifically addressed in the county policies for visual quality.

235. Vegetation on the Rancho San Carlos project site is described in Chapter 11, "Biological Resources", of the draft EIR.

236. Vasquez Trail is a private unpaved road that extends to the project site.

237. County policies for visual quality do not specifically address protection of views from private property.

238. As stated in the "Approach and Methodology" section for the impact assessment in Chapter 12, "Aesthetics", of the EIR, the approach used for visual assessment relies on the FHWA visual impact assessment system. This system uses an objective evaluative approach for describing and assessing visual impacts.

239. Height limits of 24, 18, and 16 feet are proposed for structures and avoidance of ridgeline impacts.

240. The clubhouse may be visible from Robinson Canyon Road, and current information is provided on page 12 -15 in the draft EIR. The ranch center and the lodge will be subject to county design review under the "D" district regulations.

241. Portions of proposed structures may be visible in the viewshed; however, by screening with native vegetation and leaving the landform substantially unchanged, the impact is considered less than significant.

242. As described in the draft EIR, to mitigate the significant impact, the ranch operations center should be relocated or redesigned away from the edge of Robinson Canyon Road and Rancho San Carlos Road intersection. This relocation is reflected in the revised vesting tentative map (VTM) (Appendix J of the final EIR).

243. Native vegetation used to screen the area shown in the draft EIR (Figure 12-7b) consists of more than one species of plants. The photosimulation shows various plants native to the area proposed for screening.

244. Buildings and parking structures will be screened and will be designed to maintain the current architectural style and color to provide unity with existing features in San Francisquito Flat.

245. Vasquez Trail is west of the equestrian center. Pronghorn Run is west of Robinson Canyon Road (an unpaved road center of Figure 12-8b in the draft EIR). The sewer treatment plant in the middle of Figure 12-8b is screened behind vegetation. Rancho San Carlos Road is to the west.

246. The establishment of native vegetation before beginning quarry operations was suggested to ensure that any public views of the quarry site are adequately screened.

247. Potential impact of the golf course is evaluated in The Santa Lucia Preserve Golf Trail: A Visual Analysis (Rancho San Carlos Partnership 1994d). The golf clubhouse will be located 1,200-1,500 feet from the roadway and although it may be visible, it would not produce a significant visual impact from a common public viewing area.

248. The project impacts and the recommended improvements are summarized on Table S-1 of the draft EIR.

249. Although there is no significant impact requiring mitigation, the applicant has offered the following measures. Robinson Canyon Road will be widened, and improvements to sight lines will be made within the San Francisquito Flat area to accommodate additional cross traffic and circulation; the cattle guards on this section of Robinson Canyon Road would all be replaced. All improvements will be made to comply with Monterey County road

standards. The capacity of this section of the roadway is expected to be in the range of 8,000-15,000 vehicles daily after improvements are made. Robinson Canyon Road near Rancho San Carlos Road is expected to carry about 1,200 vehicles on a typical day. Appropriate signage would be provided, including speed limit signs. The applicant does not propose any other improvements for Robinson Canyon Road. The proposed project is expected to have minimal impacts on Robinson Canyon Road. The design and proposed improvements of the project will minimize use of Robinson Canyon Road by dedicating access rights along Robinson Canyon Road, avoiding development that would enter and exit on substandard sections of Robinson Canyon Road, developing interior roads that limit access to Robinson Canyon Road to east-west links through established ranch gates, improving Rancho San Carlos Road as a faster and safer link to Carmel Valley, and establishing a Traffic Management Association to manage onsite and offsite trip patterns. All improvements to internal roads, including the adequacy of sight distance at the gates, will be reviewed by Monterey County Department of Public Works before implementation.

In response to comments on the draft EIR and at the request of the Monterey County Department of Public Works, the applicant and the EIR preparers have investigated other measures to minimize traffic on Robinson Canyon Road (e.g., tunnels and grade separations). These measures have been rejected based upon the potential environmental impact and the absence of a significant impact requiring such mitigation. Text has been added to page 13-38 of the final EIR, Volume II, to discuss the issue of grade separations.

Robinson Canyon Road has been observed to carry as many as 28 vehicles per hour during peak summer weekends. More typical weekday traffic volumes, however, peak at only 12 vehicles per hour. The 20 weekday peak-hour vehicle trips added by buildout of the Santa Lucia Preserve would cause the weekday peak-hour volumes to be close to the maximum that has been observed on the summer weekends.

Drivers going uphill in the canyon section (between Mileposts 4.0 and 8.0) of Robinson Canyon Road currently encounter on the average three or four opposing vehicles on weekday and weekend peak hours. The Rancho San Carlos CDP-GMPAP project would increase the average encounters by one to five opposing vehicles. Potential buildout of the Santa Lucia Preserve would increase this to an average of six encounters of opposing vehicles in the canyon section of Robinson Canyon Road during weekday and weekend peak hours. The number of encounters would be less during other hours of the day.

A two-lane rural road with 9-foot lanes, no passing, and no shoulders can carry a maximum of 990 vehicles per hour (total of both directions) in mountainous terrain (Transportation Research Board 1985). Robinson Canyon Road has 8-foot lanes in most sections and would therefore be expected to carry less traffic. The existing and future traffic volumes with build-out are still much less than the physical traffic-carrying capacity of Robinson Canyon Road.

The traffic added by buildout of the Santa Lucia Preserve would not change the level of service of Robinson Canyon Road.

The maximum speed limit on Robinson Canyon Road is not 55 miles per hour (mph). It is set by California's "Basic Speed Law", which states: "No person shall drive a vehicle upon a highway at a speed greater than is reasonable or prudent having due regard for weather, visibility, and the traffic on, and the surface and width of, the highway, and in no event at a speed which endangers the safety of person or property." Posted speed limits supplement but do not replace this law.

250. Page 2-8 in the final EIR, Volume II, has been revised to acknowledge the conflict in the name of this road. For clarity and because all of the application materials refer to the road as San Clemente Road, the EIR text has been revised to call the road "San Clemente Road (Dormody Road)".

251. Regarding road width and width of bridges on Robinson Canyon Road, refer to the response to Comment 249 above.

252. Refer to response to Comment 250 above.

253. The commenter's personal observations are noted; however, no records of these accidents are available at the Monterey County Department of Public Works, except the ones noted on page 13-20 of the draft EIR.

254. No official statements that can be cited in the EIR are available from Caltrans on this subject. Caltrans received the NOP and NOA for this EIR.

255. Figure 13-5 has been corrected to show this change. The corrected figure is included in the errata.

256. The EIR assumes that about 80% of the trips generated by the units in the Carmel Valley Master Plan Area are external to the site, compared with 70% for the CDP-GMPAP area. This assumption reflects the proximity of these units to Carmel Valley Road. The visitor accommodations are also projected to generate about 696 trips per day, which accounts for the trips specified in the comment.

Lots 1-9 and Lots 187-200 are closer to Carmel Valley Road than to the ranch center (a total of 24 lots). The average distance to the closest off-ranch shopping for these lots is 6 miles. The lots represent 10% of the CDP-GMPAP and 8% of the total buildout lots. All other lots in the Santa Lucia Preserve will be much closer to the ranch center than Carmel Valley shopping.

257. These plans will be available at the Monterey County Department of Public Works for review by interested parties. The minimum width of Rancho San Carlos Road will be 18 feet and will only be applied where construction of two 10-foot lanes would require removal of one or more large trees. There are only a few of these locations, and the narrow section will only be long enough to function as a transition around the tree being avoided. Emergency access

and evacuations would not be affected. The design of the internal road system will comply with county standards and be subject to county review.

258. Monterey County Department of Public Works will review all internal roadway plans before they are implemented to ensure that they meet the county standards and that they are adequate for emergency access and evacuation. The project site can be reached by Rancho San Carlos Road and Robinson Canyon Road. In case of an emergency, such as road closure due to landslides on one road, access to the site can be obtained via the other road.

259. The applicant is recommending several measures that would minimize traffic impacts on Robinson Canyon Road. These measures are listed on page 13-29 of the draft EIR.

Because of the many constraints on Robinson Canyon Road listed above in response to Comment 250, the travel time along Robinson Canyon Road is the same as along Rancho San Carlos Road although the distance along Robinson Canyon Road is less. Test runs were made to judge the comfortable speed along both routes. Although it is possible to drive faster, the average comfortable speed along Robinson Canyon Road was about 22 mph. The average comfortable speed along Rancho San Carlos Road was about 29 mph. After improvements are made to Rancho San Carlos Road, the average speed is expected to increase to 35 mph. Bridges to separate intersections would be effective in preventing a small amount of traffic from using Robinson Canyon Road (17-20 p.m. peak-hour trips); however, the cost to visual and environmental resources would be high, and emergency response and evacuation times would be affected.

260. This segment will only be used for an east-west link and has adequate width, gradient, and sight distance.

261. Refer to response to comment 250. San Clemente Road has been changed to Dormody Road in Volume II of the final EIR. Robinson Canyon Road will be improved to county standards and county sight distance and intersection design standards in the San Francisquito Flat area. The county road design standards are designed for roadways carrying significantly higher volumes than are projected at buildout for Robinson Canyon Road, and thus no problems should arise with new road intersections.

The project impacts on Robinson Canyon Road are expected to be minimal. Nevertheless, the applicant has offered several measures that would minimize traffic impacts on Robinson Canyon Road. These measures are listed on page 13-29 of the draft EIR. The applicant, Monterey County Department of Public Works, and the EIR preparers have also examined additional measures, including tunnels and grade separations.

262. The trip rates for the Santa Lucia Preserve represent an average of trip generation for all houses on the preserve. It is likely that some houses will generate more trips than average and others will generate less, depending on the characteristic of the homeowners. It is also likely that travel patterns will differ from the average depending on the location of individual

houses; residents near Carmel Valley Road may be more likely to travel toward Carmel Valley than the average resident, and residents nearer the ranch center may be more likely to make heavier use of the on-ranch facilities. On average, the residents on the project site are expected to generate traffic similar to that of the Via Los Tulares development.

The project is projected to generate 2,267 trips per day, as shown on Table 13-10 of the draft EIR.

263. The trip generation analysis uses the best available data obtained from surveys of other similar developments. The rates, however, that are normally used for residential developments do not apply to a community like the proposed project, where residential units are located a significant distance from other developments, and commercial and residential uses are provided for the residents.

264. Employee trips have been projected for the proposed project and are shown on Table 13-10.

265. Segment 6 of Carmel Valley Road is currently operating at an unacceptable level without the proposed project. The addition of traffic by any project will cause significant impacts on this segment. The proposed project will contribute 22 peak-hour trips. Although the proposed project will provide measures to mitigate impacts that are caused primarily by the proposed project, it is inequitable to require the proposed project to mitigate impacts that have been caused, to a large extent, by others.

Monterey County has adopted a fee ordinance, which establishes development fees to fund mitigation measures. The improvements that will be funded by the applicant's contribution will be determined at a later date by Monterey County Department of Public Works. The mitigation measures recommended in the EIR are consistent with this ordinance.

266. Refer to the response to Comment 261 above.

267. Rancho San Carlos Road would be widened to be 18-20 feet. Robinson Canyon Road is 9.5-18 feet wide. Rancho San Carlos Road would provide a faster, safer alternative to Robinson Canyon Road.

268. Plans for the driveways and the Rancho San Carlos Bridge are not yet available. These plans would be approved by Monterey County Department of Public Works before implementation. The pedestrian portion will be attached to the outside of the one side of the bridge and will be completely separated from vehicular traffic.

269. Refer to the response to Comment 265 above. The Monterey County Board of Supervisors decides which mitigation measure (signal versus an underpass) should be implemented for the intersection of Carmel Valley Road and Rancho San Carlos Road.

270. The applicant is recommending several measures that would minimize traffic impacts on Robinson Canyon Road. These measures are listed on page 13-29 of the draft EIR.

271. Dam construction would be a temporary impact, rather than a future cumulative impact.

272. The proposed project is not expected to contribute 1,200 trips per day to Robinson Canyon Road. The construction traffic would not be permitted to use Robinson Canyon Road, except the segments used for the east-west link.

273. The impacts of truck traffic on public roads would not be significant. The EIR recommends that a traffic control plan be prepared for the construction site before the start of construction. This plan would minimize project construction traffic impacts. Any damage to public roads caused by the proposed project construction will be repaired. Carmel Valley Road is designed to carry truck traffic. Truck activity on Carmel Valley Road will be minimized by the use of an onsite aggregate borrow area and the quarry. Truckers will not be allowed to routinely travel to the site in unloaded trucks.

274. The roadways will be designed to meet the county's design and safety standards.

275. The discussion of asphalt plant locations has been modified in the final EIR to delete the reference to asphalt plants in Monterey or Marina.

276. EPA has not developed emission standards for fireplaces. Currently, EPA's emission standards apply only to wood-burning stoves and fireplace inserts.

277. Page 15-4 in Chapter 15, "Noise", of the final EIR has been amended to indicate that the Sportsmen's Club, San Clemente Rancho, and White Rock Club have target ranges.

278. The lots identified on page 15-11 are the only lots located within 2,000-4,000 feet of the proposed mining site. Figure 6-4 depicts the location of the site.

279. A meaningful quantitative analysis of sound cannot be conducted from potential barking dogs, children, and occasional landscaping activities. The qualitative discussion of these sources of noise provided on page 15-15 of the draft EIR is considered to be adequate and provides a reasonable discussion and disclosure of these sources. Because of the high degree of separation between the proposed home sites and other surrounding offsite land uses, the impact of noise from these sources is considered less than significant.

280. As discussed on page 15-15 of the draft EIR, wildlife will avoid the immediate area of the home sites or other facilities solely because of noise. This impact is considered less than significant, and no changes to the draft EIR are required.

281. Page 15-4 of the draft EIR has been amended to include the San Clemente Airfield. Because the use of this field is so infrequent, the potential for an adverse impact is considered small. No other changes to the draft EIR are required.

282. The emergency response time is dependent on where the emergency occurs at the Santa Lucia Preserve. Please refer to Chapter 16, "Public Services and Utilities", of the EIR for a discussion of emergency response times.

283. County Service Areas (CSAs) have been used successfully for many years as a means to provide and finance public services in unincorporated areas. According to the 1994 Inventory of Local Agencies (Monterey County LAFCO, June 1994), Monterey County presently operates 43 CSAs dating back as far as 1959. A CSA generates its funding by levying a "special tax" on all real properties within the CSA. This special tax is levied each year by the board of supervisors based on the budget presented by the Director of Public Works.

Because local government fiscal years begin on July 1 and the first increment of property taxes is not collected until December, it is not uncommon for special districts to run out of funds during the first 5 months of their fiscal year. The board of supervisors frequently advances funds to such districts over this time by what are commonly called "dry-period loans". Government Code 25210.9a provides for both "dry-period loans" and a "revolving fund" to finance activities of CSAs. In both cases, the CSA must reimburse the county from its special tax proceeds, with interest at the current rate.

284. Based on conversation with Monterey Peninsula Water Management District staff, water for the Los Padres Reservoir has already been allocated. Two of the three Rancho San Carlos wells in Carmel Valley are used to irrigate the farm fields adjacent to the Carmel River. The third Carmel Valley well is leased and is used as part of the Rancho Cañada Country Club and is used to irrigate the golf course. These wells are not proposed to be used to supply water for the development of the Santa Lucia Preserve. The Carmel Valley wells could not be used to supply water to the Santa Lucia Preserve unless a permit were obtained from the Monterey Peninsula Water Management District to create or expand a water distribution system. As stated in the EIR, there are no plans to use these wells for the project. Given the conclusions reached by the applicant's water experts, the county's independent third-party reviewer, and the EIR water consultants regarding the identification and evaluation of the groundwater resources of the project, it is improbable and highly unlikely that the groundwater resources of the preserve will "prove to be inadequate".

285. The generation numbers for solid waste are based on full-time occupancy of residents at the Santa Lucia Preserve. The EIR states that because these homes will likely not be occupied full time, the generation rates are high. Even with the high generation rate, the Marina Landfill would be able to dispose of this additional solid waste. The EIR is not stating that retired persons produce less solid waste.

286. The Carmel Unified School District (CUSD) was contacted to determine the existing conditions of the schools. Year-round school is a viable alternative that could not be implemented by anyone except the CUSD because it is not within the jurisdiction or responsibility of the applicant or county.

287. Because the potential increased demand for additional police officers is a less-than-significant impact and the proposed project includes security staff, the need for police assistance should be minimal and there will not be a significant loss of police protection to the Carmel Valley when police officers are called to the Santa Lucia Preserve.

288. Exceptions to Ordinance 3600 are granted by the reviewing authority. In section 18.56.030 ("Definitions"), the reviewing authority is the Director of the Board of Forestry and Fire Protection, his or her designee, including local fire districts, sharing jurisdiction in State Responsibility Areas.

289. The maximum response time to any incident in the project area will be approximately 15 minutes. Full-time staff of the Stewardship Company will be trained in wildland and structural firefighting techniques. This staff will be augmented by a trained volunteer fire department.

290. The number of swimming pools that might be built in the project is currently unknown. However, the unit water demand of 0.75 acre-feet per dwelling unit used in the water demand evaluation, based on a review of actual water use, water use estimates used for other proposed projects in Monterey County and demand information from local agencies, is higher than numbers reviewed, which typically ranged from 0.2 to 0.5 acre-feet per year. Therefore, 0.75 acre-feet per year appears to be a conservative estimate and should indirectly account for swimming pool use at some of the units. As for water use for pools, the Monterey Peninsula Water Management District provided an average annual swimming pool use value of 0.026 acre-feet per year per 100 feet of pool surface in the 1991 version of the district's Table II, "Projected Water Use".

291. According to Figure 8-5 of the EIR, "Locations of Existing and Proposed Future Water Supply Wells", no supply wells are currently located in Phase I. Future well(s) located in that phase have an unknown discharge rate. However, the fire demand will be met by water storage tanks located throughout the project area, and swimming pools.

292. A CSA can annex new properties into its service area even if the property is not included in the development. Requirements for this annexation include (but are not limited to) a request by the homeowner, an application for the annexation, and a public hearing.

293. This recommendation for a mitigation measure to avoid this site has been incorporated into Volume II of the final EIR.

294. Social friction is not an environmental issue required to be evaluated under CEQA. The Monterey County Board of Supervisors will consider this comment when it takes action on the proposed project.

295. Text has been added to Chapter 19, "Cumulative Impacts", to discuss the cumulative effects of construction of the new Los Padres Dam concurrent with the proposed project.

296. Refer to response to Comment 250 above.

297. The EIR explains the rationale for suggesting that the loss of 2,000 acres will be largely mitigated because of the enhancement associated with improved management that would occur with the proposed project. The cumulative impact, however, has been identified as significant.

298. This word has been added.

399. A 150-lot alternative is not considered feasible by the project applicant. The EIR concludes that there is a safe yield to provide to the proposed project.

300. The alternatives considered in the draft EIR are adequate. Refer to the response to Comment 6 from Alexander T. Henson.

301. The rationale for rejecting this alternative is explained in Table 20-1 of Chapter 20 of the EIR under "Results of Screening".

302. The ranch center would provide a general store, post office, gas station, specialty retail, offices, cafe, and remote banking services (i.e., ATM). These uses will reduce the number of offsite trips, but of course would not preclude the need for offsite trips for meeting the needs of residents. The rationale for rejecting a no-commercial alternative is provided in Table 20-1 of the EIR under "Results of Screening".

303. This alternative would accommodate fewer visitor facilities and therefore have less environmental impact, as described in the analysis.

304. A golf course in the Mesa area would have to have access from Robinson Canyon Road because it is the closest main road. Otherwise, a new access road would have to be developed. The rationale for rejecting the Potrero site is provided in the "Results of Screening" column in Table 20-1. The applicant is considering only the proposed site for the golf trail, not the other sites alluded to in this comment. The applicant has no intention of applying for any other golf course location.

305. The EIR accurately evaluates the visual impacts of this alternative.

306. The Cattle Grazing Plan could be implemented without the development. The Cattle Grazing Plan is part of the application; the county, however, has no authority to require the implementation of the grazing plan outside the context of the application.

307. It is important to remember that the Existing Lots of Record Alternative is a No-Project Alternative. Refer to response to Comment 6 from Alexander T. Henson.

308. The impact analysis has been revised to include this information.

309. This alternative reduces groundwater demand, traffic impacts, and public services demand and is therefore evaluated in this chapter.

310. This alternative is adequately analyzed in the EIR.

311. The Monterey County Board of Supervisors will consider this comment when it takes action on the project.

312. This chapter has been modified to discuss more clearly the environmentally superior alternative.

313. This has been corrected in Volume II of the final EIR.

314. A full-scale map is available for review at the Monterey County Planning and Building Inspection Department. A summary has been provided for this appendix in the final EIR.

315. Refer to response to Comment 250 above.

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CARMEL, CA.,
408-659-2111
FAX# 408-659-5934

July 14, 1995

LETTER OF TRANSMITTAL:

Wanda Hickman
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240 Church St., North Wing, Suite 116
Salinas, CA., 93901

FAX # 408-755-5487

Addendum # 1 to Page 15, to our response to the DEIR of Santa Lucia Preserve. Please add to Financial Responsibility Section.

Who are the owners of Rancho San Carlos? List all owners names and addresses. List the names and current addresses of all Limited Partners, Corporations, and Holders of Interest in Development Partnerships. Include breakdown of Chamisal Partnership, Las Garzas Partnership, A Plus Co. Ltd., Pacific Union, Rancho San Carlos Partnership, Daishinpan, Sanwa Bank, Grainger Trust, Lurie Company, Santa Lucia Trust and all other parties and individuals having an ownership or development rights to the Santa Lucia Preserve. The principal owner of Rancho San Carlos to the best of our knowledge is the Sanwa Bank of Tokyo, Japan, but this information is somewhat clouded and should be brought out and made accurate. 1

Currently, U.S. trade relationships with Japanese institutions are quite one sided. Both countries have questionable monetary policies. State the method the developers will use if money is not provided by the owners for buildout. State who will be responsible for completion of the project. To mitigate, provide a binding letter of intent from foreign owner to Monterey County that development money will be available to complete the project in a timely manner. Place development money in a United State's institutional escrow fund. Do not allow the sale of any lots until completion of all infrastructure.

Page 18-5 - Social Effects (Please add to additional comments, Section II, Page 3). Define property rights. State the rights that 2

large groups of investors and foreign financial institutions have to jeopardize the property rights of local lifetime tax paying citizens. State their right to take water from impacted streams, pollute the water that is left with chemicals, impact the local roads and destroy the viewshed of the public, and then lock everyone else out of their preserve and golf course for their own exclusive use. To mitigate, protect the rights of the adjoining properties. Place safeguards on conditions of approval including setbacks where adjoining property is effected, require physical structures to keep Preserve traffic off Robinson Canyon Road. One could reason if the public is excluded from Preserve lands then Preserve traffic should not be allowed to further impact Robinson Canyon Road. If the public can not use the golf course, golf course owners should not be allowed to further impact public trust water by depleting the supply or contaminating purity of water with chemical runoff. These items must be addressed in the EIR. 2

Please add to Fire Protection Section - Page 16-16. Some of the house sites on Long Ridge will be served by pressure pumps from water tanks. State methods that will be used to obtain fire fighting water to these houses if there is a power outage caused by the fire. 3

Sincerely,

Michael H. Dormody

Donna Dormody

1. The type of information requested in this comment is not required by CEQA in an EIR. No changes to the draft EIR are required.

2. The project applicant is seeking entitlements (i.e., rights) to develop its property as outlined in the comprehensive development plan and the combined development permit applications. These entitlements will be given only after processes defined by the local, state, and federal governments have been properly completed. The rights of nearby property owners and the public are considered in this entitlement process.

   The effects of the golf course on water demand are discussed in Chapter 8, "Groundwater Hydrology, Stream Base Flow, and Water Supply and Demand", of the draft EIR and the effects on runoff are discussed in Chapter 9, "Runoff, Flooding, and Water Quality" of the draft EIR.

3. Gas-powered pressure pumps and standby generators will be used to obtain water for firefighting in the event of a power outage. Additionally, all water tanks will be accessible by fire trucks with accessory hookups to supply additional water for firefighting (Perkins pers. comm.).

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Section Two - Additional comments to our July 6, 1995, answers and comments to the DEIR of the Santa Lucia Preserve.

Weather - Weather for the Santa Lucia Preserve has not been addressed in depth. Provide temperature charts which indicate locations of snow and ice in the higher elevations. Show number of days of ground fog in the San Francisquito Flats. Rainfall charts for the drainages of the Preserve would also be helpful. Provide a chart indicating how water demand increases as temperatures rise. Compare the distinct weather zones, for instance Potero Canyon in lower Carmel Valley elevations with San Clemente Flats in the higher elevations. Show which sections of Robinson Canyon Road freeze in winter with black ice. Show what sections of Robinson Canyon Road are enshrouded with fog which has "blind visibility" many nights of the summer months. 1

Clustering - Monterey County requires in their Land Use Designation that "housing must be clustered" . Define the term "clustering". Provide legible maps of all house sites. Explain how units close to 1/2 mile from nearest neighbor complies with the County clustering condition. To mitigate, cluster houses in compliance with Monterey County's condition on the permit. 2

Fencing - Describe all fencing, walls, and other methods of containment to keep domestic animals on homesites. Tabulate combined total length of fencing. Explain how these physical divisions of land will effect wild life corridors. This must be addressed in the EIR. To mitigate fencing should not be allowed for units in preserve areas. 3

Edge effect on adjoining property - Explain in detail what the effect of estate housing when placed within a few hundred feet of adjoining property line will have on the adjoining land use. Will property that has been set aside for wildlife habitat be adversely effected if these areas of the adjoining property could no longer be used as preserve? Would they be allowed equal development rights? Elucidate how this could encourage urban sprawl. Define "urban sprawl" and County policy against it. To mitigate, do not allow structures within 450 feet of adjoining property lines. 4

Page 3-13, Monterey County General Plan Policy for water shed resources. Explain in detail how a golf course in a semi-arid area is in compliance of Policy 5.1, 5.1.1, and 5.1.2. Explain in detail how ranch wide water system with wells and sewage treatment plant comply with this policy. To mitigate, relocate the golf course. 5

Redwood Resources. Page 3-17 Define in depth long term water pumping effects on all redwood trees. To mitigate, all redwood trees over eight inches in diameter should be cataloged and numbered as to size, location and condition. These trees could be dedicated to the Conservancy or the Big Sur Land Trust. This mitigation should apply to Valley Oaks as well. 6

Explain in detail the characteristic of redwoods, their shallow root system and what they need to survive? What will be done to protect them? To mitigate, there should be no earth disturbance allowed within fifty feet or as much as necessary of any root system. Prohibit the removal of any water that would adversely impact these trees.

Investigate the effect tertiary water could have on redwood trees. To mitigate, allow no tertiary water to flow near or into redwood tree areas.

Viewshed Page 3-19 Monterey County General Plan Policy 26.1.9 "Sighting of new development visible from private viewing areas may be taken into consideration during subdivision process". Carmel Valley Master Plan, quotes verbatim this policy of the Monterey County General Plan. State how this project conforms with the General Plan and the Carmel Valley Master Plan on Dormody Road. State how many housing units will be within sight of Dormody Road. State how close these units will be to Dormody Road. Provide map to show exact distance these houses will be from Dormody Road. To mitigate, keep all structures out of sight of Dormody Road. 7

Page 3-19. The Northern portion of Robinson Canyon Road is located along the canyon bottom. It has no viewshed except the canyon bottom. The Southern portion of Robinson Canyon Road is located on TOP of the canyon and has spectacular vistas the San Francisquito Flats, portions of Long Ridge, the upper Garzas Creek area, Touche and the Mesa. Los Padres National Forest Ventana Wilderness Area, with Mount Carmel and the Big Pines are in the background. The DEIR is in error where it states the northern part of the road is the scenic portion. To clutter the southern portion unmatched vistas with housing, roadcuts, sewage treatment facilities, maintenance facilities, commercial retail area, hotel, lodge, equestrian center, two separate sports centers, employee 8

housing of approximately fifty units,plus parking lots for 350+ cars and a golf course is not acceptable to Monterey County viewshed policies. This must addressed further in the EIR. To mitigate, keep all structures and golf course out of sight of Robinson Canyon Road and Dormody Road. Conform with established County policies. Note: It is very distressing to read Monterey County's restrictions that were placed on this land use development and compare them with the developers application which blatantly ignores or changes the wordage of these conditions. These policies were placed to protect the land and must not be allowed to be abused to enrich the developers foreign bank accounts. 8

Page 18-5 Social Effects Most of the adjoining lands have been held by families for generations. These properties have not changed significantly in use since first homesteaded ("wilderness recreation") Everyone of these parcels will be significantly effected by a hotel, golf course and estate compounds scattered throughout the 20,000 acres of the Preserve. This effect must be further studied in the EIR. To mitigate keep all improvement west of Robinson Canyon Road, lower density, and relocated golf course. 9

18-5 Social Effects Placing a golf course on both sides of a private road which has a legal easement leading to a "Wilderness Recreational Area" will cause significant negative social interaction. Historically, Dormody Road, has been a quiet country road enjoyed by all for animal and wildflower viewing. Many of the licensees of San Clemente Rancho engage in hiking and bicycle riding on this roadway for pleasure and exercise. The establishment of the golf course will destroy these pleasures. Resentment and undercurrent toward the foreign investors could become hostile, especially in periods when San Clemente Creek is low or dry in front of these member's cabins and the golf course is being sprinkled. Out of control golf balls will be a significant hazard to travelers on Dormody Road. These impacts must be addressed in the EIR. To mitigate relocate golf course to an area with no right of ways through it (The Potero Canyon). 10

The Preserve - State the financial stability of the Trust. Provide measures to protect land dedicated to the Trust that this land will forever stay dedicated to a Preserve. To mitigate provide contingency plan in the event the Santa Lucia Preserve no longer exists. 11

Migratory wildlife - Provide a list of migratory birds which take refuge on lands and waters of Santa Lucia Preserve. List all measure that will 12

be taken to protect these species. Provide list of species that will nest within the Preserve before continuing their migration. 12

Warm water fisheries - Provide a complete list of areas which will contain warm water fisheries. Provide a map which shows drainages associated with these areas. Provide a list of warm water fish that will habitat these areas. List measures that will be taken to prevent these fish from entering cold water fish habitat (steelhead trout) in times of high water and flood. Explain in detail the effect warm water fish have on steelhead trout habitat. 13

Document fisheries and aquatic life on all drainages effected by this project in more detail. Note: numerous steelhead smolt were observed in Potero Creek and Robinson Canyon Creek quite recently (June and July 1995) These fisheries must be included in the EIR. What measures will be taken to protect them? Provide documentation of all central and southern California coastal streams which have lost their fisheries due to loss of water. Explain in detail what measures have been taken to reestablish these fisheries, if any. To mitigate, take no water from these already exhausted aquifers. 14

Water Rights - Explain State Water Right law and how it pertains to this development's legal right to remove water from Carmel River, Garzas Creek, San Clemente Creek, San Jose Creek, Hitchcock Canyon, Robinson Canyon and Potero Creek. List the amount of water the developer has historically removed from each of these drainages. Show documentation to verify the amounts of water taken from the above listed watersheds. To mitigate, take no water from fully impacted watersheds. 15

Bicycle Traffic - Page 3-31, states bicycles will not be allowed on Rancho San Carlos Road as it is winding and will only be widened to 24 foot maximum. Will that provision add additional bicycle traffic to Robinson Canyon Road which is only twelve foot wide in some sections, has steeper grades and more blind corners? This question must be addressed in the EIR. To mitigate, all bicycles must be legally kept off Robinson Canyon Road by County ordinance and appropriate signage. 16

Additional use of Robinson Canyon Road - Visits by friends, guests and relatives of employees living in the inclusionary housing located on Robinson Canyon Road must be fully addressed. Many low cost housing occupants can not afford the highly expensive collision and liability insurance for their vehicles. As the number of vehicles use increases on Robinson Canyon Road the potential for accidents also increases. To mitigate all ranch generated traffic with the exception of emergency 17

vehicles must be kept off Robinson Canyon Road by the use of bridges, automobile culverts, frontage ranch roads and shuttle buses. 17

Closing comments for Section Two - The more one studies the DEIR for the Santa Lucia Preserve, the more problems with this proposed project are brought to attention. If our reply seems disorganized and not in chronological order, we apologize. We can only attribute this to a poorly organized DEIR and a lack of adequate response time to reply to this huge document. 18

We hope to have the opportunity to discuss this project further in section three of our reply.

Sincerely,

Michael H. & Donna Dormody

Mr. & Mrs. Michael H. Dormody

Donna D. Dormody

Response to Comments from Michael and Donna Dormody (Section Two)

1. Many of the climate-related information items requested by the commenters (occurrence of local fog, road freezing, snow.) do not relate in an obvious way to impacts on water resources. Gradients in rainfall and plant evapotranspiration were considered in detail in the Comprehensive Hydrological Study prepared by the project applicant. A copy of the study is available for inspection at the Monterey County Planning and Building Inspection Department office.

2. See response to Comment 5 from Bruce Dormody.

3. Refer to response to Comment 11 from Bruce Dormody concerning fencing. The extensive detail requested on fencing and other containment for domestic animal cannot be determined at this time and is beyond the scope of this EIR. Refer to Chapter 11, "Biological Resources", of the EIR for a discussion of the effects of proposed development on wildlife. Also refer to response to the comment from the University of California at Santa Cruz concerning fragmentation.

4. The comments were somewhat difficult to decipher. However, the compatibility of the proposed project with surrounding land is evaluated in Chapter 3, "Land Use", of the EIR. Chapter 11, "Biological Resources", of the EIR evaluates the wildlife impacts of the proposed project. Growth inducement is evaluated in the summary section of the EIR.

5. The consistency assessment in Table 3-1 of the EIR provides this information.

6. A discussion of the effects of groundwater pumping on redwood trees in the riparian zone is included in the impact assessment related to riparian vegetation on pages 8-52 to 8-57 of the draft EIR. Redwood trees that do not occur in the riparian zone will not be affected by changes in groundwater levels. These trees rely heavily on fog drip, which contributes a significant amount of the soil moisture that is necessary for redwood survival.

   Reclaimed (tertiary) water would be used for irrigating the golf course only. It would not be disposed of by spray disposal or percolation in redwood groves.

   Redwood trees, along with other riparian vegetation, would be included in the monitoring and mitigation measure proposed in the draft EIR for impacts on riparian vegetation (pages 8-54 to 8-57).

7. Protection of private views is not specifically addressed by county policies for visual quality. Information on lots proposed for development can be found on the VTM.

8. The visual resources map (Figure 12-1 in Chapter 12, "Aesthetics", of the draft EIR) depicts the northern area of the project site as having the highest sensitivity, not the southern area.

9. The comment does not specify what significant social effects are anticipated with the proposed project.

10. These comments will be considered by the Monterey County Board of Supervisors. This chapter of the EIR focused on interactions with nearby developed communities.

11. This information is not required to be included in the EIR. The proposed project is intended to provide a preserve in perpetuity; there is no basis for a contingency "mitigation" in the event that the preserve no longer exists.

12. The common and scientific names of all resident and migratory birds mentioned in the text is provided in Appendix D. Further information on these species is given in the draft EIR (pages 11-3 to 11-16), and in the background reports (BioSystems Analysis 1992, 1994). CEQA does not require detailed discussions of all species that could occur at a project site, only rare and legally protected species, as defined on pages 11-17 and 11-18 of the draft EIR.

13. It is not within the scope of the project to provide a complete list of areas that contain warm-water fish species. The proposed project will not increase the chances of high water and flooding; therefore, these impacts are not relevant to the proposed project and are not analyzed in the EIR.

14. It is not within the scope of the project to document all central and southern California streams that have lost fisheries because of loss of water. The proposed project includes mitigation measures to prevent the reduction of the flow in the drainages of the project area and protect the fisheries resources.

15. The recent California State Water Resources Control Board (SWRCB) decision regarding the Carmel Valley declared that groundwater in the Carmel Valley alluvial groundwater basin shall be considered underflow of the Carmel River for the purposes of administering water rights. The decision does not apply to groundwater in the fractured bedrock uplands adjacent to the alluvial groundwater basin. Groundwater in those areas, including Rancho San Carlos, is still considered percolating groundwater. Owners of land overlying a groundwater system containing percolating groundwater are free to drill wells and pump groundwater for reasonable and beneficial uses on their land without obtaining a permit from the SWRCB. The constraints that require water use to be "reasonable and beneficial" are codified in Article X, Section 2 of the state constitution. Municipal and domestic water supply and golf course irrigation are uses that are normally considered reasonable and beneficial. The right to use percolating groundwater on overlying lands is governed by a principle called "correlative" water rights. Like riparian rights to surface water, correlative groundwater rights are not quantified. All owners of land overlying the groundwater system are entitled to a reasonable share of the groundwater. The overall intensity of water use for the Santa Lucia project is very low (278 af/yr of consumptive use on 19,900 acres) and certainly would be considered reasonable and beneficial. Thus, the project is considered consistent with water rights law.

16. Even though Rancho San Carlos Road is not appropriate for bicycle traffic, no legal provisions are proposed for keeping bicyclists off this road. Robinson Canyon Road is also not suitable for bicycle traffic. Before the county prevents bicycle travel on Robinson Canyon Road, other facilities that provide access to the area should be constructed for bicycle access.

17. Friends, guests, and relatives of employees living in the inclusionary housing can enter Rancho San Carlos only through the main gate. These trips generated by these visitors have been considered in the traffic analysis and are reflected in Table 13-10 of the EIR. The applicant is proposing to implement several measures to minimize the use of Robinson Canyon Road. These measures are listed on page 13-29 of the draft EIR.

18. The comments are noted.

PATRICK L. DORMODY
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(408) 624-2635

July 6, 1995

Monterey County Planning & Building
Inspection Department
c/o Ms. Wanda Hickman, Associate Planner
P.O. Box 1208
Salinas, CA 93902

Subject: Santa Lucia Preserve Project (PC94067), (PC94218)

Comments: by Patrick L. Dormody relating to the Draft Environmental Impact Report Dated May 19, 1995 (EIR No 94-005)

Dear Ms. Hickman:

I again state that I am a property owner off of Rancho San Carlos (RSC) Road. This is my primary residence, and is 120 yards to the East of RSC Road across Potrero Creek on the Carmel Valley Golf and Country Club's sixth fairway. The house faces directly West to RSC Road. I have lived at this location since 1968.

CHAPTER 13. TRAFFIC

There is no mention in the draft report on traffic using Valley Greens Drive to enter or leave RSC Road. This is a significant issue that was not addressed. RSC Bridge has a 15-ton weight limit so all heavy trucks and vehicles over that weight are required to use Valley Greens Drive. The residents of Carmel Valley Golf and Country Club (CVG&CC) will be subjected to increased construction traffic for years. Noise and exhaust will be severe. The roadway will deteriorate. 1

The RSC Road and Bridge were closed for several days in March of 1995 due to flooding of the Carmel River. Several weeks later the RSC Road and Bridge were closed again to remove a log jam that was lodged against and around the main support footings. The bridge must be higher, wider and have longer spans to support the RSC Santa Lucia Preserve Project.

When I built my residence off of RSC Road in 1968 there were not more than twenty (20) vehicle trips per day on RSC Road (private road with locked gate). Today there are several thousand and traffic is increasing every day. I have waited up to eight minutes to enter Carmel Valley Road.

Peak hour vehicle trips in the traffic Chapter 13 are under estimated. I have lived in the Carmel – Carmel Valley area since 1930. I can count the autos on RSC Road from my house. We don't need someone in Sacramento telling us what the Level of Service (LOS) is.

THE OLD RSC BRIDGE: 13-28

The existing bridge that crosses the Carmel River was constructed in 1958/59 by ranch hands and their friends. The bridge was transported in sections (pieces) from Northern California and placed on concrete columns; the wooden decking was replaced with a concrete deck (not meeting today's bridge specifications). The bridge was not constructed using licensed structural engineers. A sign on each site of the bridge designates a 15-ton vehicle weight limit which is not enforced. Trucks of all sizes, shapes and weight use the bridge. Automobiles have to back off the bridge when trucks and buses approach. The bridge is subject to major log jams in high water periods and has had to be closed while ranch personnel are called to remove logs and debris. At the present time a 12-inch diameter iron water line, electricity lines, T.V., and telephone lines have been attached to the bridge to serve the Quail Meadows project. 1

This bridge vibrates when autos and trucks cross (just stand underneath, listen and watch). The bridge moves under the weight of large and heavy trucks from one end to the other. Rancho San Carlos Bridge has no walking or bicycle lane. Now with the realignment and widening of Rancho San Carlos Road on both sides of the bridge and the entrance and exit changes at Carmel Valley Road, traffic to Rancho San Carlos, Carmel Valley Racquet Club, Quail Meadows Development, Carmel Valley Golf and Country Club, plus sightseers, construction workers, events and guests to all these places - Rancho San Carlos Road has been transformed from a one lane private ranch road to a major public thoroughfare. The bridge is 18 feet wide and the road and approach to the bridge are 24 feet wide. This is a significant issue of public safety. The Rancho San Carlos Bridge over the Carmel River must meet all the criteria for earthquake standards for bridges (the concrete decking is cracked in all directions). The bridge suffers from severe metal fatigue, hauling of blasting explosives should not be allowed on the RSC bridge.

MITIGATION MEASURE: Require RSC to design and construct a new bridge over the Carmel River to accommodate there Santa Lucia Preserve Project and traffic. 1

CHAPTER 9. RUNOFF. FLOODING AND WATER QUALITY

9-1 "The project applicant retained several consultants to prepare water resource, wastewater disposal, erosion control; and drainage studies to support the project."

As I've stated Potrero Creek runs directly in front of my residence and is on my property line and only 20 yards from the house.

In periods of severe weather flash flooding occurs in the creek. Signs of erosion on the creek banks are evident in many places.

In periods of high water in the Carmel River, it is impossible for Potrero Creek to empty (flow) into the Carmel River. Flooding occurs when water backs up on the golf course; and some residences of Valley Greens Circle are flooded. 2

On March 10th of 1995 this occured. Due to high flood water in the Carmel River and water coming down Potrero Creek. Potrero Creek does not flow all year in the lower section (1/2 Mile). Potrero Creek was 5' deep and 30' across at the height of the March 10th storm. In my area, another two feet the water would have been on my property and into my house.

The two (2) large culverts that pass under Valley Greens Drive were completely full. Had it not stopped raining or if they had become clogged the water would have gone over Valley Greens Drive closing the road. Possibly even washing the road out. When the creek did subside silt was left high on the creek banks and across the golf course. Erosion occured in front of my and other residences.

10-4 "Excess sedimentation occurs within all of the drainage of the proposed project area, specifically Potrero Canyon."

7-4 "The slope below Chamisal pass in Potrero Canyon is undergoing accelerated erosion."

7-5 "Applicants Proposed Mitigation Measure: Implement Erosion Control Plans. The applicant is proposing to implement Erosion Control Plans for the development areas and the golf trail." What and where is the plan? This is a significant issue that has not been properly addressed especially for Potrero Canyon flooding down stream..

MITIGATION MEASURE: **Construct retention ponds and catch basins to hold water during periods of potentially high water run off to protect residences along Potrero Creek.** 2

As I've stated before I am also a property owner off Robinson Canyon Road. The property is four tenth's (.04) of a mile from the entrance to White Rock Gun Club and is adjacent to Rancho San Carlos to the south, at an elevation of 2,200 feet. I travel Robinson Canyon Road several times each week.

I WILL BE AFFECTED MORE THAN ANY ONE ELSE BY THE SANTA LUCIA PRESERVE PROJECT BECAUSE OF MY PROPERTY LOCATION. 3

I HAVE NEVER BEEN ASKED BY ANY OF THE RANCHO SAN CARLOS PARTNERSHIP OR ANY OF THEIR CONSULTANTS AS TO MY CONCERNS AND THE IMPACT OF THEIR PROJECT ON MY PROPERTY: (Again for the record)

CHAPTER 16. PUBLIC SERVICES AND UTILITIES

16-16 FIRE PROTECTION: "The proposed project will result in an increase of risk for fire hazards at the proposed project area." "A fire station is proposed to be built in the project area."

4

The problem of fire suppression and protection has not been adequately addressed. As an adjoining property owner I am greatly concerned that with all the proposed increased activity associated with this monumental development project, the chances of wild land fires are more apt to occur. A make-up of ranch hands and construction workers is not the answer to putting out fires and handling medical emergency's on over 100 miles of roads, and a response time with so many variables.

MITIGATION MEASURE: **RSC must have in place a full time, well trained, certified, (with the proper and adequate equipment) fire crew and first aid personnel. Augmented by many other qualified volunteers prior to any construction starting on RSC property. Also, an evacuation plan for residents and workers must be written and practiced in case of fire. For example: Robinson Canyon Road cut off - people from White Rock, San Clemente Ranch and other property owners must be allowed to evacuate using RSC Road. This is what I want and what they must be required to provide.**

NOTE:
RSC with 20,000 plus acres is compared to the size of the entire Monterey Peninsula which has 26 plus fire stations. 4

CHAPTER 12. AESTHETICS: The Patrick Dormody property overlooks the following areas of Rancho San Carlos (VIEW SHED):

1. San Francisquito Flats*
2. Long Ridge*
3. Chamisal Ridge*
4. Robinson Canyon Road
5. San Clemente Ridge*
6. Las Garzas Creek*
7. Rancho San Carlos - complex and lakes*
8. Pinyon Peak
9. Mesa
10. Vasquez Knob

* These areas are being planned as Rancho San Carlos' major development points, i.e., hotel, golf trail, recreation, commercial, residential, roads, water storage tanks, employee housing, etc. 5

The expansive views of these unspoiled lands from my property will be devastated with any development. This is a significant and sensitive issue to me.

12-5 The project site contains areas that are identified by Monterey County as "sensitive and highly sensitive visual resource areas that are visible from existing. potential, and proposed scenic routes." Then why are employee housing sites so close to Robinson Canyon Road? Surely RSC with its "Environmentally Sensitive Land" some 20,000 acres can come up with better location for employee housing than just off of the roadway. This is in total contradiction to their philosophy of sensitive land. No houses should be allowed on hills or slopes or land immediately adjacent to Robinson Canyon Road. Also, all employee housing should be located close to the employees' recreation center and out of site (example - Quail Meadows employee housing). 6

12-14 / 12-17 Robinson Canyon Road is a designated County Scenic Road and does not need employee housing built on hill slopes in many locations next to it regardless of height limit. 7

MITIGATION MEASURES: RELOCATE ALL DESIGNATED EMPLOYEE HOUSING ALONG ROBINSON CANYON ROAD WHERE IT CAN'T BE SEEN FROM ROBINSON CANYON ROADWAY - THIS IS WHAT I WANT. 7

12-24 "Some private residences have views of some of the project area, including San Francisquito Flat and surrounding hills and portions of other areas where private residences will be developed. The private residences are located 1.5 - 2 miles south of the project site." 8

This statement is erroneous and misleading. My property as stated is directly above some of the project areas. I look down not across to these points. "County policies for visual quality do not specifically address protection of views from private residences."

A water storage tank is shown directly in front of my viewshed. In other words when I look out over the project site the first thing I will see is this 500,000 gallon water storage tank. This is not acceptable and will not be tolerated.

MITIGATION MEASURE: PLACE WATER TANK ON EAST SIDE OF HILL BELOW RIDGE LINE (NOT ON RIDGE LINE) SO IT WILL BE OUT OF MY LINE OF SITE. SEE VESTING TENTATIVE MAP SHEET 13. ALL OTHER WATER STORAGE TANKS MUST BE OUT OF PUBLIC VIEW. NO EXCEPTIONS.

NOTE:
It is difficult to be objective in analyzing and commenting on any one topic when it is obvious that consultant's reports are slanted towards the project's developers. The Draft of Santa Lucia Preserve Project EIR is incomplete, not accurate, factual and contains misleading information and leaves a lot of unanswered questions. 9

The Monterey County Planning Department should be required to review all project plans and reports for accuracy and completeness before releasing them for public comments. There are many distorted facts - example - PROJECT PHASING.

Sincerely,

Patrick L. Dormody

Response to Comments from Patrick Dormody

1. Valley Greens Drive was not analyzed in the draft EIR because earlier traffic studies conducted for Santa Lucia Preserve indicated that the impact of this project on Valley Greens Drive would be minimal. The Traffic Report for Rancho San Carlos, prepared by Dowling Associates and dated April 22, 1994, indicated that Valley Greens Drive is currently carrying 122 vehicles during the p.m. peak hour. Buildout of the Santa Lucia Preserve and the Quail Meadows development would add about 278 vehicles to this road during the p.m. peak hour. This report also indicated that the intersection of Rancho San Carlos Road and Valley Greens Road, which is operating at level of service A under the existing conditions, will continue to operate at this level with the buildout of the Santa Lucia Preserve and other approved and proposed projects.

   The applicant is proposing to upgrade the Rancho San Carlos Road bridge across the Carmel Valley River to conform with American Association of State Highway and Transportation Officials (AASHTO) HS20-44 loading requirements to handle emergency vehicles. This exceeds the county and state standards that require that all new or refurbished bridges leading to or within a state responsibility area be designed for HS15-44 loadings, which is equivalent to a vehicle load limit of about 30 tons. In addition, the bridge would be widened to 20 feet, and a pedestrian footpath would be added to this bridge that would provide a physical separation between vehicles and pedestrians.

2. As described on pages 9-7 and 9-19 in Chapter 9, "Runoff, Flooding, and Water Quality", of the draft EIR, the project applicant will be required by Monterey County Water Resources Agency and Monterey County to attenuate floodflows from its development.

   County regulations determine the sizing of local infrastructure, such as the culverts under Valley Greens Drive. As described on page 9-17 of the draft EIR, culverts under secondary roads are designed to pass 10- to 25-year floodflows. Both the January and March 1995 storms resulted in total precipitation that exceeded the theoretical 100-year, 24-hour precipitation. Consequently, it is likely that much of the local storm drain infrastructure would be overwhelmed and localized flooding would occur, which is considered acceptable to the county.

   Sedimentation and erosion is a normal stream-building process that occurs during large flood events. The project applicant will be required to mitigate accelerated erosion caused by development activities as described on page 7-5 of the draft EIR.

3. Monterey County Board of Supervisors will consider the impacts of the proposed project on all resources and affected properties when it makes a decision on the proposed project. Monterey County Planning and Building Inspection Department followed the requirements under CEQA for public noticing, scoping, and review periods.

4. The EIR states that the potential exists for an increase in fire hazard; however, because the Fire Safety Management Plan was developed and will be implemented and a fire station and firefighter program will be located on site, the potential increase in fire hazard is considered a less-than-significant impact. Other methods to prevent fire hazards are included in the EIR. Additionally, the Stewardship Company will provide first-response emergency services (these employees are trained by the American Red Cross in CPR and first aid) and the county service area will contract with other agencies to provide ambulance and paramedic services for major medical emergencies. The Fire Safety Management Plan discusses the road network created on the vesting tentative map that provides safe ingress for firefighting personnel and equipment and also identifies safe egress for residents. An emergency evacuation plan will be created for the homeowners living in various regions of the property on a lot-by-lot basis, as well as those using or working in the commercial and recreational areas of the Santa Lucia Preserve.

5. The Patrick Dormody property is an area with various views to Rancho San Carlos. The location of the property provides views to the proposed development in the middleground zone. Areas of proposed development will be screened with vegetation and blended into the landscape with subdued earth-tone colors intended to maintain unity with surrounding vegetation. Also, county policies for visual quality do not specifically address protection of views from private residences.

6. Employee housing is located beyond the 100-foot county buffer zone along the scenic road. It is designed to blend into the landscape, as described on page 12-15 of draft EIR. For these reasons, impacts of these structures are considered less than significant.

7. Proposed employee housing along Robinson Canyon Road will be sited near existing vegetation to blend into the landscape. Although portions of new structures would be visible, the changes would not substantially reduce the intactness, vividness, or unity of views of the area from a public viewing area and sensitive ridgelines would not be visually affected. Also refer to response to Comment 6 above.

8. The private residences are located about 0.5-2 miles south of the project site. Portions of the project site in designated sensitive and highly sensitive visual resource areas are generally within middleground and background distance zones and occupy a portion of the overall viewshed for views from private residences.

   The water storage tank would probably be visible from portions of the Patrick Dormody property located southeast of the tank. Although this tank may be visible from this private property, Monterey County policies for visual quality do not specifically address views from private lands. Because of this, and according to the criteria for significance identified in the draft EIR, this impact is considered less than significant.

9. The "rule of reason standard" is applied to judicial review of EIR contents. The courts do not hold an agency to a standard of absolute perfection but require only that an EIR show that an agency has made an objective, good-faith attempt at full disclosure. The Monterey County Planning and Building Inspection Department believes that this final EIR represents such an effort.

GEORGE E. FERGUSON
24795 Outlook Drive
Carmel, CA 93923

7-7-1995

Ms. Wanda Hickman, Project, Planner
Monterey County Planning & Building Inspection Department
P.O. Box 1208
Salinas, CA 93902

Project: EIR 94-005

Dear Ms. Hickman:

I was at the Sierra Club forum last night and it was stated that 6 acres of redwoods would be destroyed as a result of the Santa Lucia Project. The people cited the DEIR as the source of this statement.

I understood that only 3 redwood trees would be lost as a result of the entire project. I think that this issue needs to be clarified because the statement as it stands now is very misleading and the project is being maligned because of it. 1

Six acres of trees is a lot different than 3 trees!

Sincerely,

George E. Ferguson

George E. Ferguson

cc. Board of supervisors

Response to Comment from George E. Ferguson

1. The vesting tentative map shows that 5.1 acres of upland redwood forest and 0.5 acre of redwood riparian forest are located within settled lands (BioSystems Analysis 1994). Because these areas will not be set aside as preserve lands, a worst-case scenario approach was adopted for the impact analysis and it was assumed that these areas had potential to be lost or degraded. However, only two redwood trees will actually be removed by proposed development (Ralph Osterling Consultants 1994). Thus, the great majority of redwood trees within the redwood forests are not planned for removal.

June 30, 1995

Monterey County Planning &
Building Inspection Dept.
P. O. Box 1208
Salinas, CA 93902

Attention: Wanda A. Hickman

Re: Draft EIR Santa Lucia Preserve, EIR #94-005

Dear Gentlepersons:

I am a neighboring landowner of the Rancho San Carlos. I am an owner of both riparian and appropriative rights of water flowing in the San Jose Creek. I am extremely concerned over the potential for depletion of the water flow down the San Jose Creek. 1

The San Jose Creek aquifer is not just one creek. Both the North Fork (Animas) and the South Fork run through or along the Fish Ranch property before merging to become the main San Jose Creek. These creeks merge above our intake valve and pump, which is a primary source of our ranch water.

Redwood trees, springs, and riparian vegetation are all dependent on the San Jose Creek aquifer.

Unfortunately, at least from my perspective, the focus of the Environmental Impact Report is on impacts on the Carmel Valley aquifer. The result is that adverse environmental impacts on the two forks of the San Jose Creek and the vegetation the aquifer system may support have not received appropriate scrutiny.

Just as an example of the foregoing statements, I submit the following:

1. Page 8-58, EIR, states, ". . . 24% of the total streamflow depletion would occur in the San Jose Creek watershed, which is not tributary to the Carmel River." 2

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2. Page 8-19, EIR, states that the San Jose Creek groundwater demand is put at 18 acre feet per year with a 9 acre feet per year return. 3

3. Page 8-48, EIR, states, "The San Jose Creek is not included in the gaging program." 4

4. Page 8-49, EIR, states, stream segments downstream of the Rancho San Carlos property line "may be ignored." 5

Many months in both wet and dry years we are unable to pump any water at all from the San Jose Creek. I am extremely concerned at the proposed amount of depletion. 6

I am also extremely concerned that there are 24 existing or proposed wells to be drilled either within or immediately on the border of the San Jose Creek watershed boundary. See Figure 8-5, page 8-23 of the EIR. 7

The information supplied in the EIR is inadequate to determine exactly where these locations are. I need to see a topographical map with the actual and proposed well locations drawn thereon within the Rancho San Carlos boundaries in order to be fully informed as to the impact on the San Jose Creek watershed and aquifer.

With reference to page 8-48 and 8-55, my opinion is that the streamflow of both the North and South Forks of the San Jose Creek, as well as the aquifer withdrawal and riparian vegetation impact should be monitored every year, not every three years. If there is damage, habitat modification or degredation, it can and must be immediately addressed. A mitigation monitoring plan must be established for such effects. Stream gaging alone is not adequate. 8

Water is obviously my primary concern. However, on page 16-23 and opposite page 2-8, the developed areas appear to be extremely close to our boundary. From all I can discern, there is not an adquate agricultural setback of 100 to 150 feet on some of these proposals. While there are numerous references to view impacts from Carmel Valley areas, nothing is said in the EIR about the view impact on development so close to the Fish Ranch boundary. 9 10

Lastly, I am extremely concerned about increased fire hazard 11

in the back country. The private trail system is extremely close to the Fish Ranch in the back country, and there is also a projected public trail system near the Carmel River (see page 16-23). The Fire Hazard maps for Monterey County show high and very high fire hazard designations for this area. 11

In addition the specific comment and responses, I would appreciate being supplied with the information requested in this letter so that I may be more fully informed as to the impacts about which I am concerned, particularly with reference to water and secondly, with reference to view impact. 12

Sincerely,

Diana Fish

Diana Fish

1. Although the surface water drainage is divided into the north and south forks of San Jose Creek, the underlying fractured bedrock groundwater system is one continuous system. Groundwater in these upper watershed areas would tend to flow toward the nearest fork of the creek. The effect on surface flow below the confluence would equal the sum of the effects on the two forks.

   The increased consumptive use for the project would derive largely from streamflow depletion. Groundwater pumping would be distributed among the watersheds in proportion to their estimated water yields (principally a function of watershed area), not in proportion to the amount of water demand in each watershed. Thus, only 9 af/yr of net water demand (3.2% of total net demand for the project) would be located in the San Jose Creek watershed, but the water yield from that watershed is estimated to be 24% of the total needed for the project. Thus, net pumping from the San Jose Creek watershed would be 67 af/yr (24% of 278 af/yr).

   The project is designed to minimize streamflow depletions during summer base flow periods, when impacts on aquatic and riparian habitats and other water users would be most critical. This is accomplished by the Cattle Grazing Plan, which is expected to increase base flow above existing levels, and limiting groundwater pumping from wells within 1,000 feet of any base flow reach in a creek.

   In California, wells that intercept percolating groundwater can be developed for beneficial uses on the overlying lands without a water right. Domestic use is a beneficial use that has weight equal to environmental uses. The EIR properly identifies potential impacts of groundwater development and proposes measures to mitigate these impacts: reduced base flow, dewatering or otherwise reducing the extent of riparian habitat or wetlands, degradation of water quality, and reduction of fisheries habitat.

2. Refer to the response to Comment 1 above.

3. Refer to the response to Comment 1 above.

4. The rest of the sentence quoted in the comment explains why San Jose Creek was not included in the streamflow gaging program. The reason was not because impacts on San Jose Creek are unimportant; rather, they would be difficult to detect through streamflow gaging because of other factors affecting flows in that watershed.

5. The sentence quoted in the comment is out of context. The draft EIR stated that for four of the five creeks, reaches downstream of the Rancho San Carlos property boundary may be ignored in the monitoring program. This is because the property boundary is downstream of the reaches that would be directly affected by the project. Thus, there would be no further

changes in streamflow downstream of the property boundary, and the measured change at the property boundary would be the maximum change that might occur at any downstream location. This is not true in the case of Las Garzas Creek because the property boundary happens to be fairly high up in the watershed. In that watershed, the monitoring program needs to include areas downstream of the property boundary. By the same token, mitigation of impacts on flow in protected base flow reaches upstream of the property boundary would also mitigate impacts downstream of the property boundary, including impacts along San Jose Creek.

6. It is not surprising that direct diversion has proven to be an unreliable water supply at the commenter's ranch because existing streamflow in all of the creeks typically dwindles to a trickle in summer. This trickle generally is not large enough to support a diversion for significant offstream uses. Also, direct diversions from the creek in summer tend to have a very large adverse impact on aquatic habitat. The Santa Lucia Preserve project is designed to avoid impacts on summer base flow as much as possible by obtaining water from wells rather than by direct diversion and by avoiding the use of wells close to creeks as much as possible.

7. The number of water supply wells for the Santa Lucia Preserve project is large because the yield of each well is small. For comparison, the average yield of wells on Rancho San Carlos is only about 13 gallons per minute (gpm), compared to hundreds of gallons per minute for municipal and irrigation wells in the alluvial system of the Carmel Valley and over 1,000 gpm for large irrigation wells in the Salinas Valley.

   The EIR includes mitigation measures to minimize impacts on adjacent streams. Future wells will be sited in accordance with these mitigation measures. Detailed topographic maps showing locations of existing and proposed wells are available for inspection at the Monterey County Planning and Building Inspection Department office. Locations of future wells indicated on Figure 8-5 of the draft EIR are tentative.

8. San Jose Creek was considered for inclusion in the monitoring program but was not included for the reasons stated on page 8-48 of the draft EIR. It would be more accurate to estimate the impact on San Jose Creek by correlation with other creeks than by direct measurement because of the numerous other factors affecting flow in San Jose Creek.

   Small trends in vegetation pattern can be detected only over a long period of time (many years) because they are masked in the short term by large annual variations caused by unrelated factors such as wet and dry years, fire, pest outbreaks, and introduction of new species.

9. Lots 5, 7, and 8 are the closest to the commenter's property (Fish property) line. Lot lines for these lots are 50-150 feet from the edge of the Fish property. Homeland building envelopes within these lots are adequately set back; the closest homeland on Lot 8 to the Fish property is 100 feet from the edge of the Fish property.

10. The EIR focuses the impact analysis on important public viewing areas rather than views from adjacent private properties.

11. The proposed project includes a fire station, firefighters trained in wildland and structural firefighting techniques, fuel modification and fuel reduction, a fire safety management plan, and conforms with CDF and county standards.

12. The information requested (topographical map with actual and proposed well locations) is available at the Monterey County Planning and Building Inspection Department.

Michele Jennings
500 Casanova Ave.
Monterey, CA 93940

June 29, 1995

Monterey County Planning Department
P.O. Box 1208
Salinas, Calif. 93902

Attention: Wanda Hickman, Associate Planner

To Whom It May Concern:

I've recently reviewed the Draft Environmental Impact Report for Rancho San Carlos and the proposed Santa Lucia Preserve and one figure jumps out at me.

It would seem to me that basing per unit demand of water on .75 acre feet of water use per year is overly conservative -- in fact, that's an extraordinarily high figure. Where is the basis for this high number? Has the County Environmental Health Department review this figure?

Such a conservative number would, in fact, not only include water use for a single family home, but also an in-law cottage or domestic unit.

Please take this into consideration when you make a deter-mination as to the completeness of this document.

Yours truly,

Michele Jennings

Michele Jennings

Response to Comments from Michele Jennings

1. Refer to the response to Comment 1 from MCSI Water Systems Management, which provided data confirming that the water demand factor is probably high. The demand factor was developed by the project applicant in consultation with the Monterey County Environmental Health Department, Monterey County Water Resources Agency, and the Monterey Peninsula Water Management District prior to initiation of the EIR process.

John Lazor
Post Office Box 1574
Carmel Valley, California 93924

July 13, 1995

Wanda Hickman, Planner
Monterey County Planning Department
240 Church Street
Salinas, California

RE: San Carlos Ranch EIR

Dear Ms. Hickman,

A prelude to my comments...

Many years ago a local family began to despoil Carmel Valley; the quarry scar off of Carmel Valley Road at Brookdale Drive is evidence of their activities. They then moved their operations way up Robinson Canyon. They cut off the top of a mountain for an airstrip. Part of this then fell into the San Clemente Reservoir and the Peninsula lost a lot of its drinking water supply due to siltation. They ripped out majestic oaks and redwoods to build swimming pools, tennis courts and put close to 100 "cabins" here. Many "cabins" had septic systems so close to local creeks that failed to work properly. 1

I have been hearing a lot about the San Carlos Ranch EIR and I recently heard that this same family, who now has joined the Sierra Club and would have people believe they are environmentalists, want to destroy the beauty of San Francisquito Flats by requesting that the developer put in Los Angeles style freeway frontage roads to keep cars off of Robinson Canyon Road. They also request tunnels, and bridges for this same purpose.

Please have the EIR address the environmental impacts of covering wetlands, fields and wildflower meadows with these new freeway style frontage roads. Please assess the visual and environmental impacts of installing tunnels and bridges.

I come up this road to enjoy the scenic beauty, birds, etc. and think that this proposal would destroy the beauty of the area. While it is ridiculous, if this type of road and underpass/overpass is to be considered, please properly address the effects.

Sincerely,

John Lazor

1. The roadway improvements to be implemented are described on pages 13-28 and 13-29 in Chapter 13, "Traffic", of the draft EIR. "Freeway style" roads will not be constructed. Rather, upgrades such as widening Rancho San Carlos Road to include two 10-foot lanes and modifying the Rancho San Carlos Road bridge to meet current county standards will be made. Although it may have been suggested from other sources that tunnels and bridges be constructed to limit access from the plan area to Robinson Canyon Road, there are no plans or recommendations for such improvements.

TO: Wanda Hickman
Re: Santa Lucia Project
EIR 94-005

From: Patricia Lunt
26420 Via Petra
PO Box 631
Carmel, CA 93921

I am concerned about the lack of an index in the Draft EIR for the Santa Lucia Project. The lack of an index makes it very difficult to locate information. I propose a color-coded index be included in future EIRs. 1

I am very concerned about the impact another golf course will have on the Monterey Bay National Marine Sanctuary. All runoff from this development will ultimately reach the bay. I request that the EIR take into account the levels of pesticides in the bay and to what extent another golf course will raise those levels. I suggest a detailed study be done on how this development will effect the Sanctuary and the Los Padres National Forest. I suggest that the Monterey Bay National Marine Sanctuary approve any and all construction on the Santa Lucia Project due to its potential impact on the Sanctuary. 2

I am concerned about the use of pesticides on the golf course. Certain pesticides have been found to reduce shell size and thickness in bald eagles. The proposed golf course is very near the Los Padres National Forest which is being seeded with bald eagles. The DEIR does not address pesticide runoff from the golf course and the impact it may have on the recovering bald eagle population in the Los Padres National Forest. Will these pesticides be carried by the wind into nesting areas of bald eagles? What pesticides will be used on the golf course and will they have an adverse effect on the bald eagle population in the Los Padres Forest? At some point, these pesticides will find their way to the ocean. What affect will these pesticides have on the Monterey Bay National Marine Sanctuary? I want more information on the bald eagle population near the proposed golf course site to be included in future EIRs. I want any data available regarding any and all effects of pesticides on bald eagle populations in areas where similar projects have been constructed. I want a list of the pesticides to be used on the golf course and the manufacturers of these pesticides with their addresses and phone numbers to be listed in the next EIR. I want any and all studies of the effects of these pesticides to be included in the EIR. I suggest a study be done to determine what effect the use of pesticides will have on the recovering bald eagle population near the Santa Lucia Project. I suggest this study include the effect eating rodents that have ingested pesticides will have on bald eagle populations. I suggest this study include the impact pesticides will have on all resident birds, mammals, reptiles and amphibians. I suggest this study include the effect of pesticides on all egg-laying creatures and any way this golf course could adversely affect the Monterey Bay National Marine Sanctuary and the Los Padres National Forest. I suggest that the Monterey Bay National Marine Sanctuary approve any and all construction on the Santa Lucia Project due to its potential impact on the Sanctuary. 3

I am very concerned about the golf course. It raises many questions, none of which is adequately dealt with in the EIR. The golf course is to be located in a golden eagle habitat. The DEIR does not sufficiently address the impact the golf course may have on the birds. Will the removal of 380,000 cubic meters of soil and the ensuing dust, noise and pollution from heavy equipment disturb the eagles? I think it will. The DEIR does not address the impact this construction will have on small rodents which are a food source for golden eagles. I suggest a study be done on the golden eagle population in the proposed Santa Lucia Project area. I suggest a study be done on their food sources and the impact that a loss of food sources will have on the golden eagles in the project area. I want information on the impact similar projects have had on golden eagle populations in other areas. I suggest the golf course be put on hold until we know how it will effect these birds. 4

I am concerned about the removal of 380,000 cubic meters of dirt from the golf course site. Where is this dirt going? Is it coming down Rancho San Carlos or Robinson Canyon Road? If so, what impact will that have on traffic? Are those roads able to support such traffic? I suggest a detailed report on the dump site of the dirt removed for construction of the golf course. 5

I am concerned about the proposed removal of 78 landmark trees for construction of the golf course at the Santa Lucia Project. I suggest that no trees be removed and the golf course be moved to a less sensitive site. 6

I am concerned about the water supply for the Santa Lucia Project. How will pumping this water affect the Carmel Valley River and its aquifer? How will plant and animal life be effected by diminished flow from the creeks that flow through the project? I believe the DEIR grossly underestimates water usage for the project and does not adequately address the effects on plant and animal life. I suggest a detailed study on any and all possible effects pumping would have on the Carmel Valley River and its aquifer. I suggest the Santa Lucia Project be scaled down to accommodate existing well flow. 7

I am concerned about treatment of water at the well sights. What will this water be treated with and what are the effects of the treatment and treating agents on the environment and people? What happens to the byproduct of this treatment? Does it need special disposal? How much noise will this generate? If all water is treated at well sights, what effect will sixty or seventy of these sites have on the environment over a prolonged period of time? I want studies of this type of treatment at the well site included in the next DEIR as well as answers to my above questions. 8

I am very concerned about traffic issues raised by the Santa Lucia Project. I do not believe the DEIR has sufficiently addressed the increased traffic that will add to the existing problems at the mouth of Carmel Valley. I believe the DEIR grossly misjudges the impact this development will have on traffic at the intersections of Robinson Canyon and Rancho San Carlos Roads. The DEIR does not adequately take into account the bottleneck this increased traffic flow will create. I suggest the Santa Lucia Project be scaled down to accommodate existing roads and bridges. 9

I am very concerned that the DEIR allows up to four buildings on lots over ten acres. This allowance could drastically increase the number of dwellings in the project, greatly increasing the water usage, traffic congestion, sewage, pollution, etc. I suggest that only one habitable building be allowed per parcel, regardless of parcel size. 10

I am very concerned about the proposed quarry in the Santa Lucia Project. Will dynamite be used in this quarry? What effect will that have on wildlife? Where will all the slag from the quarry go? Will it come down Robinson Canyon Road or dumped on site? If it comes down Robinson Canyon Road, what effect will that have on traffic and can that road support continuous use by heavy equipment? If the slag is dumped on site, where is this dump site and what effect will it have on flora and fauna? What will happen to the air quality of Carmel Valley once asphalt production is underway? What effect will runoff from the quarry have on the quality of Carmel Valley water? Will it raise the level of chemicals and minerals in our water supply? What effect will this quarry and its runoff have on the Monterey Bay National Marine Sanctuary? What will happen to the quarry once all the roads are built? I request that a detailed study that includes every aspect of the quarry's operation and its effect on wildlife be included in the next EIR. I suggest this study include reports of quarry operation in other areas of the country and any environmental impacts that have been encountered at these sites. I want this report to include answers to questions raised above. I suggest that the Monterey Bay National Marine Sanctuary approve any and all construction on the Santa Lucia Project due to its potential impact on the Sanctuary | 11

I request that impacts from all proposed mitigation be examined. I want evidence that these measures have worked previously and are self sustaining. | 12

I am concerned about the impact the Santa Lucia Project will have on local schools. I suggest plans for a school be included in the Santa Lucia Project. | 13

I am very concerned about police and fire protection for the project. I do not believe help could arrive in time from Carmel Valley to save lives and property if a fire broke out or a police emergency occurred. I suggest the Santa Lucia Project include plans for one police station and one fire station for every 260 acres of developed land. | 14

I am very concerned about how this project will impact the quality of life in Carmel Valley. The size and density of this development are not compatible with the best use of the land and will adversely affect everyone, not to mention the potential damage to the Los Padres National Forest and the Monterey Bay National Marine Sanctuary. I suggest this project be scaled down to one tenth its present size; 36 buildable lots, no shopping center, no golf course, with ultimate approval still going to the Monterey Bay National Marine Sanctuary. | 15

Thank you
Patty Lunt

1. CEQA does not require an EIR to contain an index.

2. As described on pages 9-13 and 9-14 in Chapter 9, "Runoff, Flooding, and Water Quality", of the draft EIR, NOAA provides review of NPDES permits and waste discharge requirements to ensure that Sanctuary resources are protected. The golf trail use permit application identifies pesticides that are commonly used in the region for turf management. The application package also describes measures to protect water quality. Specific measures include capturing runoff from the managed turf areas and storing it at the golf trail for subsequent irrigation use and piping up gradient runoff around managed areas and returning it through the natural drainages.

   It is beyond the scope of this EIR to evaluate pollutant loadings in the Sanctuary or the Las Padres National Forest.

   NOAA does not have the legal authority to regulate development; however, it has the authority to ensure that existing rules and regulations are followed.

3. The golf trail use permit application identifies pesticides that are commonly used in the region for turf management. All pesticides are assumed to be approved for their proposed uses and applied in accordance with the label instructions, as required by federal law. Consequently, the pesticide use is not considered to result in an adverse impact.

   An EIR is a public information planning document. It is beyond the scope and purpose of this document to analyze numerous pesticides that may or may not be used on all animal species in the region. Federal agencies such as EPA, USDA, and FDA, evaluate the toxicology of pesticides in their approval processes.

4. This comment expresses concerns that the draft EIR does not sufficiently address the potential impacts of the golf trail on golden eagles, but the commenter does not distinguish between nesting and foraging habitat for this species. As referenced in the draft EIR (page 11-35), BioSystems Analysis (1994) prepared a Special-Status Wildlife and Botanical Resources report for the golf trail application. Suitable habitats for special-status species, including oak and riparian habitats, are present at this site, and no state-listed or federally listed species was found within the proposed golf trail (draft EIR, page 11-36).

   Golden eagles are frequently observed at higher elevations of the Santa Lucia Preserve, and possible nesting pairs have been noted near Peñon Peak and Hill's Ridge (draft EIR, Table 11-3). Since both of these locations are miles from the proposed golf trail, golden eagle nesting habitat would not be affected by implementation of this phase of the project. Mitigation measures for the loss of golden eagle nesting and foraging habitat were provided in the BioSystems Analysis report and the Resource Management Plan for special-status

species observed along the golf trial. Overall, the loss of 53 acres of oak woodlands and savannas and 45 acres of grasslands (i.e., potential golden eagle foraging habitat) due to golf trail construction would represent only 1.8% of the suitable foraging habitat for this species at the Santa Lucia Preserve under the proposed project (draft EIR, Table 11-4, page 11-37). Therefore, this impact was considered less than significant.

5. Cut-and-fill materials will balance within the project site (i.e., no material will be transported onto the site and no material will be hauled off the site). Most of the material excavated at the golf trail will be used at the golf trail as fill. Robinson Canyon and Rancho San Carlos Roads will probably be used to haul soil and rock to one part of the site to another. There will be no need for a dump site. For Phase 1 of the project, all hauling of soil and rock will be done using onsite roads. Only a crossing of Robinson Canyon Road will be required for subsequent phases of the project.

6. The EIR documents this impact; the Monterey County Board of Supervisors will consider this recommendation when it makes a decision on the project.

7. The draft EIR discusses each of the issues raised in the comment in considerable detail: effects on Carmel Valley groundwater and water supply (pages 8-51 to 8-52 and 8-57 to 8-60), and impacts on plant and animal life related to decreased streamflow (pages 8-39 to 8-57).

8. Compared to many surface water supplies, groundwater typically requires relatively little treatment prior to potable use. Water from each well will be treated at the wellhead to meet State of California drinking water standards. This will involve chlorination at all wells and removal of iron and manganese at some wells. These are all common treatment processes for municipal and domestic groundwater supplies. Chlorination does not produce a solid waste material.

9. The draft EIR analyzes the traffic impacts of the proposed project on nine roadway segments of Carmel Valley Road and six intersections in the project vicinity. Several significant traffic impacts of the project were identified. Mitigation measures were recommended to reduce these impacts to a less-than-significant level.

10. Refer to the response to Comment 8 from the Carmel Valley Property Owners.

11. Because the rock underlying the borrow area is expected to be "decomposed," dynamite and other explosive devices are not expected to be used.

    Dynamite will not be used in the quarry operations. It is expected, however, that the increased noise, dust, and traffic would cause local disturbance of wildlife living in this area. For example, similar large operations (e.g., other quarries) using heavy equipment are clearly audible at distances of at least 0.5 mile and this operation would probably have at least some effects on wildlife (e.g., localized avoidance) within this zone.

The erosion control/revegetation plan that will be prepared for the Chamisal Ridge borrow area will require that the topsoil at the borrow area will be stripped and stockpiled for later reapplication at the borrow area for revegetation purposes. (Refer to Chapter 7, "Soils", of the EIR for the mitigation measure for controlling erosion at the new borrow area.) Weathered rock underlying the topsoil would be used as aggregate base rock and other purposes. No excess material ("slag") will need to be disposed. After borrowing operations are complete, the borrow area would be revegetated.

Extraction of rock at the borrow area could be conducted such that there would be no net increase in the rate or volume of runoff during borrowing operations and after operations are complete. The granodiorite that underlies the borrow area consists predominately of quartz and feldspars; weathering of these minerals does not cause leaching of toxic compounds. Indeed, rainwater already percolates through these rocks and into groundwater; therefore, establishment of the borrow area would not cause an appreciable change in the chemical make-up of the groundwater.

Only onsite roads will be used to haul soil and rock for Phase 1 of the project. For subsequent phases, a crossing of Robinson Canyon Road will be required.

Please refer to Chapter 14, "Climate and Air Quality", in the EIR for a discussion of impacts and mitigation measures relative to asphalt production at the site.

Any additional discussion of quarry operations, potential impacts, and mitigation measures would be outside the scope of this EIR.

12. State CEQA Guidelines Section 15126(c) states that if a mitigation measure would cause one or more significant effects in addition to those that would be caused by the project as proposed, the effects of the mitigation measure shall be discussed but in less detail than the significant effects of the project as proposed. The EIR discusses the significant effects of the mitigation measures to provide a grade-separated intersection at Rancho San Carlos Road and Carmel Valley Road. No other mitigation measures are anticipated to cause significant environmental effects. The mitigation measures recommended in this EIR are not experimental and have been successfully implemented throughout California. CEQA does not require such evidence to be presented in an EIR.

13. The proposed project includes the implementation of school impact fees to finance the building of new schools or portable classrooms. Additionally, if the Carmel Unified School District chooses to do so, year-round schools could be implemented or Carmelo School could be reopened if an alternative location is found for the Carmelo program.

14. The proposed project includes a fire station and firefighters trained in structural and wildland firefighting techniques. A trained volunteer firefighter program already in use at the Santa Lucia Preserve will be augmented to contribute to the firefighting capabilities. The proposed

project also includes an entrance gate with a security guard and security staff also will patrol the proposed project area.

15. The Monterey County Board of Supervisors will consider this opinion and recommendation when it makes a decision on the proposed project.

July 8, 1995

Ms. Wanda Hickman
Monterey County Planning Dept.
Salinas, Ca. 93920 FAX 755 5487

Dear Ms. Hickman:

Thursday, July 6, I attended a meeting conducted by the Carmel Valley Environmental Defense Fund with the purpose of gaining some knowledge and information regarding the preliminary E.I.R. concerning the proposed Rancho San Carlos development.

I left that meeting more perplexed than informed. Panel members who stated they had reviewed the E.I.R. document (94-005,?), seemed more ready to discredit it than to analyze or discuss it.

Some of the questions I was left with, after they were raised as issues, are these:

1) Is it true, as the panel contends, that water run off from the R.S.C property provides 15% of the water flow into the Carmel Valley? Or would the development as planned seriously reduce or even eliminate that flow? 1

2) Is it true that test wells, some driven 2000' deep, have not proven sufficient aquifer reserves to provide an adequate water supply for the project? 2

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W. Hickman. Planning Dept.

3) Will fumes from an asphalt plant and dust from an on site quarry (blasting) pose a nuisance problem for C.V. residents? 3

4) A proposed sewage plant along Robinson Canyon Road was cited as a problem. How does this differ from the proposed Cañada Woods sewage facility which has been hailed by our Board of Supervisors as highly desireable, even necessary, in the development process? 4

From what I know about this planned project, it appears to be the best possible solution to what will be the inevitable development of a privately held 20,000 acre property. One which is closely linked to the future well being of the place in which I live, Carmel Valley.

Should this planned development fail, the breakup of the Ranch and its sale piecemeal, will be a disaster.

I will appreciate your reply to my letter with any comments you may have.

Sincerely

Roland H. Martin

Roland H. Martin
7026 Valley Greens Cir. #12
Carmel, CA 93923

Phone 626-1105
Sorry no fax

Pg. 2 of 2

1. There was apparently a misunderstanding: The EIR does not state that water runoff from the Rancho San Carlos property provides 15% of the water flow into the Carmel Valley. What it does state is on page 8-59 of the draft EIR: some simulations of the New Los Padres Reservoir project were completed using the CVSIM model. The simulations were completed as part of the environmental impact analysis for the reservoir project EIR/EIS. When all tributary inflows (including the flows from all creeks on Rancho San Carlos that are tributary to the Carmel River) were decreased by 15%, there was no decrease in simulated project yield and the number of months of water rationing that would be required during a critical drought period increased by only 1%. The EIR also states that modeling studies of the New Los Padres Reservoir project indicate that the yield of water supplies in the Carmel Valley during critical droughts is not appreciably affected by fairly large (15%) decreases in tributary inflows.

   According to the Comprehensive Hydrological Study submitted by the project applicant, average annual runoff for the ranch plus upstream areas tributary to the Carmel River is about 12% of the Carmel River average annual flow. Refer to pages 7 through 12 of the study.

2. Test wells have indicated that there are sufficient aquifer reserves to provide an adequate water supply for the project. Thirty-seven existing wells are proposed for inclusion in the water supply system for Rancho San Carlos. The combined yield of these wells is sufficient to meet the water demand during the early phase of project completion. The project applicant plans to drill additional wells to meet the higher water demand levels during the later phases of project completion. The smallest estimate of usable groundwater storage in the depth interval penetrated by most of the water supply wells is 64,675 acre-feet, as described in the section on "Aquifer Characteristics". This volume is sufficient to supply the project demand at buildout for 219 years. Even if the distribution of wells allows access to only about half of the total Rancho San Carlos area during periods of prolonged pumping, the amount of accessible groundwater would still greatly exceed the project's water demand.

3. The draft EIR contains a mitigation measure that will prevent fumes from the portable asphalt plant from posing a nuisance to residents. That mitigation measure prevents the construction contractor from operating the asphalt plant within 0.25 mile of any occupied sensitive odor receptor. Similarly, several mitigation measures are included to minimize dust generated by construction activities.

4. The Cañada Wood wastewater treatment facility was a different type of design than that proposed for the proposed project; but both are self-contained, aerobic-type facilities. The proposed facility is, however, very similar to the Laguna Seca and Las Palmas Ranch facilities.

29 June 1995

Comments on Draft EIR for The Santa Lucia Preserve

Dear Ms Hickman:

1. Page S-23/24 Summary of Traffic Impacts and Mitigation Measures is misleading and unacceptable and must be clarified before acceptance can be recommended. The problem is that merely contributing to funds or 'fair shares' is hardly mitigation. 1

2. Page 8-15 Impacts and Mitigation Measures. "This section describes ..... the adequacy and reliability of the proposed water supply wells." The reader can stop here as "proposed" things can be neither adequate nor reliable. The writing may be either poorly done or deliberately made to mislead and must be corrected to be meaningful. 2

3. Page 8-17 In the same sense, what is the meaning, under Water Reliability, of "the water demand on a long-term average annual basis"? It appears to be saying that occasional serious failures to meet demand are OK as long as the overall average is OK. A clarification is needed. 3

4. Page 13-27 Traffic Significance Criteria. Neal Thompson and adopted standards are being misunderstood in saying an intersection deteriorating from LOS A, or C to LOS D, E, or F would be significant. Indeed, it could be a real disaster.

Further, those who prepared the material on this page should be aware that the CVMP was basing its statements on a Level of Traffic Service (LOS) standard adopted by the County for County-wide use. It was the plain LOS C of 1965 which meant stable flow with acceptable operating speeds and was suitable for urban design speeds and volumes. Since then practitioners and consultants have invented a myriad of LOSs for various traffic movements and have succeeded in confusing their readers. This EIR would gain praise if it would refrain from using extended criteria and just state whether the project complied with the CVMP standard, or rose above, or fell below it and if the applicant can mitigate the result. 4

5. Page 13-28 "Pay a traffic impact fee", "Contribute its fair share", "Contribute to the traffic mitigation fund" are hardly mitigations. Unless the product of the fee can be identified and a time of action presented and the fact that the fee will be adequate at that time, citing the gesture as a "mitigation' is asking for scorn. Carmel Valley has collected such fees for over a decade and has little of significance to show for them. Further, "traffic impact" should be quantified and priced so the proposal of a fee can be meaningful; "share" should be defined 5

as to what of and with whom shared. For example list the assumed items and aggregate costs and note that those who have previously paid are unlikely to be required to pay (or share) again.

Regarding upgrading Rancho San Carlos Road, the paragraph fails to make clear which section is the subject, what is the width of the remainder, and will the overall width include maintained shoulders, passing turnouts, width for protective barriers? After all, the intent is to improve the road as the primary access and make it the preferred route. 6

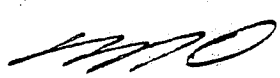
The next to last paragraph should be kept subject to County and/or CDF approval rather than developer choice as it will set an undesirable precedent. In such a large project, it is arguable that such an exception could ever be justified. 7

6. Page 13-29 Paragraph beginning "Rancho San Carlos Road" is a non-sequiter and requires substantiation. The next paragraph does not reference location of Penon Gate (which would seem to be just north of development accesses) and fails to show how the minor usage of Robinson Canyon Road would be brought about and guaranteed. 8

7. Page 13-33 The estimate of 9.3% of project traffic using Robinson Canyon Road is above that discussed in the opening stages of the project design. It indicates the internal circulation system features designed to encourage use of Rancho San Carlos Road are inadequate (It also shows that misinformation was given on Page 13-3). Furthermore, Table 13-12 is impossible to find even though referenced in the List of Tables as being on Page 14-34 - which does not exist. 9

8. Page 13-35 et seq. To say "there is no change in the LOS" for certain road segments is not quite true. It obscures the fact that the LOS is significantly affected but is not yet to the point of falling to the next lower stage which may well be complete stoppage. It would be better to speak plainly and the draft should be so corrected. In the same vein, to say that the act of contributing to various funds will mitigate problems is not acceptable to guarantee mitigation. Further, in that the element of time is not taken into account as well as the number that may contribute, the funds may be irrelevant. This sort of proposal must be kept in perspective and offer proof of effectiveness in a timely manner to be acceptable. 10

Yours sincerely,



L M Orrett, PE, Civil and Traffic

Response to Comments from L. M. Orrett

1. Refer to the response to Comment 21 from the Carmel Valley Property Owners.

2. It is fundamental to all planning processes to anticipate future resource conditions and public needs and to design projects accordingly. Given the extensive drilling and well testing program that has been completed for this project and the very conservatively high water demand factor assumed for the market rate homes, the EIR preparers are confident that the conclusions regarding the adequacy and reliability of the proposed water supply wells are reasonable and well founded.

3. The rest of the sentence quoted in the comment answers this question. The entire sentence on page 8-17 is "The water supply for the project would be considered unreliable if it were unable to meet the water demand on a long-term average annual basis, *during moderately severe droughts, or during short-term peak demand periods*" (emphasis added).

4. The significance criteria are used as a guide to determine the significance of an environmental effect. It is necessary to document these significance criteria so the readers can understand the basis for a significance determination.

   The county's level of service (LOS) C standard is the basic criterion for identifying significant impacts for intersections in the Santa Lucia Preserve Project draft EIR. If an intersection drops below LOS C due to the addition of project traffic, mitigation is required. For intersections that currently operate below LOS C, additional significance criteria have been established for LOS D, E, and F. The amount of traffic required to cause a significant impact for the lower LOS levels becomes progressively smaller because congestion is progressively worse. To illustrate this point, seconds of average delay per vehicle, a small number of trips added to the intersection would not be significant to the average driver. If the intersection is already operating at LOS F, with very long delays, any added traffic would be significant. The significance criteria for the draft EIR were intended to define this difference in motorists' actual perception.

   The standards described in the draft EIR are consistent with those used by Monterey County. Subsequent discussion with Neal Thompson, Traffic Engineer for the Monterey County Department of Public Works, confirmed that the significance criteria described in th draft EIR are reasonable.

5. Typically, the cost of capital improvements is spread to the anticipated new growth and development in the area based on the traffic generation estimates of the new growth. The applicant's fair share toward transportation improvements would be determined and collected by Monterey County Public Works Department prior to approval of the Final Map and issuance of a building permit. Refer to the response to Comment 21 from the Carmel Valley Property Owners.

The board of supervisors adopted a permanent fee ordinance at a scheduled public hearing on August 22, 1995.

6. The applicant is proposing to upgrade Rancho San Carlos Road south of the Quail Meadows subdivision entrance. The portion of Rancho San Carlos Road north of the Quail Meadows subdivision is about 20-24 feet wide. With the improvements, the overall width of Rancho San Carlos Road would include two 10-foot travel lanes except where this road will be narrowed to a minimum of 18 feet for short distances to minimize impact on existing trees or other special landscape features. This road would also include a 1-foot-wide asphalt dike on one side and a maintained 2-foot shoulder on the other side. No passing turnouts are proposed. Retaining walls will be constructed where needed.

7. As specified on page 13-40 in Chapter 13, "Traffic", of the draft EIR, the design of all internal roads will need to be approved by the Monterey County Department of Public Works.

8. The improvements that the applicant is proposing for Rancho San Carlos Road are presented on page 13-28 of the EIR.

   Peñon gate is located about 2 miles north of the intersection of Rancho San Carlos and Robinson Canyon Road.

   The applicant proposes to limit travel of Robinson Canyon Road by implementing the five measures listed on pages 13-29 and 13-30 of the EIR.

9. Based on the relative travel time and distances from the center of the preserve to Carmel Valley Road via Rancho San Carlos Road and Robinson Canyon Road, 9.3% of the project traffic is estimated to use Robinson Canyon Road. This equals to about 16 trips during the a.m. peak hour and 20 trips during the p.m. peak hour. The applicant is proposing to further reduce the traffic on Robinson Canyon Road by establishing a TMA, which will seek to minimize project traffic on this road by implementing an education program, distributing information, and installing appropriate signs.

   Table 13-12 was missing from the draft EIR. This table has been included in the errata.

10. The draft EIR states that the proposed project would result in additional traffic on several intersections and roadway segments. At some locations, this traffic increase is not considered significant. The report determines the locations where the project contributes a significant amount of additional traffic and would result in a significant traffic impact and recommends

mitigation measures for those locations. In addition to the proposed project, there are other approved and proposed projects that contribute to the degradation of a level of service at an intersection or roadway segment. All these projects would need to contribute toward improving these facilities. The applicant's fair share toward these transportation improvements would be determined and collected by Monterey County Public Works Department prior to approval of the Final Map and issuance of a building permit.

June 30, 1995

Ms. Wanda Hickman
Monterey County Planning Department
240 Church Street, Suite 116
Salinas, CA 93901

Dear Wanda:

I have reviewed the Draft Environmental Impact Report ("DEIR") for the Santa Lucia Preserve Project. I own property directly bordering Rancho San Carlos. I have followed the approval process closely for many years. I am supportive of the project and the preserve which it will establish.

Overview

The DEIR finds that many of the potential impacts of the project are less than significant and that all other potential impacts can be reduced to less-than-significant levels. This is welcome news. If 90% of the 20,000 acre property is placed in a land conservancy and held as open space with a maximum of 350 homes, I can't see how there can be much of an impact. 1

Water Quality

The DEIR finds that water quality can be mitigated to a less than significant level. There has been much controversy made that the water quality of the San Clemente Creek and Carmel River will be ruined by the use of one golf course. There are many courses in the Carmel Valley right on the river that have much more managed turf areas draining directly adjacent to the river and I am not aware of any controversy or existing problems with these courses. The proposed Golf Trail will be much further from the Carmel River and will have sophisticated drainage controls. I am glad that the DEIR reached the only logical conclusion that there will be a less-~~than-s~~ignificant impact. 2

Impacts on Offsite Water Users

The DEIR finds that this will be a less-than-significant impact. I am glad to find that after the original EIR and 5 more years of study by many other experts, that yet another group of independent experts, this time selected by the County of Monterey, has reached the same conclusion that clearly determines this to be a less-than-significant impact and "which together present a picture of reasonable use and minimal impact" (page 8-59). This was always obvious to me given a net usage projected at 273 af/yr (page 8-19) for a property with average rainfall of 53,000 af/yr (page 8-9). I am sure that some of the suggested mitigation measures are appropriate, 3

but it seems that some are just to make work and to attempt to mollify one of the project's opponents.

Flooding (page 9-20)

The DEIR states that flooding of the Carmel Valley is a significant impact which may be mitigated to less-than-significant. Table 9-3 says 173 acres of new impervious surfaces could be added. How can adding 173 acres out of a 20,000 acre watershed in anyway be considered significant? This is an increase of 0.87%. 4

Traffic Impacts to Carmel Valley Road

The DEIR states that these impacts can be mitigated to a level of less-than-significant level when using the 1992 traffic counts on Carmel Valley Road. The newer counts of 1993 show volumes decreasing by 5% (page 13-9). I find it ironic that the entire increase in traffic from the project at full buildout many years from now approximates the decline that has already occurred. I have heard that the 1994 traffic counts are lower also, but I have not seen these figures. Are they available? 5

Potential Soil Erosion and Increased Sedimentation on Slopes Over 30%

The DEIR states that these impacts can be mitigated to a level of less-than-significant by implementing the erosion control plan. Much of the limited amount of development of roads and driveways that will be on slopes over 30% is located on existing dirt ranch roads serving the ranch and serving existing right-of-ways to neighboring properties. These existing dirt roads contribute to sedimentation of the waterways because of storm runoff and routine annual grading. Converting these dirt roads on 30% slopes to paved surfaces with appropriate drainage structures should actually provide a positive benefit from the existing condition or a mitigation for other increased runoff. By mostly using the existing roads, there is less visual impacts from road scars and less potential erosion from new cuts. 6

Respectfully,

Bill Patterson

cc: Supervisor Sam Karas

Mailing Address / Phone:
262 El Dorado Street, Suite 300
Monterey, CA 93940
408-646-8100

1. Comment noted.

2. Comment noted. Turf management science has advanced significantly in the last decade. With the introduction of computer controls, it is possible to regulate irrigation to minimize the applications of fertilizers and pesticides.

3. The Monterey County Board of Supervisors will consider the commenter's concurrence with its conclusion that the overall water use for the project is reasonable and minimal.

4. Although the land area converted to impervious area is less than 1%, the resulting floodflows are measurably increased. In nearly level areas, such as the Carmel Valley, even small increases in floodflows may cause significant additional damage. As described on page 9-19 in Chapter 9, "Runoff, Flooding, and Water Quality", of the draft EIR, the project applicant is required to attenuate peak floodflows and has proposed detention and/or retention basins to mitigate this impact.

5. Dowling and Associates compared the 1992 traffic volumes used in the draft EIR with the county's latest 1994 traffic counts. This comparison indicated that traffic volumes on Carmel Valley Road dropped by 3% between 1992 and 1994. The 1994 traffic volumes can be obtained from Monterey County Department of Public Works.

6. Comment noted.

755.5487 July 13 1995

Comments on Santa Lucia Preserve Project
DEIR # 94-005
PC # PC 94-067 SCH 94083019
PC 94-46 SCH 95023036

To: City Planning & Bldg. Dept
ATTN: Wanda Hickman

From: Ambrose M Pollock
26550 Rancho San Carlos Rd
Carmel Ca 93923 408-624-8145

Document Reference

Pg 4.3 A Population increase will create a strain on the already filled to capacity school system, therefore the project will make a significant impact on the counties Budget for schools and teachers and busing etc. 1

P. 4.4 Any time there are an additional 500-1000 humans in any area there will be an impact - societal physical, social, etc. and it will be significant on many levels. 2.

I want to see real answers to these comments - not presumptions and or off-the-cuff remarks regarding supposed less-than-significa impacts - Carmel area is already over-populated for it's INFRASTRUCTURE

Ambrose Pollock page 2
(408) 624-8145

REF.
8-15 Should the project be allowed to experiment with using resources already "in demand" by
8-16 natural systems and therefore by run the risk of damaging the already fragile environment on the "ranch" based on the mere assumption ("professional") that there will be adequate supply — there is no scientifically based proof that there is sustainable water supply for this event. Too many "guesstimate & assumptions" do not "scientific data make."
The county states that it needs proof — MAKE THEM PROVE IT I don't care if it takes them 20 years. — Too much is at stake — to be willy nilly about this. 3

How many people will be "on staff" with the preserve" and "the county to specifically insure that all on-site mitigations are continually accurately & EFFECTIVELY monitored recorded and accounted for.! 4

Who pays their salaries and holds them accountable — who establishes and maintains standards & principles who approves and regulates same.?

This alone is a huge job — needs to be done & done well.

Ambrose Pollock
408 624-8149

TRAFFIC

"E"

Given the current LOS at Rancho San Carlos & C.V. Rd, and given the current Traffic signal warrants at this intersection, and given the general unsafe nature of this troublesome intersection - I'd like to recommend that MAJOR "road improvements be "phased-in" up Front rather than when build-out occurs. - Those of us who live adjacent to this project already have negative impacts from the existing conditions on this road - poor traffic controls signage, lack of enforcement, visibility etc. etc. We don't want band-aid mitigations that result in redundant and unnecessary expenditures, delays, etc— in continuous road improvement at this dangerous site. 5

R&L Bridge

This Bridge is inadequate structured for a Foundation for improvement IT needs to be replaced. IT is sub standard in width, and the road bed is aged - There is poor visibity and no allowance for pedestrians it is substandard for current use. 6

Ambrose Pollock
(415) 524-8145

B-bridge cont

Signage and SAFETY "signals" are all overgrown with shrubs and speed limits are ignored and there is no enforcement of THESE limits because it is a PRIVATE rd.

What does Rancho San Carlos propose to do differently to enforce SAFE ACTIVITY on THIS BRIDGE AND ROAD in THE FUTURE IF THEY AREN'T ABLE TO do anything now?

6

NOW City Sheriff does not patrol or enforce laws here now — what will change - on the county level - on the preserve level

DEIR errata

The current data on the bridge is misleading in width —

The mitigation on the bridge states that it will create a bridge that has 2 10' travel lanes in each direction —

that would require a 60' wide bridge when you throw in the pedestrian lane.

what gives?

I'd like to see 2-3 engineering reports from several different sources —

6

Page 5

Ambrose Pollock
(408) 624-8145

→ County Public works, Granite Const, or similar on the old bridge — the new bridge and what changes will made if old bridge is indeed utilized. 6

The DEIR needs to specifically address these ~~and~~ comments more specifically and effectively

Thank you. —

1. The impact of the implementation of the plan on schools is discussed on pages 16-14 and 16-15 in Chapter 16, "Public Services and Utilities", of the draft EIR and is considered significant. Three mitigation measures are recommended to reduce this impact to a less-than-significant level.

2. The social effects of implementation of the plan are discussed in Chapter 18, "Social Effects", of the draft EIR and physical effects such as those on soils, water, traffic, air quality, and noise are discussed in Chapter 7, "Soils"; Chapter 8, "Hydrology, Stream Base Flow, and Water Supply and Demand"; Chapter 13, "Traffic"; Chapter 14, "Climate and Air Quality"; and Chapter 15, "Noise" of the draft EIR. In some cases, significant effects are identified. In all cases where significant effects are identified, mitigation is recommended that will reduce the impact to a less-than-significant level.

3. The draft EIR presents the results of an extensive analysis of water supply and demand associated with implementation of the proposed project. The conclusion of this analysis is that the potential for a water shortfall during the peak demand season is considered a significant impact. A detailed mitigation measure to reduce this impact to a less-than-significant level is provided. No changes to the draft EIR are required.

4. As discussed on page 2-5 of the draft EIR, the preserved lands will be owned and managed through two organizations: the Santa Lucia Conservancy and the Stewardship Company. The Santa Lucia Conservancy will be organized as an independent nonprofit corporation to oversee, govern, and control the resource management of the preserve. The Stewardship Company will be a separate wholly owned subsidiary of the Conservancy and together will be responsible for implementing all resource management, scientific, and educations objectives of the conservancy. Property owners will fund these organizations through the purchase price of lots and homeowners' fees. As part of the mitigation monitoring program, Monterey County staff will oversee all mitigation measures adopted as conditions of approval.

5. The comment is noted. The EIR recommends mitigation measures for this intersection. The applicant would need to contribute funds toward these mitigation measures prior to the project generating appreciable traffic volumes. Monterey County Department of Public Works is responsible for determining the nature and timing of the improvements.

6. The applicant is proposing to upgrade the Rancho San Carlos Road bridge across the Carmel Valley River to conform with American Association of State Highway and Transportation Officials (AASHTO) HS20-44 loading requirements to handle emergency vehicles. This exceeds the county and state standards that require that all new or refurbished bridges leading to or within a State Responsibility Area be designed for HS15-44 loadings, which is equivalent to a vehicle load limit of about 30 tons. In addition, the bridge would be widened to 20 feet, and a pedestrian footpath would be added to this bridge that would provide a physical separation between vehicles and pedestrians. No engineering design plans are yet available for these improvements.

July 8, 1995

TO: Wanda Hickman, County Planning Department

FROM: Gillian Taylor, Carmel Valley Resident

RE: Santa Lucia Preserve (Rancho San Carlos) Draft EIR Comments

Following is a two page fax with my concerns and suggestions regarding the Santa Lucia Preserve Draft EIR.

Thank you,

Gillian Taylor

Gillian Taylor
40 Laurel Drive
Carmel Valley, CA 93924

659-0298 (home number)

July 7, 1995

TO: Wanda Hickman

FROM: Gillian Taylor (659-0298)

Comments for Santa Lucia Project EIR 94-005

1. Density and number of housing units to be built within the Carmel Valley (CV) Master Plan area. The County should ensure the project plans for building in the CV area are consistent with the CV Master Plan zoning and other requirements. I understand the building in the CV Master Plan area is planned to go forward after the main (GMPAP area) development begins. However, the overall application or EIR should protect CV from any negative changes to its guidelines and zoning. Also, assurances should be included that the water for such development will come from the project wells, and not the Carmel Valley water supply. The total number of units planned for the CV Master Plan area should be deducted from the Carmel Valley "build-out" cap. 1

2. Golf Course Usage. Application should contain clear assurance that the golf "trail" will not be subjected to intensified usage or expansion after approval is given for the project. This is due to the traffic impact that expanded (non-resident) golf would generate. 2

3. Land Conveyance to Trust for Public Land. The transfer of open space land to the permanent protection of the Trust for Public Land is currently planned to be done in phases, as lots are purchased. This process could allow the Partnership to back out of its commitment to transfer land at a future date. The County should require the project to find another way to accomplish the transfer immediately, so that all 18,000 acres will be protected in perpetuity. 3

4. Who Controls the Preserve. I was told verbally by project manager Tom Gray that the first Board of Directors for the Preserve will have the RSC Partnership in the minority of the Board, and be a minority in terms of quorum. The application or EIR should clearly lock in this policy in perpetuity, to ensure the goals of the Partnership will be subservient to those of the Conservancy/Land Trust, as RSC spokespeople claim they will be. 4

5. Monitoring of Mitigation Measures. Per the EIR, RSC is to do ongoing data gathering and monitoring of mitigation measures. Various county agencies (Water, Bldg. and Planning, etc.) are to be the final point for verification. In light of the County's lack of ability to adequately monitor and control violations at Carmel Valley Ranch (for example), it is improbable they will have the ability (staffing or processes in place) to deal with something the size and complexity of RSC. The County should require an annual or semi-annual citizens' review of the monitoring actions and reporting, so the public can contribute to the necessary "watchdog" process. Copies of the reports should go to local libraries and a public meeting should be arranged to answer questions regarding compliance with the mitigation measures. 5

6. Future Changes to RSC Plan. Many local residents are skeptical that RSC will not change its direction once approval is received for its current plan. Enlargement or alternation of the project could significantly impact water, traffic, pollution, water use, etc. While the Supervisors would have to approve major permit changes, they could succumb to pressure if the Partnership claimed risk of bankruptcy, for example. The County should take whatever actions would bind them and subsequent Boards to the project as it is finally approved, unless proposed changes would lessen project impacts, and of course after a full public review of the proposed changes. With water and traffic being the concerns they are, insisting RSC live within its means seems to be reasonable. 6

7. Traffic Mitigations. Mitigations can only work if they are executed. The RSC EIR labels many of the largest traffic impacts (like CV Road at Hwy 1) as "insignificant" with mitigations measures taken. I note that unless the County and/or Cal Trans actually funds and builds the Hwy 1 improvements (for example), the impacts will take the LOS even lower than it is now. RSC paying "their fair share" of money for traffic mitigations does not in fact mitigate the problems caused by their development. The County should not authorize building to begin on the RSC project unless the traffic mitigation measures are underway and going forward expeditiously. 7

8. Trails for Public Use. The County should require public trail easements on RSC commensurate with the size and impact of the proposed development, as is required by California law. The County should also specifically require the trails called for in the Greater Monterey Area Plan. 8

9. Preserve Protection: Preserve lands surrounding the "homesites" need to be protected from homeowner (or other) alterations ("brushing" of the landscape, disturbance of plant and animal habitat, tree trimming to improve views, etc.) This should be spelled out in detail in the application or EIR. If there is not a strong education/enforcement program in place, we can expect violations to occur -- compromising the habitat and animal protection that RSC states it is committed to. What is the plan to monitor, penalize and repair any such damage? 9

10. I understand the complete project application makes note of four additional structures (housing additional people) which can be built on parcels over 2 acres. I do not believe this was made clear in the EIR (which I reviewed). I don't think the public is at all aware of all this additional development. The final EIR should contain clear information about this additional development, and provide assurances that the additional building and habitation impacts have been taken into account in the EIR assumptions and mitigations (if indeed they have been). If they have not been taken into account in the EIR, they should be. 10

1. The applicant's comprehensive development plan includes 20,000 acres within the GMPAP, CVMP, and the Carmel Area Coastal Zone. At this time, the applicant is seeking entitlement to only those portions of the site within the GMPAP area. The EIR evaluates the entire comprehensive development plan; however, approval would be granted only for those uses within the GMPAP. Development within CVMP area will require consistency with the CVMP. The commenter's suggestions concerning development in the CVMP area are noted and will be considered.

2. Any substantial changes in the usage or size of the golf trail as defined in the combined development permit application for the golf trail would require subsequent environmental review and approval.

3. The commenter's suggestion that all 18,000 acres be immediately transferred is noted and will be considered.

4. The commenter's suggestion concerning the relative voting power of the Board of Directors of the preserve is noted and will be considered. However, this is not an issue that must be addressed in the EIR.

5. The commenter's suggestion that the county required citizen review of the monitoring actions and reporting is noted and will be considered.

6. The commenter's concerns regarding changes to the current plan are noted and will be considered. As stated, any changes to the current plan would require additional review and approval.

7. In the case of cumulative impacts where a project is contributing to a significant impact, a project's share of mitigation is limited to its pro rata share of its contribution to the cumulative impact. CEQA cannot be used to require an applicant to mitigate beyond the impacts caused by the proposed project; otherwise it can be considered an unlawful taking. Therefore, pro rata contributions to a fund identified for specific purposes have been upheld in the courts as adequate mitigation. The commenter's suggestion that the county not authorize building unless traffic mitigation measures are underway is noted and will be considered.

8. Public trails will be developed and operated in compliance with California law and the GMPAP.

9. The covenants, conditions, and restrictions (CC&Rs) to which all property owners will be a party specifically limit development to defined building envelopes. Private property outside

the building envelope (openlands), will be subject to a conservation easement governed by the Santa Lucia Conservancy. The Santa Lucia Conservancy will be responsible for the management of the open space components of the project including the openlands in accordance with the Resource Management Plan. This plan consists of a series of conservation and development standards for the 20,000-acre ranch property. Because the CC&R document is a legal contract to which property owners are a party, the Santa Lucia Conservancy will be able to pursue legal remedies for violations of the contract.

10. Article III of the CC&Rs describes the following permitted structures:

- one principal structure;
- one senior citizen unit;
- one caretaker unit on any lot exceeding 2 acres in size, or 10 acres in size if a senior citizen unit exists on the site; and
- one guest house.

These are auxiliary units that are allowed in all residential zoning districts of the county. Under the Monterey County Zoning Ordinance (Title 21), all such auxiliary units require a discretionary permit from the county, and all, including guesthouses, are subject to specific development restrictions. The applicant has not requested approval for any auxiliary units; the project CC&Rs simply acknowledge these uses, which are available under county zoning with appropriate permits. Although the applicant has not requested approvals for any auxiliary units, Chapter 19, "Cumulative Impacts", of the EIR, has been revised to evaluate the impacts of a reasonable estimate of such units, which might be expected to occur within the project site over time.

Section C. Citations

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