

May 15, 2018

Paul Chatriand Capital Concrete, Inc. PO Box 1156 East Helena, MT 59635

Dear Mr. Chatriand:

Montana Air Quality Permit #4281-02 is deemed final as of May 15, 2018, by the Department of Environmental Quality (Department). This permit is for Capital Concrete, Inc's new silos. 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,

Julie A. Merkel

Permitting Services Section Supervisor

Julio A Merkel

Air Quality Bureau

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Shawn Juers

Environmental Engineer

Air Quality Bureau

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JM:SJ Enclosure

# Montana Department of Environmental Quality Air, Energy & Mining Division

Montana Air Quality Permit #4281-02

Capital Concrete, Inc. PO Box 1156 East Helena, MT 59635

May 15, 2018



## MONTANA AIR QUALITY PERMIT

Issued To: Capital Concrete, Inc. MAQP #: 4281-02

P.O. Box 1156 Application Complete: 3/26/2018

East Helena, MT 59635 Preliminary Determination Issued: 4/9/2018
Department Decision Issued: 4/27/2018

Department Decision Issued: 4/2/,

Permit Final: 5/15/2018

AFS #: 777-4281

A Montana Air Quality Permit (MAQP), with conditions, is hereby granted to Capital Concrete, Inc. (Capital), 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

Capital operates a portable truck-mix concrete batch plant and associated equipment initially located in the SW ½ of Section 30, Township 19 North, Range 29 West within Mineral County, Montana. MAQP #4281-02 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 (PM<sub>10</sub>) 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 PM<sub>10</sub> nonattainment areas. A complete list of permitted equipment is contained in Section I.A. of the Permit Analysis to MAQP #4281-02.

### B. Current Permit Action

On March 26, 2018 the Department received from Bison Engineering, Inc, on behalf of Capital Concrete, Inc. an application for modification of the MAQP. The application is to increase the permitted engine size associated with this permit, and to add two new cement ground storage silos. The current permit action allows for these changes, providing an intended flexible permitting of the diesel generator engine and assuming AP-42 emissions factors to allow for future engine change outs provided the maximum horsepower remains 130 or less, updates the emissions inventory and equipment list. Best Available Control Technology review for the new cement silos is presented in the permit analysis.

# SECTION II: Conditions and Limitations

### A. Emission Limitations

1. Capital shall install, operate and maintain a fabric filter baghouse and a rubber boot load-out spout (ARM 17.8.752).

- a. Capital shall install, operate, and maintain a fabric filter baghouse to control particulate emissions from all cement and cement supplement silo ventilation openings with designed capture efficiencies as presented in application(s); and
- b. Capital shall install, operate, and maintain a rubber boot load-out spout to control particulate emissions from the product load-out opening(s) on the portable concrete plant, where cement and aggregate materials are transferred for mixing.
- 2. Capital shall not cause or authorize to be discharged into the atmosphere from the portable concrete batch plant:
  - a. Any vent emissions that exhibit an opacity of 20% or greater averaged over 6 consecutive minutes (ARM 17.8.304).
  - b. Any fugitive emissions from the source or from any material transfer operations, including, but not limited to, truck loading or unloading, which exhibit an opacity of 20% or greater averaged over 6 consecutive minutes (ARM 17.8.308 and ARM 17.8.752).
- 3. Water shall be available on site at all times and operated, as necessary, to prevent visible fugitive emissions from the conveyors (ARM 17.8.749 and ARM 17.8.752).
- 4. Capital shall not cause or authorize to be discharged into the atmosphere from any street, road, or parking lot any visible fugitive emissions that exhibit an opacity of 20% or greater averaged over 6 consecutive minutes and must take reasonable precautions to control emissions of airborne particulate matter (ARM 17.8.308 and ARM 17.8.752).
- 5. Capital shall treat all unpaved portions of the haul roads, access roads, parking lots, and 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.4 (ARM 17.8.749 and ARM 17.8.752).
- 6. Total concrete plant production shall be limited to 350,400 cubic yards of concrete during any rolling 12-month time period (ARM 17.8.749).
- 7. Capital shall not operate more than one diesel generator engine, with a maximum rated design capacity not to exceed 130 horsepower (hp) (ARM 17.8.749).
- 8. Capital shall comply with all applicable standards and limitations, and the reporting, record keeping, and notification requirements contained in 40 Code of Federal Regulations (CFR) 60, Subpart IIII, Standards of Performance for Stationary Compressions 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 engines (ARM 17.8.340, 40 CFR 60, Subpart IIII; ARM 17.8.342 and 40 CFR 63, Subpart ZZZZ).

9. If the permitted equipment is used in conjunction with any other equipment owned or operated by Capital, at the same site, production shall be limited to correspond with an emission level that does not exceed 250 tons of emissions during any rolling 12-month time period. The Department shall approve any calculations used to establish production levels (ARM 17.8.749).

## B. Emissions Monitoring

- 1. Capital shall inspect the fabric filter baghouse and its vents, which are used for controlling emissions from the silo and weigh hopper, every 6 months of operation or less to ensure that each collector is operating at the optimum efficiency. Fabric filters shall be replaced at least once per operating season as preventative maintenance. Records of inspections, repairs, and maintenance shall be kept for a minimum of 5 years (ARM 17.8.752 and ARM 17.8.749).
- 2. Capital shall maintain on-site records of inspections, repairs, and maintenance. All records compiled in accordance with this permit shall be maintained by Capital as a permanent business record for at least 5 years following the date of the measurement, shall be submitted to the Department upon request, and shall be available at the plant site for inspection by the Department (ARM 17.8.749).

# C. Testing Requirements

- 1. All compliance source tests shall conform to the requirements of the Montana Source Test Protocol and Procedures Manual (ARM 17.8.106).
- 2. The Department may require further testing (ARM 17.8.105).

# D. Operational Reporting Requirements

- 1. If this truck-mix concrete batch plant is moved to another location, an Intent to Transfer Form must be sent to the Department. In addition, 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 Intent to Transfer Form and 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. Capital shall maintain on-site records showing daily hours of operation and daily production rates, for the last 12 months. Capital shall maintain a list of all sites where the diesel-fired engine/generator was used, including a list of the other permitted sources that the diesel-fired engine was use in conjunction with and the hours it was operated with that source. All records compiled in accordance with this permit shall be maintained by Capital as a permanent business record for at least 5 years following the date of measurement, must be submitted to the Department upon request, and must be available at the plant site for inspection by the Department (ARM 17.8.749).

- 3. Capital 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 is not limited to, all sources identified in the most recent 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, based on actual emissions from the facility, and/or to verify compliance with permit limitations (ARM 17.8.505).
- 4. Capital 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(1)(d) (ARM 17.8.745).
- 5. Capital shall document, by month, the concrete production from the facility. By the 25<sup>th</sup> day of each month, Capital shall calculate the total amount of concrete produced during the previous month. The monthly information will be used to verify compliance with the rolling 12-month limitation in Section II.A.6. The information for each of the previous months shall be submitted along with the annual emission inventory (ARM 17.8.749)

### SECTION III: General Conditions

- A. Inspection Capital 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 Emission Monitoring System (CEMS), Continuous Emission 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 Capital fails to appeal as indicated below.
- C. Compliance with Statutes and Regulations Nothing in this permit shall be construed as relieving Capital 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.* (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 the Board does not issue a stay, 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 air quality permit 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 Capital may be grounds for revocation of this permit, as required by that section and rules adopted there under 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. Capital 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 Capital Concrete, Inc. MAQP #4281-02

# I. Introduction/Process Description

## A. Permitted Equipment

Capital Concrete, Inc. (Capital) owns and operates a portable truck-mix concrete batch plant with a maximum production capacity of 40 cubic yards per hour (yd<sup>3</sup>/hr). Equipment located at the plant includes, but is not limited to the following:

- 1969 Ross 100 Concrete Plant with a maximum production capacity of 40 yd<sup>3</sup>/hr with a 2002 Ideal Manufacturing Silo Baghouse for particulate matter control
- Cement Storage Silo (33 ton) on plant
- Diesel-fired generator engine up to 130 horsepower (hp) maximum capacity
- 2 additional cement silos equipped with baghouse control (for three total silos)
- Associated equipment and operations (conveyors, transfer points, 6 yd³ hopper, etc.)

## B. Source Description

Capital will utilize this concrete batch plant and associated equipment to provide concrete for use in various construction operations. For a typical operational setup, stockpiles of sand and gravel for concrete production are stored on site. A front-end loader transfers the sand and gravel from the stockpiles to a feed hopper and the material is then conveyed into the concrete batch plant. The cement silo transfers the cement into the batch plant where water is added. The sand (fine aggregate), coarse aggregate, cement, and water are then fed into mixing trucks where the materials are mixed together to form concrete. The concrete is then transported to job site.

## C. Permit History

On February 10, 2009, Pioneer Concrete and Fuel, Inc. (Pioneer) was issued **MAQP** #4281-00 for the construction and operation of a portable truck-mix concrete batch plant, diesel-fired generator, and associated equipment. At the request of Pioneer, this permit was written in a de minimis friendly manner.

On February 17, 2011, the Montana Department of Environmental Quality (Department) received a notice of ownership transfer and a request to change the permittee name on MAQP #4281-00 from Pioneer to Capital. Effective January 1, 2011, Pioneer's assets were divided and Capital became an independently owned entity with no affiliation to Pioneer. An administrative amendment pursuant to Administrative Rules of Montana (ARM) 17.8.764 changed the permittee name as requested. In addition to accounting for this name change, the permit action updated the rule references, permit format, and emissions inventory. **MAQP #4281-01** replaced MAQP #4281-00.

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### C. Current Permit Action

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### 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 ARM and are available, upon request, from the Department. Upon request, the Department will provide references for locations 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. <u>ARM 17.8.101 Definitions</u>. This rule is a list of applicable definitions used in this subchapter, unless indicated otherwise in a specific subchapter.
  - 2. <u>ARM 17.8.105 Testing Requirements</u>. 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. <u>ARM 17.8.106 Source Testing Protocol</u>. 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 Montana Clean Air Act, 75-2-101, *et seq.*, Montana Code Annotated (MCA).

Capital shall comply with all 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. <u>ARM 17.8.110 Malfunctions</u>. (2) The Department must be notified promptly by telephone whenever a malfunction occurs, which can be expected to create emissions in excess of any applicable emissions limitation, or to continue for a period greater than 4 hours.
- 5. <u>ARM 17.8.111 Circumvention</u>. (1) No person shall cause or permit the installation or use of any device or any means that, without resulting in reduction in 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 17.8.204 Ambient Air Monitoring
  - 2. ARM 17.8.210 Ambient Air Quality Standards for Sulfur Dioxide
  - 3. ARM 17.8.211 Ambient Air Quality Standards for Nitrogen Dioxide.
  - 4. ARM 17.8.212 Ambient Air Quality Standards for Carbon Monoxide
  - 5. ARM 17.8.213 Ambient Air Quality Standard for Ozone
  - 6. ARM 17.8.220 Ambient Air Quality Standard for Settled Particulate
    Matter
  - 7. ARM 17.8.221 Ambient Air Quality Standard for Visibility
  - 8. ARM 17.8.223 Ambient Air Quality Standard for Particulate Matter with an Aerodynamic Diameter of 10 Microns or Less (PM<sub>10</sub>)

Capital must comply with the applicable ambient air quality standards.

- C. ARM 17.8, Subchapter 3, Emission Standards, including, but not limited to:
  - 1. <u>ARM 17.8.304 Visible Air Contaminants</u>. This rule requires that no person may cause or authorize emissions to be discharged to an 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, Capital 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. <u>ARM 17.8.310 Particulate Matter, Industrial Process.</u> 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. <u>ARM 17.8.322 Sulfur Oxide Emissions -- Sulfur in Fuel</u>. 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 Code of Federal Regulations (CFR) 60, Standards of Performance for New Stationary Sources (NSPS). Based on the information submitted by Capital the portable concrete batch plant and associated equipment may be subject to NSPS (40 CFR 60), as follows:
  - a. <u>40 CFR 60, Subpart A General Provisions</u> apply to all equipment or facilities subject to an NSPS Subpart as listed below:
  - b. 40 CFR 60, Subpart F Standards of Performance for Portland Cement Plants. This subpart does not apply because the truckmix plant does not meet the definition of a Portland Cement Plant.
  - c. 40 CFR 60, Subpart IIII Standards of Performance for Stationary Compression Ignition (CI) Internal Combustion

    Engines (ICE). NSPS requirements apply to owners or operators or stationary CI ICE that commence construction, modification, or reconstruction after July 11, 2005, where the stationary CI ICE is manufactured after April 1, 2006, and is not a fire pump engine. CI ICE will be subject to this NSPS standard only if the engine remains or will remain at the permitted location for more than 12 months, or a shorter period of time for an engine located at a seasonal source. A seasonal source remains at a single location on a permanent basis (at least 2 years) and operated 3 months or more each year.
- 8. <u>ARM 17.8.342 Emission Standards for Hazardous Air Pollutants for Source Categories</u>. The source, as defined and applied in 40 CFR 63, shall comply with the requirements of 40 CFR 63, as listed below.

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- a. <u>40 CFR 63, Subpart A General Provisions</u> apply to all equipment or facilities subject to a National Emission Standard for Hazardous Air Pollutants (NESHAP) Subpart as listed below.
- b. 40 CFR 63, Subpart ZZZZ National Emissions Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines (RICE). As an area source the diesel RICE will be subject to this rule. Any diesel RICE engine operated by Capital will be subject to this Maximum Available Control Technology (MACT) standard if the engine remains or will remain at the permitted location for more than 12 months, or a shorter period of time for an engine located at a seasonal source. A seasonal source remains at a single location on a permanent basis (at least 2 years) and operates 3 months or more each year.
- D. ARM 17.8, Subchapter 5, Air Quality Permit Application, Operation and Open Burning Fees, including, but not limited to:
  - 1. <u>ARM 17.8.504 Air Quality Permit Application Fees</u>. This rule requires that Capital submit an air quality permit application fee concurrent with the submittal of an air quality permit application. A permit application is incomplete until the proper application fee is paid to the Department. The Department received the required \$500.00 with the application.
  - 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 air quality permit, excluding an open burning permit, issued by the Department. The air quality operation fee is based on the actual or estimated actual amount of air pollutants emitted during the previous calendar year.

An air quality operation fee is separate and distinct from an air quality permit 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. <u>ARM 17.8.740 Definitions</u>. This rule is a list of applicable definitions used in this chapter, unless indicated otherwise in a specific subchapter.
  - 2. <u>ARM 17.8.743 Montana Air Quality Permits--When Required</u>. This rule requires a person to obtain an air quality permit 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. Capital has a PTE greater than 15 tons per year of particulate matter (PM); therefore, an air quality permit is required.

- 3. <u>ARM 17.8.744 Montana Air Quality Permits General Exclusions</u>. This rule identifies the activities that are not subject to the Montana Air Quality Permit Program.
- 4. <u>ARM 17.8.745 Montana Air Quality Permits Exclusion for De Minimis Changes</u>. 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. (1) This rule requires that a permit application be submitted prior to installation, modification, or use of a source. (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. Capital made a public notice in the March 29, 2018 issue of the Meagher County News, a newspaper in general circulation in the White Sulphur Springs area.
- 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. <u>ARM 17.8.755 Inspection of Permit</u>. This rule requires that air quality permits shall be made available for inspection by the Department at the location of the source.
- 9. <u>ARM 17.8.756 Compliance with Other Requirements</u>. This rule states that nothing in the permit shall be construed as relieving Capital 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. <u>ARM 17.8.759 Review of Permit Applications</u>. 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. <u>ARM 17.8.760 Additional Review of Permit Applications</u>. This rule describes the Department's responsibilities for processing permit applications and making permit decisions on those applications that require an environmental impact statement.

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- 12. ARM 17.8.762 Duration of Permit. An air quality permit 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.
- 13. <u>ARM 17.8.763 Revocation of Permit.</u> An air quality permit 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).
- 14. ARM 17.8.764 Administrative Amendment to Permit. An air quality permit 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 in emissions because 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.
- 15. ARM 17.8.765 Transfer of Permit. (1) This rule states that an air quality permit 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 air quality permit 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. <u>ARM 17.8.801 Definitions</u>. This rule is a list of applicable definitions used in this subchapter.
  - 2. ARM 17.8.818 Review of Major Stationary Sources and Major Modifications—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. <u>ARM 17.8.1201 Definitions</u>. (23) Major Source under Section 7412 of the FCAA is defined as any stationary source having:
    - a. PTE > 100 tons per year of any pollutant,
    - b. PTE > 10 tons per year of any one Hazardous Air Pollutant (HAP), PTE greater than 25 tons per year of a combination of all HAPs, or lesser quantity as the Department may establish by rule, or
    - c. PTE greater than 70 tons per year of PM<sub>10</sub> in a serious PM<sub>10</sub> 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 Air Quality Permit #4281-02 for Capital, the following conclusions were made:
    - a. The facility's PTE is less than 100 tons per year for any pollutant.
    - b. The facility's PTE is less than 10 tons per year for any one HAP and less than 25 tons per year of all HAPs.
    - c. This source is not located in a serious PM<sub>10</sub> nonattainment area.
    - d. This facility is not subject to any current NSPS standards (but may become subject to 40 CFR 60, Subpart IIII depending on the engine/generator that may be used).
    - e. This facility is not subject to any current NESHAP (but may become subject to area source provisions of 40 CFR 63, Subpart ZZZZ depending on the engine/generator that may be used).
    - f. This source is not a Title IV affected source or a solid waste combustion unit.
    - 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 Capital is not subject to Title V Operating Permit requirements. However, if minor sources subject to NSPS are required to obtain a Title V Operating Permit, Capital will be required to obtain an operating permit.

### III. BACT Determination

A BACT determination is required for each new or modified source. Capital 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.

### **Cement Silos**

Capital proposes to add two new 56-ton cement ground storage silos to the concrete batch plant. Both new silos will vent to a new fabric filter baghouse for control of particulate emissions from cement transfer activities. Fabric filter baghouses generally provide the highest level of particulate control compared to other particulate control options such as cyclones or electrostatic precipitators. For the size and function of this portable concrete batch plant, an electrostatic precipitator is neither feasible nor common to the industry. Given the size of particulate generated during cement handling, cyclones are also not feasible and would not provide the level of control that a baghouse does.

In accord with ARM 17.8.740, BACT assigned in this case is design and work practice standards, as testing of an emissions limitation of a silo filling operation, which would have intermittent operations challenging the application of a standardized source test, is applicable in this scenario. The Department does not routinely require particulate testing of cement silos. Capital proposed, and the Department accepts, baghouse control whose design is expected to result in 99% or better control of particulate matter. Such reduction of emissions constitutes BACT in this case. The Department, in consultation with Capital, has prescribed maintenance and inspection requirements in lieu of an emissions limitation and testing requirement.

Capital shall install, operate, and maintain a fabric filter baghouse to control particulate emissions from all cement and cement supplement silo ventilation openings; and Capital shall inspect the fabric filter baghouse and its vents, which are used for controlling emissions from the silo and weigh hopper, every 6 months of operation to ensure that each collector is operating at the optimum efficiency. Fabric filters shall be replaced at least once per operating season as preventative maintenance. Records of inspections, repairs, and maintenance shall be kept for a minimum of 5 years.

## **Diesel Generator Engine**

Any new diesel-fired engine would likely be required to comply with federal engine emission limitations including, for example, EPA Tiered emission standards for non-road engines (40 CFR Part 89 or 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). The Department has determined that compliance with any applicable federal standards, with no additional requirements, constitutes BACT.

# IV. Emissions Inventory

	Tons/yr							
<b>Emissions Source</b>	PM(fil)	PM <sub>10</sub> (fil)	PM <sub>2.5</sub> (fil)	PM(cond)	$NO_X$	VOC	СО	$SO_X$
Aggregate Delivery to Ground								
Storage	1.13	0.54	0.17					
Sand Delivery to Ground								
Storage	0.26	0.12	0.04					
Aggregate Transfer to Conveyor	1.13	0.54	0.17					
Sand Transfer to Conveyor	0.26	0.12	0.04					
Aggregate Transfer to Elevated								
Storage	0.56	0.27	0.08					
Sand Transfer to Elevated								
Storage	0.13	0.06	0.02					
Cement Unloading to Storage								
Silo	0.04	0.01	0.01					
Cement Supplement Unloading								
to Silo	0.06	0.03	0.01					
Weigh Hopper Loading of								
Sand/Aggregate	1.62	0.95	0.24					
Truck Mix Loading	33.11	8.89	4.97					
Diesel Generator Engine	1.25	1.25	1.25	0.20	17.65	1.43	3.80	1.17
Haul Roads	5.68	1.57	0.16					
2 New Cement Storage Silos	0.09	0.03	0.01					
TOTAL	45.33	14.39	7.17	0.20	17.65	1.43	3.80	1.17

Total Particulate = PM(fil) + PM(cond) = 45.53Total  $PM_{10} = PM_{10}(fil) + PM(cond) = 14.59$ Total  $PM_{2.5} = PM_{2.5}(fil) + PM(cond) = 7.37$ 

CO = carbon monoxide

 $NO_X$  = oxides of nitrogen

PM = particulate matter

 $PM_{10}$  = particulate matter with an aerodynamic diameter of 10 microns and less

 $PM_{2.5}$  = particulate mater with an aerodynamic diameter of 2.5 microns and less

PM(fil) = filterable particulate

PM(cond) = condensable particulate

## Assumptions Made:

Throughput =	350,400	cu yds/rolling 12 months		=	705,004.80	TPY Throughpu	
Generator Engine =	130	hp			80.48	TPH Thro	ughput
Hours of Operation	8760	hr/yr					
Concrete Composition			Fraction				
Coarse Aggregate	1865	lb/yd	0.4634692				
Sand	1428	lb/yd	0.3548708				
Cement	491	lb/yd	0.1220179	Non-wate	r Fraction		
Cement Supplement	73	lb/yd	0.0181412	0.958499			
Water	167	lb/yd	0.041501				

Aggregate Delivery to Ground Storage					
PM(fil) emissions					
Uncontrolled Emissions Factor =	0.0069	lb/ton	(AP-42 Tal	ble 11.12-2,	6/2006)
Calculations					
80.48TPH Throughput*0.0069lb/ton*8760hr/yr*	0.463*0.00	05 ton/lb =	1.13	TPY	
PM10(fil) emissions					
Uncontrolled Emissions Factor =	0.0033	lb/ton	(AP-42 Tal	ble 11.12-2,	6/2006)
<u>Calculations</u>					
80.48TPH Throughput*0.0033lb/ton*8760hr/yr*	0.463*0.00	05 ton/lb =	0.54	TPY	
PM2.5(fil) emissions					
Uncontrolled Emissions Factor =	0.00104	lb/ton	(AP-42 App	pendix B-2,	9/1990)
Calculations					
80.48TPH Throughput*0.001035lb/ton*8760hr/yr*0	.463*0.0005	ton/lb =	0.17	TPY	

Sand Delivery to Ground Storage					
PM(fil) emissions					
Uncontrolled Emissions Factor =	0.0021	lb/ton	(AP-42 Tak	ole 11.12-2,	6/2006)
<u>Calculations</u>					
80.48TPH Throughput*0.0021lb/ton*8760hr/	/yr*0.355*0.00	05 ton/lb =	0.26	TPY	
PM10(fil) emissions					
Uncontrolled Emissions Factor =	0.00099	lb/ton	(AP-42 Tak	ole 11.12-2,	6/2006)
Calculations					
80.48TPH Throughput*0.00099Ib/ton*8760h	r/yr*0.355*0.00	005 ton/lb =	0.12	TPY	
PM2.5(fil) emissions					
Uncontrolled Emissions Factor =	0.00032	lb/ton	(AP-42 App	pendix B-2,	9/1990)
<u>Calculations</u>					
80.48TPH Throughput*0.000315lb/ton*8760hr/y	yr*0.355*0.0005	ton/lb =	0.04	TPY	

Aggregate Transfer to Conveyor					
PM(fil) emissions					
Uncontrolled Emissions Factor =	0.0069	lb/ton	(AP-42 Tal	ole 11.12-2	6/2006)
Calculations					
80.48TPH Throughput*0.0069lb/ton*8760hr/yr	*0.463*0.00	05 ton/lb =	1.13	TPY	
PM10(fil) emissions					
Uncontrolled Emissions Factor =	0.0033	lb/ton	(AP-42 Tal	ole 11.12-2	6/2006)
<u>Calculations</u>					
80.48TPH Throughput*0.0033lb/ton*8760hr/yr	*0.463*0.00	05 ton/lb =	0.54	TPY	
PM2.5(fil) emissions					
Uncontrolled Emissions Factor =	0.00104	lb/ton	(AP-42 App	oendix B-2,	9/1990)
<u>Calculations</u>					
80.48TPH Throughput*0.001035lb/ton*8760hr/yr*	0.463*0.0005	ton/lb =	0.17	TPY	

Sand Transfer to Conveyor					
PM(fil) emissions					
Uncontrolled Emissions Factor =	0.0021	lb/ton	(AP-42 Tal	ole 11.12-2	6/2006)
Calculations					
80.48TPH Throughput*0.0021lb/ton*8760hr	/yr*0.355*0.00	05 ton/lb =	0.26	TPY	
PM10(fil) emissions					
Uncontrolled Emissions Factor =	0.00099	lb/ton	(AP-42 Tak	ole 11.12-2	6/2006)
Calculations					
80.48TPH Throughput*0.000991b/ton*8760hr/y	/r*0.355*0.0005 t	on/lb =	0.12	TPY	
PM2.5(fil) emissions					
Uncontrolled Emissions Factor =	0.00032	lb/ton	(AP-42 App	oendix B-2,	9/1990)
<u>Calculations</u>					
80.48TPH Throughput*0.000315lb/ton*8760hr,	/yr*0.355*0.0005	ton/lb =	0.04	TPY	

Aggregate Transfer to Elevated Storage					
Transfer with 50% control applied					
Transfer with 50% control applied					
Sand Transfer to Elevated Storage					
Transfer with 50% control applied					
Cement Unloading to Storage Silo					
PM(fil) emissions					
Controlled Emissions Factor =	0.00099	lb/ton	(AP-42 Tal	ole 11.12-2	2, 6/2006)
Calculations:					
80.48TPH Throughput*0.00099Ib/ton*0.122*8760h	r/yr*0.0005 t	on/lb =	0.043	TPY	
PM10(fil) emissions					
Controlled Emissions Factor =	0.00034	lb/ton	(AP-42 Tal	ole 11.12-2	2, 6/2006)
Calculations:					
80.48TPH Throughput*0.00034lb/ton*0.122*8760h	r/yr*0.0005 t	on/lb =	0.015	TPY	
PM2.5(fil) emissions					
Controlled Emissions Factor =	0.00015	lb/ton	(AP-42 App	pendix B-2	, 9/1990)
Calculations:					
80.48TPH Throughput*0.0001485lb/ton*0.122*876	0hr/yr*0.000!	5 ton/lb =	0.006	TPY	

Cement Supplement Unloading to Silo					
PM(fil) emissions					
Controlled Emissions Factor =	0.0089	lb/ton	(AP-42 Tal	ole 11.12-2	2, 6/2006)
Calculations:					
80.48TPH Throughput*0.0089lb/ton*0.0181*876	0hr/yr*0.0005 to	on/lb =	0.057	TPY	
PM10(fil) emissions					
Controlled Emissions Factor =	0.0049	lb/ton	(AP-42 Tal	ole 11.12-2	2, 6/2006)
<u>Calculations:</u>					
80.48TPH Throughput*0.0049lb/ton*0.0181*876	0hr/yr*0.0005 to	on/Ib =	0.031	TPY	
PM2.5(fil) emissions					
Controlled Emissions Factor =	0.00134	lb/ton	(AP-42 App	oendix B-2	2, 9/1990)
<u>Calculations:</u>					
80.48TPH Throughput*0.001335lb/ton*0.0181*8	760hr/yr*0.000	5 ton/lb =	0.01	TPY	

Weigh Hopper Loading of Sand/Aggrega	<u>ite</u>				
PM(fil) emissions					
Controlled Emissions Factor =	0.0048	lb/ton	(AP-42 Tal	ole 11.12-2,	6/2006)
Calculations:					
0.0048lb/ton*80.48TPH Throughput*0.9585*876	60hr/yr*0.0005tc	n/lb =	1.62	TPY	
PM10(fil) emissions					
Controlled Emissions Factor =	0.0028	lb/ton	(AP-42 Tal	ole 11.12-2,	6/2006)
<u>Calculations:</u>					
0.0028lb/ton*80.48TPH Throughput*0.9585*876	60hr/yr*0.0005tc	n/lb =	0.95	TPY	
PM2.5(fil) emissions					
Controlled Emissions Factor =	0.00072	lb/ton	(AP-42 App	oendix B-2,	9/1990)
Calculations:					
0.00072lb/ton*80.48TPH Throughput*0.9585*8	760hr/yr*0.0005t	on/lb =	0.24	TPY	

Truck Mix Loading					
PM(fil) emissions					
Controlled Emissions Factor =	0.098	lb/ton	(AP-42 Tal	ole 11.12-2,	6/2006)
Calculations:					
0.098lb/ton*80.48TPH Throughput*8760hr/yr*0.0009	Ston/Ib =		33.11	TPY	
PM10(fil) emissions					
Controlled Emissions Factor =	0.0263	lb/ton	(AP-42 Tal	ole 11.12-2,	6/2006)
<u>Calculations:</u>					
0.0263lb/ton*80.48TPH Throughput*8760hr/yr*0.000	O5ton/Ib =		8.89	TPY	
PM2.5(fil) emissions					
Controlled Emissions Factor =	0.0147	lb/ton	(AP-42 Tal	ole 11.12-2,	6/2006)
<u>Calculations:</u>					
0.0147lb/ton*80.48TPH Throughput*8760hr/yr*0.000	)5ton/Ib =		4.97	TPY	

Diesel Generator Engine						
PM/PM10/PM2.5(fil) emissions						
Emissions Factor =	0.0022	lb/hp-hr	(AP-42 Tab	le 3.3-1, 10	/1996)	
<u>Calculations:</u>						
0.0022lb/hp-hr*130hp*8760hr/yr*0.0005 ton	/lb =		1.25	TPY		
PM(cond) emissions						
Emissions Factor =	0.00035	lb/hp-hr	assumed s	ame ratio a	s AP-42 Ta	ble 3.4-2
			this does n	ot assume	PM(fil) inc	ludes conden
Calculations:						
0.000347843942505134lb/hp-hr*130hp*8760	hr/yr*0.0	005 ton/lb	0.20	TPY		
NOX emissions						
Emissions Factor =	0.031	lb/hp-hr	(AP-42 Tab	le 3.3-1, 10	/1996)	
<u>Calculations:</u>						
0.031lb/hp-hr*130hp*8760hr/yr*0.0005 ton/	lb =		17.65	TPY		
VOC emissions						
Emissions Factor =	0.00251	lb/hp-hr	(AP-42 Tab	le 3.3-1, 10	/1996)	
<u>Calculations:</u>						
0.0025141lb/hp-hr*130hp*8760hr/yr*0.0005	ton/lb =		1.43	TPY		
CO emissions					/	
Emissions Factor =	0.00668	lb/hp-hr	(AP-42 Tab	le 3.3-1, 10	/1996)	
Calculations:						
0.00668lb/hp-hr*130hp*8760hr/yr*0.0005 to	n/lh =		3.80	TPV		
0.0000010/11p 111 15011p 6700111/y1 0.0005 to	11/10 -		3.00	11 1		
SO2 Emissions						
Emissions Factor =	0.00205	lb/hp-hr	(AP-42 Tab	le 3.3-1, 10	/1996)	
Calaulatiana						
Calculations:	 		4 47	TDV		
0.00205lb/hp-hr*130hp*8760hr/yr*0.0005 to	11/1D =		1.1/	TPY		

## V. Existing Air Quality

MAQP #4281-02 is issued for the operation of a portable truck mix concrete batch plant that was initially located along Interstate 90 at the DeBorgia exit in the SW ½ of Section 30, Township 19 North, Range 29 West, Mineral County, Montana. This facility would be allowed to operate at this proposed site and any other areas designated as attainment or unclassified for all National Ambient Air Quality Standards (NAAQS); excluding counties that have a Department-approved permitting program, areas considered tribal lands, or areas in or within 10 kilometers (km) of certain PM<sub>10</sub> nonattainment areas.

# VI. Air Quality Impacts

The permit contains operational conditions and limitations that would protect air quality for this site and the surrounding area. Also, this facility is a portable source that would likely operate on an intermittent and temporary basis, limiting impacts to air quality. Impacts are expected to be minor, and short-lived at locations other than the original location.

## VII. Ambient Air Impact Analysis

The Department believes that the facility operating in compliance with all applicable permit conditions and air quality rules will not cause or contribute to a violation of any ambient air quality standard.

## VIII. Taking or Damaging Implication Analysis

As required by 2-10-101 through 105, MCA, the Department conducted the following private property taking and damaging assessment.

YES	NO	
X		1. Does the action pertain to land or water management or environmental regulation
Λ		affecting private real property or water rights?
	X	2. Does the action result in either a permanent or indefinite physical occupation of private
	Λ	property?
	X	3. Does the action deny a fundamental attribute of ownership? (ex.: right to exclude others,
	Λ	disposal of property)
	X	4. Does the action deprive the owner of all economically viable uses of the property?
	X	5. Does the action require a property owner to dedicate a portion of property or to grant an
	Λ	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?
	X	6. Does the action have a severe impact on the value of the property? (consider economic
	71	impact, investment-backed expectations, character of government action)
	X	7. Does the action damage the property by causing some physical disturbance with respect
	71	to the property in excess of that sustained by the pubic generally?
	X	7a. Is the impact of government action direct, peculiar, and significant?
	X	7b. Has government action resulted in the property becoming practically inaccessible,
		waterlogged or flooded?
	X	7c. Has government action lowered property values by more than 30% and necessitated the

YE	ES NO	
		physical taking of adjacent property or property across a public way from the property in
		question?
		Takings or damaging implications? (Taking or damaging implications exist if YES is
	X	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 as required is attached.

## DEPARTMENT OF ENVIRONMENTAL QUALITY

Air, Energy & Mining Division Air Quality Bureau P.O. Box 200901, Helena, Montana 59620 (406) 444-3490

## **ENVIRONMENTAL ASSESSMENT (EA)**

Issued To: Capital Concrete, Inc.

PO Box 1156

East Helena, MT 59638

Montana Air Quality Permit number (MAQP): 4281-02

EA Draft: 4/9/2018 EA Final: 4/27/2018 Permit Final: 5/15/2018

- 1. Legal Description of Site: Capital Concrete, Inc. (Capital) operates a portable truck-mix concrete batch plant and associated equipment initially located in the SW ½ of Section 30, Township 19 North, Range 29 West within Mineral County, Montana. MAQP #4281-02 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 (PM<sub>10</sub>) nonattainment areas.
- 2. Description of Project: Capital submitted an air quality application to the Montana Department of Environmental Quality Air Quality Bureau (Department) to allow for the additional of 2 concrete storage silos and to replace the current 68 horsepower (hp) diesel engine used for onsite and portable electricity generation with a 130 hp diesel engine.
- 3. *Objectives of Project:* The issuance of MAQP #4281-02 would allow for the project as described above.
- 4. Alternatives Considered: In addition to the proposed action, the Department also considered the "no-action" alternative. However, Capital has submitted an application in compliance with all requirements of the Montana and Federal clean air acts. Therefore, the "no-action" alternative was eliminated from further consideration. Certain control technology alternatives are considered in the BACT analysis, found in the permit analysis associated with MAQP #4281-02.
- 5. A Listing of Mitigation, Stipulations, and Other Controls: A list of enforceable conditions, including a BACT analysis, would be included in MAQP #4281-02.
- 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.

4281-02 1 Final: 5/15/2018

# 7. 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 current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## B. Water Quality, Quantity and Distribution

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## C. Geology and Soil Quality, Stability and Moisture

The current permitting action would not be expected to have any impacts to geology, soil quality, stability, or moisture. The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## D. Vegetation Cover, Quantity, and Quality

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

### E. Aesthetics

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. Controls are required such that any change to visible emissions would be expected to be negligible. The addition and changeout of equipment is to occur at an already operating facility. No more than minor impacts would be expected as a result of this permitting action.

### F. Air Quality

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

### G. Unique Endangered, Fragile, or Limited Environmental Resources

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## H. Sage Grouse Executive Order

The Department recognizes that the site location is not within a Greater Sage Grouse Habitat Area as defined by Executive Order No. 12-2015.

## I. Demands on Environmental Resource of Water, Air and Energy

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## J. Historical and Archaeological Sites

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action, with no impacts expected for installation at an already operating location.

### K. Cumulative and Secondary Impacts

The Department finds no more than minor potential impacts to the individual physical and biological considerations above. No more than minor cumulative or secondary impacts would be expected.

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

### A. Social Structures and Mores

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## B. Cultural Uniqueness and Diversity

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

### C. Local and State Tax Base and Tax Revenue

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

## D. Agricultural or Industrial Production

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

### E. Human Health

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

### F. Access to and Quality of Recreational and Wilderness Activities

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

### G. Quantity and Distribution of Employment

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

# H. Distribution of Population

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No more than minor impacts would be expected as a result of this permitting action.

# I. Demands for Government Services

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No change to the facility classification would be necessary. No more than minor impacts would be expected as a result of this permitting action.

## J. Industrial and Commercial Activity

The current permit action would allow for a small amount of allowable emissions increases (less than 10 tons per year of any pollutant) at an already existing and operating source, with any actual emissions increases expected to be much less. No change to the facility classification would be necessary. No more than minor impacts would be expected as a result of this permitting action.

## K. Locally Adopted Environmental Plans and Goals

The Department is not aware of any locally adopted environmental plans and goals which may be affected by the issuance of MAQP #4281-02. The permit would be issued in compliance with state and federal clean air act requirements.

### L. Cumulative and Secondary Impacts

The Department found no more than minor impacts to the individual social and economic considerations above. Additionally, no more than minor cumulative or secondary impacts would be expected.

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 an existing and operating concrete plant at which two new silos and a generator engine upgrade is to be made. MAQP #4281-02 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 – Montana Sage Grouse Conservation Program

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

EA prepared by: Shawn Juers

Date: 4/2/2018