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DIVISION OF
OIL, GAS & MINING

August 18, 1989

TO: RICK SMITH, PERMIT SUPERVISOR

FROM: BILL WARMACK, RECLAMATION SPECIALIST *WAW*

RE: COAL FINES ACCUMULATION IN COTTONWOOD CREEK, BEAVER CREEK COAL COMPANY (BCCC), TRAIL MOUNTAIN #9 MINE, ACT/015/009, FOLDER #2, EMERY COUNTY, UTAH.

SYNOPSIS/ANALYSIS

As a followup to my July 19, 1989 memo, several coal fine sources were observed and noted during a recent partial inspection at Trail Mountain #9 Mine (August 17, 1989). The amount of coal fines and particle size varied along each side of the Cottonwood Canyon Road; no measurable concentrations were located.

Rain showers preceeded this inspection which produced sediment deposition in various locations. Since the ground was moist, coal fines were very visible. Areas that have a potential to supply a source of coal fines to Cottonwood Creek are as follows:

1. BCCC's coal stockpiles and truck loadout. Coal fines generated by the loading and storage of coal are, for the most part, large size particles. Once airborne, these particles would rapidly drop out in the general vicinity of their origination.
2. BCCC's lower gate (truck exit). Fines observed in this immediate area and along the Canyon Road just outside of the gate, were minute dust particles which have become pulverized by the trucks. This material would have a high tendency to become airborne and stay in suspension for some time. Drainage at and below the lower gate reports to the sediment pond.
3. Utah Power & Light's (UP&L) Cottonwood Fan Portal/Old Johnson Mine. Several locations of exposed coal and coal/soil mixtures were noticeable along the eastern side of the Canyon Road. Major contributors of coal appeared to be the following sources:
 1. North of and adjacent to the UP&L subsoil storage pile (coal rider seams).

2. UP&L exposed coal seam (highwall).
3. Rider coal seams at the southern end of UP&L's property adjacent to the road.

Coal observed in the road drainage ditch varied from pin-head to nugget and lump size. Various amounts of coal was seen in the slopes and revegetated areas. All of the drainage from the eastern side of the Canyon ultimately drains to Cottonwood Creek via culverts.

RECOMMENDATIONS

Coal fines were noticed in Cottonwood Creek, and along the eastern and western sides of the Canyon Road. However, due to the size of particles and amount of exposed coal on UP&L's property, coal accumulations (fugitive dust) cannot be totally attributed to BCCC's operations. In conjunction with my recommendations in the July 19 memo, I further recommend the following:

1. Inform UP&L of the situation and the concerns brought about by Mr. Niebergall of the Manti-LaSal Forest Service. Alternate sediment controls (rock gabions) should be cleaned as often as possible to ensure that coal and coal fines are deposited before entering the drainage culverts and ultimately Cottonwood Creek.

c. c. PFO