# Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants Application Form

Facility Name: Click or tap here to enter text.

Existing Facility ID: <u>A</u>Click or tap here to enter text.

Existing Class II General AQOP for Nonmetallic Minerals Crushing and Screening Plants: <u>AP</u>Click or tap here to enter text.

### **Application Type:**

- □ New Class II General AQOP for Nonmetallic Minerals Crushing and Screening Plants
- □ Revision of Existing Class II General AQOP for Nonmetallic Minerals Crushing and Screening Plants
- □ Renewal of Existing Class II General AQOP for Nonmetallic Minerals Crushing and Screening Plants



#### **Please Submit Application to:**

Nevada Division of Environmental Protection Bureau of Air Pollution Control, Class II Permitting Branch 901 South Stewart Street, Suite 4001 Carson City, Nevada 89701-5249 Phone (775) 687-9349

August 2022

#### **IMPORTANT INFORMATION**

- The application packet contains:
  - General Company Information Form
  - Application Fee
  - Special Use Area Additional Information Forms (if applicable)
  - Emission Factors
  - Emission Limits
  - Emission Calculation Form(s)
  - Surface Area Disturbance Form
  - Application Certification Document with Required Attachments
  - Process Narrative
  - Process Flow Diagram(s)
  - Location Map(s)
- Please see the Guidance Document for additional instructions on how to complete the application.
- A printed copy of the application must be submitted (mailed or hand delivered), along with an electronic version.
- The application filing fee required by Nevada Administrative Code (NAC) 445B.327 must be submitted with the completed application. Checks must be made payable to the "Nevada State Treasurer, Environmental Protection" with "BAPC" noted in the memo line. Fees may also be submitted electronically at <u>https://epayments.ndep.nv.gov/</u>.
- This application shall be used for new Class II General sources (Nonmetallic Minerals Crushing and Screening Plants), revisions to existing Class II General Air Quality Operating Permits for Nonmetallic Minerals Crushing and Screening Plants, and the renewal of Class II General Air Quality Operating Permits for Nonmetallic Minerals Crushing and Screening Plants. This application packet is <u>not</u> to be used for an Administrative Amendment, Class II Air Quality Operating Permits, a stand-alone Surface Area Disturbance (SAD) permit, nor for a Request for Change of Location Approval permit for a temporary source.
- An application for a Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants must be signed by the Responsible Official, as defined in NAC 445B.156. The certification/signature page is the last page of the application and the original "wet" signature must be provided.
- All items in the application must be addressed. If an item does not apply "N/A" or similar notation must be entered in the appropriate blank. All other information must be provided. Incomplete applications will be returned to the Responsible Official within 10 working days of receipt of the application.
- For the renewal of a Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants, a complete application and corresponding filing fee must be submitted in accordance with NAC 445B.3477(12), at least 30 days prior to the expiration date of the current permit. The Nevada Division of Environmental Protection Bureau of Air Pollution Control (BAPC) suggests that the application be submitted well in advance of the timeline outlined in NAC 445B.3477(12) to ensure the application is deemed complete.

#### GENERAL COMPANY INFORMATION FORM

1.	Company [NAC 445]		and	Address	that	are	to	appear	on	the	operating	permit
	Name:											
	Address:											
	City:											
	State:					Zip (	Code:					
2.	Owner's N	ame and	Addre	ss [NAC 44	5B.295							
	Name:											
	Address:											
	City:											
	State:					Zip (	Code:					
	E-mail Ad	dress:										
3.	Facility Na	me and A	Addres	s, if differe	nt from	#2 [N	AC 44	45 <b>B.295</b> (1	l)]:			
	Name:											
	Address:											
	City:											
	State:					Zip (	Code:					
4.	If records a specify tha	-		-		permit	will l	be kept at	t a loca	ation o	ther than th	e facility,
	Name:											
	Address:											
	City:											
	State:					Zip (	Code:					

#### **GENERAL COMPANY INFORMATION FORM (continued)**

#### 5. Responsible Official Name, Title and Mailing Address [NAC 445B.295(1)]:

Name:			
Title:			
Address:			
City:			
City: State:		Zip Code:	
Phone Number:	(XXX) XXX-XXXX	i	
Fax Number:	(XXX) XXX-XXXX		
E-mail Address:			

#### 6. Plant Manager or other appropriate Contact Name, Title and Address [NAC 445B.295(1)]:

Name:			
Title:			
Address:			
City:			
State:		Zip Code:	
Phone Number:	(xxx) xxx-xxxx		
Fax Number:	(xxx) xxx-xxxx		
E-mail Address:			

### 7. Location and Driving Directions to the Facility (For Example: From Elko, Nevada, 4 miles south of I-80 at xx Interchange) [NAC 445B.295(8)]:

Township(s):	N; Range(s):	E; Section(s):
UTM Coordinates fo	or the Front Gate of the Facility (NA m North;	AD 83, Zone 11): m East;
Nearest City:		
County:		
Hydrographic		
Area:		
Driving Directions f	rom nearest city to the Facility:	

#### 8. What is the minimum setback of equipment from public access and maximum hours of operation?

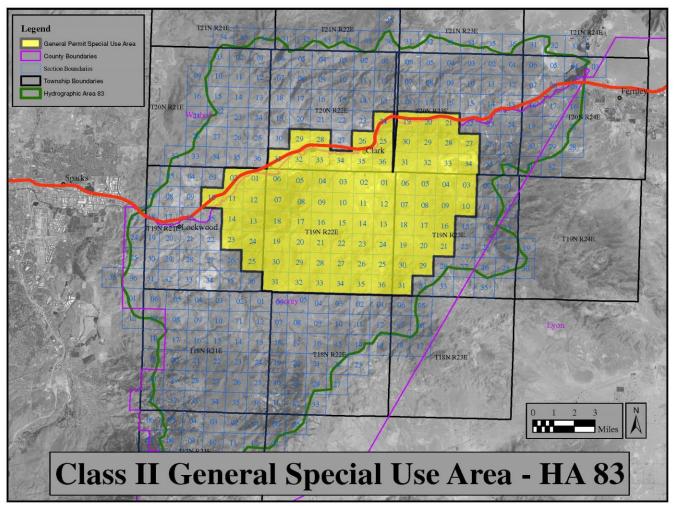
Minimum Setback:	Maximum Hours of Operation:
$\Box$ 25 meters	$\square$ 8 hrs
$\Box$ 50 meters	$\Box$ 12 hrs
$\Box$ 75 meters	$\Box$ 16 hrs
$\Box$ 100 meters	$\Box$ 24 hrs

### CLASS II GENERAL PERMIT SPECIAL USE AREA

Under the authority of NAC 445B.22097, the following exceptions and additional requirements apply to applicants applying for this Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants:

- 1. For stationary sources applying to operate under this general permit in the Class II General Special Use Area described in this section, the following constraints apply:
  - a. The Director will require a 30-day time period to conduct an Environmental Evaluation to demonstrate compliance with the Nevada Ambient Air Quality Standards (NAAQS) for any regulated air pollutant.
  - b. If compliance with the NAAQS for any regulated air pollutant cannot be demonstrated under the requirements of the Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants, authorization to operate will <u>not</u> be approved. A Class II Air Quality Operating Permit must be applied for and approved prior to operation.
- 2. Tracy Segment Hydrographic Area (HA) 83

Township	Range	Sections
19 North	21 East	1, 2, 10 through 14, and 23 through 25
19 North	22 East	All Sections
19 North	23 East	3 through 10, 16 through 21, and 29 through 31
20 North	22 East	24 through 26, 28, 29, and 31 through 36
20 North	23 East	19 through 21, and 27 through 34



#### **EMISSION FACTORS**

Under the authority of NAC 445B.305, the emission factors listed below are to be used to calculate the Potential to Emit (PTE), for operating scenarios authorized by the general permit:

Nonmetallic Crushing and Screening							
Enviroing Unit	Emissi	Emission Factor (lb/ton)					
Emission Unit	PM	$PM_{10}$	PM <sub>2.5</sub>				
Truck Unloading to Hopper - Controlled <sup>1</sup>	0.00075	0.00028	0.00004				
Truck Unloading to Hopper - Uncontrolled	0.003	0.0011	0.00017				
Primary Crusher - Water Spray Controlled <sup>1</sup>	0.0014	0.0006	0.0001				
Primary Crusher - Enclosure Controlled <sup>2</sup>	0.0027	0.0012	0.0002				
Primary Crusher - Uncontrolled	0.0054	0.0024	0.0004				
Secondary Crusher - Water Spray Controlled <sup>1</sup>	0.0014	0.0006	0.0001				
Secondary Crusher - Enclosure Controlled <sup>2</sup>	0.0027	0.0012	0.0002				
Secondary Crusher - Uncontrolled	0.0054	0.0024	0.0004				
Tertiary Crusher - Water Spray Controlled <sup>1</sup>	0.0014	0.0006	0.0001				
Tertiary Crusher - Enclosure Controlled <sup>2</sup>	0.0027	0.0012	0.0002				
Tertiary Crusher - Uncontrolled	0.0054	0.0024	0.0004				
Primary Screen - Water Spray Controlled <sup>1</sup>	0.0063	0.0022	0.00033				
Primary Screen - Enclosure Controlled <sup>2</sup>	0.0027	0.0012	0.0002				
Primary Screen - Uncontrolled	0.025	0.0087	0.0013				
Secondary Screen - Water Spray Controlled <sup>1</sup>	0.0063	0.0022	0.00033				
Secondary Screen - Enclosure Controlled <sup>2</sup>	0.0013	0.0044	0.0007				
Secondary Screen - Uncontrolled	0.025	0.0087	0.0013				
Tertiary Screen - Water Spray Controlled <sup>1</sup>	0.0063	0.0022	0.00033				
Tertiary Screen - Enclosure Controlled <sup>2</sup>	0.0013	0.0044	0.0007				
Tertiary Screen - Uncontrolled	0.025	0.0087	0.0013				
Conveyor Transfer Point - Water Spray Controlled <sup>1</sup>	0.00075	0.00028	0.00004				
Conveyor Transfer Point - Enclosure Controlled <sup>2</sup>	0.0015	0.00055	0.00009				
Conveyor Transfer Point - Uncontrolled	0.003	0.0011	0.00017				
Notes:							
(1) The emission factors listed for controlled emissions require wet dust suppression located at each emission unit and transfer point. Wet dust suppression consists of water sprays, fogging water sprays, fogging water sprays with chemical surfactant, or pneumatic fogging water sprays. Pre-wetting of material does not constitute wet dust suppression.							
<ul> <li>(2) The emission factors listed for controlled emissions require the use of an enclosure at the transfer point. An enclosure must have a solid cover surrounding the transfer point. This excludes entries and exits. Transfer points must not be clearly visible.</li> </ul>							

Diesel Engines									
Turingian Iluit	Emission Factor (lb/hr)								
Emission Unit	PM	<b>PM</b> <sub>10</sub>	PM <sub>2.5</sub>	NOx	SO <sub>2</sub>	СО	VOC		
Diesel Engine Equal to or Less Than 299 Horsepower Combusting 15 Gallons Per Hour or Less of Diesel Fuel	0.651	0.651	0.651	9.261	0.609	1.995	0.735		

#### **EMISSION LIMITS**

Under the authority of NAC 445B.305, NAC 445B.22017, and NAC 445B.346, the calculated emissions at any one location shall not equal or exceed any of the emission limits specified in the table below:

	Operating	Parameters	Emission Limits (lb/day)			
Operating Scenario	Minimum Setback (meters)	Maximum Daily Hours of Operation	РМ	<b>PM</b> 10	PM2.5	
		8	<mark>31.30</mark>	<mark>14.54</mark>	<mark>6.53</mark>	
	25	12	<mark>37.60</mark>	<mark>18.47</mark>	<mark>9.32</mark>	
	23	16	<mark>42.39</mark>	<mark>21.85</mark>	<mark>12.03</mark>	
		24	<mark>50.67</mark>	<mark>28.16</mark>	<mark>17.40</mark>	
Crushers, screens, and		8	<mark>37.64</mark>	<mark>16.81</mark>	<mark>6.85</mark>	
conveyors operated only for	50	12	<mark>45.22</mark>	<mark>21.19</mark>	<mark>9.71</mark>	
the processing of nonmetallic		16	<mark>50.77</mark>	<mark>24.85</mark>	<mark>12.46</mark>	
minerals, including diesel		24	<mark>61.00</mark>	<mark>31.85</mark>	<mark>17.92</mark>	
engines that are equal to or		8	<mark>44.24</mark>	<mark>19.17</mark>	<mark>7.18</mark>	
less than 299 horsepower,	75	12	<mark>35.06</mark>	<mark>15.88</mark>	<mark>6.72</mark>	
consuming 15 gallons per hour or less of diesel fuel.	15	16	<mark>59.21</mark>	<mark>27.86</mark>	<mark>12.88</mark>	
nour or less of diesel fuel.		24	<mark>70.73</mark>	<mark>35.33</mark>	<mark>18.41</mark>	
		8	<mark>50.55</mark>	<mark>21.42</mark>	<mark>7.50</mark>	
	100	12	<mark>59.90</mark>	<mark>26.44</mark>	<mark>10.45</mark>	
	100	16	<mark>67.36</mark>	<mark>30.78</mark>	<mark>13.30</mark>	
		24	<mark>79.25</mark>	<mark>38.38</mark>	<mark>18.84</mark>	

### **Form 1A – Emission Unit List: Particulate Emissions (PM) Units Calculation Form**<sup>4</sup> [Use this table or equivalent spreadsheet to request operating parameters and calculated particulate emissions for each emission unit.]

Source #	Source Description	Minimum Setback	Maximum Throughput Rate	Maximum Operating Hours	Air Pollution Controls	Emission Factor, lb/ton <sup>1</sup>				Calculated PM <sub>10</sub> Emissions	Calculated PM2.5 Emissions
		meters	tons/hr	hrs/day	Controls	PM	<b>PM</b> <sub>10</sub>	PM <sub>2.5</sub>	lb/day	lb/day	lb/day
Α	В	С	D	Е	F	G	Н	Ι	J (=D*E*G)	K (=D*E*H)	L (=D*E*I)
System 1	-	1	l						1		
					Crusl	hing and	l Screenii	ng Total			
						]	Emission	Limits <sup>2</sup>			
						Engi	ine Contr	ibution <sup>3</sup>	15.62	15.62	15.62
Footnotes:	<ol> <li>The Emission Factors as stated in this application mus</li> <li>The total of PM, PM<sub>10</sub>, and PM<sub>2.5</sub> emissions combined</li> <li>Engine PM/PM<sub>10</sub>/PM<sub>2.5</sub> lb/day emissions will always background and do not need to be considered when c</li> <li>Use a delitional forms or processing.</li> </ol>	for all units must be 15.62 lb/day eac	ch. This is to show th	nat engine emission	ns were accounte	d for. The	ese engine c	ontribution	s are considered p	art of the	

(4) Use additional forms as necessary.

### Form 1B – Diesel Engine(s) Form [Use Form 1B for any diesel engines that are being requested]

Source #	Source Description	Maximum Rated Engine Horsepower	Maximum Rated Fuel Consumption	Maximum Operating Hours					
		ВНр	gal/hr	hrs/day					
Α	В	С	С	D					
System 2 -	System 2 - Diesel Engine(s)								
	Combined Fuel Consumption (gal/hr)								
	Fuel Consumption Limit (gal/hr) 15								
Footnote:	Please provide manufacturer's specifications								

<u>**1C** – Special Use Area Additional Information</u><sup>1</sup> [Use Form 1C if applying for a Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants in the Special Use Area as described in this application.]

Emission Unit Description	Emission Unit Identifier	UTM Coordinates (NAD 83, Zone 11)		Release	Drop	Emission Unit	Stack	Stack Inside Diameter or	Stack	Stack Exit	Stack	Requested Hours of Operation	
		Easting (m)	Northing (m)	Height (ft)	Length (ft)	Dimensions L x W x H (ft)	Height (ft)	L x W Dimensions (ft)	Flow Rate (acfm)	Velocity (ft/sec)	Temperature (°F)	Start Time (AM/PM)	End Time (AM/PM)
Α	В	С	D	Ε	F	G	Н	I	J	K	L	M	Ν
Footnote: (1) Use additional forms as	necessary.												

#### Form 1D – Special Use Area Additional Information

[Use Form 1D if applying for a Class II General Air Quality Operating Permit for Nonmetallic Minerals Crushing and Screening Plants in the Special Use Area as described in this application. In addition to filling out this form, please provide a topographic map (or similar satellite-image map) showing the entire fence line boundary for the proposed location.]

	Corner Location of Fence Line Boundary for the Proposed Facility Location           UTM Easting (m)         UTM Easting (m)								
Corner Number	UTM Easting (m)	UTM Easting (m)							
	(NAD 83, Zone 11)	(NAD 83, Zone 11)							
A	B	C							
<u></u>									

#### SURFACE AREA DISTURBANCE FORM

- 1. **Project Name:** Click or tap here to enter text.
- 2. Total Acres Disturbed: Click or tap here to enter text.
- 3. NAC 445B.22037 requires fugitive dust to be controlled (regardless of the size or amount of acreage disturbed), and requires an ongoing program, using best practical methods, to prevent particulate matter from becoming airborne. All activities which have the potential to adversely affect the local air quality must implement all appropriate measures to limit controllable emissions. Appropriate measures for dust control may consist of a phased approach to acreage disturbance rather than disturbing the entire area all at once; using wet suppression through such application methods as water trucks or water spray systems to control wind-blown dust; the application of soil binding agents or chemical surfactant to roadways and areas of disturbed soil; as well as the use of wind-break or wind limiting fencing designed to limit wind erosion soils.
- 4. Please check each box that applies for Best Management Practices (BMPs) used for controlling dust on project's disturbed areas:
  - $\Box$  Water trucks
  - $\Box$  Graveling/paving of roadway storage areas and staging areas
  - □ Dust palliatives
  - □ Posting and limiting vehicle speeds
  - □ Ceasing operations during high wind events
  - $\Box$  Fencing or berming to prevent unauthorized access to disturbed areas
  - □ Application of water sprays on material storage piles on a regular basis
  - □ Covering material storage piles with tarpaulin or geo-textiles; tenting
  - □ Use of overhead water spray racks or water hoses
  - □ Track-out controls (graveled entranced, exit area, and street sweeping)
  - $\Box$  Landscape preservation and impact avoidance
  - $\Box$  Wind fence
  - □ Pre-watering of areas to be disturbed (including all unpaved onsite roads and staging areas)
  - □ Inform all subcontractors (including truck drivers) of their responsibilities for the control of fugitive dust while they are on the project site
  - □ Training of equipment operators to recognize fugitive dust generation and having the authority to shut down operations until water truck arrives and sprays water on the disturbed areas
  - □ Other Applicable BMPs: Click or tap here to enter text.
  - □ Other Applicable BMPs: Click or tap here to enter text.
  - □ If using water trucks, list how many water trucks are used and their capacity in gallons: Click or tap here to enter text.

### **APPLICATION CERTIFICATION DOCUMENT**

(With Required Attachments)

Please check all applicable boxes below to indicate the information provided in your application submittal:

- □ General Company Information Form
- □ \$500 Application Fee Attached (NAC 445B.327)
- □ \$500 Application Fee Electronically Submitted (NAC 445B.327)
- □ Form 1A Particulate Emissions Calculation Form(s)
- $\Box$  Form 1B Diesel Engine(s) Form
- $\Box$  Form 1C Special Use Area Form (if applicable)
- $\Box$  Form 1D Special Use Area Form (if applicable)
- □ Surface Area Disturbance Form
- Process Flow Diagrams(s) of the emission units as they will be set up, including identification of all pollution control(s) and which emission units are controlled by these devices. All emission units must be identified by name.
- Process Narrative which details the flow of material as shown in the Process Flow Diagram(s).
- Topographic Map (or similar satellite-image map) indicating the exact location of each emission unit.
- □ Special Use Area Map (topographic map or similar satellite-image map) showing the entire fence line boundary for the proposed location (if applicable).
- Application Certification Document with Original "Wet" Signature from the Responsible Official

## PLEASE NOTE THE FOLLOWING REQUIREMENTS WHICH APPLY TO APPLICANTS DURING THE APPLICATION PROCESS:

- A. A permit applicant must submit supplementary facts or corrected information upon discovery [NAC 445B.297(1)(b)].
- B. A permit applicant is required to provide any additional information which the Director requests in writing within the time specified in the Director's request [NAC 445B.297(1)(c)].
- C. Submission of fraudulent data or other information may result in prosecution for an alleged criminal offense [NRS 445B.470].

#### **CERTIFICATION:**

I certify that, based on information and belief formed after reasonable inquiry, the statements and information contained in this application are true, accurate and complete.

Signature of Responsible Official

Print or Type Name and Title