

0015



Canyon Fuel Company, LLC
Skyline Mines
HC 35 Box 380
Helper, Utah 84526
(435) 448-6463 Fax: (435) 448-2632

April 4, 2000

Coal Regulatory Program
Attn.: Daron Haddock
Division of Oil, Gas and Mining
1594 West North Temple, Suite 1210
Box 145801
Salt Lake City, Utah 84114-5801

RECEIVED

APR 07 2000

DIVISION OF
OIL, GAS AND MINING

RE: Midterm Review, Canyon Fuel Company, LLC, Skyline Mine, ACT/007/005-MT99

Copy Daron
INCOMING
Info in MT 99

Dear Mr. Haddock:

I have been pleasantly reminded recently by Mike Suflita of your staff that we have failed to adequately respond to the midterm review of the Skyline Mines permit. We have yet to adequately satisfy the Division's request regarding addressing the mine site sediment pond discharge issue. To this end, I am forwarding to you this letter that details the Skyline Mines' plan to reduce the number of UPDES discharge violations.

As we have discussed in the past, Skyline Mines intends to install a monitoring system that will allow the mine to closely monitor the quality of the mine water discharged to Eccles Creek. I have attached two schematic diagrams to this letter; one illustrating the existing in-mine water collection and discharge system and the other illustrating the proposed system. You will note the proposed system diagram has pH, turbidity (or opacity), and oil and grease analyzers in-line in the discharge system. These instruments will continuously sample and analyze the water quality within the discharge system. The instrumentation will be calibrated to set maximum and minimum values, where applicable, that are equal to or less than allowable UPDES discharge limits. The analyzers will be electronically connected to a downstream valve system and will activate the system to divert water to abandoned mine workings if the maximum or minimum values are exceeded. The instrumentation will also be connected to the mine's Conspec® system which is monitored 24-hours a day. The status of each instrument and the current water quality will be displayed on monitors in both the mine-site warehouse and operations room. If an exceedance occurs, an audible alarm will sound and a warning will appear on the monitors. If a problem with the system or discharge water is detected, the discharge system will be checked and monitored for proper function. This includes confirming that mine-water is being discharged to the abandoned

workings and not Eccles Creek. If a problem with the quality of the mine water persists, the appropriate mine personnel will be notified and the source of the problem will be traced and corrected.

In addition to the in-line analyzers, the required UPDES sampling will be continued as required on a weekly basis. Water samples will be obtained from both the mine water discharge and the pond discharge locations. The flow will be measured at both locations and used to determine the proper composite percentage to be used for the final sample. We anticipate the sediment pond will discharge infrequently after the mine water is discharged directly to Eccles Creek.

The schedule for implementation of the new mine discharge management plan is dependent upon a few critical factors. First, the two large underground sumps are being constructed in previously or currently mined areas. The 6 left sub-mains sump will be located in Mine1 in an area where mining is complete. The 2 west mains sump will be located in an area where mining is still occurring. The last panel in this area should be completely mined by the end of May 2000. Bulkheads will be constructed in the 2 west mains shortly thereafter and the appropriate pumps will be installed. The pumps for the system have been ordered and we anticipate the system will be operational by July 2000.

A second factor influencing the timing of project implementation is the approval by DWQ to allow for the two discharge locations for UPDES Discharge Point 001. A copy of a letter sent to Mr. Don Ostler of the Utah Division of Water Quality (DWQ) regarding our plans to discharge mine water directly to Eccles Creek has been attached to this letter. In this letter, Skyline Mines has applied to split UPDES Discharge point 001 into two discharge locations. One discharge point will remain at the sediment pond while the other will be located at a point farther upstream in the main Eccles Creek culvert near the water treatment plant. This application was discussed at length with Mr. Mike Herkimer of DEQ and he is aware of the reasons for the application. Mr. Herkimer has been very helpful in this matter and we anticipate approval within the next few weeks. However, if we do not receive approval for our current plan, significant costs and modifications to the plan may be necessary. The impetus for creating two discharge locations is related to the cost and timing of installing a pipeline from the upper pad of the mine site to the sediment pond. Existing buried piping systems are not adequate for our future needs. Numerous utility corridors, several of which have locations that are not precisely known, would need to be crossed by a trench for the discharge pipe. Additionally, the trench would need to be excavated in the steep slope between the middle and the lower pads, a dangerous and difficult proposition.

I feel it is appropriate to point out that Skyline Mines has made significant progress toward reducing the number of UPDES permit discharge exceedances since 1997. Since November 1997, a total of three limit exceedances have occurred at discharge point 001. In June 1999, a pH value of 6.31 for the discharged water was measured. However, subsequent testing indicated this measurement was related to

an equipment failure and not representative of the actual pH value of the water. The pH meter and probe were subsequently replaced with new functioning equipment.

In July 1999, the results of analysis of a discharge water sample indicated we had exceeded our 30 day and 7 day TSS limitations. However, upon further review, we found that a significant precipitation event had occurred within twenty-four hours of sampling which would have allowed us, by permit, to use settleable solids analysis instead of TSS. The sample had been obtained by a summer intern who had been trained in proper sampling techniques but simply forgot to note the runoff event and to request total settleable solids analysis. The intern was retrained but was not asked to sample the discharge water again.

Finally, in February 2000, analysis of a discharge sample indicated the pond discharge water contained 36 mg/l of TSS, exceeding our seven day limit by 1 mg/l. We had anticipated this might occur since mine water discharge volumes had been temporarily increased resulting in a stirring of the sediments in the upstream portion of the pond. The mine water itself did not contain a significant amount of TSS. Mine personnel now monitor the volume of water discharged to avoid disturbing the sediment within the pond. This particular problem should not reoccur after implementation of the new mine water discharge system and the pond is cleaned of sediment this summer.

I would also like to address the issue of the release of emulsion fluids from the mine to Eccles Creek. The only known release of emulsion fluid to Eccles Creek occurred on September 6, 1995. This release occurred as the result of a failure of an automatic shut-off valve. The valve system was upgraded and no similar problems with the valves has occurred since. We have had one instance where a much smaller volume of emulsion has actually reached the sediment pond since 1995. This occurred in March of 1999 when a hose carrying emulsion to the longwall broke, the fluid entered a nearby sump, and was discharged to the pond. (Please note that in this instance, the emulsion was pre-mixed at a ratio of approximately 96% water to 4% oil and sampling of the pond water indicated an oil and grease concentration of less than 2 mg/L, the method detection limit. The spill in September of 1995 resulted in neat oil discharging directly to the pond.) The sump the emulsion entered was the last in a series of sumps which were used to collect mine water for discharge to the sediment pond. The broken hose was repaired and an equipment monitoring plan that included periodic examination of hoses and piping was instigated. The sump collection system in this area was also modified so emulsion fluid, if spilled, could not enter into the mine water discharge sump system.

Skyline Mines has requested on two other occasions to pump water from the pond to abandoned underground workings. In December 1998, a request was made to pump water out of the pond to avoid discharging water running off a portion of the coal pile where spontaneous combustion had occurred. The runoff water, while not

considered contaminated, did exhibit a reddish color and have a smoky smell. In August 1999, a request was again made to pump water underground to avoid the potential for discharging emulsion contaminated water. The August 1999 event did not result in a discharge of emulsion to the pond since mine personnel were successful in diverting the small volume of contaminated water to abandoned workings. Skyline requested permission to pump the water back underground only as a precautionary measure. The spill occurred when a filter on a longwall return line plugged and caused a holding tank to overflow. The filter became plugged as a result of using poor quality water in the mix with neat oil to form the emulsion fluid. The source of the water used in the emulsion was changed to a higher quality water source and is analytically monitored on a more frequent basis to insure a similar accident does not occur. The spill occurred on the upstream end of the mine water collection system, thus allowing mine personnel time to divert the water to the abandoned workings.

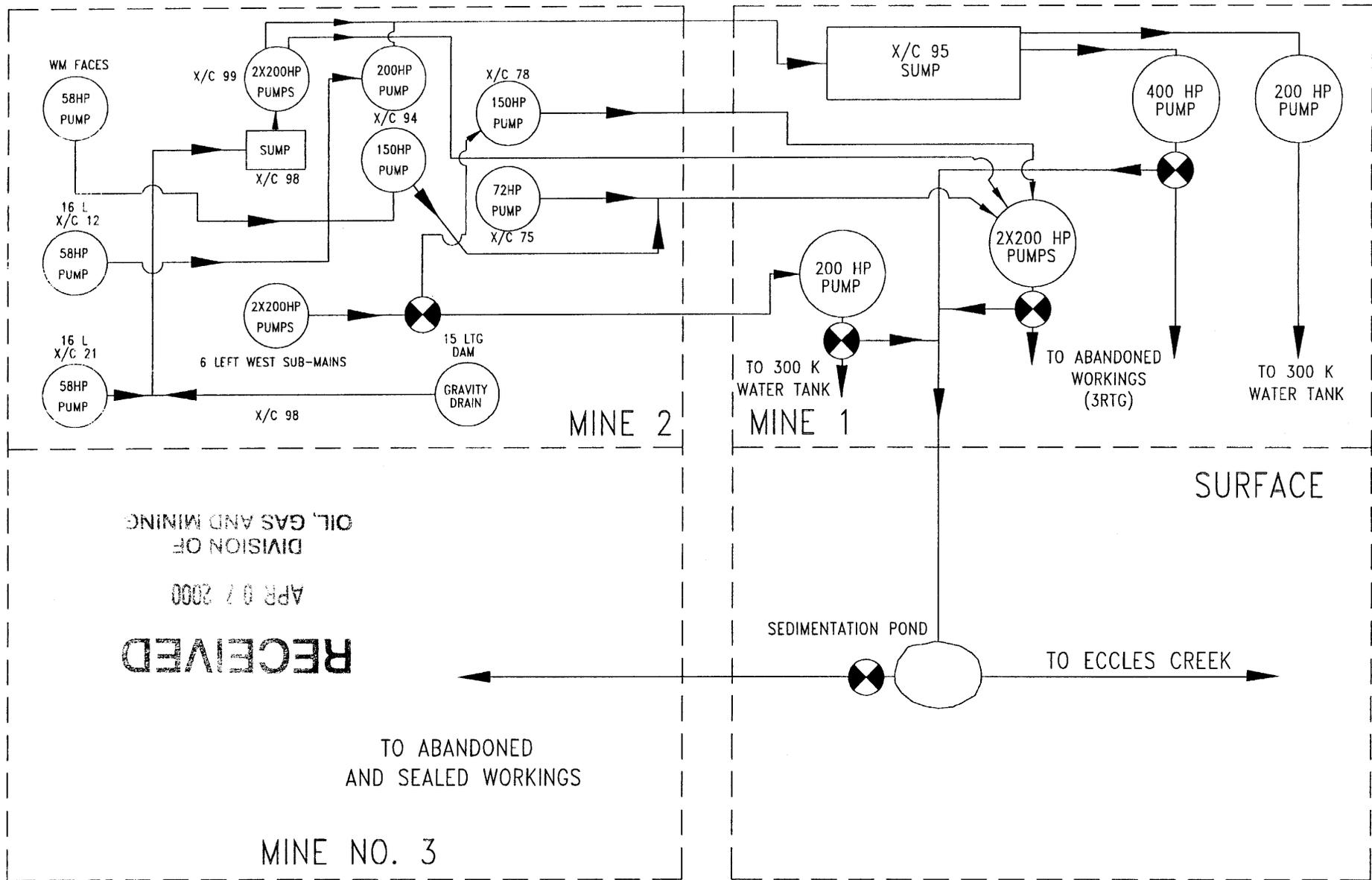
I believe Skyline Mines has been able to reduce the risks of discharge violations over the past few years by implementing more stringent underground equipment and mine water monitoring plans and immediately addressing underground spills when they occur. While we cannot anticipate every accident that may occur, we have been successful in implementing plans that we believe will prevent them from reoccurring. Additionally, the new mine water collection, storage, and discharge system should greatly improve the quality of the water discharged to Eccles Creek and further reduce the risk of contaminants being discharged to the creek. We anticipate the holding time of the water within the new mine water sump system to be in excess of 28 days, thus allowing for additional and significant sediment settling time.

We look forward to the completion of this project. Canyon Fuel Company is committed to the reduction of risk to the environment in which we work while mining coal and directly providing 245 well paying jobs at Skyline Mines. We appreciate your patience regarding the construction of the new mine water discharge system. If you have any questions, please call me at (435) 448-2669.

Sincerely:



Chris D. Hansen
Environmental Coordinator
Canyon Fuel Company, LLC



RECEIVED
 APR 07 2000
 DIVISION OF
 OIL, GAS AND MINING

TO ABANDONED
AND SEALED WORKINGS

DRAWING 1			
EXISTING			
DISCHARGE WATER SCHEMATIC			
CF Canyon Fuel Company, LLC		Skyline Mines	
<small>P.O. BOX 719 HELPER, UTAH 84526</small>	<small>DATE: 3.19.00</small>	<small>CK. BY: C. HANSEN</small>	<small>REVISION:</small>
<small>CAD FILE: P:\mine\cfdp\EXISTINGWTR</small>	<small>SCALE: NONE</small>	<small>DR. BY: G. KENZY</small>	
<small>Scale: 1" = 100'</small>	<small>DATE: 3/19/00</small>	<small>BY: G. KENZY</small>	

MINES 1 AND 2

SURFACE

6 LEFT
SUB-MAINS
PUMP

2WM
MAINS
PUMP

OIL, GREASE, PH, AND TURBIDITY
ANALYZERS

AUTOMATIC
VALVE

TO ECCLES CREEK

5 MILLION GALLONS CAPACITY (APPROX).

54 MILLION GALLONS CAPACITY

TO ABANDONED
AND SEALED WORKINGS

MINE NO. 3

RECEIVED
APR 07 2000
DIVISION OF
OIL, GAS AND MINING

DRAWING 2
PROPOSED NEW
DISCHARGE WATER SCHEMATIC

CF Canyon Fuel Company, LLC
Skyline Mines

P.O. BOX 716 HELPER, UTAH 81024	DATE: 2.21.00	CK BY: C. HANSEN	REVISION:
GAL. TEL. 437-837-2925	SCALE: NONE	DR. BY: G. KENZY	
U.W. NO. P15A008			

Canyon Fuel Company, LLC
Skyline Mines
HC 35 Box 380
Helper, UT 84526
435 448-6463
Facsimile 435 448-2632



14 March 2000

Mr. Don Ostler, Director
Division of Environmental Quality
Division of Water Quality
State of Utah
Salt Lake City, Utah 84114-4870

RECEIVED

APR 07 2000

DIVISION OF
OIL, GAS AND MINING

Re: UPDES Permit UT-0023540

Dear Mr. Ostler:

Canyon Fuel Company, LLC, Skyline Mines is requesting the mine water discharge into the mine site sediment pond be segregated from surface runoff as it pertains to the UPDES discharge point 001.

The sediment pond was originally designed to handle surface runoff and a small amount of mine discharge. However, the underground mines have encountered more groundwater than anticipated, thus more water is discharging to the pond. This increase in mine discharge has caused a hydraulic overload to occur in the pond. Attempts have been made to reduce the mine discharge flow to the pond by diverting the water to a 300,000 gallon tank used for process/fire fighting and to old underground workings. Sediment from surface runoff settles out in the pond as designed. However, as the sediment depth increases in the pond, the mine water discharge agitates the sediments which increases the total suspended solids discharged from the pond.

Segregation of the mine water and surface will allow the sediment pond to function as designed without the hydraulic overloading. The mine water will be pumped directly into the Eccles Canyon Creek. The water quality of Eccles Creek will remain the same since mine water discharge has typically been pumped to the sediment pond which discharges to the creek. Steps will be taken to ensure that the water quality in Eccles Creek is maintained at its present state. These steps will include the installation of an inflow oil and grease analyzer, a pH meter, and a turbidity meter into the mine water discharge line. These instruments will continually monitor the mine water. If any of the parameters are exceeded, an automated valving system will be activated and the water will be diverted into old mine working to prevent any contaminants from reaching the creek.

Thank you for approving this request.

Sincerely,

Dan Meadors
General Manager
Canyon Fuel Co., LLC - Skyline Mines