SAN DIEGO COUNTY AIR POLLUTION CONTROL DISTRICT 10124 Old Grove Rd. San Diego, CA 92131

> VULCAN MATERIALS COMPANY CARROLL CANYON FACILITY SITE ID 6306 RISK REDUCTION PLAN REPORTING YEAR 2021

Prepared For:

Vulcan Materials Company 10051 Black Mountain Rd. San Diego, CA 92126

Project No: VULCN-23-3103 Contact: Scott Taylor Date: March 5, 2025



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Part I EXECUTIVE SUMMARY

This risk reduction plan and associated application, prepared by Taylor Environmental Services, on behalf of Vulcan Materials Company (Vulcan) details the risk reduction plan (RRP) for the Aggregate Plant, Recycled Asphalt Plant, Hot Mix Asphalt plant and Cement Treated Base plant located at 10051 Black Mountain Rd., San Diego, CA 92126.

On September 4, 2024, Vulcan received approval of the 2021 Health Risk Assessment (HRA). The approved HRA determined an occupational risk of 2.84 for the Acute Health Hazard Index and a maximum occupational Chronic Health Hazard Index of 1.98. Pursuant to Rule 1210 (e)1, HRA's resulting in a risk equal to or greater than 1.0, above the significant risk threshold, a risk reduction audit and plan is required.

In accordance with San Diego Air Pollution Control District Rule 2010 (e) (1)

- (1) Within 180 days of receipt of written notice from the Air Pollution Control Officer that a stationary source's most recent approved health risk assessment indicates health risks at or above the significant risk threshold(s), the owner or operator shall submit to the Air Pollution Control Officer, for completeness review and approval, a risk reduction audit and plan. For the purpose of this section, the significant risk threshold for maximum individual cancer risk shall be:
 - (i) equal to or greater than 10 in one million for emissions inventory years 2018 and later, or
 - (ii) equal to or greater than 100 in one million for emissions inventory years prior to 2018.

The risk reduction audit and plan shall comply with the requirements of Subsection (e)(2). Such risk reductions shall be accomplished within five years of the date the plan is approved by the Air Pollution Control Officer unless an extension has been granted pursuant to Subsections (e)(4) or (e)(5).

- (2) The risk reduction audit and plan submitted by the owner or operator shall be accompanied by appropriate application(s) to implement the plan and contain all of the following:
 - (i) The name and location of the stationary source.
 - (ii) A facility risk characterization which includes an updated emissions inventory report and health risk assessment, if the risk due to total facility emissions has increased to above or decreased to below the levels indicated in the previously approved health risk assessment.
 - (iii) The identification of all the emission unit(s) for which the owner or operator proposes to reduce toxic air contaminant emissions and the identification of the airborne toxic risk reduction measures proposed for implementation to reduce such emissions, and the anticipated emission and health risk reductions.

- (iv) A schedule for implementing the proposed airborne toxic risk reduction measures within five years. The schedule shall include specific increments of progress towards implementing the airborne toxic risk reduction measures.
- (v) A demonstration, including supporting documentation such as emission calculations, that the proposed airborne toxic risk reduction measures will reduce or eliminate toxic air contaminant emissions from the stationary source. The demonstration shall be made through analogy with the approved health risk assessment for the stationary source or by submission of a revised forecast risk assessment. The demonstration also shall include any foreseeable new or increased emissions of toxic air contaminants from the stationary source and the estimated health risks resulting from such new or increased emissions during the period approved for implementation of the risk reduction audit and plan.
- (vi) A schedule for providing progress reports on reductions in emissions of toxic air contaminants and estimated health risks achieved under the implemented plan. Progress reports shall include a technology review, as applicable, that provides an update on new emissions reducing technologies, and shall be provided not less frequently than within 12 months from when the plan is approved, and annually thereafter, and may be incorporated into emission inventory report updates required pursuant to Section 44344 of the California Health and Safety Code.

Part II Project Description

A. Business B	Background
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1.	Name	Vulcan Materials Company
2.	Owner	Vulcan Materials Company
3.	Contact	Patricia Hernandez - Environmental Specialist
		10051 Black Mountain Rd. San Diego, CA 92126 (424) 318-5983
4.	Facility Address	10051 Black Mountain Rd. San Diego, CA 92126 (Site ID 6306)
5.	Business Description	Aggregate Plant, Recycled Asphalt Plant (RAP), Hot Mix Asphalt Plant and Cement Treated Base Plant (CTB)

B. Description of Facility

Vulcan Materials Company operates an aggregate plant, recycled asphalt plant, Hot Mix asphalt plant and a cement treated base plant located at 10051 Black Mountain Rd., San Diego, CA 92126 (Site ID 06306). Refer to Figure 1 below for a vicinity map detailing the location of the site.

This facility produces aggregate, hot mix asphalt, RAP and CTB. The asphalt is comprised of aggregate and asphalt oil. The facility mines and processes aggregate at the site. The aggregate is stored in open stockpiles and wetted to control PM emissions. RAP is delivered to the site by trucks and processed for sale directly to customers or to be used in the asphalt mix. CTB is prepared on demand when projects require it. The aggregate from the site is blended with cement that is delivered to the site and stored in a silo. The Asphalt plant is fed through open stockpiles which are located over an underground conveyor system. The drum dryer/mixer fired on natural gas which heats the aggregate and asphalt oil to proper mixing temperatures. The finished product is then conveyed to storage silos and loaded into trucks. The facility produces State of California Standard Specification asphalt concrete mixes, which typically consist of $\frac{3}{4}$ ", $\frac{1}{2}$ ", $\frac{3}{8}$ " asphalt



Figure 1 - Vicinity Map

Part III Risk Reduction

A. Emission Sources

The Vulcan facility contains the following emission units that contribute to public health risks above the significant mitigation levels:

- Aggregate Facility (point and volume sources)
- Recycled Asphalt Conveying and Screening (point and volume sources)
- Cement Treated Base Plant (point source)
- Asphalt Dryer Baghouse (point sources)
- All Stockpiles (area source)
- All Unpaved and paved haul roads (line volume sources)
- Quarrying Activities (area source)

B. Risk Contribution

According to the 2021 HRA approval, dated September 4, 2024, the haul roads and aggregate facility contributes the most to the total Acute and Chronic health risks at the facility, as seen in the tables below.

Table 1 - Acute Health Risk Contribution at MEIR

Source	Maximum Acute % Contribution	
Aggregate Facility	49.4%	
Haul Roads	43.8%	

Table 2 - Acute Health Risk Contribution at MEIW

Source	Maximum Chronic % Contribution	
Aggregate Facility	48.7%	
Haul Roads	46.9%	

Table 3 - Chronic Health Risk Contribution at MEIW

Source	Maximum Chronic % Contribution	
Haul Roads	85.2%	
Recycle Asphalt Plant	6.1%	

Specific toxic air contaminates (TACs) that contribute the most to overall health risk under the Acute and Chronic risk scenario are detailed in Tables 4 and 5.

Table 4 - Specific TAC Health Risk Contribution Acute

TAC	Maximum Acute	
Nickel	100%	

TAC	Maximum Chronic	
Arsenic	85%	
Silica	10%	
Nickel	5%	

Table 5 - Specific TAC Health Risk Contribution Chronic

C. Risk Reduction Evaluation

1. Shutdown of Aggregate Processing Equipment

As described in the 2017 Risk Reduction Plan (RRP), the Carroll Canyon facility has downsized the mining and aggregate processing operations. This transition was completed in 2023 and has resulted in a significant portion of the dry and wet portion of the aggregate processing operation to be shutdown. The list of sources removed from the health risk assessment, as outlined in the 2017 RRP, are described below in table 6. A map of the eliminated sources is shown in Figures 2 and 3.

Source ID	Source Type	Description		
D12	Volume	5 ½ STD Cone Crusher		
D1233A	Volume	Rock Plant Conveying		
D1233B	Volume	Rock Plant Conveying		
D1233C	Volume	Rock Plant Conveying		
D2A	Area	Storage Pile		
D2B	Area	Storage Pile		
D2443	Area	Storage Pile Wash		
D27	Volume	S7 Screen		
D28	Volume	S8 Screen		
D13	Volume	5 ½ Shorthead Cone Crusher		
1233	Area	Quarrying Activities		

Table 6 - List of Sources Removed from the Health Risk Assessment

2. Increased Haul Road Watering Frequency (2-hr Intervals)

A 95% control efficiency was applied to paved and unpaved roads from applying water every two hours. The control efficiency of 95% from watering at 2-hour intervals is stated in San Diego APCD's Haul Road Emissions guidance document last updated December 2023. A 95% control efficiency was applied to the following haul road sources: D32A-I, D328605A-P, D5A-G, D78910A-F. A spreadsheet detailing the revised haul road emission calculations has been provided along with the other modeling files.



Figure 2 - Map of Eliminated Sources



Figure 3 – Map of Eliminated Sources Continued

Table 7 summarizes the results of the health risk assessment at the Point of Maximum Impact (PMI) after implementing the changes to the model described above.

HRA Scenario	PMI Receptor	UTM (x)	UTM (y)	Hazard Index (HI)
Acute Hazard Index	1400	487892.68	3640184.04	0.46
Occupational Chronic Hazard Index	768	487766	3640017	1.31

Table 7 - Summary of Health KISK Assessment at Point of Maximum impact (PM	Table 7 - Summar	y of Health Risl	k Assessment at	Point of M	aximum Im	pact (PM
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The point of maximum impact for the acute hazard index is below 1. A risk results table for the 50 receptors with the highest acute risk can be found in Attachment "A". The proposed risk reduction plan satisfies the district's threshold of 1 for the maximum occupational and residential acute Hazard Index.

Table 8 summarizes the results of the occupational chronic hazard index after implementing the risk reduction measures. The Maximally Exposed Individual Worker (MEIW) located on-site at Cemex is below the hazard index threshold of 1.

Description	Receptor No.	UTM (x)	UTM (y)	Hazard Index (HI)
Cemex Highest On-site Receptor (MEIW)	1406	487932.68	3640184.04	0.84
Robertson's Highest On-site Receptor	1334	488291.11	3640136.23	0.67

Table 8 – Summary of Occupational Chronic Risk

A risk results table for the 50 receptors with the highest occupational chronic risk can be found in Attachment "B". The proposed risk reduction plan satisfies the district's threshold of 1 for the maximum occupational and residential chronic Hazard Index.

The HARP modeling files and controlled haul road emissions calculations used for the risk reduction plan can be found at the following link:

https://www.dropbox.com/scl/fo/n0c0z09z6j0c4pj9cqd3j/APh2nLQLjpvCB9kq-Xdl4S4?rlkey=dkl5rh5it683s8pl1ixpksxr8&st=1sdz45qj&dl=0

D. Risk Reduction Schedule

1. Aggregate Plant Decommissioning

As stated in the 2017 RRP, Vulcan submitted an application to modify the Permit to Operate for the Aggregate plant (APP870745) which removed a major portion of the aggregate processing plant. The equipment and stockpiles were decommissioned at the end of March 2023. The revised HRA discussed in Section

C demonstrates the modification has reduced the Hazard Index thresholds below both Acute and Chronic Indexes.

2. Paved and Unpaved Haul Road Watering at 2-Hour Intervals

Vulcan currently operates a water truck that is actively watering roads every 2 hours at the time of this risk reduction plan submittal. Therefore, the emissions reductions have already been realized, and the risk reduction requirements are fully satisfied.

ATTACHMENT "A"

ACUTE HRA RESULTS

*HARP - HRACalc v22118 11/1/2024 3:24:57 PM - Acute Risk - Input File: C:\Users\Modeling 1\Documents\Vulcan CC 2021 HRA\HARP VULCAN CC 2021 HRA\hra\acuteHRAInput.hra

REC	GRP	NETID	Х	Y SCENARIO	CV	CNS	IMMUN	KIDNEY	GILV	EPRO/DEVE	RESP	SKIN	EYE	30NE/TEETH	ENDO	BLOOD	ODOR	GENERAL	MAXHI
1400 A	ALL.		487892.7	3640184 NonCancer	4.54E-01	4.55E-01	4.57E-01	0.00E+00	0.00E+00	4.61E-01	2.85E-03	0.00E+00	9.17E-03	0.00E+00	0.00E+00	6.58E-03	0.00E+00	0.00E+00	4.61E-01
1406 A	ALL		487932.7	3640184 NonCancer	4.54E-01	4.54E-01	4.55E-01	0.00E+00	0.00E+00	4.59E-01	2.57E-03	0.00E+00	6.33E-03	0.00E+00	0.00E+00	4.54E-03	0.00E+00	0.00E+00	4.59E-01
1403 A	ALL		487912.7	3640184 NonCancer	4.47E-01	4.47E-01	4.49E-01	0.00E+00	0.00E+00	4.52E-01	2.64E-03	0.00E+00	7.57E-03	0.00E+00	0.00E+00	5.43E-03	0.00E+00	0.00E+00	4.52E-01
1407 A	ALL.		487932.7	3640204 NonCancer	4.23E-01	4.23E-01	4.27E-01	0.00E+00	0.00E+00	4.28E-01	2.49E-03	0.00E+00	7.36E-03	0.00E+00	0.00E+00	5.28E-03	0.00E+00	0.00E+00	4.28E-01
785 A	ALL		488021	3640017 NonCancer	3.66E-01	3.67E-01	4.24E-01	0.00E+00	0.00E+00	3.75E-01	2.63E-03	0.00E+00	1.26E-02	0.00E+00	0.00E+00	9.01E-03	0.00E+00	0.00E+00	4.24E-01
1115 A	ALL.		488016.3	3640016 NonCancer	3.65E-01	3.66E-01	4.23E-01	0.00E+00	0.00E+00	3.75E-01	2.63E-03	0.00E+00	1.27E-02	0.00E+00	0.00E+00	9.09E-03	0.00E+00	0.00E+00	4.23E-01
1532 A	ALL		488016.3	3640016 NonCancer	3.65E-01	3.66E-01	4.23E-01	0.00E+00	0.00E+00	3.75E-01	2.63E-03	0.00E+00	1.27E-02	0.00E+00	0.00E+00	9.09E-03	0.00E+00	0.00E+00	4.23E-01
1404 A	ALL .		487912.7	3640204 NonCancer	4.12E-01	4.12E-01	4.17E-01	0.00E+00	0.00E+00	4.18E-01	2.56E-03	0.00E+00	8.39E-03	0.00E+00	0.00E+00	6.02E-03	0.00E+00	0.00E+00	4.18E-01
1401 A	ALL .		487892.7	3640204 NonCancer	4.05E-01	4.06E-01	4.10E-01	0.00E+00	0.00E+00	4.12E-01	2.60E-03	0.00E+00	8.78E-03	0.00E+00	0.00E+00	6.30E-03	0.00E+00	0.00E+00	4.12E-01
1397 A	ALL		487872.7	3640184 NonCancer	4.04E-01	4.05E-01	4.07E-01	0.00E+00	0.00E+00	4.11E-01	2.54E-03	0.00E+00	8.37E-03	0.00E+00	0.00E+00	6.01E-03	0.00E+00	0.00E+00	4.11E-01
1405 A	ALL		487912.7	3640224 NonCancer	3.97E-01	3.97E-01	4.02E-01	0.00E+00	0.00E+00	4.03E-01	2.51E-03	0.00E+00	8.42E-03	0.00E+00	0.00E+00	6.04E-03	0.00E+00	0.00E+00	4.03E-01
1394 A	ALL .		487852.7	3640184 NonCancer	3.93E-01	3.94E-01	3.92E-01	0.00E+00	0.00E+00	3.99E-01	2.40E-03	0.00E+00	7.09E-03	0.00E+00	0.00E+00	5.09E-03	0.00E+00	0.00E+00	3.99E-01
1402 A	ALL .		487892.7	3640224 NonCancer	3.90E-01	3.91E-01	3.96E-01	0.00E+00	0.00E+00	3.97E-01	2.52E-03	0.00E+00	9.07E-03	0.00E+00	0.00E+00	6.51E-03	0.00E+00	0.00E+00	3.97E-01
1408 A	ALL .		487932.7	3640224 NonCancer	3.91E-01	3.91E-01	3.96E-01	0.00E+00	0.00E+00	3.97E-01	2.41E-03	0.00E+00	7.74E-03	0.00E+00	0.00E+00	5.55E-03	0.00E+00	0.00E+00	3.97E-01
1398 A	ALL.		487872.7	3640204 NonCancer	3.86E-01	3.87E-01	3.91E-01	0.00E+00	0.00E+00	3.93E-01	2.46E-03	0.00E+00	8.65E-03	0.00E+00	0.00E+00	6.20E-03	0.00E+00	0.00E+00	3.93E-01
1116 A	ALL.		487996.4	3640016 NonCancer	3.39E-01	3.40E-01	3.91E-01	0.00E+00	0.00E+00	3.48E-01	2.52E-03	0.00E+00	1.25E-02	0.00E+00	0.00E+00	8.95E-03	0.00E+00	0.00E+00	3.91E-01
1533 A			487996.4	3640016 NonCancer	3.39E-01	3.40E-01	3.91E-01	0.00E+00	0.00E+00	3.48E-01	2.52E-03	0.00E+00	1.25E-02	0.00E+00	0.00E+00	8.95E-03	0.00E+00	0.00E+00	3.91E-01
784 A			488006	3640017 NonCancer	3.33E-01	3.34E-01	3.84E-01	0.00E+00	0.00E+00	3.42E-01	2.50E-03	0.00E+00	1.25E-02	0.00E+00	0.00E+00	8.93E-03	0.00E+00	0.00E+00	3.84E-01
1395 A			487852.7	3640204 NonCancer	3.74E-01	3.74E-01	3.76E-01	0.00E+00	0.00E+00	3.79E-01	2.34E-03	0.00E+00	7.76E-03	0.00E+00	0.00E+00	5.56E-03	0.00E+00	0.00E+00	3.79E-01
783 A			487991	3640017 NonCancer	3.27E-01	3.28E-01	3.77F-01	0.00F+00	0.00F+00	3.36E-01	2.47E-03	0.00E+00	1.25E-02	0.00F+00	0.00E+00	8.94E-03	0.00F+00	0.00E+00	3.77E-01
1117 A			487976.6	3640016 NonCancer	3.21E-01	3.22E-01	3.69E-01	0.00E+00	0.00E+00	3.31E-01	2.45E-03	0.00E+00	1.24E-02	0.00E+00	0.00E+00	8.89E-03	0.00E+00	0.00E+00	3.69E-01
1534 A			487976.6	3640016 NonCancer	3.21E-01	3.22E-01	3.69E-01	0.00E+00	0.00E+00	3.31E-01	2.45E-03	0.00E+00	1.24E-02	0.00E+00	0.00E+00	8.89E-03	0.00E+00	0.00E+00	3.69E-01
780 A			487946	3640017 NonCancer	3.20F-01	3.21E-01	3.66F-01	0.00F+00	0.00F+00	3.28E-01	2.31E-03	0.00E+00	1.07F-02	0.00F+00	0.00E+00	7.65E-03	0.00F+00	0.00E+00	3.66F-01
1399 A			487872.7	3640224 NonCancer	3.55E-01	3.55E-01	3.60F-01	0.00E+00	0.00E+00	3.61F-01	2.32E-03	0.00E+00	8.92E-03	0.00E+00	0.00E+00	6.40E-03	0.00E+00	0.00E+00	3.61F-01
1396 A			487852.7	3640224 NonCancer	3.54F-01	3.55E-01	3.58F-01	0.00E+00	0.00E+00	3.60F-01	2.27E-03	0.00E+00	8.19E-03	0.00E+00	0.00E+00	5.88E-03	0.00E+00	0.00E+00	3.60F-01
782 A			487976	3640017 NonCancer	3.07F-01	3.08E-01	3.53E-01	0.00E+00	0.00E+00	3.17E-01	2.38E-03	0.00E+00	1.24F-02	0.00E+00	0.00E+00	8.86E-03	0.00E+00	0.00E+00	3.53E-01
765 A			487721	3640017 NonCancer	3.45E-01	3.46E-01	3.52E-01	0.00E+00	0.00E+00	3.51E-01	2.59E-03	0.00E+00	8.47E-03	0.00E+00	0.00E+00	6.08E-03	0.00E+00	0.00E+00	3.52E-01
766 A			487736	3640017 NonCancer	3.44F-01	3.44F-01	3.50F-01	0.00F+00	0.00F+00	3.50E-01	2.54E-03	0.00E+00	7.99E-03	0.00F+00	0.00E+00	5.73E-03	0.00F+00	0.00E+00	3.50E-01
1114 A			488036.1	3640016 NonCancer	3.06E-01	3.06E-01	3.50E-01	0.00E+00	0.00E+00	3.14E-01	2.27E-03	0.00E+00	1.12E-02	0.00E+00	0.00E+00	8.02E-03	0.00E+00	0.00E+00	3.50E-01
1531 A			488036.1	3640016 NonCancer	3.06F-01	3.06E-01	3.50E-01	0.00F+00	0.00F+00	3.14F-01	2.27E-03	0.00E+00	1.12F-02	0.00F+00	0.00E+00	8.02E-03	0.00F+00	0.00E+00	3.50E-01
1130 A			487718.5	3640016 NonCancer	3.43E-01	3.43E-01	3.50E-01	0.00E+00	0.00E+00	3.49F-01	2.57E-03	0.00E+00	8.46F-03	0.00E+00	0.00E+00	6.07E-03	0.00E+00	0.00E+00	3.50E-01
1547 A			487718.5	3640016 NonCancer	3.43E-01	3.43E-01	3.50F-01	0.00E+00	0.00E+00	3.49F-01	2.57E-03	0.00E+00	8.46E-03	0.00E+00	0.00E+00	6.07E-03	0.00E+00	0.00E+00	3.50E-01
786_A			488036	3640017 NonCancer	3.04F-01	3.04F-01	3.48F-01	0.00E+00	0.00E+00	3.12F-01	2.26E-03	0.00E+00	1.12E-02	0.00E+00	0.00E+00	8.03E-03	0.00E+00	0.00E+00	3.48E-01
1129 A			487738.3	3640016 NonCancer	3.39F-01	3.39E-01	3.45F-01	0.00E+00	0.00E+00	3.45E-01	2.48F-03	0.00E+00	7.82E-03	0.00E+00	0.00E+00	5.61E-03	0.00E+00	0.00E+00	3.45F-01
1546 A			487738.3	3640016 NonCancer	3.39F-01	3.39E-01	3.45F-01	0.00E+00	0.00E+00	3.45E-01	2.48E-03	0.00E+00	7.82E-03	0.00E+00	0.00E+00	5.61E-03	0.00E+00	0.00E+00	3.45E-01
 767 A			487751	3640017 NonCancer	3.36F-01	3.36E-01	3.41F-01	0.00E+00	0.00E+00	3.42F-01	2.42E-03	0.00E+00	7.46E-03	0.00E+00	0.00E+00	5.35E-03	0.00E+00	0.00E+00	3.42E-01
781 4			487961	3640017 NonCancer	2 98F-01	2 99E-01	3 42E-01	0.00E+00	0.00E+00	3.07E-01	2.31E-03	0.00E+00	1 18E-02	0.00E+00	0.00E+00	8 47E-03	0.00E+00	0.00E+00	3 42E-01
777 4			487901	3640017 NonCancer	3 18E-01	3 18E-01	3.41E-01	0.00E+00	0.00E+00	3 23E-01	2.01E 00	0.00E+00	6 44F-03	0.00E+00	0.00E+00	4.62E-03	0.00E+00	0.00E+00	3.41E-01
710 4			486911 1	3640059 NonCancer	2 82F-01	2.82F-01	3.38E-01	0.00E+00	0.00E+00	2 85E-01	1 40F-03	0.00E+00	3.85E-03	0.00E+00	0.00E+00	2 76E-03	0.00E+00	0.00E+00	3 38E-01
787 4			488051	3640017 NonCancer	2.02E 01	2.02E 01 2.91E-01	3.37E-01	0.00E+00	0.00E+00	3.00E-01	2 31E-03	0.00E+00	1 26E-02	0.00E+00	0.00E+00	9.04E-03	0.00E+00	0.00E+00	3.37E-01
768 4			487766	3640017 NonCancer	3.32E-01	3.32E-01	3.36E-01	0.00E+00	0.00E+00	3.37E-01	2.37E-03	0.00E+00	7.35E-03	0.00E+00	0.00E+00	5 28E-03	0.00E+00	0.00E+00	3.37E-01
1128 4			487758 2	3640016 NonCancer	3.32E-01	3.32E-01	3.36E-01	0.00E+00	0.00E+00	3.37E-01	2.38E-03	0.00E+00	7.35E-03	0.00E+00	0.00E+00	5.20E 00	0.00E+00	0.00E+00	3.37E-01
15/5 /			407758.2	3640016 NonCancer	3 32E-01	3 32E-01	3 36F-01	0.00E+00	0.00E+00	3 37E-01	2.30E-00	0.00E+00	7 35E-03	0.00E+00	0.002.00	5.27E-00	0.00E+00	0.00E+00	3 37E-01
1121 /			4077897 1	3640016 NonCancer	3 1/F-01	3.1/F-01	3 34F-01	0.00E+00	0.00E+00	3 19F-01	2.00E-00	0.00E+00	6 29E-03	0.00E+00	0.00E+00	4 51E-03	0.00E+00	0.00E+00	3 3/E-01
1529 /			407007.1	3640016 NonCancer	3 1/E-01	3 1/E_01	3 34E-01	0.002.00	0.002.00	3 10E-01	2.020 00	0.002.00	6 20E-03	0.002.00	0.002.00	4.51E-03	0.002.00	0.002.00	3 34E-01
1000 F 76/ /			487706	3640017 NonCancer	3 26F-01	3 27E-01	3.34F-01	0.0000-000	0.0000	3.32F-01	2.02L-03	0.0000-000	8 45F-03	0.000-00	0.0000-000	4.01E-03	0.0000-000	0.0000-000	3.34F-01
1122 /			487857 4	3640016 NonCancer	3 18F-01	3 18F-01	3 33E-01	0.0002.00	0.00E+00	3.02L-01	2.40L 00	0.00E+00	8 63E-03	0.00E+00	0.002+00	6 19E-03	0.0002.00	0.002+00	3 33E-01
15/0 /			187857 /	3640016 NonCancer	3 185-01	3 185-01	3 335-01	0.0002.00	0.000-00	3.246-01	2.22L-03	0.0002.00	8 63E-03	0.000-00		6 10E-02	0.000-00	0.000-00	3 335-01
1340 F 77/ /			487856	3640017 NonCancer	3 18F-01	3 10E-01	3 33E-01	0.00E+00	0.00L+00	3.24L-01	2.22L-03	0.00E+00	8 6/F-03	0.00L+00	0.00L+00	6 20E-03	0.00E+00	0.00L+00	3 33E-01
1225 /			188201 1	36/0156 NonCancer	3 255-01	3 265-01	3.000-01	0.0002.00	0.000-00	3 325-01	2.201-03	0.0002.00	8 00E-03	0.000-00		5 7/E-02	0.000-00	0.000-00	3 325-01
1000 F			-+00231.1		0.200-01	0.200-01	J.2-+L-01	0.00L 00	0.000000	0.026-01	2.106-03	0.000	0.001-03	0.000000	J.UUL 100	J./ +L-UJ	0.00L 00	J.UUL 100	0.021-01

CHRONIC WORKER HRA RESULTS

ATTACHMENT "B"

CHRONIC WORKER HRA RESULTS

*HARP -	HRACalc v22118 11/1/2024 3:20:01 PM	 Chronic Risk - Input File: C:\Users\Modeli 	ng 1\Documents\Vulcan CC 2021 HRA\HARP	VULCAN CC 2021 HRA\hra\workerchronicHRAInput.hra

REC	GRP	NETID	х	Y	SCENARIO	CV	CNS	IMMUN	KIDNEY	GILV	EPRO/DEVE	RESP	SKIN	EYE	30NE/TEETH	ENDO	BLOOD	ODOR	GENERAL	MAXHI
768	ALL		487766	3640017	NonCancer	1.15F+00	1.31F+00	4.25E-03	1.84F-03	2.04F-04	1.15E+00	1.27F+00	1.15E+00	6.15E-06	0.00F+00	1.08F-06	4.25E-02	0.00F+00	0.00F+00	1.31F+00
767	ΔΙΙ		487751	3640017	NonCancer	1 14F+00	1.30E+00	4 22E-03	1.83E-03	2 03E-04	1 14F+00	1 27E+00	1 14E+00	6.05E-06	0.00E+00	1 07E-06	4 22E-02	0.00E+00	0.00E+00	1.30E+00
769			487781	36/0017	NonCancer	1 13E+00	1.30E+00	4.22E 00	1.00E 00	2.00E 04	1 13E+00	1.27E+00	1.14E+00	6 22E-06	0.00E+00	1.07E 00	4.22E 02	0.00E+00	0.00E+00	1 30E+00
770			487796	3640017	NonCancer	1 12E+00	1.00E+00	4.16E-03	1.80E-03	1 96E-04	1 12E+00	1.20E+00	1.10E+00	6 26E-06	0.00E+00	1.10E-06	4.18E-02	0.00E+00	0.00E+00	1.00E+00
1128			407758.2	3640016	NonCancer	1 12E+00	1.202.00	4.100 00	1.00E-00	1.000-04	1 12E+00	1.23E+00	1.12E+00	6 08E-06	0.0002.00	1.10E-00	4.16E-02	0.002.00	0.002.00	1.202.00
1545			407758.2	3640010		1.12E+00	1.200-00	4.15E-03	1.00L-03	1.00E-04	1.12L-00	1.24L+00	1.12L+00	6.08E-06	0.000100	1.07E-06	4.10L-02	0.000100	0.0001.00	1.200-00
1107			407730.2	2640010		1.12E+00	1.200-00	4.15E-03	1.000-03	1.99E-04	1.12E+00	1.245+00	1.120+00	0.00E-00	0.000000	1.072-00	4.102-02	0.000000	0.000000	1.200-00
112/ /	ALL		40///0	3040010		1.12E+00	1.2005.00	4.15E-03	1.00E-03	1.905-04	1.12E+00	1.24E+00	1.12E+00	0.19E-00	0.000000	1.09E-00	4.10E-02	0.00E+00	0.000000	1.2007.00
1544	ALL		48///8	3640016		1.12E+00	1.28E+00	4.15E-03	1.80E-03	1.98E-04	1.12E+00	1.24E+00	1.12E+00	6.19E-06	0.00E+00	1.09E-06	4.16E-02	0.00E+00	0.00E+00	1.28E+00
/00/	ALL		487736	3640017	NonCancer	1.11E+00	1.2/E+00	4.11E-03	1.78E-03	1.98E-04	1.11E+00	1.23E+00	1.11E+00	5.92E-06	0.00E+00	1.04E-06	4.10E-02	0.00E+00	0.00E+00	1.2/E+00
1126 /	ALL		487797.9	3640016	NonCancer	1.10E+00	1.26E+00	4.08E-03	1.77E-03	1.91E-04	1.10E+00	1.22E+00	1.10E+00	6.25E-06	0.00E+00	1.10E-06	4.10E-02	0.00E+00	0.00E+00	1.26E+00
1543	ALL		48//9/.9	3640016	NonCancer	1.10E+00	1.26E+00	4.08E-03	1.77E-03	1.91E-04	1.10E+00	1.22E+00	1.10E+00	6.25E-06	0.00E+00	1.10E-06	4.10E-02	0.00E+00	0.00E+00	1.26E+00
771	ALL		487811	3640017	NonCancer	1.10E+00	1.25E+00	4.06E-03	1.76E-03	1.88E-04	1.10E+00	1.22E+00	1.10E+00	6.28E-06	0.00E+00	1.11E-06	4.09E-02	0.00E+00	0.00E+00	1.25E+00
1129	ALL		487738.3	3640016	S NonCancer	1.09E+00	1.25E+00	4.06E-03	1.76E-03	1.95E-04	1.09E+00	1.22E+00	1.09E+00	5.92E-06	0.00E+00	1.04E-06	4.05E-02	0.00E+00	0.00E+00	1.25E+00
1546	ALL		487738.3	3640016	S NonCancer	1.09E+00	1.25E+00	4.06E-03	1.76E-03	1.95E-04	1.09E+00	1.22E+00	1.09E+00	5.92E-06	0.00E+00	1.04E-06	4.05E-02	0.00E+00	0.00E+00	1.25E+00
1125	ALL		487817.7	3640016	6 NonCancer	1.07E+00	1.23E+00	3.97E-03	1.73E-03	1.82E-04	1.07E+00	1.19E+00	1.07E+00	6.27E-06	0.00E+00	1.11E-06	4.01E-02	0.00E+00	0.00E+00	1.23E+00
1542	ALL		487817.7	3640016	6 NonCancer	1.07E+00	1.23E+00	3.97E-03	1.73E-03	1.82E-04	1.07E+00	1.19E+00	1.07E+00	6.27E-06	0.00E+00	1.11E-06	4.01E-02	0.00E+00	0.00E+00	1.23E+00
772	ALL		487826	3640017	NonCancer	1.07E+00	1.22E+00	3.94E-03	1.71E-03	1.80E-04	1.07E+00	1.18E+00	1.07E+00	6.28E-06	0.00E+00	1.11E-06	3.98E-02	0.00E+00	0.00E+00	1.22E+00
773	ALL		487841	3640017	NonCancer	1.05E+00	1.20E+00	3.89E-03	1.69E-03	1.75E-04	1.05E+00	1.17E+00	1.05E+00	6.28E-06	0.00E+00	1.11E-06	3.95E-02	0.00E+00	0.00E+00	1.20E+00
1124	ALL		487837.6	3640016	NonCancer	1.05E+00	1.20E+00	3.86E-03	1.68E-03	1.74E-04	1.05E+00	1.16E+00	1.05E+00	6.27E-06	0.00E+00	1.11E-06	3.92E-02	0.00E+00	0.00E+00	1.20E+00
1541	ALL		487837.6	3640016	NonCancer	1.05E+00	1.20E+00	3.86E-03	1.68E-03	1.74E-04	1.05E+00	1.16E+00	1.05E+00	6.27E-06	0.00E+00	1.11E-06	3.92E-02	0.00E+00	0.00E+00	1.20E+00
774	ALL		487856	3640017	NonCancer	1.03E+00	1.18E+00	3.81E-03	1.66E-03	1.69E-04	1.03E+00	1.15E+00	1.03E+00	6.32E-06	0.00E+00	1.12E-06	3.89E-02	0.00E+00	0.00E+00	1.18E+00
765	ALL		487721	3640017	NonCancer	1.03E+00	1.18E+00	3.81E-03	1.66E-03	1.82E-04	1.03E+00	1.14E+00	1.03E+00	5.76E-06	0.00E+00	1.02E-06	3.80E-02	0.00E+00	0.00E+00	1.18E+00
1123	ALL		487857.4	3640016	NonCancer	1.02E+00	1.17E+00	3.76E-03	1.64E-03	1.66E-04	1.02E+00	1.14E+00	1.02E+00	6.34E-06	0.00E+00	1.12E-06	3.85E-02	0.00E+00	0.00E+00	1.17E+00
1540	ALL		487857.4	3640016	NonCancer	1.02E+00	1.17E+00	3.76E-03	1.64E-03	1.66E-04	1.02E+00	1.14E+00	1.02E+00	6.34E-06	0.00E+00	1.12E-06	3.85E-02	0.00E+00	0.00E+00	1.17E+00
1130	ALL		487718.5	3640016	NonCancer	1.01E+00	1.15E+00	3.74E-03	1.62E-03	1.78E-04	1.01E+00	1.12E+00	1.01E+00	5.70E-06	0.00E+00	1.00E-06	3.73E-02	0.00E+00	0.00E+00	1.15E+00
1547	ALL		487718.5	3640016	NonCancer	1.01E+00	1.15E+00	3.74E-03	1.62E-03	1.78E-04	1.01E+00	1.12E+00	1.01E+00	5.70E-06	0.00E+00	1.00E-06	3.73E-02	0.00E+00	0.00E+00	1.15E+00
775	ALL		487871	3640017	NonCancer	9.68E-01	1.11E+00	3.56E-03	1.56E-03	1.57E-04	9.68E-01	1.08E+00	9.67E-01	6.52E-06	0.00E+00	1.15E-06	3.67E-02	0.00E+00	0.00E+00	1.11E+00
1122	ALL		487877.3	3640016	NonCancer	9.60E-01	1.10E+00	3.53E-03	1.54E-03	1.55E-04	9.61E-01	1.07E+00	9.60E-01	6.57E-06	0.00E+00	1.16E-06	3.65E-02	0.00E+00	0.00E+00	1.10E+00
1539	ALL		487877.3	3640016	NonCancer	9.60E-01	1.10E+00	3.53E-03	1.54E-03	1.55E-04	9.61E-01	1.07E+00	9.60E-01	6.57E-06	0.00E+00	1.16E-06	3.65E-02	0.00E+00	0.00E+00	1.10E+00
776	ALL		487886	3640017	NonCancer	9.48E-01	1.08E+00	3.48E-03	1.53E-03	1.52E-04	9.48E-01	1.05E+00	9.48E-01	6.73E-06	0.00E+00	1.19E-06	3.61E-02	0.00E+00	0.00E+00	1.08E+00
764	ALL		487706	3640017	NonCancer	9.16E-01	1.05E+00	3.39E-03	1.48E-03	1.58E-04	9.16E-01	1.02E+00	9.15E-01	5.56E-06	0.00E+00	9.81E-07	3.38E-02	0.00E+00	0.00E+00	1.05E+00
1121	ALL		487897.1	3640016	NonCancer	9.06E-01	1.03E+00	3.33E-03	1.46E-03	1.45E-04	9.06E-01	1.01E+00	9.06E-01	7.04E-06	0.00E+00	1.24E-06	3.47E-02	0.00E+00	0.00E+00	1.03E+00
1538	ALI		487897.1	3640016	S NonCancer	9.06F-01	1.03E+00	3.33E-03	1.46F-03	1.45E-04	9.06F-01	1.01F+00	9.06F-01	7.04F-06	0.00F+00	1.24F-06	3.47E-02	0.00F+00	0.00E+00	1.03E+00
777	ALI		487901	3640017	NonCancer	8.94F-01	1.02F+00	3.28E-03	1.45E-03	1.43E-04	8.94F-01	9.94F-01	8.94F-01	7.22E-06	0.00E+00	1.27E-06	3.42E-02	0.00E+00	0.00E+00	1.02F+00
1131	ALI		487698.6	3640016	S NonCancer	8.70F-01	9.94F-01	3.22E-03	1.40F-03	1.49F-04	8.71F-01	9.67F-01	8.70F-01	5.45E-06	0.00F+00	9.61F-07	3.21E-02	0.00F+00	0.00E+00	9.94F-01
1548	ALI		487698.6	3640016	NonCancer	8.70F-01	9.94F-01	3.22E-03	1.40F-03	1.49E-04	8.71F-01	9.67E-01	8.70F-01	5.45E-06	0.00E+00	9.61E-07	3.21E-02	0.00E+00	0.00E+00	9.94F-01
763			487691	3640017	NonCancer	8 20F-01	9.37E-01	3.03E-03	1.32E-03	1.38E-04	8 20F-01	9 11F-01	8 20F-01	5.30E-06	0.00E+00	9.34E-07	3.02E-02	0.00E+00	0.00E+00	9.37E-01
778			187916	36/0017	NonCancer	7 7/F-01	8.85E-01	2.85E-03	1.02E 00	1.00E 04	7 75E-01	8.63E-01	7 7/F-01	8 /1E-06	0.00E+00	1 /8E-06	3.01E-02	0.00E+00	0.00E+00	8.85E-01
1120			407010	36/0016	NonCancer	7.67E-01	8 76E-01	2.00E 00	1.20E-00	1.20E-04	7.67E-01	8 5/F-01	7.67E-01	8 /8E-06	0.00E+00	1.40E-00	2 98E-02	0.00E+00	0.00E+00	8 76E-01
1527			407017	3640010		7.67E-01	9.76E-01	2.02E-00	1.20E-00	1.240 04	7.67E-01	8 5/E-01	7.67E-01	8 48E-06	0.0002.00	1.50E-06	2.000-02	0.002.00	0.002.00	8 76E-01
1122			407317	3640010		7.67E-01	0.70L-01	2.02L-03	1.20L-03	1.240-04	7.63E-01	8.04L-01	7.63E-01	5.13E-06	0.000100	0.04E-07	2.30L-02	0.000100	0.0001.00	0.70L-01
152 /			407070.7	2640010	NonCancer	7.030-01	0.710-01	2.021-03	1.200-00	1.200-04	7.032-01	0.4701	7.000-01	5.130-00	0.000	0.040-07	2.000-02	0.000	0.000	0.710-01
1549 /	ALL		40/0/0./	3040010		7.03E-01	0.71E-01	2.02E-03	1.232-03	1.20E-04	7.03E-01	0.4/E-UI	7.03E-01	5.13E-00	0.00E+00	9.04E-07	2.00E-02	0.00E+00	0.000000	0.712-01
/62 /	ALL		48/6/6	3640017	NonCancer	7.4/E-01	8.53E-01	2.76E-03	1.21E-03	1.23E-04	7.4/E-UI	8.29E-01	7.4/E-01	5.08E-06	0.00E+00	8.96E-07	2.74E-02	0.00E+00	0.00E+00	8.53E-01
1406	ALL		48/932./	3040184		7.41E-01	0.44E-U1	2.09E-03	1.1/E-03	9.02E-05	7.41E-01	0.22E-01	7.41E-U1	4./5E-06	0.00E+00	0.3/E-U/	2./UE-U2	0.00E+00	0.00E+00	0.44E-01
1403	ALL		48/912.7	3640184	NonCancer	7.18E-01	8.18E-01	2.60E-03	1.14E-03	8./9E-05	/.18E-01	7.96E-01	7.18E-01	4.4/E-06	U.UUE+00	7.88E-07	2.61E-02	U.UUE+00	U.UUE+00	8.18E-01
4392	ALL		48/850	3640000	NonCancer	7.15E-01	8.1/E-01	2.64E-03	1.1/E-03	1.1/E-04	/.15E-01	7.96E-01	/.15E-01	6.53E-06	U.UUE+00	1.15E-06	2./4E-02	U.UUE+00	U.UUE+00	8.1/E-01
4225	ALL		487700	3640000	NonCancer	/.11E-01	8.12E-01	2.63E-03	1.15E-03	1.20E-04	7.11E-01	7.90E-01	/.11E-01	5.17E-06	0.00E+00	9.12E-07	2.64E-02	0.00E+00	0.00E+00	8.12E-01
1400	ALL		487892.7	3640184	NonCancer	7.08E-01	8.06E-01	2.57E-03	1.13E-03	8.75E-05	7.08E-01	7.85E-01	7.08E-01	5.39E-06	0.00E+00	9.51E-07	2.57E-02	0.00E+00	0.00E+00	8.06E-01
4339	ALL		487800	3640000	NonCancer	7.00E-01	7.99E-01	2.58E-03	1.14E-03	1.16E-04	7.00E-01	7.79E-01	6.99E-01	6.20E-06	0.00E+00	1.09E-06	2.65E-02	0.00E+00	0.00E+00	7.99E-01
4282	ALL		487750	3640000	NonCancer	6.87E-01	7.85E-01	2.54E-03	1.12E-03	1.17E-04	6.87E-01	7.64E-01	6.87E-01	5.79E-06	0.00E+00	1.02E-06	2.59E-02	0.00E+00	0.00E+00	7.85E-01

APPLICATION TO THE SAN DIEGO AIR POLLUTION CONTROL DISTRICT 10124 Old Grove Road

San Diego, CA 92131

VULCAN MATERIALS COMPANY CARROLL CANYON FACILITY SITE ID 6306 PERMIT MODIFICATION

Prepared For:

Vulcan Materials Company, Western Division 10051 Black Mountain Rd. San Diego, CA 92126

Project No.: VULCN-23-3103 Contact: Hayden Street Date: March 6, 2025

TAYLOR ENVIRONMENTAL SERVICES

5122 Bolsa Avenue, Suite 101 Huntington Beach, CA 92649 Phone: (714) 587-2595 Fax: (714) 587-2598 www.tayloresinc.com

SAN DIEGO COUNTY AIR POLLUTION CONTROL DISTRICT APPLICATION FEE ESTIMATE

Please complete <u>ALL</u> highlighted fields in the upper section									
Applicant Site ID/EIF ID:		APCD1985-SI	TE-03641	Reason	for Submittal:		Other		
Equipment Type:									
Applicant DBA:			Vulcan Materials	3			Existing Site?	Yes	
Affected Permit Number:							Estimate Date:	3/6/2025	
Equipment Description: RRP application. Estimated fees to review Risk Reduction Plan related to APCD2023-HRA-0008 for facility's 202 emissions									
Special Con	sideratio	ons		Number of Un	its (for equipm	ent types ind	licated as "each")	1	
Oustanding operating fees may be owed No Request Split Payment									
	Applica	ation is a modific	cation/condition chan	ge which does no	ot substantially	alter equipn	nent or emissions	No	
	HRA Fee not applicable because paid with another application, or application does not increase TACs?								
APCD Use On	ly	Ref. No.		ee Balance		1			
ACTIVITY			FEE CLASSIFICATIO	ON	QUANTITY	UNIT COST	SUBTOTAL	TRUST (APCD USE)	
Initial Evaluation Eco				· · ·		I			
Base Engineering Evaluati	ion	T&M Engineering Services			12.0	\$315.00	\$3,780.00	ETM	
		Fixed Fee				·	. ,	EFX	
Additional Evaluation an	d Proces	sing Foos (Pul	a 40(d)(5))						
New Source Review	u FIOCES	T&M Engineeri	na Services					NSR	
		T&M Monitorin	g Services					AQI	
AB2588 Hot Spots (Rule 4 (Health Risk Assessment)	0(f)(6))	HRA Base Esti Services)	mate (Engineering &	Monitoring	12.0	\$315.00	\$3,780	TNS	
NESHAPS/ATCM/NSPS		T&M Engineeri	ng Services					HAP	
CEQA		T&M Engineeri	ng Services					CEQ	
Source Testing		Fixed Fee/T&N	Monitoring Service:	3				STF	
Miscellaneous Fees									
Processing Fee (Rule 40(d)(1)(ii)) 1.0 \$130 \$130.00 EF:								EFX/ETM	
Annual Operating Fee (Rule 40(e)(2)(ii)) \$0.00 REI								REN	
Emissions Fee (Rule 40(e)(2)(iv)) \$0.00 EM									
Split Payment Fee									
NOTES:					ESTIMA ⁻	TE TOTAL:	\$7,690.00		

SPLIT PAYMENT 1 SPLIT PAYMENT 2

(1) This document must be submitted with your application forms and is subject to review by District staff for accuracy.

(2) The fees contained in this estimate are are based on APCD Rule 40. Final fee may be more or less than this estimate (see Rule 40(d)(1)(iii)).

(3) Emissions determined to be greater than 5 tons per year will be charged a emission fee on a ton per year basis. (see Rule 40 (e)(2)(iv)(A))

(4) Fees paid by credit card will be assessed a 2.19% processing fee (see Rule 40(c)(5))

(5) Federal government payments made through DFAS: Please reference the above liste Site ID Record number in your DFAS submittal.

(6) Fees are typically revised on annual basis. This estimate is valid only for applications received prior to any revisions, anticipated to be June 30, 2025.

	Internal Use Only
APP ID: APCD	-APP/CER-
SITE ID: APCD	-SITE-

GENERAL PERMIT OR REGISTRATION APPLICATION FORM



Submittal of this application does not	t grant permissi	ion to construct (or to operate equipment e	except as specified i	in Rule 24(c).					
REASON FOR SUBMITTAL OF A	PPLICATION:									
New Installation		Existing U Existing U or Rule 11 Cha	Inpermitted Equipment ange	Modificatio Permitted Equi	n of Existing pment					
Amendment to Existing Author Construct or Application	ity to	Change of Equipment Location (please provide proof of ownership)								
Change of Permit Conditions		Change Petto Inactive	ermit to Operate Status	Banking En	nissions					
Registration of Portable Equipm	nent	Other (Spe	ecify)							
List affected APP/PTO Record ID(s): <u>APCD2007-P</u>	TO-001233 AF	PCD2008-PTO-000442 APCD20	009-PTO-000443						
APPLICANT INFORMATION	APPLICANT INFORMATION Name of Business (DBA) Vulcan Materials Company Western Division									
Name of Business (DBA) <u>voicen materials company western Division</u> Does this organization own or operate any other APCD permitted equipment at this or any other adjacent locations? Ves I No										
If ves, list assigned Site Record IDs listed on your Permits										
Name of Legal Owner (if different from DBA) Vulcan Materials Company Western Division										
Equipment	Owner		Authority to	Construct Maili	ng Address					
Name: Vulcan Materials Company We	stern Division		Name: Vulcan Materials C	Company Western D	Division					
Mailing Address: 10051 Black Mountain	n Rd		Mailing Address: 10051 BI	ack Mountain Rd						
City: San Diego State: CA	Zip: G	92126	City: San Diego	State: CA	Zip:92126					
Phone: (424) 318-5983			Phone: (424) 318-5983							
E-Mail Address: hernandezpat@vmcm	zpat@vmcmail.com	1								
Permit To Operate Mailing Address Invoice Mailing Address										
Name: Vulcan Materials Company We	stern Division		Name: Vulcan Materials C	Company Western D	Division					
Mailing Address: 10051 Black Mountain	n Rd		Mailing Address: 10051 BI	ack Mountain Rd						
City: San Diego State: CA	Zip: S	92126	City: San Diego	State: CA	Zip: 92126					
Phone: (424) 318-5983			Phone: (424) 318-5983							
E-Mail Address: hernandezpat@vmcm	ail.com		E-Mail Address: hernande	zpat@vmcmail.com	1					
EQUIPMENT/PROCESS INFORMA <u>equipment storage address</u> . If portab	ATION: Type o le, will operatio	of Equipment: In exceed 12 cons	Stationary Dortable Secutive months at the same	e, <u>if portable please</u> ne location 🗌 Yes	<i>enter below the</i> 5 🗌 No					
Equipment Location Address			Cit	y San Diego	State: CA					
Parcel No	Zip	Phone ()E-mail	:						
Site Contact			Phone	()						
General Description of Equipment/Proc	ess									
Application Submitted by Owner	Operator	Contractor	Consultant Affiliation							
EXPEDITED APPLICATION PROCESSING: I hereby request Expedited Application Processing and understand that: a) Expedited processing will incur additional fees and permits will not be issued until the additional fees are paid in full (see Rule 40(d)(8)(iv) for details) b) Expedited processing is contingent on the availability of qualified staff c) Once engineering review has begun this request cannot be cancelled d) Expedited processing does not guarantee action by any specific date nor does it guarantee permit approval.										
This application contains trac	le secret or co	nfidential infor	mation (see reverse for	instructions)						
I hereby certify that all information I SIGNATURE Patricia Hernand	orovided on this	s application is t	ue and correct. Date C	3/06/2025						
Print Name Patricia Hernandez			Compa	any Vulcan Materials C	ompany Western Division					
Phone (424) 318-5983			E-mail	Address hernande	zpat@vmcmail.com					
		Internal U	Use Only							
DateStaff Ini	tials <u>:</u>	Amt Rec'd \$	Fee Sche	edule						
RNP: EMF:		NBF:	TA:	_	GEN_APP_Form_Rev Date: Aug. 2017					

10124 Old Grove Rd. – San Diego - California 92131-1649 – (858) 586-2600

www.sdapcd.org



EXECUTIVE SUMMARY

Vulcan Materials Company is submitting a modification to multiple permit units located at 10051 Black Mountain Road, San Diego, CA 92121. On September 4, 2024, Vulcan received approval of the 2021 Health Risk Assessment (HRA). The approved HRA determined an occupational risk of 2.84 for the Acute Health Hazard Index and a maximum occupational Chronic Health Hazard Index of 1.98. Pursuant to Rule 1210 (e)1, HRA's resulting in a risk equal to or greater than 1.0, above the significant risk threshold, a risk reduction audit and plan was submitted. This modification is being submitted to add a watering schedule condition to the aggregate plant, rock plant, and cement treated base plant permits to reduce the risk to below 1.

As described previously in the Risk Reduction Plan, the Carroll Canyon facility is in the process of decommissioning and removing a major portion of the aggregate processing plant. In addition, to those measures the facility is implementing paved and unpaved haul road watering at 2-hour intervals. This control system will reduce the emissions below the significant risk threshold, fulfilling the SDAPCD requirements.



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Attachment	_	Description
"A"	-	SDAPCD Haul Road Emissions Guidance
"B"	_	Permits



PART I PROJECT DESCRIPTION

A.	Busine	ess Background	
	1.	Name	Vulcan Materials Company, Western Division 500 N. Brand Blvd, Suite 500 Glendale, CA 91203
	2.	Owner	Vulcan Materials Company
	3.	Contact	Patricia Hernandez - Environmental Specialist (424) 318-5983
	4.	Entitlement	Equipment to be owned and operated by Vulcan Materials Company
	5.	Type of Business	California Corporation
	6.	Business Description	Aggregate Plant, RAP Plant, Asphalt Plant, CTB Plant
В.	Туре с	of Application	Modification

C. Description of Facility

1. Location

10051 Black Mountain Road, San Diego, CA 92121

2. General Purpose of Facility

Vulcan Materials Company operates an aggregate plant, recycled asphalt plant, Hot Mix asphalt plant and a cement treated base plant located at 10051 Black Mountain Rd., San Diego, CA 92126 (Site ID 06306).

This facility produces aggregate, hot mix asphalt, RAP and CTB. The asphalt is comprised of aggregate and asphalt oil. The facility mines and processes



aggregate at the site. The aggregate is stored in open stockpiles and wetted to control PM emissions. RAP is delivered to the site by trucks and processed for sale directly to customers or to be used in the asphalt mix. CTB is prepared on demand when projects require it. The aggregate from the site is blended with cement that is delivered to the site and stored in a silo. The Asphalt plant is fed through open stockpiles which are located over an underground conveyor system. The drum dryer/mixer fired on natural gas which heats the aggregate and asphalt oil to proper mixing temperatures. The finished product is then conveyed to storage silos and loaded into trucks. The facility produces State of California Standard Specification asphalt concrete mixes, which typically consist of $\frac{3}{4}$ ", $\frac{1}{2}$ ", $\frac{3}{8}$ " asphalt concrete mix.

- D. Description of Process Modification
 - 1. Paved and Unpaved Haul Road Watering at 2-Hour Intervals

The 2021 risk reduction plan submitted under separate cover details the haul road watering strategy to reduce risk at the facility.

This modification of the permits for the new control measures to the haul roads includes an emissions analysis and an updated HRA to demonstrate the continued compliance with maintaining the operation below the thresholds.

A 95% control efficiency was applied to paved and unpaved roads from applying water every two hours. The control efficiency of 95% from watering at 2-hour intervals is stated in San Diego APCD's Haul Road Emissions guidance document last updated December 2023 (see Attachment A). A 95% control efficiency was applied to the following haul road sources: D32A-I, D328605A-P, D5A-G, D78910A-F. A spreadsheet detailing the revised haul road emission calculations was provided in the risk reduction plan along with the other modeling files.

The following permit units will be modified to include a new condition requiring watering the roads at 2-hour intervals:

- i. APCD2007-PTO-001233 (Rock Plant)
- ii. APCD2008-PTO-000442 (Asphalt Batch Plant)
- iii. APCD2009-PTO-000443 (Cement Treated Base Plant)
- 2. Operating Schedule

There are no planned modifications to the facility operating schedule.



3. Permits

Under Attachment B are the permits which the two hour watering condition will be added for the haul roads.



PART II – RULE 1200 TOXICS AIR QUALITY DISPERSION MODELING DATA

A risk reduction plan has been submitted to SDAPCD under a separate cover which demonstrates that the modification of control measures will reduce the risk below the Acute and Chronic Hazard Indices. The HARP modeling files used for the health risk assessment can be found at the following link:

https://www.dropbox.com/scl/fo/n0c0z09z6j0c4pj9cqd3j/APh2nLQLjpvCB9kq-Xdl4S4?rlkey=dkl5rh5it683s8pl1ixpksxr8&st=cdy4f4uv&dl=0



ATTACHMENT "A"

SDAPCD Haul Road Emissions Guidance

HAUL ROAD EMISSIONS

Date Initiated:

October 5, 1998

Dates Modified / Updated:

November 2, 2021 January 6, 2022 November 28, 2022 December 2023

1.0 INTRODUCTION:

A haul road is a road or a route used by trucks and other vehicles to move raw materials, final products, waste and other production-related materials into, within, or out of the facility. On site vehicle traffic can produce a significant amount of particulate emissions for several types of industries. The presence of trace metals in haul roads emissions is reported in both literature and site-specific source testing. When calculating emissions from haul roads, it is important to distinguish between paved and unpaved roads, since a paved road (concrete or asphalt) will have different physical characteristics than an unpaved (dirt or gravel) road. While present in both paved and unpaved roads activities, particulate emissions are produced due to direct emissions or fugitive emissions from resuspension of particulates and calculated, differently, for each. The following sections provide a brief discussion of each type, as well as the emission estimation techniques and emission factors, currently used by the San Diego Air Pollution Control District (the District).

2.0 Paved Haul Roads:

2.1 Sources of Emissions in Paved Haul Roads:

Particulate emissions from paved roads are due to direct emissions from vehicles in the form of exhaust, brake wear and tire wear emissions and resuspension of loose material on the road surface. Resuspended particulate emissions from paved roads originate from, and result in the depletion of, loose material present on the surface (i.e., the surface loading). In turn, that surface loading is continuously replenished by other sources. At industrial sites, surface loading is replenished by spillage of material and track-out from unpaved roads and staging areas or wind driven dust. In the absence of continuous addition of fresh material, paved road surface loading usually reaches an equilibrium value in which the amount of material resuspended matches the amount replenished. Because of the importance of the surface loading, available control techniques either attempt to prevent material from being deposited on the surface or to remove (from the travel lanes) any material that has been deposited¹.

2.2 Emission Estimation for Paved Haul Roads:

In general, the road particulate emissions are proportional to the number of vehicle miles traveled, road surface silt conditions, the average vehicles weight of vehicles traveling the road and precipitation.

¹ https://www.epa.gov/sites/default/files/2020-10/documents/13.2.1_paved_roads.pdf

For the purposes of determining haul road emissions, silt is defined as particles equal to or less than 75 micrometers (μ m) in physical diameter. Silt loading is defined in AP-42 as "the mass of silt-size material per unit area of travel surface" and is used as a measurement of how much dust is on the road. Silt content represents the proportion of the loose dry surface dust on a road that passes through a 200-mesh screen and is measured using the ASTM-C-136 test method. The surface silt loading provides a reasonable means of characterizing seasonal variability in a paved road emission inventory.²

The District's calculation methodology is based on paved roads emissions from resuspension of loose material on the road surface due to vehicle travel; on the United States Environmental Protection Agency (USEPA) Compilation of Air Pollutant Emission Factors, 5th Edition, Volume 1 (AP-42) Chapter 13 – Miscellaneous Sources, Sections 13.2.1 (Paved Roads, revised January 2011)². The following derived empirical equation is used to evaluate the annual particulate emissions of paved road:

$$E_{a} = (VMT) * [(k) * (sL)^{0.91} * (W)^{1.02} * (1 - \frac{P}{4N})] * (G) * (1 - e)$$
$$E_{h} = \frac{E_{a}}{(D_{a} * H)}$$

Where:

 E_a = Annual emissions of each contaminant, (lbs/year)

 E_h = Maximum hourly emissions of each contaminant, (lbs/hour)

VMT = Vehicle miles traveled on site, (miles/year)

VMT = (Amount Hauled/(Average vehicle weight full – Average vehicle weight empty))

k = Particle size multiplier, (lbs/VMT)

sL = Paved haul road surface silt loading, (in g/m^2). Note: 33.9 $g/m^2 = 1 \text{ oz/yd}^2$

W = Average vehicle weight, (tons)

P = number of "wet" days with at least 0.254 mm (0.01 in) of precipitation during the

averaging period, in the lack of site-specific data, default value of 40 days, as reflected in AP-

42, figure 13.2.1-2, will be used.

N = number of days in the averaging period (365 for annual or 8760 hours)

 C_i = Concentration of each listed substance in the haul road dust, (lbs/lb)

 $D_a =$ Active days during reporting period, (days/year)

H = Hours of operation, (hours/day)

e = Control efficiency, if applicable, (%)

Note: the District has adopted the application of the AP- 42 precipitation correction term to (1-(P/4N)) to account for average uncontrolled conditions (but including natural mitigation) under the simplifying assumption that annual (or other long-term) average emissions are inversely proportional to the frequency of measurable (> 0.254 mm [0.01 inch]) precipitation. The precipitation correction term can be applied on a daily or an hourly basis. Control

efficiencies can be granted for the use of surfactants if proper documentation is provided and approved by the District.

The following table summarizes the default values used by the District for some of the Equation's variables:

Variable	Variable Description	Default Values and Ranges
k	PM-30 Particle size multiplier (lbs/VMT)	0.011 (PM-30, from AP-42 Table 13.2.1-1)
k	PM-10 Particle size multiplier (lbs/VMT)	0.0022 (PM-10, from AP-42 Table 13.2.1-1)
sL	Road surface silt loading	13.6 g/m2 (Usually 7 to 70, Note: this default Median value of District test data (Table.2) will be used as default, unless the site provided site specific ST data or requested the use of AP-42 default values)
sL	Road surface silt loading	0.40 oz./yd2 (typical range is 0.21 to 2.1, Note: this default Median value of District test data (Table.2) will be used as default, unless the site provided site specific ST data or requested the use of AP-42 default values)
е	Control Efficiency	95% for watering at 2-hr intervals. 90% for watering at 4-hr intervals.
е	Control Efficiency	80% for watering at unknown frequency.
е	Control Efficiency	0% (if sweeping only, note: sweeping is accounted for in the site specific sL)

TABLE (1): DEFAULT VALUES - PAVED H	AUL ROADS
		I DEI ADEI VALOES I AVEDI	INCE NOADS

Table (2): SUMMARY OF DISTRICT'S HAUL ROADS SAMPLES

COMPANY NAME	UNPAVED ROAD SILT PERCENTAGE (% -200 MESH)	PAVED ROAD SILT LOADING (OZ/SQ YD)
Nelson & Sloan, Lakeside	0.104	0.19
Nelson & Sloan, Birch	0.057	NA
Nelson & Sloan, Otay	0.107	0.459
South Coast Matis., Carlsbad	0.055	0.224
Wyroc, Vista	0.098	0.251
Sim J. Harris, Miramar	0.06	0.386
V.R. Dennis, Mission Gorge	0.068	2.866
Asphalt Inc., Lakeside	0.144	0.521
East County Materials, Hester's Granite Pit	0.104	NA
H.G. Fenton, Carroll Canyon	0.08	0.172
H.G. Fenton, Mission Valley	0.092	0.634
CCAC, Carroll Canyon	0.071	0.283
H.G. Fenton, Pala	0.148	NA
Nelson & Sloan, San Marcos	0.135	NA
R.E. Hazard, Carroll Canyon	0.139	1.332
Superior Ready Mix, Mission Gorge	0.072	0.712
South Coast Matis., Escondido	0.142	2.347

3.0 Unpaved Roads:

3.1 Sources of Emissions in Unpaved Haul Roads:

When a vehicle travels an unpaved road, the force of the wheels on the road surface causes pulverization of surface material. Particles are lifted and dropped from the rolling wheels, and the road surface is exposed to strong air currents in turbulent shear with the surface. The turbulent wake behind the vehicle continues to act on the road surface after the vehicle has passed.² Emissions caused by hauling can be minimized by paving, windbreaks, frequent water and/or environmentally friendly chemical applications, and using gravel as a means of dust suppression.⁵

3.2 Emission Estimation for Unpaved Haul Roads:

The particulate emissions of concern from unpaved roads are particulate matter (PM) including PM less than 10 microns in aerodynamic diameter (PM-10) and PM less than 2.5 microns in aerodynamic diameter (PM-2.5). The quantity of dust emissions from a given segment of unpaved road varies with the volume of traffic, the condition of the road, the number of vehicles passes, the vehicle characteristics (e.g. vehicle weight, speed and number of wheels), the properties of the road surface material being disturbed (e.g. silt content, moisture content), and the climatic conditions (e.g., frequency and amounts of precipitation). Dust emissions from unpaved roads have been found to vary directly with the fraction of silt in the road surface material³.

The District bases its calculation methodology of unpaved roads emissions from resuspension of loose material on the road surface due to vehicle travel; on the United States Environmental Protection Agency (USEPA) Compilation of Air Pollutant Emission Factors, 5th Edition, Volume 1 (AP-42) Chapter 13 – Miscellaneous Sources, 13.2.2 (Unpaved Roads, revised January 1995)⁴. The following derived empirical equation is used to evaluate the annual particulate emissions of unpaved road:

$$E_{a} = (VMT) * [(k) * (5.9) * (\frac{s}{12}) * (\frac{s}{30}) * (\frac{W}{3})^{0.7} * (\frac{W}{4})^{0.5} * (\frac{(365 - p)}{365})] * (C_{i}) * (1 - e)$$
$$E_{h} = \frac{E_{a}}{(D_{a} * H)}$$

Where:

 E_a = Annual emissions of each contaminant, (lbs/year)

 E_h = Maximum hourly emissions of each contaminant, (lbs/hour)

VMT = Vehicle miles traveled on site, (miles/year)

k = Particle size multiplier, (dimensionless)

s = Unpaved haul road surface material silt content, (weight %)

- S = Mean vehicle speed, (miles/hour)
- W = Mean vehicle weight, (tons)
- w = Number of vehicle wheels, (dimensionless)

p = Days with precipitation, (days/year).

 C_i = Concentration of each listed substance in the haul road dust, (lbs/lb)

² https://www.epa.gov/sites/default/files/2020-10/documents/13.2.2_unpaved_roads.pdf

³ https://www.epa.gov/sites/default/files/2020-10/documents/ap-42_13.2.2_background_report_unpaved_roads.pdf ⁴ https://www.epa.gov/sites/default/files/2020-10/documents/ap-

^{12 12 2 2} background report unpound roads ndf

⁴²_13.2.2_background_report_unpaved_roads.pdf

 D_a = Active days during reporting period, (days/year)

H = Hours of operation, (hours/day)

e = Control efficiency, if applicable, (%)

The following table summarizes the default values used by the District for some of the Equation's variables:

TABLE (3): DEFAULT VALUES - UNPAVED HAUL ROADS

Variable	Variable Description	Default Values and Ranges	
k	PM-30 Particle size multiplier (lbs/VMT)	0.80 (PM-30, from AP-42 Section 13.2.2)	
k	PM-10 Particle size multiplier (lbs/VMT)	0.36 (PM-10, from AP-42 Section 13.2.2)	
s	Surface material silt content	15% (Usually 4 to 20, test data), Note: the District will use this default value, unless the site provided site specific ST data or requested the use of AP-42 default values.	
р	Annual precipitation >0.01 in.	40 days/year for San Diego County	
е	Control Efficiency	95% for watering at 2-hr intervals. 90% for watering at 4-hr intervals.	
е	Control Efficiency	80% for watering at unknown frequency.	

3.0 Trace Metals Emissions in Haul Roade:

Haul road dust that is generated will contain several trace metals at Parts Per Million by Weight (PPMW) levels⁵. Default trace metal concentrations for San Diego County have been developed by analyzing multiple haul road silt samples taken from several mineral products industry sites. Typical haul road trace metal dust concentrations for San Diego County are as follows:

TABLE 3. HAUL ROAD DUST TRACE METAL CONCENTRATIONS

Trace Metals	Range Detected in SD County (ppmw)	Suggested Default Value
Arsenic	1 to 50	20
Beryllium	0.5 to 2	1
Cadmium	1 to 1.5	1
Chromium (total)	5 to 60	50
Copper	20 to 650	100
Lead	5 to 120	50
Manganese	200 to 1200	500
Mercury	0 to 10	5
Nickel	3 to 25	20
Selenium	3 to 5	5
Silica (crystalline)	10% to 75%	10%
Zinc	30 to 300	200
Asbestos	Not Detected	0

4.0 EMISSIONS INFORMATION:

Haul road particulate emissions are nearly impossible to quantify through source testing

⁵ Reference: Pagotto C, Rémy N, Legret M, Le Cloirec P. Heavy metal pollution of road dust and roadside soil near a major rural highway. Environ Technol. 2001 Mar;22(3):307-19. doi: 10.1080/09593332208618280. PMID: 11346288.

procedures. EPA and its contractors appear to have developed an empirical procedure to estimate emissions and then 'fitted' critical variables to the predicted curve. Theoretically, this procedure is applicable to both low speed plant haul roads and high speed freeways. Typical controlled emission rates for plant haul roads range from 0.5 to 2.5 lbs PM10 / vehicle mile traveled. Higher estimates usually fail to account for control efficiencies associated with wetting the road surface. Lower estimates usually indicate an underestimated silt loading value for the facility's on-site haul road. It is often more difficult to obtain accurate information regarding vehicle types, weights, haul road lengths, and number of trips than it is to decide upon representative emission estimation technique default variables.

5.0 ASSUMPTIONS / LIMITATIONS:

- Use site specific test data instead of default values as appropriate. Default values should be used where site specific data is highly questionable.
- No additional control efficiency should be granted for activities which are already accounted for by the silt loading value (i.e.; sweeping, etc.).
- While the use of mean vehicle weights and speeds may be acceptable for freeway estimates, these values tend to highly distort the quantification of emissions from facility haul roads. Haul road information should be collected and processed separately for each distinct vehicle type and function.
- The total number of vehicle trips and associated carrying capacities should coincide with the reported material imports and exports.
- Vehicle exhaust pipe emissions are not quantified by this procedure. An accurate estimate of tail pipe emissions depends upon representative fuel combustion emission factors for the vehicles and fuels used. These emissions must be quantified separately from haul road dust.
- Some District emission estimation techniques already include miscellaneous vehicular traffic in the default particulate emission factors. Care should be taken not to "double count or omit" on-site vehicles.
- The Office of Environmental Health Hazard Assessment (OEHHA) has adopted a chronic reference exposure level (REL) for respirable crystalline silica, cristobalite (CAS 14464-46-1) and quartz (CAS 14808-60-7). The REL is based on the PM4 fraction of crystalline silica which is expected to have associated health risks. The District has chosen to implement a health protective value of 7.95% default PM4 to PM10 ratio from published data¹ in order to more accurately estimate the health risks associated with respirable crystalline silica. If available, the District recommends using District approved site-specific data to refine the PM4 to PM10 ratio. The District's current default crystalline silica emission factor is based on local test results, which is 10% of the PM10 default emission factor. The PM4 to PM10 ratio can be accurately applied to the crystalline silica default emission factor since the test results were sized to -10 micron which was used to represent the average composition of PM10. Both crystalline silica as PM10 and respirable crystalline silica as PM4 should be estimated

¹ Richards, J. R., Brozell, T., Rea, C. E., Boraston, G., & Hayden, J. (2009). PM₄ Crystalline Silica Emission Factors and Ambient Concentrations at Aggregate-Producing Sources in California. Journal of the Air & Waste Management Association, 59(11), 1287–1295. https://doi.org/10.3155/1047-3289.59.11.128



ATTACHMENT "B"

Permits



San Diego County Air Pollution Control District 10124 Old Grove Road, San Diego, CA 92131-1649 Phone (858) 586-2600 Fax (858) 586-2601

www.sdapcd.org

4, M Sectors: APCD1985-SITE-03641 Site Record: Application Record: APCD2022-RRP-990016

Permit Record: APCD2007-PTO-001233



Equipment Address:

Vulcan Materials Western Division Calmat Environmental Manager 10051 Black Mountain Rd San Diego, CA 92126

Vulcan Materials Western Division Calmat 500 N. Brand Blvd, suite 500 Glendale, CA 91203

PERMIT TO OPERATE

EXPIRES: June 30, 2025

This permit is not valid until required fees have been paid.

The above is hereby granted a Permit To Operate the article, machine, equipment or contrivance described below. This permit is not transferable to a new owner nor is it valid for operation of the equipment at another location except as specified. This Permit To Operate or copy must be posted on or within 25 feet of the equipment, or readily available on the operating premises.

Equipment Owner:

Vulcan Materials Western Division Calmat 10051 Black Mountain Rd., San Diego, CA 92121

Equipment Description:

ROCKS AND PLANT CONSISTING OF: OVERLAND PIT PROCESS SYSTEM (1000 TONS/HR CAPACITY), WITH SIXTEEN PIT CONVEYORS, ONE PIT SCALPER WITH WATER SPRAY, ONE PRIMARY GYRATORY CRUSHER WITH A TORIT DONALDSON DCE BAGHOUSE, ONE 2400-FOOT CONVEYOR AND A SECONDARY PLANT PROCESS SYSTEM (750 TONS/HR CAPACITY), WITH TWO 5-1/2" SECONDARY CONE CRUSHERS, ONE LOG WASHER, THREE WET SCREENS, FIVE DRY SCREENS, ONE 100-TON ROCK BOX, ONE TORIT DONALDSON BAGHOUSE, FIVE FEEDERS, TWENTY-NINE CONVEYOR BELTS, AND A TRUCK LOADOUT SYSTEM. (APPL #870745/JJS) (0888870745) (973060 ALC 10/00) (976056 EFH 02/05) (978760 ALC 01/07), S/N #PE6068N017925.

Every person who owns or operates this equipment is required to comply with the conditions listed below and all applicable requirements and District rules, including but not limited to Rules 10, 20, 40, 50, 51.

Fee Schedules:

- 1 [07A] Crusher System
- 2 [07A] Crusher System
- 1 [07B] Screening System
- 1 [07C] Loadout System

BEC: APCD2023-CON-002011

FAILURE TO OPERATE IN COMPLIANCE IS A MISDEMEANOR SUBJECT TO CIVIL AND CRIMINAL PENALTIES

- Operation shall be in compliance with all information included in applications for this permit to operate, as approved 1. by the District, and with all conditions listed herein.
- 2. The equipment associated with the secondary plant process system listed below shall remain inoperable by removal of electrical power to the listed equipment.
 - a. Two 5-1/2" Secondary Cone Crushers,
 - b. One Log Washer,
 - c. Three Wet Screens.
 - d. Five Dry Screens,
 - e. One 100-Ton Rock Box,
 - f. One Torit Donaldson Baghouse,
 - g. Five Feeders and Twenty-nine Conveyor Belts
 - (Rule 1210)
- 3. A differential pressure gauge shall be installed across the Baghouse filter media and maintained in good working order at all times to measure the pressure drop across the filters. The pressure drop across the filter media shall be maintained between 1 and 10 inches of water.



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Sectors: 4 M APCD1985-SITE-03641 Site Record: Application Record: APCD2022-RRP-990016



- Water and/or surfactant spray systems shall be used to control particulate matter emissions at all aggregate 4 transfer points, screens, and the truck load out station such that the opacity does not exceed 10% at any time.
- Water and/or surfactant spray systems shall be used to control particulate matter emissions at all crushers such 5. that the opacity does not exceed 15% at any time.
- All access and haul roads in use by mobile traffic shall be adequately watered to ensure that the visible dust 6. emissions from these roads do not exceed the emissions standard of Rule 50, measured eight feet above the road surface.
- 7. The material processed in this equipment may be sampled and tested, at the applicant's expense, so as to determine the moisture content of the aggregate. If tested, the moisture content shall be at least 3%. Additionally, the moisture content of samples taken at the primary scalper and/or the fs15 screen shall be at least 5%.
- 8. The maximum throughput of material at the pit process system shall not exceed 12,000 tons per day or 2,000,000 tons per rolling twelve-month period. The Permittee shall maintain records of daily and monthly throughput.
- 9. The maximum throughput of material at the plant process system shall not exceed 7,500 tons per day or 2,000,000 tons per rolling twelve-month period. The Permittee shall maintain records of daily and monthly throughput.
- All records required by this Permit, including daily and monthly throughputs, shall be maintained on-site for a 10. minimum of three years and made available to District personnel upon request.
- Access, facilities, utilities and any necessary safety equipment for source testing and inspection shall be provided 11. upon request of the Air Pollution Control District.
- 12. This Air Pollution Control District Permit does not relieve the holder from obtaining permits or authorizations required by other governmental agencies.
- The permittee shall, upon determination of applicability and written notification by the District, comply with all 13. applicable requirements of the Air Toxics "Hot Spots" Information and Assessment Act (California Health and Safety Code Section 44300 et seq.)



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Sectors: 4 M APCD1985-SITE-03641 Site Record: Application Record: APCD2021-APP-006572

Permit Record: APCD2008-PTO-000442

APCD2008-PTO-000442

Equipment Address:

Vulcan Materials Western Division Calmat Environmental Manager 10051 Black Mountain Rd San Diego, CA 92126

Vulcan Materials Western Division Calmat Plant Manager 10051 Black Mountain Rd San Diego, CA 92126

PERMIT TO OPERATE

EXPIRES: June 30, 2025

This permit is not valid until required fees have been paid.

The above is hereby granted a Permit To Operate the article, machine, equipment or contrivance described below. This permit is not transferable to a new owner nor is it valid for operation of the equipment at another location except as specified. This Permit To Operate or copy must be posted on or within 25 feet of the equipment, or readily available on the operating premises.

Equipment Owner:

Vulcan Materials Co., Western Division Tony Varisco 7220 Trade St., Ste 200, San Diego, CA 92121

Equipment Description:

ASPHALT BATCH PLANT (400-TON/HR CAPACITY): STANDARD HOT MIX 8000 LB. BATCHER: 125 MM BTU/HR ECO-STAR MODEL M005L125 GAS FIRED BURNER WITH CONTROLS (OIL BACKUP); KLEEN AIRE PULSE JET BAGHOUSE 17,272 SQ. FT. CLOTH AREA; 50,000 SCQM BLOWER: SUSPENDED OIL PARTICLES CONTROL; ENCLOSURE FOR THREE (3) ASTEC HB200 TON STORAGE SILOS; ENCLOSED CONVEYOR TO SILO LOAD-IN AREA; THREE SILO BATCHERS; ONE 10,000 CFM BLOWER AND ASSOCIATED VENT DUCTING TO THE PLANT CYCLONE; ONE (1) BLUE SMOKE CONTROL SYSTEM: MANUFACTURED BY BLUE SMOKE CONTROL, MODEL 6S24C, 48,000CFM, S/N S-1335, 100 HP FAN COMPANY BLOWER, S/N 2002-862, ONE (1) 25 TON STORAGE SILO, ONE (1) SCREW CONVEYOR AND ONE (1) VULCAN MATERIALS FINES WEIGH HOPPER. MODEL NO. CC-HMA-MF, S/N 001RBL 01/91, APPL# 962164 EFH 07/99, APPL# 978912 EFH 09/04, APPL# 984207 EFH Every person who owns or operates this equipment is required to comply with the conditions listed below and all applicable requirements and District rules, including but not limited to Rules 10, 20, 40, 50, 51.

Fee Schedules:

1 [04A] Hot Mix Asphalt Batch Plant

1 [93A] Test Witness and Report Review (T&M)

BEC: 11489

FAILURE TO OPERATE IN COMPLIANCE IS A MISDEMEANOR SUBJECT TO CIVIL AND CRIMINAL PENALTIES

- Air pollution control equipment shall be maintained in good operating condition and shall be in full operation in 1. accordance with manufacturer's instructions at all times when the process equipment is in operation.
- All process equipment shall be maintained and operated so that there is no leakage of air contaminants to the 2. atmosphere prior to their treatment in the air pollution control system.
- Baghouse exhaust Particulate Matter Emissions shall not exceed 0.1 grains per dry standard cubic foot as 3. determined by San Diego APCD Test Method 5. Baghouse emissions shall not exceed 40% opacity for more than 3 minutes in any 60 minute period. (EPA Method 9)
- The concentration of oxides of Nitrogen emissions, as Nitrogen Dioxide, in the dryer exhaust shall not exceed 125 4. parts per million by volume on a dry basis (PPMVD) corrected to 3 percent Oxygen when the dryer is burning natural gas, or 225 PPMVD at 3 percent Oxygen when burning liquid fuel.
- 5. This equipment shall be source tested once each permit year (annual source test) to demonstrate compliance with the emission standards contained in this permit. For the purposes of this permit, a permit year is the 12-month period ending on the last day of the permit expiration month. It is the responsibility of the permittee to schedule the source test with the District. The source test shall be performed or witnessed by the District. Each annual source test shall be separated by at least 90 days from any annual source test performed in a different permit year.



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 Sectors:
 4, M

 Site Record:
 APCD1985-SITE-03641

 Application Record:
 APCD2021-APP-006572



- 6. The Blue Smoke Control System shall be in operation at all times when hot asphalt is being transferred. The Blue Smoke Control System shall be operated a sufficient time after hot mix production has terminated to preclude exceeding 40 percent (%) opacity for more than 3 minutes in any consecutive 60 minute period.
- 7. Blue smoke emissions shall not exceed 40 percent (%) opacity for more than 3 minutes in any consecutive 60 minute period.
- 8. The rate of hot mix asphalt production shall not exceed 400 tons per hour, and 4000 tons per day. Daily records of hot mix asphalt production and delivery rates shall be maintained and made available to the District upon request. Recycle of asphalt pavement shall not be conducted without prior approval from District.
- 9. Diesel fuel usage for operating the rotary drum dryer burner shall be limited to 12,500 gallons per day.
- 10. All the required records shall be maintained for a minimum of three calendar years. These records shall be maintained and made available to the District upon request.
- 11. Access, facilities, utilities and any necessary safety equipment for source testing and inspection shall be provided upon request of the Air Pollution Control District.
- 12. This Air Pollution Control District Permit does not relieve the holder from obtaining permits or authorizations required by other governmental agencies.
- The permittee shall, upon determination of applicability and written notification by the District, comply with all applicable requirements of the Air Toxics "Hot Spots" Information and Assessment Act (California Health and Safety Code Section 44300 et seq.)



San Diego County Air Pollution Control District 10124 Old Grove Road, San Diego, CA 92131-1649 Phone (858) 586-2600 Fax (858) 586-2601 www.sdapcd.org

 Sectors:
 4, M

 Site Record:
 APCD1985-SITE-03641

 Application Record:
 N/A

Permit Record: APCD2009-PTO-000443



Equipment Address:

Vulcan Materials Western Division Calmat Environmental Manager 10051 Black Mountain Rd San Diego, CA 92126

Vulcan Materials Western Division Calmat Plant Manager 10051 Black Mountain Rd San Diego, CA 92126

PERMIT TO OPERATE

EXPIRES: June 30, 2025

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Equipment Owner:

Vulcan Materials Co., Western Division Tony Varisco 7220 Trade St., Ste 200, San Diego, CA 92121

Equipment Description:

CEMENT TREATED BASE PLANT, 480 TONS/HR: PUGMILL; CEMENT SILO VENTS TO A LAMAR 4-BAG FILTER APPL #0352 940628

Every person who owns or operates this equipment is required to comply with the conditions listed below and all applicable requirements and District rules, including but not limited to Rules 10, 20, 40, 50, 51.

Fee Schedules:

1 [08A] Concrete Batch Plant

BEC: 0146A

FAILURE TO OPERATE IN COMPLIANCE IS A MISDEMEANOR SUBJECT TO CIVIL AND CRIMINAL PENALTIES

- 1. Materials handled shall contain sufficient naturally occurring or added moisture to comply with the emission standards of Rule 50.
- 2. Air pollution control equipment shall be maintained in good operating condition and shall be in full operation in accordance with manufacturer's instructions at all times when the process equipment is in operation.
- 3. All process equipment shall be maintained and operated so that there is no leakage of air contaminants to the atmosphere prior to their treatment in the air pollution control system.
- Access roads and yards in the general area of this equipment shall be watered or otherwise treated to prevent dust generated by plant mobile traffic from exceeding the emission standards of Rule 50.
- 5. Access, facilities, utilities and any necessary safety equipment for source testing and inspection shall be provided upon request of the Air Pollution Control District.
- 6. This Air Pollution Control District Permit does not relieve the holder from obtaining permits or authorizations required by other governmental agencies.
- 7. The permittee shall, upon determination of applicability and written notification by the District, comply with all applicable requirements of the Air Toxics "Hot Spots" Information and Assessment Act (California Health and Safety Code Section 44300 et seq.)