Ventilation map for:

Black Wolf Coal Company
Quecreek #1 Mine
Upper Kittanning Seam
Permit # 56981301
MSHA ID# 36-08746
Lincoln & Somerset Townships
Somerset County, Pennsylvania
Mine Address:
10310 Somerset Pike
Somerset, PA 15501
Date: 10-28-02
Scale: 1"=200'

Engineers Seal
JAMES A. STEFFEY
No. 8624-E
PROFESSIONAL ENGINEER
COMMONWEALTH OF PENNSYLVANIA
10-28-02

Check Surveys performed:
2-11-02 GPS points to C22 in mains
10-18-02 C22 in mains to STA 559 in 1 left
10-19-02 C22 in mains to STA 549 in mains
10-21-02 C22 in mains to GPS points.

Ventilation Legend
- intake air
- return air
- belt air
- stopping
- stopping with door
- check curtain
- primary escapeway
- alternate escapeway
- overcast
- Proposed Overcast
- proposed stopping
- (xx) equipment doors
- air lock doors
- 6' door
- Framed Canvas Check
- proposed seals
- flooded area

Scale: 1"=200'

ORIENTATION PROCEDURES USED FOR THE PLACEMENT OF ADJACENT ABANDONED DEEP MINE ON QUECREEK MINE MAPS

Harrison #2 Mine

The Harrison #2 Mine is digitized from a map obtained by the Quecreek investigation Team from the Windber Coal Museum (1" = 100') with the last survey date of January 1, 1954, which delineated the boundary adjacent to the Quecreek property. Production records were checked in the PA Bituminous Coal Division Annual Reports and there was no production, days worked, or employee data after 1960. The following sources were checked for maps: Consol Energy, PA Deep Mine Safety, Office of Surface Mining in Greentree, PA, PA DEP office in McMurray, and MSHA District 2 office in Hunker, PA. There is no final certified map available.

Orientation was accomplished by lining up surface features from the 1" = 100' mine map which was reconfigured on 1" = 176.07' scale and matched to a Quecreek Mine map to the same scale. The following points were used from the old sealed borehole in S South Main near 5 Butt Heading Left, then:
9064 feet east to the northwest corner of a house over 5 Butt Heading Left,
25822 feet southeast to a fork in the stream, and
21585 feet southeast to a bend in the stream on the Wm. Greg property.

Consol 120 Mine

The Consol 120 Mine was digitized from maps donated by Consol to the University of Pittsburgh Library Archives. These maps are 1" = 100' and some were reduced to 1" = 200' for digitizing purposes. The 1" = 1000' map obtained from Consol Energy was also used. The 1" = 100' map at Deep Mine Safety that was marked Abandoned April 1955. This mine boundary is the same as that on the reserve map provided by Consol (Mine Development Consol Co., Jennerstown Project Reserve Area, and the Reserve Maps (1" = 200') showing flooded deep mines, and 2) Jennerstown Project Map 120 Mine (1" = 100') showing flooded deep mines. The following sources were checked for maps: Consol Energy, PA Deep Mine Safety, Office of Surface Mining in Greentree, PA, PA DEP office in McMurray, and MSHA District 2 office in Hunker, PA. There is no final certified map available.

Orientation was accomplished as follows:
1. On the 1" = 1000' map: The intersection of T436 and SR4001, the intersection of Faidley Rd. and T4527, and the intersection of SR4001 and SR4005.
2. On the 1" = 200' map: center of bridge on Quecreek Rd. over stream, intersections of T436 and SR4001, T436 and tributary #1, SR4001 and T450.
3. On the 1" = 100' map: intersection of SR4005, Centerline of T448, intersections of SR4001 and SR4005, SR4005 and T448, SR4001 and Tributary #1, the old railroad bridge over Quemahoning Creek (upstream of the town), and the old railroad bridge (spur) over Quemahoning Creek lower town, and the centerline of SR4015.

Quemahoning Creek No. 1 Mine

The Quemahoning Creek No. 1 Mine of the Quemahoning Creek Coal Company was plotted on the Consol 120 Mine 1" = 100' and was digitized onto the Quecreek Permit Map from the Consol 120 Mine map. The locations and boundaries of this mine are the same as that in the Annual Reports, Quemahoning Creek Coal Company Property map dated December 16, 1942. According to the Annual Reports, this mined closed in 1920 as there is no tonnage, employee, or days worked after this date. This map was oriented in the same manner as the Consol 120 Mine map. There is no certified final map available.

Ralphton #5 Mine

The Ralphton #5 Mine of the Quemahoning Coal Co. is an Upper Freeport Mine as described in the Annual Report. The map was digitized from an 1936 WPA map. The following sources were checked for maps: PA Deep Mine Safety, Office of Surface Mining, PA DEP office in Greentree, PA, and MSHA District 2 office in Hunker, PA. A 1" = 100' hardback map was used for digitizing purposes. Engineering and compared to the WPA map. This is the original map. Roads and railroads was the same. The mining boundary and orientation of the mine is based on February 25, 1930 and the last date of same. The survey legend on the 1936 WPA map indicates the mine closed in 1931. The Annual Report indicates the mine closed in 1931. mining on the map was April 1, 1931. There is no production, employment, or days worked after this date. Orientation was accomplished by matching roads in the mine vicinity.

Lower Freeport Mines

The known extent of the Lower Freeport Mines at the drift were plotted from a map acquired from the Office of Surface Mining at Greentree, Pa..

Mahoning Seam Deep Mine

The Mahoning Seam Deep Mine was located by field reconnaissance. There were no maps available.

The Harrisburg Blueprint Co. maps were examined to determine that there are no additional permitted mines adjacent to the Quecreek Mine.

The information contained on this map is accurate to the best of my knowledge, information, and belief.

Map Notes and Legend

1. People responsible for map information:
   David Riesbuck, David Keller, Joseph Hoffman, Chadwick Mostoller, Joseph Gallo, James Hickman
2. Closed loop survey meets the 1/5,000 accuracy requirement. This map satisfies the requirements of parts 75.372 & 75.1200
3. The distance between the Lower Freeport Coal Seam and the Upper Kittanning Coal Seam is approximately 55 feet.

Bell readings
- ① Height: 50' Methane: 0 PPM
- ② Height: 51' Methane: 0 PPM, Velocity: 24 FPM
- ③ Height: 50' Methane: 0 PPM, Velocity: 25 FPM
- ④ Height: 52' Methane: 0 PPM, Velocity: 12 FPM
- ⑤ Height: 52' Methane: 0 PPM, Velocity: 19 FPM
- ⑥ Height: 52' Methane: 0 PPM, Velocity: 18 FPM

UK Mines
Centerline Projections
Drillholes
Surface Permit Line
Permit Line
Streams
Dwellings
Other Buildings
Water Well or Spring (W or S)
Upper Freeport Cropline
Upper Kittanning Cropline
Roads
Proposed Horizontal Drillhole
500' Drilling Lines
Gas Line (G)
Main Fan

GPS Control Baseline Information
Azimuth from Mon. #1 to Mon. #2 = 237°-42'-45"
Horizontal Distance = 492.02 feet

Mapping compiled by photogrammetric methods using aerial photography taken in 1996. Grids are based upon PA State plane coordinate system, South Zone NAD27 North American Datum

Abandoned Mine Key, (D)eep or (S)urface

Mine Name	Operator	Map Symbol	Seam
Mine #120, (D)	Consol Coal Co.	A	Upper Kittanning
Quemahoning (D) Creek #1 Mine	Saxman Coal & Coke	B	Upper Kittanning
Harrison #2, (D)	Saxman Coal & Coke	C	Upper Kittanning
Unknown, (D)	Unknown	D	Lower Freeport
Coal Junction #10, (S)	Coal Junction	E	Upper & Lower Freeport
Unknown, (D)	Unknown	C	Mahoning
Quecreek Reclamation, (S)	Delta Mining	H	Refuse Recovery

Ventilation Legend