Fugitive Dust Control Plans – Instructions

The Fugitive Dust Rule (R307-309) requires a fugitive dust control plan (R307-309-6) from all sources whose activities or equipment have the potential to produce fugitive dust (airborne dust) in PM_{10} and PM_{2.5} non-attainment areas. Fugitive dust control plans include steps your company will take to minimize fugitive dust on-site from pits, yards, storage areas, and areas of operation and to prevent opacities caused by fugitive dust from exceeding 20% on site and 10% at the property boundary. The fugitive dust rule addresses storage and handling of aggregate materials, construction and demolition activities on sites greater than 1/4 acre, road ways and tailings piles and ponds. Sources shall develop their fugitive dust control plans and submit them to the Director prior to the start of clearing or construction. Fugitive dust control plans, tailored to specific operations and sites of operation, shall be required for:

1. All operations with material storage, handling and/or hauling operations and areas of source operations, construction sites; and all sources or operations which have the potential to produce fugitive dust in nonattainment areas along the Wasatch Front;

2. All temporary relocations under R307-401-17. Sources will be required to develop a site specific fugitive dust control plan for each temporary relocation of permitted equipment;

3. All sources and areas of source operations, pits and yards, statewide, which have been issued a Compliance Advisory for excess fugitive dust.

Operations, areas of operation and sources that shall be addressed in fugitive dust control plans are:

- material storage/handling - drilling, blasting, and pushing operations
- material handling/transfer - clearing/leveling/development construction
- material processing/transfer - earth moving and excavation
- road ways and yard areas - track out/spillage on paved roads
- loading/hauling/dumping materials - exposed surfaces

Completing the Fugitive Dust Control Plan online is the easiest and fastest way to obtain a permit. An electronic copy of the application is automatically approved by the State Division of Air Quality upon completion. The online Fugitive Dust Control Plan can be found at the following address:

https://secure.utah.gov/deq-dashboard/index.html

If completing the Fugitive Dust Control Plan online is not an option, a hard copy of the application may be completed and submitted by mail to the DAQ for processing. To request a hard copy of the Fugitive Dust Control Plan, contact the DAQ by phone at (801) 536-4000. Please note: it may take up to 14 days from the date of request to receive an acceptance if a hard copy is submitted for processing.
Detailed Instructions:

The online fugitive dust control plan creation tool can be found at the following address:

https://secure.utah.gov/deq-dashboard/index.html

- Click on “Start a New Permit”
- Login or Create an Account
- Answer the qualifying questions to determine if you need a permit or not. This also determines if you need to create a Storm Water permit application.
  - Note: even if you are not required to fill out a Fugitive Dust Control Plan, you will still be given the option to create one.
  - Also, if you already have an existing Storm Water Permit and the qualifying questions indicate that you are required to have one, you do not need it start a new one.
- You will not be able to edit a plan once it has been submitted.
  - Edits to your plan must be done by calling the DAQ or you may submit an entirely new application.
- Once the fugitive dust plan is filled out in its entirety, the plan is automatically approved.

The following information will be required in order to fill out the application in full. The application does not have the capability of saving partial plans. Use the outline below to gather all of the relevant information required before starting the plan.

Plan Type: Air Quality attainment area or non-attainment area

Applicant Type: Property Owner, Prime Contractor, Sub Contractor, Facility/Project Manager

Name:

Mailing Address:

City:

State:

Zip:

Phone:

Fax

Email:

Project Name:
Address:
City:
State:
Zip:
Directions:
County:
Acreage:
  * Latitude:
  * Longitude:

Lookup the latitude and longitude based on the address above:

Or Enter degrees, minutes, seconds below and convert to decimals:

Latitude:
Longitude:

*Point of Contact*

Name:
Company:
Address:
City:
State:
Zip:
Phone:
Fax:
Cell/Pager:

On-site Superintendent/Supervisor/Foreman contact

Name:
Company:

On-Site Phone:

Cell/Pager:

Do you require the use of chemical or organic dust suppressing agency and other chemical stabilizers?  Yes  No

Magnesium chloride (SHOULD NOT BE USED NEAR SURFACE WATER BODIES OR DRAINAGE AREAS).

Calcium chloride (SHOULD NOT BE USED NEAR SURFACE WATER BODIES OR DRAINAGE AREAS).

Clay additives.

Lime (calcium oxide) (SHOULD NOT BE USED NEAR SURFACE WATER BODIES OR DRAINAGE AREAS).

Synthetic polymers (for example; polyvinyl acetate and vinyl acrylic).

Organic non-petroleum products, (ligninsulfonate, tall (pine) oil, and vegetable derivatives).

Place a check mark next to every activity that will be conducted on this site, for each checked activity, complete the corresponding control measures/best management practice (bmp) selection page.  When completed, you will have the option to print the entire plan.

01. Backfilling area previously excavated or trenched.

02. Blasting soil & rock - drilling and blasting.

03. Clearing for site preparation and vacant land cleanup.

04. Clearing forms, foundations, slab clearing and cleaning of forms, foundations and slabs prior to pouring concrete.

05. Crushing of construction and demolition debris, rock and soil.

06. Cut and fill soils for site grade preparation.

07. Demolition - Implosive demolition of a structure, using explosives.

08. Demolition - mechanical/manual demolition of walls, stucco, concrete, freestanding structures, buildings and other structures.

09. Disturbed soil throughout project including between structures. **THIS ACTIVITY MUST BE SELECTED FOR ALL PROJECTS.**

10. Disturbed land - long term stabilization and erosion control of large tracts of disturbed land that will not have continuing activity for more than 30 days.
11. Hauling materials.

12. Paving/subgrade preparation for paving streets, parking lots, etc.

13. Sawing/cutting material, concrete, asphalt, block or pipe.

14. Screening of rock, soil or construction debris.

15. Staging areas, equipment storage, vehicle parking lots, and material storage areas.

16. Stockpiles materials (storage), other soils, rock or debris, for future use or export.

17. Tailings piles, ponds and erosion control.

18. Trackout Prevention and Cleanup of mud, silt and soil tracked out onto paved roads.

(THIS ACTIVITY MUST BE SELECTED FOR ALL PROJECTS.)

19. Traffic - unpaved routes and parking, construction related traffic on unpaved interior and/or access roads and unpaved employee/worker parking areas.

20. Trenching with track or wheel mounted excavator, shovel, backhoe or trencher.

21. Truck loading with materials including construction and demolition debris, rock and soil.

**Best Management Practice (BMP) Selections**

**BACKFILLING BMP 01**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Stabilize backfill material when not actively handling.**

01-01. Water backfill material to maintain moisture or to form crust.

01-02. Apply and maintain a chemical stabilizer to backfill material to form crust.

01-03. Cover (natural or synthetic) or enclose backfill material when not actively handling.

**Stabilize backfill material during handling.**

01-04. Empty loader bucket slowly and minimize drop height from loader bucket.

01-05. Dedicate water truck or large hose to backfilling equipment and apply water as needed.

01-06. Mix moist soil with dry soil until the optimum moisture is reached.

01-07. Apply and mix water into the backfill material until optimum moisture is reached.
01-08. Apply and mix water and chemical solution into the backfill material until optimum moisture is reached.

**Stabilize soil at completion of backfilling activity.**

01-09. Apply water and maintain disturbed soils in a stable condition.

01-10. Apply and maintain a chemical stabilizer on disturbed soils to form a crust.

**Stabilize material while using pipe padder equipment.**

01-11. Mix moist soil with dry soil until the optimum moisture is reached.

01-12. Dedicate water truck or large hose to equipment and apply water as needed.

01-13. Not Applicable

**BLASTING - SOIL AND ROCK BMP 02**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Stabilize surface soils where drills, support equipment and vehicles will operate.**

02-01. Pre-water and maintain surface soils in a stabilized condition.

02-02. Apply and maintain a chemical stabilizer on surface soils.

**Stabilize soil during blast preparation activities.**

02-03. Limit the blast footprint area to no larger than what can be practically stabilized immediately following the blast.

02-04. Maintain surface rock and vegetation where possible to reduce exposure of disturbed soil to wind.

**Stabilize soil after blasting.**

02-05. Water disturbed soils to form crust immediately following blast and safety clearance.

02-06. Apply and maintain a chemical stabilizer to form crust immediately following blast and safety clearance.

**CLEARING BMP 03**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**
Stabilize surface soils where support equipment and vehicles will operate.

03-01. Pre-water and maintain surface soils in a stabilized condition.

03-02. Apply and maintain a chemical stabilizer on surface soils.

**Stabilize disturbed soil immediately after clearing and grubbing activities.**

03-03. Water disturbed soils to form crust.

03-04. Apply and maintain a chemical stabilizer on disturbed soils to form crust.

**Stabilize slopes at completion of activity.**

03-05. Stabilize sloping surfaces using soil binders until vegetation or ground cover can effectively stabilize the slope.

03-06. Apply water and maintain sloping surfaces/wind breaks in a crusted condition.

**CLEARING FORMS, FOUNDATIONS AND SLABS BMP 04**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5 MAKE AT LEAST ONE SELECTION.**

04-01. Use water spray to clear forms, foundations and slabs.

04-02. Use sweeping and water spray to clear forms, foundations and slabs.

04-03. Use industrial vacuum to clear forms, foundations and slabs prior to the use of high pressure air to blow soil and debris.

04-04. Use industrial vacuum to clear forms, foundations and slabs.

**CRUSHING BMP 05**

If you have crushers and screening on site, you may be subject to the federal requirements contained in New Source Performance Standards Subpart OOO. It is advised that you read this subpart to determine if these requirements apply to you. Please note that Subpart OOO is NOT included in this Dust Control Plan submission. The link to Subpart OOO is listed below:


**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5 MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

Stabilize surface soils where support equipment and vehicles will operate.
05-01. Pre-water and maintain surface soils in a stabilized condition.

05-02. Apply and maintain a chemical stabilizer to surface soils.

05-03. Pave operational area(s).

**Stabilize material before crushing.**

05-04. Pre-water material.

05-05. Test material to determine moisture content and silt loading, crush only material that is at optimum moisture content.

**Stabilize material during crushing.**

05-06. Apply water to stabilize material so as to maintain compliance with opacity standards and permit conditions.

05-07. Monitor opacity. Make adjustments to maintain compliance with opacity standards and permit conditions.

05-08. Install wind break or use enclosure.

**Stabilize material after crushing.**

05-09. Water crushed material immediately following crushing.

05-10. Apply and maintain a chemical stabilizer to crushed material.

05-11. Maintain in enclosure.

05-12. Minimize height of stockpile.

**Traffic.**


05-14. Reduce truck traffic.

05-15. Reduce truck speed.

**Transfer height.**

05-16. Minimize transfer and drop point height.

**CUT AND FILL BMP 06**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**
Stabilize surface soils where support equipment and vehicles will operate.

06-01. Pre-water and maintain surface soils in a stabilized condition.

06-02. Apply and maintain a chemical stabilizer to surface soils.

Pre-water soils.

06-03. Dig a test hole to depth of cut or equipment penetration to determine if soils are moist at depth. Continue to pre-water if not moist to depth of cut.

Stabilize soil during cut activities.

06-04. Apply water to depth of cut prior to subsequent cuts.

Stabilize soil after cut and fill activities.

06-05. Water disturbed soils to maintain moisture.

06-06. Apply and maintain a chemical stabilizer on disturbed soils to form crust following fill and compaction.

06-07. Apply cover (natural or synthetic).

DEMOLITION - IMPLOSION BMP 07

Note: An asbestos survey may be necessary subject to the asbestos NESHAP and R307-801. All asbestos containing material must be removed prior to demolition and implosion.

GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5

MAKE AT LEAST ONE SELECTION FROM EACH SECTION.

Stabilize surface area where support equipment and vehicles will be operated.

07-01. Restrict support equipment and vehicles to existing paved and/or stable areas.

Note: You must select one of the following if paved and/or stable areas do not already exist and you have not selected 07-1.

07-02. Pre-water and maintain surface soils in a stabilized condition.

07-03. Apply and maintain a chemical stabilizer on surface soils.

Stabilize demolition debris immediately following blast and safety clearance.

07-04. Apply water to debris immediately following blast and safety clearance.
07-05. Apply and maintain a chemical stabilizer to debris immediately following blast and safety clearance.

**Stabilize and clean surrounding area immediately following blast and safety clearance.**

07-06. Water all disturbed soil surfaces to maintain moisture content and prevent wind erosion of soil.

07-07. Sweep and wash blast debris from paved and other surfaces following blast and safety clearance.

**DEMOLITION - MECHANICAL/MANUAL BMP 08**

Note: An asbestos survey may be necessary subject to NESHAP. All asbestos containing material must be removed prior to demolition.

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Stabilize surface areas where support equipment and vehicles will operate.**

08-01. Pre-water and maintain surface soils in a stabilized condition.

08-02. Apply and maintain a chemical stabilizer to surface soils.

08-03. Pave operational areas.

**Stabilize demolition debris during handling.**

08-04. Apply water.

**Stabilize debris following demolition.**

08-05. Apply water.

08-06. Apply a chemical stabilizer.

**Stabilize surrounding area following demolition.**

08-07. Apply water.

08-08. Apply and maintain a chemical stabilizer to stabilize.

**DISTURBED SOIL BMP 09**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Limit disturbance of soils where possible.**
09-01. Limit disturbance of soils with the use of fencing, barriers, barricades, and/or wind barriers.

09-02. Limit vehicle mileage and reduce speed.

**Stabilize and maintain stability of all disturbed soil throughout construction site.**

09-03. Apply water to stabilize disturbed soils. Soil moisture must be maintained such that soils can be worked without generating fugitive dust.

09-04. Apply and maintain a chemical stabilizer.

09-05. Use wind breaks.

09-06. Apply cover (natural or synthetic).

**DISTURBED LAND LONG-TERM STABILIZATION OVER 30 DAYS BMP 10**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Prevent access to limit soil disturbance.**

10-01. Prevent access by fencing, ditches, vegetation, berms or other suitable barrier.

**Stabilize soil.**

10-02. Apply and maintain a chemical stabilizer on disturbed soils.

10-03. Stabilize disturbed soil with vegetation.

10-04. Pave or apply surface rock.

10-05. Use wind breaks.

10-06. Apply water and maintain soil moisture sufficient to avoid generating fugitive dust.

**HAULING MATERIALS BMP 11**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Limit visible dust opacity from vehicular operations.**

11-01. Apply and maintain water/chemical suppressant to operational areas and haul routes.

11-02. Limit vehicle mileage and speed.

**Stabilize materials during transport on site.**
11-03. Use tarps or other suitable enclosures on haul trucks.

11-04. Apply water prior to transport.

**Clean wheels and undercarriage of haul trucks prior to leaving construction site.**

11-05. Clean wheels.

11-06. Sweep or water haul road.

**PAVING/SUBGRADE PREPARATION BMP 12**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5 MAKE AT LEAST ONE SELECTION.**

**Stabilize adjacent disturbed soils following paving activities.**

12-01. Apply and maintain water on disturbed soils.

12-02. Apply and maintain chemical stabilizer on disturbed soils.

12-03. Stabilize disturbed soils with vegetation or hydrotech.

12-04. Apply synthetic cover to disturbed soils.

12-05. There are no soils adjacent to paving activities.

**SAWING/CUTTING MATERIALS BMP 13**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5 MAKE AT LEAST ONE SELECTION.**

**Limit visible emissions.**

13-01. Use water control to dust.

13-02. Use a vacuum to collect dust.

**SCREENING BMP 14**

If you have crushers and screens on site, you may be subject to the federal requirements contained in New Source Performance Standards Subpart OOO. It is advised that you read this subpart to determine if these requirements apply to you. Please note that Subpart OOO is NOT included in this Dust Control Plan submission. The link to Subpart OOO is listed below:
GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5 MAKE AT LEAST ONE SELECTION FROM EACH SECTION.

Stabilize surface soils where support equipment and vehicles will operate.

14-01. Pre-water and maintain surface soils in a stabilized condition.

14-02. Apply and maintain a chemical stabilizer on surface soils.

14-03. Pave operational area(s).

Pre-treat material prior to screening.

14-04. Apply a dust suppressant to material.

Stabilize material during screening.

14-05. Dedicate water source to screening operation and apply water as needed to prevent dust.

14-06. Install wind barrier upwind of screen as high as the drop point.

Stabilize material and surrounding area immediately after screening.

14-07. Apply water to stabilize screened material and surrounding area.

14-08. Apply and maintain a chemical stabilizer to stabilize screened material and surrounding area.

14-09. Minimize storage pile height.

Transfer height.

14-10. Drop material through the screen slowly and minimize drop height.

STAGING AREAS BMP 15

GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5 MAKE AT LEAST ONE SELECTION FROM EACH SECTION.

Limit visible dust opacity from vehicular operations.

15-01. Limit vehicle mileage and speed.

15-02. Apply water on all vehicle traffic areas in the staging areas and unpaved access routes.

Stabilize staging area soils during use.
15-03. Pre-water and maintain surface soils in a stabilized condition.

15-04. Apply and maintain a chemical stabilizer to surface soils.

**Stabilize staging area soils at project completion.**

15-05. Apply a chemical stabilizer.

15-06. Apply screened or washed aggregate.

15-07. Use wind breaks.

15-08. Pave.

15-09. Completed project will cover staging area with buildings, paving, and/or landscaping.

15-10. Apply water to form adequate crust and prevent access.

**STOCKPILING BMP 16**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

**MAKE AT LEAST ONE SELECTION FROM EACH SECTION.**

**Stabilize surface soils where support equipment and vehicles will operate.**

16-01. Pre-water and maintain surface soils in a stabilized condition.

16-02. Apply and maintain a chemical stabilizer on surface soils.

16-03. Pave area.

**Stabilize stockpile materials during handling.**

16-04. Remove material from the downwind side of the stockpile, when safe to do so.

16-05. Reduce height.

16-06. Create wind screen

**Stabilize stockpiles after handling.**

16-07. Water stockpiles to form a crust immediately.

16-08. Apply and maintain a chemical stabilizer to all outer surfaces of the stockpiles.

16-09. Provide and maintain wind barriers on 3 sides of the pile.

16-10. Apply a cover (natural or synthetic)
16-12. Avoid steep sides to prevent material sloughing.

**TAILINGS PILES AND PONDS BMP 17**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

MAKE AT LEAST ONE SELECTION.

Stabilize piles and ponds.

17-01. Pre-water and maintain surface soils in a stabilized condition.
17-02. Apply and maintain a chemical stabilizer on surface soils.
17-03. Install cover (natural or synthetic).
17-04. Apply wind break.
17-05. Avoid steep sides of faces.
17-06. Minimizing the area of disturbed tailings.
17-07. Restricting the speed of vehicles in and around the tailings operation.

**TRACKOUT PREVENTION AND CLEANUP BMP 18**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

MAKE AT LEAST ONE SELECTION FROM EACH SECTION.

Prevent dust from trackout.

18-01. Clean trackout at the end of the work shift from paved surfaces to maintain dust control.
18-02. Maintain dust control during working hours and clean trackout from paved surfaces at the end of the work shift/day.
18-03. Install gravel pad(s), clean, well-graded gravel or crushed rock. Minimum dimensions must be 30 feet wide by 3 inches deep, and, at minimum, 50' or the length of the longest haul truck, whichever is greater. Re-screen, wash or apply additional rock in gravel pad to maintain effectiveness.
18-04. Install wheel shakers. Clean wheel shakers on a regular basis to maintain effectiveness.
18-05. Install wheel washers. Maintain wheel washers on a regular basis to maintain effectiveness.
18-06. Motorized vehicles will only operate on paved surfaces.
18-07. Install cattle guard before paved road entrance.

All exiting traffic must be routed over selected trackout control device(s).

18-08. Clearly establish and enforce traffic patterns to route traffic over selected trackout control device(s).

18-09. Limit site accessibility to routes with trackout control devices in place by installing effective barriers on unprotected routes.

**TRAFFIC UNPAVED ROUTES AND PARKING AREAS BMP 19**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

MAKE AT LEAST ONE SELECTION.

Stabilize surface soils where support equipment and vehicles will operate.

19-01. Limit vehicle mileage and speeds.

19-02. Apply and maintain water on surface soils.

19-03. Apply and maintain chemical stabilizers on surface soils.

19-04. Apply and maintain gravel on surface soils.

19-05. Supplement chemical stabilizers, water or aggregate applications as necessary.

19-06. Apply recycled asphalt (RAP) to surface soils.

**TRENCHING BMP 20**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

MAKE AT LEAST ONE SELECTION FROM EACH SECTION.

Presoak soils prior to trenching activities.

20-01. Pre-water surface.

Stabilize surface soils where trenching equipment, support equipment and vehicles will operate.

20-02. Pre-water and maintain surface soils in a stabilized condition.

20-03. Apply and maintain a chemical stabilizer to surface soils.

20-04. Limit mileage and speed.

Stabilize soils after trenching.
20-05. Apply and maintain water on excavated soil.

20-06. Apply and maintain chemical stabilizer on excavated soil.

**TRUCK LOADING BMP 21**

**GENERAL REQUIREMENT: ALL ACTIVITIES MUST MEET OPACITY REQUIREMENTS IN R307-309-5**

MAKE AT LEAST ONE SELECTION.

21-01. Pre-water and maintain surface soils in a stabilized condition where loaders, support equipment and vehicles will operate.

21-02. Apply and maintain a chemical stabilizer on surface soils where loaders, support equipment and vehicles will operate.

21-03. Empty loader bucket slowly and keep loader bucket close to the truck to minimize the drop height while dumping.