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Staff Report:	7/31/15
Hearing Date:	8/13/15

STAFF REPORT: APPEAL
SUBSTANTIAL ISSUE

Application No.:	**A-1-DNC-15-0047**
Applicant:	**Gul Jaisinghani**
Appellants:	(A) Commissioners Shallenberger & Bochco (B) Shelia and Mike McCanta (C) Friends of Del Norte County
Local Government:	County of Del Norte
Local Decision:	Approval with Conditions
Location:	Approximately ½-mile south of the California-Oregon state line, at 16850 Highway 101, Del Norte County (APN 101-070-01)
Project Description:	Demolition of an existing one story 4,000-square-foot restaurant; (2) construction of a 3-story, 17,575-square-foot 20-unit motel; (3) construction of 20 parking spaces; (4) installation of approximately 3,925 square feet of landscaped area; (5) construction of a 10,600-square-foot grassy area for the sewage disposal area; and (6) construction of an on-site sewage disposal system.
Staff Recommendation:	Substantial Issue

IMPORTANT HEARING PROCEDURE NOTE:

The Commission will not take testimony on this "substantial issue" recommendation unless at least three commissioners request it. The Commission may ask questions of the applicant, any aggrieved person, the Attorney General or the executive director prior to determining whether or not to take testimony regarding whether the appeal raises a substantial issue. If the Commission takes testimony regarding whether the appeal raises a substantial issue, testimony is generally and at the discretion of the Chair limited to 3 minutes total per side. Only the applicant, persons who opposed the application before the local government (or their representatives), and the local government shall be qualified to testify during this phase of the hearing. Others may submit comments in writing.

If the Commission finds that the appeal raises a substantial issue, the de novo phase of the hearing will occur at a future Commission meeting, during which the Commission will take public testimony.

SUMMARY OF STAFF RECOMMENDATION

On July 1, 2015, the Del Norte County Planning Commission conditionally approved Coastal Development Permit (CDP) No. B32949C, authorizing demolition of an existing restaurant and construction of a 3-story, 17,575-square-foot 20-unit motel and an on-site sewage disposal system. The subject property is a bluff top parcel on the west side of Highway 101, north of Smith River, approximately one-half mile south of the California-Oregon state line.

The Commission received three separate appeals of the project as approved by the County, collectively raising 5 basic contentions. The appeals were filed by: (A) Commissioners Shallenberger and Bocho (**Exhibit No. 8**); (B) Sheila and Mike McCanta (**Exhibit No. 9**); and (3) Friends of Del Norte County (**Exhibit No. 10**).

Staff recommends that the Commission find that the appeal raises a substantial issue regarding consistency of the approved project with the geologic hazards and ESHA protection policies of the certified LCP.

First, regarding geologic hazards, the approved 8-foot bluff setback of the three-story motel from the bluff edge is based on a geologic report that projects that the site will be subject to a bluff retreat rate of 0 over the life of the project. As (1) the zero bluff retreat rate was based solely on an analysis of aerial photographs that does not clearly show the bluff edge because of obscuring vegetation and existing development, and (2) the analysis of bluff retreat did not take into account previous geologic reports prepared for the site and other geologic information that

indicate the bluff is subject to significant erosion, staff believes the appeal contentions that the approved project is inconsistent with geologic hazards policies of the certified LCP raise a substantial issue.

Second, regarding ESHA protection, the certified LCP identifies sea cliffs and bluffs in this area as ESHA and indicate that sea cliffs and bluffs provide habitat for birds and burrowing animals. Although the subject parcel contains a sea cliff and bluff containing extensive amounts of vegetation, the county staff report failed to analyze the presence of Sea Cliff ESHA and the potential for adverse effects from the county approved project. No biological or vegetation assessment was performed on the site in conjunction with the approved project. As (1) no biological survey nor County analysis was undertaken to evaluate the biological resources of the bluff and establish whether a buffer between the development and the bluffs is needed to protect any ESHA that may exist at the site, and (2) the foundation of the approved motel will be located only 8 feet from the bluff edge and cantilevered decks will extend all the way to the bluff edge, staff believes the appeal contention that the approved project is inconsistent with ESHA protection policies of the certified LCP raises a substantial issue of consistency of the approved development with the County's certified LCP.

Staff further recommends that if the Commission finds substantial issue, that the Commission continue the *de novo* hearing to a subsequent date until the applicant provides certain information listed in Section II-H of the staff report, to enable the Commission to determine consistency of the development with the LCP.

The motion to adopt the staff recommendation of substantial issue is found on page 5.

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I. MOTION AND RESOLUTION

Motion:

> *I move that the Commission determine and resolve that Appeal No. A-1-DNC-15-0047 does not present a substantial issue with respect to the grounds on which the appeal has been filed under Section 30603 of the Coastal Act regarding consistency with the Certified Local Coastal Plan and/or the public access and recreation policies of the Coastal Act.*

Staff recommends a **NO** vote on the foregoing motion. Following the staff recommendation by voting no will result in the Commission conducting a *de novo* review of the application, and adoption of the following findings. Passage of this motion via a yes vote, thereby rejecting the staff recommendation, will result in a finding of No Substantial Issue, and the local action will become final and effective. The motion passes only by an affirmative vote of the majority of the appointed Commissioners.

Resolution:

> *The Commission hereby finds that Appeal No. A-1-DNC-15-0047 presents a substantial issue with respect to the grounds on which the appeal has been filed under § 30603 of the Coastal Act regarding consistency with the Certified Local Coastal Plan and/or the public access and recreation policies of the Coastal Act.*

II. FINDINGS AND DECLARATIONS

A. APPEAL JURISDICTION AND PROCEDURES

The Coastal Commission effectively certified Del Norte County's local coastal program (LCP) in 1983. After certification of an LCP, the Coastal Act provides for limited appeals to the Coastal Commission of certain local government actions on coastal development permits (CDPs). Pursuant to Coastal Act Section 30603, the County's approval of the subject project is appealable to the Commission because the approved development is located: (1) between the sea and the first public road paralleling the sea; (2) within 300 feet of the inland extent of a beach; and (3) within 300 feet of the top of the seaward face of a coastal bluff. The Commission's Appeal Jurisdiction is further discussed in Appendix A which is hereby incorporated by reference. The grounds for an appeal are limited to an allegation that the approved development does not conform to the standards set forth in the certified Local Coastal Program (LCP) or the public access policies set forth in the Coastal Act.

Section 30625(b) of the Coastal Act requires the Commission to hear an appeal unless the Commission determines that the appeal raises no substantial issue[1] of conformity of the approved project with the certified LCP. Since the staff is recommending substantial issue, unless three

[1] The term "substantial issue" is not defined in the Coastal Act or its implementing regulations. In previous decisions on appeals, the Commission has generally been guided by the following factors in making substantial issue determinations: (a) the degree of factual and legal support for the local government's decision; (b) the extent and scope of the development as approved or denied by the local government; (c) the significance of the coastal resources affected by the decision; (d) the precedential value of the local government's decision for future interpretations of its LCP; and, (e) whether the appeal raises only local issues, or those of regional or statewide significance.

Commissioners object, it is presumed that the appeal raises a substantial issue and the Commission may proceed to its *de novo* review at the same or subsequent meeting. The Commission will not take public testimony during this phase of the appeal hearing unless three Commissioners request it.

If three Commissioners object, the Commission will hear arguments and vote on the substantial issue question. Proponents and opponents will have three minutes per side to address whether the appeal raises a substantial issue. The only persons qualified to testify before the Commission on the substantial issue question are the applicants, appellants, and persons who made their views known to the local government (or their representatives). Testimony from other persons regarding substantial issue must be submitted in writing. It takes a majority of Commissioners present to find that no substantial issue is raised.

Unless it is determined that there is no substantial issue, the Commission will proceed to the *de novo* portion of the appeal hearing and review the merits of the county approved development. The de novo phase of the hearing will occur at a future Commission meeting, during which the Commission will take oral and written public testimony.

B. LOCAL GOVERNMENT ACTION AND FILING OF APPEAL

The Del Norte County Planning Commission conditionally approved Coastal Development Permit No. B32949C at its hearing held on July 1, 2015. The Coastal Commission's North Coast District Office received a pre-Notice of Final Local Action for the approved development on July 8, 2015 (**Exhibit No. 7**). The County's notice indicated that a local appeal of the County's decision on the subject permit must be filed with the Clerk of the Board of Supervisors by July 13, 2015, ten working days from the date of Planning Commission approval. Since no local appeal was filed with the Board the Notice of Final Local Action was deemed filed on July 14, 2015, and the Commission's appeal period began that day and ran for ten working days, ending on July 27, 2015. Three separate appeals of the County's decision to grant the permit with conditions were filed in a timely manner with the Commission within 10 working days of receipt by the Commission of the County's Notice of Final Local Action. The appeals were filed by: (A) Commissioners Shallenberger & Bochco (**Exhibit No. 8)**; (B) Shelia and Mike McCanta (**Exhibit No. 9**) and (C) Friends of Del Norte County (**Exhibit No. 10**). Section 13111 of the Commission's regulations allows an appeal of a local government's decision on a CDP application to be filed by any two members of the Commission.

C. BACKGROUND

On September 2, 2014 the Coastal Commission North Coast District office received a draft Mitigated Negative Declaration (MND) from the County of Del Norte for the Nautical Inn Project (CDP # B32949C). Commission staff provided comments on the MND including, but not limited to, concerns regarding the project's consistency with the geologic hazards policies of the certified LCP. Commission staff recommended that a larger bluff setback distance be established to avoid impacts from future bluff instability or erosion, particularly with respect to the avoidance of construction of protective shoreline devices at some future time.

Commission staff visited the site on February 24, 2015 and provided comments on the draft County staff reports that were received in the North Coast District Office. The comment letters reiterated concerns regarding the size of the bluff setback and suggested that the applicant

provide additional information on geologic hazards before the Planning Commission consider the application. The letters contained comments from the Commission's staff geologist that raised concerns that the approaches used to calculate the bluff retreat rate, and in turn develop the bluff setback, may not have been appropriate for the site and that a more site-specific analysis should be performed.

The CDP application was originally scheduled to be heard at the Del Norte County Planning Commission meeting on March 4, 2015. The hearing was postponed. Subsequently, Commission staff (including the staff geologist), representatives from the Del Norte County planning department, and the applicant's geologist and agent met at the site on May 27, 2015. During this visit, the Commission's staff geologist requested additional information regarding results from a shear test and again recommended a larger bluff setback be established. On June 10, 2015 Commission staff received the shear test results, as well as notice that the applicant had requested that the item be scheduled for hearing at the July 1, 2015 meeting of the Del Norte County Planning Commission. The Commission staff responded to the notice on June 30, 2015, reiterating concerns that the 8-foot geologic setback needed to be expanded to fully account for bluff retreat over the life of the development and to avoid geologic hazards. On July 1, 2015 CDP# B32949C was conditionally approved by the Del Norte County Planning Commission.

D. PROJECT AND SITE DESCRIPTION

On July 1, 2015, the Del Norte County Planning Commission conditionally approved Coastal Development Permit No. B32949C authorizing: (1) demolition of an existing 4,000-square-foot restaurant; (2) construction of a 3-story, 17,575-square-foot 20-unit motel; (2) installation of 20 parking spaces; (3) installation of approximately 3,925 square feet of landscaped area; (4) construction of a 10,600-square-foot grassy area for the sewage disposal area; and (5) construction of an on-site sewage disposal system (Exhibit No. 3).

The subject 1.9-acre parcel is located at 16850 Highway 101N. in Smith River, one-half mile south of the California -Oregon state line (Exhibit No.2). The project site is located immediately south of Pelican State Beach, a California State Park, and immediately north of the White Rock Resort, a private park model Recreational Vehicle Park. The site has been developed with a one-story restaurant since approximately 1947. The area surrounding the subject parcel is developed with visitor serving land uses along the US 101 corridor which transitions into rural residential, agriculture, and timber lands east of US 101. The parcel is zoned Commercial Recreation (CR) with a Coastal Combining Access and Hazards District (CR-C(A)(H)) and the General Plan Land Use Designation is Visitor Serving Commercial (VSC). Motels and hotels are a principally permitted use in the Commercial Recreation (CR) zoning district.

The project site is situated on the edge of a relatively flat, low gradient coastal terrace to the west of Highway 101 and adjacent to the Pacific Ocean at an elevation ranging from 35 to 50 feet mean sea level (msl). Published geologic maps indicate the area is underlain by marine terrace and sand dune deposits. No active fault traces are shown traversing the site on the published maps and the site is not located within an Earthquake Fault Zone. However, the site is located within a seismically active region which is subject to moderate to large earthquakes from a series of active faults associated with the Cascadia Subduction Zone.

The surrounding area consists primarily of a narrow marine terrace with sea cliffs and low bluffs. To the east of the site the terrain becomes gently sloping and then rises abruptly to a high ridgeline that parallels the coast at an elevation of approximately 800 feet. This upland area is covered with a mosaic of mixed deciduous/coniferous forest and grassland vegetation. Land use in the area is a mixture of agriculture and rural residential housing. Due to the flat terrain and lack of development, the project site is highly visible from Highway 101 in both directions. The views to and along the coast from this stretch of Highway 101 are dominated by ocean vistas and related scenery such as offshore rocks, sea cliffs, coastal vegetation and marine life. Views of upland topography and forestlands, together with agricultural land uses, are also available within the viewshed.

The County granted its approval of the Coastal Development Permit subject to 22 special conditions, including but not limited to, conditions requiring: (1) a coastal bluff setback of at least of eight feet (as measured from the 38-foot bluff contour) shall be provided for the proposed development pursuant to the submitted geotechnical report; (2) all additional geotechnical recommendations shall be incorporated by reference into the approval of this permit including proper foundation footing depth, etc. (LACO Consultants, 2014); (3) prior to the issuance of the Coastal Development Permit a Deed Restriction shall be recorded stating that no shoreline protection structure shall be proposed or constructed to protect the development and expressly waiving any future right to construct such a device; (4) construction of the sewage disposal system shall adhere to the design recommendations provided in the submitted sewage disposal report (Stover Engineering 2015); and (5) the project shall comply with the standard construction setbacks and height restrictions of the Del Norte County Commercial Recreational Zoning Chapter (DNCC §21.28).

E. APPELLANT'S CONTENTIONS

As set forth in Section 30603 of the Coastal Act, after certification of its LCP, an appeal of a local government-issued CDP is limited to allegations made on the grounds that the approved development does not conform to the standards set forth in the certified LCP or the public access policies of the Coastal Act.

The Commission received three separate appeals of the County of Del Norte's decision to conditionally approve the development, including appeals from: (A) Commissioners Shallenberger & Bochco (**Exhibit No. 8**); (B) Shelia and Mike McCanta (**Exhibit No. 9**); and (C) Friends of Del Norte (**Exhibit No. 10**).

The three appeals raise contentions alleging inconsistency of the approved project with the certified Del Norte County LCP, including but not limited to: (1) inconsistency with the geologic hazards policies of the certified LCP; (2) the protection of Environmentally Sensitive Habitat Areas (ESHA) from the impacts of approved development; (3) the provision of adequate water and septic services to accommodate approved development; (4) the protection of visual resources; and (5) improper noticing and public hearing process.

As discussed below the Commission finds that the contentions raised by Appellants A and C regarding inconsistency of the approved development with the geologic hazard policies and standards of the certified LCP and the contentions raised by Appellant C regarding inconsistency of the approved development with the ESHA protection policies and standards of the certified

LCP raise a substantial issue of conformance of the approved development with the policies of the certified LCP. The contentions are discussed separately below.

Appellant A
Commissioner Appellants Shallenberger and Bochco (Appellant A) claim that the approved development is inconsistent with the geologic hazards polices and standards of the LCP because the determination that the bluff retreat rate is 0 is unreasonable based on other evidence that was not taken into account by the consulting geologist. As a result, the recommended setback cannot be relied upon to ensure that the development will be sited and designed to avoid hazards associated with bluff failure over its economic life and the project as approved is inconsistent with the policies and standards of the LCP.

Appellant B
Shelia and Mike McCanta (Appellant B) contend that the approved project is in conflict with Commission coastal bluff setback requirements and that the bluff is eroding and would require additional support during the life of the project, which would not be permitted under the certified LCP. Appellant B also contends that the county approved project does not provide for adequate water and sewer service for the 20-unit motel and that the view from their par model recreational vehicle at the White Rock Resort would be completely eliminated by the motel and would cause them to lose most of the value of their cabin. Lastly, appellant C contends that there were procedural problems with the application for permit. The appellant contends that there was insufficient noticing and signage, and that unequal time was given to the projects agent during the public hearing.

Appellant C
The Friends of Del Norte (Appellant C) claims that the approved development is inconsistent with the geologic hazards polices and standards of the LCP because the proposed placement fails to provide a margin of safety with regard to geologic hazards, sea level rise, Cascadian earthquakes and tsunami run-up. Appellant C also contends that the county approved project fails to adequately protect environmentally sensitive habitat by not providing a safe setback from sea cliff ESHA so as to provide space for bluff retreat and that according to the certified LCP motels are not an allowable use within the sea cliff ESHA. Lastly, appellant C contends that the county approved project will block coastal views to and along the coast and is therefore inconsistent with the visual resources policies of the certified LCP.

F. ANALYSIS

1. Allegations raising a substantial issue

A. Inconsistency with LCP geologic hazards policies
All of the appellants contend that the development as approved by the County is in conflict with the geologic hazards policies of the certified LCP because the coastal bluff setback is inadequate to provide safety from geologic hazards for the economic life of the motel. The approved three-story, 17,575-square-foot motel would be sited only eight feet from the bluff edge on a site comprised largely of unconsolidated sand and gravel where historic erosion and bluff retreat events are known to occur. In addition, Appellant C contends that the project fails to incorporate best available scientific information with regard to geologic hazards from both a Cascadia

Subduction event and sea level rise from climate change. The appellant states that the motel siting fails to provide a margin of safety with regard to geologic hazards and sea level rise for a 50 year time scale or a 100 year time scale, and is therefore inconsistent with the certified LCP and the Coastal Act.

The County's LCP chapter titled "Hazards Areas", Section IV-A (Policies and Implementation) states the following:

> 1. *LCP Policies for Geologic Hazards:*
>
> *P-1. Any development proposed adjacent to coastline erosion areas shall be preceded by:*
>
> *- an assessment of the rates of coastal retreat, in the case of bluffs, a detailed examination of underlying geology by a registered geologist or engineering geologist, and*
>
> *- an analysis of the potential for tsunami run-up*
>
> *P-2. In lieu of the above the County may establish specific area setbacks of sufficient distance to mitigate potential coastal erosion hazards.*

Additionally, the County's LUP "Marine and Water Resources" chapter, Section VII (Specific Area Policies and Recommendations) states as follows:

> 4. *Policies and Recommendations:*
>
> *a. Geologic studies shall be required for new construction within the [2] area of demonstration on bluff-tops to determine:*
>
> *i.) Their suitability for development; and*
>
> *ii.) The necessary set-backs required to avoid hazards associated with bluff failure.*

The applicant's geologist prepared and submitted a geotechnical report and an associated coastal bluff setback recommendation as required by the above policy. The geologic investigation used the approach recommended in Johnsson 2003 to establish a coastal bluff setback and evaluated both: (1) bluff stability by performing a quantitative slope instability analysis and (2) historic bluff retreat from wind and wave erosion through aerial photo analysis. According to the memorandum, to define the total development setback, one must combine the two aspects of the

[2] Note: The area of demonstration of stability includes the base, face and top of all bluffs and cliffs. The extent of the bluff top considered should include the area between the face of the bluff and a line described on the bluff top by the intersection of a plane inclined at a 20° angle from horizontal passing through the toe of the bluff or cliff, or fifty feet inland from the edge of the cliff or bluff, whichever is greater. However, the County may designate a lesser area of demonstration in specific areas of known geologic stability (as determined by adequate geologic evaluation and historic evidence) or where adequate protective works already exist. The County may designate a greater area of demonstration or exclude development entirely in areas of known high instability.

setback considered above: the setback to assure safety from land sliding or block failure, and the setback for long-term bluff retreat. The resulting setback assures that minimal slope stability standards are maintained for the design life of the structure.

To assess the on-site soil conditions, LACO reviewed the boring logs from previous subsurface explorations near the site (LACO 2011) and performed a field exploration on June 26 and July 8, 2014. The field exploration included drilling one boring utilizing a hollow stem auger to a maximum depth of 9 feet. Due to the gravelly and cobbly nature of the subsurface below approximately five feet, the hollow stem auger could no longer penetrate the subsurface and drilling was terminated. Additionally, on July 9, 2014 Advanced Geological Services performed a geophysical survey at the site. The survey consisted of two approximately 200-foot long seismic refraction lines generally oriented perpendicular to one another. The geophysical survey was initiated to obtain subsurface data to estimate the depth and character of underlying soil strata and bedrock.

According to the geotechnical report (LACO 2014a) the soils beneath the site are unconsolidated Pleistocene alluvial deposits identified as the Battery Formation (Qby). Based on the applicants geologists observations of the bluff face made during the site visits on June 26 and July 8, 2014, the soils beneath the site consist of approximately 5 feet of loose dune sand and silt overlying an undetermined thickness of weakly to moderately cemented silty sandy poorly graded gravels (GP) and well graded sandy gravels (GW). The alluvium is primarily composed of marine terrace sand and dune deposits overlying imbricated gravels and sands. The gravels continue below the beach sands at the toe of the bluff. The soil profile was determined to be generally the same as what was observed in the boring and bluff logs. Bedrock was determined to range between 10 feet and 30 feet below the top of the bluff.

To evaluate the stability of the bluff under both static and dynamic conditions, the geologist performed a quantitative slope stability analysis of the bluff using the computer program Slide (version 5.0) (Exhibit No. 5). The software assesses the stability of the slope by comparing the forces resisting failure to the forces driving failure. The ratio of the two forces is defined as a “factor of safety” (F). In a stable slope, the forces resisting failure exceed the driving forces and the resultant ‘F’ is greater than 1.0. When the two forces are equal, the F is equal to 1.0 and slope failure is imminent. The stability analysis for this site used slope geometry obtained from a topographic map of the site, a simplified 3-layer model of the slope soil materials derived from the results of the laboratory testing, and the seismic refraction survey by Advanced Geological Services.

According to the geotechnical report (LACO 2014a), a slope failure surface with a factor of safety equal to 1.5 under static conditions (Fs) furthest from the bluff edge (approximately 38 feet in elevation) is located approximately eight feet east of the bluff edge. Therefore, a distance of eight feet was used for establishing the component of the recommended geologic setback needed to address bluff stability.

The long-term bluff retreat rate was then evaluated using site specific aerial photographic review covering approximately 50 years from 1963 to 2013. According to the LACO report, the site specific aerial photograph review utilized a constant transect through the site to measure changes

in distance to the bluff from a fixed location over time (Exhibit No. 4). The centerline of Highway 101 was used as the fixed location for the years 1963 through 2013.

Distances from the edge of bluff to the fixed reference point for each photo year reviewed were measured since 1963 and no measureable retreat was detected between the bluff edge and the center line of Highway 101. Since the bluff retreat rate analysis indicated no retreat was noted at or near the site during the time of the available aerial photographs (1963 to 2013), the LACO 2014b report indicates that the establishment of a bluff retreat rate greater than zero for the site was not achievable. The report (LACO 2014b) suggests a zero retreat rate is reasonable in this case because of evidence that the beach adjacent to the approved development is accreting at a rate of 0 to 1, .5 feet per year (Hapke et al. 2006).

Following the geotechnical exploration and calculation of the bluff retreat rate, the applicant's geologist prepared a coastal bluff setback recommendation. Following the recommendations in Johnsson 2003, the applicant's geologist established a bluff setback by adding the setback he determined was needed to accommodate bluff retreat over the life of the structure (bluff retreat rate)to the setback distance needed to establish an acceptable margin of safety from land sliding from bluff instability (site specific quantitative slope instability analysis). Based on the geologist's recommended bluff retreat rate of 0 and the eight-foot-setback to account for bluff stability factors, the consulting geologist recommended a total geologic bluff setback of eight feet be applied to the development.

Relying on the recommendations of the consulting geologist's reports, the County found the project to be consistent with the standards and policies of the LCP relating to geologic hazards concluding in Finding E the following:

> *"This project has been designed with a coastal bluff stability setback incorporated to avoid hazards such as sea level rise, bluff retreat, and coastal erosion with no shoreline protection necessary for an anticipated economic life of approximately 75 years."*

Commission staff, including Staff Geologist Mark Johnsson, has reviewed the geologic report, conducted site visits, and met with the consulting geologist at the site on May 27, 2015. Commission staff has also examined information contained in coastal development permit application files for earlier development at the site. The determination that the bluff at the project site is subject to zero bluff retreat is based on incomplete information and inadequate evaluation for several reasons.

First, the canopy of existing trees and shrubs, as well as the existing restaurant built in 1947 that sits on, and partially over, the bluff edge, obscure the bluff edge to a degree that the aerial photography analysis performed (which includes photos from 1963-2013) cannot be relied upon entirely to accurately assess the amount of bluff retreat that has occurred over the time period. Some degree of on-site ground level observation of bluff retreat that penetrates the vegetation canopy and looks under the building is needed to more accurately assess bluff retreat in this case.

Second, the consulting geologist's reliance on the fact that the local shoreline has been characterized by others as accretionary at a rate of 0 to 1.5 feet per year (Hapke, C.J., Reid, D., and Richmond, B.M. 2006) is insufficient to corroborate a bluff retreat rate of 0 as the beach accretion rate is a measure of the rate at which the beach is expanding, rather than a measure of the rate of bluff retreat. An accreting beach does not prevent all waves from flowing over the beach and reaching the bluff, especially during winter storms. Bluff retreat still occurs.

Third, according to the 'National Assessment of Shoreline Change, Part 4: Historical Coastal Cliff Retreat along the California Coast' (Hapke and Reid 2007[3]), the average amount of coastal cliff erosion measured over 70 years in Northern California was 28.8 meters, and the average rate was -0.5 meters/year, as measured on 2,325 transects. As described in Figure 11 of the report, the area around the project site is actually retreating at a rate of 0.25 to 1.1 meters per year (Hapke and Reid 2007). At this rate, between 0.8 and 3.6 feet of the bluff could be lost in any given year.

Fourth, site visits by Commission staff revealed that the bluff edge under the existing restaurant adjacent to where the approved motel would be constructed shows evidence of erosion. Commission staff observed that the existing deck structure was perched over the bluff approximately 4 feet and that the substrate beneath the deck appeared to be eroding and fragile to the touch. Additionally, Commission staff observed areas where support structures had been installed to stabilize the foundation of the existing structure in areas where bluff erosion had occurred.

Fifth, staff has found a 1995 geologic report prepared by Ferrerro Geology for another project at the adjacent site that refers to earlier incidents of erosion on the subject property. Although the 1995 geologic report was prepared for the adjacent property, where the owner was proposing to develop a Recreational Vehicle park, the geologic report discussed the geologic stability of the general area (including the subject parcel) in an attempt to characterize existing geologic hazards and provide recommendations for a bluff setback for the proposed RV Park. The reports states there was "substantial terrace bluff erosion…The westward corner of the Nautical Inn restaurant [the building to be demolished and replaced by the motel] was undercut by erosion, leading to the need for the.. [installation] of steel support piers…There is no doubt that the terrace bluff in this vicinity is vulnerable to substantial erosional retreat. The rate of erosion is unpredictable, since it is associated with random high energy climatic, tidal and/or seismic events." The geologic report prepared for the current project did not reference this earlier report nor did it address its conclusions.

Sixth, in 1994, the County approved a CDP/CUP and a minor subdivision for replacement of motel /cabin units and remodeling of the Nautical Inn restaurant. CDP/CUP No. B22361C included interior remodeling, foundation stabilization and replacement work, and the construction of a new entrance. The County approved development included several conditions relating to the subject parcel being an area of potential geologic risk and that prior to issuance of the permit, all building plans and plot plans required approval of a California registered engineer or geologist to assure that the final plans conformed to the recommendations contained in the

[3] Hapke, C.J., and Reid, D., 2007, National Assessment of Shoreline Change, Part 4: Historical Coastal Cliff Retreat along the California Coast: U.S. Geological Survey Open-file Report 2007-1133.

accompanying geologic report. Furthermore, the County approved project included a condition requiring that the parcel owner record a deed restriction on the property that documented that 'the applicant understands that the site is subject to erosion and geological hazards'.

Finally, the County findings do not include an alternatives analysis to determine if other sizes or locations of the proposed motel would provide sufficient protections from geologic hazards as required by the LCP, and the approved setback does not allow enough room for heavy equipment to operate between the bluff edge and the approved development in case such need arises for removal or movement of the approved building away from the bluff edge. Therefore, as (1) the recommended and approved geologic setback of 8 feet is dependent on the assumption that no bluff retreat will occur at the site over the economic life of the structure, and (2) the assumption of no retreat is not adequately supported and is contradicted by substantial available evidence to the contrary as discussed above, the appeal raises a substantial issue regarding whether the approved project is inconsistent with the provision of Policy No. 4 of Chapter 2 , Section F – Specific Area Policies and Recommendations – Bluff Retreat, that state among other things, that "Geologic studies shall be required for new construction… to determine: (i) their suitability for development; and (ii) the necessary set-backs required to avoid hazards associated with bluff failure."

As stated in the Coastal Bluff Setback Recommendation report, the recommended bluff setback distance was established to allow the building to be as close to the bluff as possible. The County's findings for approval state in part:

> *'…although any geologic hazard present could be further mitigated by moving the development further back from the bluff, having reviewed the area available and site constraints, there does not appear to be any practicable way of re-siting the development without severely impinging the project in some other way and furthermore, would remove the economic incentive that the applicant has in undertaking the project at all.'*

The County staff report also states:

> *' While it is the opinion of staff that the applicant and his team have articulated a project that that meets statutory and regulatory standards that it is required to, there is a significant amount of unease on the part of County staff in recommending that the proposed 8-foot bluff setback be approved. The unease stems from the significant disagreement between very qualified geologic professionals about the adequacy of the proposed buffer, as well as there not being any margin for error should an 8-foot bluff setback ultimately not be adequate. Clearly, if the applicant's geologic team is wrong, and the bluff does fail, it would be a catastrophic failure - a factor that the Planning Commission may choose to give extra weight to in its deliberation. To that point, whereas staff reviews projects through a somewhat rigid viewpoint (based on statutory and regulatory requirements), the Planning Commission, in making their decision, may take into consideration other factors beyond those analyzed by staff as in the case with all discretionary permit approvals.'*

While the County staff report acknowledges that the staff is uneasy with the established setback, it sites regulatory and statutory completeness of the application as a reason for

the recommended conditional approval, and suggests that the Planning Commission use its ability to look beyond these requirements when considering the proposed development. However, as required under the certified LCP, to be approved, a CDP must be first consistent with the policies of the certified LCP. Thus, the public record for the project lacks substantive factual and legal support for the County's decision to approve the development as being consistent with the geologic hazard policies of the certified LCP, including, but not limited to the requirement that development incorporate the necessary set-backs required to avoid hazards associated with bluff failure. Additionally, the decision to approve a bluff-top development with a geologic setback that incorporates a 0 bluff retreat rate without sufficient substantiation, would set an adverse precedent with respect to how the County interprets the geologic hazard policies of the certified LCP in future permitting actions.

Conclusion
Therefore, as (1) the recommended and approved geologic setback of eight feet is dependent on the assumption that no bluff retreat will occur at the site over the economic life of the structure, and (2) the assumption of no retreat is not adequately supported and is contradicted by substantial available evidence to the contrary as discussed above, the approved project is inconsistent with the provision of Policy No. 4 of Chapter 2 , Section F – Specific Area Policies and Recommendations – Bluff Retreat. Consequently, for all the above reasons, the Commission believes that the contentions discussed above appeal raises a substantial issue with respect to the conformity of the County-approved development with LCP policies regarding the protection of development from geologic hazards.

B. Protection of Environmentally Sensitive Habitat Areas
Appellant C contends that the county approved project fails to adequately protect environmentally sensitive habitat and is therefore inconsistent with the ESHA protection policies of the certified LCP. The appellant asserts that the county approved project does not provide a safe setback from sea cliffs ESHA so as to provide space for sea cliff ESHA retreat, thus failing to prevent development from intruding into the retreating sea cliff ESHA within the economic life of the project. Additionally, the appellant contends that motels are not an allowable use within the sea cliff ESHA.

The County's certified LCP chapter titled, "Marine and Water Resources," Section IV – Sensitive Coastal Habitats, Part C (Sensitive Habitat Types) identifies seven coastal habitat areas of concern and discusses specific policies and recommendations regarding their maintenance (Appendix C). Of these seven types of coastal habitat areas that are identified in this section, the certified LCP states the following regarding sea cliffs:

C. Sensitive Habitat Types

> *6. Sea Cliffs: High, steep bluffs fronting the ocean are valuable and sensitive assets within the coastal zone. Bluff face vegetation is often sparse and usually quite sensitive to disruptions such as trampling. Many wildlife species benefit from bluff habitats for nesting and feeding. Bluffs are generally composed of easily erodible, unconsolidated materials making them potentially hazardous for coastal access and as building sites.*

……

VII. Specific Area Policies and Recommendations

F. Sea Cliffs:

1. Definition: A sea cliff or bluff is a more or less vertical escarpment fronting the ocean.

2. Principal Distributions: A large portion of the coastline in Del Norte County consists of sea cliffs ranging from a few to hundreds of feet in height. The primary areas of the sea cliffs are:

a. North of the Smith River
b. Point Saint George to Crescent City
c. South of Crescent City Along Most of the Redwood National Park Coastline

3. Planning Issues: The principal issues associated with the management of sea cliffs include their fragile nature and their potential for geologic hazards.

The vegetation of sea cliffs serves to stabilize the generally unconsolidated material of bluff faces. The plant life of sea cliffs, although adapted to the harsh environmental conditions of wind and salt spray, is typically fragile and highly subject to disturbance. The faces of sea cliffs provide a special habitat for nesting marine birds and various burrowing species.

Sea cliffs are inherently unstable and therefore potentially hazardous sites when associated with development or coastal access.

4. Policies and Recommendations:

a. Geologic studies shall be required for new construction within the [4]area of demonstration on bluff-tops to determine:

i.)Their suitability for development; and

ii.) The necessary set-backs required to avoid hazards associated with bluff failure.

Furthermore, the County's certified LCP chapter titled "Marine and Water Resources", Section VI – General Policies, Part C (LCP policies) expressly incorporates the provisions of Coastal Act Section 30240 as an LCP policy and states the following regarding protection of ESHA habitats:

[4] Note:The area of demonstration of stability includes the base, face and top of all bluffs and cliffs.The extent of the bluff top considered should include the area between the face of the bluff and a line described on the bluff top by the intersection of a plane inclined at a 20°angle from horizontal passing through the toe of the bluff or cliff, or fifty feet inland from the edge of the cliff or bluff, whichever is greater.However, the County may designate a lesser area of demonstration in specific areas of known geologic stability (asdetermined by adequate geologic evaluation and historic evidence) or where adequate protective works already exist.The County may designate a greater area of demonstration or exclude development entirely in areas of known high instability.

> *6. Environmentally sensitive habitat areas shall be protected against any significant disruption of habitat values, and only uses dependent on such resources shall be allowed within such areas. Development in areas adjacent to environmentally sensitive habitat areas shall be sited and designed to prevent impacts which would significantly degrade such areas, and shall be compatible with the continuance of such habitat areas.*

Therefore the project, as conditionally approved, raises a substantial issue with respect to the conformity of the County-approved development with LCP policies regarding the protection of EHSA.

The certified LCP identifies sea cliffs as ESHA providing special habitat for nesting marine birds and various burrowing species and goes on to state that many other wildlife species benefit from bluff habitats for nesting and feeding. Although the subject parcel contains a sea cliff and bluff, the county staff report failed to analyze the presence of sea cliff ESHA and the potential for adverse effects from the county approved project. No biological or vegetation assessment was performed on the site in conjunction with the approved project. This information is necessary to ascertain the extent of existing habitat value of the vegetation on the subject parcel. In addition, given the large quantity of vegetation found on the bluff face and lack of biological information, the site may contain rare or sensitive plant species that would require appropriate setbacks and protection. Without this information, it cannot be determined if the county approved project with the approved 8-foot setback from the bluff edge is sited and designed to prevent impacts which would significantly degrade such areas, and is therefore not compatible with the continuance of such habitat areas. as required by the certified LCP. In addition, as discussed in the finding above, a substantial issue exists as to whether the recommended geologic setback can be relied upon to ensure that the development will be sited and designed to avoid hazards associated with bluff failure over its economic life. The project as approved could significantly impact environmentally sensitive sea cliff habitat with falling debris and other disturbances if the approved coastal bluff setback proves to be inadequate.

The county approval fails to evaluate what environmentally sensitive habitat and/or rare plants may be present at the site and how much of an ESHA setback is needed to protect the ESHA from impacts of the approved development prior to the development of the motel. Therefore, the County's determination that the development is consistent with all of the LCP policies is not based on a high degree of factual support. Therefore, for all the above reasons, the appeal raises a substantial issue with respect to the conformity of the County-approved development with LCP policies regarding the protection of ESHA.

2. Allegations Not Raising a Substantial Issue

A. Inadequate Water and Sewer Services

Appellant B alleges that the County approved development does not provide sufficient sewage and water services to handle the needs of a 20-unit motel and that the increase in intensity of use at the site will greatly increase water usage.

The appellant is incorrect in the assertion that the county approved development would utilize the existing on-site sewage disposal system. The approved development includes plans to

construct and install a new on-site sewage system that has been designed to treat all the wastewater that will be produced by the motel.

According to the County staff report, the project area would be redeveloped to remove some of the current parking area and would be developed with approximately 10,600 square feet of grassy area in which the sewage disposal area will be located. The County staff report discusses that the applicant provided an on-site sewage disposal system evaluation based on an investigation and analysis of soils present onsite (Exhibit No. 11). Several test pits were identified and soils were examined for appropriateness to accommodate a future sewage disposal system for the motel. The report indicates that there is sufficient area available onsite for sewage disposal in addition to an adequate reserve area for the 20-unit motel. The submitted design was based on the Del Norte County sewage disposal ordinance and the North Coast Regional Water Quality Control Board Basin Plan. According to the submitted onsite sewage disposal system design, a shallow pressurized system will be used to accommodate site characteristics. According to the County staff report, the submitted sewage disposal system design was reviewed and approved by the Del Norte County Department of Environmental Health and meets all Del Norte County zoning code requirements.

The County staff report also states that the project will receive water from the Smith River Community Water District (District). The site contains an existing water connection, which historically provided water service for the restaurant. According to the District manager, the District is fully capable of providing water at sufficient service levels for the county approved development and does not foresee any capacity or availability issues in the foreseeable future.

Therefore, the County's staff report provides a high degree of factual support for the local government's determination that the approved project contains sufficient sewage disposal and water availability for the 20-unit motel. Therefore, the Commission finds that this appeal contention does not raise a substantial issue of conformance of the project as approved with the policies and standards of the certified LCP or the public access policies of the Coastal Act.

B. Protection of Coastal Views

Appellant B further states that the view from their park model recreational vehicle at the White Rock Resort, located immediately adjacent to the subject parcel, would be completely eliminated by the motel and would cause them to lose most of the value of their cabin, in addition to interfering with the privacy from their deck.

The visual resource policies of the County's certified LCP are limited to addressing the effects of development on publicly accessible views and do not extend to the protection of views from private properties. Additionally, the certified LCP does not contain any policies regarding assurances of monetary value for the effects of new development on surrounding properties. Therefore, these concerns are not valid grounds for appeal, as the concerns do not relate to conformance of the approved project with the policies and standards of the certified LCP and the public access policies of the Coastal Act. The Commission therefore finds that these contentions are not valid grounds for appeal pursuant to Section 30603(b)(1) of the Coastal Act.

C. Improper Public Noticing and Public Hearing Procedures

Appellant B alleges that Del Norte County Planning and Building Services failed to provide adequate notice of the coastal development permit application before the local action, inconsistent with the noticing requirements of the Del Norte County Code (DNCC), Title 21, Chapter 50C, Section 40-Notification, which requires that the County shall provide notice of pending application at least 10 days prior to hearing. The appellant also alleges that during the hearing, individual comments from members of the general public were limited to 3 minutes of testimony, while the projects agent was allowed to testify for approximately 20 minutes.

Coastal Act Section 30603(b)(1) limits the grounds for an appeal to an allegation that the development does not conform to the standards set forth in the certified LCP or the public access policies of the Coastal Act. The contentions regarding noticing and testimony periods do not allege an inconsistency of the project as approved with the certified LCP or the public access policies of the Coastal Act. Rather, the appellant alleges that the application was not processed in the appropriate manner. These contentions are not valid grounds for appeal, as the contentions do not allege an inconsistency of the approved development with the certified LCP or the public access policies of the Coastal Act. The Commission therefore finds that these contentions are not valid grounds for appeal pursuant to Section 30603(b)(1) of the Coastal Act.

Furthermore, as described in the DNCC, Title 21, Chapter 50C, Section 50 – Hearings, there are no established time limits for testimony during public hearings. Also, although the appellant did not receive notice of the initial application submittal, the appellant admits that they were provided notification two weeks prior to the July 1 hearing.

G. CONCLUSION

Overall, the County has not adopted findings that provide factual and legal support for its determination that the approved development conforms with all applicable policies of the certified LCP including that; (1) the approved motel, located eight feet from a coastal bluff will be safe from bluff retreat over the life of the project; and (2) the approved development has been sited and designed to prevent impacts which would significantly degrade any ESHA on the coastal bluff, an area identified in the certified LCP as sensitive habitat of wetlands. The approval of development eight feet from the bluff edge would establish an adverse precedent for similar bluff top development without adequate setbacks from the bluff to avoid geologic hazards and protect sea cliff ESHA.

For the reasons stated above, the Commission finds that Appeal Number A-1-DNC-15-0047 raises a substantial issue with respect to the grounds on which the appeal has been filed under Section 30603 of the Coastal Act regarding consistency of the approved development with the certified LCP.

H. INFORMATION NEEDED FOR DE NOVO REVIEW OF APPLICATION

Section 30621 of the Coastal Act instructs the Commission to provide for a *de novo* hearing on all appeals where it has determined that a substantial issue exists with respect to the grounds on which an appeal has been filed. If the Commission finds substantial issue as recommended above, staff also recommends that the Commission continue the *de novo* hearing to a subsequent

date. The *de novo* portion of the appeal hearing must be continued because the Commission does not have sufficient information to determine what, if any, development can be approved, consistent with the certified LCP.

Given that the project the Commission will be considering *de novo* has come to the Commission after an appeal of a local government action, the Commission has not previously been in the position to request additional information from the applicant needed to ultimately determine if the project can be found to be consistent with the certified LCP. Therefore, before the Commission can act on the project *de novo*, the applicant must submit all of the information identified below.

(1) Revised Bluff Retreat Evaluation

The Commission must make findings regarding potential geologic hazards associated with new development. Authorization of the placement of new development on a blufftop lot is contingent on making findings that the necessary set-backs required to avoid hazards associated with bluff failure will be incorporated into the development. (The LACO coastal bluff setback report indicates that aerial imagery and site reconnaissance were used to evaluate the sea cliffs and bluff edge. However, given the large quantity of vegetation covering the bluff face and that the existing building has been on the site since 1947, aerial photographs depictions of the bluff edge do not provide adequate evidence of bluff retreat since the bluff edge is completely obscured. To accurately determine the rate of bluff retreat that affects the site and the exact location of the bluff edge to determine how much additional setback from the bluff edge may need to be provided to avoid geologic hazards, a revised bluff retreat evaluation must be provided. The revised evaluation must include an analysis of site-specific information regarding bluff retreat including topographic information, on the ground observations of bluff erosion, a review of available photographs of the site, as well as a review of all available literature and geologic information contained in past local government and Commission CDP applications and permits. Lastly, the revised bluff retreat evaluation should include the calculations used to prepare the revised setback, including rationale on how the final setback distance will ensure that the motel will be sited to ensure safety from geologic hazards.

(2) Development Alternatives Analysis

An alternatives analysis must be provided that evaluates all feasible alternative locations and designs for, and uses for the subject parcel which would provide for an acceptable setback from the bluff edge based on the revised bluff retreat evaluation required above and the ESHA setback evaluation required below. The alternatives analysis should examine all combinations of design alternatives, including alternative locations for the proposed motel, with a reduced number of units, and with smaller units. In addition, the alternative analysis should evaluate all the feasible development options allowed as principally permitted and conditionally permitted uses in the Commercial Recreation zone district, including, but not limited to, development of a restaurant and recreational vehicle park.

(3) Public Access

No information was provided in the CDP application or in the County's findings regarding the provision of public access to the beach area below the subject parcel. The Commission must evaluate the proposed project for consistency with the public access policies of the Coastal Act and the certified LCP. Therefore, detailed public access information must be submitted that

includes a clear description of all existing and proposed public access ways – including location, type, and a map depicting proposed access

(5) Biological and Vegetation Assessment

As discussed above, the certified LCP identifies cliff and bluffs along the coastline in the vicinity of the subject property as an environmentally sensitive habitat area. The project raises a substantial issue of conformance with the policies of the LCP regarding the protection of environmentally sensitive habitat areas (ESHA), as (1) it is unclear what sensitive habitats and rare vegetation occur within the sea cliff ESHA; and (2) there is no proposed sea cliff ESHA buffer proposed.

Therefore, to determine the presence and extent of all potential sensitive plant community and wildlife nesting and foraging habitat at and adjacent to the project site, a current botanical survey and biological assessment should be prepared. The survey should be prepared by a qualified biologist/botanist and should include, but not be limited to: (1) a map of all environmentally sensitive habitat areas (ESHA) identified by the survey, including delineation of sea cliff ESHA; (2) a botanical survey of all bluff face vegetation on and adjacent to the subject parcel; (3) a biological assessment of all potential wildlife nesting and foraging habitat, including nesting habitat for migrating birds. Each environmentally sensitive habitat area identified should be described in detail and depicted on an ESHA map prepared for the subject site at a minimum size of 11 inches by 17 inches. All proposed developments should be superimposed on the map, and the map should depict all proposed buffers between ESHAs and proposed development.

In addition to the biological and botanical assessments, an ESHA buffer analysis must be provided for each development alternative, including a motel with reduced and/or smaller units. The buffer analysis should: (1) demonstrate how disturbance to ESHAs as a result of all elements of the proposed development is avoided; and (2) discuss all necessary mitigation measures to ensure that the development would be sited and designed in a manner that would prevent impacts that would significantly degrade the area and provide for the continuance of the ESHA.

Conclusion

The above information is necessary to assess the consistency of proposed development with the policies of the certified LCP. Therefore, before the Commission can act on the project de novo, the applicant must submit all of the above LCP-required information.

APPENDIX A
Commission's Appeal Jurisdiction over the Project

On July 1, 2015, the Del Norte County planning commission approved Coastal Development Permit (CDP) No. B32949C authorizing demolition of an existing one story 4,000-square-foot restaurant; (2) construction of a 3-story 17,575-square-foot 20-unit motel; (3) construction of 20 parking spaces; (4) installation of approximately 3,925-square feet of landscaped area; (5) construction of a 10,600-square-foot grassy area for the sewage disposal area; and (6) construction of an on-site sewage disposal system.

After certification of Local Coastal Programs (LCPs), the Coastal Act provides for limited appeals to the Coastal Commission of certain local government actions on CDPs (Coastal Act Section 30603). Section 30603 states that an action taken by a local government on a CDP application may be appealed to the Commission for certain kinds of developments, including developments located within certain geographic appeal areas, such as those located between the sea and the first public road paralleling the sea, or within 300 feet of the inland extent of any beach, or of the mean high tide line of the sea where there is no beach, or within 100 feet of any wetland or stream, or within 300 feet of the top of the seaward face of any coastal bluff, or those located in a sensitive coastal resource area. Furthermore, developments approved by counties may be appealed if they are not designated the "principal permitted use" under the certified LCP. Finally, developments which constitute major public works or major energy facilities may be appealed, whether approved or denied by the city or county. The grounds for an appeal are limited to an allegation that the development does not conform to the standards set forth in the certified LCP and, if the development is located between the first public road and the sea, the public access policies set forth in the Coastal Act.

The subject development is appealable to the Commission pursuant to Section 30603 of the Coastal Act because the approved development is located: (1) between the sea and the first public road paralleling the sea; (2) within 300 feet of the inland extent of a beach; and (3) is located within 300 feet of the top of the seaward face of a coastal bluff.

Between the First Public Road and the Sea

The approved motel is located on the west side of Highway One in Del Norte County in a location where the Post LCP Certification Permit and Appeal Jurisdiction Map for the area adopted by the Commission in 1983 designates Highway 101 as the first public road paralleling the sea. Therefore, as the approved development is located between the first public road paralleling the sea and the Pacific Ocean, it is appealable to the Commission pursuant to Section 30603(a)(1) of the Coastal Act.

Within 300 feet of the inland extent of a beach

The project site is a bluff-top parcel, and the approved development is located less than 50 feet from the inland extent of Pelican State Beach. Therefore, the subject development is appealable to the Commission pursuant to Section 30603(a)(1) of the Coastal Act.

Within 300 feet of the top of the seaward face of a coastal bluff

The project site is a bluff-top parcel, and the approved development is located less than 10 feet from the bluff edge. Therefore, the subject development is appealable to the Commission pursuant to Section 30603(a)(2) of the Coastal Act.

The Del Norte County Planning Commission conditionally approved Coastal Development Permit No. B32949C at its hearing held on July 1, 2015. The Coastal Commission's North Coast District Office received a pre-Notice of Final Local Action for the approved development on July 8, 2015 (**Exhibit No. 7**). The County's notice indicated that a local appeal of the County's decision on the subject permit must be filed with the Clerk of the Board of Supervisors by July 13, 2015, ten working days from the date of Planning Commission approval. Since no local appeal was filed with the Board the Notice of Final Local Action was deemed filed on July 14, 2015, and the Commission's appeal period began that day and ran for ten working days, ending on July 27, 2015. Three separate appeals of the County's decision to grant the permit with conditions were filed in a timely manner with the Commission within 10 working days of receipt by the Commission of the County's Notice of Final Local Action. The appeals were filed by: (A) Commissioners Shallenberger & Bochco (**Exhibit No. 8)**; (B) Shelia and Mike McCanta (**Exhibit No. 9**) and (C) Friends of Del Norte County (**Exhibit No. 10**). Section 13111 of the Commission's regulations allows an appeal of a local government's decision on a CDP application to be filed by any two members of the Commission.

APPENDIX B
Substantive File Documents

Appeal File No. A-1-DNC-15-0047, including local record for Del Norte County Coastal Development Permit No. B32949C

Del Norte County certified local coastal program (LCP)

Initial Study and Proposed Negative Declaration for a Coastal Development Permit; lead agency; Del Norte County Community Development Department; dated

APPENDIX C
Del Norte County LCP Policies Regarding Geologic Hazards
(Emphasis added)

LUP "Marine and Water Resources" chapter, Section IV (Sensitive Habitat Types) in part states as follows:

> C. Sensitive Habitat Types: Several biological sensitive habitat types, designated through the application of the above criteria, are found in the Coastal Zone of Del Norte County. These include: off shore rocks; intertidal areas; estuaries; wetlands; riparian vegetation systems; sea cliffs; and coastal sand dunes. A brief description of these sensitive habitat types is given below:
>
> > 6. *Sea Cliffs: High, steep bluffs fronting the ocean are valuable and sensitive assets within the coastal zone. Bluff face vegetation is often sparse and usually quite sensitive to disruptions such as trampling. Many wildlife species benefit from bluff habitats for nesting and feeding. Bluffs are generally composed of easily erodible, unconsolidated materials making them potentially hazardous for coastal access and as building sites.*

LUP "Marine and Water Resources" chapter, Section IV-C (Sensitive Habitat Types) Table 1 (Sensitive Habitat Types and Their Principal Locations) specifically lists "North of Smith River" as a "principal location" for sea cliffs and bluffs sensitive habitat type.

LUP "Marine and Water Resources" chapter, Section VII (Specific Area Policies and Recommendations) states as follows:

> F. Sea Cliffs:
>
> > *1. Definition: A sea cliff or bluff is a more or less vertical escarpment fronting the ocean.*
> >
> > *2. Principal Distributions: A large portion of the coastline in Del Norte County consists of sea cliffs ranging from a few to hundreds of feet in height. The primary areas of the sea cliffs are:*
> >
> > *a. North of the Smith River*
> > *b. Point Saint George to Crescent City*
> > *c. South of Crescent City Along Most of the Redwood National Park Coastline*
> >
> > *3. Planning Issues: The principal issues associated with the management of sea cliffs include their fragile nature and their potential for geologic hazards.*
> >
> > *The vegetation of sea cliffs serves to stabilize the generally unconsolidated material of bluff faces. The plant life of sea cliffs, although adapted to the harsh environmental conditions of wind and salt spray, is typically fragile and highly subject to disturbance.*

The faces of sea cliffs provide a special habitat for nesting marine birds and various burrowing species.

Sea cliffs are inherently unstable and therefore potentially hazardous sites when associated with development or coastal access.

4. Policies and Recommendations:

a. Geologic studies shall be required for new construction within the [5] area of demonstration on bluff-tops to determine:

i.)Their suitability for development; and

ii.) The necessary set-backs required to avoid hazards associated with bluff failure.

b. The following bluff areas have undergone excessive vegetation damage from trampling and should be investigated as Coastal Conservancy restoration and enhancement projects:

i.) Pyramid Point to Lopez Creek

ii.) Pebble Beach Public Fishing Access

iii.) Pebble Beach at Murphy Street

D. LCP Policies and Implementation: The following policies are recommended to minimize risks from geologic, seismic and flood hazards within the Coastal Zone of Del Norte County:

1. LCP Policies for Geologic Hazards:

P-1. Any development proposed adjacent to coastline erosion areas shall be preceded by:

- an assessment of the rates of coastal retreat, in the case of bluffs, a detailed examination of underlying geology by a registered geologist or engineering geologist, and

- an analysis of the potential for tsunami run-up

P-2. In lieu of the above the County may establish specific area setbacks of sufficient distance to mitigate potential coastal erosion hazards.

[5] Note: The area of demonstration of stability includes the base, face and top of all bluffs and cliffs. The extent of the bluff top considered should include the area between the face of the bluff and a line described on the bluff top by the intersection of a plane inclined at a 20° angle from horizontal passing through the toe of the bluff or cliff, or fifty feet inland from the edge of the cliff or bluff, whichever is greater. However, the County may designate a lesser area of demonstration in specific areas of known geologic stability (as determined by adequate geologic evaluation and historic evidence) or where adequate protective works already exist. The County may designate a greater area of demonstration or exclude development entirely in areas of known high instability.

P-3. The County shall petition appropriate federal and state agencies to aid in a study of coastal bluff erosion and its impact on the Crescent City Harbor. The studies shall include:

- the source of harbor deposition material, specifically the impact of beach erosion north of Battery Point;

- the effect harbor deposition has on beach sand replenishment south of Crescent City Harbor;

- the impact of harbor dredging practices on the County hospital;

- the impact of harbor dredging on potential tsunami hazard;

- the direct and indirect costs of harbor dredging to the County, and

- the economic benefit of harbor dredging to the County.

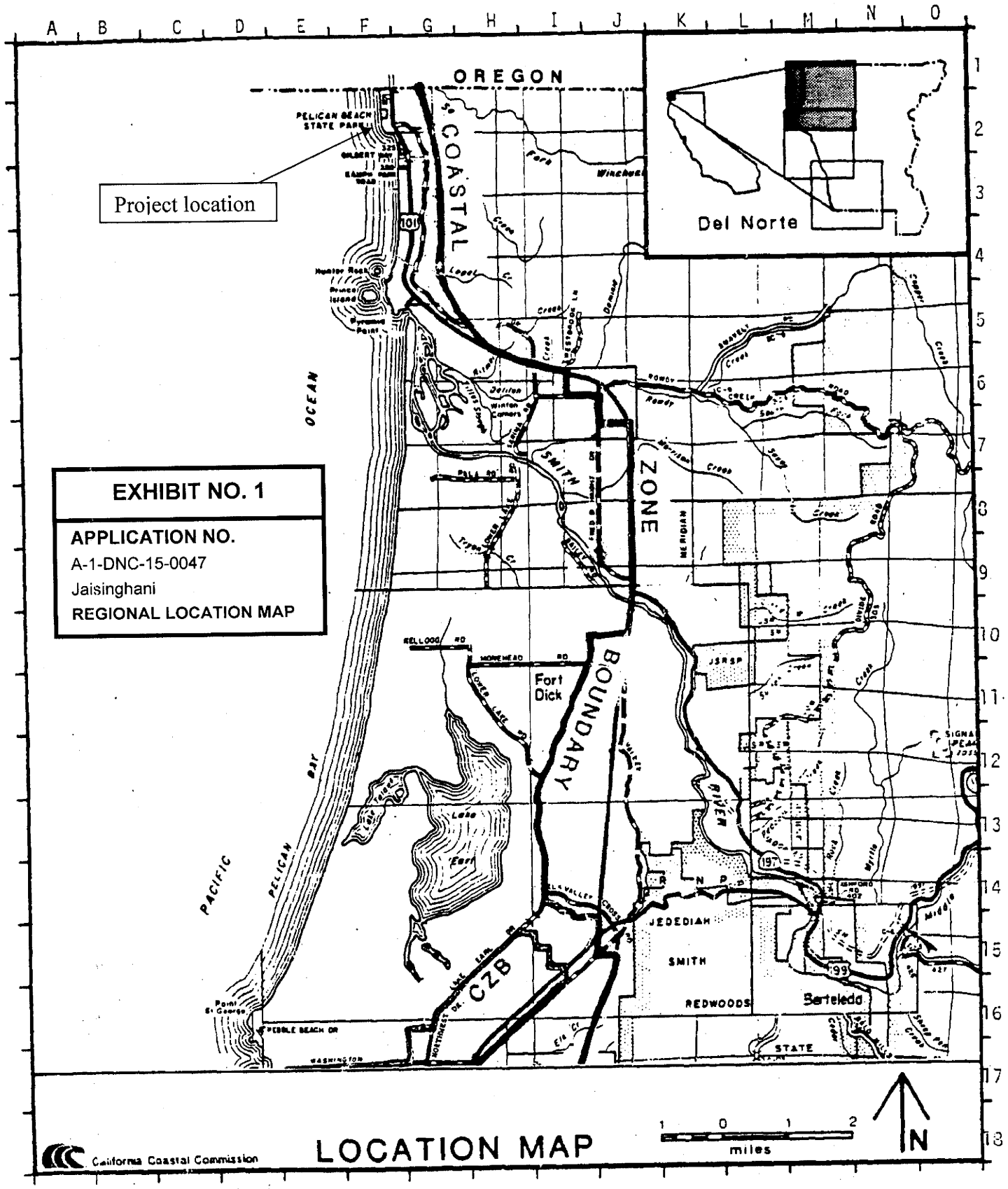
Additionally, the County shall request of the U.S. Army Corps of Engineers a more detailed study of the critical coastline erosion areas in and adjacent to Crescent City, to ascertain the feasibility and practicality of installing seawalls, as recommended by the Corps.

P-4. Residential development involving significant alteration of natural land forms or surface conditions shall be discouraged on slopes greater than 30 percent.

P-5. A geological investigation shall be made by a registered geologist, engineering geologist or RCE for all proposals in landslide potential areas, including road construction. These investigations should assess the stability of the site under both normal and seismic conditions as well as recommend mitigation measures.

P-6. The County, in conjunction with other governmental agencies, when feasible, shall utilize lands subject to severe geologic hazards for low intensity park and recreational activities or open space.

P-7. Any construction contemplated on filled areas shall be preceded by an analysis of the fill and its capabilities or limitations.



County of Del Norte

POR SEC 32 T.19N., R.1W., H.B.&M.

101-7

THIS IS NOT AN OFFICIAL MAP
FOR ASSESSMENT PURPOSES ONLY

1" = 200'

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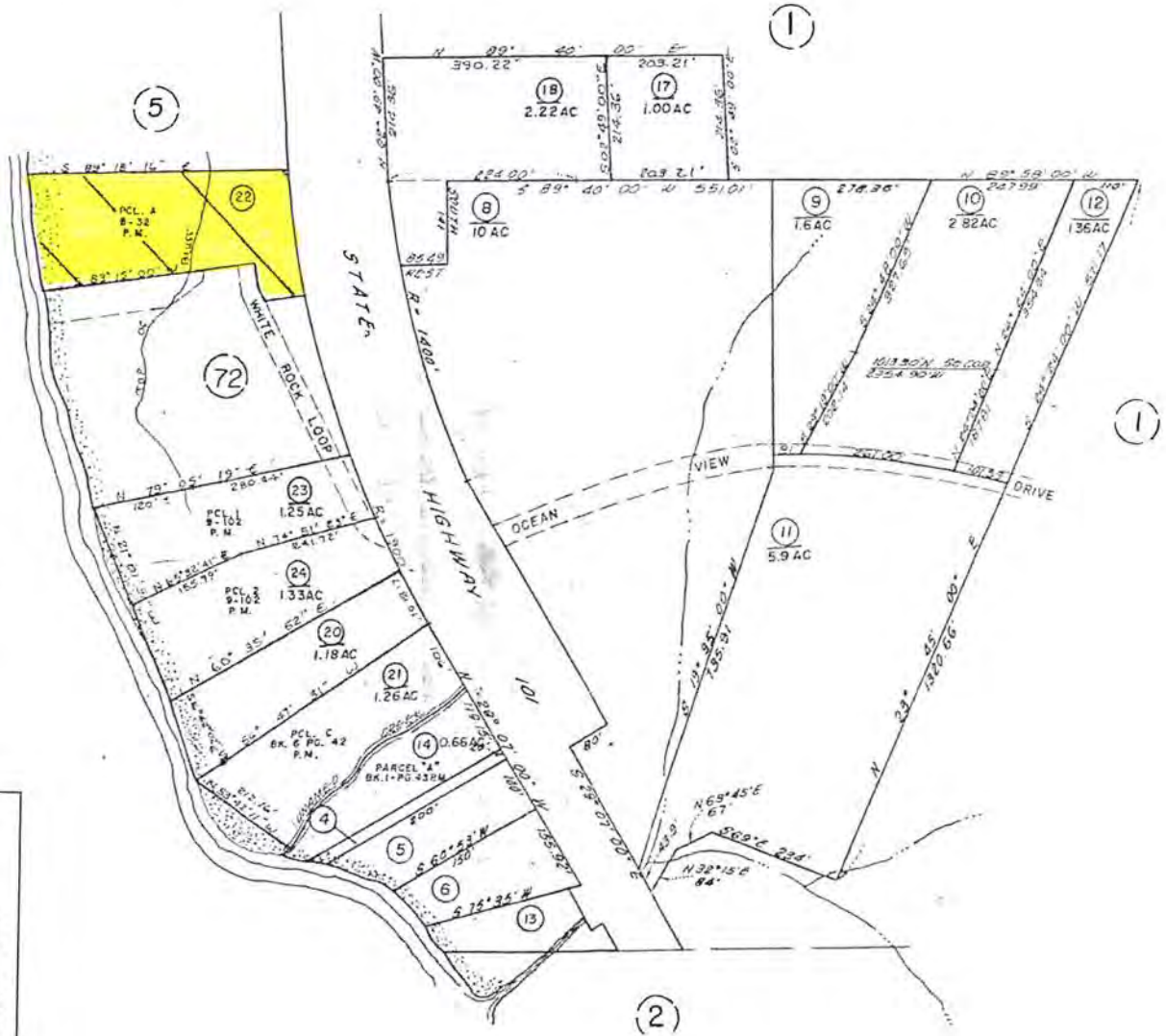


Pacific Ocean

Louise Wilson
Del Norte County Assessor

EXHIBIT NO. 2
APPLICATION NO.
A-1-DNC-15-0047
Jaisinghani
PARCEL MAP

JAISINGHANI, GUL B32949C
—Env. Review/CDP-Demo/New Motel 101-070-22 —

EXHIBIT NO. 3
APPL. NO. A-1-DNC-15-0047
Jaisinghani
SITE PLANS
1 OF 6

PROGRAM & AMENITIES

Number of Guest Units: 10
Manager Unit: 1
Total Bdrms/sleeping Units: 10 (Guest Suites + Manager Unit)
Reception: Entry lobby, cozy inviting warm fireplace. Comfortable lounge chairs and tables for guests to enjoy.
Reception Support: Storage and prep kitchen
Mechanical Rooms: Electric, Water Heating, Phone & Data
Floor Levels: 3 stories
Elevator: Optional (not Req'd. CBC 11B-206.2.3 ex 5)
Laundry Room (1st Floor): Two stacked space/pairs washer/dryer installed. Folding table, ironing station, mop sink, utility & cleaning supply storage for general maintenance.
Supply Room (2nd & 3rd Flr): Small coin operated laundry & basic supplies on the floor (laundry room).
Vending Machines: Weather protected exterior recess for 2 machines: drinks, snacks, etc.

GUEST SUITE DESIGN

Room Types: Double Queen or King Suites
Width: XX'-X" Outside to Common Walls
Length: XX'-X" Exterior Face to Face
Ceiling Height: 9'-0" min.
Ocean View: Yes, all units
Bathing Facilities: Tub/Shower
(Accessible rooms shower per Exception CBC 11B-608.2 & 9)
Bar: Mini-fridge, counter, sink, mirror
Closet: With shelf & rod
Ironing: Wall mount & board, cabinet
Entry Door: Fire-rated, solid core, 1-hour. Solid core doors in locations.
Sliding Glass Door: To patio or roof deck.
Curtains: Privacy & blackout
Balcony: Private, all with Fiberglass guard
HVAC: Thru-wall PTAC, indoor window unit w/ manager and owner
Lighting: All LED, warm light color, dimming
Mobility Features: 1 room (CBC 11B-224.2 & 806.2)
Communications Features: 2 rooms (CBC 11B-224.4 & 806.3)
Fireplace (Ambiance): All rooms provided w/ electric
In-room Spa: Optional for 1 room, to be verified

BUILDING CODE REVIEW

Applicable Codes: 2013 California Building Codes
Construction Type: VA, Wood light frame
Occupancy Groups: Primary guest and owner occupancies per CBC 10A 1.2
- **Guest Suites:** R-1
- **Manager Apt:** R-2
- **Office/Reception:** B Occupancy
- **Incidental:** Laundry & Storage

Fire Sprinkler System: Yes, NFPA 13R (CBC 903.3.1.2)
Design-Build by Others. Coordinate location of riser and FDC w/arch.
Fire Alarm System: Yes, NFPA 72, (CBC Section 907)
Design-Build by Others

CONSTRUCTION SYSTEMS

Foundation: Refer to Soil(s) Report for preliminary
Floor Assemblies: Wood below
- **Ground Floor:** Carpet or Cork, Slab
- **2nd & 3rd floor:** Carpet or T. Cork over 3/4" Acoustical Mat @ T&G Plywd. Sheng. & Glue w/ Tuf-Lumite Underlay Supported by 9-1/4" TJI @ 12" O.C. Layer of Type C Fire Rated Gyp. Bd. Mtd. to the Ceiling Below.

Roof Assembly: Comply with required insulation requirements during gypsum board underlayment installation
Wall Assemblies: Wood Studs w/ Decorative finish elements
- **Exterior:** 2x6 stud w/ 7/8" Plywd & 3/8" Type 1 (3WB)
- **Common:** Double 2x4 walls, separate plates
- **Int Typical:** 1 hr. RRP w/ Acoustic Insul. & Poly Plate
- **Int Typical:** 2x4 w/ 5/8" GWB, Insulated 2x6 @ plumbing walls. Sheetrboard @ wet walls

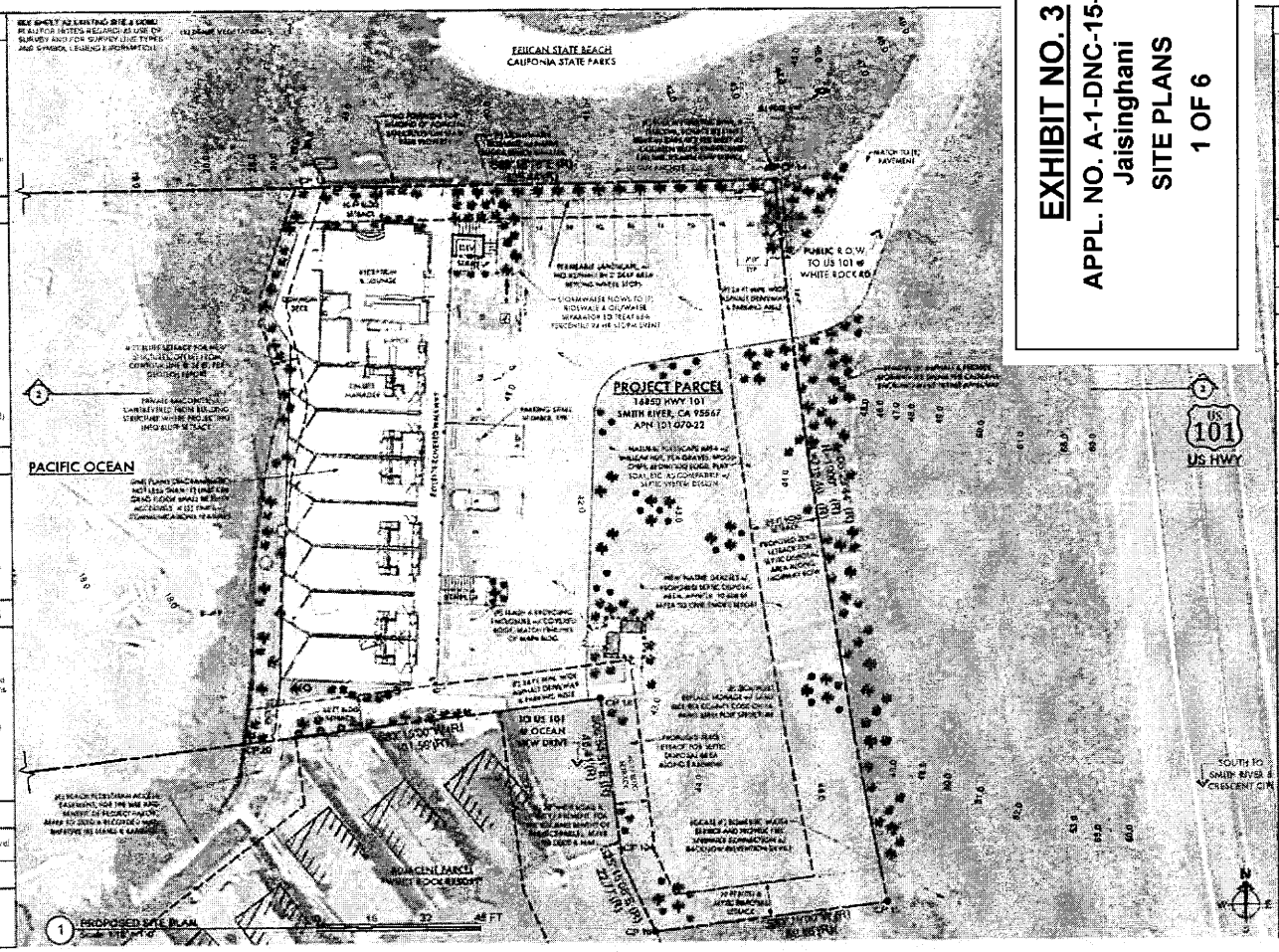
Stairs: Fire-rated concrete treads & steel frame
Corridor: No interior corridor service. Walkway only
Exterior Finishes: Durability & rust prevention is essential

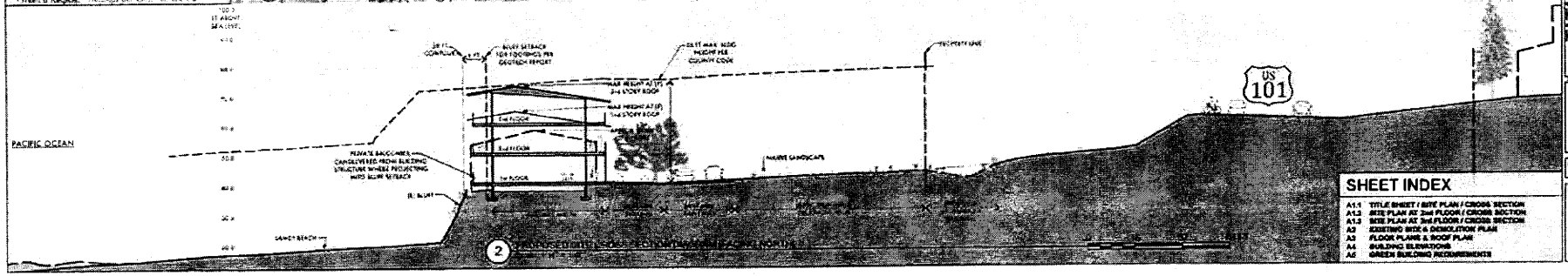
HAZARDS & TSUNAMI

Refer to reports by Geotek Engineering and LACO Associates related to potential hazards including but not limited to: site level risk, flooding, inundation, seismic, & geotechnical.

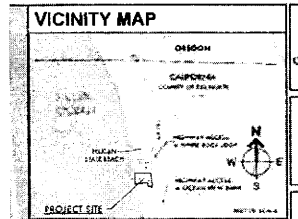
UTILITIES

- **Water:** Smith River Community Services District
- **Electric:** Pacific Power, underground from (e) pole
- **Telecom:** To be verified
- **Propane:** If needed provide tank screening per NFPA
- **Sewer:** New on-site Septic Disposal System
- **Trash & Recycle:** Recology Del Norte 707-464-8181





VICINITY MAP



PROJECT DESCRIPTION

Proposed project includes removal of existing residences on-site and construction of new beach front boutique motel with 10 guest units and 1 onsite manager unit, including new community structure, parking, septic disposal, and storm water improvements.

PROJECT TEAM

- **Owner:** Gul Jaisinghani
- **Owner's Rep.:** Arkitekt
- **Engineering & Survey:** Mercer Engineering (Project Lead)
- **Architecture:** K. Boodjeh Architects
- **Geotechnical:** LACO Associates

PROJECT SITE & ZONING

Project address: 16850 Hwy 101, Smith River, CA 95567
APN: 101-070-22
Planning: County of Del Norte, Randy Hansen, Planning Director
- General Plan, including Coastal Element (LCP): "MU"

Zoning District: CH = Commercial Highway (Ord. 2.3.10)
Combining Districts: CC = Coastal Area Combining District
- Coastal Wetland Habitat: Two vern. pools, 1 drainage feature
- Coastal Access: Public vertical access not required. See (a) existing access adjacent on South, adjacent property.
- Highly Scenic Visual Resource Area

Permitted Use: Tourist Visitor Facilities permitted

Min. Lot Width:	100 FT (exist)
Min. Lot Area:	1 Acre (exist)
Max. Bldg Height:	35 FT (exist)
Max. Lot Coverage:	60% max. See Area Analysis below.
Yard Setbacks Req'd:	Listed below
• Front (Yd1):	20 feet min.
• Side (North):	10 feet min.
• Side (South):	10 feet min.
• Bluff (Coastal):	8 feet from 1.5 to 1 bluff per Geotech
Parking, Quantity, Req'd:	Motels - 1 space per unit (§31.44.050)
Parking, Quantity, Prop'd:	25 spaces total (10 units + 1 manager + 14 guest)
Parking, Size:	Standard 9'x20' min. Compact 8'x16' min. (20% of total)
Parking, Screening:	Fence or Planting screen along side or rear lot in residential district
Driveway:	Access Aisles: 20 FT wide min.
Accessible Parking	1 van Accessible (adjacent to Front per CBC Table 11B-208.2)
	Total min. not provided
RV Parking	Not req'd per CBC 11B-224.4.2
Accessible sidewalk:	Provided per CBC 1004
Play Areas:	Provided per CBC 1004
Site Lighting:	Exterior, Bollard min. 3 FC at 36"
Signage:	Max. 32 sq.ft / 40 SF (Coastal CH 10)
Trash Enclosure:	Screened from all adjacent areas
Beach Access:	Yes, accessible steel edge pavement
Stormwater (LID)	Bioswales & infiltration retention Treat 0.85 Q percentile, 24hr storm
Landscaping	Native Beach & Bluff Edge planting, confirm w/ California Coastal Act.

Aesthetics: Proposed development to protect views to and along ocean and scenic coastal areas, minimize alteration of natural landforms and be compatible with surrounding areas (Coastal Act 30251).

AREA ANALYSIS

- **Total Site Area:** 1.0 (or 43,560) SF (Survey and or Title)
- **Building Footprint:** 1,875 SF (Enclosed Walls & Balconies)
  - 1st Floor Area: 625 SF
  - 2nd Floor Area: 625 SF
  - 3rd Floor Area: 625 SF
- **Total Floor Area:** 1,875 SF (excl. walls & bal. areas)
- **Trash Enclosure:** 150 SF (with roof)
- **Paved Parking:** 8,250 SF
- **Septic Disposal:** 1,100 SF (excl. bldg. footprint + repairs)
- **Landscape Area:** 1,925 SF +/- (Outside of Septic Disp. Area)
- **Lot Coverage:** 33% not Covered by Buildings, Cmpd.

SHEET INDEX

PRELIMINARY NOT FOR CONSTRUCTION

K. BOODJEH ARCHITECTS
ARCHITECTURE AND PLANNING
707.822.0691 P.O. BOX 881 ARCATA, CA 95518

NAUTICAL INN
OWNER: GUL JAISINGHANI
16850 HWY 101 , SMITH RIVER, CA 95567
A.P.N. 101-070-22
LAT: 41°59.47'N LONG: 124°15.52'W

TITLE SHEET
SITE PLAN & CROSS SECTION

11 JULY 2016

A1.1

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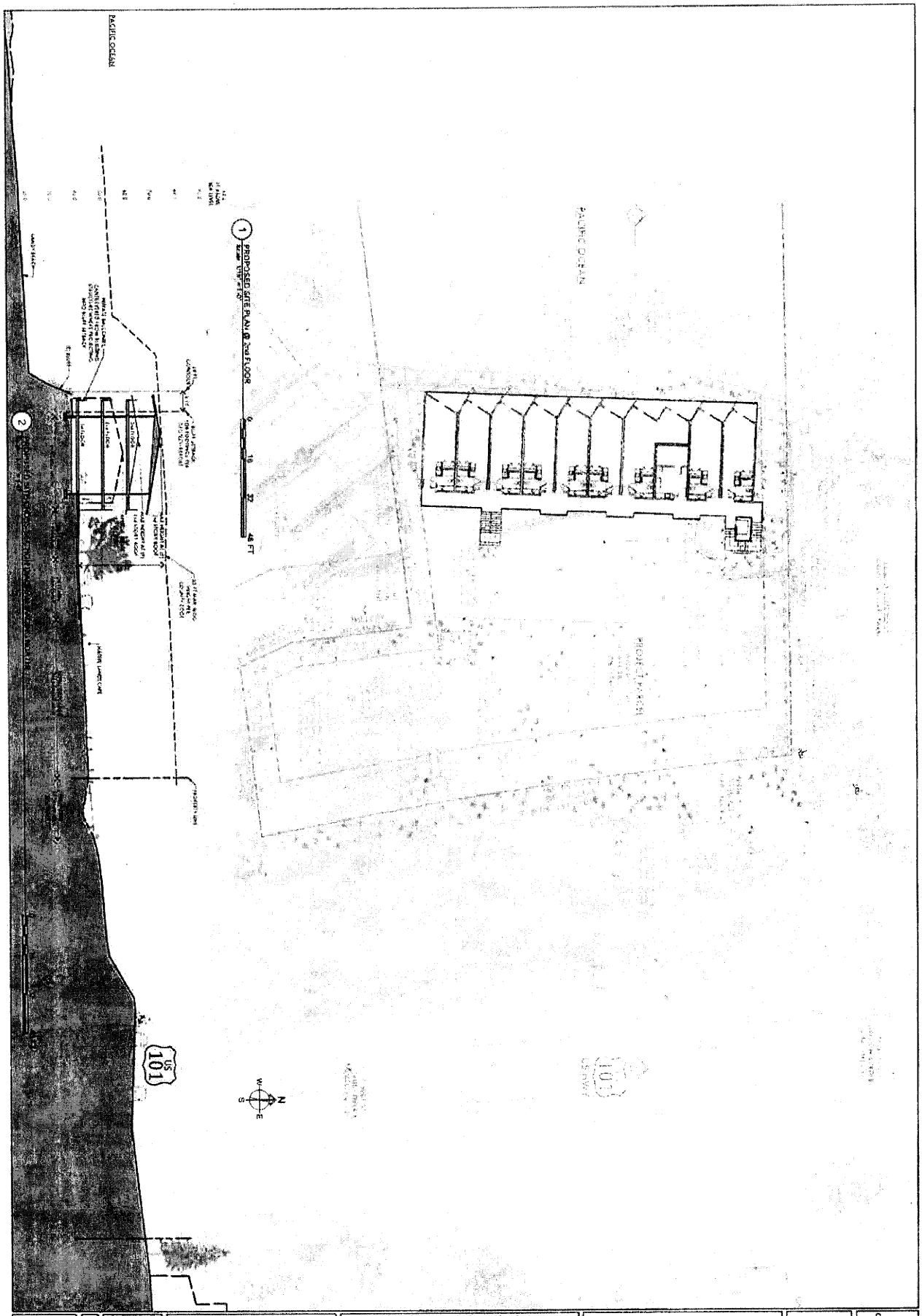
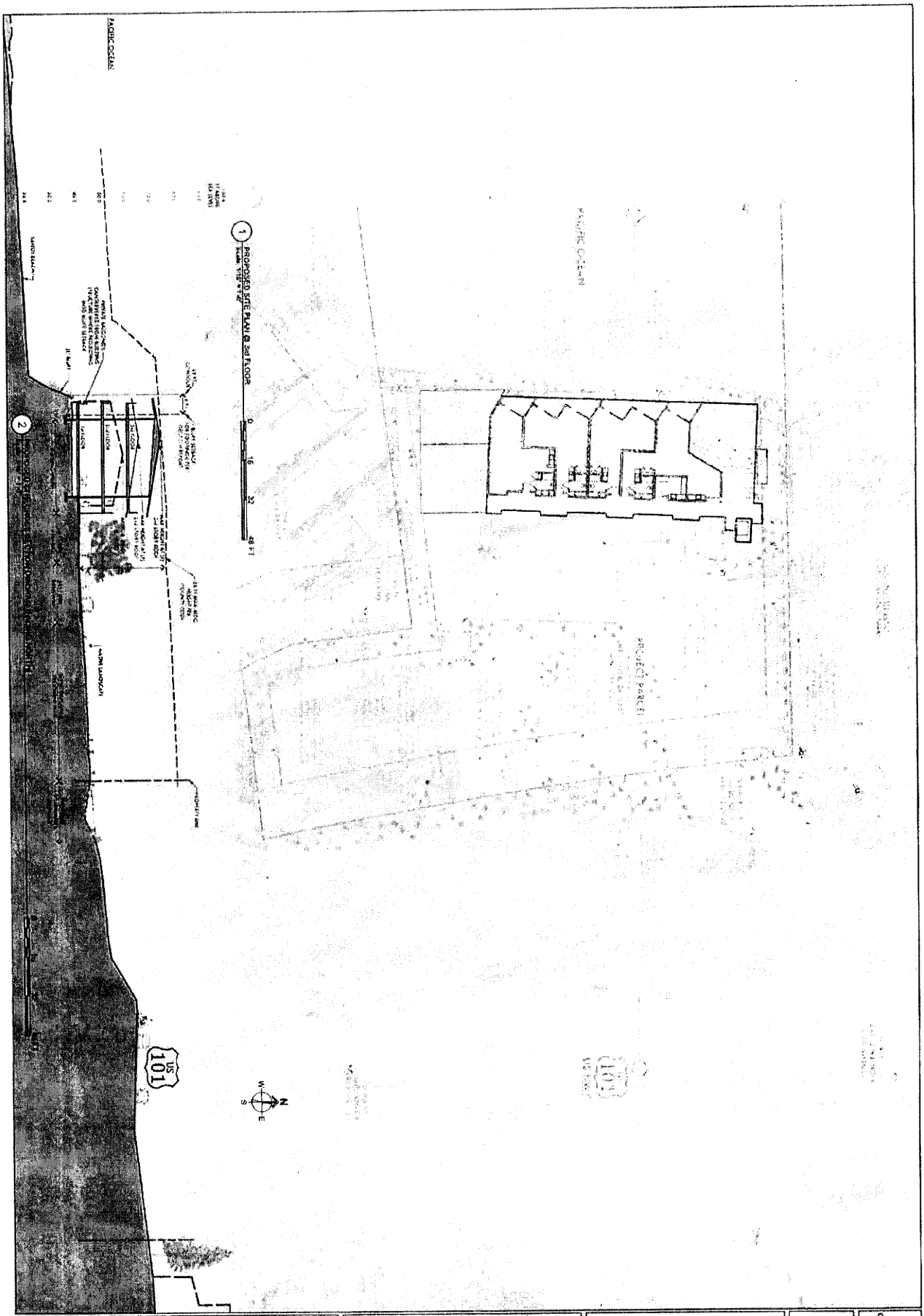
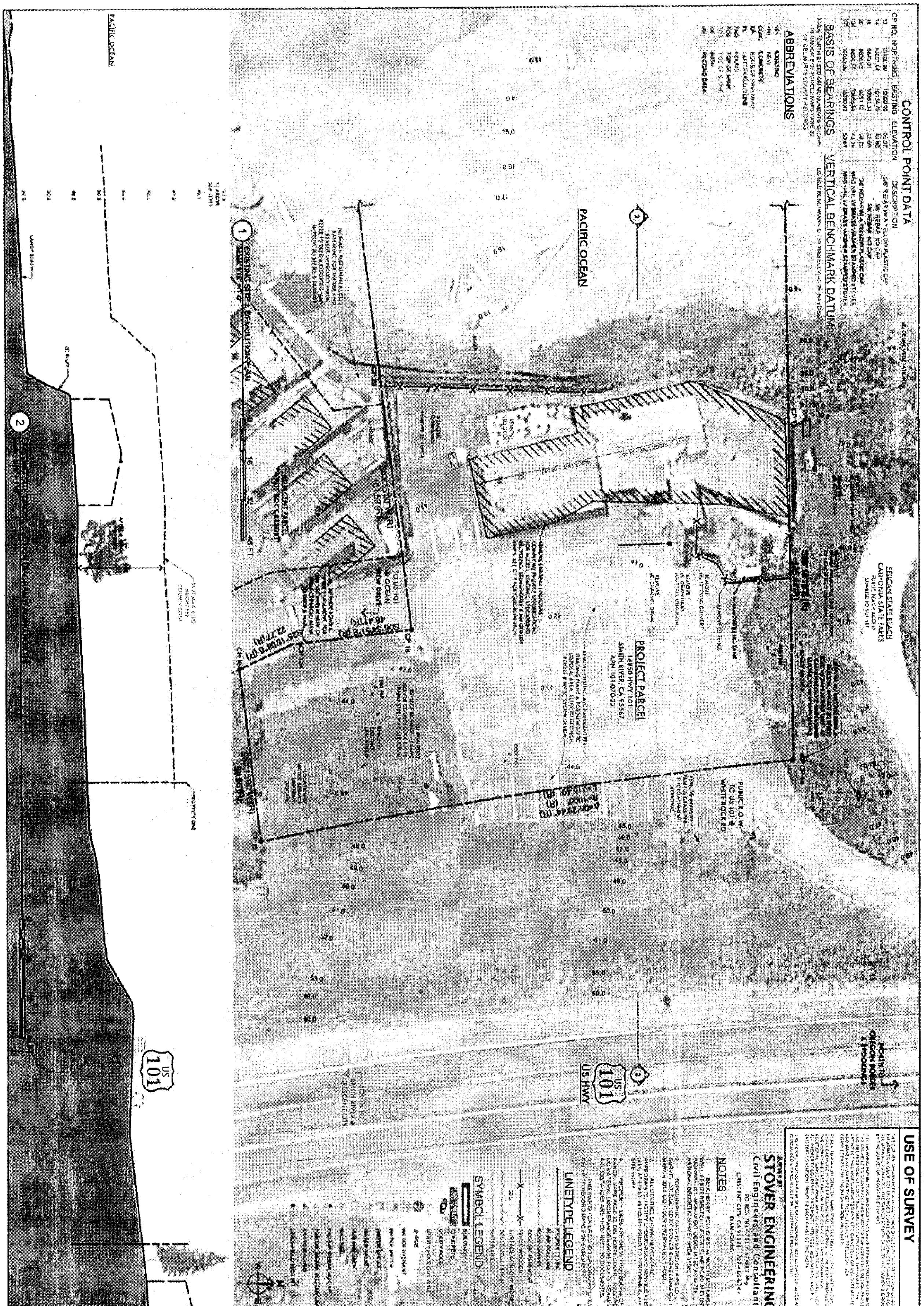
JAISINGHANI, GUL B32949C
Env. Review/CDP-Demo/New Motel 101-070-22



A1.2			SITE PLAN AT SECOND FLOOR	NAUTICAL INN OWNER: GUL JAISINGHANI 16850 HWY 101, SMITH RIVER, CA 95567 A.P.N: 101-070-22 LAT: 41°59.47'N LONG: 124°15.52'W	K. BOODJEH ARCHITECTS ARCHITECTURE AND PLANNING 707.822.6691 P.O. BOX 691 ARCATA CA 95518	PRELIMINARY NOT FOR CONSTRUCTION



A1.3		SITE PLAN AT THIRD FLOOR	NAUTICAL INN OWNER: GUL JAISINGHANI 16850 HWY 101, SMITH RIVER, CA 95567 A.P.N. 101-070-22 LAT: 41°59'.47"N LONG: 124°15'.52"W	K. BOODJEH ARCHITECTS ARCHITECTURE AND PLANNING 707.822.0681 P.O. BOX 661 ARCATA CA 95518	PRELIMINARY NOT FOR CONSTRUCTION



PRELIMINARY
NOT FOR CONSTRUCTION

K. BOODJEH ARCHITECTS
ARCHITECTURE AND PLANNING
707.822.8681 P.O. BOX 881 ARCATA CA 95518

NAUTICAL INN
OWNER: GUL JAISINGHANI
16850 HWY 101, SMITH RIVER, CA 95567
A.P.N. 101-070-22
LAT: 41°59.47'N LONG: 124°15.52'W

EXISTING SITE & DEMOLITION

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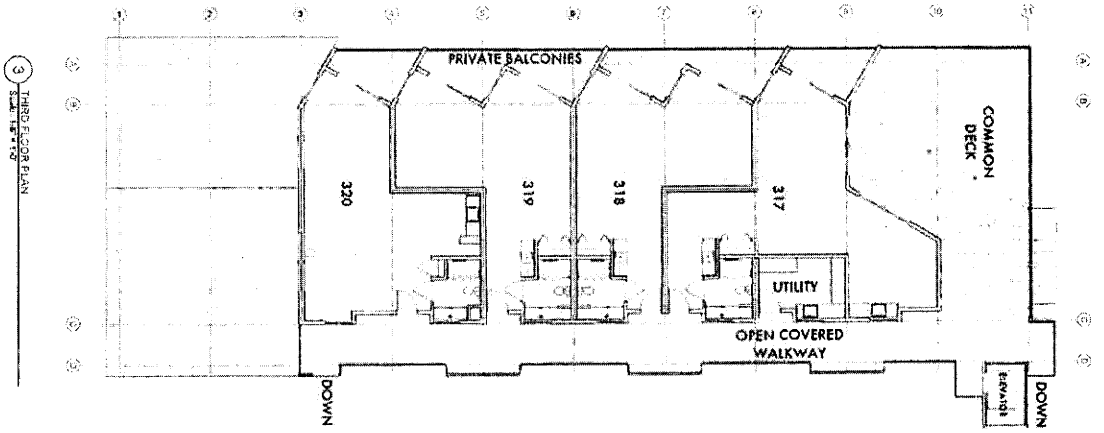
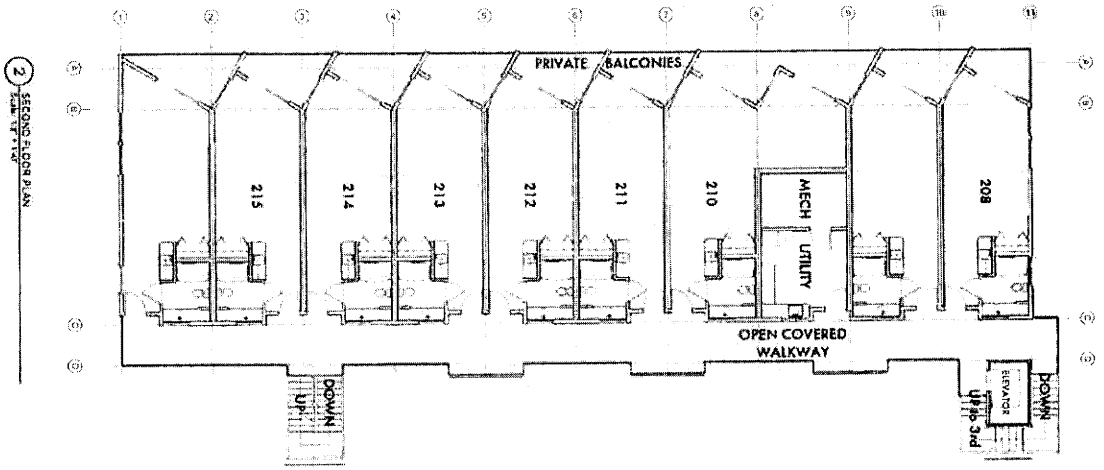
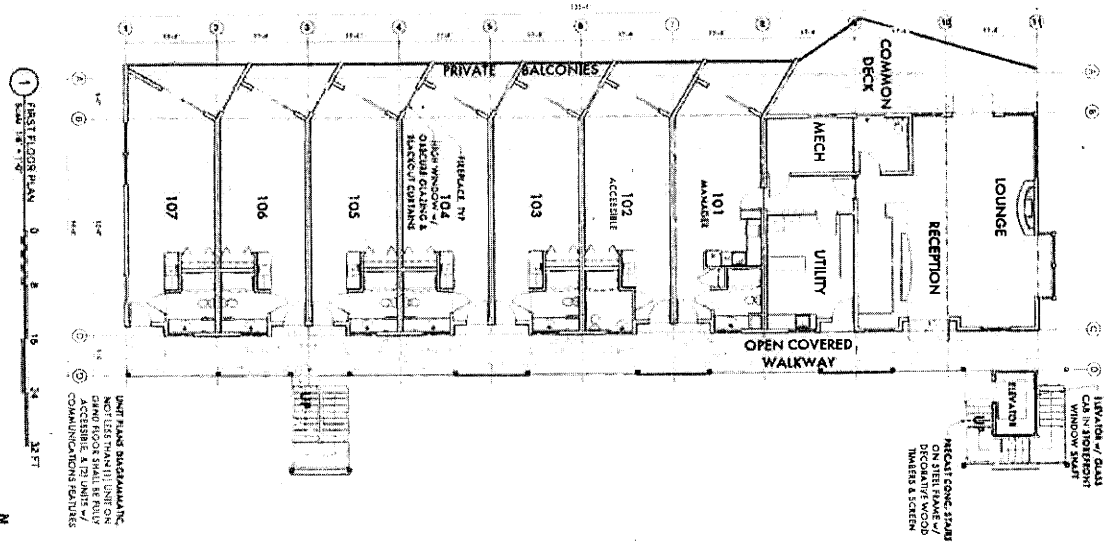


3 THIRD FLOOR PLAN



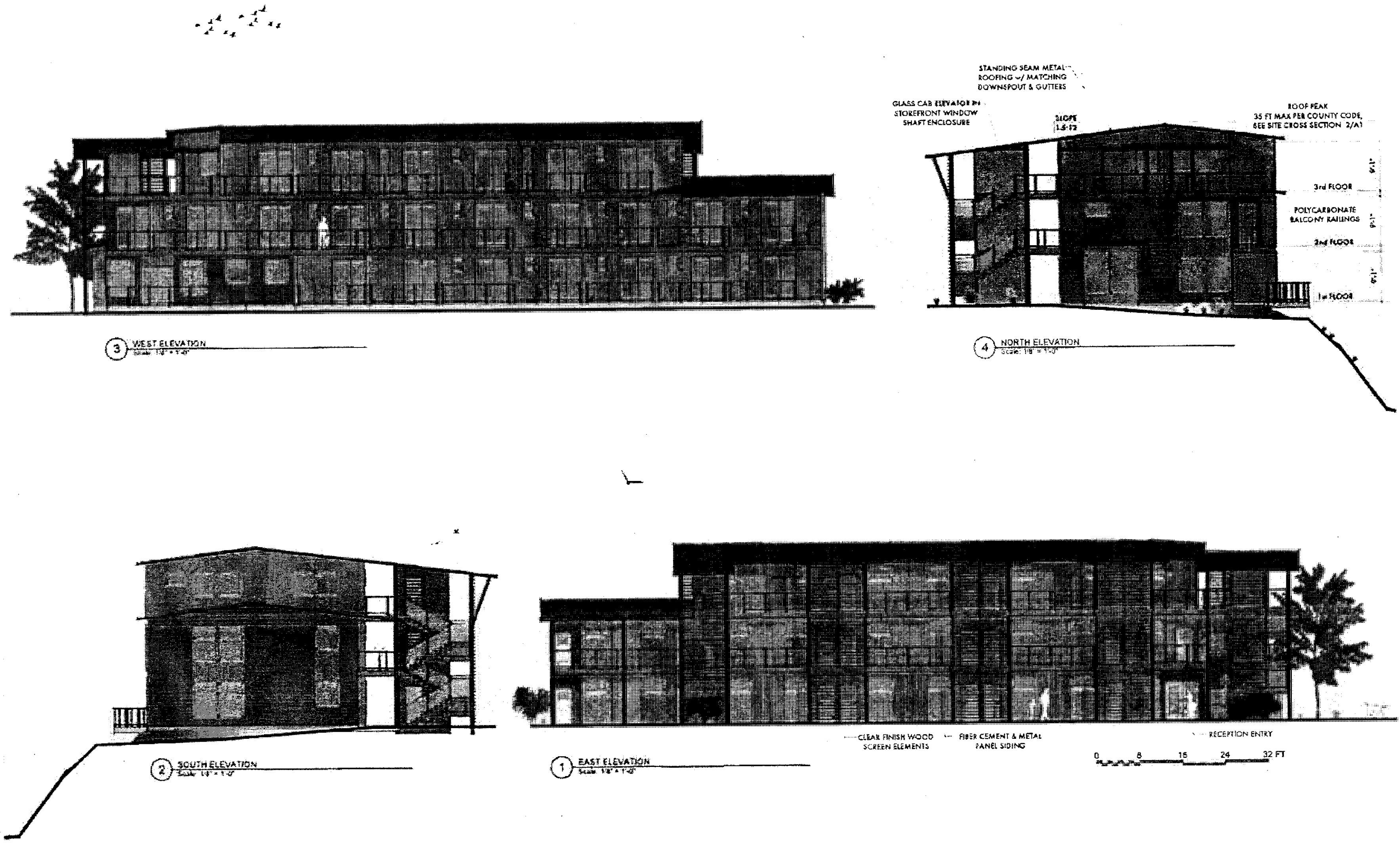
2 SECOND FLOOR PLAN



1 FIRST FLOOR PLAN

UNIT PLANS DIAGRAMMATIC NOT LESS THAN (1) UNIT ON EVERY FLOOR SHALL BE FULLY ACCESSIBLE & ADAPTABLE & COMMUNICATIONS FEATURES

A3	11 DEC 2018		SCHEMATIC FLOOR PLANS	**NAUTICAL INN** OWNER: GUL JAISINGHANI 16850 HWY 101 , SMITH RIVER, CA 95567 A.P.N. 101-070-22 LAT: 41°59.47'N LONG: 124°15.52'W	**K. BOODJEH ARCHITECTS** ARCHITECTURE AND PLANNING 707.822.8691 P.O. BOX 861 ARCATA CA 95518		PRELIMINARY NOT FOR CONSTRUCTION



PRELIMINARY NOT FOR CONSTRUCTION

K. BOODJEH ARCHITECTS
ARCHITECTURE AND PLANNING

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OWNER: GUL JAISINGHANI
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A.P.N. 101-070-22
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SCHEMATIC ELEVATIONS

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JAISINGHANI, GUL B32949C
Env. Review/CDP-Demo/New Motel 101-070-22

Former Nautical Inn
Geotechnical Report

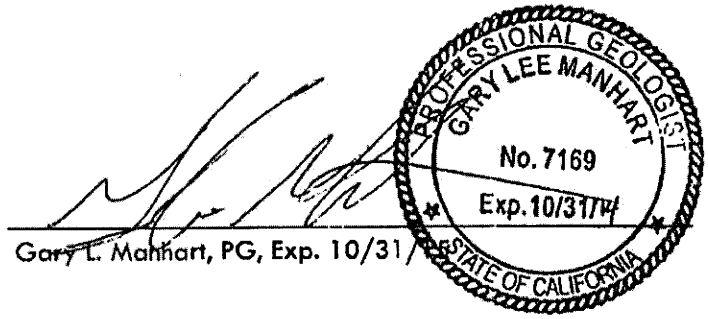
APN 101-070-022, Smith River, California

July 29, 2014

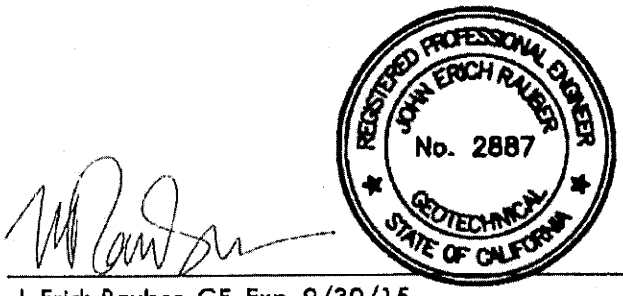
Prepared For:
Gul Jaisinghani

Prepared By:
LACO Associates, Inc.
21 W. 4th Street
Eureka, California 95501
707 443-5054

Project No. 8062.00



Gary L. Manhart, PG, Exp. 10/31/14



J. Erich Rauber, GE, Exp. 9/30/15

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EXHIBIT NO. 4
APPL. NO. A-1-DNC-15-0047
Jaisinghani
GEOTECHNICAL REPORT
1 OF 21

B32949C

TABLE OF CONTENTS

1.0 INTRODUCTION

This report presents the results of a Geotechnical Exploration performed by LACO Associates (LACO) to support construction of the proposed motel building on the subject site. Included in this report is an assessment of the potential geologic hazards associated with the proposed development and recommendations to mitigate the potential effects of such hazards.

2.0 SITE AND PROJECT DESCRIPTION

The subject 0.7 acre site (Assessor's Parcel Number 101-070-022) is located near the western edge of Section 32, Township 19 North, Range 1 West, Humboldt Baseline and Meridian, of the United States Geological Survey (USGS) Smith River 7.5-Minute Series Topographic Quadrangle (Figure 1). It is currently has a building located on the bluff edge and a parking lot to the east of the building the remainder of the site is covered with grass and low vegetation.

We understand the current plan is to redevelop the site with a new motel building and associated paved parking lot. Design details of the proposed motel were not available at the time of the preparation of this report. Based on discussions with the Gul Jaisinghani, the proposed two to three story, 20 unit motel building will likely be supported by a shallow footing with a slab on grade foundation system. Although building construction details are not yet known, a wood or metal-frame structure of light to moderate loading is typically associated with the proposed building type.

3.0 SCOPE OF SERVICES

In accordance with our agreement dated June 2, 2014, LACO's scope of services for this project was limited to:

1. Reviewing existing published geologic maps pertinent to the subject site and readily available unpublished soils and geologic reports.
2. Performing a field exploration program that includes:
    a. Geologic and geomorphic mapping of the proposed development area and vicinity.
    b. Subsurface exploration to characterize and sample soils within the development area.
    c. Collecting soil samples for possible laboratory analysis.
3. Conducting a laboratory testing program of selected soil samples to characterize relevant soil properties, as appropriate.
4. Preparing this 2013 California Building Code (CBC) compliant geotechnical report that documents existing subsurface conditions and provides foundation and earthwork recommendations for the proposed development.

Specifically excluded from our scope of services is a quantitative liquefaction analysis and an environmental assessment for the presence or absence of any hazardous, toxic, or corrosive materials. Although we have explored subsurface conditions as part of this investigation, we have not conducted any analytical laboratory testing of samples obtained for the presence of gasoline constituents, hazardous and/or corrosive materials.

4.0 LIMITATIONS

This report has been prepared for the exclusive use of Gul Jaisinghani, his contractors and consultants, and appropriate public authorities for specific application to development of the subject site. LACO has endeavored to comply with the generally accepted geotechnical engineering standard of care common to the local area. LACO makes no other warranty, express or implied. A brochure prepared by Association of Firms Practicing in the Geosciences (ASFE) has been included as Attachment 1 of this report. We recommend that all individuals reading this Report also read this brochure.

The analyses and recommendations contained in this report are partially based on data obtained from subsurface exploration. The methods used indicate subsurface conditions only at specific locations where samples were obtained, only at the time of the exploration, and only to the depths penetrated. Samples cannot always be relied upon to accurately reflect stratigraphic variations that commonly exist between sampling locations, nor do they necessarily represent conditions at any other time. Results of any analysis of samples obtained during this project will be retained on file in our office. Unless directed otherwise by our Client, collected samples will be discarded 30 days following the issuance of this report.

The recommendations included in this report are based, in part, on assumptions about subsurface conditions that may only be observed and/or tested during subsequent project earthwork. Accordingly, the validity of these recommendations is contingent upon review of the subsurface conditions exposed during construction in order to check that they are consistent with those characterized in this report. Upon request, LACO can discuss the extent of (and fee for) observations and tests required to check the validity of the recommendations presented herein.

This report's conclusions or recommendations may not be valid if the nature, design, or location of the project is changed. If changes are contemplated, LACO should be consulted to review their impact on the applicability of the recommendations presented in this Report. Also, LACO cannot be responsible for any claims, damages, or liability associated with any other party's interpretation of the subsurface data presented herein, or the reuse of this report for other projects or at other locations without our express written authorization.

5.0 FIELD EXPLORATION AND LABORATORY TESTING

To assess in-situ soil conditions within the proposed development area, LACO reviewed the boring logs from previous subsurface explorations near the site (LACO 2011), and performed a field exploration program on June 26 and July 8, 2014. Our field exploration effort included drilling one boring utilizing a hollow stem auger to a maximum depth of 9 feet. The location of the boring (B1) is indicated on Figure 2. Due to the gravelly and cobbly nature of the subsurface below approximately five feet, the hollow stem auger could no longer penetrate the subsurface and drilling was terminated. Our geologist logged the soils and obtained soil samples of the materials encountered during the drilling. Soils were also logged from the bluff face; the soil profile location is marked on Figure 2. Soils were described in general accordance with the American Society for Testing and Materials (ASTM) Test Procedure D2488 Visual-Manual Procedures. The boring log and bluff soil profile are included in Attachment 2. Soil samples were delivered to our laboratory for possible analysis.

Due to the relatively fine granular nature of the upper five feet of soils encountered, laboratory testing was limited to particle size, a direct shear on the fine grained material and moisture-density analysis. The coarser grained soils were tested for grain size. Laboratory test results are presented on the soil logs in Attachment 2.

On July 9, 2014, Advanced Geological Services performed a geophysical survey at the site. It consisted of two approximately 200-foot long seismic refraction lines generally oriented perpendicular to one another (Figure 2); the geophysical survey report is presented in Appendix 3. The geophysical survey was initiated to obtain subsurface data to estimate the depth and character of underlying soil strata and bedrock.

6.0 SITE AND SUBSURFACE CONDITIONS

6.1 Topography and Site Conditions

The site is situated on a flat low gradient ground surface (less than 5 percent). As mapped by United States Geologic Survey, the site is at an elevation of approximately 40 feet above mean sea level (msl). As noted previously, the site is currently occupied by a former restaurant and associated parking lot.

6.2 Geologic Setting

Based on a review of published geologic mapping (CDMG 1983), the soils beneath the site are unconsolidated Pleistocene alluvial deposits identified as the Battery Formation (Qby) (see Figure 2). The alluvium is primarily composed of marine terrace sand and dune deposits overlying imbricated gravels and sands.

6.3 Seismicity

The subject site is located within a seismically active region in which large earthquakes are expected to occur during the economic life span (50 years) of the development. North of the Mendocino triple junction, the regional tectonic framework is controlled by the Cascadia Subduction Zone (CSZ), wherein oceanic crust of the Juan de Fuca/Gorda plate is being actively subducted beneath the leading edge of the North American plate. The CSZ in its entirety extends from the Mendocino triple junction to British Columbia. Plate convergence along the Gorda segment of the CSZ is occurring at a rate of approximately 30 to 40 millimeters per year (mm/yr) (Heaton & Kanamori 1984). Rupture along the entire CSZ boundary may produce an earthquake with a maximum moment magnitude (Mw) of 9.0 or greater (Satake 2003).

The subject site is located in proximity to the late Quaternary-aged Big Lagoon Bald Mountain fault, which is a north-northwest trending thrust fault. Currently, the Big Lagoon Bald Mountain fault is not recognized by the State of California as being active within the past 11,000 years (CGS 2007). The CSZ and Trinidad fault are both recognized active faults located within a 55-mile radius from the subject site. The Trinidad fault is a northwest-striking, northeast dipping, low-angle thrust fault. The upper-bound earthquake considered likely to occur on the Trinidad fault has an estimated Mw of 7.3 (ICBO 1998).

Based on the record of historical earthquakes, faults within the plate boundary zone and internally-deforming Gorda Plate have produced numerous small-magnitude and several moderate to large (i.e., magnitude greater than 6) earthquakes affecting the local area. Several active regional seismic sources in addition to those described above are proximal to the subject site and have the potential to produce strong ground motions. These seismic sources include:

- The northern segment of the San Andreas transform fault that represents the boundary between the stable North American plate and the northwest-migrating Pacific plate;
- The Mendocino fault, an offshore, high-angle, east-west-trending, right-lateral strike-slip fault that forms the boundary between the Gorda and Pacific plates; and
- Faults within the internally-deforming Gorda plate consisting of high-angle, northeast-trending, left-lateral, strike-slip faults.

6.4 Soil Conditions

The shallow soils underlying the site consist of approximately 5 feet of native fine sandy silt. Underlying the surface soils are discontinuous and heterogeneous layers of dense silty sandy well-graded gravels to the maximum depth explored (~9 feet bgs). Logging the bluff face indicates that the gravels continue below the beach sands at the toe of the bluff.

6.5 Groundwater Conditions

A review of groundwater monitoring data from the environmental investigations near the site indicates groundwater fluctuates between approximately 8 to 10 feet bgs (LACO 2011). No seeps or emergent groundwater was observed from the bluff face during our investigation

7.0 GEOLOGIC HAZARDS

Potential geologic hazards assessed for the subject site include seismic ground shaking, surface fault rupture, liquefaction and related phenomena, settlement, flooding and high groundwater, tsunami inundation, and slope instability. These assessments are presented in the following paragraphs.

7.1 Seismic Ground Shaking

As noted in Section 4.3 of this report, the subject site is situated within a seismically active area proximal to multiple seismic sources capable of generating moderate to large ground motions. Consequently, there is high probability that the subject site will experience strong ground shaking during the economic life span of the proposed development. As prescribed by the 2013 CBC, the spectral response accelerations for seismic analysis and design of proposed structures are presented in Section 8.3 of this report.

7.2 Surface Fault Rupture

The subject site is not located within an Alquist-Priolo earthquake fault zone and, as such, does not require a trench-based fault rupture hazard evaluation. Based on the distance between the subject site and the closest active fault, the potential for surface fault rupture to occur within the subject site is low.

7.3 Liquefaction

Liquefaction is a phenomenon in which loosely deposited granular soils generally less than 50 feet below ground surface, with silt and clay contents of less than approximately 35 percent and non-plastic silts located below the groundwater table undergo rapid loss of shear strength when subjected to strong earthquake-induced ground shaking. Ground shaking of sufficient duration results in the loss of grain-to-grain contact due to a rapid rise in pore water pressure, and causes the soil to behave as a fluid for a short period of time. Factors known to influence liquefaction potential include composition and thickness of soil layers, grain size distribution, relative density, and both intensity and duration of ground shaking.

As presented on Map S-2 of Special Publication 115 (CDMG 1995), the subject site is not in an area delineated as having a liquefaction hazard. A quantitative liquefaction analysis was not performed.

Lateral spreading, which is the lateral displacement of surficial soils, is usually associated with liquefaction of the underlying soils. Given that the liquefaction hazard at the subject site is considered to be low, the potential for liquefaction-induced lateral spreading is also considered to be low.

7.4 Settlement

Static settlement is the result of compressive deformation of soil beneath an applied load. The compressive deformation generally results from a reduction in voids within the soil. In dry or granular soils, the compression of the soil occurs relatively rapidly. Conversely, the compressive deformation in soft, saturated fine-grain soils often occurs very slowly.

The proposed development is anticipated to be relatively lightly- to moderately-loaded, and supported on native soils. As such, provided building foundations are designed per our recommendations, we estimate total foundation settlement will be less than 1 inch (Schmertmann 1979), and to occur during the building construction. Differential settlement should be less than ¼ inch across a distance of approximately 20 feet.

7.5 Slope Instability/Landsliding

Slope instability and setbacks from the bluff face are addressed in a separate report (LACO 2014).

7.6 Flooding, Tsunami, and High Groundwater

7.6.1 Flooding

The Site is in Flood Insurance Rate Map, Del Norte County, California and Incorporated Areas, Panel 30, Map number 06015C0030F (100 year flood) area(2010). The Site is not with in Zone A (the 100 year flood zone). Zone A is generally confined to the beach below the toe of slope. No base flood elevation has been determined for Zone A and the Site is approximately 20 feet higher than Zone A. Risk of future flooding with the potential to adversely affect the project is considered to be low.

7.6.2 Tsunami

The tsunami hazard map published by the State of California (CGS, 2009), indicates the subject site is within a predicted tsunami hazard inundation zone. The Tsunami hazard zone has been developed for planning purposes and to assist government agencies identify potential tsunami inundation Hazards and emergency planning. The map was prepared to assist cities and counties in identifying their tsunami hazard. It is intended for local jurisdictional, coastal evacuation planning uses only. The map is not a legal document and does not meet disclosure requirements for real estate transactions nor for any other regulatory purpose. The inundation map was compiled with best available scientific information at the time of its publication. The inundation line represents the maximum considered tsunami runup from a number of extreme, yet realistic, tsunami sources. Tsunamis are rare events; due to a lack of known occurrences in the historical record, the map includes no information about the probability of any tsunami affecting any area within a specific period of time.

7.6.3 Groundwater

As noted in Section 6.5 of this report, emergent groundwater or evidence of groundwater seepage was not observed on the approximately 20 foot high bluff face during our site reconnaissance.

7.7 Expansion Potential

Some clay minerals undergo volume changes upon wetting or drying. Soils containing such minerals will shrink/swell with the removal/addition of water. The heaving pressures associated with swelling can damage structures and flatwork. The soils encountered during our field exploration consist primarily of granular soils. Thus, we judge the likelihood of expansive soils being present is low to negligible.

8.0 RECOMMENDATIONS

Based on the results of our field exploration, laboratory testing, engineering analysis, and literature review, we judge the subject site to be suitable for development of the proposed building, provided the recommendations presented in this report are incorporated into the project design and construction.

The main geologic/geotechnical engineering considerations affecting design and construction of the proposed development include: the potential for strong seismic shaking occurring at the Site, slope instability and tsunami inundation.

8.1 Foundations

The planned up to three-story building can be supported on shallow spread footings designed and constructed in accordance with the minimum standards of the 2013 CBC and the recommendations (including earthwork) contained herein.

The footings should bear on low organic content native stiff sandy silt beginning at approximately 1.5 feet bgs assuming a 1.5 feet footing width. For design, use a maximum allowable bearing pressure of 3,500 pounds per square foot (psf) for dead, 4,200 pounds per square foot (psf) for dead plus live loads, and Total including windand/or seismic 5,200 pounds per square foot (psf).

Resistance to lateral forces may be computed using friction along or passive pressure against foundation elements. Friction between the undersurface of concrete footings and the supporting soil is available, as well as passive pressure acting against the sides of foundations. Use an allowable lateral bearing pressure of 250 pounds per cubic foot, and an allowable coefficient of friction of 0.25 between the footing bottoms and underlying soil. If friction and passive pressures are combined, the lesser value should be reduced by 50 percent.

Footing concrete should generally be placed neat against a firm soil surface that is relatively free of loose debris material. If backfill against formed footings is required, it should be a structural fill material that is placed and compacted as recommended in the earthwork section of this report.

Where trenches closely parallel a footing and the trench bottom is within a 2:1 (horizontal:vertical) projection outward and downward from the footing, concrete slurry (2-sack minimum) should be utilized to backfill that portion of the trench below the plane. The use of slurry backfill is not required where a narrow trench crosses a footing at or near a right angle.

8.2 Moisture Control for Concrete Slab Foundations

Concrete slabs should be underlain by at least 4 inches of clean, 3/4-inch crushed rock to act as a capillary moisture break. To reduce the possibility of moisture migration through the concrete floor, a 15-mil plastic membrane (vapor retarder) should be placed on the crushed rock. To help protect the membrane against puncture during steel and concrete placement, and to aid in concrete curing, the membrane should be covered with 2 inches of clean sand.

LACO's recommendation for a concrete slab moisture vapor barrier is not intended to eliminate potential slab moisture problems, but rather to reduce the potential for moisture to permeate through the concrete. Flooring consultants and/or flooring manufactures should be consulted for slab design where slab finishes require stringent moisture control.

8.3 Seismic Design Parameters

Based on the conditions encountered in our recent geotechnical borings, we have classified the Site as Site Class D consisting of a "stiff soil profile" (Section 1613.5.2, 2013 CBC). The design spectral response accelerations S_S, S_1, F_a, F_v, S_{MS}, S_{M1}, S_{DS}, and S_{D1} were determined using the United States Geological Survey (USGS) seismic calculator software, "Seismic Hazard Curves, Response Parameter, Design Parameters: Seismic Hazard Curves and Uniform Hazard Response Spectra", (Last Modified: March 10, 2014), utilizing the American Society of Civil Engineers (ASCE) Standard 7-10, Minimum Design Loads for Buildings and Other Structures analysis option. Calculated values are presented in Table 2.

Table 2 - Summary of Seismic Design Factors

Site Class	F_a	F_v	S_s	S_1	S_{MS}	S_{M1}	S_{DS}	S_{D1}
D	1.0	1.5	1.392	0.680	1.392	1.020	0.928	0.680

**Latitude and longitude are 41.991223° North and -124.208454° West, for the central portion of the parcel from Google earth.*

These design spectral response accelerations are further defined as follows:

- F_a Short period coefficient to modify 0.2-second period of mapped spectral response accelerations for Site Class D.
- F_v Long period coefficient to modify 1.0-second period of mapped spectral response accelerations for Site Class D.
- S_s Mapped spectral response acceleration, 5 percent damped, at 0.2-second period for Site Class B (%g).
- S_1 Mapped spectral response acceleration, 5 percent damped, at 1.0-second period for Site Class B (%g).
- S_{MS} Maximum considered earthquake spectral response acceleration, 5 percent damped, at 0.2-second for Site Class effects (%g).
- S_{M1} Maximum considered earthquake spectral response acceleration, 5 percent damped, at 1.0-second period for Site Class effects (%g).
- S_{DS} Design spectral response acceleration, 5 percent damped, at 0.2-second period (%g).
- S_{D1} Design spectral response acceleration, 5 percent damped, at 1.0-second period (%g).

8.4 Pavement

Pavement structural sections should be designed by a qualified design professional to withstand the anticipated traffic loads over the known supporting subgrade soil strength for the design life of the development. A flexible pavement system may be used for this site consisting of asphalt concrete (AC) placed over compacted Caltrans Class 2 Aggregate Base (AB), which in turn rests on a properly prepared subgrade.

8.4.1 Pavement Subgrade Preparation

The pavement subgrade should be prepared in accordance with the Site Preparation section of this report. The upper 6 inches of the subgrade should be scarified and recompacted to a minimum of 95 percent relative compaction per Caltrans Test Methods 216 and 231. Following compaction, the subgrade should be proof rolled with a loaded ten-wheel dump truck (or equivalent) under the supervision of the project geotechnical engineer (or a designated representative), to check that a firm and unyielding surface is provided. Yielding areas or areas that do not meet the required compaction standard may have to be over-excavated and replaced with engineered fill that is placed, compacted, and tested as recommended in this report.

9.0 EARTHWORK

The following sections of this report present general earthwork recommendations for the project, where needed. Recommendations for site and subgrade preparation fill and backfill quality and compaction, and surface drainage control are included.

9.1 Site Preparation

Areas to be graded should be cleared of debris and stripped of vegetation and undocumented fill and loose native soil to expose the firm native soils (at least 1.5 feet bgs). These activities should generally be conducted during dry-weather conditions, where feasible. If wet-weather site preparation is necessary, additional excavation may be needed where rain-softened, yielding soils occur.

9.2 Subgrade Preparation

Areas to receive fill should be cleared of any existing asphalt concrete pavement, concrete foundations, building rubble, sod, topsoil, and/or any other debris materials. The exposed ground surface should be excavated to slope at 10 percent or less, if needed. Vertical sides or steps may be necessary in some situations to achieve this recommended maximum slope. The exposed grade should then be prepared as follows:

1. Proof-roll the exposed grade under the supervision of the project Geotechnical Engineer or their representative in pavement areas only. Proof rolling should be conducted with a fully-loaded, ten-yard dump truck with a minimum rear-axle load of 8 tons or equivalent. The soil surface should provide a firm and unyielding grade under the load of the dump truck. Unsuitable soils identified during proof rolling should either be removed and replaced or addressed through supplemental recommendations from the project Geotechnical Engineer.
2. Soft and/or undocumented fill soils should be removed for their full depth beneath planned foundation or floor slab areas. Depending on the finished grades of planned foundation and floor slab elements, the removed materials should be replaced with properly compacted structural fill.

9.3 Structural Fill

Structural fill materials used to support floor slabs, sidewalks, and pavements should be composed of low expansion potential material that is free of organic material, debris, and/or other deleterious matter. Structural fill material should be placed on a prepared grade as recommended in section 9.2 of this report. The material should not contain rocks larger than 3 inches in greatest dimension, or more than 15 percent of rocks larger than 2 inches. Additionally, the material should meet the following specifications:

Plasticity Index:	15% or less
Liquid Limit:	40% or less
Percent passing No. 200 sieve:	50 maximum, 5 minimum

9.4 Compaction Standard

Unless directed otherwise by the project Geotechnical Engineer or their representative, structural fill should be compacted to a minimum of 90 percent of the maximum dry density of the same soil as determined by the ASTM D1557 method. A LACO field technician should be present to observe fill placement operations and to perform field density tests (per ASTM D6938) at random locations throughout the fill to check that the specified relative compaction is being achieved by the Contractor. The structural fill should be placed in loose lifts less than approximately 8 inches thick on a prepared subgrade as specified above.

9.5 Cut and Fill Slopes

We understand the current development plans do not include permanent, un-retained cut or fill slopes. In the event that un-retained cut and/or fill slopes greater than 3 feet high are required, they should be constructed in accordance with the requirements of the Del Norte County Grading Ordinance and the 2013 CBC.

9.6 Drainage

The subject site should generally be graded to provide positive drainage away from foundations and the bluff face. A minimum gradient of 2 percent should be maintained for hardscaped areas. A 5 percent gradient should be maintained for landscaped areas within 10 feet of a structure. The grading or landscaping design and construction should not allow water to pond, or migrate beneath any structure. Runoff from hardscaped areas, roofs, patios, and other impermeable surfaces should be contained, controlled, and collected in a tight-line pipe that outlets into the Site storm drainage system.

10.0 CONSTRUCTION CONSIDERATIONS

Based on the subsurface conditions encountered at the site, required excavations will be made in residual soils. These materials should be easily dug with an excavator or backhoe.

Temporary excavations and construction slopes should be designed, planned, constructed, and maintained by the Contractor and should conform to applicable local, state, and federal regulations including the current Occupational Safety and Health Administration (OSHA) Excavation and Trench Safety Standards. To help minimize the risk of ground movement and/or settlement, construction equipment, building materials, excavated soil, vehicular traffic, and other similar loads should not be allowed near the top of any unshored excavation. Where the stability of adjoining buildings, walls, pavements, or other similar improvements may be endangered by excavation operations, and to protect personnel working in the excavation, support systems such as shoring, bracing, or underpinning may be required to provide structure and trench wall stability.

Excavation operations are dependent on construction methods and schedules and, as such, the Contractor shall be solely responsible for the design, installation, maintenance, and performance of all shoring, bracing, underpinning, and other similar excavation-related systems. Under no circumstances should anything written herein be inferred to mean that LACO assumes any responsibility for temporary excavations or the safety thereof. Nor does LACO assume any responsibility for the design, installation, maintenance, and performance of any shoring, bracing, underpinning, or other similar excavation-related systems.

11.0 ADDITIONAL GEOTECHNICAL SERVICES

We recommend LACO be retained to provide the following post-report and construction services:

- Review the foundation and grading plans to check for conformance with the recommendations presented herein.
- Monitor site grading and observe exposed grades prior to placement of structural fills and/or pavement sections.

- Observe foundation excavations prior to placement of any forms or reinforcing steel.
- Monitor the placement of structural fill, and test all structural fill to check that the recommended relative compaction is achieved.

These services will allow us to check that the work performed conforms to the recommendations contained within this report, and that the assumptions made in its preparation are valid.

12.0 REFERENCES

American Society of Civil Engineers (ASCE) Standard 7-10

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P:\8000\8062 Gul Jaisinghani\8062.00 Nautical Inn\08 Geology\Reports\8062.00 Geotech Report.docx

FIGURES

LACO

EUREKA • UKIAH • SANTA ROSA

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PROJECT	NAUTICAL INN SITE	BY JDB	FIGURE 1A
CLIENT	GUL JAISINGHANI	DATE 7/16/14	
LOCATION	SMITH RIVER, CA	CHECK GLM	JOB NO. 8062.00
	GEOLOGIC LOCATION MAP	SCALE AS SHOWN	

Jul 22,2014–3:41pm T:\Cadfiles\8000\8062.00 SMITH RIVER (NORTH)\8062.00 GEO fig 1A.dwg

LACO	PROJECT	NAUTICAL INN SITE	BY	JDB	FIGURE
EUREKA • UKIAH • SANTA ROSA	CLIENT	GUL JAISINGHANI	DATE	7/16/14	1B
1-800-515-5054 www.lacoassociates.com	LOCATION	SMITH RIVER, CA	CHECK	GLM	JOB NO. 8062.00
		GEOLOGIC LEGEND	SCALE	AS SHOWN	

EXPLANATION

TRANSLATIONAL/ROTATIONAL SLIDE: indicates scarp, indicates direction of movement; solid where active, dashed where dormant, queried where uncertain.

EARTHFLOW: indicates scarp, ← indicates direction of movement; solid where active, dashed where dormant.

DEBRIS SLIDE: includes scarp and slide deposits; solid where active, dashed where dormant.

DEBRIS FLOW/TORRENT TRACK

DEBRIS SLIDE AMPHITHEATER/SLOPE

INNER GORGE: ←→ where too narrow to delineate at this scale.

• ACTIVE SLIDE: too small to delineate at this scale.

DISRUPTED GROUND: irregular ground surface caused by complex landsliding processes resulting in features that are indistinguishable or too small to map individually at this scale; also may include areas affected by downslope creep, expansive soils, and/or erosion; boundaries usually are indistinct.

Q ALLUVIUM (Holocene): stream channel deposits of sand and gravel; area of active stream channel erosion.

Qbs BEACH DEPOSITS (Holocene): sands and gravels along the coast line.

Qds DUNE SAND (Holocene): includes vegetated and unvegetated deposits of fine, gray aeolian sand near the coast; in places, contains gravel.

Qac ALLUVIAL FAN/COLLUVIUM (Holocene-Pleistocene): alluvial fan deposits and/or colluvial slope deposits adjacent to mountains; angular sandstone, shale, and schist fragments supported in a silty-clay matrix.

Qrt ALLUVIAL TERRACES (Holocene-Pleistocene): older river gravels located above present stream channels; includes former or present flood plain deposits that are covered with vegetation and contain strong organic-rich or silty-clay soil profile; area of deposition.

Qb BATTERY FORMATION (Pleistocene): marine terrace and sand dune deposits overlying abrasion platform; consists of tan to reddish-brown unconsolidated medium-grained quartz sands alternating with silty clay and imbricated gravels.

Qt UNDIFFERENTIATED MARINE OR RIVER TERRACE DEPOSITS (Pleistocene): topographic bench paralleling the ocean; exposures consist of brown to tan, sandy to silty clay overlying gravels.

bm BAY MUD (Pliocene-Pleistocene): blue-gray, very sticky clay; exposed near base of the coastal hills; may underlie most Quaternary units; may be part of Pliocene St. George Formation which crops out near Crescent City.

KJfbf FRANCISCAN BROKEN FORMATION (Cretaceous-Jurassic): massive gray to tan-brown sandstone, interbedded sandstone and dark-gray mudstone, and minor amounts of conglomerate and schist; fragmented into bedded or massive blocks in a sheared shaley matrix; degree of metamorphism, if present, is less than that present in the melange.

fm FRANCISCAN MELANGE (Cretaceous-Jurassic): discontinuous outcrops of sandstone, mudstone, conglomerate, chert, greenstone, serpentine, and minor amounts of blueschist in a sheared argillaceous matrix.

gs GREENSTONE

ch CHERT: large, banded chert outcrop.

LITHOLOGIC CONTACT: dashed where approximate, dotted where projected or inferred.

GRADATIONAL CONTACT

X ROCK OUTCROP: too small to delineate at this scale.

SPRING

QUARRY OR BORROW PIT

BURIED TRACE OF DEL NORTE AND ROWDY CREEK FAULTS

$\swarrow_{86}$ STRIKE AND DIP OF BEDDING

STRIKE AND DIP OF SCHISTOCITY

MARSH

SLOPES > 70 PERCENT: compiled from map contours, aerial photo interpretation, and field reconnaissance.

Jul 22,2014-3:41pm T:\Cadfiles\8000\8062.00 SMITH RIVER MOTEL\DWG\ 8062.00 GEO FIG 1B.dwg

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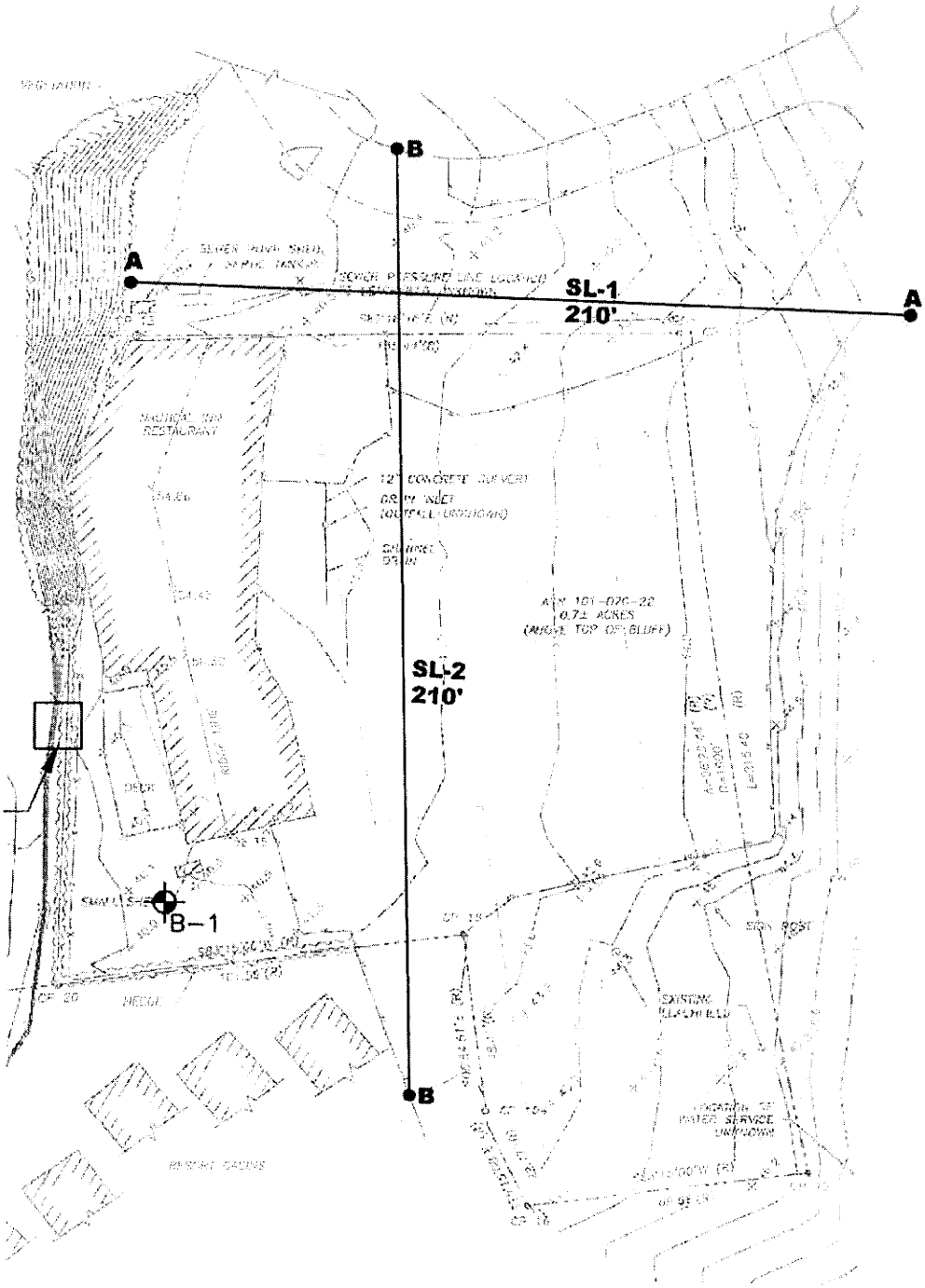
PROJECT	NAUTICAL INN SITE	BY JDB	FIGURE 2
CLIENT	GUL JAISINGHANI	DATE 7/16/14	
LOCATION	SMITH RIVER, CA	CHECK GLM	JOB NO. 8062.00
	SITE MAP	SCALE AS SHOWN	



LOCATION OF BLUFF SOIL PROFILE

0 20' 40'

SCALE: 1"=40'

Jul 22,2014—3:41pm
T:\Cadfiles\8000\8062.00 SMITH RIVER MOTEL\DWG\ 8062.00 GEO FIG 2.dwg

ATTACHMENT 2

Soil Profile Logs

LACO

BORING NUMBER B1

CLIENT Gul Jaisinghani
PROJECT NUMBER 8062.00
DATE STARTED 6/26/14 COMPLETED 6/26/14
DRILLING CONTRACTOR Fisch Drilling
DRILLING METHOD Rotary Hollow Stem Auger
LOGGED BY JMW CHECKED BY GLM
NOTES

PROJECT NAME Nautical Inn
PROJECT LOCATION Smith River
GROUND ELEVATION HOLE SIZE 3.24 inches
GROUND WATER LEVELS:
AT TIME OF DRILLING —
AT END OF DRILLING —

DEPTH (ft)	GRAPHIC LOG	MATERIAL DESCRIPTION	SAMPLE TYPE NUMBER	RECOVERY % (RQD)	BLOW COUNTS (N VALUE)	WET UNIT WT. (pcf)	DRY UNIT WT. (pcf)	MOISTURE CONTENT (%)	ATTERBERG LIMITS: LIQUID LIMIT	ATTERBERG LIMITS: PLASTIC LIMIT	ATTERBERG LIMITS: PLASTICITY INDEX	FINES CONTENT (%)
0		(ML) Dark brown, dry, silt with a trace of sand and gravel, grades to brown with depth.	ST			109	98	11				
5		(ML) Yellow brown, moist, silt with some sand and gravel.										
		(GW) Brown, moist, dense, well graded gravel with silt and sand.	SPT		11-26-33 (59)							4
		Refusal at 9.0 feet. Bottom of borehole at 9.0 feet.										

GEOTECH LOG - COLUMNS - GINT STD US LAB.GDT - 7/21/14 13:41 - P:\GINT FILES\PROJECTS\8062.00 NAUTICAL INN.GPJ

LACO

BORING NUMBER Bluff Face

CLIENT Gul Jaisinghani
PROJECT NAME Nautical Inn
PROJECT NUMBER 8062.00
PROJECT LOCATION Smith River
DATE STARTED 6/26/14 COMPLETED 6/26/14
GROUND ELEVATION ____ HOLE SIZE inches
DRILLING CONTRACTOR ____
GROUND WATER LEVELS:
DRILLING METHOD N/A
AT TIME OF DRILLING —
LOGGED BY JMW CHECKED BY GLM
AT END OF DRILLING —
NOTES Logged Bluff Face exposure

DEPTH (ft)	GRAPHIC LOG	MATERIAL DESCRIPTION	SAMPLE TYPE NUMBER	RECOVERY % (RQD)	BLOW COUNTS (N VALUE)	WET UNIT WT. (pcf)	DRY UNIT WT. (pcf)	MOISTURE CONTENT (%)	ATTERBERG LIMITS: LIQUID LIMIT	ATTERBERG LIMITS: PLASTIC LIMIT	ATTERBERG LIMITS: PLASTICITY INDEX	FINES CONTENT (%)
0		(ML) Brown, dry, silt with a trace of sand and gravel, grades to brown with depth.										
5		(GW-GM) Gray brown, dry, well graded gravel with silt and sand.										
10		(GW) Gray, dry well graded gravels with some sand. gravels are imbricated and slightly cemented.										
		(GP-GM) Gray, dry, poorly graded gravels with some sand and silt . gravels slightly cemented.										
15												
20		(SP) Light Gray, dry to moist poorly graded sand. (beach)										

Bottom of borehole at 20.0 feet.

GEOTECH LOG - COLUMNS - GINT STD US LAB.GDT - 7/21/14 13:41 - P:\GINT FILES\PROJECTS\8062.00 NAUTICAL INN.GPJ

Former Nautical Inn
Coastal Bluff Setback
Recommendation Report

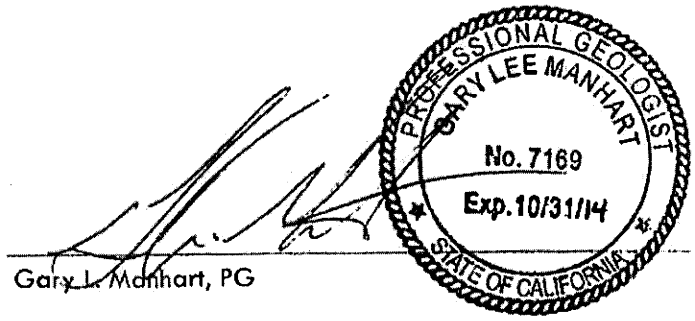
APN 101-070-022, Smith River California

July 29, 2014

Prepared For:
Gul Jaisinghani

Prepared By:
LACO Associates, Inc.
21 W. 4th Street
Eureka, California 95501
707 443-5054

Project No. 8062.00



Gary L. Manhart, PG

J. Erich Rauber, GE

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EXHIBIT NO. 5
APPL. NO. A-1-DNC-15-0047
Jaisinghani
COASTAL BLUFF SETBACK
RECOMMENDATION REPORT
1 OF 43

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Figures

1.0 INTRODUCTION

1.1 Purpose

This report presents a recommended development setback from the coastal bluff that defines the western edge of the marine terrace at Assessor's Parcel Number (APN) 101-070-22 (Site) in Smith River, California (Figure 1). The Site is within the Coastal Zone appeal jurisdiction (located within the Del Norte County jurisdiction). The Del Norte County Planning Department has requested slope setback recommendations in accordance with California Coastal Commission Requirements. The recommended development setback is based on the results of a site specific quantitative slope instability analysis and bluff retreat rate analysis completed in accordance with California Coastal Commission Memorandum W11.5 (Johnsson 2003).

This report was prepared in accordance with our Engineering Services Agreement dated June 2, 2014, with Mr. Gul Jaisinghani (Client). Our Scope of Services was limited to:

- Perform structural mapping along two sections of the shear bluff face and collect select rock samples for further testing
- Perform strength testing on select samples
- Drill four geotechnical borings to bedrock, log and sample soils
- Perform laboratory testing on select samples
- Perform a kinematic and mathematical slope instability analysis of the bluff slope along two sections
- Establish a recommended slope instability setback from the existing bluff edge based on the results of the instability analysis and a 75-year structure design life
- A 2013 California Building Code Compliant Geotechnical Report delivered under separate cover

Services other than those specified in the above scope of services will require a service agreement amendment and additional negotiated fee, including but not limited to:

- Tsunami run up evaluation
- Coastal development permit
- Surveying
- Construction staking
- Materials testing and inspection during construction

1.2 Limitations

This report has been prepared for the exclusive use of Mr. Gul Jaisinghani (Client), his contractors and consultants, and appropriate public authorities for specific application to development of the Site. LACO has exercised a standard of care equal to that generated for this industry to ensure that the information contained in this report is current and accurate. A brochure prepared by Association of Firms Practicing in the Geosciences (ASFE) has been included as Appendix 1 of this report. We recommend that all individuals reading this report also read this brochure.

Data generated for this report represent information gathered at that time and at the indicated locations. Subsurface conditions may change with time and under anthropologic influences. As such, the recommendations included in this report are based, in part, on assumptions about subsurface conditions that may only be observed and/or tested during subsequent project earthwork. Accordingly, the validity of these recommendations is contingent upon review of the subsurface conditions exposed during construction in order to check that they are consistent with those characterized in this report. Upon request, LACO can discuss the extent of (and fee for) observations and tests required to check the validity of the recommendations presented herein.

LACO disclaims any and all liability for any errors, omissions, or inaccuracies in the information and data presented in this report and/or any consequences arising therefrom, whether attributable to inadvertence or otherwise. LACO makes no representations or warranties of any kind including, but not limited to, any implied warranties with respect to the accuracy or interpretations of the data furnished. This report is valid solely for the purpose, site, and project described in this document. Any alteration, unauthorized distribution, or deviation from this description will invalidate this report. LACO assumes no responsibility for any third-party reliance on the data presented. Additionally, the data presented should not be utilized by any third-party to represent data for any other time or location.

2.0 PROJECT DESCRIPTION

2.1 Project Location

Pertinent Site location information is listed in Table 1.

Table 1 – Project Location Information

Latitude and Longitude*	41.991224°N and -124.208465°W
Legal Description	Assessor Parcel Number 101-070-022
Parcel Size	0.7± acres above the bluff face

United States Geologic Survey Quadrangle: Smith River 7.5-minute quadrangle
*Based on coordinates provided from Google Earth general parcel center

2.2 Proposed Development

The Site is currently developed with a former restaurant building sitting on the edge of the bluff at the western end of the Site (Figure 2). As we understand, the current development plan is to construct a new motel on the western side of the property. The exact building location has yet to be determined and will be based on the findings of this report. Community water services are available by the Smith River Community Services District; an on-site sewage disposal system will be required.

3.0 SITE AND SUBSURFACE CONDITIONS

3.1 Geologic and Seismic Setting

The Site is situated on the edge of low gradient marine terrace surface adjacent to the Pacific Ocean. The marine terrace surface is at an elevation ranging from 35 to 50 feet mean sea level (msl). Published geologic maps indicate the area is underlain by Quaternary marine terrace and sand dune deposits consisting of unconsolidated sands, alternating with silty clays and imbricated Gravels (CDMG 1983).

No active fault traces are shown traversing the Site on the published geologic maps reviewed. This Site is not located within an "Earthquake Fault Zone". However, the Site is located within a seismically active region which is subject to moderate to large earthquakes from a series of active faults associated with the Cascadia Subduction Zone.

The Site is located within a seismically active region in which large earthquakes are expected to occur during the economic life span (50 years) of the development. North of the Mendocino triple junction, the regional tectonic framework is controlled by the Cascadia Subduction Zone (CSZ), wherein oceanic crust of the Juan de Fuca/Gorda plate is being actively subducted beneath the leading edge of the North American plate. The CSZ in its entirety extends from the Mendocino triple junction to British Columbia. Plate convergence along the Gorda segment of the CSZ is occurring at a rate of approximately 30 to 40 millimeters per year (mm/yr) (Heaton & Kanamori 1984). Rupture along the entire CSZ boundary may produce an earthquake with a maximum moment magnitude (Mw) of 9.0 or greater (Satake, et al 2003).

Table 2: Seismic Sources in the Project Vicinity[1]

Fault System	Distance from Site (Kilometers)	Direction from Site	Maximum Moment Magnitude[2]	Peak Ground Acceleration[3] (g)
Trinidad Fault	75	South	7.1	0.26
Cascadia Subduction Zone	36	West	9.0	0.18

[1] Based on EQFAULT (v. 2.01) and a digitized data file of the California Division of Mines and Geology Fault Activity Map of California (Jennings 1994).

[2]Earthquake magnitudes are expressed in terms of the moment magnitude scale (Mw) and were obtained from Tables of California Fault Parameters in Peterson et al. (1996), Cao et al. (2003).

[3]Peak ground accelerations are average values estimated for the maximum moment magnitude earthquake, using attenuation relationships developed by Boore et al. (1997), Campbell (1993 and 1997), and Sadigh et al.(1997) for a site underlain in the upper 30 meters by stiff alluvial soils.

3.2 Soil Conditions

Based on observations of the bluff face made during our site reconnaissance of June 26 and July 8, 2014, the soils beneath the Site consist of approximately 5 feet of loose dune sand and silt overlying an undetermined thickness of weakly- to moderately-cemented silty sandy poorly-graded gravels (GP) and well-graded sandy gravels (GW). A boring log and a representative bluff face profile are included in Appendix 2. A geophysical seismic line was also completed for the site to a depth of approximately 50 feet below the top of the bluff. The soil profile was determined to generally be the same as what was observed in the boring and bluff logs. Bedrock was determined to range between 10 feet and 30 feet below the top

of the bluff. A retaining wall foundation for the northern portion of the existing building is situated on the portion of the bluff where the face is less than vertical.

A geophysical seismic transect survey was initiated by Advanced Geological Services to obtain subsurface data to determine depth of underlying soil strata and bedrock. The geophysical survey consisting of two approximately 200-foot long lines generally oriented perpendicular to one another (Figure 2); the geophysical survey report is enclosed in Appendix 3. The geophysical survey was initiated to obtain subsurface data to determine thickness of the soil strata overlying bedrock, as well as shear wave velocity of the soil units.

3.3 Groundwater Conditions

Emergent groundwater or evidence of groundwater seepage was not observed on the approximately 20-foot high bluff face during our site reconnaissance.

3.4 Bluff Face and Slope Instability

Historic slope failure events provide evidence that coastal bluffs within the Site are susceptible to both mass wasting and erosion. Slope failures along the coastal bluffs in the vicinity of the Site typically occur as a result of toe erosion with shear failure in the weakly-cemented soils and as tensile-exfoliation failures in areas that are moderately-cemented.

We did not observe evidence of previous or incipient slope failure within the local area. Furthermore, the local shoreline has been characterized by others as accretionary at a rate of 0 to 1.5 feet per year (Hapke, C.J., Reid, D., and Richmond, B.M. 2006).

4.0 QUANTITATIVE SLOPE INSTABILITY ANALYSIS

4.1 Discussion and Methodology

Table 1 of Memorandum W11.5 (Johnsson 2003) presents the guidelines for performing quantitative slope stability analysis for purposes of establishing setback distances. Simplified, the guidelines state the following:

- The analysis should demonstrate a setback distance associated with a factor of safety of 1.5 for static conditions and 1.1 for seismic conditions.
- The effects of earthquakes on slope stability may be addressed through psuedostatic slope analysis assuming a horizontal seismic coefficient of 0.15g.
- All slope stability analysis should be undertaken with water table or potentiometric surfaces for the highest groundwater conditions.
- In general, methods that satisfy both force and moment equilibrium, such as Spencer's (Spencer 1967; 1973), Morgenstern-Price (Morgenstern and Price 1965), and General Limit Equilibrium (Fredlund et al. 1981; Chugh 1986) are preferred. Methods based on moment equilibrium alone, such as Simplified Bishop's Method (Bishop 1955) also are acceptable.

To evaluate the stability of the bluff under both static and dynamic conditions, LACO performed a quantitative slope stability analysis of the bluff using the computer program Slide (version 5.0) developed by Rocscience, Inc., Toronto, Ontario. The software assesses the stability of the slope using Bishop's Method to compare the forces resisting failure to the forces driving failure. The ratio of the two forces is defined as a "factor of safety" (F). In a stable slope, the forces resisting failure exceed the driving forces and the resultant F is greater than 1.0. When the two forces are equal, the F is equal to 1.0 and slope failure is imminent. The greater the F the greater the stability of the slope.

The stability analysis for this Site used slope geometry obtained from a topographic map of the site by Stover Engineering, and a simplified 3-layer model of the slope soil materials derived from the results of laboratory testing (the uppermost layer, Soil 1), and the seismic refraction survey by Advanced Geological Services (Layers 2 and 3). The three layers used included the medium-dense sandy silt overlying the weakly- to moderately-cemented granular soils which, in turn, overlays bedrock.

Table 4 summarizes the soil parameters used in the slope instability analysis for the Site.

Table 4: Soil Parameters Used in the Factor of Safety Analysis

Description	Layer 1 - Sandy Silt (ML)	Layer 2 - Cemented Granular Soil (GP-GM, GW, GW-GM)	Layer 3 - Bedrock
Saturated Unit Weight	120 pcf	130 pcf	140 pcf
Cohesion	1500 Pounds per square foot (psf)	150 psf	3,000 psf
Friction Angle	24°	42°	45°

For Layer 1, soil parameters were based on the results of direct shear tests. The Layer 2 friction angle was estimated based on shear wave velocity tests; Equivalent Standard Penetration Test blow counts (N values) were estimated using shear wave velocity/N-value relationships (Wair et al 2012) and N-value/friction angle relationships (Meyerhof 1956). To account for Layer 2 cementation, a cohesion of 150 pounds per square foot (psf) was utilized in our analyses. This cohesion value was judged reasonable, considering that the estimated Rock Mass Rating (Bieniawski 1989) of IV (poor quality rock), which equated to a cohesion of over 2,000 psf. Groundwater is modeled at an elevation of approximately 10 feet and emerging at the bottom of the slope to represent high groundwater conditions, as discussed in the Section 3.3 of this report.

4.2 Results of Factor of Safety Analysis

Graphic results from the factor of safety analysis are included in Appendix 2. The analysis of the possible slope failures was filtered to show only the safety factors of 1.5 under static load (Sheet 1, Appendix 2) and 1.1 under dynamic load (Sheet 2, Appendix 2). Additionally, a surcharge of 200 psf was added to the slope. The model analysis reflecting a slope failure surface with a factor of safety equal to 1.5 under static conditions (termed F_S) furthest from the bluff edge (approximately 38 feet in elevation) is located approximately 8 feet to the east. The slope failure surface with a factor of safety equal to 1.1 under dynamic conditions (termed F_D) furthest from the bluff face is less than 5 feet to the east within the model profiles (Appendix 4). The greater slope failure distance (F_S) from the bluff edge was used to determine the setback from the bluff edge.

5.0 BLUFF RETREAT RATE

5.1 Discussion and Methodology

A long-term bluff retreat rate was evaluated using site specific aerial photographic review covering approximately 50 years from 1963 to 2013. A list of the aerial photographs referenced is included as Appendix 5.

The site specific aerial photograph review utilized a constant transect through the Site to measure changes in distance to the bluff from a fixed location over time. The centerline of Highway 101 was used as the fixed location for the years 1963 through 2013.

5.2 Results of Bluff Retreat Rate Analysis

Based on review of aerial photographs, the edge of the bluff at the Site has not retreated during the time period covered by the aerial photos. Distances from the edge of bluff to the fixed reference point for each photo year reviewed were measured since 1963 no measurable retreat was detected between the bluff edge and the center line of Highway 101.

6.0 SEA LEVEL RISE

It is widely accepted that sea level is predicted to rise in the future. The rate and effects of sea-level rise on coastal Del Norte County are debatable. The Pacific Institute estimates that a rise in sea level of approximately 5 feet (1.5 meters) by the year 2100 will result in an average of 525 feet (160 meters) of dune erosion and 200 feet (61 meters) of cliff erosion (Pacific Institute 2009). However, the Pacific Institute study does not consider the effects of tectonic uplift. Uplift rates in the vicinity of the Site are estimated to be approximately 1 millimeter per year. Data obtained from the *National Assessment of Shoreline Change, Part 3: Historical shoreline changes and associated coastal land loss along sandy shorelines of the California Coast* by Hapke, C.J., Reid, D., and Richmond, B.M., (2006) record an accretionary shoreline at a rate of 0 to 1.5 feet per year. Given the regional uplift and accreting shoreline, the affects of sea-level rise are presumed to be insignificant within the 75-year design life of the proposed development.

7.0 RECOMMENDED SETBACK

7.1 Discussion and Methodology

California Coastal Commission Memorandum W11.5 (Johnsson 2003) recommends that the bluff setback be established by combining the distance from the present bluff edge to the most distant slope failure surface (F_S =1.5 or F_D = 1.1 slope failure surface, whichever is greater) with the estimated erosion distance over a 50-year period.

The factor of safety analysis indicates the failure distance associated with the F_S is greater than the distance associated with F_D and therefore should be used in the establishment of the setback.

The bluff retreat rate analysis indicates that during the time of the available aerial photographs (1963 to 2013) no retreat was noted at or near the Site. As such, the establishment of a future bluff retreat rate for this Site is not achievable. A conservative approach is to estimate the retreat rate with a previously accepted rate for the project area. The estimated rate for the project area appears to be accretionary with a rate of 0 to 1.5 feet per year (Hapke, C.J., Reid, D., and Richmond, B.M. 2006). For this particular project, we understand that this conservative approach is acceptable by the project team because the preferred location of the motel building will be as close to the bluff as possible.

Given that no erosional retreat has been observed in the 50 years of aerial photographs, and published bluff retreat rates near the Site indicate that the beach environment is accretionary, the stability related setback should govern.

7.2 Setback

Using the results of our bluff retreat study for this project and the slope stability analysis, LACO recommends a minimum setback distance of 8 feet from 38 foot contour as defined from the map supplied by the client and his engineer.

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P:\8000\8062 Gul Jaisinghani\8062.00 Nautical Inn\08 Geology\Reports\8062.00 Jaisinghani Bluff Setback Report.docx

FIGURES

LACO EUREKA • UKIAH • SANTA ROSA 1-800-515-5054 www.lacoassociates.com	PROJECT	NAUTICAL INN SITE	BY	JDB	FIGURE
	CLIENT	GUL JAISINGHANI	DATE	7/16/14	1A
	LOCATION	SMITH RIVER, CA	CHECK	GLM	JOB NO.
		GEOLOGIC LOCATION MAP	SCALE	AS SHOWN	8062.00

Jul 22,2014-3:41pm
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LACO
EUREKA • UKIAH • SANTA ROSA
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PROJECT	NAUTICAL INN SITE	BY JDB	FIGURE 1B
CLIENT	GUL JAISINGHANI	DATE 7/16/14	
LOCATION	SMITH RIVER, CA	CHECK GLM	JOB NO. 8062.00
	GEOLOGIC LEGEND	SCALE AS SHOWN	

EXPLANATION

TRANSLATIONAL/ROTATIONAL SLIDE: ⟨ indicates scarp, ✓ indicates direction of movement; solid where active, dashed where dormant, queried where uncertain.

EARTHFLOW: ⟨ indicates scarp, ← indicates direction of movement; solid where active, dashed where dormant.

DEBRIS SLIDE: includes scarp and slide deposits; solid where active, dashed where dormant.

DEBRIS FLOW/TORRENT TRACK

DEBRIS SLIDE AMPHITHEATER/SLOPE

INNER GORGE: ←→ where too narrow to delineate at this scale.

ACTIVE SLIDE: too small to delineate at this scale.

DISRUPTED GROUND: irregular ground surface caused by complex landsliding processes resulting in features that are indistinguishable or too small to map individually at this scale; also may include areas affected by downslope creep, expansive soils, and/or erosion; boundaries usually are indistinct.

Q ALLUVIUM (Holocene): stream channel deposits of sand and gravel; area of active stream channel erosion.

Qbs BEACH DEPOSITS (Holocene): sands and gravels along the coast line.

Qds DUNE SAND (Holocene): includes vegetated and unvegetated deposits of fine, gray aeolian sand near the coast; in places, contains gravel.

Qoc ALLUVIAL FAN/COLLUVIUM (Holocene-Pleistocene): alluvial fan deposits and/or colluvial slope deposits adjacent to mountains; angular sandstone, shale, and schist fragments supported in a silty-clay matrix.

Qrt ALLUVIAL TERRACES (Holocene-Pleistocene): older river gravels located above present stream channels; includes former or present flood plain deposits that are covered with vegetation and contain a strong organic-rich or silty-clay soil profile; area of deposition.

Qb BATTERY FORMATION (Pleistocene): marine terrace and sand dune deposits overlying abrasion platform; consists of tan to reddish-brown unconsolidated medium-grained quartz sands alternating with silty clay and imbricated gravels.

Qt UNDIFFERENTIATED MARINE OR RIVER TERRACE DEPOSITS (Pleistocene): topographic bench paralleling the ocean; exposures consist of brown to tan, sandy to silty clay overlying gravels.

Qm BAY MUD (Pliocene-Pleistocene): blue-gray, very sticky clay; exposed near base of the coastal hills; may underlie most Quaternary units; may be part of Pliocene St. George Formation which crops out near Crescent City.

KJfbf FRANCISCAN BROKEN FORMATION (Cretaceous-Jurassic): massive gray to tan-brown sandstone, interbedded sandstone and dark-gray mudstone, and minor amounts of conglomerate and schist; fragmented into bedded or massive blocks in a sheared shaley matrix; degree of metamorphism, if present, is less than that present in the melange.

fm FRANCISCAN MELANGE (Cretaceous-Jurassic): discontinuous outcrops of sandstone, mudstone, conglomerate, chert, greenstone, serpentine, and minor amounts of blueschist in a sheared argillaceous matrix.

gs GREENSTONE

ch CHERT: Large, banded chert outcrop.

LITHOLOGIC CONTACT: dashed where approximate, dotted where projected or inferred.

GRADATIONAL CONTACT

ROCK OUTCROP: too small to delineate at this scale.

SPRING

QUARRY OR BORROW PIT

BURIED TRACE OF DEL NORTE AND ROWDY CREEK FAULTS

STRIKE AND DIP OF BEDDING

STRIKE AND DIP OF SCHISTOCITY

MARSH

SLOPES > 70 PERCENT: compiled from map contours, aerial photo interpretation, and field reconnaissance.

Jul 22,2014--3:41pm
T:\Codfiles\8000\8062.00 SMITH RIVER MOTEL\DWG\ 8062.00 GEO FIG 1B.dwg

LACO

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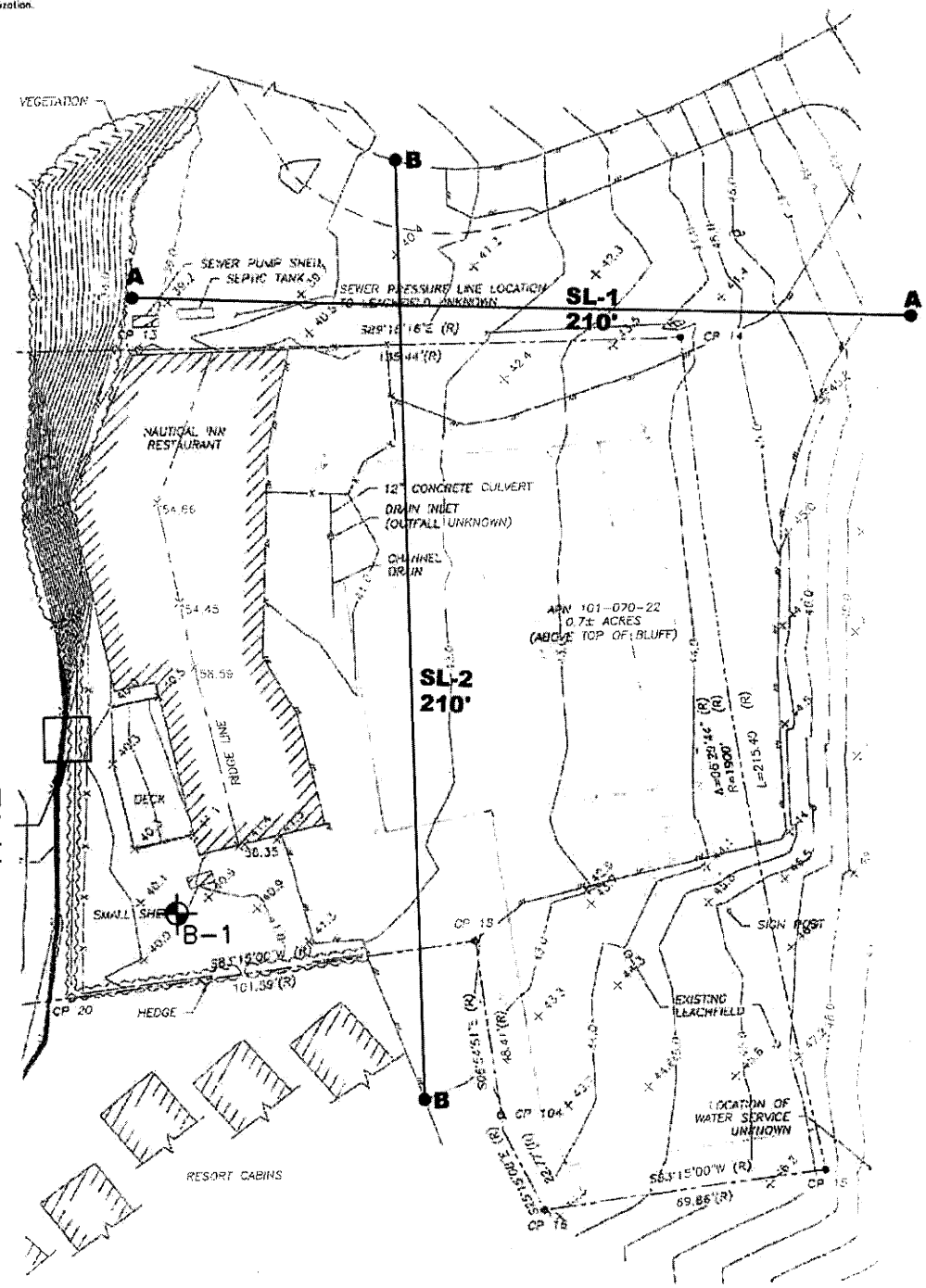
PROJECT	NAUTICAL INN SITE	BY JDB	FIGURE 2
CLIENT	GUL JAISINGHANI	DATE 7/16/14	
LOCATION	SMITH RIVER, CA	CHECK GLM	JOB NO. 8062.00
	SITE MAP	SCALE AS SHOWN	



0 20' 40'

SCALE: 1"=40'

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T:\Cadfiles\8000\8062.00 SMITH RIVER MOTEL\DWG\ 8062.00 GEO FIG 2.dwg

APPENDIX 2

Boring Log and Slope Profile

LACO

BORING NUMBER B1
PAGE 1 OF 1

CLIENT Gul Jaisinghani
PROJECT NAME Nautical Inn
PROJECT NUMBER 8062.00
PROJECT LOCATION Smith River
DATE STARTED 6/26/14 **COMPLETED** 6/26/14
GROUND ELEVATION _____ **HOLE SIZE** 3.24 inches
DRILLING CONTRACTOR Fisch Drilling
GROUND WATER LEVELS:
DRILLING METHOD Rotary Hollow Stem Auger
AT TIME OF DRILLING —
LOGGED BY JMW **CHECKED BY** GLM
AT END OF DRILLING —
NOTES

DEPTH (ft)	GRAPHIC LOG	MATERIAL DESCRIPTION	SAMPLE TYPE NUMBER	RECOVERY % (RQD)	BLOW COUNTS (N VALUE)	WET UNIT WT. (pcf)	DRY UNIT WT. (pcf)	MOISTURE CONTENT (%)	ATTERBERG LIMITS: LIQUID LIMIT	ATTERBERG LIMITS: PLASTIC LIMIT	ATTERBERG LIMITS: PLASTICITY INDEX	FINES CONTENT (%)
0		(ML) Dark brown, dry, silt with a trace of sand and gravel, grades to brown with depth.	ST			109	98	11				
5		(ML) Yellow brown, moist, silt with some sand and gravel.										
		(GW) Brown, moist, dense, well graded gravel with silt and sand.	SPT		11-26-33 (59)							4

Refusal at 9.0 feet.
Bottom of borehole at 9.0 feet.

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LACO

BORING NUMBER Bluff Face

CLIENT Gul Jaisinghani
PROJECT NAME Nautical Inn
PROJECT NUMBER 8062.00
PROJECT LOCATION Smith River
DATE STARTED 6/26/14 COMPLETED 6/26/14
GROUND ELEVATION _____ HOLE SIZE inches
DRILLING CONTRACTOR _____
GROUND WATER LEVELS:
DRILLING METHOD N/A
AT TIME OF DRILLING —
LOGGED BY JMW CHECKED BY GLM
AT END OF DRILLING —
NOTES Logged Bluff Face exposure

DEPTH (ft)	GRAPHIC LOG	MATERIAL DESCRIPTION	SAMPLE TYPE NUMBER	RECOVERY % (RQD)	BLOW COUNTS (N VALUE)	WET UNIT WT. (pcf)	DRY UNIT WT. (pcf)	MOISTURE CONTENT (%)	ATTERBERG LIMITS: LIQUID LIMIT	ATTERBERG LIMITS: PLASTIC LIMIT	ATTERBERG LIMITS: PLASTICITY INDEX	FINES CONTENT (%)
0		(ML) Brown, dry, silt with a trace of sand and gravel, grades to brown with depth.										
5		(GW-GM) Gray brown, dry, well graded gravel with silt and sand.										
10		(GW) Gray, dry well graded gravels with some sand. gravels are imbricated and slightly cemented.										
15		(GP-GM) Gray, dry, poorly graded gravels with some sand and silt . gravels slightly cemented.										
20		(SP) Light Gray, dry to moist poorly graded sand. (beach)										

Bottom of borehole at 20.0 feet.

GEOTECH LOG - COLUMNS - GINT STD US LAB.GDT - 7/21/14 13:41 - P:\GINT FILES\PROJECTS\8062.00 NAUTICAL INN.GPJ

APPENDIX 3

Advanced Geological Services Report

ADVANCED GEOLOGICAL SERVICES

1605 School Street, #4
Moraga CA 94556
925 (808-8965)

Gary I. Manhart, Senior Geologist
LACO Associates
Eureka | Ukiah | Santa Rosa, California

Subject: Report
Seismic Refraction and Seismic Surface-wave Surveys
Nautical Inn Restaurant Site, 16850 US Highway 101
Smith River, California

Dear Mr. Manhart:

1.0 INTRODUCTION

This letter presents the results of Advanced Geological Services, Inc. (AGS) seismic refraction and seismic surface-wave surveys in support of LACO Associates' geotechnical investigation at the Nautical Inn Restaurant site, 16850 U.S. Highway 101, Smith River, California (Figure 1). The investigation objective was to assess the depth, configuration and velocity of bedrock.

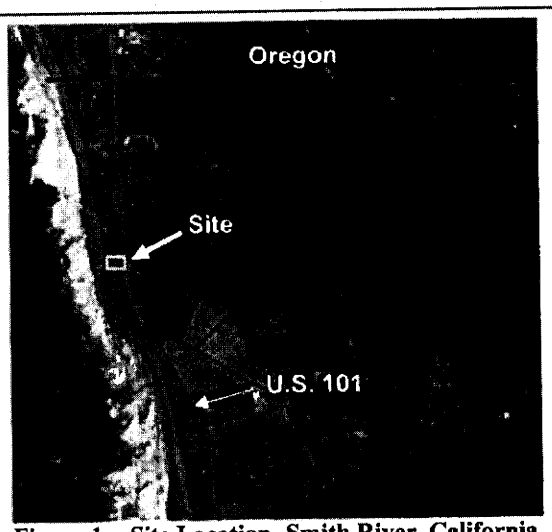


Figure 1 - Site Location- Smith River, California

AGS used seismic refraction to obtain bedrock depth and compressional (P-) velocity was seismic refraction. A seismic surface-wave survey was also performed to assess the shear (S-) wave velocity of bedrock. The investigation was performed on July 9, 2014 by AGS senior geophysicist Roark Smith.

2.0 SUMMARY OF FINDINGS

- Depth to top-of-bedrock ranges from 5 to 30 feet below ground surface (bgs), and bedrock is generally shallower in the southern portion of the site. Subsurface profiles showing seismic velocity layers and interpreted bedrock depth are presented on Figure 2.

- Bedrock exhibited compressional- (P-) wave velocities between 8,000 and 9,000 feet per second (fps). The surface-wave data indicate that the shear (S-) wave velocity of bedrock is approximately 1,700 fps. S-wave velocity models showing S-wave variations with depth are presented on Figure 3.

3.0 SITE DESCRIPTION

The topographically flat Smith River site is on a bluff between U.S. Highway 101 and the edge of a sea cliff overlooking a wide beach, approximately 25 feet below, and the Pacific Ocean. At the time of the investigation, the Nautical Inn Restaurant building occupied the western portion of the site, at the cliff's edge. Except along its northern edge, the ground surface was mostly covered with asphalt pavement. One seismic line was located in the grassy area along the site's northern edge, and a second perpendicular line was located on the asphalt-paved parking lot (Figure 2).

4.0 FIELD PROCEDURES

Seismic Refraction

At the direction of LACO Associates personnel, AGS laid a fiberglass tape measure across the ground surface to mark the first seismic refraction line (SL-1) location. AGS then placed 24 geophones in the ground at 5- and 10 -foot spacings to form a 195-foot-long seismic line. The geophones were coupled to the ground surface by means of 4-inch spikes. Three shot points were used— one was placed in the middle of the geophone array and one at each end of the array, 5 feet beyond the nearest geophone.

AGS produced seismic energy through multiple impacts with a 16-lb sledge hammer against a metal plate placed on the ground surface at each shotpoint location. Ten hammer blows were used ("stacked") at the end-of-line shotpoints and five blows were used at the mid-line shotpoints. The P-waves produced by the hammer impacts were detected using Mark Products 14-Hz high output geophones. The detected seismic signals were recorded using a DAQLink II seismic system connected to a laptop computer. For the surface-wave survey, AGS swapped out the 14-Hz geophones for 4.5-Hz geophones, which are better suited for detecting the lower-frequency portions of the surface-wave data.

After seismic refraction data were collected along the first line, AGS moved the tape measure to mark a second line (SL-2) roughly perpendicular to the first line (Figure 2). AGS then repositioned the geophones along the second line and collected refraction and surface-wave data in same manner as at the first line. It is worth noting that, because the second line was located on asphalt pavement, the geophones spikes were removed and the geophones were mounted onto heavy steel plates, which were then coupled to the pavement with an adhesive product. After the seismic data were obtained, AGS performed a hand-level survey to measure the relative elevation changes along the two seismic lines so that the ground surface topography could be incorporated into the data analysis. Finally, AGS plotted the seismic line locations onto a LACO-provided basemap by using a tape measure to reference the line to fences, buildings, and other prominent site features.

Seismic Surface-Wave Survey

For the surface-wave survey, AGS used the same alignments that were used for the two refraction lines, but the 14-Hz refraction geophones were replaced with lower-frequency 4.5-Hz geophones, which are more suitable for surface-wave work. A single shotpoint located in-line with the array and 20 feet away from the first geophone was used. As with the refraction work,

seismic energy was generated through multiple impacts with a 16-lb sledge hammer against a metal plate placed on the ground surface at each shotpoint location. The detected seismic signals were recorded using a DAQLink II seismic system connected to a laptop computer, the same seismic system that was used for the refraction work.

5.0 GEOPHYSICAL METHOD OVERVIEW

5.1 Seismic Refraction

The seismic refraction method uses compressional (P-) wave energy to delineate seismic velocity layers within the subsurface. Interpretation entails correlating the velocity layers to geologic features such as soil and various types of bedrock. To perform a refraction survey, an elastic wave (compressional, or P-wave) is generated at certain locations (shotpoints) along a survey line. The P-wave energy is usually produced with a small explosion or by striking the ground with a sledgehammer. As the P-wave propagates through the ground it is refracted along boundaries between geologic layers with different seismic velocities.

Part of the refracted P-wave energy returns to the ground surface where it is detected by vibration-sensitive devices called geophones, which are placed in a co-linear array along the seismic survey line. The geophone data are fed to a seismograph, where they are recorded, and then to a computer, where they are analyzed to determine the depth and velocities of subsurface seismic layers. Key data for refraction analysis are the positions of the geophones and shotpoints along a seismic line, and the amount of time it takes for the refracted wave to travel from the shotpoint to each geophone location. Because the P-wave is the fastest traveling of all types of seismic waves, it can be readily identified as the first deflection ("first break") on a seismic trace.

Additional discussion of the refraction method, its limitations, and the relationship between seismic velocity and geologic materials is presented in Appendix A.

5.2 Seismic Surface Wave

Seismic surface-wave surveys use essentially the same field set-up as a refraction survey, but a different part of the recorded seismic signal— the Rayleigh (surface) wave is analyzed instead of the P-wave. Briefly, a surface-wave survey entails measuring the velocity of surface waves using an array of motion detectors (geophones) placed on the ground surface. Because surface-wave velocity closely follows shear-wave velocity (90 to 95% of V_S), surface-wave velocity data can be used to estimate shear wave velocity (V_S). Surface-Waves are seismic waves that travel along or near the surface of the earth; they are generated by both natural (e.g., wind, ocean waves) and man-made (e.g., hammer blow, traffic noise, factory vibration) sources. Surface-Waves travel in assemblages of frequencies, with each frequency having a corresponding wavelength. Because surface-waves are influenced by subsurface material to a depth approximately equal to the surface-wave's wavelength, a velocity vs. depth profile can be generated by measuring the velocity of surface-waves of varying wavelengths. Short wavelengths (higher frequencies) respond to the material properties (e.g., stiffness) of shallower materials while longer wavelengths (lower frequency) respond to deeper materials.

Specialized computer software is used to identify surface-waves in the recorded data and prepare a 'velocity spectrum' image, which the geophysical analyst interprets to produce a 'dispersion

curve' to depict how velocity varies with frequency. The geophysicist then prepares a velocity layer model from which a synthetic dispersion curve is produced. The analyst then adjusts the model to obtain a 'best fit' between the synthetic dispersion curve and the actual dispersion curve that was interpreted from the velocity spectrum. The degree or closeness of the fit between the interpreted and synthetic curves provides an indication of how well the model represents actual subsurface conditions. The final output from a surface-wave survey is a one-dimensional (1-D) profile showing S-wave velocity variations with depth at a point that is taken to be at the center of the geophone array.

6.0 DATA PROCESSING AND ANALYSIS

The seismic refraction data quality for this project was good and first break picks were made with confidence. Data quality was enhanced by "stacking," which entailed using multiple hammer blows at each shotpoint location to improve the signal-to-noise ratio. The additive affect of stacking of multiple hammer blows at the same location enhances or increases the amplitude of the signal (i.e., the refracted wave arrival) while amplitude of the background noise, which, being random in nature, tends to cancel itself on successive hammer blows and remains largely unchanged. Stacking was made necessary by the vibratory noise from vehicle traffic along U.S. 101. AGS stacked 10 hammer blows at the end-of-line shotpoints and 5 blows at the center shotpoint.

Seismic data were processed using the *SeisImager* and *SeisImager/SW* software packages for the refraction and surface-wave data, respectively. Briefly, *SeisImager* is a computer inversion program that generates an initial velocity layer model, produces synthetic data from the model, and then adjusts the model so that the synthetic data better matches the observed field data. The agreement between the synthetic and observed data provides an indication of how well the model represents the true subsurface conditions.

6.1 Refraction Processing and Analysis

First, AGS used the *SeisImager* module *PickWin* to interpret ("pick") the P-wave arrivals ("first breaks") for each of the shotpoint data sets ("shot gathers") per line. *PickWin* was also used to check (against the geophysicst's field log) that the proper locations were assigned to the geophones and shotpoints. Next, the first break files were fed to the SeisImager module *PlotRefra*, which was used review time-distance (TD) plots for the two seismic lines and assign a seismic layer to each arrival time. For the initial refraction analysis, each P-wave arrival is considered to have refracted from a distinct seismic layer. The number of layers resolved by the seismic survey, and their thickness and average velocity, are revealed by straight line segments on the TD plot; because these straight-line segments represent a constant velocity condition within the subsurface, they are usually considered to represent a distinct geologic layer. The topographic elevation files were incorporated into the analysis at this point. Next, a time-term inversion was performed to produce models showing the velocity layering along each of the two seismic lines.

6.2 Surface-Wave Processing and Analysis

In general, surface wave data processing entails first producing a velocity spectrum image, which shows the phase velocity for the various frequencies of surface waves detected (Figure 3). This

image is used as the basis for interpreting ("picking") a dispersion curve, which is a graph that depicts how surface-wave velocity varies with frequency (hence, depth). The dispersion curve is then used to prepare an initial 1D model of surface-wave velocity versus depth using a one-third wavelength approximation (i.e., a given phase velocity is assigned to a depth that is one-third of the wavelength of the corresponding surface-wave). The initial velocity layer model is then adjusted using an inversion process until the corresponding synthetic dispersion curve achieves a "best-fit" match to the original dispersion curve that was interpreted from the observed data (i.e., the velocity spectrum image). The degree or closeness of the fit between the interpreted and synthetic curves provides an indication of how well the model represents actual subsurface conditions.

Accordingly, AGS first used the *SeisImager/SW* module *PickWin* to check that the proper geophone and shotpoint locations were incorporated into the data. *PickWin* was then used to perform the phase velocity-frequency transformation and pick a dispersion curve. Next, the *WaveEq* module was used to edit the dispersion curve and prepare an initial model of S-wave velocity (V_s) with depth. Next, *WaveEq* was used to perform the inversion that produced the final V_s models. The inversion was performed using 15 layers and 10 iterations and 15 layers; it achieved an RMS error of 2.5%, or 54 fps for SL-1 and an RMS error of 2.9%, or 70 fps for SL-2.

7.0 RESULTS

The investigation results are presented on Figures 2 and 3. Figure 2 presents P-wave velocity layer cross-sections generated from the seismic refraction data; Figure 2 also includes a site map showing the seismic line locations. Figure 3 presents the surface-wave survey results in the form of velocity spectrum images and interpreted dispersion curves, along with the associated velocity models showing S-wave velocity variations with depth at a point that is considered to be the center of each geophone array.

The refraction data indicate that depth to top-of-bedrock ranges from 5 to 30 feet below ground surface (bgs), with bedrock being shallower in the southern portion of the site. Three velocity layers were identified from the refraction data— a thin upper layer exhibiting a P-wave velocity between 1,000 and 1,150 feet per second (fps) that represents surface soil, a 4- to 20-foot thick middle layer exhibiting a P-wave velocity between 3,600 and 4,100 fps that is interpreted to represent alluvium, and a bottom layer exhibiting a P-wave velocity between 8,000 and 9,000 fps that is interpreted to represent bedrock.

The surface-wave data indicate that the S-wave velocity of shallow bedrock is approximately 1,700 fps. The S-wave model generated from data obtained along SL-1 shows a layer boundary at about 18 feet bgs, with the upper layers exhibiting S-wave velocities around 1,000 fps compared to lower layers (corresponding to bedrock) exhibiting S-wave velocities of 1,700 and greater. The model for SL-2 also shows a layer boundary at about 18 ft bgs; however, it does not show the same amount of contrast between the upper and lower layers. Along SL-2, the upper layers exhibit somewhat higher S-wave velocities, around 1,300 fps, while the lower layers exhibit velocities similar to those observed along SL-1. This slight discrepancy is attributed to natural geologic variation, which includes shallower bedrock along SL-2, and to the presence of

pavement (and presumably the underlying baserock fill material), which likely changed the nature of surface-wave generation and transmission along that line, as compared to SL-1.

8.0 CLOSING

All geophysical data and field notes collected as a part of this investigation will be archived at the AGS office. The data collection and interpretation methods used in this investigation are consistent with standard practices applied to similar geophysical investigations. The correlation of geophysical responses with probable subsurface features is based on the past results of similar surveys although it is possible that some variation could exist at this site. Due to the nature of geophysical data, no guarantees can be made or implied regarding the targets identified or the presence or absence of additional objects or targets.

AGS appreciates working for you and we especially enjoyed this project, particularly the site's picturesque location overlooking the Pacific Ocean. We look forward to working with you again.

Sincerely,

Roark W. Smit
Senior Geophysicist
Advanced Geological Services, Inc.

Figures:	Figure 1	Site Location (imbedded in Report text)
	Figure 2	Seismic Refraction Survey Results
	Figure 3	Seismic Surface-wave Survey Results

Attachments: Appendix A: Seismic Velocity and Limitations of the Refraction Method

APPENDIX A

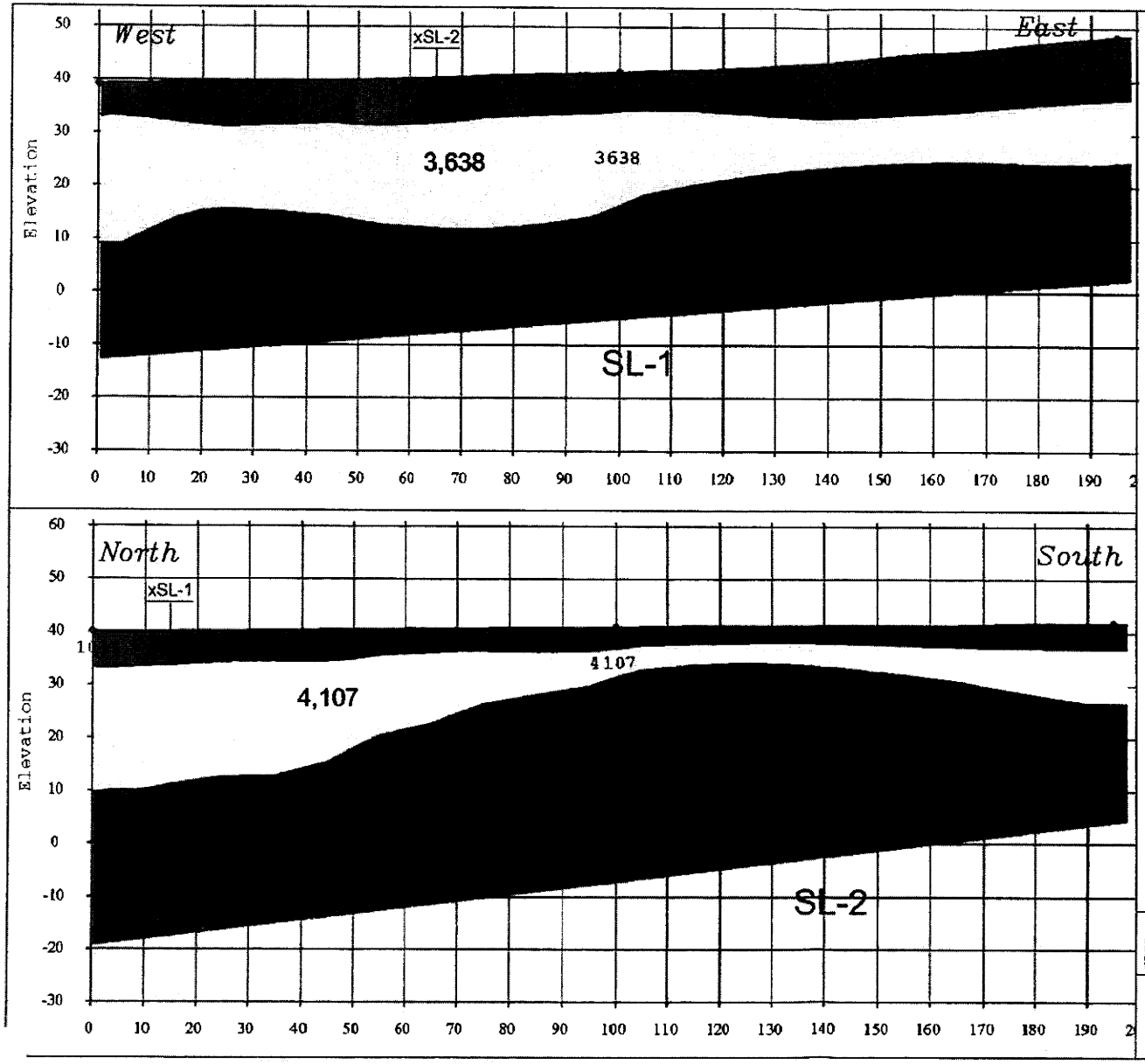
SEISMIC VELOCITY AND LIMITATIONS OF THE REFRACTION METHOD

The physical properties of earth materials (fill, sediment, rock) such as compaction, density, hardness, and induration dictate the corresponding seismic velocity of the material. Additionally, other factors such as bedding, fracturing, weathering, and saturation can also affect seismic velocity. In general, low velocities indicate loose soil, poorly compacted fill material, poorly to semi-consolidated sediments, deeply weathered, and highly fractured rock. Conversely, high velocities are indicative of competent rock or dense and highly compacted sediments and fill. The highest velocities are measured in unweathered and little fractured rock.

There are certain limitations associated with the seismic refraction method as applied for this investigation. These limitations are primarily based on assumptions that are made by the data analysis routine. The data analysis routine assumes that the velocities along the length of each spread are uniform. If there are localized zones within each layer where the velocities are higher or lower than indicated, the analysis routine will interpret these zones as changes in the surface topography of the underlying layer. A zone of higher velocity material would be interpreted as a low in the surface of the underlying layer. Zones of lower velocity material would be interpreted as a high in the underlying layer. The data analysis routine also assumes that the velocity of subsurface materials increase with depth. Therefore, if a layer exhibits velocities that are slower than those of the material above it, the slower layer will not be resolved. Also, a velocity layer may simply be too thin to be detected.

The quality of the field data is critical to the construction of an accurate depth and velocity profile. Strong, clear "first-break" information from refracted interfaces will make the data processing, analysis, and interpretation much more accurate and meaningful. Vibrational noise or poor subsurface conditions can decrease the ability to accurately locate and pick seismic waves from the interfaces.

Due to these and other limitations inherent to the seismic refraction method, resultant velocity cross-sections should be considered only as approximations of the subsurface conditions. The actual conditions may vary locally.

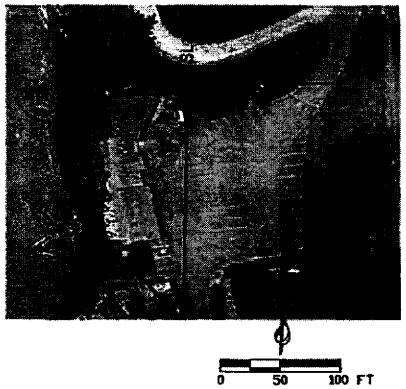


EXPLANATION

SL-1	SEISMIC LINE DESIGNATION
9,007	COMPRESSIONAL (P-) WAVE VELOCITY (FEET PER SECOND)

1000
1800
2600
3400
4200
5000
5800
6600
7400
8200
(ft/s)

SEISMIC LINE LOCATION MAP



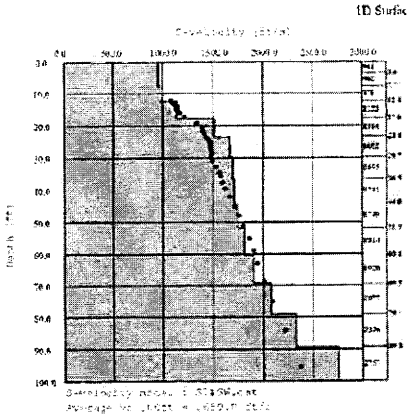
ADVANCED GEOLOGICAL SERVICES
1605 School Street
Suite 4
Moraga, CA 94556
(925) 808-8965

Seismic Refraction Survey Results-
P-Wave Velocity Layering
Nautical Inn Restaurant

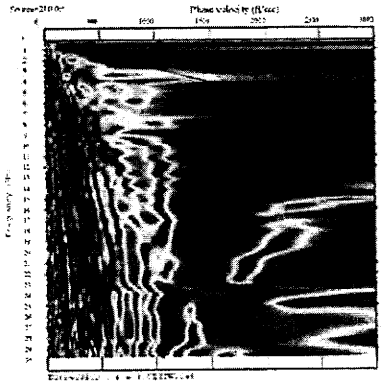
LOCATION: Smith River, CA
CLIENT: LACO Associates
PROJECT #: 14-038-1CA
DATE: July 10, 2014 DRAWN BY: R. SMITH

FIGURE 2

SL-1

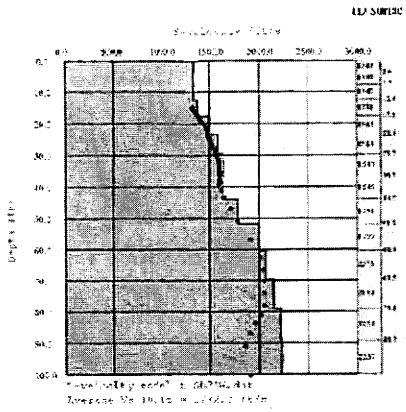


S-Wave Velocity Model, SL-1

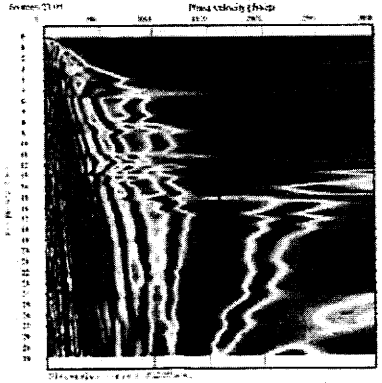


Phase Velocity Image and Dispersion Curve, SL-1

SL-2

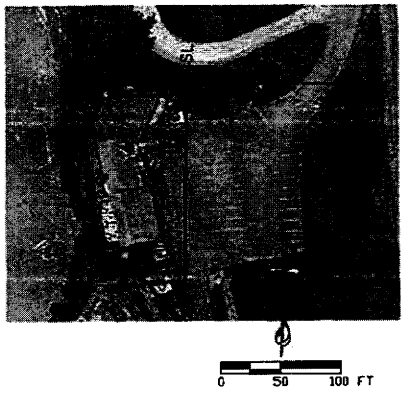


S-Wave Velocity Model, SL-2



Phase Velocity Image and Dispersion Curve, SL-2

SEISMIC LINE LOCATION MAP



ADVANCED GEOLOGICAL SERVICES
1605 School Street
Suite 4
Moraga, CA 94556
(925) 808-8965

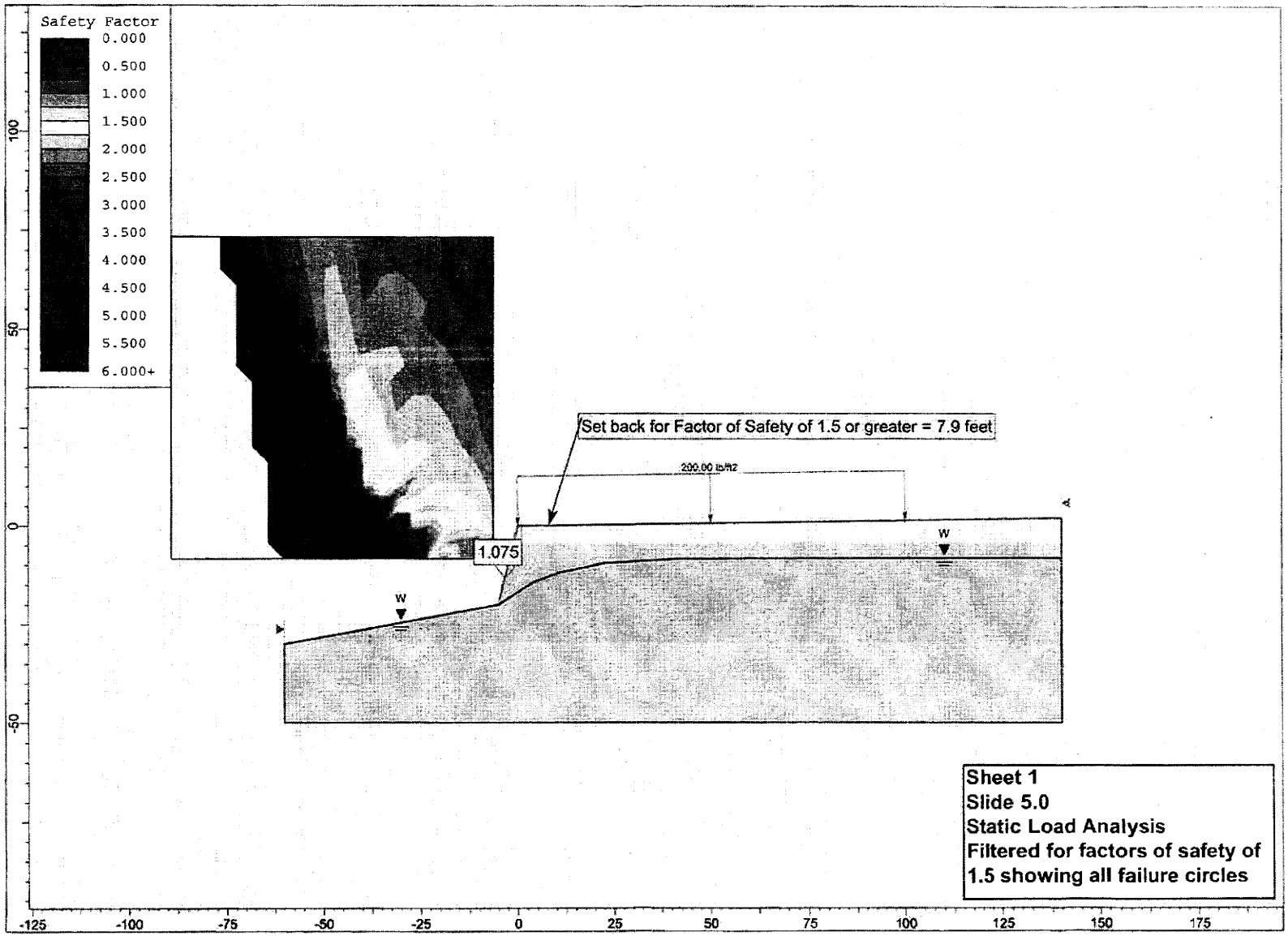
Seismic Surface-Wave Survey Results-
S-Wave Velocity Models
Nautical Inn Restaurant

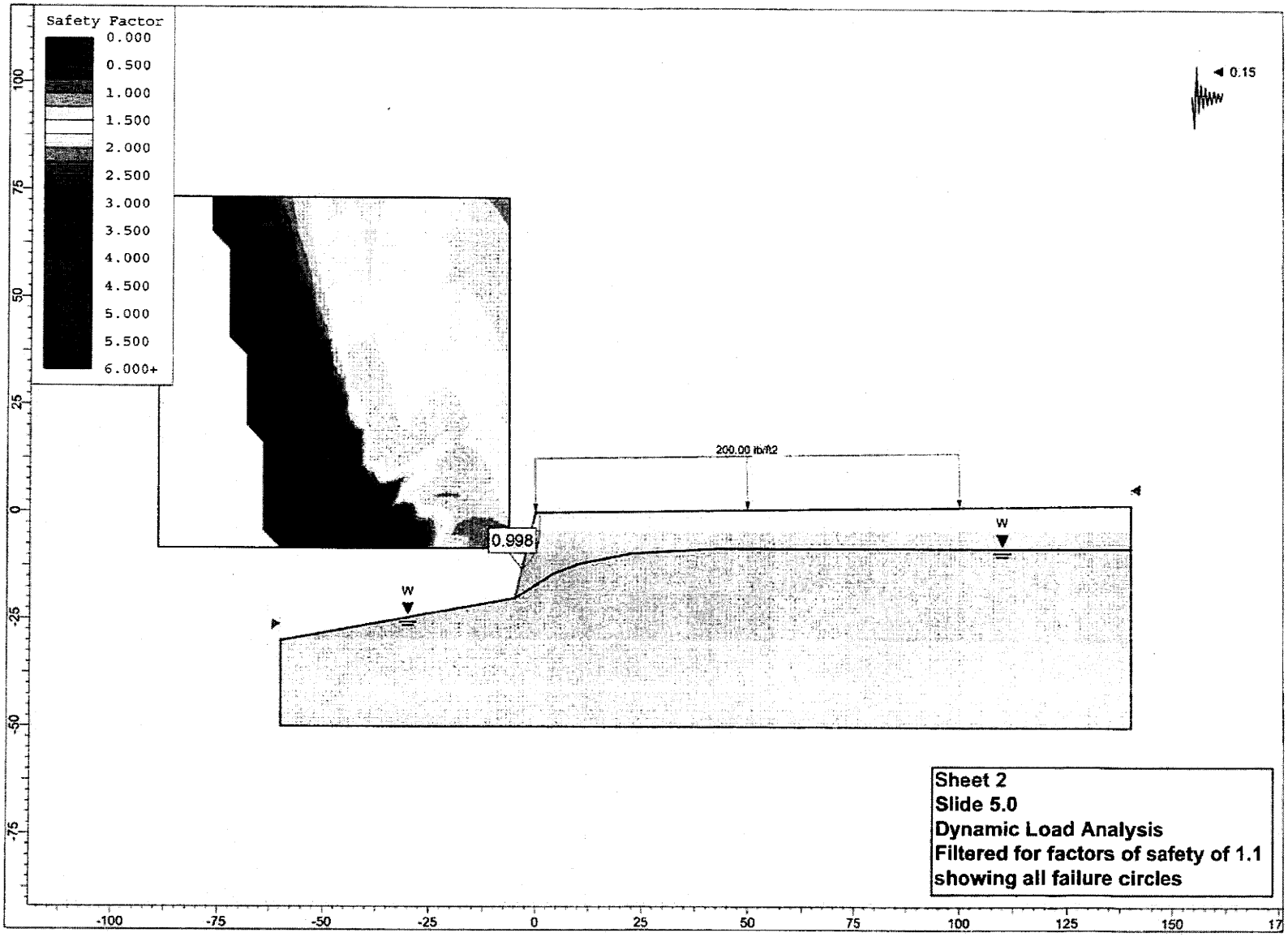
LOCATION: Smith River, CA
CLIENT: LACO Associates
PROJECT #: 14-038-1CA
DATE: July 10, 2014 DRAWN BY: R. SMITH

FIGURE 3

APPENDIX 4

Slope Stability Analysis Results


Safety Factor
0.000
0.500
1.000
1.500
2.000
2.500
3.000
3.500
4.000
4.500
5.000
5.500
6.000+
Set back for Factor of Safety of 1.5 or greater = 7.9 feet
200.00 lb/ft2
1.075
W
W
Sheet 1
Slide 5.0
Static Load Analysis
Filtered for factors of safety of
1.5 showing all failure circles
100
50
0
-50
-125
-100
-75
-50
-25
0
25
50
75
100
125
150
175


Safety Factor
0.000
0.500
1.000
1.500
2.000
2.500
3.000
3.500
4.000
4.500
5.000
5.500
6.000+
0.15
200.00 lb/ft2
0.998
W
W
Sheet 2
Slide 5.0
Dynamic Load Analysis
Filtered for factors of safety of 1.1
showing all failure circles

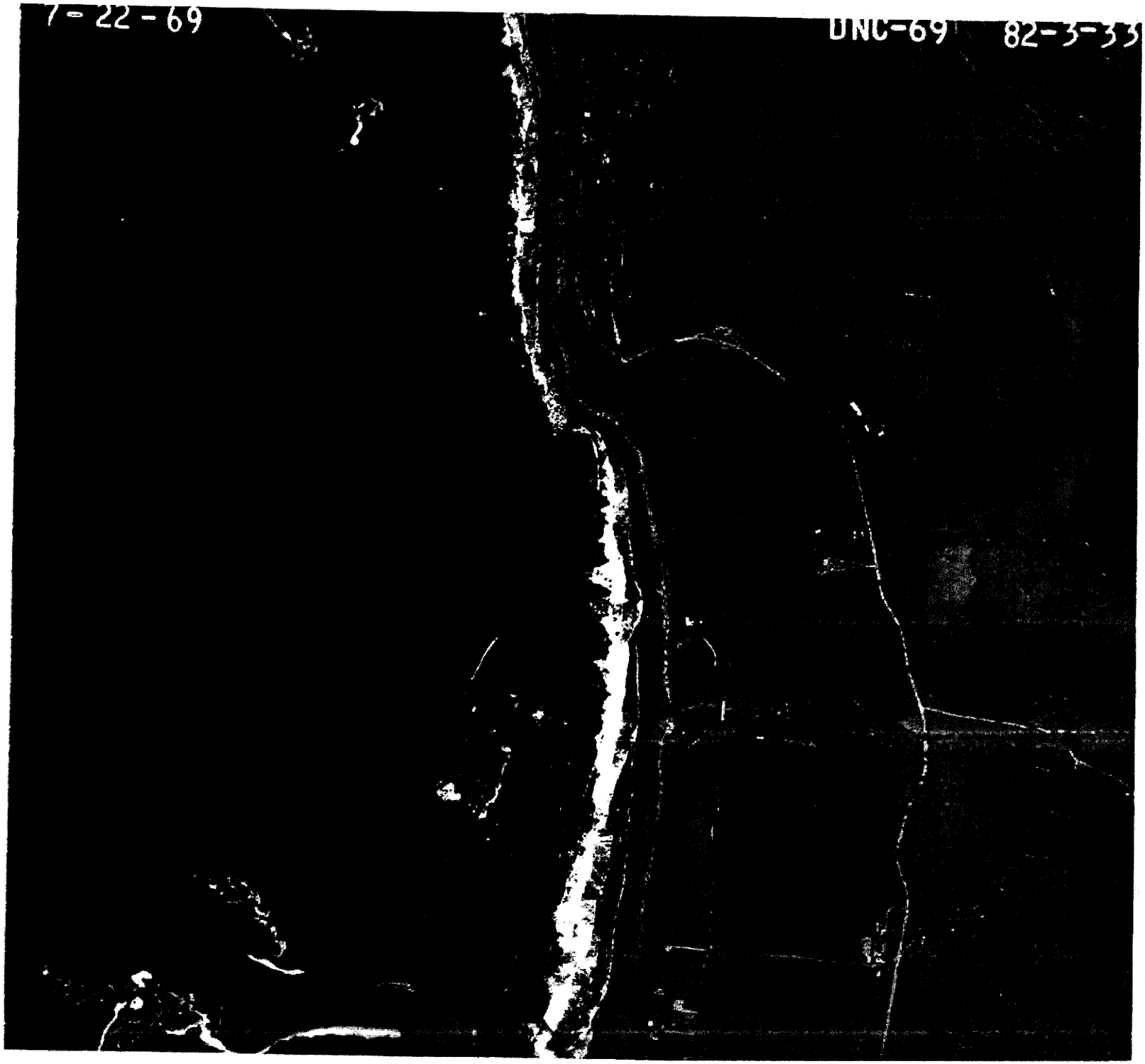
APPENDIX 5

Historic Aerial Photographs References

1963

1963

1969



1969

1975

1975

1996

1996

DEC NORTE 03 4B-11

1"=1000'

FERRERO GEOLOGIC 760 Oak St. Ashland OR 97520
(503)488-2452

To: Allan Murray
850 Pioneer Road
Brookings, Oregon 97415

Date: 2/8/95

Subject: Nautical Inn RV Park site, geologic investigation.

Introduction

The proposed Nautical Inn RV Park site is located at the California/Oregon state line, on top of a marine sand terrace that stands about 25 feet above beach elevation. In past years, I have evaluated three adjacent sites to the north and south on the same terrace. There has been substantial terrace bluff erosion in recent years. To the north, the westward corner of the Nautical Inn restaurant was undercut by erosion, leading to the need for the recently installed steel support piers as per my evaluation and recommendations. To the south, I saw substantial erosion of the terrace bluff a few years ago when evaluating a proposed home site. I recommended not building a home on that site, and a 65 foot setback for a mobile home on the adjacent site to the south. The terrace bluff on the Nautical Inn RV property shows evidence of ongoing erosion, including steep, unvegetated bluff slopes. There is no doubt that the terrace bluff in this vicinity is vulnerable to substantial erosional retreat. The rate of erosion is unpredictable, since it is associated with random high energy climatic, tidal and/or seismic events.

Site Geology

The attached site plan and cross-sections show the topography and geology of the site. In general, the marine terrace deposits are composed of 3 to 4 feet of black, organic, silty sand loam over 4 feet of red-buff sand over 4 to 10 feet of gray-buff gravelly sand. These deposits overlie bedrock of the Franciscan melange, which locally is composed of sheared mudstone and sandstone. Thrust fault related shearing has transformed layered mudstone and sandstone into boulders of broken sandstone suspended in ground up mudstone, the latter weathering to a silt/clay mixture. As the terrace retreats due to erosion, the weak, ground up mudstone washes out from between the sandstone boulders, leaving a beach covered by the boulders. Where terraces are underlain by more competent bedrock that rises 10 or 20 feet above beach level, the very slow erosion rate of hard rock controls the rate of terrace retreat. On this terrace, the retrea

is potentially more rapid due to the weakness of the ground-up mudstone matrix.

Site Geohydrology and Related Stability issues

Groundwater seeps slowly from the gravelly sand/sheared bedrock contact. The terrace sediments, even during this heavy rainfall year, are not saturated due to the their high permeability allowing free drainage out of the bluff. Therefore, bluff retreat is not due to saturation and block failure, and the potential for substantial block failure due to earthquakes is low. The primary mode of bluff retreat is erosion by high seas during random climatic, tidal and/or tsunami events.

Earthquakes

There are two primary sources of earthquakes in the region. One is a group of plate boundary faults offshore from northern California and Southern Oregon bounding the Gorda and Juan De Fuca plates. These faults have generated several earthquakes in the magnitude 5 to 7 range in historic time, estimated to produce ground accelerations of up to 0.3 g, but more often 0.2 g or less along the Oregon Coast. The other source is the Cascadia Subduction Zone (CSV), which is a linear feature that runs under the coastline from northernmost California to British Columbia.. Based on geologic evidence along the coast of Oregon and Washington, the CSV ruptures every 300 to 500 years, the last time about 300 years ago. It is theorized that these are 8.0 to 8.5 magnitude earthquakes. Geologic evidence indicates that tsunami (seismic sea wave) run-up heights resulting from CSV earthquakes have been 20 feet or higher. Such an event would most likely result in substantial terrace erosion.

Proposed Site Development/Setbacks

The proposed plan for development of the site includes a 10 foot setback from the bluff for RV site developments and 30 feet for more permanent developments such as utility lines. It is my understanding that all buildings will be over 100 feet from the bluff. Since only RVs that can be easily and rapidly moved will be on the camp sites, the safety risk is minimal. It is remotely possible that a great earthquake tsunami could overtop the bluff and wash vehicles into the ocean. The risk of loss of human life due to a sudden great earthquake is equal to or higher on any beach. I doubt if the beaches are going to be closed due to that hazard. Storm and/or tide related erosion occurs fairly rapidly sometimes, but not so rapidly that RVs could not be moved out of danger in

EXHIBIT NO. 6
CCC-00-CD-01
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time.

A 35 degree angle projected back up through the terrace sediments from the gravelly sand/sheared bedrock contact on the terrace bluff intersects the top of the terrace 13 feet from the top of the bluff at cross-sections 4 and 7, and 19 feet back at cross-section 1. Though it is unlikely that the weight of an RV could cause terrace bluff failure if it is set back the proposed 10 feet, a prudent setback of 20 feet based on the angle of repose of sand (about 35 degrees) is recommended.

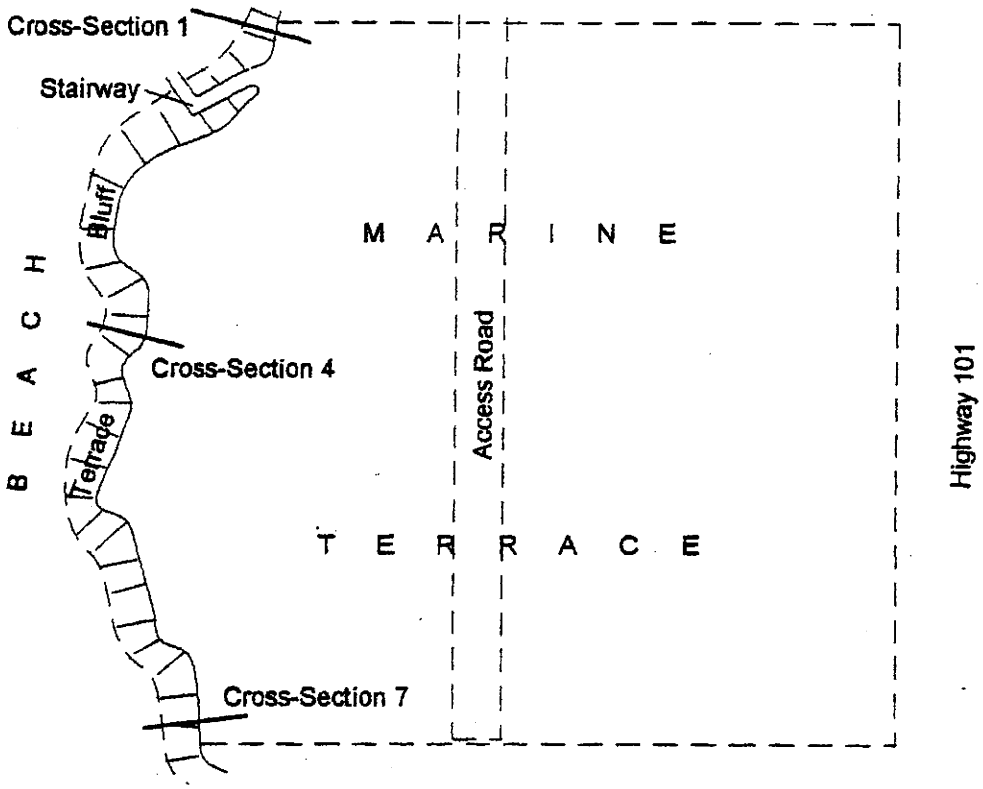
Recommendations/General Risk Factors

I recommend the 20 foot setback from the top of the bluff as described above. I estimate that the risk of injury or loss of life and property to people using the proposed Nautical Inn RV Park is very low. The risk of long term bluff retreat is moderate to high. The amount of bluff retreat is not predictable to any meaningful degree of accuracy due to the unpredictability of random climatic, tidal and/or seismic events. I estimate that the risk of bluff retreat back 30 feet to utility lines in the likely useful lifetime of the RV park is low to moderate.

Sincerely,

REGISTERED GEOLOGIST
CERTIFIED ENGINEERING GEOLOGIST
THOMAS FERRERO NO. 1806
STATE OF CALIFORNIA

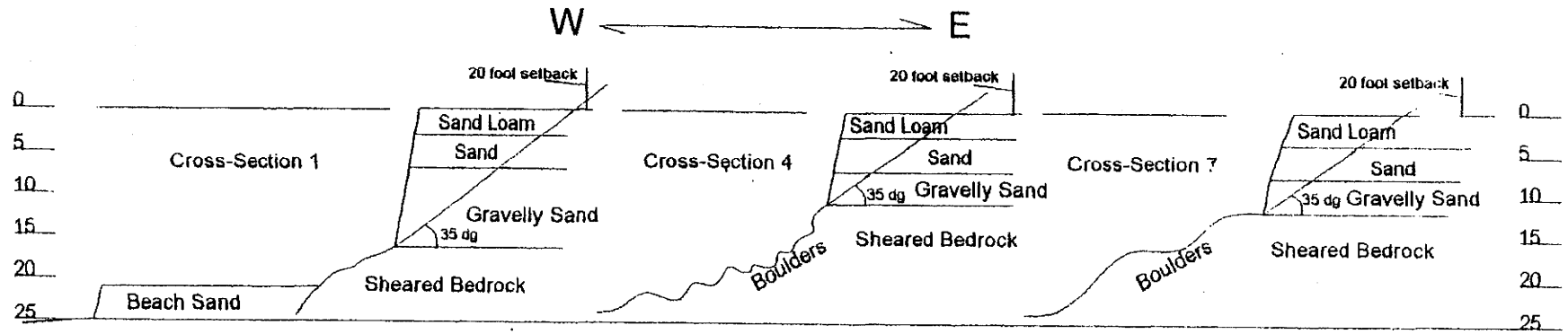
EXHIBIT NO. 6
CCC-00-CD-01
3 OF 5



N

Nautical Inn RV Park
Site Plan
Geologic Investigation
Ferrero Geologic
2/8/95
Scale: 1 inch = 100 feet

EXHIBIT NO. 6
CCC-00-CD-01
4 OF 5



Nautical Inn RV Park
Cross-Sections
Geologic Investigation
Ferrero Geologic
2/8/95
Scale: 1 inch = 20 feet

DEL NORTE COUNTY COMMUNITY DEVELOPMENT DEPARTMENT
981 H STREET, SUITE 110
CRESCENT CITY, CA 95531

NOTICE OF ACTION

I. Notice is hereby given that the **Planning Commission** of Del Norte County took the following action on **July 1, 2015** regarding the application for development listed below:

Action: ✓ Approved ___Denied ___Continued ___Recommended EIR
___Forwarded to Board of Supervisors

Application Number: B32949C
Project Description: Coastal Development Permit for a Hotel
Project Location: 16850 Hwy 101 N., Smith River
Assessor's Parcel Number: 101-070-22
Applicant: Gul Jaisinghani
Applicant's Mailing Address: 2423 E 57th Street, Los Angeles, CA 90058
Agent's Name & Address: Ward Stover,711 H Street ,Crescent City, CA 95531

A copy of any conditions of approval and/or findings adopted as part of the above action is attached.

II. **If Approved:**

✓ This County permit or entitlement serves as a Coastal permit. No further action is required unless an appeal is filed in which case you will be notified.

This County permit or entitlement DOES NOT serve as a Coastal permit. Consult the Coastal Zone Permit procedure section of your NOTICE OF APPLICATION STATUS or the Planning Division of the Community Development Department if you have questions.

III. **Notice is given that this project:**

Is not appealable to the California Coastal Commission, however, a local appeal period does exist.

✓ Is appealable to the California Coastal Commission.

✓ Any appeal of the above decision must be filed with the Clerk of the Board of Supervisors by July 13, 2015 for consideration by the Board of Supervisors.

✓ Any action of the Board of Supervisors on this item may be appealed to the California Coastal Commission within 10 working days or 21 calendar days subject to the requirements of Chapter 21.52 DNCC and Coastal Regulations.

Must be forwarded to the California Coastal Commission for final action. You will be notified of its status by the Coastal Commission Office.

(Continued on the next page)

EXHIBIT NO. 7
APPL. NO. A-1-DNC-15-0047
Jaisinghani
NOTICE OF LOCAL ACTION
1 OF 10

Is not subject to Coastal Commission regulations, however, a local appeal process is available. Written appeals must be filed with the Clerk of the Board of Supervisors by N/A. Consideration will be by the Board of Supervisors.

Requests for deferment of road improvement standards or for modification of road improvement standards must be filed in writing with the Clerk of the Board of Supervisors by _____, with a copy provided to the Secretary of the Planning Commission. Consideration will be by the Board of Supervisors.

Parcel map must be filed within 24 months of the date of approval.

N/A Record of Survey and new deeds must be filed within 24 months of the date of approval.

New deeds must be filed within 24 months of the date of approval.

EXTENSIONS – MAJOR & MINOR SUBDIVISIONS OR BOUNDARY ADJUSTMENTS – Maps (or Records of Survey/Deeds) must be filed within 12 months after the original date of expiration.

NOTICE – SECTION 1.40.070

The time within which review of this decision must be sought is governed by the California Code of Civil Procedure, Section 1094.6, and the Del Norte County Ordinance Code, Chapter 1.40. Any petition seeking judicial review must be filed in the appropriate court not later than the 90th day following the date on which this decision was made; however, if within 10 days after the decision was made, a request for the record of the proceedings is filed and the required deposit in an amount sufficient to cover the estimated cost of preparation of such record is timely deposited, the time within which such petition may be filed in court is extended to no later than the 30th day following the date on which the record is either personally delivered or mailed to you or your attorney of record.

FISH AND GAME FILING FEES

Projects subject to CEQA are also subject to the following fees as required by the California Department of Fish and Wildlife:

Applicable Fee - ✓ Neg. Dec. ($2,260.00) ___EIR ($3119.75) ___Exempt

This fee is due and payable to the County Clerk's Office. The applicant or agent is responsible for paying the current Fish and Game fee, which is subject to change. If not paid within 5 working days of the date of action of the Planning Commission, your project may be invalid by law (PRC 21089(b)) and will be referred to Fish and Game's Department of Compliance and External Audits in the Clerk's monthly deposit and report to Fish and Game.

ATTENTION APPLICANT

As a subdivider or adjuster of property, this notice is to advise you that **all taxes** must be paid in full prior to the recordation of your map or deeds. If the map or deeds are filed **after December 16th, you must pay all taxes due PLUS NEXT YEAR'S TAXES** before the map or deeds can be recorded.

If you have any questions regarding the payment of taxes, call the Del Norte County Tax Collector's Office at (707) 464-7283.

Agent: Stover Engineering APP# B32949C

STAFF REPORT

APPLICANT: Gul Jaisinghani

APPLYING FOR: Coastal Development Permit for a Motel

APN: 101-070-22 LOCATION: 16850 Hwy 101 N., Smith River (Nautical Inn)

PARCEL(S) SIZE: 1.9-acres EXISTING USE: Commercial EXISTING STRUCTURES: Restaurant

PLANNING AREA: 1 GENERAL PLAN: VSC ADJ. GEN. PLAN: Same, PF, RR 1/3

ZONING: CR-C(A)(H) ADJ. ZONING: Same, PF-C (A)(H), RRA-3

1. PROCESSING CATEGORY:
☐ NON-COASTAL
☐ NON-APPEALABLE COASTAL
☒ APPEALABLE COASTAL
☐ PROJECT REVIEW APPEAL

2. FIELD REVIEW NOTES: DATE: 8/8/14
☒ ENVIRONMENTAL HEALTH
☒ PLANNING
☒ BUILDING INSP
☒ ENGINEERING/SURVEYING

ACCESS: Driveway off of US 101
TOPOGRAPHY: Flat pad to bluff
ADJ. USES: Residential, State Park, and Commercial
DRAINAGE: Surface

DATE OF COMPLETE APPLICATION: August 14, 2014

3. ERC RECOMMENDATION: Adopt Negative Declaration. Post public hearing notice. Approve with conditions.

4. STAFF RECOMMENDATION:
Ward Stover, acting as agent for property owner Gul Jaisinghani, has submitted a Coastal Development Permit application to construct a motel at 16850 Highway 101 North near the community of Smith River, approximately ½-mile south of the Oregon border. Currently the parcel is developed with a vacant restaurant and lounge (previously the Nautical Inn) and parking area. The project area is zoned Commercial Recreational with a Coastal Combining Access and Hazards District (CR-C(A)(H)); the General Plan Land Use Designation is Visitor Serving Commercial (VSC). Access to the motel is via an existing driveway off of Highway 101. The project will be served by community water and an onsite sewage disposal system.

Prior Use/Age
According to the Assessor's Office the subject property has been developed with the current building since at least 1947. The existing structure is approximately 4,000-square feet in area and has a 34-space parking lot. As previously stated the zoning of the project area is CR. Hotels and motels are principally permitted uses in the CR zone district as was the previous use of a restaurant. The CR zoning is intended to primarily be commercial in nature and geared towards enhancing public recreational opportunities

through tourism related uses. Due to its location the project is subject to review as a Coastal Development Permit.

Summary of Proposed Development
Application materials submitted indicate the proposed motel would consist of 19 guest suites and a manager's unit for a total of 20 units and a reception/lounge area. The 20 units would be spread across three floors. Each suite would feature a kitchenette, bar, and fireplace as well as an ocean facing private balcony. The height of the proposed motel would be no more than 35-feet from the average adjacent grade, as limited by the zoning, and the footprint of the motel would be approximately 6,275-square feet with a total floor area of 17,575-square feet across the three floors (including walkways and balconies). The applicant has indicated that the proposed motel will also be named *The Nautical Inn*.

County Code requires at least one parking space be provided for each "sleeping unit" (DNCC 21.44.020.N). As such, 20-parking spaces are provided including one van accessible disabled parking space. Application materials indicate screening of the parking area from adjacent residences. Lighting around the project area will incorporate "dark sky" lighting standards to minimize light pollution and impacts to adjacent parcels. Landscaping will incorporate native lawn varietals and low, native plantings. The project area would be redeveloped to remove some of the current parking area and would be developed with approximately 10,600-square feet of grassy area in which the sewage disposal area will be located as well as approximately 3,925-square feet of landscaped areas. According to the applicant the project has been designed to protect views to and along the ocean and scenic areas, minimize alterations of natural landforms and to be compatible with surrounding areas. The current sign pole will be retained and the new motel sign will essentially match the existing sign in terms of height (about 26-feet above the grade) and size (about 60-square feet). Photosimulation renderings of the new sign have been submitted depicting the view of the sign from Highway 101 (i.e. looking west).

The subject parcel was created in 1995 when a Parcel Map (PM 8-32) was recorded subdividing the previous parcel into two parcels. The Parcel Map separated the parcel upon which the White Rock Resort (Parcel B) is now developed from the Nautical Inn parcel (Parcel A). At the time of the recordation of the map an easement for a trail was provided for across Parcel B and a small footpath is now proposed along the southern property line to the beach area below the project. Lateral access was also granted to the general public across the beach for pedestrian use.

A traffic impact analysis was prepared as part of the application identifying a total net decrease in traffic from the prior restaurant use. As previously stated the parking area currently developed on the property includes 34-parking spaces. The project engineer has used this to assume a peak hour traffic of 34 trips whereas the hotel would generate a peak of 20 trips resulting in a net decrease in peak traffic of 14 trips. Access to the project is proposed from an existing driveway on the north end of the project area from Highway 101. Access is also available through Parcel B where a 30-foot wide road and utility easement however this is not proposed to provide access to the project.

Onsite Sewage Disposal System
The applicant has provided an on-site sewage disposal system evaluation based on an investigation and analysis of soils present onsite. Several test pits were identified and soils were examined for appropriateness to accommodate a future sewage disposal system for the motel. The report indicates that there is sufficient area available onsite for sewage disposal in addition to adequate reserve area for the 20-unit motel. Specifically, Stover Engineering performed a site investigation comprised of three exploratory soil excavations. The test pits were excavated to a depth of 5 to 8-feet below ground surface

(bgs). The soil in test pit #1 consisted of dark gray sandy loam to a depth of 4-feet bgs and yellow-brown silty clay from 4 to 5-feet bgs with bedrock encountered at 5.5-feet bgs. Soil observed in test pit #2 consisted of dark gray clay to a depth of 3.5-feet bgs and light brown sandy loam from 3.5 to 8-feet bgs with bedrock encountered at 8-feet. Soil observed in test pit #3 consisted of dark gray sandy loam to a depth to a depth of 2-feet bgs and light brown sandy loam from 2 to 11-feet bgs. No groundwater was encountered in any of the test pits. Stover found percolation rates to be 42 minutes per inch (MPI) near test pit #1 and 60 MPI near test pit #3. Samples from test pits #1 and #2 were found to be classified as Zone 2, loam and sandy loam respectively on the Soil Percolation Suitability Chart. Stover recommends the use of a treatment system (e.g. *Orenco Systems Advantex Treatment System*) for the pre-treatment of effluent prior to disposal. Stover further indicates that runoff from Highway 101 be intercepted and conveyed north around the disposal area (see more in stormwater treatment section of this Staff Report) to avoid impacts to the sewage disposal area.

Geologic Hazards and Coastal Bluff Review
Stover Engineering has subcontracted with LACO Associates for the preparation of a Geotechnical Report and a Coastal Bluff Setback Recommendation Report which have been prepared by Registered Geologist Gary Manhart, P.G., and Engineering Geologist J. Erich Rauber, G.E.

The Geotechnical Report provides information relating to LACO's field exploration of the project area including site and subsurface conditions, details geologic hazards potentially present in the project area, and makes recommendations based on their findings with regard to future construction considerations and site development. Generally, the LACO report finds that the project is suitable for the proposed project. Notably the report provides recommendations relating to the design of the foundation, moisture control for concrete slab foundations, seismic design parameters, and pavement.

The Coastal Bluff Setback and Recommendation Report provides further detail with regard to site and subsurface conditions but provides a more focused analysis relating to specific factors including a quantitative slope instability analysis, bluff retreat, sea level rise, and concludes with a recommended setback based on these factors and their analysis. Through analysis a minimum setback distance of 8-feet from the 38-foot bluff contour elevation is recommended for the siting of the hotel. In developing their recommendation Manhart and Rauber employed a method described in a 2003 Coastal Commission Memorandum which recommends new development be located such that it will not be subject to erosion or stability hazard over the course of its design life ("Establishing Development Setbacks from Coastal Bluffs", Johnsson, 2003). According to the LACO report the bluff retreat analysis indicates that during the time of the available aerial photographs (1963-2013) no retreat was noted at or near the site and accordingly the establishment of a rate of bluff retreat is not achievable. Alternatively, a conservative approach is to estimate the retreat rate with a previously accepted rate for the project area which in this case is an accretionary rate of 0 to 0.5-feet per year. According to LACO, given that no erosional retreat has been observed in the 50 years of available aerial photographs and published bluff retreat rates near the project area indicate accretionary conditions, a stability related setback should govern. The Coastal Bluff Setback and Recommendation Report also includes an analysis of the effect of sea level rise (SLR) on the project. According to the report, due to the previously discussed accretionary shoreline the rate of SLR is rendered relatively insignificant over the 75-year economic life of the project. Essentially, the rate of regional uplift is outpacing the rate of SLR resulting in regional negative SLR.

CEQA Review and Response to Comments
As part of the review of this project the Planning Division has completed an initial study which has resulted in a proposed Mitigated Negative Declaration. The initial study reviewed the project for potential

impacts to aesthetics, biological resources, cultural resources, geology & soils, water quality, noise, transportation, and other topics. The project was determined to have "no impact" or a "less than significant impact" to most topics reviewed however certain impacts which require mitigation to lessen the impact to a less than significant level were also discovered. Specifically, under the discussion of geology & soils a potential impact requiring mitigation resulted in the requirement to incorporate the recommendations of the geotechnical report including incorporation of a bluff setback of at least 8-feet from the 38-foot (msl) bluff contour. Other mitigation recommended to be adopted includes the placement of tsunami information and evacuation signs in guest rooms, the parking area, and in other important locations throughout the project area. No other mitigation was found to be necessary through the CEQA process.

The proposed CEQA document was received by the State Clearinghouse for review and comment by the agencies on August 29, 2014. At the end of the review period comments were received from Eileen Cooper, the California Department of Transportation (Caltrans), and the California Coastal Commission. A summary of the comments is provided below and the comment letters are attached to this Staff Report as exhibits:

- Eileen Cooper expressed opposition to the project because the supplemental analysis does not satisfactorily take into account geologic hazards related to a Cascadia subduction zone events and sea level rise. Ms. Cooper states that in her opinion an acceptable economic lifespan is not accurately provided for and is therefore "inconsistent with the Del Norte LCP."
- Caltrans state in their letter that the project will be subject to an encroachment permit for all work within the State right of way.
- Coastal Commission staff member Kasey Sirkin provided comments based on the CEQA review, covering several areas of concern. Specifically, Ms. Sirkin notes a fuller narrative regarding the demolition activities of the current structure should be provided (including the end status of demolition debris) in order that the project can be fully evaluated for consistency with the LCP. Ms. Sirkin also notes concern with aesthetic impacts potentially arising from the approval of the project (i.e. development of the motel could impact ocean views and coastal topographic features). Ms. Sirkin also notes concern with the geologic hazards and the adequacy of the proposed bluff setback (i.e. would the project create or contribute to erosion or geologic instability). Finally, Ms. Sirkin notes concerns related to impacts on hydrology and water quality (i.e. more stormwater runoff generated from the paving associated with the development of the site).

Based on the comments received Mr. Stover requested that the County place the project on hold so that he could develop a response to the noted concerns. In the intervening months, Mr. Stover and his associates have provided additional information responding to the comment letters. Specifically, Mr. Stover has provided a statement detailing the handling of materials related to the demolition of the existing building and confirms that the project will conform to applicable local and state statutes (staff is also recommending a condition requiring proper disposal of all demolition materials in permitted facilities). Mr. Stover has provided photosimulation mockup renderings that depict resultant views in and around the project area pre and post development of the site. These renderings depict that the motel will conform to the maximum building height restrictions of the zone district (35-feet from average adjacent grade) but would provide design features so as to minimize impacts to coastal views (such as an opening on the third floor of the motel). Additionally, Mr. Stover indicates that neutral colors are proposed which will blend more cohesively with the surrounding environment, particularly in contrast to the existing bright blue structure located on the parcel. Mr. Stover's office has also prepared a conceptual analysis of the project with regard to hydrology and water quality. Notably, as a result of the project the site will have more permeable surface than it currently does as the parking lot will be

reconstructed and will result in less parking than is currently provided by the restaurant. A large portion of the current parking area will have the paved surface removed and will be redeveloped as part of the sewage disposal area. According to the analysis the site will remove approximately 4,100-squre feet of paved parking area and will add 1,150-square feet of roof resulting a net increase of 2,950-square feet of permeable surface. Additionally, a preliminary drainage analysis has been prepared which demonstrates that 85th percentile one-hour storm events will be accommodated with the flow based treatment approach using a stormwater quality treatment system (e.g. "Stormceptor System Model 450i").

Site Visit with Coastal Commission Staff

After the above described review process this project was scheduled to be presented to the Planning Commission in March. As such, public notice was posted, a Staff Report was prepared, and the item was placed on that agenda. Subsequently, the Coastal Commission staff offered to arrange a meeting with the applicant geologic representatives and the Coastal Commission's geologist (Mark Johnsson, PhD) to discuss certain outstanding concern with the project. Based on the plan to meet with the Commission's staff the item was introduced and then continued at the March Planning Commission hearing.

On May 27th the applicant's agent and representatives (Ward Stover, PE and Gary Manhart, PG), County staff (Randy Hooper), and Coastal Commission staff (Bob Merrill, Kasey Sirkin, Josh Levine, and Dr. Johnsson) met onsite to discuss the project with a focus of the discussion being the adequacy of the proposed bluff setback. While it was generally agreed that the physical constraints and lack of available area make siting the motel difficult it was also expressed that there is concern over the adequacy of the bluff setback to withstand the geologic hazards potentially present in the project area. Dr. Johnsson suggested that the LACO analysis presented too optimistic of a conclusion given the potential for coastal erosion and bluff retreat and that further analysis is necessary to support the proposed bluff setback. Mr. Manhart stated that the risks had been appropriately analyzed and that the proposed bluff setback is based on the conclusions LACO made after conducting a thorough analysis of the risks present and of site conditions (see attached geologic hazards reports).

Mr. Manhart and Dr. Johnsson failed to reach an agreement or understanding on the issue of the proposed bluff setback and the applicant has now requested that the project proceed rather than conducting further analysis. Clearly, any geologic hazard present could be further mitigated by moving the development further back from the bluff however, having reviewed the area available and site constraints, there does not appear to be any practicable way of re-siting the development without severely impinging the project in some other way (i.e. area for septic, existence of easement through the parcel, need for parking area, etc.) and, furthermore, doing so would remove the economic incentive that the applicant has in undertaking this project at all.

The LACO geological assessment accounts for geologic conditions changing over time, normal erosion, as well as episodic erosion and bluff failure and other geologic processes described in this Staff Report. Even though geologists cannot predict conditions with absolute certainty, geological assessments can better inform the decision making process. While the LACO reports indicate that the proposed bluff setback is appropriate all such development should be held accountable for any submitted information that determines that a site is safe for development without the need for a protective devices and, as such, staff is recommending a condition prohibiting the use of any future shoreline protection device.

It is the practice of the County Planning Division to view project applications and make recommendations in as objective of a manner as possible given the facts and best available data and science. In this case,

it is the opinion of staff that the applicant and his team have articulated a project that meets the statutory and regulatory standards that it is required to. While there is a significant amount of unease on the part of County staff in recommending that the proposed 8-foot bluff setback be approved the applicant's geologic team has demonstrated, as required by the regulations, that the proposed setback addresses the geologic hazard risks in order to provide a 75-year economic life for the motel *without needing to construct any future shoreline protection device.* In this case, the County staff's unease stems from the significant disagreement between very qualified geologic professionals about the adequacy of the proposed buffer as well as there not being any *margin for error* should an 8-foot bluff setback ultimately not be adequate. Clearly, if the applicant's geologic team is wrong, and the bluff does fail, it would be a catastrophic failure - a factor that the Planning Commission may choose to give extra weight to in its deliberation. To that point, whereas staff reviews projects through a somewhat rigid viewpoint (based on statutory and regulatory requirements), the Planning Commission, in making their decision, may take into consideration other factors beyond those analyzed by staff as is the case with all discretionary permit approvals.

Public Comments

Through the review process comments have been received from various members of the public including affected, adjacent property owners. Generally, the concerns expressed have to do with obstruction of views and potential loss of economic value of property resulting from future development of the proposed motel. Letters received are attached to this Staff Report as exhibits. There are at least two cabins in the adjacent White Rock RV Resort (spaces #1 and #2) whose coastal views will be severely impacted if the motel is constructed as proposed. Letters have been received by the owners of those spaces requesting that their concerns be addressed by the Planning Commission. As of the writing of this Staff Report no public comments in favor of this project have been received.

Conclusion

The ERC and CDD Staff, including the Planning Division, the Building Inspection Division, the Environmental Health Division, and the Engineering Division have reviewed this application and have recommended the attached conditions. Staff recommends this project be approved, with conditions, and that the Planning Commission consider the Initial Study and adopt the proposed Mitigated Negative Declaration.

5. FINDINGS:

A. This project is consistent with the Standards and Policies of the General Plan and the Coastal Zoning Chapter of the Del Norte County Code specifically in that motels are a principally permitted land use in the Commercial Recreational zone district;
B. A Mitigated Negative Declaration has been prepared pursuant to the California Environmental Quality Act which the Commission has considered in reviewing the project and making its decision;
C. This project is subject to the California Department of Fish and Wildlife CEQA Environmental Document filing fee unless the Department waives the fee;
D. The project has been designed to protect views to and along the ocean by providing design features such as openings which accommodate views around the project area and avoiding impacts to natural landforms. Aesthetically, the structure will provide an improvement over the existing building which has reached the end of its economic life;
E. This project has been designed with a coastal bluff stability setback incorporated to avoid hazards, such as sea level rise, bluff retreat, and coastal erosion with no shoreline protection necessary for an anticipated economic life of approximately 75-years.

6. CONDITIONS:

1. This permit is for the demolition of an existing building and construction of a new 20-unit motel. The permit is not automatically transferrable but is eligible be transferred upon application to the Del Norte County Community Development Department;
2. Development shall be pursued in a diligent manner and completed in a reasonable period of time. If development has not commenced the permit will expire two years from the date of final approval. Application for extension of permit must be made prior to the date of expiration;
3. Issuance of the Coastal Development Permit shall be subject to final review and approval by the Building Inspection Division;
4. The project shall be completed in accord with the reviewed plot plan;
5. The project shall comply with the requirements of the California Fire Code applicable at the time of complete application (Aug. 14, 2014);
6. Prior to the issuance of this permit a Notice of Conditional Approval, with signature block, shall be recorded at the applicant's expense;
7. Prior to the issuance of the Coastal Development Permit the applicant shall obtain and provide to the County a copy of an Encroachment Permit (or waiver from permit requirement) from Caltrans for any work within the Caltrans Highway 101 right of way;
8. All material associated with the demolition component of this project shall be properly disposed of in permitted facilities;
9. Best Management Practices shall be implemented during the demolition of the existing structure and construction of the motel including but not limited to: screening the work site; wetting of the bare soils in the work site (to prevent and reduce fugitive dust); installation and maintenance of appropriate erosion and run-off control devices; and limiting working hours to normal business hours to prevent noise impacts on the adjacent White Rock Resort, Pelican Bay State Park, and other noise sensitive receivers around the project area.
10. Construction of the sewage disposal system shall adhere to the design recommendations provided in the submitted sewage disposal report (Stover Engineering, 2014);
11. Development of the site shall include post construction BMP's (e.g. pervious surfaces, natural swales, stormwater treatment facilities) capable of treating stormwater runoff from an 85th percentile rain event as per reviewed engineered stormwater control calculation (Stover Engineering, 2015);
12. A minimum of one (1) parking space shall be provided onsite for each sleeping unit (including the manager's quarters) with at least one (1) ADA compliant, van-accessible parking space also provided on-site. Prior to the issuance of the Certificate of Occupancy the Planning Division shall be notified and shall inspect the property for compliance with this condition;
13. The project shall comply with the standard construction setbacks and height restrictions of the Del Norte County Commercial Recreational Zoning Chapter (DNCC §21.28);
14. A coastal bluff setback of at least of 8-feet (as measured from the 38-foot bluff contour) shall be provided for the proposed development pursuant to the submitted geotechnical report. All additional geotechnical recommendations shall be incorporated by reference into the approval of this permit including proper foundation footing depth, etc. (LACO Consultants, 2014). Prior to the issuance of the Coastal Development Permit a Deed Restriction shall be recorded stating that no shoreline protection structure shall be proposed or constructed to protect the development and expressly waiving any future right to construct such a device;
15. Informational signage shall be placed in guest rooms and in parking areas alerting to tsunami hazards existing in the area and evacuation routes out of the tsunami hazard area. Prior to the issuance of the Certificate of Occupancy the Planning Division shall be notified and shall inspect the property for compliance with this condition;

16. In the event that concentrations of previously unknown archaeological or historical resources (or materials that may be considered to be archaeological or historical resources) are encountered:
    - The County shall be notified immediately and the County shall notify the Smith River Rancheria.
    - All ground disturbing work at the location shall temporarily cease and not resume until a qualified archaeologist has been contacted to evaluate the materials and recommend appropriate action. In the event that project-related activities result in the accidental discovery or recognition of any human remains, the County shall initiate the procedure specified in section 15064.5(d) of the CEQA Guidelines.
17. The project shall conform to the requirements of the Parcel Map (Book 8 of Parcel Maps, Pages 32-33);
18. Prior to the issuance of this permit the applicant shall obtain approval from the County Environmental Health Division for on-site food preparation associated with the motel business;
19. This entitlement is specifically conditioned on the applicant agreeing to indemnify and hold harmless the County of Del Norte, the Planning Commission of the County of Del Norte, the Board of Supervisors of the County of Del Norte, their officers, employees and agents against any and all claims arising out of the issuance of the entitlement and specifically against any expense arising from defending any legal action challenging the issuance of the entitlement, including but not limited to the value of time devoted to such defense by County officers, employees and agents and the amount of any judgment, including costs of suit and attorney fees, recovered against the County or any of its officers, employees or agent in such legal action. The County of Del Norte reserves the option to either undertake the defense of any such legal action or to tender such defense to the applicant. Should the County tender such defense to the applicant and the applicant fail or neglect to diligently defend such legal action, the County may consider such failure or neglect to be a material breach of this conditions and forthwith revoke this entitlement;
20. Prior to the issuance of the Building Permit, the applicant shall submit a grading and drainage plan to the Engineering Division for review and acceptance. The plan shall be prepared by a California Registered Civil Engineer and include provisions for erosion and runoff control;
21. The California Department of Fish and Wildlife environmental document filing fee must be submitted before the Notice of Determination can be recorded. Alternatively, the project proponent may provide a No Effect Determination (NED) or similar waiver that has been issued for this project by the Department of Fish and Wildlife to exempt the project from the filing fee; and
22. Outdoor lighting systems shall be designed and installed to minimize outdoor light pollution with downcast lighting, lighting directed away from adjacent residences, and otherwise placed to not negatively impact adjacent parcels and traffic.

CALIFORNIA COASTAL COMMISSION
NORTH COAST DISTRICT OFFICE
1385 EIGHTH STREET, SUITE 130
ARCATA, CA 95521
VOICE (707) 826-8950 FAX (707) 826-8960

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT

Please Review Attached Appeal Information Sheet Prior To Completing This Form.

SECTION I. Appellant(s)

Name: See Appendix A

Mailing Address:

City: Zip Code: Phone:

RECEIVED
JUL 27 2015
CALIFORNIA
COASTAL COMMISSION
NORTH COAST DISTRICT

SECTION II. Decision Being Appealed

1. Name of local/port government:

County of Del Norte

2. Brief description of development being appealed:

Coastal Development Permit to authorize demolition of an existing one-story, 4,000 square foot restaurant and develop a three-story, 17,575-square foot, motel, including 19 guest units, 1 managers unit, a reception and lounge area, 20 parking spaces, and a new septic system. Each guest suite would include a kitchenette, bar and fireplace in addition to an ocean facing balcony.

3. Development's location (street address, assessor's parcel no., cross street, etc.):

16850 Highway 101 N., Smith River, CA

4. Description of decision being appealed (check one.):

☐ Approval; no special conditions

☒ Approval with special conditions:

☐ Denial

Note: For jurisdictions with a total LCP, denial decisions by a local government cannot be appealed unless the development is a major energy or public works project. Denial decisions by port governments are not appealable.

TO BE COMPLETED BY COMMISSION:

APPEAL NO: A-1-DNC-15-0047

DATE FILED: 7/27/15

DISTRICT: 1

EXHIBIT NO. 8
APPL. NO. A-1-DNC-15-0047
Jaisinghani
COMMISSIONER APPEAL
1 OF 13

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 2)

5. Decision being appealed was made by (check one):

- ☐ Planning Director/Zoning Administrator
- ☐ City Council/Board of Supervisors
- ☒ Planning Commission
- ☐ Other

6. Date of local government's decision: July 1, 2015

7. Local government's file number (if any): B32949C

SECTION III. Identification of Other Interested Persons

Give the names and addresses of the following parties. (Use additional paper as necessary.)

a. Name and mailing address of permit applicant:

Gul Jaisinghani
C/O Stover Engineering
711 H Street
Crescent City, CA 95531

b. Names and mailing addresses as available of those who testified (either verbally or in writing) at the city/county/port hearing(s). Include other parties which you know to be interested and should receive notice of this appeal.

1. Sheila and Mike McCanta
   6602 Hogan Drive
   Weed, CA 96094

2. Ron Cotten
   Whiterock Resort
   16800 Highway 101
   Smith River, CA 95567

3. Friends of Del Norte County
   P.O. Box 229
   Gasquet, CA 95543

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 3)

SECTION IV. Reasons Supporting This Appeal

PLEASE NOTE:

- Appeals of local government coastal permit decisions are limited by a variety of factors and requirements of the Coastal Act. Please review the appeal information sheet for assistance in completing this section.
- State briefly **your reasons for this appeal.** Include a summary description of Local Coastal Program, Land Use Plan, or Port Master Plan policies and requirements in which you believe the project is inconsistent and the reasons the decision warrants a new hearing. (Use additional paper as necessary.)
- This need not be a complete or exhaustive statement of your reasons of appeal; however, there must be sufficient discussion for staff to determine that the appeal is allowed by law. The appellant, subsequent to filing the appeal, may submit additional information to the staff and/or Commission to support the appeal request.

See Appendix B

State briefly your reasons for this appeal. Include a summary description of Local Coastal Program, Land Use Plan, or Port Master Plan policies and requirements in which you believe the project is inconsistent and the reasons the decision warrants a new hearing. (Use additional paper as necessary.)

Note: The above description need not be a complete or exhaustive statement of your reasons of appeal; however, there must be sufficient discussion for staff to determine that the appeal is allowed by law. The appellant, subsequent to filing the appeal, may submit additional information to the staff and/or Commission to support the appeal request.

SECTION V. Certification

The information and facts stated above are correct to the best of my/our knowledge.

Signed: Mary K Shallenberger
Appellant or Agent

Date: 7-27-15

Agent Authorization: I designate the above identified person(s) to act as my agent in all matters pertaining to this appeal.

Signed: _____

Date: _____

State briefly your reasons for this appeal. Include a summary description of Local Coastal Program, Land Use Plan, or Port Master Plan policies and requirements in which you believe the project is inconsistent and the reasons the decision warrants a new hearing. (Use additional paper as necessary.)

Note: The above description need not be a complete or exhaustive statement of your reasons of appeal; however, there must be sufficient discussion for staff to determine that the appeal is allowed by law. The appellant, subsequent to filing the appeal, may submit additional information to the staff and/or Commission to support the appeal request.

SECTION V. Certification

The information and facts stated above are correct to the best of my/our knowledge.

Signed: _____
Appellant or Agent

Date: 1/27/15

Agent Authorization: I designate the above identified person(s) to act as my agent in all matters pertaining to this appeal.

Signed: _____

Date: _____

(Document2)

SECTION I – APPELLANTS

Attachment A

1. Mary Shallenberger
   P.O. Box 354
   Clements, CA 95227
   415-904-5200

2. Dayna Bochco
   45 Fremont St., Suite 2000
   San Francisco, CA 94105
   415-904-5200

ATTACHMENT B

APPEALABLE PROJECT:

After certification of Local Coastal Programs (LCPs), the Coastal Act provides for limited appeals to the Coastal Commission of certain local government actions on coastal development permits (Coastal Act Section 30603). Section 30603 states that an action taken by a local government on a coastal development permit application may be appealed to the Commission for certain kinds of developments, including developments located within certain geographic appeal areas, such as those located between the sea and the first public road paralleling the sea, or within 300 feet of the inland extent of any beach, or of the mean high tide line of the sea where there is no beach, or within 100 feet of any wetland or stream, or within 300 feet of the top of the seaward face of any coastal bluff, or those located in a sensitive coastal resource area. Furthermore, developments approved by counties may be appealed if they are not designated the "principal permitted use" under the certified LCP. Finally, developments which constitute major public works or major energy facilities may be appealed, whether approved or denied by the city or county. The grounds for an appeal are limited to an allegation that the development does not conform to the standards set forth in the certified local coastal program and, if the development is located between the first public road and the sea, the public access policies set forth in the Coastal Act.

The subject development is appealable to the Commission pursuant to Section 30603 of the Coastal Act because the approved development is (1) located between the sea and the first public road paralleling the sea; (2) within 300 feet of the inland extent of a beach; and (3) within 300 feet of the top of the seaward face of a coastal bluff.

BACKGROUND

On July 1, 2015 the County of Del Norte conditionally approved Coastal Development Permit (CDP) # B32949C authorizing demolition of the Nautical Inn restaurant and development of a three-story 19-unit motel with a manager's unit on a bluff top property on the west side of Highway 101 approximately one half mile from the Oregon border. The approved three-story, 17,575-square-foot motel would be sited only 8 feet from the bluff edge on a site comprised largely of unconsolidated sand and gravel where historic erosion and bluff retreat events are known to occur. The County-approved development consists of the following: (1) demolition of the existing one-story 4,000-square-foot restaurant; (2) construction of a 3-story, 17,575-square-foot, 19-unit motel with a manager's unit; (3) construction of 20 parking spaces including one van accessible disabled parking space; (4) installation of approximately 3,925 square feet of landscaped area; (5) construction of a 10,600-square-foot grassy area for a sewage disposal area; and (6) construction of an on-site sewage disposal system.

The project site is located immediately south of Pelican State Beach, a California State Park, and immediately north of the White Rock Resort, a private park model recreational vehicle park. The subject property extends from the highway right-of-way across a coastal terrace to an approximately 40-foot-high bluff and then seaward across the adjoining sandy beach. A one-story restaurant has been located on the site since approximately 1947. The area surrounding the subject property inland of the beach is generally developed with visitor serving land uses along the US 101 corridor which transitions into rural residential, agriculture, and timber lands east of

US 101. The project site is zoned Commercial Recreation with a Coastal Combining Access and Hazards District (CR-C (A)(H) and the General Plan Land Use Designation is Visitor Serving Commercial (VSC).

The project site is situated on the bluff edge of a low gradient coastal terrace adjacent to the Pacific Ocean. The marine terrace is at an elevation ranging from 35 to 50 feet above mean sea level (msl). Published geologic maps indicate the project site is underlain by Quarternary marine terrace and sand dune deposits consisting of unconsolidated sands, alternating with silty clays and imbricated gravels. No active fault traces are shown traversing the site on the published maps and the site is not located within an Earthquake Fault Zone. However, the site is located within a seismically active region which is subject to moderate to large earthquakes from a series of active faults associated with the Cascadia Subduction Zone.

REASONS FOR APPEAL

1. LCP Policies

The approved demolition and development of the motel is inconsistent with the policies of the certified Del Norte County LCP, including but not limited to:

- LUP Chapter 7 – Hazards, Geologic and Seismic Hazards policies
- LCP Chapter 2 - Marine and Water Resources, Specific Area Policies and Recommendations , Policy #4a, Section F – Sea Cliffs

Policy P1 and P2 of Del Norte County LUP Chapter 7, Section D - *LCP Policies and Implementation* states:

The following policies are recommended to minimize risks from geologic, seismic and flood hazards within the Coastal Zone of Del Norte County:

1. *LCP Policies for Geologic Hazards:*

P-1. Any development proposed adjacent to coastline erosion areas shall be preceded by:

- an assessment of the rates of coastal retreat, in the case of bluffs, a detailed examination of underlying geology by a registered geologist or engineering geologist, and

- an analysis of the potential for tsunami run-up

P-2. In lieu of the above the County may establish specific area setbacks of sufficient distance to mitigate potential coastal erosion hazards.

Policy No. 4a of Del Norte County LCP Chapter 2, Section F – *Specific Area Policies and Recommendations – Bluff Retreat* states:

Geological Studies shall be required for new construction within the area of demonstration[1] on bluff-tops to determine:

i) Their suitability for development and;

ii) The necessary set-backs required to avoid hazards associated with bluff failure

2. County Approval

The County approved development is inconsistent with the certified LCP Geologic Hazards policies because the project does not provide an adequate bluff setback to avoid geologic hazards associated with bluff failure. The approved three-story, 17,575-square-foot motel would be sited only 8 feet from the bluff edge on a site comprised largely of unconsolidated sand and gravel where historic erosion and bluff retreat events are known to occur.

The Del Norte County LCP Geologic Hazards policy No. 4 states that geological studies shall be required for new construction within the area of demonstration on bluff tops to determine their suitability for development and the necessary set-backs required to avoid hazards associated with bluff failure. The applicant's geologist prepared and submitted a geotechnical report and an associated coastal bluff setback recommendation as required by the above policy. The geologic investigation used the approach recommended in Johnsson 2003 and evaluated both: (1) historic bluff retreat from wind and wave erosion through aerial photo analysis and (2) bluff stability by performing a quantitative slope instability analysis. To define the total development setback, one must combine the two aspects of the setback considered above: the setback to assure safety from land sliding or block failure, and the setback for long-term bluff retreat. The resulting setback assures that minimal slope stability standards are maintained for the design life of the structure.

The Coastal Bluff Setback report (LACO 2014) states the following:

> *'The bluff retreat rate analysis indicates that during the time of the available aerial photography (1963 to 2013), no retreat was noted at or near the Site. As such, the establishment of a future bluff retreat rate for the site is not achievable. A conservative approach is to estimate the retreat rate with a previously accepted rate for the project area. The estimated rate for the project area appears to be accretionary with a rate of 0 to 1.5 feet per year (Hapke, C.J., Reid,D., and Richmond, B.M. 2006). For this particular project we understand that this conservative approach is acceptable by the project team because the preferred location of the motel building will be as close to the bluff as possible.'*

[1] The area of demonstration of stability includes the base, face and top of all bluffs and cliffs. The extent of the bluff top considered should include the area between the face of the bluff and a line described on the bluff top by the intersection of a plane inclined at a 20 degree angle from horizontal passing through the toe of the bluff or cliff, or fifty feet inland from the edge of the cliff or bluff, whichever is greater. However, the County may designate a lesser area of demonstration in specific areas of known geologic stability (as determined by adequate geologic evaluation and historic evidence) or where adequate protective works already exist. The County may designate a greater area of demonstration or exclude development entirely in areas of known high instability. In this case, the site of the approved motel is within the area of demonstration.

The applicant's geologist established a bluff setback by adding the setback he determined was needed to accommodate bluff retreat over the life of the structure to the setback distance needed to establish an acceptable margin of safety from land sliding from bluff instability. The geologist recommended that eight feet of setback from the bluff edge was needed to establish the required 1.5 factor of safety that would account for bluff erosion due to bluff stability factors. However, according to the coastal bluff setback recommendation report, the geologist performed an aerial photo analysis and did not observe any historic or current bluff retreat. Thus, the consulting geologist recommended using a bluff retreat rate of 0 over the life of the project and did not recommend any additional setback distance to account for bluff retreat. Based on this bluff retreat rate of 0 and the eight-foot-setback the consulting geologist recommended using to account for bluff stability factors, the consulting geologist recommended a total geologic bluff setback of eight feet be applied to the development.

Relying on the recommendations of the consulting geologist's reports, the County found the project to be consistent with the standards and policies of the LCP relating to geologic hazards concluding in Finding E the following:

> *"This project has been designed with a coastal bluff stability setback incorporated to avoid hazards such as sea level rise, bluff retreat, and coastal erosion with no shoreline protection necessary for an anticipated economic life of approximately 75 years."*

3. Appeal

The determination of the geologic analysis that the bluff at the project site is subject to zero bluff retreat, including the geologic determination based on aerial photo analysis, is unreasonable based on significant contradictory evidence that was not taken into account by the consulting geologist. As a result, the recommended setback cannot be relied upon to ensure that the development will be sited and designed to avoid hazards associated with bluff failure over its economic life and the project as approved is inconsistent with the policies and standards of the LCP, including, but not limited to Policy No. 4 of Chapter 2, Section F – Specific Area Policies and Recommendations – Bluff Retreat.

Coastal Commission staff, including Staff Geologist Mark Johnsson, has reviewed the geologic report, conducted site visits, and met with the consulting geologist at the site on May 27, 2015. Commission staff has also examined information contained in coastal development permit application files for earlier development at the site. The determination that the bluff at the project site is subject to zero bluff retreat is based on incomplete information and inadequate evaluation for several reasons.

First, the canopy of existing trees and shrubs, as well as the existence of the restaurant since 1947 that sits on, and partially over, the bluff edge, obscures the bluff edge to a degree that the aerial photography analysis performed (which includes photos from 1963-2013) cannot be relied upon entirely to accurately assess the amount of bluff retreat that has occurred over the time period. Some degree of on-site ground level observation of bluff retreat that penetrates the vegetation canopy and looks under the building is needed to more accurately assess bluff retreat in this case.

Second, the consulting geologist's reliance on the fact that the local shoreline has been characterized by others as accretionary at a rate of 0 to 1.5 feet per year (Hapke, C.J., Reid, D., and Richmond, B.M. 2006) is insufficient to corroborate a bluff retreat rate of 0 as the beach accretion rate is a measure of the rate at which the beach is expanding, rather than a measure of the rate of bluff retreat. An accreting beach does not prevent all waves from flowing over the beach and reaching the bluff, especially during winter storms. Bluff retreat still occurs.

Third, according to the 'National Assessment of Shoreline Change, Part 4: Historical Coastal Cliff Retreat along the California Coast' (Hapke and Reid 2007[2]), the average amount of coastal cliff erosion measured over 70 years in Northern California was 28.8 meters, and the average rate was -0.5 meters/year, as measured on 2,325 transects. As described in Figure 11 of the report, the area around the project site is actually retreating at a rate of 0.25 to 1.1 meters per year (Hapke and Reid 2007). At this rate, between 0.8 and 3.6 feet of the bluff could be lost in any given year.

Fourth, site visits by Commission staff revealed that the bluff edge under the existing restaurant adjacent to where the approved motel would be constructed shows evidence of erosion. Commission staff observed that the existing deck structure was perched over the bluff approximately 4 feet and that the substrate beneath the deck appeared to be eroding and fragile to the touch. Additionally, Commission staff observed areas where support structures had been installed to stabilize the foundation of the existing structure in areas where bluff erosion had occurred.

Fifth, staff has found a 1995 geologic report prepared by Ferrerro Geology for another project at the adjacent site that refers to earlier incidents of erosion on the subject property. Although the 1995 geologic report was prepared for the adjacent property, where the owner was proposing to develop a Recreational Vehicle park, the geologic report discussed the geologic stability of the general area (including the subject parcel) in an attempt to characterize existing geologic hazards and provide recommendations for a bluff setback for the proposed RV Park. The reports states there was "substantial terrace bluff erosion…The westward corner of the Nautical Inn restaurant [the building to be demolished and replaced by the motel] was undercut by erosion, leading to the need for the.. [installation] of steel support piers…There is no doubt that the terrace bluff in this vicinity is vulnerable to substantial erosional retreat. The rate of erosion is unpredictable, since it is associated with random high energy climatic, tidal and/or seismic events." The geologic report for the current project did not reference this earlier report nor did it address its conclusions.

Sixth, in 1994, the County approved a CDP/CUP and a minor subdivision for replacement of motel /cabin units and remodeling of the Nautical Inn restaurant. CDP/CUP No. B22361C included interior remodeling, foundation stabilization and replacement work, and the construction of a new entrance. The County approved development included several conditions relating to the subject parcel being an area of potential geologic risk and that prior to issuance of the permit, all building plans and plot plans required approval of a California registered engineer or geologist to assure that the final plans conformed to the recommendations contained in the accompanying geologic report. Furthermore, the County approved project included a condition

[2] Hapke, C.J., and Reid, D., 2007, National Assessment of Shoreline Change, Part 4: Historical Coastal Cliff Retreat along the California Coast: U.S. Geological Survey Open-file Report 2007-1133.

requiring that the parcel owner record a deed restriction on the property that documented that 'the applicant understands that the site is subject to erosion and geological hazards'.

Finally, the County findings do not include an alternatives analysis to determine if other sizes or locations of the proposed motel would provide sufficient protections from geologic hazards as required by the LCP nor would the approved setback allow enough room for heavy equipment to operate between the bluff edge and the approved development in case such need arises for removal or movement of the approved building away from the bluff edge. Therefore, as (1) the recommended and approved geologic setback of 8 feet is dependent on the assumption that no bluff retreat will occur at the site over the economic life of the structure, and (2) the assumption of no retreat is not adequately supported and is contradicted by substantial available evidence to the contrary as discussed above, the approved project is inconsistent with the provision of Policy No. 4 of Chapter 2 , Section F – Specific Area Policies and Recommendations – Bluff Retreat, that state among other things, that "Geologic studies shall be required for new construction… to determine: (i) their suitability for development; and (ii) the necessary set-backs required to avoid hazards associated with bluff failure."

As stated in the Coastal Bluff Setback Recommendation report, the recommended bluff setback distance was established to allow the building to be as close to the bluff as possible. The County's findings for approval state in part:

> *'...although any geologic hazard present could be further mitigated by moving the development further back from the bluff, having reviewed the area available and site constraints, there does not appear to be any practicable way of re-siting the development without severely impinging the project in some other way and furthermore, would remove the economic incentive that the applicant has in undertaking the project at all.'*

The County staff report also states:

> *' While it is the opinion of staff that the applicant and his team have articulated a project that that meets statutory and regulatory standards that it is required to, there is a significant amount of unease on the part of County staff in recommending that the proposed 8-foot bluff setback be approved. The unease stems from the significant disagreement between very qualified geologic professionals about the adequacy of the proposed buffer, as well as there not being any margin for error should an 8-foot bluff setback ultimately not be adequate. Clearly, if the applicant's geologic team is wrong, and the bluff does fail, it would be a catastrophic failure - a factor that the Planning Commission may choose to give extra weight to in its deliberation. To that point, whereas staff reviews projects through a somewhat rigid viewpoint (based on statutory and regulatory requirements), the Planning Commission, in making their decision, may take into consideration other factors beyond those analyzed by staff as in the case with all discretionary permit approvals.'*

While the County staff report acknowledges that the staff is uneasy with the established setback, it sites regulatory and statutory completeness of the application as a reason for the recommended conditional approval, and suggests that the Planning Commission use its ability to look beyond these requirements when considering the proposed development. However, as required under the

certified LCP, to be approved, a CDP must be first consistent with the policies of the certified LCP.

CONCLUSION

Despite the preparation of a geological report, the County approval does not demonstrate how the approved 8-foot bluff setback is sufficient to ensure avoidance of hazards associated with bluff retreat and coastal erosion. The County approval also fails to consider existing contradictory geologic evidence regarding bluff retreat and erosion on the site that indicate that the site is experiencing ongoing erosion and bluff retreat. As a result, the project, as approved by the County, is inconsistent with the geologic and hazard policies of the certified LCP.

STATE OF CALIFORNIA – THE RESOURCES AGENCY

EDMUND G. BROWN JR., *Governor*

RECEIVED

JUL 17 2015

CALIFORNIA
COASTAL COMMISSION
NORTH COAST DISTRICT

CALIFORNIA COASTAL COMMISSION
NORTH COAST DISTRICT OFFICE
1385 EIGHTH STREET, SUITE 130
ARCATA, CA 95521
VOICE (707) 826-8950 FAX (707) 826-8960

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT

Please Review Attached Appeal Information Sheet Prior To Completing This Form.

SECTION I. Appellant(s)

Name: Sheila + Mike McCanta
Mailing Address: 6602 Hogan Dr.
City: Weed, CA Zip Code: 96094 Phone: 510-816-6371

SECTION II. Decision Being Appealed

1. Name of local/port government:
County of Del Norte Planning Commission

2. Brief description of development being appealed:
Demolition of the existing Nautical Restaurant at 16850 US Hwy. 101, Smith River, CA And construction of a 20-unit motel, US Hwy 101, Del Norte, CA (APN 101-070-22) Gul Jaisinghani, Applicant SCH# 2014082090

3. Development's location (street address, assessor's parcel no., cross street, etc.):
Existing Nautical Restaurant
16850 US 101, Smith River, CA

4. Description of decision being appealed (check one.):

☒ Approval; no special conditions

☐ Approval with special conditions:

☐ Denial

Note: For jurisdictions with a total LCP, denial decisions by a local government cannot be appealed unless the development is a major energy or public works project. Denial decisions by port governments are not appealable.

TO BE COMPLETED BY COMMISSION:

APPEAL NO: A-1-DNC-15-0047

DATE FILED: 7/17/15

DISTRICT: 1

EXHIBIT NO. 9
APPL. NO. A-1-DNC-15-0047
Jaisinghani
McCANTA APPEAL
1 OF 9

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 2)

5. Decision being appealed was made by (check one):

- ☐ Planning Director/Zoning Administrator
- ☐ City Council/Board of Supervisors
- ☒ Planning Commission
- ☐ Other

6. Date of local government's decision: July 1, 2015

7. Local government's file number (if any): B32949C - APN 101-070-22

SECTION III. Identification of Other Interested Persons

Give the names and addresses of the following parties. (Use additional paper as necessary.)

a. Name and mailing address of permit applicant:

Mr. Gul Jaisinghani and His Agent:
2423 E. 57th St. Stover Engineering
Los Angeles, CA 90058 c/o Ward Stover, P.E.
711 H Street
Crescent City, 95531

b. Names and mailing addresses as available of those who testified (either verbally or in writing) at the city/county/port hearing(s). Include other parties which you know to be interested and should receive notice of this appeal.

(1) Sheila McCanta — Testified + wrote letters
6602 Hogan Dr.
Weed, CA 96094
* Owner of Cabin #1 at Whiterock Resort (Adjacent to Nautical Restaurant Closest cabin)
16800 US 101, Smith River

(2) Mike McCanta — Testified
6602 Hogan Dr.
Weed, CA 96094
* Co-owner of cabin #1, Whiterock Resort

(3) Ron Cotten — Testified
Property Manager
Whiterock Resort
16800 US 101, Smith River

(4) Other interested parties are all the cabin owners of Whiterock resort, especially cabins 2, 3 & 4, but I am not privy to those names + addresses.
Our view/cabin value will be completely blocked by this motel - theirs partially blocked.

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 3)

SECTION IV. Reasons Supporting This Appeal

PLEASE NOTE:

- Appeals of local government coastal permit decisions are limited by a variety of factors and requirements of the Coastal Act. Please review the appeal information sheet for assistance in completing this section.
- State briefly **your reasons for this appeal**. Include a summary description of Local Coastal Program, Land Use Plan, or Port Master Plan policies and requirements in which you believe the project is inconsistent and the reasons the decision warrants a new hearing. (Use additional paper as necessary.)
- This need not be a complete or exhaustive statement of your reasons of appeal; however, there must be sufficient discussion for staff to determine that the appeal is allowed by law. The appellant, subsequent to filing the appeal, may submit additional information to the staff and/or Commission to support the appeal request.

Please see attachments

SECTION IV. REASONS SUPPORTING THIS APPEAL

I understand that the reasons for this appeal must involve "substantive issues" mentioned in the review by the Coastal Commission, and the property in question must be between the ocean and the first public highway, which in this case is Hwy. 101 Del Norte County. These substantive issues are mentioned in the Coastal Commission's Review dated June 30th and received on July 1st (the date of the hearing), but dismissed in a negative fashion by Planning Commission Staff and the appellant's agent Mr. Ward Stover of Stover Engineering at the hearing of the Planning Commission on July 1st.

The issues are:

1) The Planning Commission approved the permit for a 20 unit motel with only an 8 feet setback from the bluff. The Coastal Commissions recommendation after physical review of the bluff on May 27, 2015 required a 25 foot setback. Thus there is a conflict between what the Planning Commission approved and the Coastal Commission requirements.

2) The Coastal Commission also stated that the bluff is, in fact, receding and is not strong enough and would require additional support during the life of the project—this additional support is not permitted by the LCP.

3) The Planning Commission approved the design of the motel as monolithic 75 ft. above sea level which would eliminate the view of the ocean from Highway 101 which is the first view of the California Coast when traveling south on Hwy. 101. The Planning Commission staff and Mr. Ward Stover dismissed the Coastal Commission's recommendation by claiming that a redesign of the project to 2 buildings with view in between, or a reduction in the number of units would "make the project economically infeasible". Yet no proof/ documentation of this was provided.

4) The appellant stated unequivocally that "no modifications, or mitigations of any kind could be made without making the whole project infeasible". Again, there was no documentation provided and the Planning Commission just accepted this as fact dismissing the mitigating recommendations of the Coastal Commission.

5) The appellant's representative dismissed the recommendations of the Coastal Commission by saying, "we made some changes to the parking places and the septic system, but they just didn't like our answers."

6) There were procedural problems with this application for permit. Owners of property adjacent to the property in question were supposed to be notified when this application was originally made about a year ago. Our cabin #1 is the closest Whiterock cabin to the existing Nautical Restaurant, yet we were given no notification until 2 weeks before the July 1st hearing. Signs were supposed to be posted on the property and adjacent property at the time of application, yet these were not posted until a couple of days before the July 1st hearing.

7) In the hearing itself, those of us who testified against the project as presented were given 3 minutes to speak. This was controlled with a timer. Yet the agent for the developer, Mr. Ward Stover was permitted to ignore the timer and spoke for over 20 minutes. He went over pictures and plans which were given to the Commission members only. We had no copies to reference and were given no information.

The above list represents the ways in which the approval of the Planning Commission is inconsistent with the Local Coastal Program: The setback of 8 ft. is inconsistent with safety and the building design will eliminate the visual resource of the view from Hwy. 101 of the coast. **Due to these substantive issues and the questionable procedural matters, I request an appeal and hopefully a reversal of the Planning Commission's approval of this project.**

As for our personal interest for this appeal, our cabin #1 at Whiterock Resort is the closest and immediately adjacent to the property in question. If this project is permitted with just an 8 ft. setback, the view from our cabin will be completely eliminated causing us to lose most of the value. We could live with and maintain some of our attractive view with a 25 foot setback as the Coastal Commission recommended.

I have attached the "Considerations/objections to the Coastal Development Application Permit for a Motel on the property of the former Nautical Restaurant" which I submitted ahead of time for the July 1st hearing to the staff and members of the Planning Commission. This was the basis of my testimony at the hearing. The Planning Commission gave no consideration to compensating us for our loss of value if this project proceeds with only an 8 foot setback.

I have also attached the statement of my husband regarding this loss of value.

Mr. Jaisinghani is a wealthy and powerful developer from Southern California with regard only for his profits in this project. We are senior citizens on a fixed income and will lose the value of our cabin. We know that the county stands to gain from the taxes on a motel, but we hope the Coastal Commission will stand firm on the recommendations you have made to have a 25 ft. setback and a redesign to either a smaller number of units, or divided sections which will permit the ocean view from hwy. 101.

Thank You for Your Consideration.

Considerations/objections to the Coastal Development Application Permit for a Motel on the property of the former Nautical Restaurant from Sheila and Mike McCanta owners of Cabin #1 at Whiterock Resort:

1) Location: Our Cabin #1 is the closest cabin to the property in question, just a few paces away from our deck. Building a 3 story motel so close would eliminate much of our view and interfere with the privacy of our deck. Already, the hedge and the deck in front of the existing structure is eliminating much of our view, so a three story structure in the same location would eliminate even more of the view, causing us to lose rental customers that we have built up loyalty for choosing our cabin. This causes us to lose value in our rental property.

2) Our Cabin #1 is a rental property. Tearing down the old structure and building a 3 story motel so close to us would cause us to lose rentals because of noise, dust, dirt and lack of privacy and view. Again, we would lose value of our property. Our rental customers would not be able to enjoy our cabin and would not want to stay there or return.

3) A three story motel on the existing Nautical Property would eliminate the ocean view from Hwy. 101. This view is what attracts our rental customers to our cabin. Thus we would lose more value.

4) The bluff is eroding. Building a 20 unit structure on the existing property would contribute to future erosion.

5) The application for permit plans to use existing on site sewage disposal and community water. The restaurant had only two bathrooms for customers (Male and Female) and Kitchen facilities. The existing sewage will not be able to handle the needs of a 20 unit motel. California is currently in drought conditions. A 20 unit motel would greatly increase water usage.

6) Our cabin #1 has been for sale for about a year, but due to the uncertainty created by this application and the possible loss of value a permit would create, we are unable to sell because we have to disclose this possibility of loss.

DUE TO THESE CONSIDERATIONS, WE ASK THAT IF YOU APPROVE THE PERMIT FOR BUILDING OF A 20 UNIT MOTEL RIGHT NEXT TO OUR CABIN, YOU REQUIRE THE BUILDER/OWNER TO COMPENSATE US FOR THE TREMENDOUS LOSS OF VALUE OF OUR CABIN THAT THIS PROJECT WOULD CREATE. WE THEREFORE REQUEST THAT YOU REQUIRE THE NEW OWNER TO BUY OUR CABIN AT A FAIR PRICE. (IT IS CURRENTLY LISTED FOR $175,000) WHICH IS BASED ON WHAT WE PAID FOR IT AND WHAT WE HAVE PUT INTO IT.

Respectfully Submitted,
Sheila and Mike McCanta, owners Cabin#1 Whiterock Resort
510-816-6371
smccanta@me.com
6602 Hogan Dr., Weed, CA 96094

What was most disappointing about the hearing on July 1st is that no accommodations or modifications were offered to mitigate the impact to our property which the building of a three-story, twenty room "boutique hotel" will have to the ocean view property which we have enjoyed for over seven years. In an attempt to explain his ruling one of the members of the planning board commented that we should have known back when we purchased the property that such a structure could have been built which would destroy our view and peaceful enjoyment of our cabin. How were we supposed to have known that?

Back when we purchased the cabin the owner of the land who had also at one time owned the Nautical restaurant assured us when we asked about it that the Planning Commission and the Coastal Commission would never permit an extension to the restaurant which would allow a structure to be built closer to the cliff since he had been denied a permit to do so "several times." But, regrettably, a couple of years ago we noticed that a deck was being built out towards the cliff which restricted our view. We were given no notice of this change and were not able to voice our objections or find out why the policy had changed.

When we found out by word of mouth that a hearing would be held to discuss the proposed "boutique hotel" right next to our property we were optimistic that the Planning Commission would take into consideration our plight and if the permit were granted at least require the builder to modify his plans to make reasonable accommodations to lessen the impact on our cabin. One of the members did in fact express sympathy for us but, after ruling against us, said that we should have known this could happen and that such projects represent "progress."

We do not object to "progress." In fact we welcome that something will be done to the abandoned building which was the Nautical restaurant. But what we cannot understand is why the owner of the property will not take into consideration how much his project, as it is presently configured, will devalue our cabin and make it difficult to use as a rental property. The "boutique hotel" will certainly provide competition to our rental unit and we are not afraid of that as long as it is fair competition and not based on obliterating our view.

When we suggested in the hearing that the owner could lessen the impact to our property by modifying his design or compensating us for our loss the owner's representative would not even consider our request. He dismissed our property as a "RV park" not worthy of concern. As anyone who has ever seen White Rock Resort knows the property is much more than a "RV park." The cabins are park models which are secured to their sites and have permanent water, electricity, sewer connections and permanent decks with integrated hot tubs.

The Planning Commission voted not make any modifications a condition of granting the building permit. Is this reasonable? Granted that our investment in our cabin will be cheapened by the building of the "boutique hotel" and granted that this is "progress" why must we as the small property owner suffer all of the harm when coming up against the large, resource-rich Southern California developer? We do not think it is fair or reasonable that the the Planning Commission would not even listen to how the developer could reduce the impact on our property by adjusting some parts of his proposed project.

A simple thing such as moving back a few feet from the edge of the cliff would allow us to retain at least a sliver of our previous view, but the Planning Commission's staff said that moving even a few feet would make the project "economically unfeasible." No evidence or back up was presented by either the Planning Commission's staff or by the representative of the developer

to substantiate this economic assertion. Should not at least a study have been presented to see whether or not adjusting the footprint of the building back a few feet from the edge of the cliff would cause such harm that the project would have to be abandoned?

Besides the view, one of the unique characteristics of our cabin is that it is the only one that has a private hot tub which is enclosed in an eight foot high structure. Oftentimes guests return to rent our cabin because of the private hot tub feature. If the "boutique hotel" were constructed with windows on the south side of the building their guests could look right down into our hot tub enclosure, thus destroying the privacy of our guests. A requirement that no windows or viewing areas be constructed on the south side of the "boutique hotel" would preserve the privacy of our guests and the unique characteristics of our cabin. Such a simple, reasonable accommodation was not even discussed.

Certainly there are other accommodations or modifications that could be made to the proposed structure that would lessen the impact on our cabin. Constructing a structure with fewer units and a smaller footprint would be a big help for us. Why would such a change make the project "economically unfeasible?" The architect's drawings (which we did not see until after the decision) clearly show that a cantilever deck is planned which will project all the way to the edge of the cliff, well beyond the eight foot setback that the developer is requesting. The Planning Commission did not raise an objection to this further intrusion which would hide from us even more of the view. Another example of a simple requirement is to keep the hedge trimmed in front of the hotel to a couple of feet in height. This accommodation would be a easy way to give us a peek at the ocean, but the developer would not consider even such a reasonable accommodation.

If the project must go forward we would hope that the Planning Commission or the Costal Commission or some other State or County governing body would require reasonable modifications to the building plan as submitted to lessen the impact on our property.

We are retired and living on a fixed income. We purchased our cabin seven years ago for our enjoyment and those of our guests without any reasonable expectation that the Dolphin Dream cabin could turn into our nightmare when a developer could take away our quiet enjoyment by building a three-story hotel only a few feet from us. We are long-time residences of California and have paid both State and local taxes faithfully for many years. We would hope that some of the agencies we have been funding for these many years would take our side in requiring that reasonable accommodations be made to the construction of a hotel which would, without granting us some relief, substantially devalue our property in the name of "progress."

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 4)

SECTION V. Certification

The information and facts stated above are correct to the best of my/our knowledge.

Sheila McCarta
Signature of Appellant(s) or Authorized Agent

Date: July 6, 2015

Note: If signed by agent, appellant(s) must also sign below.

Section VI. Agent Authorization

I/We hereby
authorize _____
to act as my/our representative and to bind me/us in all matters concerning this appeal.

C.M. McCarta
Signature of Appellant(s)

Date: July 6, 2015

CALIFORNIA COASTAL COMMISSION
NORTH COAST DISTRICT OFFICE
1385 EIGHTH STREET, SUITE 130
ARCATA, CA 95521
VOICE (707) 826-8950 FAX (707) 826-8960

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT

Please Review Attached Appeal Information Sheet Prior To Completing This Form.

SECTION I. Appellant(s)

Name: Friends of Del Norte

Mailing Address: PO Box 229

City: Gasquet, CA Zip Code: 95543 Phone: 707-465-8904

SECTION II. Decision Being Appealed

1. Name of local/port government:

Del Norte County

2. Brief description of development being appealed:

Construct new three story motel at Nautical Inn site.

3. Development's location (street address, assessor's parcel no., cross street, etc.):

APN 101-070-22
16859 Hwy 101 N., Smith River

4. Description of decision being appealed (check one.):

☐ Approval; no special conditions

x Approval with special conditions:

☐ Denial

Note: For jurisdictions with a total LCP, denial decisions by a local government cannot be appealed unless the development is a major energy or public works project. Denial decisions by port governments are not appealable.

TO BE COMPLETED BY COMMISSION:

APPEAL NO: A-1-DNC-15-0047

DATE FILED: 7/27/15

DISTRICT: 1

EXHIBIT NO. 10
APPL. NO. A-1-DNC-15-0047
Jaisinghani
FRIENDS OF DEL NORTE
APPEAL
1 OF 5

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 2)

5. Decision being appealed was made by (check one):

- ☐ Planning Director/Zoning Administrator
- ☐ City Council/Board of Supervisors
- x Planning Commission
- ☐ Other

6. Date of local government's decision: Hearing Date: July 1, 2015

7. Local government's file number (if any): B 3294C

SECTION III. Identification of Other Interested Persons

Give the names and addresses of the following parties. (Use additional paper as necessary.)

a. Name and mailing address of permit applicant:

Gul Jaisinghani, c/o Tower #200, 19101 Mystic Point Dr. #1209, Aventura, Florida 33180

b. Names and mailing addresses as available of those who testified (either verbally or in writing) at the city/county/port hearing(s). Include other parties which you know to be interested and should receive notice of this appeal.

(1) Gul Jaisinghani c/o Project Agent Stover Engineering, 711 H Street, Crescent City, CA 95531

(2) Eileen Cooper, 2644 Roy Ave, Crescent City, CA 95531

(3)

(4)

APPEAL FROM COASTAL PERMIT DECISION OF LOCAL GOVERNMENT (Page 3)

SECTION IV. Reasons Supporting This Appeal

PLEASE NOTE:

- Appeals of local government coastal permit decisions are limited by a variety of factors and requirements of the Coastal Act. Please review the appeal information sheet for assistance in completing this section.
- State briefly **your reasons for this appeal.** Include a summary description of Local Coastal Program, Land Use Plan, or Port Master Plan policies and requirements in which you believe the project is inconsistent and the reasons the decision warrants a new hearing. (Use additional paper as necessary.)
- This need not be a complete or exhaustive statement of your reasons of appeal; however, there must be sufficient discussion for staff to determine that the appeal is allowed by law. The appellant, subsequent to filing the appeal, may submit additional information to the staff and/or Commission to support the appeal request.

Friends of Del Norte, *Committed to our environment since 1973*

A nonprofit, membership based conservation group, advocating sound environmental policies for our region.
PO Box 229, Gasquet, CA 95543

ATT: California Coastal Commission, B. Merrill, L. Kasey Sirkin
Coastal Appeal: Gul Jaisinghani, MND and Coastal Development Permit B3294C, Construct New Motel
APN 101-070-22, 16850 Hwy 101N, Smith River, CA

The scale and placement of this proposed project is inappropriate and fails to avoid geologic hazards, fails to mitigate visual resource impacts, and fails to avoid Environmentally Sensitive Habitat Impacts - all in conflict with the Coastal Act and Del Norte County Local Coastal Plan (LCP).

Geologic Hazards

The project would place a three story motel only eight feet from the edge of the bluff, and in jeopardy of failure from bluff retreat, ongoing observable and predictable erosive forces at this site. The placement of the hotel is based on LACO geological report 2014, which is apparently inaccurate and misleading, as substantiated by on site Coastal Geological evaluation (Coastal letter dated July 1, 2015 as submitted to the record), and other professional site specific geological report by Ferrero Geologic 2/8/95 (as submitted to the record July 1, 2015) as well as previous significant structural support failure at this very location (staff report CUP#RVP9502C).
The project also fails to incorporate best available scientific information with regard to geologic hazards from both a Cascadia Subduction event and sea level rise from climate change. Thus the proposed placement of the structure fails to provide a margin of safety with regard to geologic hazards and sea level rise for a 50 year time scale or 100 year time scale, and is therefore inconsistent with Del Norte LCP and the Coastal Act.
http://www.yaleclimateconnections.org/2012/07/cascadia-subduction-zone-a-key-factor-for-pacific-nw-sea-level-rise/
http://oregonstate.edu/ua/ncs/archives/2012/jul/13-year-cascadia-study-complete-%E2%80%93-and-earthquake-risk-looms-large
"By the year 2060, if we have not had an earthquake, we will have exceeded 85 percent of all the known intervals of earthquake recurrence in 10,000 years," Patton said. "The interval between earthquakes ranges from a few decades to thousands of years. But we already have exceeded about three-fourths of them.
"For the Washington, Oregon, and California coasts north of Cape Mendocino, sea levels by 2030 are projected to be about 1.5 inches lower to nine inches higher than 2000 levels; about one inch lower to about 19 inches higher by 2050; and four inches to more than 4.5 feet higher by 2100. On the one hand, land uplift and gravitational and deformational effects reduce the threat of rising seas off Washington and Oregon. But that rising land is likely brought about because "interseismic strain is building in the Cascadia Subduction Zone. A great earthquake (magnitude larger than eight) ... would cause some coastal areas to immediately subside and relative sea level to suddenly rise. If this occurs, relative sea level could rise an additional meter or more over projected levels.
Scientists say the last major earthquake along the Cascadia Subduction Zone occurred in 1700, probably along 620 or more miles of the zone. That quake measured between magnitude 8.7 and 9.2 and triggered a tsunami that crossed the Pacific Ocean and hit a surprised Japan, where no earthquake had been felt.

Computer simulations of the quake in 1700 show the sea floor and adjacent land along the coast of the Pacific Northwest falling by more than six feet."
https://www.youtube.com/watch?v=71l9lzLsBRc
https://www.youtube.com/watch?v=RaD3ax2j3Ks
LCP Policies for Geologic Hazards (pg 230)
P-1. Any Development proposed adjacent to coastline erosion areas shall be preceded by:
-an assessment of the rates of coastal retreat, in the case of bluffs, a detailed examination of underlying geology by a registered geologist or engineering geologist, and
-an analysis of the potential for tsunami run-up
Coastal Act 30253 New Development shall:

1. *Minimize risks to life and property in areas of high geologic, flood and fire hazard.*

2. *Assure stability and structural integrity, and neither create nor contribute significantly to erosion, geologic instability, or destruction of the site or surrounding area or in any way require the construction of protective devices that would substantially alter natural landforms along bluffs and cliffs.*

The LACO report is flawed and misleading, failing to report previous structural failure at this site, observable erosive site conditions, and failing to address the underlying vulnerable substrata. The LACO report also fails to apply setbacks to address relevant bluff retreat studies, provide building designs that address catastrophic failure from Cascadian earthquakes and tsunami run-up. The LACO report misleads the public by misapplying beach accretion rates rather than bluff retreat studies.

Visual Resources
Within Del Norte LCP, on page 240, Hwy 101 north of Indian Road to Oregon border is recognized as an important View Corridor. Indeed, these views are the first scenic ocean views of our County. And the ocean views that adjacent White Rock development enjoy are important to such a popular visitor destination and recreational beach site. Blocking or significantly degrading such views contradicts Coastal Act Policies 30251 and 30253- #5 *New Development shall where appropriate, protect special communities and neighborhoods which, because of their unique characteristics, are popular visitor destination points for recreational use. (Cited under Del Norte LCP visual resource policy, page 257).*

ESHA Impacts (bluffs and sea cliffs north of Smith River – LCP page 49 and page 67,68- and LCP ESHA policy pages 57,58)
Bluffs and sea cliffs north of Smith River are identified as ESHA in LCP pages 49, 67, 68.
LCP ESHA policy, page 58, #6: *Environmentally sensitive habitat areas shall be protected against any significant disruption of habitat values, and only uses dependent on such resources shall be allowed within such areas. Development adjacent to environmentally sensitive habitat areas shall be sited and designed to prevent impacts which would significantly degrade such areas and shall be compatible with the continuance of such habitat areas.*

The proposed development has failed to provide a safe setback from the ESHA beach cliff so as to provide space for ESHA bluff retreat, thus failing to prevent development from intruding into the retreating ESHA bluff within the economic life of the project. Motels are not an allowable use within the sea cliff ESHA.

Thank you, Eileen Cooper,
Vice president FODN on behalf of the board. 707-465-8904, upsprout@yahoo.com

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SECTION V. Certification

The information and facts stated above are correct to the best of my/our knowledge.

Eileen Cooper

vice president Friends of Del Norte, on behalf of the board, 707-465-8904

Signature of Appellant(s) or Authorized Agent

Date: July 26, 2015

Note: If signed by agent, appellant(s) must also sign below.

Section VI. Agent Authorization

I/We hereby Eileen Cooper
authorize
to act as my/our representative and to bind me/us in all matters concerning this appeal.

Eileen Cooper

Signature of Appellant(s)

vice president Friends of Del Norte

Date: July 26, 2015