



**COUNTY OF SANTA BARBARA
PLANNING AND DEVELOPMENT**

MEMORANDUM

TO: Santa Barbara County Planning Commission

FROM: Susan Curtis, Planner, Energy & Minerals Division
Errin Briggs, Energy Specialist, Energy & Minerals Division

DATE: September 10, 2014

RE: Lehigh Hanson Aggregates Compliance Review Case Nos. 86-CP-106
RV01, 86-RP-006 RV01, and 02PMC-00000-00161

I. INTRODUCTION

On July 22, 2014, the Planning Commission considered this item, continued it to September 10, 2014, and directed staff to provide additional analysis demonstrating Lehigh Hanson Aggregates compliance with the project's Conditions of Approval (Case Nos. 86-CP-106 RV01 and 86-RP-006 RV01). The review period covers previously conducted mining operations carried out under the company's first and second 5-year Mining and Reclamation Plans (MRP's) from approximately 2000 to present. Specifically, your Commission directed staff to provide additional analysis demonstrating how the permit conditions of approval are effectively mitigating the environmental impacts of the project.

II. ADDITIONAL ANALYSIS

In response to the Commission's direction, staff completed exhaustive background research including review of the operator's annual Surface Mining and Reclamation Act (SMARA) inspection reports, permit case files for the current and previous 5-year Mining and Reclamation Plans, review of Case Nos. 86-CP-106 RV01 and 86-RP-006 RV01 and the associated Final Environmental Impact Report (96-EIR-004). Staff also had discussions with the operator regarding permit compliance actions completed to date. The applicant contracts with a consulting firm to prepare each 5-year MRP for review by staff. The MRP is a comprehensive document that addresses a five-year mining cycle and includes a detailed description of mining and mitigation activities, a site inventory and impact analysis for all resource areas, mitigation and restoration proposals and condition consistency analysis. Staff is currently reviewing the applicant's 3rd 5-year MRP and will issue a Zoning Clearance once all applicable conditions have been satisfied.

After gathering all the available information, staff prepared a comprehensive permit compliance matrix (see Attachment A of this staff memorandum) for your Commission which presents the following: Column 1: Identification of all environmental impacts by issue area from the Environmental Impact Report (EIR). Column 2: Identification of issue/impact area mitigation measures from the Conditions of Approval. Column 3: Description of activities completed by the operator which implement the mitigation measure/condition of approval in the field and an accompanying discussion of the conditions adequacy to mitigate the corresponding impact identified in the project EIR.

Those Conditions of Approval identified as administrative, regulatory/legal have not been included in the attached matrix because this review focuses on those conditions which are intended to mitigate impacts identified in the EIR, as required by Condition No. 1 of Case No. 86-RP-006 RV01. Staff did review the administrative/regulatory/legal conditions and all are in compliance. After conducting this additional analysis, staff continues to recommend that the project is in compliance with permit conditions of approval, that the conditions are effectively mitigating the significant environmental impacts of the project, and that no changes to the conditions are required at this time.

Attachments:

A. Lehigh Hanson Aggregates Compliance Review Matrix

Attachment A: Lehigh Hanson Aggregates Compliance Review Matrix

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
Air Quality		
<p>Potential for the project to generate emissions from increased truck traffic over existing baseline conditions which would exceed established thresholds of significance for NO_x and ROG.</p>	<p>8. Mitigation Measure MRP-1B-AIR-1 (Vehicle Maintenance): Haul trucks owned by the operators shall be maintained in proper tune to minimize NO_x and ROG emissions. Any mining operator owned equipment that is no longer operational shall be replaced with equipment which will meet CARB and EPA heavy duty vehicle emission standards applicable to the model year of the replacement equipment.</p>	<p>All haul trucks and diesel equipment are required to comply with the State of California Air Resources Board (CARB) emissions regulations designed to reduce emissions of diesel particulate matter (PM) and NO_x emissions. Equipment is maintained to ensure continued compliance with the CARB on-road heavy-duty diesel vehicle regulation. This regulation requires diesel engines in trucks and buses be upgraded to reduce emissions. Newer, heavier trucks and buses were required to meet PM filter requirements beginning January 1, 2012. Older trucks must be replaced starting January 1, 2015. P&D staff has reviewed the operator's CARB Truck and Bus Regulation Certificate No. 21200 demonstrating compliance with this condition and CARB truck and bus standards. Additionally, records of vehicle maintenance demonstrating compliance with this condition are available on site for P&D staff review on request. During annual SMARA field inspections, P&D staff verifies that the operator has a current CARB Truck and Bus Regulation</p>

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		Certificate and reviews vehicle maintenance logs to ensure continued compliance with this condition. Based upon the operators continued compliance with CARB standards, Condition No. 8 continues to effectively mitigate the air quality impacts of the project and no change to the condition is recommended at this time.
Potential for mining activities to create nuisance dust that could affect surrounding residential and agricultural development.	<p>9. Mitigation Measure MRP-1B-AIR-2 (Dust Control):</p> <p>The project applicant shall continue to use water truck sprayers and approved dust suppressants on all on-site roads and working areas to reduce visible dust. The operator shall designate a person or persons to monitor the dust control program and to order increased watering as necessary to prevent transport of dust off-site. In the event of valid complaints from nearby receptors, the applicant shall hire a monitor approved by the agencies to ensure compliance with this measure. The name and telephone number of such persons shall be provided to the APCD. The monitor shall remain on-site until a satisfactory compliance record is achieved as determined by Planning & Development Permit Compliance in consultation with APCD.</p>	The operator uses a water truck to regularly apply water to control dust at the mining site, haul roads, processing plant, and loading area for trucks hauling offsite. No dust suppressants other than water are used. The operator has a designated Site Supervisor responsible for oversight of these activities. P&D staff would investigate dust complaints to ensure compliance with this condition. In the event of valid complaints from nearby receptors, the applicant would be required to hire a monitor, in consultation with P&D staff, to ensure compliance with Condition No 9. During annual SMARA field inspections, P&D staff verifies that all dust control protocols and practices are still in place and in compliance with this condition. To date, P&D staff has received no complaints regarding dust control at the mine site. These measures are time-tested and are

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		routinely and effectively applied to all open pit mining operations. Therefore, Condition No. 9 continues to effectively mitigate the air quality impacts of the project and no change to the condition is recommended at this time.
Agricultural Resources		
Potential loss of soil productivity; conflict with Williamson Act requirements; loss of prime agricultural lands.	2. Mitigation Measure MRP-1B-AG-7 (Topsoil Conservation): To reduce potential significant impacts due to loss of prime agricultural lands, the mine operator shall remove and segregate topsoil by defined soil horizons (if present) from the 72 acre field. Concurrently with removal, this soil shall be delivered to the nearest off-channel agricultural/habitat reclamation area within the Coast Rock project for use in reclamation efforts (Hansen/St. Claire/Bognuda Pits). If temporary storage of soils is necessary, such storage shall only occur subject to the review and approval of the County to ensure that all available measures are taken to maintain the productivity of the soils during storage for later use in project reclamation efforts.	The operator removed and segregated topsoil from the 72 acre field referenced in Condition No. 2. This condition required that this soil be delivered to the CalPortland Company (formerly Coast Rock) mining operation for use in their reclamation activities. At the time of this soil removal, CalPortland Company did not need the soil for any of their on-site reclamation activities. As a result, the soil was not transferred to CalPortland Company and instead has been stockpiled at the Lehigh Hanson Aggregates property for use in future reclamation activities at the site. The soil stockpiles have naturally revegetated, reducing soil erosion and increasing productivity of the stored soils. P&D staff verifies the condition of the stockpiled soil during annual SMARA field inspections. Importantly, the operator has stockpiled and protected topsoil as a means of reducing

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		potential impacts due to the loss of prime agricultural lands pursuant to the requirements of this condition. This topsoil will be used in the future for reclamation activities. Therefore, Condition No. 2 will effectively mitigate the agricultural impacts of the project once the stockpiled soil is re-used and no change to the condition is recommended at this time.
Biological Resources		
Removal/disturbance of wetlands, riparian and mulefat scrub vegetation and associated effects on wildlife habitat due directly to mining activities and indirectly due to associated changes in groundwater levels; potential for direct and indirect effects on sensitive wildlife species due to fragmentation of habitat through mining and related activities and due to the potential for incidental	<p>25. Mitigation Measure MRP-1-BIO-1: Periodic mining & reclamation plan: Prior to commencement of surface mining operations for Phase I and coinciding with renewal of each Section 404 permit, after the initial commencement of mining, the applicant shall submit a mining and reclamation plan (MRP) for the upcoming Section 404 permit period for review and approval by each applicable agency of jurisdiction. The applicant shall be responsible for reimbursement of costs associated with, plan review and mitigation monitoring incurred by applicable agencies. Said plan, and accompanying written project description, shall include the following elements:</p> <p>A. RESOURCE MAPPING: The specific extent of all biological resources within the area proposed to be disturbed shall be mapped by an agency approved</p>	Hanson Aggregates has undergone two previous MRP's, the first in 2000 and the second in 2008. The operator is required to submit biological resource mapping, mining impact evaluation and mitigation, and proposed reclamation as part of the 5-year periodic MRP's. This information is used as a basis for informing biological mitigation and reclamation of mined areas for the subsequent cycle of mining. MRP's are reviewed and approved by P&D with the assistance of Biologists who peer review technical studies and conduct site visits as needed to ensure the adequacy of submitted plans. Additionally, the Army Corps of Engineers reviews plans and studies for in-channel river mining. P&D staff/Biologist

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take and /or harassment.	<p>Biologist/Wetlands Specialist based on an updated spring biological survey. Said mapping shall be provided as an overlay to the proposed mining plan.</p> <p>B. MINING IMPACT EVALUATION AND MITIGATION: The written project description accompanying the mining plan shall include a specific biological resource impact assessment prepared by an agency approved Biologist/Wetlands Specialist. The impact assessment shall consist of an analysis of the feasibility of avoidance of said resources, a description of the extent and chronology of disturbance to said resources where avoidance is not feasible, a description of the specific mitigation (from the menu of measures included in the program EIR) proposed for disturbance of said resources, mitigation monitoring, contingency mitigation in the event that the proposed mitigation fails, and a description of the timing of implementation of mitigation. Mitigation shall be consistent with the measures listed below for each specific sensitive biological resource. Mitigation plans shall be developed in accordance with the ACOE Habitat Mitigation and Monitoring Guidelines in effect at the time each Periodic MRP is reviewed.</p> <p>C. PROPOSED RECLAMATION: All areas proposed to be reclaimed during the permit period shall be indicated on the plans including the proposed end use,</p>	<p>review and approval of MRP's ensures that biological resources have been appropriately mapped, that appropriate impacts and mitigations are identified and the reclamation is appropriate. P&D staff is currently reviewing the 2014 MRP to verify the adequacy of materials submitted, appropriateness of biological impact evaluation and mitigation, and proposed reclamation to ensure the requirements of this condition are met. During annual SMARA field inspections, P&D staff verifies that implementation of mitigations is adequate and reclamation of corresponding areas occurs according to the approved Reclamation Plan and completed in compliance with this condition. The adequacy of this condition has been clearly demonstrated by the successful reclamation and revegetation within areas of the Carranza basin. Photos of these areas are on file for review with P&D. Therefore, no change to Condition No. 25 is recommended at this time.</p>

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	<p>method and timing for completion of reclamation. Performance criteria for measuring the success of reclamation shall be indicated as part of the written project description and shall conform to the requirements of SMARA and all local implementing ordinances.</p> <p>D. If no in-channel mining is proposed for any mining period, Planning and Development, in consultation with the Army Corps of Engineers and the State Department of Fish and Game may waive or modify plan submittal requirements (including surveys) for the in-channel areas.</p>	
	<p>26. Mitigation Measure MRP-1-BIO-2 (Wetland & Willow Riparian Habitat Avoidance/Replacement): To protect wetland resources, the applicant shall avoid all federally-delineated wetlands and willow riparian habitat to the maximum extent practicable.</p> <p>a) Mitigation Ratio: To mitigate for impacts on wetlands and willow riparian habitat that cannot be avoided (including habitat identified in the baseline delineation prepared for the EIS/R and any new habitat that develops subsequent to project initiation), the applicant shall establish and maintain self-sustaining wetlands and willow riparian habitat in or adjacent to the river environment in County-designated mitigation sites within the project area to offset the functions and values of the impacted habitat. Total self-</p>	<p>Hanson Aggregates has undergone two previous MRP's, the first in 2000 and the second in 2008. The operator is required to submit wetland and willow riparian habitat avoidance/replacement analysis and mitigation actions for proposed mining as part of the 5-year periodic MRP. MRP's are reviewed with the assistance of the P&D staff Biologist or contract Biologist who performs peer review of technical studies and conducts site visits as needed. P&D staff and Biologist work with the operator during the MRP review process to maximize avoidance and/or mitigation for wetlands and willow riparian habitat that may be impacted by mining in the proposed MRP. By observing setbacks and</p>

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	<p>sustaining, wetlands and willow riparian habitat provided in these identified mitigation sites shall be required to equal at least 1.5 times the area of wetlands and willow scrub removed or disturbed by mining and at least 3 times the area of riparian willow forest or oak woodland habitat removed or disturbed by mining on an ongoing basis throughout the life of the project. Replacement habitat at the specified ratios shall be provided in advance or concurrently with removal of wetland and willow riparian vegetation associated with approved mining.</p> <p><i>b) Advance Mitigation:</i> To provide for advance mitigation of project impacts, a mitigation bank shall be established within areas in or adjacent to the river channel that are not proposed for further mining. During the first 5 year in-channel mining period, the advance mitigation areas shall be fully vegetated to provide replacement of existing wetland and willow riparian habitat proposed to be removed during the life of the project (using either the baseline conditions mapped in the Final EIS/R or an updated biological survey and wetland delineation prepared by a County approved biologist and submitted with the first Periodic MRP). The advance mitigation areas shall be maintained to off-set removal or disturbance of wetland and willow riparian habitat in areas approved for future mining pending establishment of permanent habitat mitigation sites of equivalent or greater area within either the Carranza,</p>	<p>clearly identifying in-channel mining areas in the field prior to mining, the operator has generally avoided wetland habitat. However, approximately 1.16 acres of wetland habitat disturbance occurred in 2005. In response, the operator established a wetland mitigation area in the Carranza basin in order to ensure no net-loss of wetland habitat occurred as a result of the project. However, upon cessation of irrigation, the area revegetated with natural scrub and no longer meets the criteria as a wetland. As a result, the operator is currently working with P&D staff and Biologist to identify an alternate location to establish the requisite wetland area(s) in compliance with this condition. P&D staff is currently reviewing the 2014 MRP and as part of that process, an alternate location for wetland mitigation will be addressed. The condition requires that the operator submit wetland and willow riparian habitat avoidance/replacement analysis and mitigation actions prior to the commencement of mining and as part of the periodic 5-year MRP. Submittal of this required information as part of the current MRP, in conjunction with active reclamation in the field, will be sufficient to mitigate project impacts to biological/wetland</p>

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	<p>Davis, or Little Lucy off-channel pits, or other site acceptable to the regulatory agencies. Once permanent habitat mitigation sites are successfully established, further maintenance of the advance mitigation sites will not be required.</p> <p>Functional assessments of mitigation areas shall be utilized to document success of mitigation efforts. These shall be conducted by an ACOE and County approved biologist/wetlands specialist, and in accordance with an ACOE and County approved methodology. Any future mining projects conducted by the permittee extending beyond the Plan area, other mining projects within the Sisquoc/Santa Maria rivers, or other projects requiring wetland and/or riparian habitat mitigation shall not be allowed to utilize the advance mitigation required for this project without prior approval by the County through a revision to this permit.</p> <p>c) Cumulative Habitat Preservation. Each periodic MRP shall demonstrate that the area of ACOE jurisdictional wetland and willow scrub habitat that has cumulatively developed since the original project delineation (Category “B” below) plus the area of ACOE jurisdictional wetland and willow scrub habitat that has been successfully established at each mitigation site to date (Category “E” below) shall always equal at least 1.5 times the area of any</p>	<p>resources. Staff works with the applicant to require alternative replacement locations if initial restoration efforts are not successful to ensure continued compliance with this condition. Condition No. 26 continues to effectively mitigate the biological impacts of the project and no change to the condition is recommended at this time.</p>

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	<p>ACOE jurisdictional wetlands and willow scrub habitat cumulatively disturbed since project initiation (Category “C” below), i.e. B+E shall be greater than or equal to C at all times. Similarly, the area of willow forest and oak woodland habitat that has cumulatively developed since the original project delineation (Category “B” below) plus the area of willow forest and oak woodland habitat that has been successfully established at each mitigation site to date (Category “E” below) shall always equal at least 3 time the area of any willow forest and oak woodland habitat cumulatively disturbed since project initiation (Category “C” below).</p> <p>In order to implement this requirement, each Periodic MRP shall include the following information for the area proposed to be mined and areas previously reclaimed (if any):</p> <ul style="list-style-type: none"> • An inventory of all wetland, willow scrub, riparian willow forest and oak woodland habitat indicated in the baseline project delineation (“A”); • An inventory of all wetland, willow scrub, riparian willow forest and oak woodland habitat that has developed since the original project baseline delineation (“B”); • A cumulative inventory of all wetland, willow scrub, 	

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	<p>riparian willow forest and oak woodland habitat areas that have been disturbed since project initiation (including habitat proposed to be disturbed during the upcoming Periodic MRP (“C”);</p> <ul style="list-style-type: none"> • An inventory of all wetland, willow scrub, riparian willow forest and oak woodland habitat areas that are proposed to be avoided (“D”); • An inventory of all wetland, willow scrub, riparian willow forest and oak woodland habitat that has been established at each mitigation site to date (“E”). <p>This information shall be presented graphically and in tabular form indicating the acreage for each affected habitat type for each Periodic MRP. This information shall be tabulated separately for each Periodic MRP and cumulatively over the life of the project to demonstrate compliance with required mitigation ratios. No area will be double counted in the cumulative inventory and each area will be assigned a status best reflecting current conditions at the time of each inventory.</p> <p>d) Habitat Preservation Incentive: If cumulative mitigation requirements described above are met, and a functional assessment, consistent with County and ACOE requirements, confirms that the habitat is self-sustaining and</p>	

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	<p>provides functions and values similar to existing habitats within the project area, any habitat existing within the project area at the time of the Planning Commission's ten year review, in excess of that required as mitigation by project conditions, may be applied toward habitat mitigation requirements (on a like for like basis) for future phases of the project. The quantity, type and duration, of any credit granted shall be at the discretion of the County Planning Commission pursuant to County review of any subsequent discretionary permit for future project phases.</p> <p><i>e) General Requirements:</i> Prior to impacting any wetlands and concurrent with submittal of the Periodic Mining and Reclamation Plan, the applicant shall prepare and submit a wetlands mitigation plan prepared by a Agency approved Biologist or Wetlands Specialist (using the "ACOE Habitat Mitigation and Monitoring Guidelines" as applicable) to the Counties and the ACOE for review and approval. Wetlands mitigation shall be implemented to the satisfaction of the Counties and the ACOE prior to disturbance of existing wetland habitat. The applicant shall include an assessment of existing and newly created federal wetlands in the annual mining/monitoring report to the ACOE and the Counties. All habitat mitigation shall comply with the standards of Section 3703, 3705, and all other applicable requirements of the State of California, Mining and Geology Board</p>	

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	<p>Reclamation Regulations.</p> <p><i>f) Off-site Mitigation Contingency:</i> If suitable areas for the establishment of wetland habitat are not available, the applicant shall enter into a wetlands mitigation agreement with each applicable jurisdiction describing the timing, location, extent, installation, maintenance, monitoring, and contingency mitigation, for replacing the wetlands.</p> <p><i>g) Financial Assurance for Implementation and Maintenance:</i> The applicant shall provide a financial assurance for the establishment and maintenance of all wetland, willow riparian, and oak woodland mitigation sites in an amount acceptable to the ACOE, State Department of Conservation Division of Mines and Geology and the Counties prior to disturbance of existing wetlands. The financial assurance amount shall include any costs associated with site acquisition and preparation, planting materials, irrigation, monitoring, maintenance, and performance reports with a percentage contingency if determined to be necessary by the agencies. This contingency shall be released after three years if functional wetlands have become established. Financial assurances for long-term maintenance and monitoring of the mitigation sites shall be required to be maintained in accordance with the requirements of SMARA until vegetation is determined by the County to be self-sustaining (or five years, whichever</p>	

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	<p>is shorter). The financial assurance shall comply with all requirements of Section 3800 of State Mining and Geology Board Reclamation Regulations governing financial assurances.</p> <p><i>h) Updated Habitat Delineation:</i> A new ACOE wetland delineation and willow riparian habitat inventory shall be conducted at the end of each mining period and prior to approval of any subsequent mining plans. The delineation shall include a map (similar to those provided in the original EIS/R) of prominent aquatic features including non-wetland waters of the United States, wetlands, riparian corridors and woodlands, vegetated gravel bars, etc. The delineation shall also include a tabular description of the approximate acreage of each habitat type, and a floral and faunal species diversity inventory. The delineation shall be conducted in accordance with the most current methodology approved by the ACOE and County.</p>	
	<p><i>27. Mitigation Measure MRP-1-BIO-3 (Protective Easements):</i> All biological mitigation/reclamation sites shall be set aside in perpetuity and maintained throughout the life of the project for their habitat value through the establishment of open space/conservation easements, deed restrictions or other legal mechanism acceptable to the agencies. Any easement or other approved legal mechanism applicable to the Carranza, Davis, and Little Lucy basins shall</p>	<p>The operator has completed sufficient progress in mining at the site to establish a profile of those areas deemed suitable for protective conservation/open space easements. The operator will work with P&D staff to draft and record protective easements prior to the release of the operator's Reclamation Plan Financial Assurance. Upon recordation of these permanent conservation/</p>

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	<p>take into consideration the potential future groundwater recharge use of these basins. Easements shall be dedicated to the Counties and/or Agency approved third party organization. Easements, deed restrictions, maintenance agreements or other implementing mechanisms approved by the County, shall be recorded on the property title upon completion of reclamation and revegetation prior to final financial assurance release. A compliance fee satisfactory to P&D to provide for long-term monitoring shall be provided upon recordation of the easement(s).</p>	<p>open space easements, compliance with this condition for existing mining activities will be clearly demonstrated. P&D staff believes that the requirement that each biological mitigation/reclamation site be set aside in perpetuity through the establishment of protective easements will be adequate to mitigate future project impacts to biological resources. Therefore, no change to Condition No. 27 is recommended at this time.</p>
	<p>28. Mitigation Measure MRP-1-BIO-4 (Fish & Game Approval): No alteration to stream channels, banks, creeks, and wetlands shall be permitted until a streambed alteration agreement is obtained from the State of California, Department of Fish and Game.</p>	<p>The operator has a California Department of Fish and Wildlife Section 1600 Lake and Streambed Alteration Agreement No. 5-2003-0087 (no expiration date) which covers in-channel river mining areas that have been proposed to be mined. This permit is available for P&D staff review on request. P&D staff has verified with the operator that no changes in mining are proposed which would require a revised Streambed Alteration Agreement. The requirement that the operator obtain the requisite California Department of Fish and Wildlife Section 1600 Lake and Streambed Alteration Agreement prior to commencement of in-channel river mining is adequate to mitigate project impacts to biological resources. Therefore no change to Condition No. 28 is recommended</p>

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		at this time.
	<p>29. Mitigation Measure MRP-1-BIO-5 (Western Spadefoot Toad): To reduce potential impacts to the western spadefoot toad, the applicant shall have an agency approved biologist check potential breeding areas for tadpoles prior to disturbance. If present, occupied habitat shall not be disturbed during winter and spring, or until the toads are dispersed. The biologist shall use USFWS-established protocol for surveying and relocation, if available. The applicant shall include a map and brief discussion of any breeding ponds avoided, or disturbed in the Periodic mining/monitoring report.</p>	<p>The operator complies with Condition Nos. 29 through 35 by submitting, as applicable, the required special species studies for proposed mining areas in the 5-year periodic MRPs. Studies for the following species are provided depending upon the proposed area of disturbance, season and physical features of the area: Western Spadefoot Toad, Southwestern Pond Turtle, California Red-Legged Frog, Badgers, Arroyo Southwestern Toad, Southwestern Willow Flycatcher/Other Sensitive Bird Species, Tri-Colored Blackbird, and any changes in special-status species. Any biological reports included with the MRP's are reviewed with the assistance of the P&D staff Biologist who peer reviews studies and conducts site visits to confirm conditions on the ground as needed. P&D staff/ Biologist work with the operator during the review and approval of MRP's to ensure that potential impacts to special species are minimized according to the specifications of this condition and recommendations outlined in the sensitive species reports. The operator further minimizes impacts to special species by prohibiting mining</p>
	<p>30. Mitigation Measure MRP-1-BIO-6 (Southwestern Pond Turtle): To reduce potential impacts to southwestern pond turtle, the applicant shall have an agency approved biologist check pools and streams for occurrence before direct or indirect disturbance by mining activities. If present, the turtles shall be netted and relocated to appropriate suitable habitat onsite, in established or existing wetlands, or adjacent to the site (to be determined by the biologist). The biologist shall use USFWS-established protocol for surveying and relocation, if available. The applicant shall include a map showing source and receiving ponds, a brief discussion of any ponds avoided or disturbed in the summer and fall, and numbers of turtles moved in the</p>	

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	<p>Periodic mining/monitoring report.</p> <p>31. Mitigation Measure MRP-1-BIO-7 (California Red-Legged Frog): To reduce potential impacts to California red-legged frog , the applicant shall have an agency approved biologist survey suitable habitat areas and permanent pools or flowing water areas. The biologist shall use USFWS-established protocol for surveying if available. The applicant shall include a map and brief discussion of any breeding areas avoided or disturbed in the Periodic mining/monitoring report. If impacts to California red-legged frog are anticipated, the applicants shall demonstrate compliance with the Endangered Species Act of 1973, as amended, through the ACOE Section 7 consultation process with the USFWS for activities potentially affecting this species. Conservation measures such as avoidance of potential habitat and seasonal restrictions on mining operations may be established by the USFWS and shall be implemented by the applicant as required by the conditions of an ACOE permit.</p> <p>32. Mitigation Measure MRP-1-BIO-8 (Badgers): To reduce potential impacts to badgers, a Agency approved biologist shall check possible badger dens for animals prior to land disturbance. If occupied, dens shall be avoided, where feasible, during the spring and early summer. The applicant shall document the location of any encountered</p>	<p>when the river is actively flowing with water and between the months of September to December. P&D staff and Biologist monitor implementation of recommendations from sensitive species studies during annual SMARA field inspections. P&D staff is currently reviewing the 2014 MRP (which proposes off-channel mining only) to verify the need for special studies for proposed mining areas and to determine consistency with this condition. This condition requires special species studies as well as future studies for species that may be listed as endangered or threatened (Federal or State) in the future. The requirement to survey current and future special-status species prior to the commencement of mining proposed in periodic 5-year MRP's adequately mitigates project impacts to special status species as required by these conditions. Therefore, no changes to Condition Nos. 29, 30, 31, 32, 33, 34, and 35 are recommended at this time</p>

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	badger dens in the annual mining/monitoring report.	
	<p>33. Mitigation Measure MRP-1-BIO-9 (Arroyo Southwestern Toad): To reduce potential impacts to Arroyo Southwestern Toad, the applicant shall have an agency approved biologist survey suitable habitat areas and permanent pools or flowing water areas during the spring breeding season in areas where mining or other disturbance is proposed to take place. The biologist shall use USFWS-established protocol for surveying if available. The applicant shall include a map and brief discussion of any breeding areas avoided or disturbed in the Periodic mining/monitoring report. If impacts to Arroyo Southwestern Toad are anticipated, the applicants shall demonstrate compliance with the Endangered Species Act of 1973, as amended, through the ACOE Section 7 consultation process with the USFWS for activities potentially affecting this species. Conservation measures such as avoidance of potential habitat, seasonal restrictions on mining operations may be established by the USFWS and shall be implemented by the applicant as required by conditions of any ACOE permit.</p>	
	<p>34. Mitigation Measure MRP-1-BIO-10 (Southwestern Willow Flycatcher & Other Sensitive Bird Species): To protect sensitive avian species, the applicants shall demonstrate compliance with the Endangered Species Act</p>	

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	<p>of 1973, as amended, through the ACOE Section 7 consultation process with the USFWS for activities potentially affecting these species. In conjunction with submittal of the Periodic mining plan, the applicant shall have an agency approved biologist conduct avian surveys in the spring to check for sensitive bird species including the southwestern willow flycatcher, least Bell's vireo, California yellow warbler, and yellow-breasted chat in any suitable habitat that would be directly or indirectly affected by mining operations. If listed or sensitive bird species are encountered, the applicant shall not disturb or conduct mining adjacent to those areas between April and September, except as may be permitted by the U.S. Fish and Wildlife Service or other agencies with jurisdiction. Conservation measures such as avoidance of suitable habitat, seasonal and operational restrictions may be established by the USFWS and shall be implemented by the applicant as required by the conditions of an ACOE permit. The biologist shall use USFWS-established protocol for surveying, if available.</p> <p>35. Mitigation Measure MRP-1-BIO-11 (Changes in Species Status): To protect species that may be listed as endangered or threatened (Federal or State) in the future, the applicant shall have an agency approved biologist conduct sensitive species surveys of areas approved for mining in the upcoming Periodic MRP. If future listed species are</p>	

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	<p>expected to be impacted by mining activities, the applicant shall demonstrate compliance with the ESA through a new Section 7 consultation with USFWS or a Section 10A permit issued by USFWS, and/or consultation with the California Department of Fish and Game, whichever is appropriate. The biologist shall use USFWS-established protocol for surveying, if available. Any conservation measures and conditions required by USFWS shall be implemented to the satisfaction of the ACOE. The applicant shall submit proof of compliance with this measure (letter or copy of permit) to the Counties involved.</p>	
	<p>36. Mitigation Measure MRP-1-BIO-12 (Tree Protection Replacement): To protect existing native trees, the applicant shall have a tree protection and replacement program prepared by an Agency-approved biologist. The Agency approved plan and mitigation shall be implemented prior to disturbance of native trees in each Periodic MRP. The program shall include an updated native tree inventory for each area proposed to be mined. Impacted native trees shall be mitigated by: avoidance of direct or indirect impacts; by revising proposed excavations; removal and transplanting of selected trees if determined likely to be successful by the biologist; or tree replacement as noted below. An assessment of the tree protection and replacement program and its success shall be included in the annual mining/monitoring report. The program shall be</p>	<p>To date, mining activities have not resulted in impacts to and/or removal of any trees requiring a Tree Protection and Replacement Program. If mining operations in the future impact trees at the project site, Condition No. 36 would apply. No change to Condition No. 36 is recommended at this time.</p>

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	<p>integrated into ongoing reclamation and shall include but not be limited to the following components:</p> <p>Program Elements shall be graphically depicted and noted as conditions on Periodic mining and reclamation plans.</p> <ul style="list-style-type: none"> a) The location and extent of dripline for all native trees that would be affected by mining operations and the type and location of any feasible protective measures for such trees. b) Equipment storage and staging areas shall be designated on approved grading and building plans outside of dripline areas. c) Only designated trees shall be removed. d) Any native trees which are removed and/or damaged (more than 25% of root zone disturbed) shall be replaced with one gallon size saplings grown from locally obtained seed, and for willows, with locally obtained cuttings in conjunction with reclamation plan implementation. Where necessary to remove a tree and feasible to replant, trees shall be boxed and replanted. Drip irrigation system with a timer shall be used for all planted trees. Trees affected in each Periodic MRP shall be 	

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	<p>replaced as indicated above, prior to or concurrently with completion of mining for that Periodic MRP. Any trees planted shall be irrigated and maintained until self-sustaining or for five years. The plantings shall be protected from predation by wild and domestic animals, and from human interference by the use of staked, chain link fencing and gopher protection during the maintenance period.</p> <p>e) Maintenance of all native trees planted shall be accomplished through water-conserving irrigation techniques.</p> <p>f) Specimen trees of significance designated to be salvaged shall be boxed and replanted in an approved location within the project area.</p> <p>Any unanticipated damage that occurs to trees or sensitive habitats resulting from surface mining operations shall be mitigated in a manner approved by the agencies. This mitigation may include but is not limited to posting of a performance security, tree replacement and hiring of an outside consultant biologist to assess the damage and recommend mitigation. The required mitigation shall be done immediately under the direction of the agencies prior to any further work occurring on site. Any performance</p>	

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	<p>securities required for installation and maintenance of replacement trees will be released by the agencies after inspection and approval of such installation.</p>	
	<p>37. Mitigation Measure MRP-1-BIO-20 (Foraging/Movement): To reduce impacts on wildlife movement and re-establish foraging area as rapidly as possible, in-channel mining and subsequent revegetation of the Santa Maria/Sisquoc River corridor shall occur in accordance with the following standards:</p> <p>a) No isolated, local in-channel pits shall be permitted. Mining within inundated areas of the channel shall not be permitted. The in-channel mining shall be done in a progressive, sequential manner by widening existing channel areas as excavation advances upstream and downstream. Excavation shall occur in a manner that will allow for concurrent, ongoing reclamation to maximize habitat function and value throughout the life of the project. Areas requiring bank protection as determined by the County Flood Control District and ACOE shall be revegetated by the applicant if feasible based on the method approved by the District and the ACOE. Bank protection techniques which allow revegetation to occur are preferred. Revegetation of protected banks shall utilize native, fast growing, plants that will quickly cover the area and thrive in a rocky environment. Local shrubby native species</p>	<p>The operator has mined areas of the Santa Maria/Sisquoc River corridor in accordance with this condition. The operator designs grading for mined areas so that no in-channel pits are created and prohibits mining in inundated areas. Further, the operator reserves setbacks from the bank so that no bank revegetation is required subsequent to mining. To date, no hard bank protection measures or bank revegetation have been necessary at the mine site. As applicable, the operator provides updates on the status of in-channel mining in the Santa Maria/Sisquoc River corridor in each 5-year periodic MRP. This information is reviewed with the assistance of the P&D staff Biologist who conducts site visits as needed to ensure proposed/completed revegetated areas promote wildlife foraging/movement and are completed according to the specifications of this condition. P&D staff has verified compliance with this condition during the review and approval of the 2003 and 2011 MRP's. P&D staff and as appropriate, Biologist also inspect the condition of in-channel</p>

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	<p>suggested include: California Wild Rose (<u>Rosa californica</u>), Wild Blackberry (<u>Rubus ursinus</u>), Chaparral Morning Glory (<u>Calystegia macrostegia</u>, subspecies <u>cyslostegia</u>), Mugwort (<u>Artemesia douglasiana</u>), Creek clemantis (<u>Clemantis ligusticifolia</u>). Species selection shall be dependent upon the nature of the habitat and the species composition of adjacent areas.</p>	<p>mining areas during annual SMARA field inspections. P&D staff is currently reviewing the 2014 MRP which proposes no in-channel mining and as such does not trigger Condition No. 37. The operator's compliance with mining practices outlined in this condition support the development and maintenance of foraging/movement areas for wildlife species and are sufficient to mitigate project impacts to biological resources. No change Condition No. 37 is recommended at this time.</p>
	<p>38. Mitigation Measure MRP-1-BIO-13 (Wildlife Corridor): To provide a wildlife corridor through the project site, Kaiser Sand and Gravel, Inc. shall establish the "Ledges Unit" and a 100-foot wide area north of the proposed river mining (measured from the toe of the final cut slope) as an open/conservation easement or reserve this area as open space through some other agency accepted legal mechanism (Easement areas shall not allow access by the general public except as necessary in conjunction with public road crossings.)</p>	<p>The mining operator has been working towards establishing a 100-foot wide wildlife corridor along the north side of the river across all property owned by Lehigh Hanson Aggregates. This corridor was determined to be adequate for wildlife movement as specified in Condition No. 38. This corridor will be completed upon cessation of all mining in this area. When this occurs, the operator will dedicate the corridor through a protective easement recorded with the County. P&D staff has verified the progressive establishment of this wildlife corridor during annual SMARA field inspections. Upon completion of the 100-foot wide wildlife corridor, compliance with this condition will be</p>

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		clearly demonstrated. Therefore, Condition No. 38 when finally implemented, would effectively mitigate the biological impacts of the project and no change to this condition is recommended at this time.
	<p>39. Mitigation Measure MRP-1-BIO-14 (In-Channel Structures): Outlet structures and grade control/stabilization structures shall minimize disturbance to the natural drainage and native vegetation. Use of hard bank structures shall be avoided where feasible. Where such structures must be utilized, natural rock or ungrouted rip rap may be used where determined feasible by the agencies for bank protection so that vegetation can be established. If the agencies determine that concrete must be used, then prefabricated crib wall construction shall be used rather than pouring concrete. Rock grouting shall only be used if no other feasible alternative is available as determined by the agencies. All proposed drainage devices and grade control/stabilization structures shall be placed in the least environmentally damaging locations. The least environmentally damaging locations shall be identified in a report prepared by an agency approved engineer prior to agency approval for any in-channel structures. The applicant shall submit an engineering study and biological impact assessment which describes impacts expected from installation of the proposed structures into the existing</p>	To date, mining activities have not resulted in the need to construct hardbank, outlet or grade control/stabilization structures. If mining operations in the future require said structures, Condition No. 39 would apply. No change to Condition No. 39 is recommended at this time.

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	stream channel. Additional mitigation measures suggested by this study shall be considered by the agencies in their review of subsequent permits for any in-channel structures.	
	40. Mitigation Measure MRP-1-BIO-15 (Grazing Restrictions during Revegetation): All areas proposed to be actively revegetated shall be protected from livestock grazing if determined to be necessary by the County during and after planting until all plants are determined to be self-sustaining by the agencies or for a maximum of five years from initial planting, whichever period is shorter.	No livestock grazing occurs at the mine site triggering Condition No. 40. If livestock grazing occurs in the future, this condition would apply. No change to Condition No. 40 is recommended at this time.
	41. Mitigation Measure MRP-1-BIO-16 (Noise): To reduce potential noise impacts to sensitive bird species, the location of existing and proposed haul roads in relation to nesting sites of sensitive bird species shall be reviewed as part of each Periodic MRP. Where nesting is found to be occurring adjacent to haul roads, setbacks between haul roads and sensitive bird nesting sites shall be required until any young birds have fledged, if determined to be necessary by the agencies to reduce potentially significant impacts. Such setbacks, if required, shall provide a minimum separation of 100 feet between haul roads and sensitive bird nesting sites. This setback, if required, can apply to all new haul road extensions and to all existing haul roads where feasible and where relocation of the haul road shall not cause other adverse environmental impacts to occur as	As applicable, the operator identifies the location of existing and proposed haul roads in relation to nesting sites of sensitive bird species and provides appropriate setbacks in each 5-year periodic MRP. MRP's are reviewed with the assistance of the P&D staff Biologist who has peer-reviewed bird nesting surveys and conducted site visits as needed to ensure compliance with this condition over the compliance period. P&D staff and Biologist have, and will continue to work with the operator during the review and approval of MRP's to ensure that appropriate setbacks from sensitive bird species are established and potential impacts minimized according to the specifications of this

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	<p>determined by the agencies. Plan Requirements: Prior to extending haul roads, the operator shall provide the agencies with jurisdiction over the sensitive bird species with maps and plans as part of the Periodic MRP showing the existing and proposed haul road route(s) and its distance from adjacent nesting sites.</p>	<p>condition. P&D staff is currently reviewing the 2014 MRP to verify the adequacy of materials submitted, appropriateness of recommended sensitive bird species actions, and to determine consistency with this condition. P&D staff will verify that sensitive bird species setbacks have been implemented in compliance with this condition during periodic site inspections. The requirement that the operator provide adequate setbacks from haul roads in relation to active nesting sites provides adequate protection to young birds until they have fledged. This condition has proven to be sufficient to mitigate project impacts to sensitive bird species. No change to Condition No. 41 is recommended at this time.</p>
	<p>42. Mitigation Measure MRP-1-BIO-22 (Reclamation Plan Implementation): To reduce impacts to County defined wetlands, the applicant-proposed habitat revegetation program shall be implemented in conformance with SMARA Performance Standards for Wildlife Habitat and Revegetation (State Mining and Geology Board, PRC Article 9, §3703 and 3705, respectively) throughout the life of the project (except as specifically modified by project mitigation measures, then such mitigation measures shall take precedence). Within 18 months of approval of the</p>	<p>The operator has submitted in 5-year periodic MRP's landward area surveys and prepared site specific methodologies and contingency plans for areas to be reclaimed pursuant to SMARA performance standards for wildlife habitat and revegetation with the State Mining and Geology Board. MRP's are reviewed with the assistance of the P&D staff Biologist who has peer-reviewed biological studies and conducted site visits as needed to ensure compliance with this</p>

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	<p>project and prior to approval of each Periodic MRP, the applicant's Agency approved biologist shall do the following:</p> <p>a) Survey landward areas (or provide data if previously collected) of undisturbed native vegetation for plant species density and diversity for determining revegetation seeding and success criteria using standard sampling techniques.</p> <p>b) Prepare site specific methodologies for areas to be reclaimed (e.g. ground preparation, weed control, seeding and planting mixes and methods, a schedule for monitoring and maintenance activities, performance criteria) and contingency plans.</p> <p>c) Revegetation shall be completed within two years of completion of surface mining operations within each approved mining area;</p> <p>The applicant shall provide the above information and plans to the agencies. The applicant shall provide a report discussing the reclamation/revegetation activities implemented during the past year and planned for the next year in the annual mining/monitoring report provided to the agencies.</p>	<p>condition over the course of the compliance period. Where revegetation cannot be completed within two years of completion of surface mining due to drought, failure of plantings or seeds to propagate, or for any other reason, P&D staff/Biologists work with the operator to ensure reclamation efforts are ongoing and in compliance with this condition. P&D staff ensures compliance through review and approval of 5-year periodic MRP's, and confirms during inspections of revegetation/reclamation activities during annual SMARA field inspections. P&D staff is currently reviewing the 2014 MRP to verify the adequacy of materials submitted, appropriateness of proposed habitat revegetation activities, and determine consistency with this condition. It should be noted, this condition requires that revegetation be completed within two years of completion of surface mining operations. While this requirement serves to expedite revegetation and reclamation, staff has found that due to environmental factors in the field (i.e. failure of plants to propagate or drought) this timeframe is not always achievable. Staff works with the operator to identify other revegetation practices to adjust to environmental</p>

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		factors in the field to ensure that mitigation plantings are successful. If initial plantings fail for any reason, replanting is required until vegetation is determined to be established. Therefore, the mitigation strategy set forth in Condition No. 42, along with staff's ability to adjust performance based upon unforeseen circumstances, allows staff to recommend that Condition No. 42 continues to effectively mitigate the biological impacts of the project and no change to this condition is recommended at this time.
Cultural Resources		
Potential disturbance of sensitive cultural resources due to excavation.	3. Mitigation Measure MRP-1B-ARCH-2 (Phase I Review): All new off-channel mining areas shall be subject to a Phase 1 archaeological survey pursuant to County Archaeological Guidelines (if not previously prepared) and if required, Phase 2 and Phase 3 studies shall be performed if significant resources are encountered and potential impacts are unavoidable. All work shall be funded by the applicant.	The Specific Plan Environmental Impact Report (EIR) included an archeological assessment of the project area. The operator is required to complete a Phase I Archaeological Survey for all new off-channel mining areas not considered in the Specific Plan EIR as part of the MRP review process. A Phase I Archaeological Survey (1998) was completed for proposed mining within the Carranza and Davis basins which were reviewed and approved as part of the 2003 and 2011 MRP's. MRP's are reviewed with the assistance of the P&D staff Archeologist who provides peer

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		<p>review of Archeological surveys and conducts site visits as needed to ensure compliance with this condition. P&D staff is currently reviewing the 2014 MRP which requires a Phase I Archaeological Survey for any proposed off-channel mining areas. If significant resources are encountered and potential impacts are unavoidable, Phase 2 and Phase 3 studies would be performed. P&D staff believes that the requirement for a Phase I and if appropriate, Phase 2 and Phase 3 Archaeological Survey's is sufficient avoid project impacts to archeological sites. Therefore, no changes to Condition No. 3 are recommended at this time.</p>
	<p>4. Mitigation Measure MRP-1B-ARCH-3 (Discovery & Phase II Review): In the event archaeological remains are encountered during grading, work shall be stopped immediately or redirected until a County qualified archaeologist and Native American representative are retained by the applicant to evaluate the significance of the find pursuant to Phase 2 investigations of the County Archaeological Guidelines. If remains are found to be significant, they shall be subject to a Phase 3 mitigation program consistent with County Archaeological Guidelines and funded by the applicant. A formal set of operating and notification procedures related to discovery of cultural</p>	<p>The operator has not encountered archaeological remains which have required compliance with Condition No. 4. In the future, if archaeological remains are encountered, this condition would apply. No changes to Condition No. 4 are recommended at this time.</p>

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	<p>resources shall be established by each operator. These procedures shall include provisions for halting mining work in a specific area pending the outcome of a formal cultural resource evaluation. The applicant shall submit a copy of the operating and notification procedures to the County for review prior to commencement of mining for the first Periodic MRP.</p>	
	<p>5. Mitigation Measure MRP-1B-ARCH-4 (Phase II Requirements): If determined to be necessary pursuant to the recommendations of a Phase I analysis, a Phase 2 subsurface testing program to evaluate the nature, extent, and significance of the cultural resources shall be implemented. This evaluation program shall be designed to assess each archaeological site consistent with County Archaeological Guidelines and shall involve the following:</p> <ul style="list-style-type: none"> a) Controlled hand excavation and surface collection of a representative sample of the site deposit determined by County staff archaeologist, b) A detailed analysis of the material recovered, c) An assessment of cultural resource integrity, d) The preparation of a final report with recommendations for impact mitigation if necessary. Should this program determine that the 	<p>The operator has not encountered archaeological remains which required subsurface testing. In the future, if archaeological remains are encountered which require subsurface testing, Condition No. 5 would apply. No changes to Condition No. 5 are recommended at this time.</p>

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	archaeological sites are significant, a Phase 3 mitigation in the form of data recovery excavation shall be required consistent with County Archaeological Guidelines.	
Hydrology		
Incompatibility with adjacent land uses. Potential for significant, adverse effects on the following: sediment delivery and detention; changes to channels and levees; impacts to bridges, dip crossings, and the buried dam; impacts on beach and sand supply; impacts to downstream aquatic, wetland and riparian resources.	13. Mitigation Measure MRP-1-HYDRO-1 (Periodic Mining & Reclamation Plan): Prior to commencement of surface mining operations for Phase I and coinciding with periodic review of each Section 404 permit after the initial commencement of mining, the applicant shall submit a mining and reclamation implementation plan (MRP) for the upcoming Periodic MRP for review and approval by each applicable agency of jurisdiction. The purpose of the MRP is to provide a method of monitoring compliance with project conditions and mitigation measures on an ongoing basis for the life of the project. All mining and reclamation shall be performed in substantial conformity with each approved Periodic MRP. Substantial conformity shall be determined jointly by each agency responsible for plan review and project monitoring. The applicant shall be responsible for reimbursement of costs associated with plan review and mitigation monitoring incurred by applicable agencies. The accompanying written project description shall include a detailed description of the progression of mining during the permit period. Said plan, and	The operator is required to submit detailed hydrologic mapping, identification of proposed grade stabilization/control structures and hard bank protection, proposed reclamation, future potential residential building sites in areas of off-channel mining (if applicable), private levee/basin maintenance agreement (if applicable), description of in-channel mining (if applicable), and aerial photographs chronicling proposed mining and as part of the 5-year periodic MRP's. MRP's are reviewed and approved by P&D and County Flood Control District staff with the assistance of issue area experts, such as Biologists, Geologists and Grading Inspectors who have peer-reviewed technical studies and conducted site visits as needed. P&D staff have worked with these issue area experts to ensure that required submittals meet the criteria of this condition and have provided the required information necessary to

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	<p>accompanying written project description, shall include the following elements:</p> <p>MRP Plan Requirements: (Note: the plan submittal requirements listed below and the specific mapping and surveying specifications listed may be modified by the County Flood Control District, in consultation with the Planning Agency in each County and the State Department of Conservation, Division of Mines and Geology, should equivalent, less costly methods of providing necessary project monitoring information be available):</p> <p>A. TOPOGRAPHY:</p> <p>1) Contours: Existing and proposed finished contours shall be provided clearly illustrating the depth and extent of excavation for the area proposed to be mined in the upcoming period. Plans shall be prepared at a scale of one inch equals 200 feet at a five foot contour interval for all in-channel areas and a larger scale for all off-channel areas as determined by the County.</p> <p>2) Cross Sections: Typical cross sections showing existing grade, proposed grade at the conclusion of the Periodic MRP mining period and ultimate final grade (as projected by the FLUVIAL 12 model) shall be provided at a scale acceptable to the County Flood Control District for all</p>	<p>evaluate proposed mining and reclamation for each 5-year periodic MRP. Finally, for proposed in-channel river mining, P&D and County Flood Control District staff reviewed the MRP's in 2003 and 2011 in consultation with the Army Corps of Engineers (ACOE). (The operator's Section 404 permit has expired and no in-channel river mining is proposed at this time). P&D staff is currently reviewing the 2014 MRP to verify the adequacy of hydrologic mapping, data, supporting information, and to determine consistency with this condition. Project impacts related to hydrologic resources are adequately mitigated by the requirements of this condition including detailed hydrologic mapping, identification of proposed grade stabilization/control structures and hard bank protection, proposed reclamation, private levee/basin maintenance agreements description of in-channel mining, and aerial photographs submitted with each periodic 5-year MRP. Therefore, no change to the Condition No. 13 is recommended at this time.</p>

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	<p>affected structures, including bridges, levees, grade control structures, and areas of morphological change (these include but are not limited to areas of significant change in channel width, gradient, roughness). In the absence of critical structures or morphological changes within the river, cross-sections shall be provided as required by the County Flood Control District in consultation with all affected agencies. If a grade control structure (e.g. check dam, drop structure) or other engineered structure (e.g. bridge, utility crossing, pipeline, etc.) has been placed across a channel, or any other significant departure in the stream profile is present, cross section at, above and below the feature is required. Where cross sections are proposed adjacent to bridges, the sections shall be measured adjacent to the bridge footings and at least one bridge length away from the bridge in the upstream and downstream directions. Cross sections at each location shall be superimposed for comparison. Cross sections shall also be provided at least one mile upstream and downstream of any proposed in-channel mining area at a minimum interval of 1600 feet or at areas of morphological change (whichever results in less numerous cross sections) unless equivalent cross-sections are provided by any other mine operator. Cross sections shall be provided as indicated above for all in-channel and off-channel mining areas within each proposed Periodic MRP (for off-channel areas, only a “typical” cross section shall be required</p>	

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	<p>describing existing, proposed and ultimate conditions). Cross sections adjacent to critical structures and in areas of morphological change shall be prepared by in-field survey or other method approved by the Flood Control District providing equivalent accuracy. Cross sections for other locations may be computer generated; however, in field verification for any computer generated cross section can be required by the Flood Control District.</p> <p>3) Thalweg Profile: A thalweg profile plot, showing existing and proposed thalweg profiles for the Periodic MRP area(s) shall be prepared using data taken from the cross sections. Each thalweg data point shall be labeled with the corresponding name or number of the cross section from which it originates. All hydraulic controls (e.g. Grade stabilizers, resistant substrates) intersected by the profile shall be labeled. The thalweg plot shall also contain a legend which has the project name, date and California mine identification number.</p> <p>4) Redline Elevations: Redline elevations and appropriate setbacks from critical structures shall be determined for each MRP in conjunction with the County Flood Control District and CALTRANS based on the results of the hydrology model and observations of existing conditions for each critical structure affected by surface mining operations. Such redline elevations and setbacks shall be graphically</p>	

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	<p>depicted on all project plans and in the field through appropriate surveyed monumentation acceptable to the County Flood Control District and CALTRANS.</p> <p>5) Mapping Specifications: All surveys, cross sections, and photogrammetric mapping shall be in conformance with the following specifications:</p> <ul style="list-style-type: none"> I. Vertical control surveys for establishing elevations on the project control, photogrammetric control and cross section end points shall be accomplished in accordance with third-order or higher standards, and referenced to the north American vertical datum of 1988 (NAVD88), or the national geodetic vertical datum of 1929 (ngvd1929) previously known as the sea level datum of 1929. II. Horizontal control surveys for establishing state plane coordinates on the project control, photogrammetric control and cross section end points shall be accomplished to at least third-order class 1 standards. III. The ground control for topographic surveys shall be established in a location where erosion, sedimentation, and mining activities will not 	

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	<p>disturb the survey marker.</p> <p>IV. Photogrammetric mapping, aerial cross sectioning or digital terrain modeling shall meet the specifications set forth in <i>general specifications for photographic mapping, 1979</i>.</p> <p>V. For cross sections and spot elevations and other elevation data points derived from photogrammetry, at least 90% (e90) of all elevations shall be within 0.5 feet of the true elevation in those areas not obscured by vegetation, debris, or structures. No elevation shall be in error by more than 1.0 feet of its true elevation. Contours shall comply with the criteria in <i>general specifications for photographic mapping, 1979</i>. For data points derived from field survey measurements at least 90% (e90) of all such elevations shall be within 0.5 feet of the true elevation. No elevations shall be in error by more than 1.0 feet of its true elevation.</p> <p>VI. Elevations shall be expressed to the nearest 0.1 foot for both ground and photogrammetric based data.</p> <p>VII. The maximum distance between any two terrain data points along a cross section in flat areas or in</p>	

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	<p>areas of constant, uniform grade shall not exceed 100 feet. Data points on each section shall include all breaks in the terrain.</p> <p>VIII. Survey control points for project control and cross section end points shall be permanently monumented using either commercial monuments, #6 (or larger) rebar, 3/4" diameter (or larger) galvanized pipe. Ground control for topographic surveys shall be established in a location where erosion, sedimentation, and mining activities will not disturb or dislocate the survey marker. On projects utilizing photogrammetry, control points shall be targeted and visible in the photographs.</p> <p>IX. Cross section lines shall extend beyond the active channel width and onto any adjoining terrace flooded by a 100-year flood. The end points shall begin and terminate on stable banks where disturbance and bank erosion is not anticipated. Cross section lines shall be oriented normal (perpendicular) to the active channel.</p> <p>X. Cross sections shall be drafted at a readable scale, with a vertical exaggeration appropriate to the dimensions of the site. The cross sections shall be</p>	

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	<p>submitted on a 24"x36" 10 square per inch grid, reproducible medium. Cross sections shall be drafted consistently so that the right bank (rb) of the river is at the right side of the drafted cross section. Zero (0) distance in cross sections is at the left bank (lb) end point. By convention, the right bank is to the right as one faces downstream.</p> <p>XI. Cross section data shall be submitted on a 3.5 inch diskette as a digital (ACAD Ver 12.0 or better), along with a hard-copy print out of the data. The data shall be identified with a California mine identification number and dated.</p> <p>XII. A project cover sheet shall be provided that summarizes the surveying procedures as follows:</p> <ul style="list-style-type: none"> • A certificate and seal placed by the surveyor or engineer in responsible charge for the project. • A control diagram and statement regarding the basis of the horizontal and vertical datums employed, together with government monuments utilized for this purpose. • A description of the benchmarks and horizontal control stations utilized for the survey, the elevation ascribed to the benchmarks, and the coordinates 	

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	<p>ascribed to the horizontal control station.</p> <ul style="list-style-type: none"> • A tabulation of the published values including computed state plane coordinates and descriptions and elevations for the cross section end points and horizontal and vertical control points established in conjunction with the project. • A tabulation listing the reference points, descriptions of the reference points, and distances and elevation differences to the cross section end point. • An accuracy and precision statement certifying the field procedures and confidence level of control and data measurements established in conjunction with the project with reference to the standards referenced under "cross section surveys and drafted cross sections". • A location map with north arrow and scale. • The project name, river or stream name, river mile/station corresponding to the location of the site (when available), affected property owner(s), a key map illustrating all affected assessor's parcel number(s) and California mine identification number. To the extent that other agencies issue permits, such as a county use permit or army corps 	

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	<p>of engineers section 404 permit, or other binding agreements for the project, such as a department of fish and game streambed alteration agreement, these are also identified on the cover sheet.</p> <ul style="list-style-type: none"> • River stationing shall be standardized using numbering and spacing as determined by the County Flood Control District. <p>B. STRUCTURES & IMPROVEMENTS: Any proposed grade stabilization/control structures and hard bank protection for any affected areas shall be indicated on the plans. The designs for such structures shall be prepared by a registered civil engineer and shall be reviewed and approved by the agencies. The proposed timing for construction of such improvements shall be indicated in the written project description that shall accompany each Periodic MRP.</p> <p>C. PROPOSED RECLAMATION: All areas proposed to be reclaimed during the permit period shall be indicated on the plans including the proposed end use, method and timing for completion of reclamation. Performance criteria for measuring the success of reclamation shall be indicated as part of the written project description and shall conform to the requirements of the Surface Mining and Reclamation Act and all applicable local implementing ordinances.</p>	

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	<p>D. OFF CHANNEL MINING: Plans and the written project description for any off-channel mining shall address the following additional requirements:</p> <p>1) A future potential residential building site shall be identified on each legal parcel. Said building site shall be a minimum of one acre in size, located on the perimeter of the parcel, and shall be a minimum of two feet above the 100 year flood elevation in accordance with County Ord. No.3098. Said building site shall be improved in conjunction with completion of reclamation of said parcel. Alternatively, prior to commencement of surface mining operations on any off-channel parcel, the operator shall acquire, or if the parcel is already owned by the operator, restrict, the development rights to said parcel in a form and manner acceptable to County Counsel precluding future development of any habitable structures on said parcel.</p> <p>2) A private maintenance agreement for all required in-stream or tributary grade control/stabilization structures and levees shall be prepared to the satisfaction of the County Flood Control District and County Counsel. Said agreement shall include a requirement to post financial assurances in an amount determined to be adequate by the County Flood Control District for routine maintenance and a sufficient contingency amount for additional maintenance and/or replacement that may be necessary in the event of a</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>major breach. Said financial assurance shall remain posted with the District for a period not to exceed 10 years after completion of final site reclamation unless a persistent pattern of erosion affecting long term maintenance of said levees and structures is observed during the life of the project by the County Flood Control District. If such erosion is observed and adequate remedial measures as determined by the County Flood Control District have not been satisfactorily implemented prior to release of the initial financial assurance, the District may adjust the amount of the financial assurance as necessary and extend the time period in which financial assurances for such maintenance shall remain posted by an additional 10 years. Said maintenance agreement shall also include a "Hold Harmless/Indemnification Agreement" in favor of the County and Flood Control District. Said agreement shall also specify that all channel and basin side slopes and all basin bottoms shall remain undisturbed upon completion of reclamation except as specifically authorized by this maintenance agreement. Said agreement shall run with the land and identify the parties responsible for implementation of the agreement during and after completion of mining and reclamation. Said agreement shall be recorded prior to commencement of mining within each parcel of off-channel land contiguous to a levee. All of the above requirements shall be recorded on the title of each parcel on which</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>mining would occur in the form of a "Notice to Property Owner" subject to the review and approval of County Counsel prior to commencement of mining within each parcel of off-channel land.</p> <p>3) Off-channel shallow pit mining shall be designed to receive and convey interior (pit) and off-site drainage to an acceptable existing drainage course, or shall be retained on-site in a manner acceptable to the County Flood Control District.</p> <p>E. IN-CHANNEL MINING: Plans and the written project description for any in-channel mining shall address the following additional requirements:</p> <p>1) In-channel mining shall be conducted in a manner which shall minimize impacts on sediment transport throughout the river. No isolated, local in-channel pits shall be permitted. Mining within inundated areas of the channel shall not be permitted. The in-channel mining shall be done in a progressive, sequential manner by widening existing channel areas as excavation advances upstream and downstream. Excavation shall occur in a manner that will allow for concurrent, ongoing reclamation to maximize habitat function and value throughout the life of the project.</p> <p>2) A private maintenance agreement for all required in-stream or tributary grade control/stabilization structures and</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>levees shall be prepared to the satisfaction of the County Flood Control District and County Counsel. Said agreement shall include a requirement to post financial assurances in an amount determined to be adequate by the County Flood Control District for routine maintenance and a sufficient contingency amount for additional maintenance and/or replacement that may be necessary in the event of a major breach. Said financial assurance shall remain posted with the District for a period not to exceed 10 years after completion of final site reclamation unless a persistent pattern of erosion affecting long term maintenance of said levees and structures is observed during the life of the project by the County Flood Control District. If such erosion is observed and adequate remedial measures as determined by the County Flood Control District have not been satisfactorily implemented prior to release of the initial financial assurance, the District may adjust the amount of the financial assurance as necessary and extend the time period in which financial assurances for such maintenance shall remain posted by an additional 10 years. Said maintenance agreement shall also include a "Hold Harmless/Indemnification Agreement" in favor of the County and Flood Control District. Said agreement shall also specify that all channel and basin side slopes and all basin bottoms shall remain undisturbed upon completion of reclamation except as specifically authorized by this</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>maintenance agreement. Said agreement shall specify that the applicant is responsible for implementation of the agreement during the life of the project and the property owner is responsible after completion of mining and reclamation. Said agreement shall be recorded prior to commencement of mining and shall remain in effect in perpetuity for each affected parcel. All of the requirements of this condition shall be recorded on the title of each parcel on which in-channel mining would occur in the form of a "Notice to Property Owner" subject to the review and approval of County Counsel prior to commencement of mining within each parcel of land.</p> <p>3) If no in-channel mining is proposed for any Periodic MRP, Planning & Development, in consultation with the County Flood Control District may waive or modify mapping or other plan submittal requirements for these in-channel areas.</p> <p>F. AERIAL PHOTOGRAPHS: three sets of aerial photographs shall be provided by the operator concurrently with submittal of each Periodic MRP depicting the entire project area. Vertical format aerial photographs provide a base for overlays and a reference as to the placement of the cross section lines relative to the features on the ground. The photographs are also used to track sediment transport and fluvial geomorphic trends, note ground disturbance</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>relative to mining and reclamation activities and provide information on vegetative cover. The photographs shall meet the specifications of the County Flood Control District and Planning & Development for purposes of monitoring project impacts. The proposed limits of mining shall be shown as an overlay to these photographs. In addition, all aerial photography provided shall meet the following specifications:</p> <p>1) Aerial stereo photo print(s) shall be submitted that clearly show the site. The print(s) shall be 9"x 9" contact color prints. The negatives of these prints shall be photographically enlarged and screened onto reproducible mylar at a scale of 1 inch = 200'.</p> <p>2) When applicable, the flow at the time the aerial photo was taken, measured in cubic feet per second, shall be determined from published data from the closest stream gauge and is included in the legend. The aerial photograph shall portray low river stage so that dry bars and channel areas proposed for gravel extraction are exposed (above water).</p>	
	<p>14. Mitigation Measure MRP-1-HYDRO-3 (In-Channel Critical Structures): If at any time during the life of the project, the County Flood Control District, Army Corps of Engineers, Public Works Department or CALTRANS, after</p>	<p>To date, there have been no mining activities which have triggered this Condition. If mining activities in the future impact critical structures, levees, in-stream grade stabilization structures,</p>

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>joint consultation, determine that impacts to critical structures (i.e. bridges, levees, in-stream grade stabilization structures, bank protection, pipelines, etc.) within the river are occurring that were not predicted by the FLUVIAL 12 model prepared for the project, the concerned agency shall notify the Planning Agency of each jurisdiction. The Planning Agency may order a temporary cessation of in-channel surface mining operations throughout the affected area if necessary to prevent further adverse impacts from occurring and require the applicant to fund any studies that may be necessary to determine the extent and cause of said impact and necessary mitigation. If said studies determine that surface mining operations conducted by the applicant have directly or indirectly caused or contributed to said impact then the Planning Agency shall refer the project conditional use permit to the County Planning Commission for appropriate action to ensure that the projects' contributions to the impact are fully mitigated. Such mitigation can include, but is not limited to: repair, maintenance, replacement and/or reconstruction of the impacted structure; construction of additional facility/grade stabilization structures; revisions to the approved mining depth, width, location; or, other measures deemed necessary for the protection of critical structures affected by surface mining operations. The applicant will be responsible for reimbursement of costs associated with plan review and</p>	<p>bank protection, or pipelines, Condition No 14 would apply and staff believes the condition is still effective as written. No change to this condition is recommended at this time.</p>

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	mitigation monitoring incurred by the County agencies.	
	<p>15. Mitigation Measure MRP-1-HYDRO-4 (Mining Coordination): In the event that in-channel surface mining operations are not occurring in a coordinated manner between the mine operator and Coast Rock Products with respect to mining sequencing, maintaining approved channel depths, gradients, widths, or any other areas where coordination between the two operators is required by project conditions, the Santa Barbara County Planning & Development Department, in consultation with the County Flood Control District and ACOE, may order in-channel surface mining operations to cease immediately within the affected area under its jurisdiction until the necessary coordination occurs. The applicant will be responsible for reimbursement of costs associated with plan review and mitigation monitoring incurred by County agencies.</p>	<p>The Environmental Manager for both Lehigh Hanson and CalPortland Company coordinate mining between the two operations according to approved reciprocal agreements. To date, there have been no incidents of in-channel mining occurring absent coordination between the two operators. In the future, if efforts between the operators are not coordinated, Conditions 15 and 16 would apply. Further, coordination efforts between CalPortland Construction and Lehigh Hanson Aggregates have proven to be successful as the operator's communicate on an on-going basis to ensure compliance with this condition. Therefore, Conditions 15 and 16 continue to effectively mitigate the hydrologic impacts of the project and no changes to these conditions are recommended at this time.</p>
	<p>16. Mitigation Measure MRP-1-HYDRO-5 (Channel Transition between Operators): In the event that coordination of in-channel mining operations between Kaiser Sand and Gravel and Coast Rock Products is not occurring in accordance with the approved MRP, the Santa Barbara County Planning & Development Department, in consultation with the Flood Control District may order either operator to maintain a specified transitional channel configuration between their respective surface mining</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>operations that is consistent with the approved MRP. Reciprocal access/surface mining easements and/or agreements to the satisfaction of County Counsel and the Flood Control District shall be provided prior to issuance of a land use permit for the first MRP for either operator to ensure that either operator, upon such order can enter onto an identified transition zone within the boundaries of either surface mining operation to excavate the channel to achieve/maintain the approved transition between surface mining operations in accordance with the MRP. Either operator shall be mutually held harmless in advance from carrying out said activities under said order. The applicant will be responsible for reimbursement of costs associated with plan review and mitigation monitoring incurred by County agencies.</p>	
	<p>17. Mitigation Measure MRP-1 -HYDRO-7 (Basin Design): The final design for the Davis and Carranza Basins shall be prepared by a qualified registered professional to Flood Control District standards. The basins shall be constructed according to the following requirements to protect adjacent property, public roads and to promote public safety.</p> <p>a) Basins shall be designed to county standards which include: Final side slopes of basins shall not exceed 2:1 above high water mark (as determined by the County Flood</p>	<p>The operator has successfully constructed the Davis and Carranza Basins with 2:1 and 4:1 slope gradients to County Flood Control District standards and photos of these slopes are on file with P&D staff. However, the east side of the Carranza basin has a temporary slope of 1.5:1 in anticipation of further expansion of the basin. Perimeter fencing along Foxen Canyon Road and adjacent to the basins has also been installed. P&D staff has verified the 2:1 and 4:1 slope gradients and fencing in the field to ensure</p>

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	<p>Control District) plus five feet and 4:1 slope below high water plus five feet; perimeter fencing for the basins (except for the north side of the basins adjacent to the river bank), in conformance with County Flood Control District standards for height, location, spacing, and design shall be required to be installed upon completion of the first Periodic MRP for each basin. Perimeter fencing shall be designed, where feasible to accommodate migration by sensitive animal species.</p> <p>b) The applicant shall be responsible for reimbursement of costs associated with plan review and mitigation monitoring incurred by applicable agencies.</p> <p>c) The operator shall provide the County and Flood Control District with a Hold Harmless Agreement and Indemnification Agreement subject to review and approval by County Counsel for any liability associated with approval, construction, operation, use, maintenance, and monitoring of the basins.</p> <p><i>18. Mitigation Measure MRP-1-HYDRO-8A (Setbacks):</i></p> <p>a) A minimum 200' setback shall be maintained along the south river bank in perpetuity between final basin top of slope and the point of intersection between the 100 year inundation elevation and a 3:1 slope projected upward from</p>	<p>compliance with this condition. P&D staff also continues to verify that the basin slopes and adjacent fencing have been maintained in accordance with this condition during annual SMARA field inspections. Therefore, Condition No. 17 continues to effectively mitigate the hydrologic impacts of the project and no change to this condition is recommended at this time.</p> <p>To date, the operator has not established the minimum 200-foot setback along the south river bank. The California Department of Fish and Game, through the operator's Streambed Alteration Agreement, has directed the operator to maintain a 25 five foot buffer between the toe</p>

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>the final base river bank elevation (see illustrative figure below). The base river bank elevation shall not include colluvial or slope wash debris mantles deposited over the base native, older, fine grained alluvium material of which the banks are comprised (see illustrative figure below). The final reclaimed channel bank shall be graded to a 3:1 slope upon completion of in-channel mining in areas adjacent to the off-channel basins unless P&D and the County Flood Control District jointly determine that the slopes would be stable, not a significant hazard to the public, provide adequate protection to the adjacent pits, and provide habitat value, in their existing condition. If the slopes are allowed to remain in their existing condition based on the criteria listed above, the operator shall provide the County with a “Hold Harmless” agreement and indemnification agreement pertaining to any potential liability that may arise from leaving the slopes in their existing condition.</p> <p>b) Bio-engineered bank protection and/or hardbank protection up to the 100 year inundation elevation, or acceptable alternative measures, can be required at the discretion of the County Flood Control District in order to ensure that the required setback is maintained between the basin side slopes and the river if a persistent pattern of slope erosion is observed. Bank protection shall be designed by a registered civil engineer subject to review and approval by the County Flood Control District and ACOE. The</p>	<p>of the river bank and the footprint of mining. As a result, this requirement will prohibit the operator’s ability to establish a 3:1 slope along the south river bank. The minimum 200-foot setback is based upon the intersection of the 3:1 slope with the 100 year flood levels. P&D staff is currently working with the operator through review of their 5-year MRP to determine how the 200 foot setback will be defined and implemented in the future given the prohibition by the California Department of Fish and Game to establish a 3:1 slope. Basin setbacks from adjoining property lines have been established for the Carranza South; 50 feet from the top of slope of the basin to the Foxen Canyon Road right-of-way; Carranza West; 25 feet between the property line and the existing pit and 50 feet between the property line and the new, expanded pit area; Davis West; 100 feet from the top of slope of the basin to the Foxen Canyon Road right-of-way; Davis South; 100 feet from the top of slope of the basin to the property line. Setbacks between basins are a minimum of 50 feet. Setbacks have been verified in the field by P&D and County Flood Control staff. P&D staff verifies the condition of the setbacks during</p>

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>applicant shall pay plan check and inspection costs incurred by the responsible agency(s).</p> <p>c) Basin setbacks from adjoining property lines shall be as existing except where modified as follows: Carranza South, 50 feet from the top of slope of the basin to the Foxen Canyon Road right-of-way (or edge of pavement, whichever provides a larger setback) Carranza West, 25 feet between the property line and the existing pit and 50 feet between the property line and the new, expanded pit area; Davis West, 100 feet from the top of slope of the basin to the Foxen Canyon Road right-of-way (or edge of pavement, whichever provides a larger setback); Davis South, 100 feet from the top of slope of the basin to the property line. The setback between basins shall be a minimum of 50 feet. All setbacks shall be maintained in accordance with the provisions of the maintenance agreement referenced in condition no. 15(D)(2).</p>	<p>annual SMARA field inspections. The operator has successfully established the required basin setbacks from adjoining property in compliance with this condition. Photos of these setbacks are on file and available for review with P&D. Additionally, the operator is currently working with P&D staff to establish the minimum 200-foot setback along the south river bank. Therefore, Condition No. 18 continues to effectively mitigate the hydrologic impacts of the project and no change to the condition is recommended at this time.</p>
	<p>19. Mitigation Measure MRP-1-HYDRO-9 (Drainage): A registered civil engineer shall design drainage improvements to convey off-site flows and road drainage into or around the proposed basins in an acceptable manner consistent with Section 3706 of the CCR and County Flood Control District regulations. Said drainage shall be provided during mining operations and upon final mine reclamation. Plans shall be reviewed and approved by</p>	<p>The operator has had a registered civil engineer design drainage improvements to convey off-site flows and road drainage into or around the proposed basins, and submit encroachment analysis in accordance with the County's Floodplain Management Ordinance in compliance with these conditions. The operator documents the above information in the 5-year</p>

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	County Public Works and County Flood Control District. The applicant shall be responsible for reimbursement of costs associated with plan review and mitigation monitoring incurred by applicable agencies.	periodic MRP's which are reviewed with the assistance of issue area experts, such as Geologists and County Flood Control District staff who perform peer review of technical studies and conduct site visits as needed. P&D staff work with these issue area experts to ensure that required drainage and floodway encroachment meet the criteria of this condition and provide the required information necessary to evaluate proposed mining and reclamation for the subsequent period of mining identified in the 5-year periodic MRP. P&D staff also consults with County Flood Control District staff in the review and approval of MRP's. P&D staff verifies the condition of drainage improvements and floodway encroachment during annual SMARA field inspections. P&D staff has reviewed and approved MRP's in 2003 and 2011. P&D staff is currently reviewing the 2014 MRP to verify the adequacy of materials submitted, appropriateness of drainage improvements and floodway encroachment in compliance with these conditions. The operator has established drainage improvements and floodway encroachment analysis in accordance with the requirements of the County's Floodplain
	20. Mitigation Measure MRP-1-HYDRO-10 (Floodway Encroachment): Prior to construction of any improvements in the regulatory floodway of the river channel, the applicant shall submit an encroachment analysis in accordance with the County's Floodplain Management Ordinance 3098.	

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		<p>Management Ordinance to ensure appropriate flood protection. Strict compliance with County's Floodplain Management Ordinance fully mitigates the projects impacts to hydrologic resources and no failures in the improvements made by the operator have been observed. Therefore, Condition Nos. 19 and 20 continue to effectively mitigate the hydrologic impacts of the project and no changes to these conditions are recommended at this time.</p>
	<p>21. Mitigation Measure MRP-1-HYDRO-11 (Future Modeling): In the event that modifications are requested by the applicant pertaining to approved in-channel surface mining operations, or in the event that flood flows have substantially altered the channel configuration as determined by the County Flood Control District, in consultation with other responsible agencies, the District may require the operator to reanalyze sediment transport, geomorphological, and flood conveyance impacts with an approved model (or other approved method). The purpose of this re-evaluation would be to determine whether either the proposed modifications or interaction of previously approved mining with the changes to the project setting would result in new or more severe potentially significant impacts on sediment transport and/or river morphology. If such new or more severe impacts are predicted to occur and</p>	<p>To date, no actions have occurred that have triggered Condition Nos. 21 and 22. Actions that may trigger these conditions include the operator requesting modification to the approved in-channel mining operations, flood flows substantially altering the channel configuration, or if an affected agency determines that erosion is occurring and needs to be rectified. In the event any of these actions occur in the future, these conditions would apply and staff believes the condition is still effective as written. No changes to Condition Nos. 21 and 22 are recommended at this time.</p>

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	<p>the agencies determine that existing project mitigation measures and conditions would not adequately address such impacts, the conditional use permit may be re-opened with respect to all in-channel mining areas and referred to the Planning Commission in each County for review. The Planning Commissions may add, replace, modify or rescind project conditions as necessary to address any new or more severe potentially significant impacts.</p> <p>22. Mitigation Measure MRP-1-HYDRO-12 (Tributary Erosion):</p> <p>a) Prior to approval of each Periodic MRP Review, the County, in consultation with the ACOE, shall determine whether in-channel mining is causing or is likely to cause head-cutting at the following river tributaries: Tepusquet Creek, Kelly Canyon Creek, Foxen Canyon Creek, Long Canyon, Olivera Canyon or any other unnamed tributaries. If, in the opinion of the County and ACOE, head-cutting is likely to occur, the County and ACOE may require modifications to in-channel mining practice as necessary to minimize the potential for tributary head-cutting. Such modifications may include, but are not limited to: revised channel gradients, setbacks from the confluence of river tributaries, changes in mining depth to provide acceptable transitions between tributaries and the river, engineered</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>grade stabilization structures.</p> <p>b) Grade stabilization structures shall only be required if alternative means to address the potential for tributary head-cutting are not feasible. Should grade stabilization structures prove to be necessary, separate permitting and environmental review for said structures shall be required by the County and the ACOE. Grade stabilization structures shall be designed to minimize adverse impacts on river morphology, riparian and wetland vegetation, and fish migration. Any approved stabilization structures shall be designed by a registered civil engineer. Any stabilization structures shall have crest elevations similar to the natural streambed. Construction of any stabilization structures shall be inspected by the County with permit, plan check and inspection fees paid by the applicant.</p> <p>c) If new, unanticipated adverse impacts (such as head-cutting, aggradation, degradation, bank erosion) occur, attributable to approved mining operations, that are beyond those identified in the original impact analysis, then the applicant(s) shall be required to mitigate such impacts to the maximum extent feasible to the satisfaction of the County of Santa Barbara and ACOE in conformance with Section 3710(c) CCR. If the additional mitigation is not effectively reducing impacts to less than significant levels, the agencies shall have the authority to curtail and/or stop mining which</p>	

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
	<p>is causing or contributing to these impacts pursuant to SMARA Section 2774.1</p> <p>d) The applicant shall be responsible for the maintenance and repairs of any required grade stabilization structures throughout the life of the mining project. Maintenance thereafter shall be worked out between the applicant and the property owner(s). However, each property owner shall ultimately be responsible for adequate maintenance of all structures in conformity with Flood Control District requirements. Existing and prospective property owners shall be informed through recordation of a “Notice to Property Owner,” of the estimated level of effort/cost of maintaining grade control structures. The applicant shall pay plan check and inspection costs incurred by the responsible agency(s).</p>	
	<p><i>23. Mitigation Measure MRP-1-HYDRO-13 (Levee Design) :</i></p> <p>a) Prior to approval of the first Periodic MRP, any new levees and levee hard bank protection shall be designed by a registered civil engineer and reviewed and approved by the Santa Barbara County Flood Control District and other permitting agencies. Said design shall assure protection against breaching caused by overtopping, erosion due to high velocity flows, and piping failure.</p>	<p>To date, the operator has not constructed new levees which require review and approval by the County Flood Control District and other permitting agencies. In the future, if levees are proposed, Condition No. 23 would apply and staff believes the condition is still effective as written. No changes to Condition No. 23 are recommended at this time.</p>

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	<p>b) If any levees breach or are subject to imminent breach as determined by the County Flood Control District, either during or after completion of surface mining operations, then the applicant or successor property owner shall be required to reconstruct the levees or complete other remedial action as directed by the County Flood Control District before any mining proceeds in the affected area or as set forth in the approved maintenance agreement. Any levee reconstruction shall conform to all applicable project conditions pertaining to design, location, setbacks, slopes as determined by the County Flood Control District. The applicant shall pay plan check and inspection costs incurred by the responsible agency(s).</p> <p>c) Slopes on the south river side of levees and/or mined creek bank areas shall be ultimately reclaimed and constructed as 3:1 or flatter slopes. Levees shall have a minimum top width of 50 feet. Berms located between off-channel pits shall have a minimum top width of 50 feet. Slopes along the north side of the river shall not exceed 2:1 with a minimum setback of 25 feet between the top of slope and the adjoining property line.</p>	
	<p>24. Mitigation Measure MRP-1-HYDRO-14 (Crossing Maintenance): The applicant shall maintain or modify dip crossings at Tepusquet, during normal and low flow years for the life of the project to the satisfaction of the County</p>	<p>A bridge has been installed at this river crossing therefore, the operator has not been required to maintain or modify dip crossings. In the future, if conditions in the field change, Condition No. 24</p>

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	Public Works Department and Flood Control District.	would apply and staff believes the condition is still effective as written. No changes to Condition No. 24 are recommended at this time.
Noise		
Potential for mining and related activities to expose surrounding uses to increased noise levels due to expansion of mining operations into previously undisturbed areas and increased truck traffic due to increased production levels.	10. Mitigation Measure MRP-1B-NOISE-1 (Hours of Operation): Nighttime mining operations (10 p.m. to 6 a.m.) shall not be allowed in areas within 1,600 feet of existing residential structures to avoid nighttime noise impacts.	No nighttime mining occurs at the site. P&D staff verifies with the operator throughout the duration of operations that nighttime mining operations are not occurring. P&D staff would investigate noise complaints to ensure compliance with this condition. P&D staff has not received complaints that the operator conducts nighttime mining operations between the hours of 10:00 PM to 6:00 AM. Therefore, Condition No. 10 continues to effectively mitigate the noise impacts of the project and no change to this condition is recommended at this time.
	11. Mitigation Measure MRP-1B-NOISE-2 (Noise Shielding): Any new equipment purchased to replace unusable equipment shall be fitted with noise shielding and muffling devices. The operator shall inspect equipment periodically to ensure that it is working effectively and in compliance with new noise level regulations.	New equipment is required to have noise shielding and muffling devices. Verification that equipment is working properly occurs during routine vehicle and equipment maintenance activities conducted by the operator. Staff has reviewed vehicle maintenance records and verified with the operator during annual SMARA field inspections that maintenance activities which ensure noise

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
		shielding devices have been working properly were completed. P&D staff has not received complaints regarding excessive noise from mining equipment. Therefore, Condition No. 11 continues to effectively mitigate the noise impacts of the project and no change to this condition is recommended at this time.
	<p><i>12. Mitigation Measure MRP-1B-NOISE-3 (Pit Noise):</i> Prior to Periodic MRP approval for any mining in the Carranza Pit or Davis pit, Kaiser Sand and Gravel shall submit an acoustic study (prepared by a County approved consultant) to evaluate potential noise impacts from surface mining operations on the existing residences located on parcels adjoining the project site and fronting on Foxen Canyon Road at the southwest corner of the project site. Should the noise levels from planned mining operations be found to violate County interior noise thresholds (45 DbA CNEL Interior), then the applicant shall either fund the necessary retrofit to ensure that noise levels affecting these residences do not exceed County standards; acquire the development rights to these parcels; or implement any other method for reducing noise to acceptable levels subject to review and approval of the County prior to commencement of mining.</p>	The operator is required to submit noise studies prior to 5-year periodic MRP approval for any mining in the Carranza or Davis pit. MRP's are reviewed with the assistance a qualified noise consultant who peer-reviews the technical studies and conducts site visits as needed to verify the adequacy of noise mitigations and to ensure that mining activities do not violate County interior noise thresholds. P&D staff would investigate noise complaints to ensure compliance with this condition. P&D staff has verified that noise mitigation activities were implemented for the compliance period pursuant to this condition. Staff reviewed and approved the 2003 and 2011 MRP's and is currently reviewing the 2014 MRP which requires an updated noise study to comply with this condition. To date, P&D staff has not received complaints regarding pit noise from mining

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		operations. Therefore, Condition No. 12 continues to effectively mitigate the noise impacts of the project and no change to the condition is recommended at this time.
Risk of Upset		
Potential for undermining bridges and pipelines; accidental spill of hazardous materials; creation of steep slopes which may be hazardous if unauthorized access occurs; potential for fire related to project operations; potential for exposing residential/agricultural development to increased flood hazard due to excavation.	6. Mitigation Measure MRP-1B-HAZ-2 (Leak Inspections): To reduce impacts from spillage of petroleum products, the operators shall inspect roads, equipment and trucks daily for leakage and take corrective action to eliminate any leakage discovered immediately.	The operator conducts daily inspections of mine site roads, equipment and trucks to identify and if necessary eliminate petroleum spills or leaks. Routine vehicle and equipment maintenance activities are also performed to detect and repair petroleum leaks. Records of vehicle maintenance are available for P&D staff review on request. Recently, the operator began documenting petroleum spills or leaks in a daily log. This daily log is also available for P&D staff review on request. Staff has reviewed inspection records required by this condition and verified with the operator during annual SMARA field inspections that leak inspections occur on a daily basis. The required leak inspections pursuant to this condition are sufficient to mitigate the projects risk impacts and no change to Condition No. 6 is recommended at this time.
	7. Mitigation Measure MRP-1B-HAZ-3 (Fencing &	The operator has installed barbed wire and chain-

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	<p><i>Slopes</i>). To protect public safety, the operator shall berm or fence (with warning signs in either case) any detention basins/inundation basins or other areas of ponded water in conformance with County Flood Control District standards (except for the north side of the basins adjacent to the river bank). No final pit slope shall exceed a gradient of 4:1 below a point five feet above the maximum expected high water elevation. Completed pits shall be designed and developed in accordance with all applicable SMARA requirements, including Section 3704 (Backfilling, Regrading, Slope Stability and Recontouring) of the State Mining and Geology Board Reclamation Regulations.</p>	<p>link fencing along the south perimeter of the mine site adjacent to Foxen Canyon Road. The north perimeter of the site is adjacent to Sisquoc river. Additionally, the operator has designed detention/inundation basins in conformance with County Flood Control District standards and no final pit slopes exceed a gradient of 4:1 five feet or more below the maximum expected high water elevation. P&D staff has verified in the field the required fencing, detention basins and gradient of pit slopes to ensure compliance with this condition. P&D staff also verifies the condition of the fencing, detention/inundation basins and gradient of pit slopes during annual SMARA field inspections. The requisite fencing and detention/inundation basin design in conformance with County Flood Control District standards adequately mitigate potential impacts to public safety. Therefore, no change to Condition No. 7 is recommended at this time.</p>
Transportation		
Potential for increases in peak hour traffic associated with long term increases in	<p>43. Whenever feasible, both operators shall provide incentives to encourage material haulers to pick-up or deposit aggregate materials during non-peak traffic hours (peak hours are considered to be 7:00-9:00 am and 4:00-</p>	<p>To date, the operator has not identified a feasible means to encourage material haulers to pick-up or deposit aggregate materials during non-peak traffic hours. P&D staff has not received</p>

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
production.	6:00 pm during weekdays).	complaints regarding truck trips during peak hours (7:00-9:00 am and 4:00-6:00 pm during weekdays) from the mine site. However, staff has discussed non-compliance with the operator and required that they schedule pick-up of materials for various customers during the night shift/non-peak traffic hours as a means to comply with this condition, similar to what is done at the nearby CalPortland facility. Now that the operator begins pick-up and deposit of materials during non-peak traffic hours, Condition No. 43 effectively mitigates the transportation impacts of the project and no change to the condition is recommended at this time.
Groundwater Quality/Risk of Upset		
Potential for accidental spillage of hazardous/toxic material into the SP Milling off-channel mining pits which could cause local contamination of groundwater.	44. In order to improve safety at the Foxen Canyon Road right-angle turn, warning bumpers shall be installed on Foxen Canyon Road subject to County Public Works Department, Roads Division, review and approval.	The Public Works Department, after inspecting conditions in the field, determined that right-angle turn/warning bumpers were not necessary pursuant to this condition. This information is included in a letter dated October 16, 2000 on file with P&D and available for review. In the future, if the County Public Works Department determines right-angle turn/warning bumpers should be installed, Condition No. 44 would apply. Condition No. 44 does not require

Impact	Corresponding Mitigation Measures/Conditions of Approval	Implementation
		implementation at this time due to the Public Works Department determination that right-angle turn/warning bumpers are not necessary.