

ROSEMARY QUARRY
MUP P-87-021RPL
QUARTERLY MONITORING REPORT
July-September 2010

To the Dept of Planning and Land Use,

This report summarizes the dust, noise, and vibration monitoring that has taken place at the quarry in July-September 2010. All results are within permit limitations.

DUST

Dust emissions are regulated by MUP P-87-021RPL conditions D.7, D.8, and D.13 (attachment A). Emissions sources are monitored by a visual determination of opacity. MUP conditions limit visible emissions from transfer points and unpaved haul roads to 20 percent opacity.

Granite Construction Company understands the sensitive nature of dust emissions and worked with members of the surrounding community and developed a long term monitoring plan that has been acceptable to the County and the people that live near the quarry. This long term monitoring plan has been submitted to the County for approval. Until that time dust emissions are monitored as follows;

1. Dust emissions are monitored according to EPA Reference Method 9 by a qualified independent observer.
2. Opacity observations are randomly conducted by an independent observer once a month or within 10 days of a change in equipment used on site.
3. Air Monitoring Stations (4), BGI PQ100 Samplers ran by Tracer ES&T

The third quarter 2010 independent air monitoring report from SCS Tracer has been completed and has been posted on Rosemary's Quarry website at www.rosemarysmountainquarry.com. A hard copy of this report is also being provided with this submittal.

Observations

Date of Observation	Maximum Allowable Opacity (%)	Maximum Observed Opacity (%)	MUP Cond.	Location of Maximum Observation	Emission Source	Name of Observer
7/29/10	20	5	D7	Quarry Boundary	Quarry Operations	Paul Schafer, Tracer ES&T

8/11/10	20	10	D7	Quarry Boundary	Quarry Operations	Paul Schafer, Tracer ES&T
9/17/10	20	0	D7	Quarry Boundary	Quarry Operations	Paul Schafer, Tracer ES&T

Method 9 opacity observation forms can be found in Attachment B. CARB VEE certifications can be found in attachment C.

NOISE

Noise levels are measured with a Type I Sound Level Meter (SLM) that complies with American National Standards Institute specifications for sound level meters (ANSI S1.4). Noise monitoring is conducted by an independent acoustical engineer as required in MUP condition D.39. The latest independent noise monitoring report is included as Attachment G.

VIBRATION

The blasting plan (Attachment D) requires the operator to monitor ground vibrations and overpressures for each blast with an approved seismograph. Granite must notify the appropriate authorities if ground vibrations at the nearest structure (excluding the Pankey residence) exceed 1.25 inches per second. Peak overpressures are not to exceed 115dBp at any off site structure (excluding the Pankey residence).

A velocity seismograph that adheres to the performance specifications for blasting seismographs adopted by the International Society of Explosives Engineers is used at all times to monitor ground vibration and overpressure. Since the MUP and County Regulatory Ordinances do not specify ground vibration limits, Granite Construction Company defers to the maximum allowable ground vibration limits established by the U.S. Office of Surface Mining and Reclamation Enforcement (OSMRE) (see below). Ground vibrations are measured as the peak particle velocity (PPV) and recorded in three mutually perpendicular directions. The measured PPV shall not exceed the maximum allowable limits in any direction. OSMRE limits maximum allowable ground vibrations as follows;

Distance of Structure from Blasting Site (feet)	Maximum Allowable PPV (inches/second)
0 to 300	1.25
301 to 5,000	1.00
5,001 and beyond	0.75

Observations

Three portable seismographs monitor each blast. The seismographs are operated by a licensed blasting contractor. All units are located within 1,900 feet of each blast (see vibration map, Attachment F). Ground vibrations with a PPV less than 0.05 in/sec are too small to register on the seismograph. Seismograph reports for blasts that took place in 3rd Qtr 2010 are included as attachment E.

Please feel free to call me if there are any questions.

Sincerely,

Gary Nolan
Senior Project Manger
Granite Construction Company
(760) 578-6654

Attachment A

(MUP P-87-021RPL sections C and D)

REC'D OCT 31 2002

COUNTY OF SAN DIEGO
BOARD OF SUPERVISORS
WEDNESDAY, OCTOBER 9, 2002

MINUTE ORDER NO. 1

SUBJECT: NOTICED PUBLIC HEARING:
PALOMAR AGGREGATES, INC., MINING AND PROCESSING
FACILITY THYME'S MOUNTAIN I ; MAJOR USE PERMIT P87-
021RPL² AND RECLAMATION PLAN RP 87-001RPL², FALLBROOK
COMMUNITY PLANNING AREA (DISTRICT: 5)

OVERVIEW:

On March 5, 1997 (1) the Board of Supervisors approved Major Use Permit P87-021 and Reclamation Plan RP87-001 authorizing the operation of a mining and processing facility. The County prepared an Environmental Impact Report (EIR) pursuant to the California Environmental Quality Act (CEQA) (Public Resources Code Section 21000 and following) and the State CEQA Guidelines (CEQA Guidelines) (14 California Code of Regulations Section 15000 and following) for this project finding that all significant environmental impacts would be mitigated below a level of significance. This project approval was challenged, and pursuant to court order, the previously approved Major Use Permit and Reclamation Plan were rescinded. The County has prepared an Addendum to the EIR in order to comply with the court order regarding this project.

The project site occupies 96.4 acres on the north side of State Route 76 (SR 76), approximately 1.25 miles east of Interstate 15. The proposed rock quarry and processing plants for concrete and asphalt will occupy approximately 36 acres of the site. Mining of an estimated 22 million tons will take place primarily on the east-facing slopes of a physical feature known as Rosemary's Mountain over a period of approximately 20 years. The project will also require realignment and widening of SR 76 from the project site west to Interstate 15. A Project Study Report and environmental analysis through CalTRANS will be required to determine the appropriate alignment. The project cannot proceed as proposed without this realignment and widening of SR 76.

The Reclamation Plan proposes a continual reclamation process for the mining face using rock sculpting, planting through the application of soil and a hydroseed mix, rock capping, and installation of a wire mesh for protection against rockfall. The Reclamation Plan proposes that the lower portion of the site be used as a water storage reservoir at the completion of mining activities.

FISCAL IMPACT:
NA

RECOMMENDATION:
DEPARTMENT OF PLANNING AND LAND USE:
That the Board of Supervisors take the following actions:

1. Certify that the Addendum to the EIR for the Palomar Aggregates Quarry project has been completed in compliance with CEQA and the California Court of Appeal Fourth Appellate District, Division One decision dated December 21, 1999 (San Diego Superior Court Case Number 709480). The EIR and Addendum are on file in the Department of Planning and Land Use as Log No. 87-2-13.

2. Certify that the EIR, the Addendum thereto, all current and previous staff reports and other documentation have been presented to this Board, and the board has reviewed and considered the information and analysis contained in these documents.
3. Adopt the Findings Concerning Mitigation of Significant Effects, prepared pursuant to Section 15091 of the State CEQA Guidelines attached to this Board Letter as Attachment D-1.
4. Certify that the EIR and Addendum prepared by the County in response to the Court of Appeal decision dated December 22, 1999 (San Diego Superior Court Case Number 709480) reflect the independent judgment of the County of San Diego.
5. Adopt the Explanation of Decision Not to Prepare a Subsequent EIR Pursuant to CEQA Guidelines Section 15162 and 15164, which was prepared pursuant to Section 15164 of the CEQA Guidelines which is part of the Addendum on EIR with the Department of Planning and Land Use as Leg No. 87-2-13 (attached to this Board Letter as Attachment D-2).
6. Grant Major Use Permit PB7-021RPL², which makes the appropriate findings and includes those requirements and conditions necessary to ensure that the project is implemented in a manner consistent with The Zoning Ordinance and State law.
7. Approve Reclamation Plan RP 87-001RPL², which makes the appropriate findings and includes those requirements and conditions necessary to ensure that the project is implemented in a manner consistent with The Zoning Ordinance and State law.

ACTION:

ON MOTION of Supervisor Horn, seconded by Supervisor Jacob, the Board of Supervisors took action as recommended.

AYES: Cox, Jacob, Slater, Roberts, Horn

State of California)
County of San Diego)

I hereby certify that the foregoing is a full, true and correct copy of the Original entered in the Minutes of the Board of Supervisors.

THOMAS J. PASTUSZKA
Clerk of the Board of Supervisors

By Harold R. Randolph
Harold R. Randolph, Deputy



October 8, 2002

FORM OF DECISION
MAJOR USE PERMIT P87-021 RPL²

PERMITTEE: Palomar Aggregates, Inc.

IS HEREBY GRANTED, a Major Use Permit per revised plat plan dated September 12, 1998, pursuant to Section 2705 of The Zoning Ordinance, for a mining and processing facility for a period of 20 years.

DESCRIPTION OF PROJECT

1. Mining would take place over a period of approximately 20 years. Mobile uses include portable jaw crushers, track mounted electric power shovels, metal storage containers, small offices, and equipment storage yards.

The project will occur in three generally defined phases after the initial site preparation. The initial site preparation will involve the relocation and widening of Highway 76 and excavation to provide space for the processing facilities. This part of the operation will also include removal of overburden to be utilized in the construction of Highway 76 and utilization of the necessary portable equipment to process material for the road. The first phase of the quarry operation will include excavating the initial cut of the Mountain beginning at 215 feet above mean sea level down to approximately 325 feet above mean sea level. Once the final rock face is to be blasted, the reclamation will begin and continue as each increment is completed. The second phase will continue mining down to approximately 340 feet above mean sea level, near the elevation of the highway. The third phase will involve excavation below the surface of the road to approximately 200 feet above mean sea level.

2. Mining operations shall be contained within the 35-acre portion of the 66-acre site shown on the plat plan.
3. This permit authorizes the removal of an estimated 22,000,000 tons of aggregate. The use permit includes: excavation, processing, and distribution of decomposed granite and crushed rock, concrete and asphalt batch plant products; import of sand, cement products, soil, and amendments; truck and equipment maintenance; and office and storage areas.

October 8, 2002

- c. A complete watering system including the location, size, and type of all backflow prevention devices, pressure and non-pressure water lines, valves, and sprinkler heads in those areas requiring permanent irrigation system. For areas of native or naturalizing plant material, the Landscape Plan shall show a method of irrigation adequate to assure establishment and growth of plants through two growing seasons.

- d. Additionally, the following items shall be addressed as part of the Landscape Plans:

The landscaping on the 30 foot high berm shall include at a minimum the following tree container size by percentage: 24 inch box (25 percent); 18 gallon (25 percent); and 5 gallon (50 percent). Shrub container sizes shall be according to the following proportions: 5 gallon (20 percent); and 1 gallon (80 percent). The final Landscape Plan shall also provide for specific performance standards to be assessed by a five-year monitoring and maintenance program to assure that the goals of the Landscape Plan are met. A survival rate of 80 percent shall be maintained for all container stock during the life of the five-year monitoring period. Continued vegetative cover milestones of 40 percent (after 1 year), 60 percent (after year 3), and 100 percent (after year 5) shall be met. Remedial measures such as replanting or modifying irrigation shall be conducted annually as necessary to meet performance standards. Monitoring and maintenance shall continue until the conditions specified at the end of year five are met.

- c. Prior to any occupancy or use of the asphalt and batch plants, and prior to excavation of materials for uses other than site preparation and improvement of SR 78 between I-15 and the eastern end of the project site, the applicant shall:
1. Submit evidence to the Department of Planning and Land Use that Conditions B.2. through B.13. have been accomplished.
 2. Allow transfer of the property subject to Major Use Permit P87-021RPL¹ into Zone A of the San Diego County Street Lighting District without notice or hearing, and pay the cost to process such transfer.
 3. The color of structures, buildings, and processing equipment shall blend with the color of the graded slopes and pads. Flat colors, with low reflectivity, shall be used, excluding white and orange. (DPLU)

October 9, 2002

4. At a minimum of six months before operation of the asphalt and concrete batch plants, construct and install landscaping for an earthen berm 30 feet in height to screen views of the processing plant from Pala Road/SR 78 in the location shown on the revised plot plan and in accordance with the approved Landscape Plan. The berm shall be measured from pad elevations of the batch plant.
5. Submit to the Director of Planning and Land Use a statement from the project California licensed landscape architect that all landscaping has been installed as shown on the approved landscape planting and irrigation plans.
6. A sedimentation basin capable of handling a minimum of 6.3 cfs shall be designed and constructed to the satisfaction of the San Diego County Water Authority (SDCWA), the Department of Public Works, and the Regional Water Quality Control Board (RWQCB) prior to commencement of quarry operations. It shall be at least two feet in depth with an overall depth of four feet, and be lined with concrete. Design of the sedimentation pond shall include an emergency spillway to divert drainage during heavy rainfall beneath SR 78 to the San Luis Rey River.
7. Construct necessary surface and subsurface drainage systems for the processing area.
8. Obtain all required RWQCB permits to operate and construct.
9. Install to the satisfaction of the Department of Health Services, a standard grease trap at the sedimentation basin to remove contaminants.
10. Improve all parking areas, driveways, and haul roads within the processing area as shown on the approved plot plan with asphaltic concrete or PCC concrete, and delineate parking spaces. (DPLU)
11. Provide for approval, an estimate of the amount required to maintain the wire mesh annually and establish a permanent fund for wire mesh maintenance.
12. Screens and secondary crushers shall be fully enclosed except for the openings necessary to accommodate the conveyor belts. Also, the screens and crushing units shall have resilient materials, most likely rubber pads, installed and maintained on the impact surface areas.
13. The material used for enclosing the secondary crushers and screens shall have a minimum surface density of approximately 2.0 lb/ft².

October 8, 2002

14. Sound absorbing materials on the inside surfaces of the enclosures shall be installed and maintained throughout the life of the permit.
15. The applicant shall demonstrate by field measurements and submit a letter to the Department of Planning and Land Use that the power shovel/excavator does not exceed a maximum noise level of 75 dB at 50 feet. The applicant shall also demonstrate that the drill does not exceed 79 dB at 100 feet. Or, the cumulative noise level associated with the excavation equipment including the portable primary crusher shall not exceed a one-hour average noise level of 81 dB at 100 feet.
16. The permittee shall demonstrate by photographic record and letter to the Department of Planning and Land Use that all moving parts on batch plant facilities are enclosed in boathouses.
17. The enclosures shall be designed so that the screens and cone crushers, as well as their support structures, shall not contact the enclosure walls or ceilings. All wall to wall, wall to roof, wall to floor joints, and holes cut for control and power lines shall be sealed.
18. Enclosure doors shall be metal with an insulating foam core. Doorframes shall have gaskets and seals to provide a tight seal.
19. Noise testing shall be conducted for the proposed equipment. The design noise levels shall be obtained for the individual pieces of equipment as shown in Table B in the draft Environmental Impact Report. For excavation/drilling equipment, the individual design noise levels shall be met; or the cumulative noise level associated with the excavation equipment including the portable primary crusher shall not exceed a one-hour noise level of 81 dB Leq at 100 feet.

Alternatively, it may be possible that even though an individual piece of equipment may exceed the noise design criteria, that with all of the equipment operating the cumulative on-site operation noise level would still meet the County's Noise Ordinance limits at the permit boundary. This would result if greater than anticipated noise attenuation is achieved due to intervening topography and structures, or other individual pieces of equipment are quieter than the design criteria. Therefore, if all the equipment is operating, and the cumulative noise level with equipment that does not meet the individual design criteria would still not exceed the County's noise standard at the permit boundary, then the nonconforming individual piece(s) of equipment would not be required to meet the specific design noise levels in Table B in the Environmental Impact Report. A

October 9, 2002

report must be prepared and submitted which demonstrates this condition is met to the satisfaction of the Department of Planning and Land Use.

20. Excavation of the first phase area, as shown on Figure 5 of the Environmental Impact Report, beginning at 815 feet above mean sea level down to approximately 825 feet above mean sea level shall be completed within 6 months.
21. Riparian plantings shall be completed along the SR 78 slope bank and adjacent streambed. Revegetation shall include 12 tree and shrub species and a hydroseed mix of 5 species that would be planted at various elevations within the channel. The riparian planting along SR 78 will mitigate for impacts from the realignment of SR 78 to the individual riparian trees (Figure 81 of the draft EIR). The terms of the replacement measure shall be negotiated through consultation with the California Department of Fish and Game and the Army Corps of Engineers, and subject to a Federal 404 Permit of the Clean Water Act and, possibly, State "1801" or "1803" Streambed Alteration Agreements.
22. Prior to plant operation, standard roadside warning signs indicating potential rockfall area to the approaching motorist shall be installed. The project civil engineer for the Highway 78 realignment shall incorporate these public safety measures on a plan to be submitted for review and recommendation by the County Department of Public Works, and for approval by CalTrans.
23. Scarify the pavement on the old SR 78 road alignment as required by CalTrans.
24. Prior to operation of the processing facilities, revegetation for Southern willow scrub shall be completed in substantial conformance with the Palomar Aggregates Revegetation Plan (Appendix G of the draft EIR) approved and adopted pursuant to Condition A.14. herein.
25. Prior to any use or reliance on the Major Use Permit, the applicant shall enter into a Secured Agreement with the County of San Diego to ensure success of the revegetation plan.
26. Prior to any use or reliance on the Major Use Permit, the loss of 1.3 acres of oak woodland shall be mitigated with off-site mitigation at a ratio of 5.7:1 by dedicating a hillside south of the San Luis Rey River that supports oak woodland to open space (7.4 acres) (Figure 30 of the draft EIR). The woodland outside the mining area (1.7 acres) but within the Major Use Permit shall also be placed in open space.

October 9, 2002

27. Prior to use or reliance on the Major Use Permit, most of the chaparral at the quarry site (5.1 acres) not impacted by the mining shall be dedicated as open space (Figure 31 of the draft EIR).
28. Prior to any use or reliance on the Major Use Permit, 64.8 acres of sage scrub (Table 4 of the draft EIR) shall be preserved both on- and off-site providing approximately a 2:1 mitigation ratio for this habitat. Approximately 28.8 acres have been identified on the project site, adjacent to the site and south of the San Luis Rey River (Figures 25, 28, and 29 of the draft EIR). The yet to be identified 24.8 acres required to mitigate impacts to the California gnatcatcher also shall mitigate potential impacts to the arroyo southwestern toad. That is, the property shall be contiguous to potential river habitat of the arroyo southwestern toad, accessible to the arroyo toad and acceptable to the United States Fish and Wildlife Service (USFWS) and the California Department of Fish and Game (CDFG). Two methods suggested by CDFG staff that may enhance connectivity between the river habitat to the yet to be identified 24.8 acre sage scrub mitigation parcel, include minor grading of riverbanks and conversion of adjacent existing agricultural land to native habitat. The property should be located in the project vicinity and shall be maintained in perpetuity as open-space through a transfer fee title, the applicant's voluntary dedication of a conservation easement, or open space easement dedication to an organization acceptable to the USFWS and CDFG. Final approval of the location of the mitigation area will be by the Department of Planning and Land Use, the USFWS and the CDFG.
29. Prior to construction, obtain required building permits for all fencing, structures, or office trailer approved by this permit.
30. Prior to operation of the batch plants, the applicant shall demonstrate that the intensity of the lights, as well as the number for safety purposes, have been kept to a minimum.
31. Provide evidence to the satisfaction of the Director of Planning and Land Use that all appropriate permits have been obtained from the Regional Water Quality Control Board relating to industrial discharges associated with this permit.
32. Submit evidence to the Department of Planning and Land Use that Conditions C.2. through C.32. have been accomplished.

October 8, 2002

D. Upon certification by the Director of Planning and Land use for occupancy or establishment of use allowed by this Major Use Permit, the following conditions shall apply:

1. The perimeter fencing and fence along the north side of SR 76 shall be maintained in good repair throughout the period of operation.
2. The hours of operation shall be limited to between 7:00 a.m. and 6:00 p.m., Monday through Friday, except for Saturdays between 10:00 a.m. and 12:00 p.m. when blasting will occur and in case of an emergency need as identified by a public agency.
3. Every three months for the first year of operation and every six months thereafter, noise testing shall be conducted along the permit boundary to ensure design noise levels are maintained during on-going operations. The noise testing protocol shall be conducted in accordance with the County's Noise Ordinance and performed by a County certified acoustical consultant. Also, this condition specifies that the 60 Community Noise Equivalent Level (CNEL) exterior noise level shall not be exceeded by the project as measured at any residential building site or other noise sensitive location which may be developed in the future. The results of the noise tests shall be submitted in a written report to the County Department of Planning and Land Use within one week after conducting the noise tests. If the design noise levels are not met, the quarry operator will have 60 days to correct the problem. If after 60 days the problem has not been corrected, the quarry operator will only be allowed to operate the remaining equipment which will meet the design noise levels. The quarry operator shall fund the noise testing and County's staff time to review the results of the noise tests.
4. No blasting shall take place when wind velocity equals or exceeds 15 miles per hour. A licensed blasting contractor shall determine wind speed through the use of an recording anemometer located a minimum of ten feet above ground level near the on-site project office.
5. Dust emissions from all crushing and screening operations shall be controlled by venting to a fabric filter system.
6. Stockpiles of crushed rock shall be kept moist or shall be watered before loading.
7. Visible emissions from transfer points shall not exceed 20 percent opacity at any time. This is a Statewide requirement enforced and monitored by the Air Pollution Control District (APCD).

October 9, 2002

8. Unpaved haul roads will be chemically stabilized to minimize dust emissions to below the requirements of APCD Rule 50 (20 percent opacity). In lieu of chemical stabilization, haul roads shall be watered at least every two hours and shall be wet swept at least twice a day.
9. Initial clearing of areas to be mined, including removal and stockpiling of topsoil, shall be accompanied by surface watering to control dust generation.
10. The quarry area traversed by the power shovel shall be watered two times a day (once prior to commencing work in the morning and once at mid-day).
11. Maximum speed of all vehicles on unpaved roads shall be ten miles per hour.
12. All crushing, screening, and batching equipment used at the site must receive a permit to operate from the APCD, which would regulate the operation and maintenance of such equipment to control dust generation.
13. Other dust control methods, as necessary, must be applied to any dust-producing condition which may develop at the borrow pit, which would result in a nuisance from this operation (APCD Rule 51).
14. Transfer of cement shall be only by pneumatic conveying. There shall be no leaks of cement dust to the atmosphere anywhere within the transfer system. (APCD)
15. The hot-mix asphalt plant shall have a fabric filter, (baghouse) system.
16. Covers for hot-oil storage tanks must be kept in place unless the tanks are being filled. The condenser system for fugitive blue-smoke emissions shall be fully operational.
17. The temperature of batched hot-mix asphalt shall not exceed 330 degrees Fahrenheit.
18. Loading bins shall be enclosed.
19. Water sprays shall be used during the loading/unloading operations for aggregate and stockpile materials.

20. Quarry operations shall shut down when wind speed exceeds 20 miles per hour as determined by an on-site anemometer.
21. Only unleaded gasoline and diesel fuel containing less than 0.5 percent sulphur shall be used in the on-site equipment.
22. The sedimentation basin shall be maintained. Twice a year it shall be cleaned out and the resulting sediment recycled into the concrete and asphalt production process to the extent possible. Silt material shall be cleared from the basin following each storm event.
23. The concrete lined pond located near the northern portion of the project site shall be monitored after blasting each week for potential leakage and drained as the mining operation is advanced to within 400 feet of the pond, unless advised otherwise by the inspecting blasting engineer. Records and recommendations of such inspections shall be maintained at the mining site and a copy provided to the County Department of Planning and Land Use.
24. All runoff from the mined area shall pass through the sedimentation basin and grease trap.
25. As a condition of operation, mining shall be conducted from the top down and from south to north or north to south along the face being worked. This working face shall be a maximum of approximately 33 feet in height with a flat working bench below it. The flat working bench shall be 66 feet wide whenever possible. This will result in an interim benched slope configuration as mining proceeds downward at 33-foot intervals. A Registered Engineering Geologist (REG) or Geotechnical Engineer (GE) shall map the exposed rock surface on a weekly basis. Inspection and mapping of the mining face may be more frequent as needed, depending on the field conditions. Each 33 foot vertical by 66 foot horizontal bench may only be removed following on-site inspection and in accordance with written recommendations of the REG or GE. No finished slope greater than 2:1 (horizontal to vertical) shall be established except in compliance with the recommendation of the REG or GE. The engineer or geologist shall record all inspections on a form satisfactory to the Department of Planning and Land Use and send a copy to the Codes Enforcement Division within one week of any inspection. The review of the reports associated with this condition will be considered a cost chargeable to the annual inspection deposit.
26. As part of the on-going Reclamation Plan, the following mitigation shall be implemented: as the mining reaches the surface area which is to be the

October 8, 2002

final reclaimed surface, the method of blasting hole placement and gradient will change. The final blasting pattern of this 33 foot high mining face shall consist of a random pattern of drill holes at variable depths and angles which would result in sculpting or irregular slopes surfaces with ledges of 2 to 12 foot wide, no greater than 88 feet long with no greater than 120 feet of vertical separation. This, in effect, will be a "sculpted" rock surface with ledges, nooks, and crannies designed to trap and hold soil (see Figure 8 of the Final Environmental Impact Report [FEIR]). The ledges shall also be angled towards the rock face so that 6-12 inches of soil can be installed. The resulting mining face shall have irregularly shaped ledges at varying height locations. After the sculpting blast but prior to the beginning of the reclamation process, the resulting mining face shall be inspected by a design professional (i.e., landscape architect) to determine that the resulting mining face is natural looking consistent with the intent of the FEIR. The design professional shall then submit a letter to the Department of Planning and Land Use, with photographs, that the mining face does meet the intent of the FEIR. The Department of Planning and Land Use shall have final approval of the design of the resultant rock face.

27. Prior to blasting of the next working bench, the REG or GE shall decide if the final "sculpted" rock face is safe. If it is determined to be safe, the 33 foot freshly exposed face will be draped with anchored wire mesh prior to blasting of the next level as recommended by Cal/OSHA and the Mining Safety and Health Administration. Benching and/or rock anchors will be required where unfavorable stability conditions are encountered. The engineer or geologist shall record all inspections on a form satisfactory to the Department of Planning and Land Use and send a copy to the Code Enforcement Division within one week of any inspection. The wire mesh will be used and maintained as long as any mining activity is conducted at the base of the out face. The applicant will be responsible for maintenance during the time the mining project is in existence. Any required subsequent maintenance would be the responsibility of the then current land user using a perpetual fund established by the applicant. If the area is used for a reservoir, as proposed, the mesh would no longer be required and could be removed as part of reclamation.
28. After the completion of rock sculpting and the hanging of mesh on each 240 foot horizontal section of the final face, and after a sufficient distance of 240 feet is obtained from the adjacent working area, Permason, a non-toxic rock stain consisting of iron salts, magnesium salts, and other trace elements shall be applied by a manufacturer trained professional. Additional staining may be required to be modified on completed sections

of the final face in both vertical and horizontal directions to assure a natural looking face.

29. Soil shall be placed in the nooks and crannies and on the ledges, and hydroseeded. This method allows for the mining face to be in constant reclamation. Table 1 of the draft Environmental Impact Report shows the hydroseed mix that shall be applied for reclamation of the mining face after soil is located to the ledges, nooks, and crannies.
30. As part of the on-going reclamation, an engineering geologist and a landscape architect shall determine the project's conformance with rock sculpting and determine the project's conformance with structural safety mitigation measures as identified in the Environmental Impact Report after the completion of the first section of final face consisting of 240 horizontal feet by 33 vertical feet. This inspection of the final face will continue every 240 feet along the first 2 working benches, and after it is determined the rock-sculpting program is in conformance with the Environmental Impact Report mitigation measures, additional inspections will occur on an annual basis in conjunction with the annual engineering report. If it is determined that sculpting and on-going reclamation is not in conformance with the Environmental Impact Report, changes will be required in the blasting, excavation design, and sequence of other reclamation components to achieve mitigation.
31. As part of the on-going reclamation, an oblique aerial photograph shall be taken on an annual basis and submitted to the Department of Planning and Land Use in conjunction with the annual engineering report to determine conformance with visual mitigation measures.
32. If after the first rainy season the hydroseeding has not germinated, a temporary irrigation system shall be installed to assist the vegetative growth on the reclaimed face. The system shall be an overhead spray and shall be attached to the wire mesh that will be draped over the rock face.
33. As part of the on-going reclamation, the cut slope along the eastern project boundary shall be planted with native vegetation, including a hydroseed mixture of native plants as the mining proceeds.
34. The heavy gauge wire mesh canopy dropped over the exposed rock face shall be inspected and maintained to ensure adequate safety protection is provided. The maintenance shall be the responsibility of the mining operation and permittee for duration of the Major Use Permit, and thereafter the then current landowner.

35. A monthly rockfall potential inspection shall be performed and documented by a REG, and appropriate mitigation measures applied, if necessary. A copy of the inspection report shall be kept at the mining site and a copy shall be provided to the County Department of Planning and Land Use.
36. All light fixtures shall be designed and adjusted to reflect light downward, away from any road or street, and away from any adjoining premises, and shall otherwise conform to Section 6324 of The Zoning Ordinance.
37. All on-site lighting shall consist of LPS lamps, be fully shielded, and conform with the County Light Pollution Ordinance No. 7165.
38. Outdoor lights other than those necessary for security shall be turned off by 10:00 p.m.
39. Noise measurements shall be taken twice yearly (January and June) by a qualified acoustical consultant near the western boundaries of the project site and at its northern boundary. These shall be taken for a minimum period of 30 minutes during normal mining and processing operating hours while most on-site equipment is in operation, including drilling. A report of such measurement shall be provided to the Code Enforcement Officer of the County Department of Planning and Land Use (Director). If new residential development pursuant to the adjacent Robert Pantoy Specific Planning Area or the "Hodge Brothers Property" east of Rice Canyon Road, has been constructed, or is under construction, and noise levels from on-site activities exceed an Leq of 60 dB(A), a supplemental noise report shall be prepared and mitigation recommended. Requirements of the County for implementation of additional noise attenuation measures shall be adhered to for continued mining and processing operations until the 60 dB(A) standard is met. Additional or more frequent noise monitoring may also be required by the County.
40. Blasting operations shall also be monitored on an annual basis and shall comply with the 75 dB(A) noise level (corrected to the A-weighted noise scale) at the property line. Blasting operations shall be monitored and submitted in a report to the County Department of Planning and Land Use on an annual basis by July 1 of each year.
41. The area to be blasted shall be cleared of all personnel prior to blasting at a distance to be determined by the on-site licensed blasting contractor. This requirement will be included on the mining and blasting plan. A copy

of the plan shall be kept at the mining site and a copy shall be provided to the County Department of Planning and Land Use.

42. The operator of the Major Use Permit shall arrange for an annual engineering report to be prepared and submitted to the County by a registered civil engineer, no later than July 1 of each year. The annual engineering report shall include, but not be limited to the following information:
- a. A summary of the overall progress and the status of the project.
 - b. A survey to include an update of all the measurements submitted in the initial survey. This information shall be gathered, collated, prepared, stamped, and dated by a licensed land surveyor and shall form part and parcel of the annual engineering report.
 - c. Proper area plans and cross-sections showing the side slopes, depth of excavation, and locations of the excavation.
 - d. The operator shall arrange for annual color aerial photographs of the site (phase of excavation). These photographs shall be usable for viewing stereoscopically. These photographs shall be taken no longer than one month prior to submittal of the annual engineering report and shall be included in the annual report.
 - e. The annual engineering report shall identify any areas that have been excavated contrary to conditions of the permit and shall make the recommendations on how best to remedy such violations. Upon approval of the Director of Planning and Land Use, the operator shall implement any required mitigation measures.
43. During quarry operations, Average Daily Trips (ADT) generated by the proposed project shall not exceed a monthly average of 514 ADT and shall not exceed 1,028 ADT for more than 5 consecutive days. The project proponent (Palomar Aggregates, Inc.) shall keep a daily log of truck and automobile trips and make it available to the Department of Planning and Land Use on an on-call basis.
44. The applicant shall contribute an annual payment to the Fallbrook Unified School District's DeLuz Ecology Center of five cents per each ton of aggregate material removed from the site during each year. The payment shall be increased annually with inflation according to the consumer price index. Documentation of the payment shall be submitted to the Director of Planning and Land Use along with the annual report.

45. The operator shall keep a current copy of the plot plan, Reclamation Plan, Major Use Permit, and all other agency permits relating to this operation. These documents must be conspicuously displayed in the office trailer on-site, and readily available to the inspecting authorities at all times.
46. As an on-going condition of the Major Use Permit, surveys of the vegetation east of the site where vireos were sighted in 1988 (RECON 1988) shall be conducted in early March during every year of the project to determine if the vegetation could support vireos and/or flycatchers. If the vegetation is found to be of inadequate quality for the species, then truck traffic associated with the proposed project will be allowed to proceed during the spring and summer months. If survey results reveal that there is a potential for vireos and/or flycatchers to be using the site, then the following mitigation measure will apply to mitigate potential noise impacts to vireos in the area:
 - No sand or other raw materials may be trucked to the Pelomer Aggregates site from the east between March 15 and September 30, inclusive. To notify project employees of the restricted truck traffic distribution, a sign shall be prepared which states that no truck trips, either importing or exporting material, shall be allowed east of the project site during the vireo and flycatcher nesting season (March 15-September 30). This sign shall be posted annually on March 15 and shall remain posted through September 30. Verification of posting shall be provided to the County Department of Planning and Land Use in the form of an annual letter report to be prepared by a qualified biologist. This mitigation measure may be eliminated if the vireo and flycatcher are no longer considered endangered species by the Federal government or annual surveys indicate no suitable vireo or flycatcher habitat is present.
47. Provide on-site bottled water for employees under written contract with a copy to the Department of Environmental Health. Usage is authorized for the life of the permit or until permanent plumbing is connected to an approved sewage disposal system.
48. Provide chemical toilet(s) of commercial type construction under written contract from a licensed septic tank/chemical toilet contractor with a copy to the Department of Environmental Health. Usage is authorized for the life of the permit or until permanent plumbing is connected to an approved sewage disposal system.

49. If at any time during the mining operation groundwater is encountered and cannot be sealed to the satisfaction of the Director of Planning and Land Use, all mining operations shall be discontinued.
50. Monitoring station to monitor dust, noise, and tremors shall be placed surrounding the property to the satisfaction of the Director of Planning and Land Use. Reports generated by such monitoring stations shall be provided to the Department of Planning and Land Use on a monthly basis with the applicant providing funding for time and materials for such review.
51. As a condition of operation, comply with all mitigation measures as set forth in the Mitigation Monitoring Plan in the EIR.
52. Daily and annual material throughputs (in tons) shall be limited to those quantities which, when used in the following formulas, result in calculated particulate matter (PM10) emissions of less than 100 pounds per day and 30,000 pounds (15 tons) per year.

Daily Material Throughput Calculation:

$$100 > [1.3668] +$$

$$[\text{Aggregate Plant (w/ Quarry) throughput (in tons)} * 0.002717] +$$

$$[\text{Asphalt Plant throughput (in tons)} * 0.0132439] +$$

$$[\text{Concrete Plant throughput (in tons)} * 0.0024701] +$$

$$[\text{Aggregate Shipped (in tons)} * 0.0025518] +$$

$$[\text{Material (sand) Imported (in tons)} * 0.0009011]$$

Annual Material Throughput Calculation:

$$30,000 > [499.6] +$$

$$[\text{Aggregate Plant (w/ Quarry) throughput (in tons)} * 0.0097240] +$$

$$[\text{Asphalt Plant throughput (in tons)} * 0.0132439] +$$

$$[\text{Concrete Plant throughput (in tons)} * 0.0024701] +$$

$$[\text{Aggregate Shipped (in tons)} * 0.0025518] +$$

$$[\text{Material (sand) Imported (in tons)} * 0.0009011]$$

Applicant shall keep a daily log of aggregate plant, asphalt plant and concrete plant throughputs; the amount of aggregate shipped; and the amount of material (sand) imported to the site, to the satisfaction of the Director of Planning and Land Use. The log shall remain at the project site and be made available within twenty-four hours of a written request for such log from the Director of Planning and Land Use. Applicant shall also make available for review, within twenty-four hours of a written request from the Office of County Counsel or District Attorney, all business records

October 9, 2002

that include information regarding quantities of material produced, including, but not limited to, billing records.

This permit limits the removal of aggregate to a total of 22,000,000 tons.

53. Violation of any condition of this permit is grounds for a stop work order to be placed on a portion or all of the operation.

This Major Use Permit and other actions effective hereby shall take effect on October 9, 2002.

- E. This Major Use Permit expires on October 9, 2007 (five years from the date of approval) at 4:00 p.m. (or such longer period as may be approved pursuant to Section 7376 of The Zoning Ordinance) unless construction or use in reliance on this Major Use Permit has commenced prior to said expiration date.

- F. The following shall be the Mitigation Monitoring or Reporting Program for Major Use Permit P87-021 Palomar Aggregate:

Public Resources Code Section 21081.8 requires the County to adopt a Mitigation Monitoring Program for any project that is approved on the basis of a Mitigated Negative Declaration or an Environmental or an Environmental Impact Report for which findings are required under Section 21081(a)(1). The program must be adopted for the changes to a project which the County has adopted, or made a condition of project approval, in order to mitigate or avoid significant effects on the environment. The program must be designed to ensure compliance during project implementation.

The Mitigation Monitoring Program is comprised of all the environmental mitigation measures adopted for the project. The full requirements of the program (such as what is being monitored, method and frequency, who is responsible, and required time-frames) are found within the individual project conditions. These conditions are referenced below by category under the mechanism which will be used to ensure compliance during project implementation.

1. Subsequent Project Permits

Compliance with the following conditions is assured because specified subsequent permits or approvals required for this project will not be approved until conditions have been satisfied:

Conditions A.1 through A.20 and B1 through B.14.

Attachment B

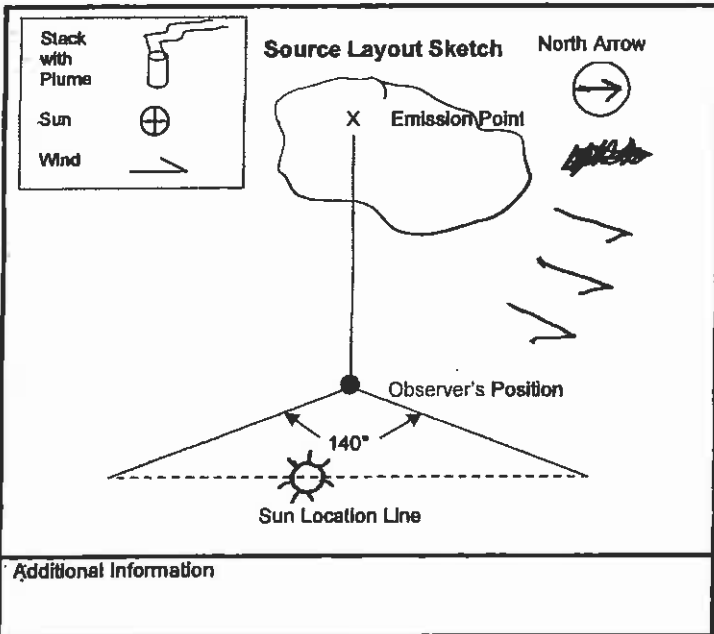
(Method 9 Opacity—Visible Emissions Observations)

VISIBLE EMISSION OBSERVATION FORM

Company Name <i>Granite Construction Co.</i>		
Street Address <i>1.5 miles East of 15 on SR 76</i>		
City <i>Fallbrook</i>	State <i>CA</i>	Zip
Phone <i>(760) 578-6654</i>	Source ID Number <i>NA</i>	
Process Equipment <i>Crusher, Dumptruck, Frontloader</i>	Operating Mode <i>Normal</i>	
Control Equipment <i>Water Truck, water</i>	Operating Mode <i>Normal</i>	
Describe Emission Point <i>Area Source: Variable, very lite</i>		
Height Above Ground Level <i>0-20</i>	Height Relative to Observer Start: <i>NA</i> End: <i>NA</i>	
Distance from Observer Start: <i>NA</i> End: <i>NA</i>	Direction from Observer Start: <i>NA</i> End: <i>NA</i>	
Describe Emissions Start: <i>lite, variable</i> End: <i>lite, variable</i>		
Emission Color Start: <i>brown/white</i> End: <i>brown/white</i>	If Water Droplet Plume Attached <input type="checkbox"/> Detached <input type="checkbox"/>	
Point in plume at which opacity was determined Start: <i>Fence line</i> End: <i>Fence line</i>		
Describe Plume Background Start: <i>Earth</i> End: <i>Earth</i>		
Background Color Start: <i>Br/wh</i> End: <i>Br/wh</i>	Sky Conditions Start: <i>Clear</i> End: <i>Clear</i>	
Wind Speed mph Start: <i>6</i> End:	Wind Direction Start: <i>SW</i> End:	
Ambient Temp Start: <i>88°</i> End: <i>89°</i>	Wet Bulb Temp <i>NA</i>	RH, Percent <i>NA</i>

Observation Date <i>7/29/10</i>		Start Time <i>12:00</i>		End Time <i>12:30</i>	
Sec Min	0	15	30	45	Comments
1	0	0	0	0	
2	0	0	0	0	
3	0	0	0	0	
4	0	0	0	0	
5	0	0	0	0	
6	0	0	0	0	
7	0	0	0	0	
8	0	0	0	0	
9	0	0	5	0	
10	0	0	5	5	
11	0	0	0	0	
12	0	0	0	0	
13	0	0	0	0	
14	0	0	0	0	
15	0	0	0	0	
16	0	0	0	0	
17	0	0	0	0	
18	0	0	0	0	
19	0	0	0	0	
20	0	0	0	0	
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22	0	0	0	0	
23	0	0	0	0	
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25	0	0	0	0	
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28	0	0	5	0	
29	0	0	0	0	
30	0	0	0	0	

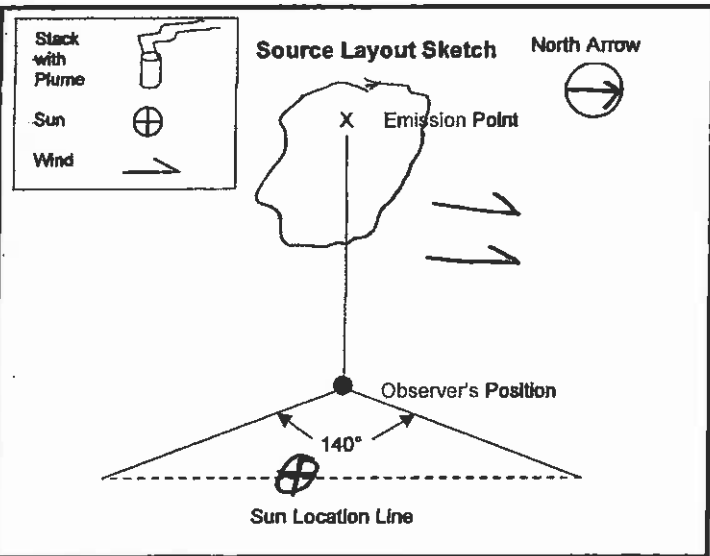
Observers Name (Print) <i>Paul Schafer</i>	
Observers Signature <i>[Signature]</i>	Date <i>7/29/10</i>
Organization <i>SCS Tracer Environmental</i>	
Certified By <i>CARB VEE Program</i>	Date <i>7/27/10</i>
Continued on VEO form Number <i>ID# 22868</i>	



VISIBLE EMISSION OBSERVATION FORM

Company Name <i>Granite Construction Co.</i>		
Street Address <i>1.5 miles east of 15 on SR 76</i>		
City <i>Fallbrook</i>	State <i>CA</i>	Zip
Phone <i>(760) 578-6654</i>	Source ID Number <i>NA</i>	
Process Equipment <i>Conveyor, Crusher, Backhoe</i>	Operating Mode <i>Normal</i>	
Control Equipment <i>Water Trucks, Misters</i>	Operating Mode <i>Normal</i>	
Describe Emission Point <i>Variable, strongest from crusher and conveyor</i>		
Height Above Ground Level <i>0-20'</i>	Height Relative to Observer Start: <i>NA</i> End: <i>NA</i>	
Distance from Observer Start: <i>NA</i> End: <i>NA</i>	Direction from Observer Start: <i>NA</i> End: <i>NA</i>	
Describe Emissions Start: <i>lite, Variable</i> End: <i>lite, Variable</i>		
Emission Color Start: <i>cream/light</i> End: <i>cream</i>	If Water Droplet Plume Attached <input type="checkbox"/> Detached <input type="checkbox"/>	
Point in plume at which opacity was determined Start: <i>Fence line</i> End: <i>Fence line</i>		
Describe Plume Background Start: <i>Earth</i> End: <i>Earth</i>		
Background Color Start: <i>Br/br</i> End: <i>Br/br</i>	Sky Conditions Start: <i>Clear</i> End: <i>Clear</i>	
Wind Speed Start: <i>4-10</i> End: <i>4-10</i>	Wind Direction Start: <i>S</i> End: <i>SSW</i>	
Ambient Temp Start: <i>82</i> End: <i>82</i>	Wet Bulb Temp <i>NA</i>	RH, Percent <i>NA</i>



Observation Date <i>8/11/2010</i>		Start Time <i>1:15</i>		End Time <i>1:45</i>	Comments
Sec	Min	0	15	30	
1	5	5	5	5	
2	0	5	5	0	
3	0	0	0	5	
4	10	10	5	0	
5	5	0	0	0	
6	0	0	0	0	
7	0	0	0	0	
8	0	5	0	0	
9	0	0	0	0	
10	0	0	0	0	
11	0	0	0	0	
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14	0	0	0	0	
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16	0	0	0	0	
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19	5	0	0	0	
20	5	0	5	5	
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22	0	5	0	5	
23	10	5	5	0	
24	0	5	0	5	
25	5	10	0	0	
26	5	0	5	0	
27	5	10	5	10	
28	5	5	5	0	
29	0	5	0	5	
30	5	0	5	0	



Observers Name (Print) <i>Paul Schafer</i>	
Observers Signature <i>[Signature]</i>	Date <i>8/11/2010</i>
Organization <i>SCS Tracer Environmental</i>	
Certified By <i>CARB VEE Program</i>	Date <i>8/27/2010</i>
Continued on VEO form Number <i>ID# 22868</i>	

Attachment C

(CARB VEE certifications)

Paul Schafer		Student ID. # 22868
Is certified as a visible emission evaluator based on the score achieved and the criteria established by the U.S. EPA Reference Method 9		
Certification expires:	1/26/2011	
 <small>Authorized Signature</small>	7/27/2010 <small>COBE Date</small>	
Certified for:	100.1	Average Dev: 5.2
<small>100.1-day</small>		White 5.4 Black
<small>100.2-4day</small>		Sun Glasses: White Black



California Environmental Protection Agency
AIR RESOURCES BOARD

VISIBLE EMISSION EVALUATION PROGRAM

Information on Future Schedules and Locations:

Day Recert: http://www.arb.ca.gov/CAP/100_1.htm

Night Recert: http://www.arb.ca.gov/CAP/100_2.htm

If a photocopy of your qualification form is required, please send a stamped self-addressed envelope to:
ARB, Enforcement Division, Compliance Assistance Section
P.O. Box 2915, Sacramento, CA 95812

Attachment D

(Blasting Plan, applicable pages)

blasting operations should be monitored by an approved seismograph located at the nearest structure within 600 feet.

The Federal Office of Surface Mining (OSM), formerly known as U.S. Bureau of Mines, recommends a Peak Particle Velocity (PPV) safety level of 2.0 in./sec. for residential structures. (PPV is a measure of vibration intensity. It is usually expressed in units of inches per second (in./sec.)). Blasting regulations specified in the project conditions are listed below.

3.0 Compliance with Blasting Conditions

During this discussion a number of recommended safety precautions have been highlighted. Blasting operations at the site shall adhere to these broad requirements. A listing of these precautions is listed as follows:

1. All blasting shall be performed according to the blasting permit issued by the County Sheriff's Department in compliance with the County Blasting Ordinance. All blasting operations shall follow County, State and Federal regulations.
2. The blasting contractor shall maintain general liability insurance in the minimum amount of \$500,000 per occurrence.
3. Blasting materials shall not be stored at the site.
4. The blasting contractor and registered geologist shall conduct field surveys to identify potentially unstable boulders prior to blasting. Any unstable boulders shall be stabilized or removed from areas of potential hazard.
5. The Blaster-in-Charge shall be responsible for all blasting operations at the site. Loaded holes shall not be left unattended.
6. Blasting plans and procedures will incorporate all reasonable measures necessary to eliminate negative impacts on persons and minimize negative impacts on property and the environment. The following general hazard areas will be reviewed to help identify potential site-specific hazards and controls for each blast site:
 - Damaged or deteriorated blasting supplies shall not be used.
 - Only authorized and qualified personnel shall handle explosives and shall always be under the direct supervision of a certified and licensed blaster.
 - On the property site, all vehicles hauling explosives will be properly loaded and properly placarded to meet all federal, state, DOT, and MSHA requirements.
 - All vehicles shall have appropriate safety equipment, including fire extinguishers, as required by federal and state regulations.
 - All necessary vehicles pertaining to the blast site will be the only vehicles allowed on the blast site.

7. Use of the following personnel protective equipment will be mandatory:
 - Protective head gear - hard hat
 - Protective footwear - stacked-toed work boots
 - Protective eye wear - approved safety glasses
8. The following protective equipment may be as needed:
 - Gloves
 - Ear protection - plugs or muffs
 - Respirators
9. Inspections of structures will conform to Blasting Guidance Manual regulations. If damages resulting from the blasting and mining operations occur, the operator shall contact the proper authorities. Also, the operator shall contact the appropriate insurance companies and assist with the investigation of the claim(s).
10. All charges shall be calculated prior to blasting to reduce ground shaking, fly rock and subblast. The Scaled Distance Equation shall be utilized to calculate maximum allowable charge weight per 8 ms delay.
11. Accurately measure stemming and use stemming material of uniform size.
12. Roadway traffic shall be interrupted during blasting operations.
13. A copy of blasting records shall be maintained at the site and be made available to the County mining inspector upon demand.
14. Ground vibrations (velocity in inches per second) associated with blasting shall be monitored and recorded. If velocity is identified as being in excess of 1.25 inches per second, proper notification of appropriate authorities shall be required.
15. Blasting shall take place between the hours of 10:00 a.m. and 12:00 p.m. on weekdays (Monday through Friday). Blasting shall only be allowed on weekends if there is an emergency. No blasting shall be allowed after dark.
16. Blasting shall not be conducted when the wind velocity equals or exceeds 15 miles per hour. Wind velocity shall be measured using a recording anemometer located a minimum of ten feet above the ground near the on-site project office.
17. At the beginning of the blast program, the peak overpressure shall be monitored. The following criteria shall apply:
 - The monitoring shall occur at the northern MUP Boundary line, the closest residence and at the locations along Couser Canyon Road and Rice Canyon Road as depicted on the attached Figure 4. The monitoring locations shall be approved by the Director of Planning and Land Use. The measurements shall be conducted by a County approved acoustical consultant.

- **Field personnel shall complete field data sheets for each blast. The datasheets will maintain a record of field activities including the date and time of the blast, measurement location, measured sound levels, meteorological conditions (i.e., wind speed, wind direction and ambient temperature) number of holes, and explosive weight and any other noteworthy items.**
- **The peak overpressure shall not exceed 115 dBP at any off site structure. Changes to the blasting procedures shall occur if the peak overpressure exceeds this level.**

Attachment E

(Seismograph Records)

SuperGraphics Corporation - Report

Tel: (205)592-2488 x 23

Customer: GRANITE
Location: PANKEY RESIENCE
Operator: HAYS
 Notes:

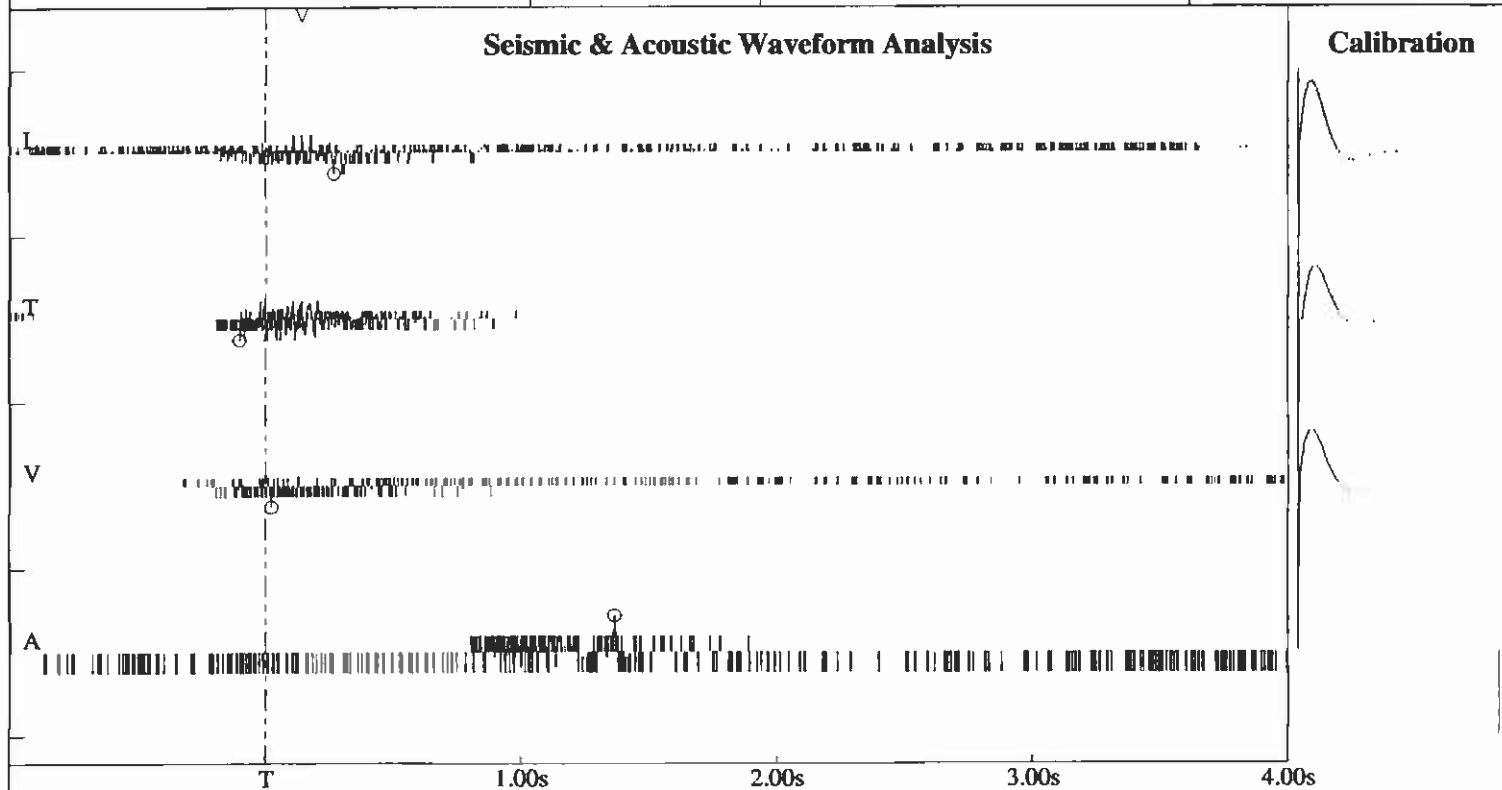
Company: M.J. BAXTER DRILLING

02JUL10 at 11:14:15 as Event # 17
 Graph: NS54001-2419
 Calibration Date: 08FEB10
 Sample Rate: 1024/sec
 Record Duration: 5 sec

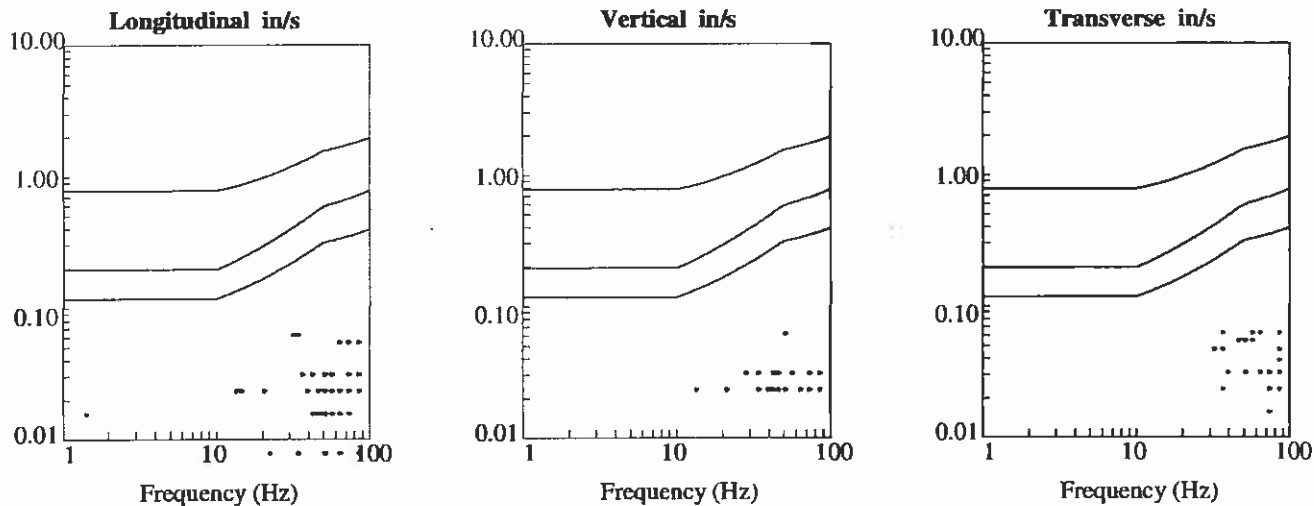
Amplitudes & Frequencies	Trigger >>> Peak	Scales & Triggers	Charge / Distance
○ Longitudinal: 0.06 in/s @ 30.1 Hz	267.6 ms	Acoustic Scale: .00115 psi/division	Wgt. per Delay: .0 lb
○ Transverse: 0.06 in/s @ 54.0 Hz	-100.6 ms	Seismic Scale: 0.25 in/s/division	Distance: 1200.00 ft
○ Vertical: 0.04 in/s @ 46.5 Hz	21.5 ms	Acoustic Trigger: N	Scaled Distance: N/A
○ Acoustic: 96 dB / . psi @ 17.6 Hz	1363.3 ms	Seismic Trigger: 0.05 in/s	
▽ Vector Sum: 0.08 in/s	139.6 ms		

Seismic & Acoustic Waveform Analysis

Calibration



Particle Velocity vs. Frequency - DIN 4150-3-Table 1



SuperGraphics Corporation - Report

Tel: (205)592-2488 x 23

Customer: GRANITE
Location: EAST RIDGE
 Operator: HAYS

Company: M.J.BAXTER DRILLING CO.

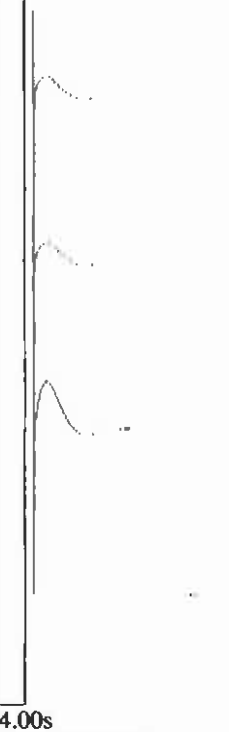
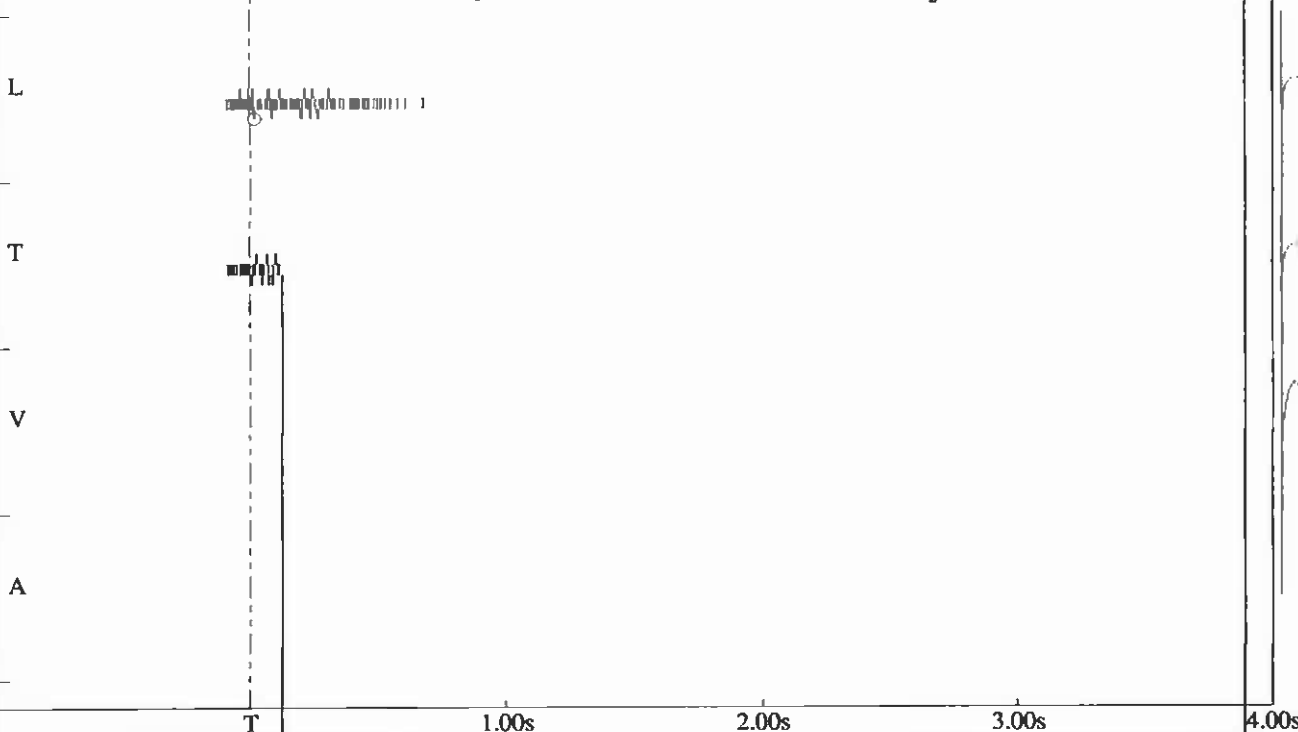
02JUL10 at 11:11:02 as Event # 17
 Graph: NS5400I-2981
 Calibration Date: 27JAN10
 Sample Rate: 1024/sec
 Record Duration: 5 sec

Notes:

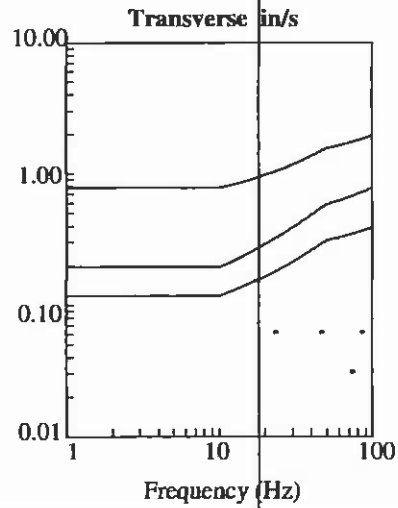
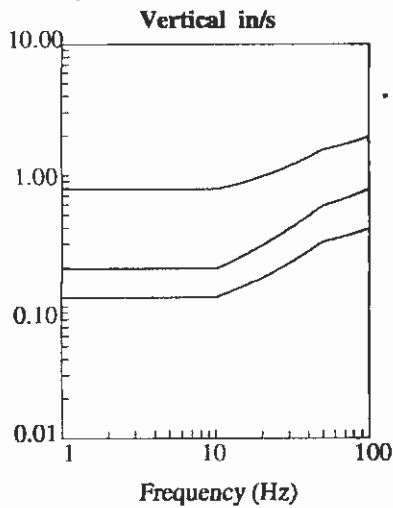
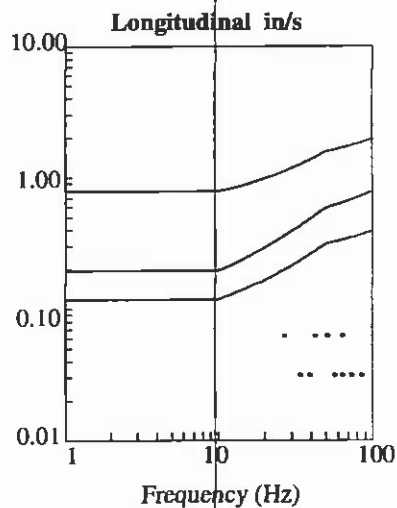
Amplitudes & Frequencies	Trigger >>> Peak	Scales & Triggers	Charge / Distance
○ Longitudinal: 0.06 in/s @ 57.0 Hz	15.6 ms	Acoustic Scale: .00230 psi/division	Wgt. per Delay: .0 lb
○ Transverse: 0.08 in/s @ 31.0 Hz	127.0 ms	Seismic Scale: 0.25 in/s/division	Distance: 760.00 ft
○ Vertical: 0.06 in/s @ 46.5 Hz	-999.0 ms	Acoustic Trigger: N	Scaled Distance: N/A
○ Acoustic: 114 dB / . psi @ 10.2 Hz	-999.0 ms	Seismic Trigger: 0.05 in/s	
▽ Vector Sum: 5.66 in/s	195.3 ms		

Seismic & Acoustic Waveform Analysis

Calibration



Particle Velocity vs. Frequency - DIN 4150-3-Table 1



SuperGraphics Corporation - Report

Tel: (205)592-2488 x 23

Customer: GRANITE

Location: QUARY ENTRANCE

Operator: HAYS

Notes:

Company: M.J. BAXTER DRILLING CO.

02JUL10 at 11:13:18 as Event # 11

Graph: NS5400I-2571

Calibration Date: 18MAR09

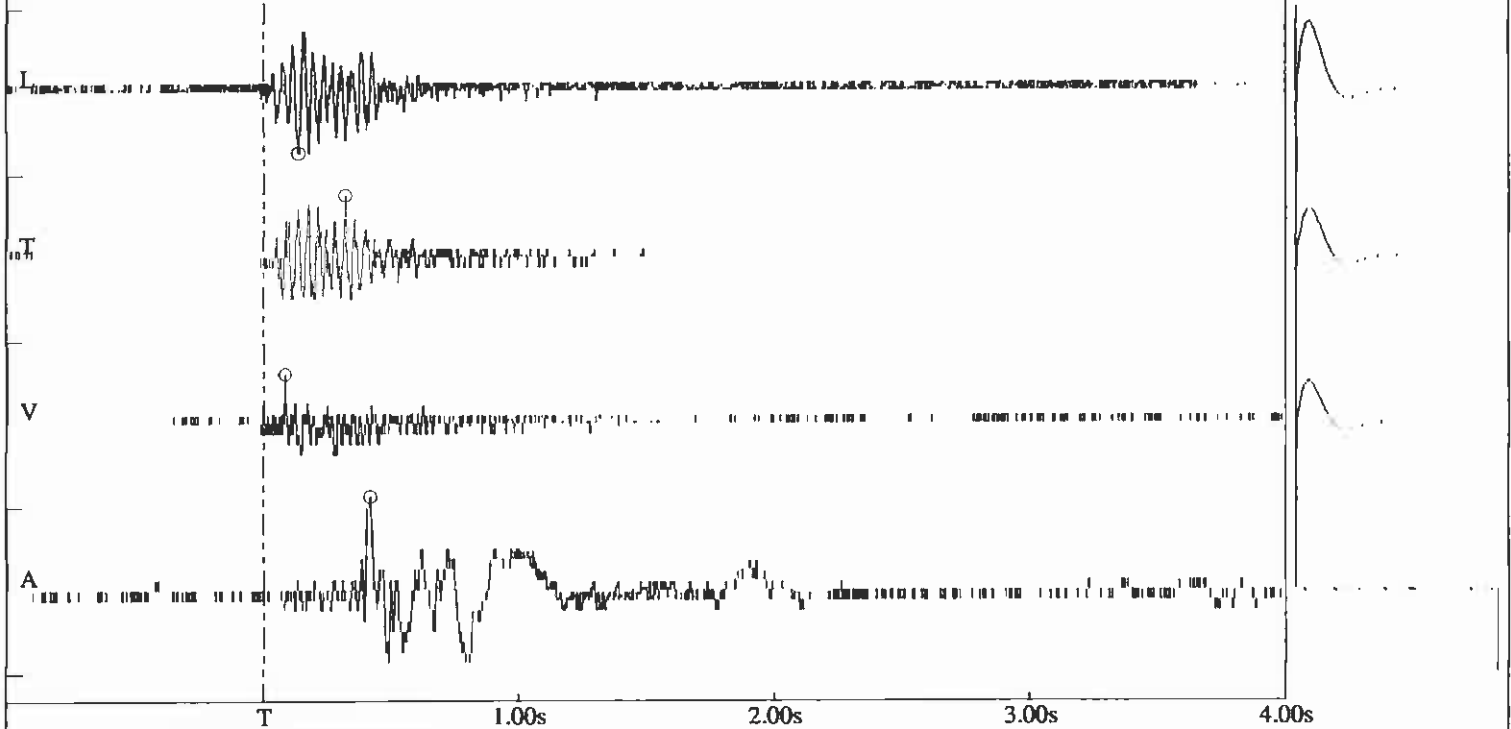
Sample Rate: 1024/sec

Record Duration: 5 sec

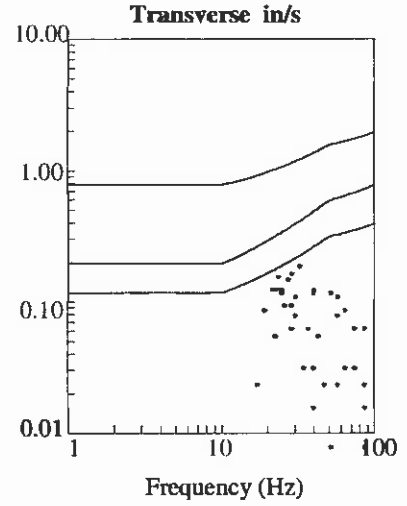
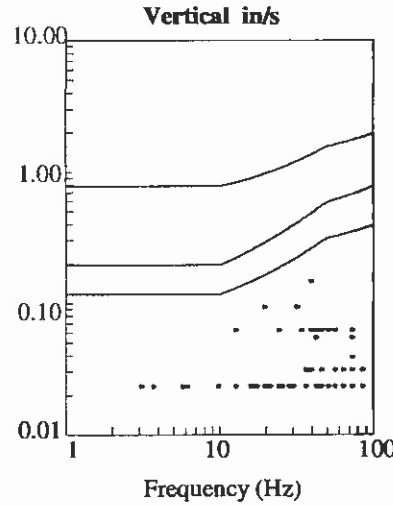
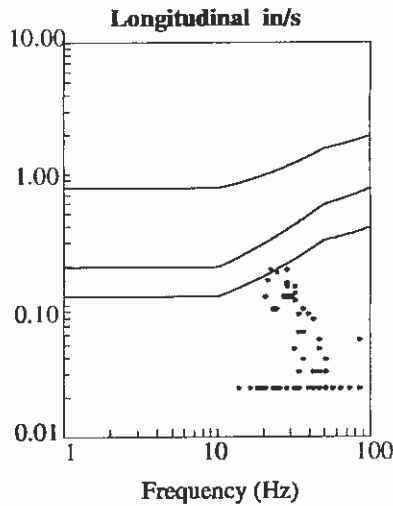
Amplitudes & Frequencies	Trigger >>> Peak	Scales & Triggers	Charge / Distance
○ Longitudinal: 0.20 in/s @ 21.5 Hz	135.7 ms	Acoustic Scale: .00230 psi/division	Wgt. per Delay: .0 lb
○ Transverse: 0.20 in/s @ 34.1 Hz	321.3 ms	Seismic Scale: 0.25 in/s/division	Distance: 480.00 ft
○ Vertical: 0.13 in/s @ 35.3 Hz	83.0 ms	Acoustic Trigger: N	Scaled Distance: N/A
○ Acoustic: 117 dB / . psi @ 11.6 Hz	421.9 ms	Seismic Trigger: 0.05 in/s	
▽ Vector Sum: 0.25 in/s	174.8 ms		

Seismic & Acoustic Waveform Analysis

Calibration



Particle Velocity vs. Frequency - DIN 4150-3-Table 1





Attachment F

(Vibration Monitoring Map)



Legend of Monitoring Stations:

-  Vibration and Overpressure (permanent)
-  Vibration and Overpressure (temporary)

LEGEND
 NORTH
 MONITORING STATION

GRAPHIC SCALE
 0 100 200
 FEET
 SCALE 1" = 300'

SOURCE OF TOPOGRAPHY AND ORTHOPHOTOGRAMMETRY
 COUNTY OF SAN DIEGO
 DATE OF PHOTOGRAPHY
 DRAWN BY
 CHECKED BY
 NOTE:
 THIS MAP IS A REPRESENTATION OF THE QUARRY SITE AND MONITORING STATIONS. IT IS NOT A GUARANTEE OF THE ACCURACY OF THE INFORMATION SHOWN HEREON.

CHERRY ENGINEERING
 17271 Poway Road, Poway, CA 92064
 Ph (619) 675-7470 Fax (619) 675-5416

GRABITE CONSTRUCTION

**ROSEMARY'S MOUNTAIN QUARRY SITE
 BLAST MONITORING STATIONS**

NO.	DATE	BY	REVISION
1	11/11/11	JL	ISSUE FOR PERMITTING
2	11/11/11	JL	ISSUE FOR PERMITTING
3	11/11/11	JL	ISSUE FOR PERMITTING
4	11/11/11	JL	ISSUE FOR PERMITTING
5	11/11/11	JL	ISSUE FOR PERMITTING
6	11/11/11	JL	ISSUE FOR PERMITTING
7	11/11/11	JL	ISSUE FOR PERMITTING
8	11/11/11	JL	ISSUE FOR PERMITTING
9	11/11/11	JL	ISSUE FOR PERMITTING
10	11/11/11	JL	ISSUE FOR PERMITTING

Attachment G

(Noise Monitoring Report)

**QUARTERLY NOISE DATA SUMMARY
THIRD QUARTER, 2010
ROSEMARY'S MOUNTAIN QUARRY
PALA, CALIFORNIA**

Prepared for:

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Prepared by:

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Mike Greene, INCE Bd. Cert.

September 30, 2010

Table A. Third Quarter 2010 Noise Monitoring Data¹

Site ID	Measurement Location	Measurement Period			Noise Sources	Measurement Results (dBA)					
		Date	Start Time	Duration (mm:ss)		L _{eq}	L _{max}	L _{min}	L ₉₀	L ₅₀	L ₁₀
N1A	Northern project boundary	9/29/10	11:58 a.m.	30:00	Project-related loader, haul trucks, dump trucks, water truck operating (in distance), backup alarms; Non-project-related distant aircraft, birds, distant traffic	44.6	57.5	32.3	34.1	37.6	49.2
N1B	Northern project boundary	9/29/10	12:30 p.m.	30:00	Project-related loader, haul trucks, dump trucks, water truck operating (in distance), backup alarms; Non-project-related distant aircraft, birds, distant traffic	39.5	58.1	31.3	32.5	35.2	40.5
N3A	Western project boundary	9/29/10	10:45 a.m.	30:00	Non-project related distant I-15 traffic, birds, aircraft; project-related noise (trucks, backup alarms) barely audible	41.9	53.1	35.1	36.8	38.6	44.2
N3B	Western project boundary	9/29/10	11:16 a.m.	30:00	Non-project related distant I-15 traffic, birds, aircraft; project-related noise (trucks, backup alarms) barely audible	42.3	54.8	35.7	37.5	39.7	45
N4A	Western property boundary, adjacent to existing residence	9/28/10	10:05 a.m.	30.00	Non-project related SR-76 traffic, non-project-related agricultural equipment, birds, distant aircraft; no project-related noise ¹	49.5	65.4	40.5	44	47	51.8
N4B	Western property boundary, adjacent to existing residence	9/28/10	10:35 a.m.	30.00	Non-project related SR-76 traffic, non-project-related agricultural equipment, birds, distant aircraft; no project-related noise ¹	50.7	73.5	38.4	41.5	44.8	50.8

N5A	Northwestern property boundary	9/28/10	9:00 a.m.	30.00	Distant non-project related traffic, distant aircraft, birds; One project-related quarry truck pass-by (front-end loader). On-site quarry noise not audible ¹	47.9	63	39.8	42.1	44.5	50.3
N5B	Northwestern property boundary	9/28/10	9:30 a.m.	30.00	Distant non-project related traffic, distant aircraft, birds; No project-related noise audible ¹	46.4	64.4	38.2	39.6	42.6	46.1
N6A	Northern property boundary	9/28/10	11:15 a.m.	30.00	Distant non-project-related traffic, aircraft; no project-related noise audible ¹	45.3	65.8	32	33.1	34.6	44
N6B	Northern property boundary	9/28/10	11:45 a.m.	30.00	Distant non-project-related traffic, aircraft; no project-related noise audible ¹	36.5	53.1	31.8	32.3	33.8	39.2

1- The continuing site development activities while the measurement was being conducted was verified visually by the field noise specialist.

Table B. Interim Noise Monitoring Results—Predicted Noise Impacts

Site ID	Date	Start Time	Noise Sources	Measurement Results (dBA)		
				L_{eq}	Applicable Noise Threshold ¹ (L_{eq})	Noise Threshold exceeded? (Yes/No)
N1A	Northern project boundary	9/29/10	Project-related loader, haul trucks, dump trucks, water truck operating (in distance), backup alarms; Non-project-related distant aircraft, birds, distant traffic	44.6	75	No
N1B	Northern project boundary	9/29/10	Project-related loader, haul trucks, dump trucks, water truck operating (in distance), backup alarms; Non-project-related distant aircraft, birds, distant traffic	39.5	75	No
N3A	Western project boundary	9/29/10	Non-project related distant I-15 traffic, birds, aircraft; project-related noise (trucks, backup alarms) barely audible	41.9	75	No
N3B	Western project boundary	9/29/10	Non-project related distant I-15 traffic, birds, aircraft; project-related noise (trucks, backup alarms) barely audible	42.3	75	No
N4A	Western property boundary, adjacent to existing residence	9/28/10	Non-project related SR-76 traffic, non-project-related agricultural equipment, birds, distant aircraft; no audible project-related noise ²	49.5	75	No
N4B	Western property boundary, adjacent to existing residence	9/28/10	Non-project related SR-76 traffic, non-project-related agricultural equipment, birds, distant aircraft; No audible project-related noise ²	50.7	75	No

N5A	Northwestern property boundary	9/28/10	Distant non-project related traffic, distant aircraft, birds; One project-related quarry truck pass-by (front-end loader). On-site quarry noise not audible ²	47.9	75	No
N5B	Northwestern property boundary	9/28/10	Distant non-project related traffic, distant aircraft, birds; No audible project-related noise ²	46.4	75	No
N6A	Northern property boundary	9/28/10	Distant non-project-related traffic, aircraft; No project-audible related noise ²	45.3	75	No
N6B	Northern property boundary	9/28/10	Distant non-project-related traffic, aircraft; No project-audible related noise ²	36.5	75	No

1 – Noise thresholds for the current phase of the project (site preparation) derived from Section 36.409 Construction Equipment and Section 36.410 Impulsive Noise.

2 - The continuing site development activities while the measurement was being conducted was verified visually by the field noise specialist.

Conclusions

Based on the noise monitoring results, no exceedances of the applicable noise limits occurred during the current period of site preparation.

CERTIFICATION

I certify that I have conducted/supervised the measurements for this report. I concur with its methodologies, modeling results, conclusions, and recommendations.

Mike Greene, INCE Bd. Cert.

Jones & Stokes
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Irvine, CA 92618

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APPENDIX A. SITE PHOTOGRAPHS



N1 looking west



N3 looking southwest



N4 looking east



N5 looking east



N6 looking south

APPENDIX B. FIELD INSTRUMENTATION

□ **Sound Level Meter:** Larson Davis Model 812 Type 1 Integrating Sound Level Meter, Serial Number 0432

□ **Acoustical Calibrator:** Larson Davis Model Ca 200 (114 dB SPL @ 1000 Hz), Serial Number 6644.

□ **Meteorology Instrumentation:** Kestrel Model K3000 Digital Hygrometer/Thermometer/Anemometer, Serial Number 475332