



Brian Schweitzer, Governor

P. O. Box 200901

Helena, MT 59620-0901

(406) 444-2544

Website: www.deq.mt.gov

November 10, 2010

Mr. Rick Fike
Fike Crushing, Inc.
524 Harvey Ave
Harvey, ND 58341

Dear Mr. Fike:

Montana Air Quality Permit #2559-02 is deemed final as of November 10, 2010, by the Department of Environmental Quality (Department). This permit is for a portable crushing and screening operation. All conditions of the Department's Decision remain the same. Enclosed is a copy of your permit with the final date indicated.

For the Department,

Vickie Walsh
Air Permitting Program Supervisor
Air Resources Management Bureau
(406) 444-9741

Shawn Juers
Environmental Engineer
Air Resources Management Bureau
(406) 444-2049

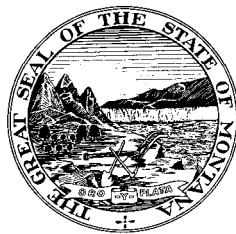
VW:SJ
Enclosure

Montana Department of Environmental Quality
Permitting and Compliance Division

Montana Air Quality Permit #2559-02

Fike Crushing, Inc.
524 Harvey Ave
Harvey, ND 58341

November 10, 2010



MONTANA AIR QUALITY PERMIT

Issued To: Fike Crushing, Inc.
524 Harvey Ave
Harvey, ND 58341

MAQP: #2559-02
Application Complete: 9/23/2010
Preliminary Determination Issued: 10/7/2010
Department's Decision Issued: 10/25/2010
Permit Final: 11/10/2010
AFS #: 777-2559

A Montana Air Quality Permit (MAQP), with conditions, is hereby granted to Fike Crushing, Inc. (Fike) pursuant to Sections 75-2-204 and 211 of the Montana Code Annotated (MCA), as amended, and Administrative Rules of Montana (ARM) 17.8.740, *et seq.*, as amended, for the following:

SECTION I: Permitted Facilities

A. Plant Location

The home pit location for Fike's crushing and screening operation is Section 7, Township 24 North, Range 60 East, in Richland County, MT. However, MAQP #2559-02 applies while operating at any location in Montana, except those areas having a Department of Environmental Quality (Department)-approved permitting program, areas considered tribal lands, or areas in or within 10 kilometers (km) of certain particulate matter with an aerodynamic diameter of 10 microns or less (PM₁₀) nonattainment areas. *A Missoula County air quality permit will be required for locations within Missoula County, Montana.* An addendum will be required for locations in or within 10 km of certain PM₁₀ nonattainment areas.

B. Current Permit Action

On August 12, 2010, the Department received a request from Fike regarding the permitting needs associated with proposed equipment changes. Upon review of MAQP #2559-01, the Department determined that a permit modification was required. This action updates the permit to the current format used by the Department, including updates to the permit conditions and limitations to reflect equipment changes, updates to the emissions inventory, and clarification of the home pit location for this operation.

SECTION II: Conditions and Limitations

A. Emission Limitations

1. All visible emissions from any Standards of Performance for New Stationary Source (NSPS) – affected crusher shall not exhibit an opacity in excess of the following averaged over 6 consecutive minutes (ARM 17.8.340 and 40 CFR 60, Subpart OOO):
 - For crushers that commence construction, modification, or reconstruction on or after April 22, 2008: 12% opacity
 - For crushers that commence construction, modification, or reconstruction after August 31, 1983 but before April 22, 2008: 15% opacity
2. All visible emissions from any other NSPS-affected equipment (such as screens and conveyors) shall not exhibit an opacity in excess of the following averaged over six consecutive minutes (ARM 17.8.340 and 40 CFR 60, Subpart OOO):

- For equipment that commence construction, modification, or reconstruction on or after April 22, 2008: 7% opacity
 - For equipment that commence construction, modification, or reconstruction after August 31, 1983 but before April 22, 2008: 10% opacity
3. All visible emissions from any non-NSPS affected equipment shall not exhibit an opacity of 20% or greater averaged over 6 consecutive minutes (ARM 17.8.304).
 4. Water and spray bars shall be available on-site at all times and operated as necessary to maintain compliance with the opacity limitations in Sections II.A.1, II.A.2, and II.A.3 (ARM 17.8.749).
 5. Fike shall not cause or authorize the use of any street, road or parking lot without taking reasonable precautions to control emissions of airborne particulate matter (ARM 17.8.308).
 6. Fike shall treat all unpaved portions of the haul roads, access roads, parking lots, or the general plant area with water and/or chemical dust suppressant, as necessary, to maintain compliance with the reasonable precautions limitation in Section II.A.5 (ARM 17.8.749).
 7. Fike shall not operate more than three crushers at any given time and the total combined maximum rated design capacity of the crushers shall not exceed 1,300 tons per hour (TPH) (ARM 17.8.749).
 8. Fike shall not operate more than one screen at any given time and the maximum rated design capacity of the screen shall not exceed 400 TPH (ARM 17.8.749).
 9. Fike shall not operate or have on-site more than one diesel generator engine. The maximum capacity of the engine that drives the generator shall not exceed 831 horsepower (hp) (ARM 17.8.749).
 10. The generator engine shall have maximum oxides of nitrogen (NO_x) emissions, as specified by the manufacturer in a specification sheet, of 10.21 pounds per hour (lb/hr), or, an engine certified to meet EPA Tier II standards (as tabulated in 40 CFR 89.112 (a)) or lower (ARM 17.8.749).
 11. Fike shall maintain the diesel generator engine's exhaust stack height a minimum of 14 feet above ground level during operation of the engine (ARM 17.8.749).
 12. If the permitted equipment is used in conjunction with any other equipment owned or operated by Fike, at the same site, production shall be limited to correspond with an emission level that does not exceed 250 tons during any rolling 12-month period. Any calculations used to establish production levels shall be approved by the Department (ARM 17.8.749).
 13. Fike shall comply with all applicable standards and limitations, monitoring, reporting, recordkeeping, testing, and notification requirements contained in 40 CFR 60, Subpart OOO, *Standards of Performance for Nonmetallic Mineral Processing Plants* (ARM 17.8.340 and 40 CFR 60, Subpart OOO).

14. Fike shall comply with all applicable standards and limitations, and the reporting, recordkeeping, and notification requirements contained in 40 CFR 60, Subpart III, *Standards of Performance for Stationary Compression Ignition Internal Combustion Engines* and 40 CFR 63, Subpart ZZZZ, *National Emissions Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines*, for any applicable diesel engine (ARM 17.8.340; 40 CFR 60, Subpart III; ARM 17.8.342 and 40 CFR 63, Subpart ZZZZ).

B. Testing Requirements

1. Within 60 days after achieving maximum production, but no later than 180 days after initial start-up, an Environmental Protection Agency (EPA) Method 9 opacity test and/or other methods and procedures as specified in 40 CFR 60.675 must be performed on all NSPS-affected equipment to demonstrate compliance with the emission limitations contained in Section II.A.1 and II.A.2 (ARM 17.8.340 and 40 CFR 60, Subpart A and Subpart OOO). Additional testing may be required by 40 CFR 60, Subpart OOO (ARM 17.8.340 and 40 CFR 60, Subpart OOO).
2. All compliance source tests shall conform to the requirements of the Montana Source Test Protocol and Procedures Manual (ARM 17.8.106).
3. The Department may require further testing (ARM 17.8.105).

C. Operational Reporting Requirements

1. If this crushing/screening plant is moved to another location, an Intent to Transfer form must be sent to the Department and a Public Notice Form for Change of Location must be published in a newspaper of general circulation in the area to which the transfer is to be made, at least 15 days prior to the move. The proof of publication (affidavit) of the Public Notice Form for Change of Location must be submitted to the Department prior to the move. These forms are available from the Department (ARM 17.8.749 and ARM 17.8.765).
2. Fike shall supply the Department with annual production information for all emission points, as required by the Department in the annual emission inventory request. The request will include, but not be limited to, all sources of emissions identified in the emission inventory contained in the permit analysis.

Production information shall be gathered on a calendar-year basis and submitted to the Department by the date required in the emission inventory request. Information shall be in the units required by the Department. This information may be used for calculating operating fees, and/or to verify compliance with permit limitations (ARM 17.8.505).

3. Fike shall notify the Department of any construction or improvement project conducted, pursuant to ARM 17.8.745, that would include ***the addition of a new emissions unit***, change in control equipment, stack height, stack diameter, stack flow, stack gas temperature, source location, or fuel specifications, or would result in an increase in source capacity above its permitted operation. The notice must be submitted to the Department, in writing, 10 days prior to startup or use of the proposed de minimis change, or as soon as reasonably practicable in the event of an unanticipated circumstance causing the de minimis change, and must include the information requested in ARM 17.8.745(l)(d) (ARM 17.8.745).

4. Fike shall maintain on-site records showing daily hours of operation and daily production rates for the last 12 months. The records compiled in accordance with this permit shall be maintained by Fike as a permanent business record for at least 5 years following the date of the measurement, must be available at the plant site for inspection by the Department, and must be submitted to the Department upon request (ARM 17.8.749).
5. Fike shall document, by month, the crushing production from the facility. By the 25th day of each month, Fike shall calculate the crushing production from the facility for the previous month. The information for each of the previous months shall be submitted along with the annual emission inventory (ARM 17.8.749).
6. Fike shall document, by month, the screening production from the facility. By the 25th day of each month, Fike shall calculate the screening production from the facility for the previous month. The information for each of the previous months shall be submitted along with the annual emission inventory (ARM 17.8.749).
7. Fike shall document, by month, the hours of operation of the diesel engine/generator. By the 25th day of each month, Fike shall calculate the hours of operation for the diesel engine/generator for the previous month. The information for each of the previous months shall be submitted along with the annual emission inventory (ARM 17.8.749).

D. Notification

Fike shall provide the Department with written notification of the actual start-up date of the crushing and screening equipment, including the generator engine, postmarked within 15 days after the actual start-up date (ARM 17.8.749)

SECTION III: General Conditions

- A. Inspection – Fike shall allow the Department's representatives access to the source at all reasonable times for the purpose of making inspections or surveys, collecting samples, obtaining data, auditing any monitoring equipment (continuous emissions monitoring system (CEMS), continuous emissions rate monitoring system (CERMS)) or observing any monitoring or testing, and otherwise conducting all necessary functions related to this permit.
- B. Waiver – The permit and all the terms, conditions, and matters stated herein shall be deemed accepted if Fike fails to appeal as indicated below.
- C. Compliance with Statutes and Regulations – Nothing in this permit shall be construed as relieving Fike of the responsibility for complying with any applicable federal or Montana statute, rule, or standard, except as specifically provided for in ARM 17.8.740, *et seq.* (ARM 17.8.756)
- D. Enforcement – Violations of limitations, conditions and requirements contained herein may constitute grounds for permit revocation, penalties or other enforcement as specified in Section 75-2-401, *et seq.*, MCA.
- E. Appeals – Any person or persons jointly or severally adversely affected by the Department's decision may request, within 15 days after the Department renders its decision, upon affidavit setting forth the grounds therefore, a hearing before the Board of Environmental Review (Board). A hearing shall be held under the provisions of the

Montana Administrative Procedures Act. The filing of a request for a hearing does not stay the Department's decision, unless the Board issues a stay upon receipt of a petition and a finding that a stay is appropriate under Section 75-2-211(11)(b), MCA. The issuance of a stay on a permit by the Board postpones the effective date of the Department's decision until conclusion of the hearing and issuance of a final decision by the Board. If a stay is not issued by the Board, the Department's decision on the application is final 16 days after the Department's decision is made.

- F. Permit Inspection – As required by ARM 17.8.755, Inspection of Permit, a copy of the MAQP shall be made available for inspection by Department personnel at the location of the permitted source.
- G. Air Quality Operation Fees – Pursuant to Section 75-2-220, MCA, failure to pay the annual operation fee by Fike may be grounds for revocation of this permit, as required by that section and rules adopted thereunder by the Board.
- H. Duration of Permit – Construction or installation must begin or contractual obligations entered into that would constitute substantial loss within 3 years of permit issuance and proceed with due diligence until the project is complete or the permit shall expire (ARM 17.8.762).
- I. The Department may modify the conditions of this permit based on local conditions of any future site. These factors may include, but are not limited to, local terrain, meteorological conditions, proximity to residences, etc.
- J. Fike shall comply with the conditions contained in this permit while operating in any location in Montana, except within those areas that have a Department-approved permitting program or areas considered tribal lands.

Montana Air Quality Permit (MAQP) Analysis
Fike Crushing, Inc.
MAQP #2559-02

I. Introduction/Process Description

Fike Crushing, Inc (Fike) owns and operates a portable crushing and screening operation.

A. Permitted Equipment

- One (1) 300 ton per hour (TPH) cone crusher (currently a 2007 JCI K200)
- One (1) 300 TPH jaw crusher (currently a 2002 Trio)
- One (1) 300 TPH crusher (currently a 1964 Rolls)
- One (1) Diesel fired generator engine (currently an 831 horsepower (hp) Caterpillar C-18 driving a 545 kW generator)
- One (1) 400 TPH screen (currently a 2007 JCI 6x20)

B. Source Description

Fike proposes to use this equipment to crush and screen sand and gravel-like material for sale for various uses.

C. Permit History

On April 6, 1989, Fike Crushing (Fike) was issued **MAQP #2559-00** for the operation of a portable 1978 EL-Jay cone crusher (maximum capacity 175 TPH) and associated equipment.

On August 11, 2000, Fike submitted a permit application for the replacement of a portable 1978 El-Jay cone crusher with a portable 2000 Pioneer vertical shaft impact crusher, a portable 1986 Allis Chalmers cone crusher, a portable 1960 Diamond Jaw Crusher, a portable 1981 Allis Chai crusher, a portable 1993 Superior 2-deck screen, a portable 1979 Kolberg 3-deck screen, and a portable 1999 Caterpillar diesel generator. The permit was also updated to reflect the current format at that time. **MAQP #2559-01** replaced MAQP #2559-00.

D. Current Permit Action

On August 12, 2010, the Department of Environmental Quality – Air Resources Management Bureau (Department) received a request from Fike regarding the permitting needs associated with proposed equipment changes. Upon review of Montana Air Quality Permit (MAQP) #2559-01, the Department determined that a permit modification was required. This action updates the permit to the current format used by the Department, including updates to the permit conditions and limitations to reflect equipment changes, updates to the emissions inventory, and clarification of the home pit location for this operation.

E. Additional Information

Additional information, such as applicable rules and regulations, Best Available Control Technology (BACT)/Reasonably Available Control Technology (RACT) determinations, air quality impacts, and environmental assessments, is included in the analysis associated with each change to the permit.

II. Applicable Rules and Regulations

The following are partial explanations of some applicable rules and regulations that apply to the facility. The complete rules are stated in the Administrative Rules of Montana (ARM) and are available, upon request, from the Department. Upon request, the Department will provide references for location of complete copies of all applicable rules and regulations or copies where appropriate.

A. ARM 17.8, Subchapter 1 – General Provisions, including, but not limited to:

1. ARM 17.8.101 Definitions. This rule includes a list of applicable definitions used in this chapter, unless indicated otherwise in a specific subchapter.
2. ARM 17.8.105 Testing Requirements. Any person or persons responsible for the emission of any air contaminant into the outdoor atmosphere shall, upon written request of the Department, provide the facilities and necessary equipment (including instruments and sensing devices) and shall conduct tests, emission or ambient, for such periods of time as may be necessary using methods approved by the Department.
3. ARM 17.8.106 Source Testing Protocol. The requirements of this rule apply to any emission source testing conducted by the Department, any source, or other entity as required by any rule in this chapter, or any permit or order issued pursuant to this chapter, or the provisions of the Clean Air Act of Montana, 75-2-101, *et seq.*, Montana Code Annotated (MCA).

Fike shall comply with the requirements contained in the Montana Source Test Protocol and Procedures Manual, including, but not limited to, using the proper test methods and supplying the required reports. A copy of the Montana Source Test Protocol and Procedures Manual is available from the Department upon request.

4. ARM 17.8.110 Malfunctions. (2) The Department must be notified promptly by telephone whenever a malfunction occurs that can be expected to create emissions in excess of any applicable emission limitation or to continue for a period greater than 4 hours.
5. ARM 17.8.111 Circumvention. (1) No person shall cause or permit the installation or use of any device or any means that, without resulting in reduction of the total amount of air contaminant emitted, conceals or dilutes an emission of air contaminant that would otherwise violate an air pollution control regulation. (2) No equipment that may produce emissions shall be operated or maintained in such a manner as to create a public nuisance.

B. ARM 17.8, Subchapter 2 – Ambient Air Quality, including, but not limited to:

1. ARM 17.8.210 Ambient Air Quality Standards for Sulfur Dioxide
2. ARM 17.8.211 Ambient Air Quality Standards for Nitrogen Dioxide
3. ARM 17.8.212 Ambient Air Quality Standards for Carbon Monoxide
4. ARM 17.8.213 Ambient Air Quality Standard for Ozone
5. ARM 17.8.220 Ambient Air Quality Standard for Settled Particulate Matter
6. ARM 17.8.221 Ambient Air Quality Standard for Visibility
7. ARM 17.8.223 Ambient Air Quality Standard for PM₁₀

Fike must maintain compliance with the applicable ambient air quality standards.

- C. ARM 17.8, Subchapter 3 – Emission Standards, including, but not limited to:
1. ARM 17.8.304 Visible Air Contaminants. This rule requires that no person may cause or authorize emissions to be discharged into the outdoor atmosphere from any source installed after November 23, 1968, that exhibit an opacity of 20% or greater averaged over 6 consecutive minutes.
 2. ARM 17.8.308 Particulate Matter, Airborne. (1) This rule requires an opacity limitation of less than 20% for all fugitive emission sources and that reasonable precautions be taken to control emissions of airborne particulate matter. (2) Under this rule, Fike shall not cause or authorize the use of any street, road, or parking lot without taking reasonable precautions to control emissions of airborne particulate matter.
 3. ARM 17.8.309 Particulate Matter, Fuel Burning Equipment. This rule requires that no person shall cause or authorize to be discharged into the atmosphere particulate matter caused by the combustion of fuel in excess of the amount determined by this section.
 4. ARM 17.8.310 Particulate Matter, Industrial Process. This rule requires that no person shall cause or authorize to be discharged into the atmosphere particulate matter in excess of the amount set forth in this section.
 5. ARM 17.8.322 Sulfur Oxide Emissions--Sulfur in Fuel. This rule requires that no person shall burn liquid, solid, or gaseous fuel in excess of the amount set forth in this section.
 6. ARM 17.8.324 Hydrocarbon Emissions--Petroleum Products. (3) No person shall load or permit the loading of gasoline into any stationary tank with a capacity of 250 gallons or more from any tank truck or trailer, except through a permanent submerged fill pipe, unless such tank truck or trailer is equipped with a vapor loss control device as described in (1) of this rule.
 7. ARM 17.8.340 Standard of Performance for New Stationary Sources. This rule incorporates, by reference, 40 CFR Part 60, Standards of Performance for New Stationary Sources (NSPS). Fike is considered an NSPS affected facility under 40 CFR Part 60 and is subject to the requirements of the following subparts.
 - a. 40 CFR 60, Subpart A – General Provisions apply to all equipment or facilities subject to an NSPS Subpart as listed below:
 - b. 40 CFR 60, Subpart OOO – Standards of Performance for Nonmetallic Mineral Processing Plants. In order for a crushing plant to be subject to this subpart, the facility must meet the definition of an affected facility and, the affected equipment must have been constructed, reconstructed, or modified after August 31, 1983. Based on the information submitted by Fike, the portable equipment to be used under MAQP #2559-02 is subject to this subpart.
 - c. 40 CFR 60, Subpart IIII - Standards of Performance for Stationary Compression Ignition Internal Combustion Engines (CI ICE). Owners and operators of stationary CI ICE that commence construction after July 11, 2005, where the stationary CI ICE are manufactured after April 1, 2006, and are not fire pump engines, and owners and operators of stationary CI ICE that modify or

reconstruct their stationary CI ICE after July 11, 2005, are subject to this subpart. Based on the information submitted by Fike, the CI ICE equipment to be used under MAQP #2559-02 is not subject to this subpart because it was manufactured prior to April 1, 2006. However, as this permit is written in a de-minimis friendly manner, future engines may be subject to this subpart.

8. ARM 17.8.342 Emission Standards for Hazardous Air Pollutants for Source Categories. This rule incorporates, by reference, 40 CFR Part 63, National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Source Categories. Fike is considered an NESHAP-affected facility under 40 CFR Part 63 and is subject to the requirements of the following subparts.
 - a. 40 CFR 63, Subpart A – General Provisions apply to all equipment or facilities subject to a NESHAPs Subpart as listed below.
 - b. 40 CFR 63, Subpart ZZZZ - National Emissions Standards for Hazardous Air Pollutants (HAPs) for Stationary Reciprocating Internal Combustion Engines (RICE). An owner or operator of a stationary reciprocating internal combustion engine (RICE) at a major or area source of HAP emissions is subject to this rule except if the stationary RICE is being tested at a stationary RICE test cell/stand. An area source of HAP emissions is a source that is not a major source. Therefore, should this engine be determined a stationary engine, remaining in the same general location for more than 12 months, Fike would be subject to this subpart.

D. ARM 17.8, Subchapter 5 – Air Quality Permit Application, Operation, and Open Burning Fees, including, but not limited to:

1. ARM 17.8.504 Air Quality Permit Application Fees. This rule requires that an applicant submit an MAQP application fee concurrent with the submittal of an MAQP application. A permit application is incomplete until the proper application fee is paid to the Department. Fike submitted the appropriate permit application fee for the current permit action.
2. ARM 17.8.505 Air Quality Operation Fees. An annual air quality operation fee must, as a condition of continued operation, be submitted to the Department by each source of air contaminants holding an MAQP, excluding an open burning permit, issued by the Department.

An air quality operation fee is separate and distinct from an MAQP application fee. The annual assessment and collection of the air quality operation fee, described above, shall take place on a calendar-year basis. The Department may insert into any final permit issued after the effective date of these rules, such conditions as may be necessary to require the payment of an air quality operation fee on a calendar-year basis, including provisions that pro-rate the required fee amount.

E. ARM 17.8, Subchapter 7 – Permit, Construction, and Operation of Air Contaminant Sources, including, but not limited to:

1. ARM 17.8.740 Definitions. This rule is a list of applicable definitions used in this chapter, unless indicated otherwise in a specific subchapter.

2. ARM 17.8.743 Montana Air Quality Permits--When Required. This rule requires a person to obtain an MAQP or permit modification to construct, modify, or use any asphalt plant, crusher or screen that has the potential to emit (PTE) greater than 15 tons per year of any pollutant. Fike has a PTE greater than 15 tons per year of oxides of nitrogen (NO_x), carbon monoxide (CO), and particulate matter (PM); therefore, an MAQP is required.
3. ARM 17.8.744 Montana Air Quality Permits--General Exclusions. This rule identifies the activities that are not subject to the Montana Air Quality Permit program.
4. ARM 17.8.745 Montana Air Quality Permits--Exclusion for De Minimis Changes. This rule identifies the de minimis changes at permitted facilities that do not require a permit under the Montana Air Quality Permit Program.
5. ARM 17.8.748 New or Modified Emitting Units--Permit Application Requirements. This rule requires that a permit application be submitted prior to installation, modification, or use of a source. Fike submitted the required permit application for the current permit action, as required by the Department. (7) This rule requires that the applicant notify the public by means of legal publication in a newspaper of general circulation in the area affected by the application for a permit. Fike submitted an affidavit of publication of public notice for the August 29, 2010 issue of the *Sidney Herald*, a newspaper of general circulation in the town of Sidney in Richland County, as proof of compliance with the public notice requirements.
6. ARM 17.8.749 Conditions for Issuance or Denial of Permit. This rule requires that the permits issued by the Department must authorize the construction and operation of the facility or emitting unit subject to the conditions in the permit and the requirements of this subchapter. This rule also requires that the permit must contain any conditions necessary to assure compliance with the Federal Clean Air Act (FCAA), the Clean Air Act of Montana, and rules adopted under those acts.
7. ARM 17.8.752 Emission Control Requirements. This rule requires a source to install the maximum air pollution control capability that is technically practicable and economically feasible, except that BACT shall be utilized. The required BACT analysis is included in Section III of this permit analysis.
8. ARM 17.8.755 Inspection of Permit. This rule requires that MAQPs shall be made available for inspection by the Department at the location of the source.
9. ARM 17.8.756 Compliance with Other Requirements. This rule states that nothing in the permit shall be construed as relieving Fike of the responsibility for complying with any applicable federal or Montana statute, rule, or standard, except as specifically provided in ARM 17.8.740, *et seq.*
10. ARM 17.8.759 Review of Permit Applications. This rule describes the Department's responsibilities for processing permit applications and making permit decisions on those permit applications that do not require the preparation of an environmental impact statement.
11. ARM 17.8.762 Duration of Permit. An MAQP shall be valid until revoked or modified, as provided in this subchapter, except that a permit issued prior to construction of a new or modified source may contain a condition providing that the permit will expire unless construction is commenced within the time specified in the permit, which in no event may be less than 1 year after the permit is issued.

12. ARM 17.8.763 Revocation of Permit. An MAQP may be revoked upon written request of the permittee, or for violations of any requirement of the Clean Air Act of Montana, rules adopted under the Clean Air Act of Montana, the FCAA, rules adopted under the FCAA, or any applicable requirement contained in the Montana State Implementation Plan (SIP).
13. ARM 17.8.764 Administrative Amendment to Permit. An MAQP may be amended for changes in any applicable rules and standards adopted by the Board of Environmental Review (Board) or changed conditions of operation at a source or stack that do not result in an increase of emissions as a result of those changed conditions. The owner or operator of a facility may not increase the facility's emissions beyond permit limits unless the increase meets the criteria in ARM 17.8.745 for a de minimis change not requiring a permit, or unless the owner or operator applies for and receives another permit in accordance with ARM 17.8.748, ARM 17.8.749, ARM 17.8.752, ARM 17.8.755, and ARM 17.8.756, and with all applicable requirements in ARM Title 17, Chapter 8, Subchapters 8, 9, and 10.
14. ARM 17.8.765 Transfer of Permit. (1) This rule states that an MAQP may be transferred from one location to another if the Department receives a complete notice of intent to transfer location, the facility will operate in the new location for less than 1 year, the facility will comply with the FCAA and the Clean Air Act of Montana, and the facility complies with other applicable rules. (2) This rule states that an MAQP may be transferred from one person to another if written notice of intent to transfer, including the names of the transferor and the transferee, is sent to the Department.

F. ARM 17.8, Subchapter 8 - Prevention of Significant Deterioration of Air Quality, including, but not limited to:

1. ARM 17.8.801 Definitions. This rule is a list of applicable definitions used in this subchapter.
2. ARM 17.8.818 Review of Major Stationary Sources and Major Modification--Source Applicability and Exemptions. The requirements contained in ARM 17.8.819 through ARM 17.8.827 shall apply to any major stationary source and any major modification with respect to each pollutant subject to regulation under the FCAA that it would emit, except as this subchapter would otherwise allow.

This facility is not a major stationary source because it is not a listed source and the facility's PTE is less than 250 tons per year of any pollutant (excluding fugitive emissions).

G. ARM 17.8, Subchapter 12 – Operating Permit Program Applicability, including, but not limited to:

1. ARM 17.8.1201 Definitions. (23) Major Source under Section 7412 of the FCAA is defined as any stationary source having:
 - a. PTE > 100 tons/year of any pollutant;
 - b. PTE > 10 tons/year of any one hazardous air pollutant (HAP), PTE > 25 tons/year of a combination of all HAPs, or lesser quantity as the Department may establish by rule; or
 - c. PTE > 70 tons/year of particulate matter with an aerodynamic diameter of 10 microns or less (PM₁₀) in a serious PM₁₀ nonattainment area.

2. ARM 17.8.1204 Air Quality Operating Permit Program Applicability. (1) Title V of the FCAA Amendments of 1990 requires that all sources, as defined in ARM 17.8.1204 (1), obtain a Title V Operating Permit. In reviewing and issuing MAQP #2559-02 for Fike, the following conclusions were made:
- a. The facility's PTE is less than 100 tons/year for any pollutant
 - b. The facility's PTE is less than 10 tons/year for any one HAP and less than 25 tons/year of all HAPs
 - c. This source is not located in a serious PM₁₀ nonattainment area
 - d. This facility is subject to a current NSPS (40 CFR 60, Subpart OOO)
 - e. This facility is subject to area source provisions of a current NESHAP standards (40 CFR 63, Subpart ZZZZ)
 - f. This source is not a Title IV affected source
 - g. This source is not a solid waste combustion unit
 - h. This source is not an EPA designated Title V source

Based on these facts, the Department has determined that Fike will be a minor source of emissions as defined under Title V

III. BACT Determination

A BACT determination is required for each new or modified source. Fike shall install on the new or modified source the maximum air pollution control capability which is technically practicable and economically feasible, except that BACT shall be utilized.

Diesel Generator Engine:

Any new diesel engine would likely be required to comply with the federal engine emission limitations including, for example, EPA Tier emission standards for non-road engines (40 CFR Part 1039), New Source Performance Standard emission limitations for stationary compression ignition engines (40 CFR 60, Subpart IIII), or National Emissions Standards for Hazardous Air Pollutant Sources for Reciprocating Internal Combustion Engines (40 CFR 63, Subpart ZZZZ). Therefore, the Department has determined that compliance with any applicable federal standards constitutes BACT for these engines.

Crushing and Screening and Fugitive Emissions:

Fike is required to use water spray bars and water and/or chemical dust suppressant, as necessary, to control particulate emissions. Furthermore, Fike is required to comply with 40 CFR 60, Subpart OOO containing opacity limitations. The Department determined that using water spray bars to maintain compliance with opacity requirements constitutes BACT for these sources. The control options selected contain control equipment and control costs comparable to other recently permitted similar sources and are capable of achieving the appropriate emission standards.

IV. Emission Inventory**

MAQP 2559-02							
Fike Crushing, Inc.							
Potential to Emit in Tons per Year							
Source	PM	PM ₁₀	PM _{2.5}	NO _x	CO	VOC	SO _x
CAT 831-hp Generator Engine	8.01	8.01	8.01	44.72	24.31	9.15	7.46
300 TPH Cone Crusher	3.94	1.58	0.09	N/A	N/A	N/A	N/A
300 TPH Jaw Crusher	3.94	1.58	0.09	N/A	N/A	N/A	N/A
300 TPH Crusher	3.94	1.58	0.09	N/A	N/A	N/A	N/A
400 TPH Screen	6.31	3.85	0.19	N/A	N/A	N/A	N/A
Material Transfer	0.55	0.18	0.07	N/A	N/A	N/A	N/A
Pile Forming	12.97	6.13	0.93	N/A	N/A	N/A	N/A
Bulk Loading	0.03	0.03	NEG	N/A	N/A	N/A	N/A
Haul Roads	5.49	1.51	0.15	N/A	N/A	N/A	N/A
TOTAL:	45.18	24.45	9.62	44.72	24.31	9.15	7.46

** Inventory reflects maximum allowable emissions for all pollutants based on maximum production and year-round operation (8,760 hours).

CO = carbon monoxide

hp = horsepower

lb = pound

N/A = not applicable

NEG = negligible

NO_x = oxides of nitrogen

PM = particulate matter

PM₁₀ = particulate matter with an aerodynamic diameter of 10 microns or less

PM_{2.5} = particulate matter with an aerodynamic diameter of 2.5 microns or less

SO_x = oxides of sulfur

TPY = tons per year

TPH = tons per hour

VOC = volatile organic compounds

VMT = vehicle miles traveled

yr = year

300 TPH Cone Crusher

Maximum Rated Throughput: 300 TPH

Allowable Yearly Operational Time: 8760 hr/yr

PM

Emissions Factor: 0.003 lb/ton AP-42 Table 11.19.2-2, 08/2004

Calculations: 0.003lb/ton*300TPH*8760hr/yr= 7884 lb/yr

7884lb/yr*0.0005ton/lb = **3.94 ton/yr**

PM₁₀

Emissions Factor: 0.0012 lb/ton AP-42 Table 11.19.2-2, 08/2004

Calculations: 0.0012lb/ton*300TPH*8760hr/yr= 3153.6 lb/yr

3153.6lb/yr*0.0005ton/lb = **1.58 ton/yr**

PM_{2.5}

Emissions Factor: 0.00007 lb/ton AP-42 Table 11.19.2-2, 08/2004

Calculations: 0.00007lb/ton*300TPH*8760hr/yr= 183.96 lb/yr

183.96lb/yr*0.0005ton/lb = **0.09 ton/yr**

300 TPH Jaw Crusher

Maximum Rated Throughput: 300 TPH

Allowable Yearly Operational Time: 8760 hr/yr

PM

Emissions Factor: 0.003 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.003\text{lb/ton} \times 300\text{TPH} \times 8760\text{hr/yr} = 7884 \text{ lb/yr}$
 $7884\text{lb/yr} \times 0.0005\text{ton/lb} = 3.94 \text{ ton/yr}$

PM₁₀

Emissions Factor: 0.0012 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.0012\text{lb/ton} \times 300\text{TPH} \times 8760\text{hr/yr} = 3153.6 \text{ lb/yr}$
 $3153.6\text{lb/yr} \times 0.0005\text{ton/lb} = 1.58 \text{ ton/yr}$

PM_{2.5}

Emissions Factor: 0.00007 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.00007\text{lb/ton} \times 300\text{TPH} \times 8760\text{hr/yr} = 183.96 \text{ lb/yr}$
 $183.96\text{lb/yr} \times 0.0005\text{ton/lb} = 0.09 \text{ ton/yr}$

300 TPH Jaw Crusher

Maximum Rated Throughput: 300 TPH
 Allowable Yearly Operational Time: 8760 hr/yr

PM

Emissions Factor: 0.003 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.003\text{lb/ton} \times 300\text{TPH} \times 8760\text{hr/yr} = 7884 \text{ lb/yr}$
 $7884\text{lb/yr} \times 0.0005\text{ton/lb} = 3.94 \text{ ton/yr}$

PM₁₀

Emissions Factor: 0.0012 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.0012\text{lb/ton} \times 300\text{TPH} \times 8760\text{hr/yr} = 3153.6 \text{ lb/yr}$
 $3153.6\text{lb/yr} \times 0.0005\text{ton/lb} = 1.58 \text{ ton/yr}$

PM_{2.5}

Emissions Factor: 0.00007 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.00007\text{lb/ton} \times 300\text{TPH} \times 8760\text{hr/yr} = 183.96 \text{ lb/yr}$
 $183.96\text{lb/yr} \times 0.0005\text{ton/lb} = 0.09 \text{ ton/yr}$

400 TPH Screen

Maximum Rated Throughput: 400 TPH
 Allowable Yearly Operational Time: 8760 hr/yr

PM

Emissions Factor: 0.0036 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.0036\text{lb/ton} \times 400\text{TPH} \times 8760\text{hr/yr} = 12614.4 \text{ lb/yr}$
 $12614.4 \times 0.0005 \text{ ton/lb} = 6.31 \text{ ton/yr}$

PM₁₀

Emissions Factor: 0.0022 lb/ton AP-42 Table 11.19.2-2, 08/2004
 Calculations: $0.0022\text{lb/ton} \times 400\text{TPH} \times 8760\text{hr/yr} = 7708.8 \text{ lb/yr}$
 $7708.8 \times 0.0005 \text{ ton/lb} = 3.85 \text{ ton/yr}$

PM_{2.5}

Emissions Factor: 0.000108 lb/ton 3% of PM - Figure 5, AP-42 11 Background Document
 Calculations: $0.000108\text{lb/ton} \times 400\text{TPH} \times 8760\text{hr/yr} = 378.432 \text{ lb/yr}$
 $378.432 \times 0.0005 \text{ ton/lb} = 0.19 \text{ ton/yr}$

831-hp Diesel generator engine

Maximum rated hp: 831 hp
 Allowable Yearly Operational Time: 8760 hr/yr

NO_x
 Emissions Factor: 10.21 lb/hr Cat C18 Data
 Calculations: 10.21lb/hr*8760hr/yr= 89439.6 lb/yr
 89439.6lb/yr*0.0005ton/lb= **44.72 ton/yr**

CO
 Emissions Factor: 0.00668 lb/hp-hr AP-42 Table 3.3-1, 10/1996
 Calculations: 0.00668lb/hp-hr*831hp*8760hr/yr= 48627.46 lb/yr
 48627.4608lb/yr*0.0005ton/lb = **24.31 ton/yr**

VOC
 Emissions Factor: 0.002514 lb/hp-hr AP-42 Table 3.3-1, 10/1996
 Calculations: 0.002514lb/hp-hr*831hp*8760hr/yr= 18301.54 lb/yr
 18301.541796lb/yr*0.0005ton/lb = **9.15 ton/yr**

SO_x
 Emissions Factor: 0.00205 lb/hp-hr AP-42 Table 3.3-1, 10/1996
 Calculations: 0.00205lb/hp-hr*831hp*8760hr/yr= 14923.1 lb/yr
 14923.098lb/yr*0.0005ton/lb = **7.46 ton/yr**

PM
 Emissions Factor: 0.0022 lb/hp-hr AP-42 Table 3.3-1, 10/1996
 Calculations: 0.0022lb/hp-hr*831hp*8760hr/yr= 16015.03 lb/yr
 16015.032lb/yr*0.0005ton/lb = **8.01 ton/yr**

CO₂
 Emissions Factor: 1.16 lb/hp-hr AP-42 Table 3.4-1, 10/1996
 Calculations: 1.16lb/hp-hr*831hp*8760hr/yr= 8444290 lb/yr
 8444289.6lb/yr*0.0005ton/lb = **4222.14 ton/yr**

Material Transfer

Number of transfers: 3
 Process Rate: 300 TPH

PM
 Emissions Factor: 0.00014 lb/ton
 Calculations: 0.00014lb/ton*300TPH*8760hr/yr*3= 1103.76 lb/yr
 1103.76lb/yr*0.0005ton/lb = **0.55 ton/yr**

PM₁₀
 Emissions Factor: 0.000046 lb/ton
 Calculations: 0.000046lb/ton*300TPH*8760hr/yr*3= 362.664 lb/yr
 362.664lb/yr*0.0005ton/lb = **0.18 ton/yr**

PM_{2.5}
 Emissions Factor: 0.000018 lb/ton
 Calculations: 0.000018lb/ton*300TPH*8760hr/yr*3= 141.912 lb/yr
 141.912lb/yr*0.0005ton/lb = **0.07 ton/yr**

Pile Forming

These calculations account for

1. Loading of aggregate onto storage piles (batch or continuous drop operations).
2. Equipment traffic in storage area.
3. Wind erosion of pile surfaces and ground areas around piles.
4. Loadout of aggregate for shipment or for return to the process stream (batch or continuous drop operations).

*For calculations, one pile at max process rate accounts for the product piles from screen w/ moisture carry over
Reapplication of water on the piles may be required to maintain the moisture content

$$E = k(0.0032) \frac{\left(\frac{U}{5}\right)^{1.3}}{\left(\frac{M}{2}\right)^{1.4}} \text{ (pound [lb]/ton)}$$

where:

E = emission factor
k = particle size multiplier (dimensionless)
U = mean wind speed, meters per second (m/s) (miles per hour [mph])
M = material moisture content (%)

BASED ON AP-42 Chapter 13 - 11/2006

k =	0.74	PM30
	0.35	PM10
	0.053	PM2.5
U =	9.1	MPH
M =	1.55	avg moisture content, AP-42 Table 11.19.2-1 Note b

PM Emissions:

Emissions Factor:	0.0074	lb/ton	
Calculations:	0.0074lb/ton*400TPH*8760hr/yr=		25941 lb/yr
	25941lb/yr*0.0005ton/lb=		12.97 ton/yr

PM₁₀ Emissions:

Emissions Factor:	0.0035	lb/ton	
Calculations:	0.0035lb/ton*12614.4*0.0005 ton/lb = *=		12269 lb/yr
	12269lb/yr*0.0005ton/lb=		6.13 ton/yr

PM_{2.5} Emissions:

Emissions Factor:	0.0005	lb/ton	
Calculations:	0.0005lb/ton**=		1858 lb/yr
	1858lb/yr*0.0005ton/lb=		0.93 ton/yr

Raw Material Handling

Hours of operation:	8760	hr/yr
---------------------	------	-------

PM₁₀ Emissions

Emissions Factor:	0.000016 lb/ton	(AP-42 Table 11.19.2-2, 08/2004)	
Calculations:	0.000016lb/ton*400 ton/hr*8760hr/yr=		56.064 lb/yr
	56.064lb/yr*0.0005 ton/lb =		0.03 ton/yr

PM Emissions: no data available, => 0.03

PM_{2.5} Emissions: no data, <0.03

Haul Roads

E = k (s/12)^a(W/3)^b

E = size-specific emission factor (lb/VMT)
s = surface material silt content (%)
W = mean vehicle weight (tons)

s =	7.1	% (AP-42 Table 13.2.2-1, 11/2006)
k =	0.15	for PM2.5 (AP-42 Table 13.2.2-2, 11/2006)
	1.5	for PM10
	4.9	for PM
W =	50	estimated
a =	0.9	PM2.5 and PM10
	0.7	PM
b =	0.45	
VMT =	5	VMT standard estimate

PM Emissions

Emissions Factor:	12.04 lb/VMT	
Calculations:	12.035994738732lb/VMT*5VMT=	60.18 lb/day
	60.17997369366lb/day*365 day/yr =	21965.69 lb/yr
	21965.6903981859lb/yr*0.0005ton/lb * 50% =	5.49 ton/yr

PM₁₀ Emissions

Emissions Factor:	3.32 lb/VMT	
Calculations:	3.31735988588915lb/VMT*=	16.59 lb/day
	16.5867994294458lb/day*365 day/yr =	6054.18 lb/yr
	6054.1817917477lb/yr*0.0005ton/lb =	1.51 ton/yr

PM_{2.5} Emissions

Emissions Factor:	0.331736 lb/VMT	
Calculations:	0.331735989lb/VMT*=	1.66 lb/day
	1.658679945lb/day*365 day/yr =	605.42 lb/yr
	605.418179925lb/yr*0.0005ton/lb =	0.15 ton/yr

V. Existing Air Quality

The home-pit location, which is the initial location for Fike’s operations under this permit, is currently designated as attainment/unclassifiable for all criteria pollutants.

VI. Air Quality Impacts

The net change in allowable emissions is represented below. This permitting action results in significant decreases in allowable emissions of particulate matter and oxides of nitrogen, with very small increases in carbon monoxide, volatile organic compounds, and oxides of sulfur.

MAQP#	PM	NO _x	CO	VOC	SO _x
2559-02	45.18	44.72	24.31	9.15	7.46
2559-01	107.38	99.23	21.38	7.91	6.56
Net Change:	-62.2	-54.51	2.93	1.24	0.9

VII. Ambient Air Impact Analysis

The Department modeled the generator engine to determine impacts to the 1-hour nitrogen dioxide (NO₂) National Ambient Air Quality Standards (NAAQS). The Department assumed that 75% of the NO_x emissions are NO₂. A background NO₂ concentration of 40 micrograms per cubic meter (ug/m³) was assumed, and Billings meteorology used. The Department determined that a 14 foot (ft) stack height would allow for a scenario in which operations were within a 10 square acre boundary in which a public road went through the facility. Furthermore, the Department determined that a 14 ft stack height would allow for operations within one calendar year in three with boundaries as small as 0.9 acres.

The Department determined, based on the NO_x emissions limit and stack height required, that the impact from this permitting action would be expected to be minor. The Department believes it will not cause or contribute to a violation of any ambient air quality standard.

VIII. Taking or Damaging Implication Analysis

As required by 2-10-105, MCA, the Department conducted the following private property taking and damaging assessment.

YES	NO	
XX		1. Does the action pertain to land or water management or environmental regulation affecting private real property or water rights?
	XX	2. Does the action result in either a permanent or indefinite physical occupation of private property?
	XX	3. Does the action deny a fundamental attribute of ownership? (ex.: right to exclude others, disposal of property)
	XX	4. Does the action deprive the owner of all economically viable uses of the property?
	XX	5. Does the action require a property owner to dedicate a portion of property or to grant an easement? [If no, go to (6)].
		5a. Is there a reasonable, specific connection between the government requirement and legitimate state interests?
		5b. Is the government requirement roughly proportional to the impact of the proposed use of the property?
	XX	6. Does the action have a severe impact on the value of the property? (consider economic impact, investment-backed expectations, character of government action)
	XX	7. Does the action damage the property by causing some physical disturbance with respect to the property in excess of that sustained by the public generally?
	XX	7a. Is the impact of government action direct, peculiar, and significant?
	XX	7b. Has government action resulted in the property becoming practically inaccessible, waterlogged or flooded?

YES	NO	
	XX	7c. Has government action lowered property values by more than 30% and necessitated the physical taking of adjacent property or property across a public way from the property in question?
	XX	Takings or damaging implications? (Taking or damaging implications exist if YES is checked in response to question 1 and also to any one or more of the following questions: 2, 3, 4, 6, 7a, 7b, 7c; or if NO is checked in response to questions 5a or 5b; the shaded areas)

Based on this analysis, the Department determined there are no taking or damaging implications associated with this permit action.

IX. Environmental Assessment

An environmental assessment, required by the Montana Environmental Policy Act, was completed for this project. A copy is attached.

DEPARTMENT OF ENVIRONMENTAL QUALITY
Permitting and Compliance Division
Air Resources Management Bureau
P.O. Box 200901, Helena, MT 59620
(406) 444-3490

FINAL ENVIRONMENTAL ASSESSMENT (EA)

Issued To: Fike Crushing, Inc.
524 Harvey Avenue
Harvey, ND 58341

Montana Air Quality Permit number: 2559-02

Preliminary Determination Issued: October 7, 2010

Department Decision Issued: October 25, 2010

Permit Final: November 10, 2010

1. *Legal Description of Site:* The home pit location for Fike's crushing and screening operation is Section 7, Township 24 North, Range 60 East, in Richland County, Montana.
2. *Description of Project:* Fike plans to operate a portable crushing and screening plant, including a diesel fired generator engine.
3. *Objectives of Project:* The objective of the project is to crush and sort sand and gravel-like material for various uses.
4. *Alternatives Considered:* In addition to the proposed action, the Department also considered the "no-action" alternative. The "no-action" alternative would deny issuance of the air quality preconstruction permit to the proposed facility. However, the Department does not consider the "no-action" alternative to be appropriate because Fike has demonstrated compliance with all applicable rules and regulations as required for permit issuance. Therefore, the "no-action" alternative was eliminated from further consideration.
5. *A Listing of Mitigation, Stipulations, and Other Controls:* A list of enforceable conditions, including a BACT analysis, would be included in MAQP #2559-02.
6. *Regulatory Effects on Private Property:* The Department considered alternatives to the conditions imposed in this permit as part of the permit development. The Department determined that the permit conditions are reasonably necessary to ensure compliance with applicable requirements and demonstrate compliance with those requirements and do not unduly restrict private property rights.

7. The following table summarizes the potential physical and biological effects of the proposed project on the human environment. The “no-action” alternative was discussed previously.

		Major	Moderate	Minor	None	Unknown	Comments Included
A	Terrestrial and Aquatic Life and Habitats			XX			Yes
B	Water Quality, Quantity, and Distribution			XX			Yes
C	Geology and Soil Quality, Stability and Moisture			XX			Yes
D	Vegetation Cover, Quantity, and Quality			XX			Yes
E	Aesthetics			XX			Yes
F	Air Quality			XX			Yes
G	Unique Endangered, Fragile, or Limited Environmental Resources			XX			Yes
H	Demands on Environmental Resource of Water, Air and Energy			XX			Yes
I	Historical and Archaeological Sites			XX			Yes
J	Cumulative and Secondary Impacts			XX			Yes

SUMMARY OF COMMENTS ON POTENTIAL PHYSICAL AND BIOLOGICAL EFFECTS: The following comments have been prepared by the Department.

A. Terrestrial and Aquatic Life and Habitats

The net change in allowable emissions which would be present in issuing MAQP #2559-02 is presented below. A large reduction in allowable emissions of particulate matter and oxides of nitrogen, with a relatively small increase in allowable emissions of carbon monoxide, volatile organic compounds (VOC), and oxides of sulfur (SO_x) would be present. The Department would expect minor, if any, discernable effect on terrestrial and aquatic life and habitats.

MAQP#	PM	NO _x	CO	VOC	SO _x
2559-02	45.18	44.72	24.31	9.15	7.46
2559-01	107.38	99.23	21.38	7.91	6.56
Net Change:	-62.2	-54.51	2.93	1.24	0.9

B. Water Quality, Quantity and Distribution

The portable operation would continue to be required to use water and spray bars to control particulate matter emissions from equipment operations and the general plant area. The Department would expect minor, if any, effects to water quality, quantity, and distribution would occur as a result of the issuance of MAQP #2559-02.

C. Geology and Soil Quality, Stability and Moisture

The portable operation would continue to be required to use water and spray bars to control particulate matter emissions from equipment operations and the general plant area. Operations would normally occur in those areas designated for such uses, such as areas permitted for open cut operations. Therefore, the Department would expect minor effects to geology, soil quality, stability, and moisture as a result of the issuance of MAQP #2559-02.

D. Vegetation Cover, Quantity, and Quality

MAQP #2559-02 would contain opacity requirements and require use of the application of water as needed to limit the emissions of particulate matter. As a result of the controls which would limit emissions as required by MAQP #2559-02, and the dispersion of those emissions, the Department would expect minor effects to vegetation cover, quantity, and quality.

E. Aesthetics

As an existing permitted source, the Department would not expect any more than a minor change in effects to aesthetics as a result of issuing MAQP #2559-02.

F. Air Quality

As presented in Section 7A above, a large reduction in allowable emissions of PM and NO_x, with a relatively small increase in allowable emissions of CO, VOC, and SO_x would be present. The Department would not expect any more than a minor impact to air quality as a result of issuing MAQP #2559-02.

G. Unique Endangered, Fragile, or Limited Environmental Resources

As presented in Section 7.A above, a large reduction in allowable emissions of PM and NO_x, with a relatively small increase in allowable emissions of CO, VOC, and SO_x would be present. The net change in allowable emissions associated with issuance of MAQP #2559-02 would likely reduce the effects to unique endangered, fragile, or limited environmental resources. The Department would expect minor, if any, discernable effects to endangered, fragile, or limited environmental resources as a result of issuance of MAQP #2559-02.

H. Demands on Environmental Resource of Water, Air and Energy

The portable operation would continue to be required to utilize water to control particulate matter emissions and would continue to use a diesel fired generator engine to provide on-site electricity. As previously discussed, this permitting action would result in a large net reduction of PM and NO_x, with increases in allowable emissions of CO, VOC, and SO_x being less than de minimis levels. The Department, in issuing MAQP #2559-02, would expect any effect on the demands of environmental resources of water, air, and energy to be minor, if any.

I. Historical and Archaeological Sites

The source would be permitted to operate with an initial location which has been the home pit location for this source. Therefore, the Department would not expect any effects to historical and archeological sites as a result of issuance of MAQP #2559-02. The source would continue to be permitted as a portable source, and these portable operations typically operate with an area designated for such uses, such as areas permitted for open cut operations. Therefore, in considering the portable nature of the facility, the Department would expect minor, if any, effect to historical and archaeological sites as a result of this permitting action.

J. Cumulative and Secondary Impacts

The Department would expect no more than a minor effect to any of the individual physical and biological considerations above. Cumulatively and secondary impacts to physical and biological would be expected to be minor.

8. The following table summarizes the potential economic and social effects of the proposed project on the human environment. The “no-action” alternative was discussed previously.

		Major	Moderate	Minor	None	Unknown	Comments Included
A	Social Structures and Mores			XX			Yes
B	Cultural Uniqueness and Diversity			XX			Yes
C	Local and State Tax Base and Tax Revenue			XX			Yes
D	Agricultural or Industrial Production			XX			Yes
E	Human Health			XX			Yes
F	Access to and Quality of Recreational and Wilderness Activities			XX			Yes
G	Quantity and Distribution of Employment			XX			Yes
H	Distribution of Population			XX			Yes
I	Demands for Government Services			XX			Yes
J	Industrial and Commercial Activity			XX			Yes
K	Locally Adopted Environmental Plans and Goals			XX			Yes
L	Cumulative and Secondary Impacts			XX			Yes

SUMMARY OF COMMENTS ON POTENTIAL ECONOMIC AND SOCIAL EFFECTS: The following comments have been prepared by the Department.

- A. Social Structures and Mores
- B. Cultural Uniqueness and Diversity
- C. Local and State Tax Base and Tax Revenue

The Department would expect minor, if any, effects to these categories as a result of issuance of MAQP #2559-02. This permitting action updates the permit for an already permitted source.

- D. Agricultural or Industrial Production

MAQP #2559-02 would contain opacity requirements and Fike would be required to use water, spray bars, and/or chemical dust suppressant as needed to maintain compliance with those opacity requirements. These conditions limit the amount of particulate matter that would be expected to dissipate on surrounding vegetation.

- E. Human Health

MAQP #2559-02 would contain conditions and limitations derived from rules designed to protect human health. The Department would expect minor effects to Human Health.

- F. Access to and Quality of Recreational and Wilderness Activities
- G. Quantity and Distribution of Employment
- H. Distribution of Population

The Department would expect minor, if any, effects to these categories as a result of issuance of MAQP #2559-02. This permitting action updates the permit for an already permitted source.

I. Demands for Government Services

In consideration of new NAAQS for NO₂, MAQP #2559-02 would contain stack height requirements and limits on NO_x emissions. Changes to demands for government services would be expected to be minor.

J. Industrial and Commercial Activity

The Department would expect minor, if any, effects as a result of issuance of MAQP #2559-02. This permitting action updates the permit for an already permitted source.

K. Locally Adopted Environmental Plans and Goals

The Department is not aware of any locally adopted environmental plans and goals in which issuance of MAQP #2559-02 would conflict with. The MAQP is derived from rules designed to protect human health.

L. Cumulative and Secondary Impacts

The Department found no more than minor effects in the individual considerations above. Collectively, the Department would expect no more than a minor effect to cumulative and secondary impacts associated with issuance of MAQP #2559-02.

Recommendation: No Environmental Impact Statement (EIS) is required.

If an EIS is not required, explain why the EA is an appropriate level of analysis: The current permitting action is for the construction and operation of a portable crushing and screening operation. MAQP #2559-02 includes conditions and limitations to ensure the facility will operate in compliance with all applicable rules and regulations. In addition, there are no significant impacts associated with this proposal.

Other groups or agencies contacted or which may have overlapping jurisdiction: Montana Historical Society – State Historic Preservation Office, Natural Resource Information System – Montana Natural Heritage Program

Individuals or groups contributing to this EA: Department of Environmental Quality – Air Resources Management Bureau, Montana Historical Society – State Historic Preservation Office, Natural Resource Information System – Montana Natural Heritage Program

EA prepared by: Shawn Juers

Date: September 28, 2010