

#2

ANDALEX RESOURCES, INC.
CENTENNIAL PROJECT
007/019

AMENDMENT
TO
THE MINING AND RECLAMATION PLAN

*TO ALLOW CONSTRUCTION OF
VENT SHAFT BLOWING FAN*

RESPONSE TO DEFICIENCIES
TASK #2679

THIS SUBMITTAL ALSO ADDRESSES CITATION #11000

SUBMITTED: DECEMBER 21, 2006

List of Appendices

FILE IN Expandable 12 21 2006

Refer to Record No. 0085
in 00070019, 2006, Incoming
for additional information

Appendix

Title

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Gilson Seam - underlying this seam is interbedded sandstone, siltstone, shale, and coal riders of the Kenilworth Member.

Centennial Seam - underlying this seam is interbedded sandstone, siltstone, and shale, and coal riders of the Kenilworth Member.

Lower Sunnyside Seam - underlying this seam is barrier beach sandstone, the Lower Sunnyside Sandstone of the Sunnyside Member.

It should be noted however, that the immediate "floor" below the seams is sandstone in the case of the Lower Sunnyside and Aberdeen; and beneath the Gilson, and Centennial, siltstone.

Pyritic Content (Laboratory Analyses)

Complete analyses of these strata are included in Appendix E.

Potential Alkalinity (Laboratory Analyses)

Complete analyses of these strata are included in Appendix E.

Clay Content (Laboratory Analyses)

Complete analyses of these strata are included in Appendix E.

R645-301-512.200. PLANS AND ENGINEERING DESIGNS

Existing Structures

All existing structures are situated on the Zion's fee land, on federal lease SL-027304, or on right-of-way UTU-62045 and are shown on Plate 6. There are no structures existing as part as Andalex's facility which were constructed prior to 1980. Originally it was anticipated that all buildings and structures were to be completed during the first five year permit term. Obviously this is not the case since the Aberdeen Mine has only recently been completely finished to this date. Plate 6 depicts the Aberdeen Mine with the surface facilities completed in early 1990. A new fan for the Aberdeen Mine will be constructed in the left fork of Deadman Canyon. Underground rock tunnels access the Centennial Seam. See 1.1, 2.1-1, 2.1-4.

Existing structures include the following:

Bathhouse (5)	14' x 60'
Mine Water Storage Tanks (3)	12' x 16'
Warehouse (1)	14' x 60'
Lamphouse (2)	40' x 40'
Substations (2)	60' x 100'
Office Building	28' x 60'
Mine Fans (4)	88"
Portals (15)	6' x 20'
Culinary Water Tanks (3)	12' x 10'
Shop	80' x 120'

All existing structures are situated on the Zion's fee land, on federal lease SL-027304, or on right-of-way UTU-62045 and are shown on Plate 6. There are no structures existing as part as Andalex's facility which were constructed prior to 1980. Plate 6 depicts the Aberdeen Mine with the surface facilities completed in early 1990. No new structures on the surface will be required to mine the Centennial and Aberdeen Seams on any lease including the new AEP Lease. Underground rock tunnels access the Centennial Seam. See 1.1, 2.1-1, 2.1-4. Existing structures include the following:

Bathhouse (5)	14' x 60'
Mine Water Storage Tanks (3)	12' x 16'
Warehouse (1)	14' x 60'
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Substations (2)	60' x 100'
Office Building	28' x 60'
Mine Fans (4)	88"
Portals (15)	6' x 20'
Culinary Water Tanks (3)	12' x 10'
Shop	80' x 120'

It should be noted that a new blowing ventilation fan and a new substation is proposed as shown on Plate 6. The fan will be a forced air fan and shaft to the Aberdeen Seam below. The fan will be located very close to the existing edge of the disturbance as shown on Plate 6. See Appendix Y for a complete description of the Ventilation Shaft/Blowing Fan Installation. The substation will be located near the Aberdeen Mine portals. See Plate 6.

Upon completion of mining activities, the portals will be sealed according to existing state and federal regulations and all buildings and structures not being utilized as part of the reclamation sequence, will be removed.

R645-301-526.111. LOCATION

See R645-301-110.

R645-301-526.112. PLANS OR PHOTOGRAPHS

See R645-301-110.

R645-301-526.113. DATES OF CONSTRUCTION OF EXISTING STRUCTURES

See R645-301-110.

R645-301-526.114. MONITORING DATA

N/A

It is very unlikely that a mine discharge will occur from any of the permanently sealed mine portals, although each seal will be equipped with a drainage pipe described above. To date, Andalex has encountered dry mining conditions and all portals in all three mines drift into the mountain in a down dip direction. If a discharge were to occur, it would only be after the entire pillared out workings had filled first. Then only would the static head against the seal allow any discharge. There is no way of knowing or estimating the mine discharge rate.

As maintained above, Andalex will monitor any discharge. Andalex's existing NPDES allows for a certain volume of mine discharge. This permit will be maintained after cessation of mining for the liability period until the bond is released.

The blowing fan ventilation shaft will be sealed by completely backfilling it from bottom to top. This shaft is 370' deep by 16' diameter, and will require approximately 2,755 cubic yards of backfill material. This backfill material will be hauled in from an offsite commercial gravel pit. See Appendix Y for reclamation information regarding the Ventilation Shaft/Blowing Fan Installation.

Temporary Cessation

Whenever it is known that operations are to be temporarily ceased for more than 30 days, Andalex Resources will submit to the Division a notice of intention to cease or abandon the operations, in accordance with MSHA standards.

This notice will describe mitigation measures to be employed in accordance with the terms and conditions of the permit approval, such as a statement of the number of surface areas involved in the cessation, extent of sub-surface strata, prior reclamation efforts accomplished on the property, and identification of all backfilling, regrading, revegation, environmental monitoring, underground opening closures and water treatment activities that will continue during the temporary cessation.

Temporary closing of underground workings will be accomplished with chain link fence material as recommended by MSHA. This prevents access by unauthorized individuals during idling periods. It is not anticipated that once Andalex reaches its peak production that this will occur.

If underground openings are to remain inactive for a period greater than 90 days, such openings will be temporarily closed off from access. Such closures will consist of a chain link or other substantial wire mesh fabric fence placed over the portals to prevent public access while allowing for air flow. Locked gates may be installed in the portal to allow for mine inspection.

Casing and Sealing of Drill Holes

All exploratory drill holes have been sealed with cement and all water wells have been cased with steel casing and will be

maintained. After mining is completed, the water wells and monitoring wells will be sealed except in the event the state engineer allows them to remain opened for other purposes.

R645-301-529.200. UNDERGROUND MINING OPERATIONS

R645-301-529.210. TEMPORARILY INACTIVE OPERATIONS

See R645-301-515.300.

R645-301-529.220. RETURN UNDERGROUND DEVELOPMENT WASTE, COAL PROCESSING WASTE OR WATER TO UNDERGROUND WORKINGS

See R645-301-515.300.

R645-301-529.300. HOLES USED FOR BLASTING

N/A

R645-301-529.400. SURFACE MINING OPERATIONS

N/A

R645-301-530. OPERATIONAL DESIGN CRITERIA AND PLANS

Operation Plan: Existing Structures

Construction and Design of Surface Facilities

Existing Structures

All existing structures are situated on the Zion's fee land, on federal lease SL-027304, or on right-of-way UTU-62045 and are shown on Plate 6. There are no structures existing as part as Andalex's facility which were constructed prior to 1980. Plate 6 depicts the Aberdeen Mine with the surface facilities completed in early 1990. No new structures on the surface will be required to mine the Centennial and Aberdeen Seams on any lease including the new AEP Lease. Underground rock tunnels access the Centennial Seam. See 1.1, 2.1-1, 2.1-4. Existing structures include the following:

Bathhouse (5)	14' x 60'
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A new blowing ventilation fan and a new substation is proposed as shown on Plate 6. The fan will be a forced air fan and shaft to the Aberdeen Seam below. The fan will be located very close to the existing edge of the disturbance as shown on Plate 6. Refer to Appendix Y for additional information regarding this installation. The new substation will be located near the Aberdeen Mine portals. See Plate 6.

Upon completion of mining activities, the portals will be sealed according to existing state and federal regulations and all buildings and structures not being utilized as part of the reclamation sequence, will be removed, according to the Reclamation Plan.

Construction Schedule

All of the above structures have been completed, **except the proposed new ventilation fan for the Aberdeen Mine.** The earthwork for the Aberdeen Mine was completed in 1989. The surface facilities were in early 1990. Construction has been located and carried out so as to prevent and control erosion, siltation, water pollution, and damage to property. All facilities have been designed and constructed and will be maintained and used in a manner which prevents damage to wildlife and related environmental values. Any future construction will be conducted in a similar manner according to regulations regarding protection of the hydrologic system, etc. The rock tunnels for the Centennial Seam development were constructed in the spring of 1990 and completed late in 1990. As previously discussed this mining will require no new surface facilities.

Construction Methods

Major Equipment

The portal and building sites were leveled using dozers, trucks, and loaders. At the building sites, the topsoil was removed and transported to a nearby area for storage.

All surface pads have been graveled and all other disturbed areas (pond embankments, etc.) have been reseeded.

R645-301-531.

GENERAL

Schedule of Construction, Mine Development, Mining and Reclamation

All surface facilities have been constructed for the Pinnacle, Apex and Aberdeen Mines. Earthwork for the Aberdeen Mine was completed in 1989. The surface facilities for the Aberdeen Mine were completed in early 1990. No additional surface facilities are required for any new leases, **however, as mentioned above, there is a proposed new ventilation fan for the Aberdeen Mine.** There will be no additional construction activities or surface disturbance whatsoever in Hoffman Creek or Alrad Canyon.

However, Andalex does intend to add a fan installation in the left-hand fork of Deadman Canyon at some point in time. This

installation will be according to measures outlined by the Bureau of Land Management as part of Right-of-Way U-64158. (Copy of Right-of-Way is included in Appendix B.) Andalex will submit detailed plans for this installation at the appropriate time. The location of this breakout is shown on Plate 29 (R.O.W.).

Mining in the Gilson seam began in October, 1980 with a single unit's production. As mining progresses, additional units will be added with three production units and the longwall scheduled to be operating by mid-1994. A systematic mining plan will be followed to assure maximum recovery. All planning and scheduled production, however, will be contingent upon the coal market. Upon the conclusion of mining activities in the area, the scheduled reclamation phase will begin immediately.

Andalex will fill, regrade and stabilize rills and gullies over 9 inches in depth. Further, Andalex has agreed to interim stabilization of all slopes and embankments within the disturbed area and has done so. One slope located at the bottom of the office driveway, has been attempted through hydroseeding, fertilizing and mulching techniques on three separate occasions. No significant erosion problems have occurred, Andalex will notify the Division in the event of any slides or other damage immediately by telephone and in writing.

Andalex will cover acid or toxic forming materials if any are encountered.

Andalex will advise the Division in the event of a temporary shutdown, such as a letter sent to the Division when Andalex's Apex Mine was temporarily closed.

R645-301-532. SEDIMENT CONTROL

See R645-301-512.240.

R645-301-532.100. MINIMIZING DISTURBANCES

Surface disturbances are minimal due to the nature of the mining activities. The permit area has been previously impacted by mining. Surface disturbances will be limited to the existing facilities which have been constructed. The total existing surface area disturbed is 34.2 acres. Existing facilities are indicated on Plate 6 and 7.

The land affected by mining operations which shall be reclaimed, in compliance with the Mining and Reclamation Plan and all requirements of the Mined Land Reclamation Act and Rules and Regulations adopted in accordance therewith, can be described as follows:

34.2 acres located in T13S, R11E, S.L.B.&M., Carbon County, Utah and contained within,
SE 1/4 SW 1/4 Section 7
NE 1/4 SW 1/4 Section 7
SW 1/4 SE 1/4 Section 7
NW 1/4 SE 1/4 Section 7
SW 1/4 NE 1/4 Section 7

NE 1/4 NW 1/4 Section 18
NW 1/4 NE 1/4 Section 18

development waste. We estimate this may be as much as 3000 yards of material. Please refer to Plate 15 addendum for a detailed drawing on the high wall areas. The Aberdeen Mine high wall has been redrawn and back fills recalculated. Where slopes are greater than 2 to 1, before final reclamation is completed, slope stability studies will be performed as necessary. All information for slope stability studies will be included as part of the final reclamation package.

Where possible, all final grading and placement of topsoil will be done along the contour to minimize erosion. In all cases, grading will be conducted in a manner which minimizes erosion and provides a stable surface for the placement of topsoils.

Topsoil existing on site will be spread using a grader. Where possible, the soil will be distributed along the contour. The thickness of the re-established soil will be consistent with soils in the vicinity and will be sufficient to support vegetation equal to or superior to pre-mining history, 6".

Andalex will rip the subsurface material to 6" using most likely a toothed motor grader or a disc, prior to soil redistribution.

Andalex will mix one ton of alfalfa per acre with its topsoil material to aid in aeration, microbiological community development, and water holding capacity.

Andalex will distribute topsoil to a minimum depth of 6" as previously stated.

Andalex has already committed to testing of redistributed soil and fill material and has committed to use proper additives if it is discovered necessary. Specifically, Andalex will test for organic matter, phosphorous, potassium, pH, conductivity, and texture. The samples will be taken at 0-6 inches, 6-12 inches, and 12-24 inches at least 90 days prior to final reclamation.

**R645-301-542.700. FINAL ABANDONMENT OF MINE OPENINGS
AND DISPOSAL AREAS**

Plates 6, 16, 17, & Appendix Y.

R645-301-542.710. DESCRIPTION

See R645-301-515.300.

R645-301-542.720. DISPOSAL OF EXCESS SPOIL

See R645-301-513.300.

R645-301-731.

GENERAL REQUIREMENTS

See R645-301-511.100.

R645-301-731.100.

HYDROLOGIC BALANCE PROTECTION

See R645-301-711-300.

R645-301-731.110.

GROUND WATER PROTECTION

Appendix L, See Appendix Y

R645-301-731.111.

GROUND WATER QUALITY

Appendix L

R645-301-731.112.

SURFACE MINING OPERATIONS

N/A

R645-301-731.120.

SURFACE WATER PROTECTIONS

Appendix L

R645-301-731.121.

SURFACE WATER QUALITY

Appendix L

R645-301-731.122.

SURFACE WATER QUANTITY PLAN

Appendix L

R645-301-731.200.

WATER MONITORING

See R645-301-711.300.

R645-301-731.210.

GROUND WATER MONITORING

See R645-301-711.300.

R645-301-731.211.

GROUND WATER MONITORING PLAN

See R645-301-711.300.

Appendix Y

Ventilation Shaft/Blowing Fan Installation

Substation Installation

Ventilation Shaft/Blowing Fan Installation

In order to provide additional ventilation to the Aberdeen Mine, a new ventilation shaft and a blowing fan will be installed north of the existing shop within the previously disturbed area. This new fan will require a vertical ventilation shaft constructed from the surface down to the Aberdeen mine workings. This will be accomplished using a raise-bore machine at the surface pulling a boring head up through a pre-drilled pilot hole. A site has been selected for the fan which will be located next to the shop building near the cut-slope within the existing disturbed area of the Tower minesite. An exploratory test hole has been dug in the yard to verify the foundation structure for the fan. (The concrete collar for the fan, as it sits over the shaft, must be on solid bedrock in order to support the raise-bore operation). A suitable shelf of bedrock is located about 15' below the existing pad surface which looks promising for anchoring the shaft collar.

The following fast-track schedule is proposed:

Complete the site preparation by excavating the remainder of the bedrock shelf area in preparation for the construction crews within the next 10 days..... 10 days to drill the pilot hole..... one week to construct the concrete collar (20' diameter, 16' high, 18" thick walls)..... one week for the concrete to cure..... one week to backfill the excavated area around the collar. At this point the raise bore machine can mobilize onto the completed collar and begin raise-boring the shaft. (The cutting head for the raise bore will already be positioned in the underground mine workings in preparation)..... 30 days to ream out the shaft (16' diameter, 370' total depth). All muck material from the excavation will fall back into the mine as is being cut and will be disposed of in the underground workings..... two weeks to install the vent fan and put it into operation. By starting earthwork construction by this week, we could have the additional ventilation capabilities by Christmas.

This construction will be entirely within the existing disturbed area, in other words there will be no new surface disturbance. There will be no change to the hydrologic design. The existing power line that once served the Apex mine, will be utilized so no new power distribution facilities will be required. All the excavated material will be replaced after the collar is constructed by backfilling around the collar. During construction care will be taken to not place any material in any designated drainage ditches.

It is not anticipated that any ground water will be encountered during the construction of the ventilation shaft, either in the pilot drill hole or the shaft raise-bore. The shaft is relatively shallow (less than 300') and will intercept the existing Aberdeen Mine workings which, in this location are dry and above the water table. Also the raise-bore operation proceeds from the mine works up to the surface. Therefore all drill cuttings and any potential water encountered will fall into the mine workings rather than reporting to the surface. If however any unexpected water is encountered during the pilot hole drilling it will be contained within the existing concrete collar (16' diameter, 16' high), or will be pumped into one of the existing disturbed area drainage ditches which report to the sedimentation pond.

During final reclamation the shaft will be backfilled with an imported material hauled in from a commercial gravel pit located off site. The imported material will be analyzed for acid/toxic parameters (particle size analysis, pH, EC, SAR, Se, B, acid/base accounting) prior to placement as backfill in the borehole, as per R645-301-542.700 and according to the Division's Topsoil and Overburden guidelines. After the shaft has been backfilled the area will be reclaimed according to the approved plan in accordance with R645-301-244, -301-353, -301-354, -301-355, -301-356, -302-280, -302-281, -302-282, -302-283, -302-284. Due to the relatively shallow depth of the shaft (less than 300') and its small diameter (16') it is not expected that any settlement of the backfill material will occur after final reclamation. However after reclamation the site will be monitored for signs of settlement. At least two survey points will be established directly above the reclaimed shaft and will be surveyed annually throughout the period of bond release. If any settlement does occur, any surface disturbance or irregularities resulting from such settlement will be regraded and recontoured with approved imported material in accordance with the approved plan.

Estimated bonding requirements for reclamation is as follows:

A.	Backfill the shaft	2,755 cu.yds.
B.	Concrete Demolition	
	Collar	105 yds.
	Collar Pad	19 yds.
	Fan Base	100 yds.
	Motor Base	8 yds.
	Transformer Pad	10 yds.

- C. Fan Steel Demolition 5 tons
- D. Substation Demolition 2 tons

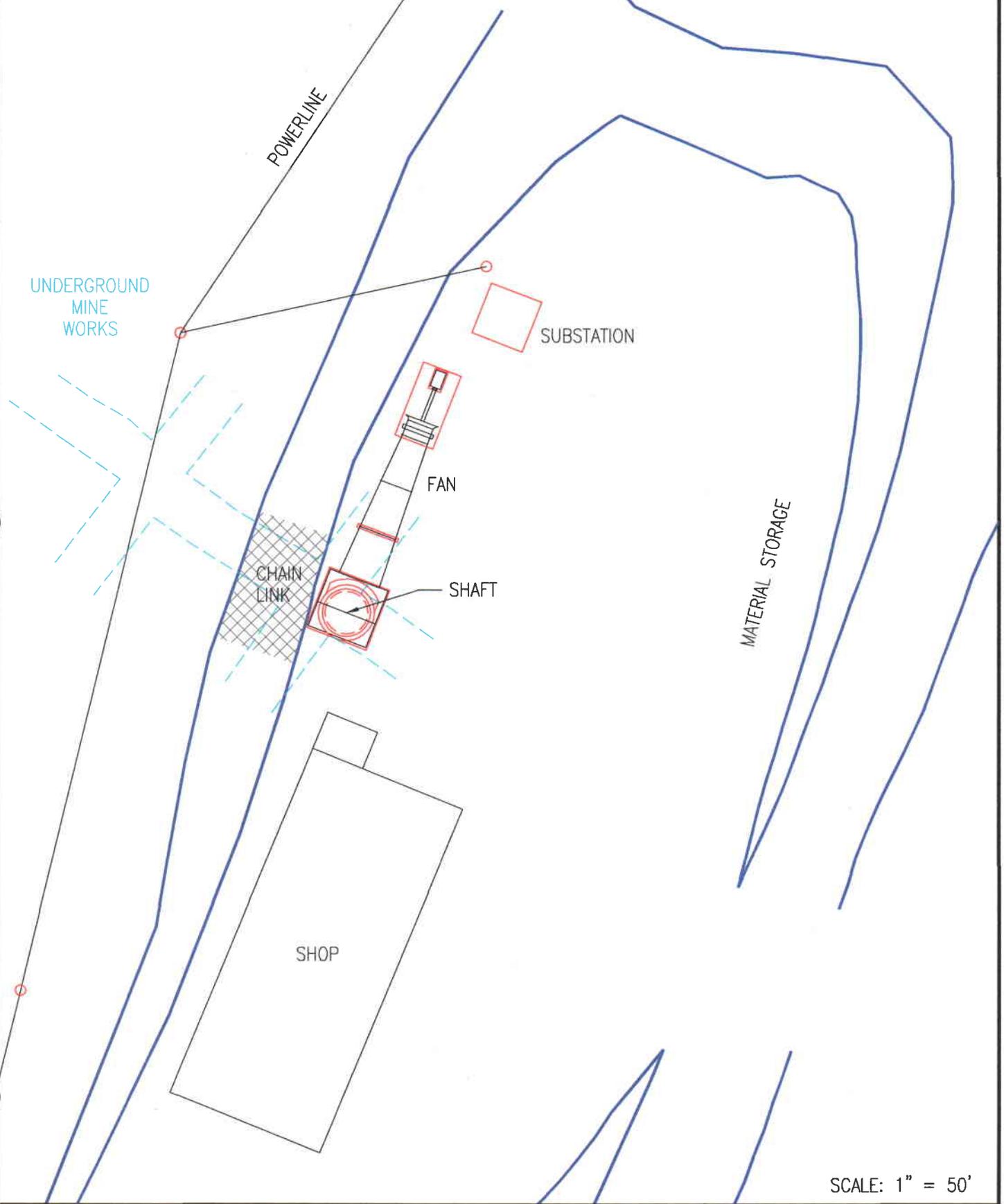
After consultation with the Division it has been determined that the bonding requirements for the ventilation shaft/blowing fan will be \$48,537. After adjusting for indirect costs and inflation escalation a reclamation bond in the amount of \$65,000 has been posted for this installation.

Substation

In order to meet the increasing power needs in the Aberdeen Mine, a new substation will be constructed. This substation will be located adjacent to the existing Aberdeen Mine intake portals. The substation will contain a 46 KV/12.5 KV transformer and switch gear. These components will be mounted on a concrete pad. All components will be enclosed within an 8' high chain link fence. Secondary power from the substation will be routed to the mine through buried electrical conduits. The primary feed to the substation will tap off of the existing 46 KV powerline which runs through the mineyard. All construction associated with the substation installation will be within the previously disturbed area. The total footprint of the substation will not exceed 60' x 100'. The installation will be very similar to the existing substation (although somewhat smaller) which will continue in operation. For bonding purposes the reclamation cost for the new substation should be similar to the existing substation.

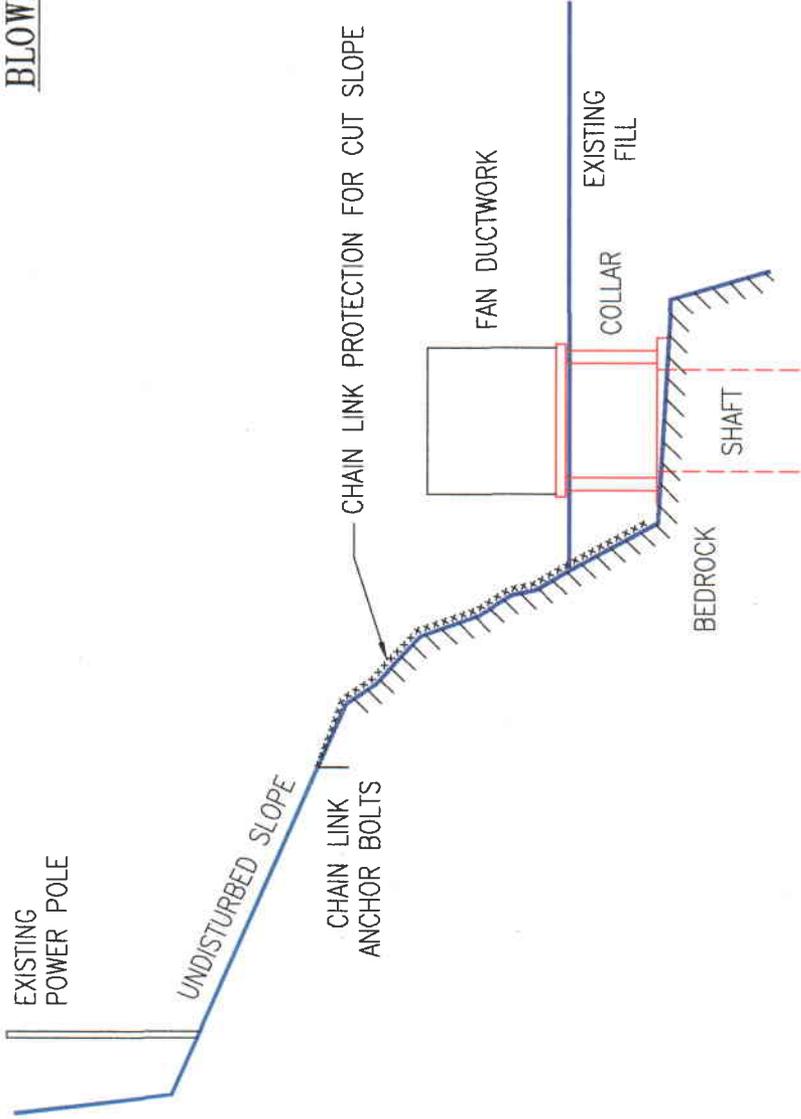
After consultation with the Division it has been determined that the bonding requirements for the substation will be \$2,273. After adjusting for indirect costs and inflation escalation a reclamation bond in the amount of \$3,000 has been posted for this installation.

**BLOWING FAN INSTALLATION
PLAN VIEW**

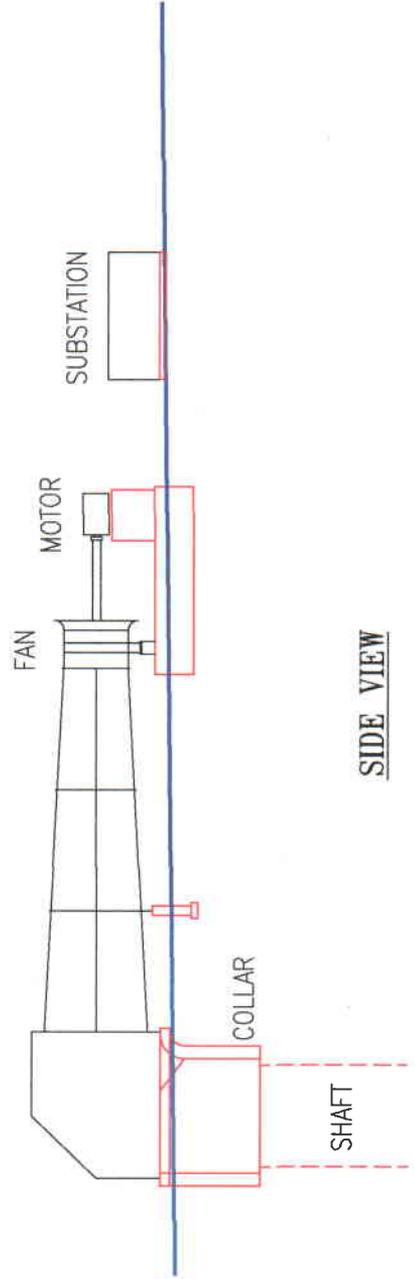


SCALE: 1" = 50'

BLOWING FAN INSTALLATION



END VIEW (PROFILE)



BONDING CALCULATIONS

Bonding Calculations
Centennial Mine C/007/019

Bond Summary

Direct Costs

Subtotal Demolition and Removal	\$305,778.00
Subtotal Backfilling and Grading	\$387,909.00
Subtotal Revegetation	\$181,474.00
Direct Costs	\$875,161.00

Indirect Costs

Mob/Demob	\$87,516.00	10.0%
Contingency	\$43,758.00	5.0%
Engineering Redesign	\$21,879.00	2.5%
Main Office Expense	\$59,511.00	6.8%
Project Maignement Fee	\$21,879.00	2.5%
Subtotal Indirect Costs	\$234,543.00	26.8%

Total Cost \$1,109,704.00

Escalation factor 0.012
 Number of years 4
 Escalation \$54,232.00

Reclamation Cost \$1,163,936.00

Bond Amount (rounded to nearest \$1,000)
 2009 Dollars \$1,164,000.00

Bond Posted \$1,211,839.00

Difference Between Cost Estimate and Bond -\$47,839.00
 Percent Difference 4.11%

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Aberdeen Mine																				
		Loadout Bin No 01																				1600
		Concrete No 02																				325
		Reclaim No 03																				2880
		Conveyor No 04																				800
		Hopper No 05																				1200
		Conveyor No 06																				1300
		Tunnel No 07																				1728
		Fan No 08																				640
		Substation No 09																				1914
		Water Tank No 10																				188
		Portals No 11																				2560
		Subtotal																				15135
		Main Office																				
		Main Office No 12																				10889
		Subtotal																				10889
		Bath House																				
		Bath House No 13																				5150
		Subtotal																				5150
		Upper Pinnacle																				
		Substation No 14																				3373
		Loadout Bin No 15																				2245
		Conveyor No 16																				640
		Reclaim No 17																				481
		Hopper No 18																				1152
		Conveyor No 19																				740
		Tunnel No 20																				1728
		Water Tank No 21																				282
		Rock Dust Tank No 22																				314
		Trailers No 23																				3036
		Portals No 24																				14560
		Subtotal																				28531
		Lower Pinnacle																				
		Office No 25																				1999
		Portals No 26																				7680
		Subtotal																				9679
		Shop/Warehouse																				
		Shop/Warehouse No 27																				39105
		Subtotal																				39105
		Apex																				
		Loadout No 28																				1657
		Conveyor No 29																				1120
		Reclaim No 30																				3264
		Hopper No 31																				1843
		Conveyor No 32																				1000
		Tunnel No 33																				2400
		Portals No 34																				13920
		Water Tank No 35																				188
		Shed No 36																				800
		Magazines No 37																				38
		Substation No 38																				1917
		Office No 39																				1755
		Subtotal																				29902
		Culverts																				
		Culverts No 41																				18100
		Subtotal																				18100
		Gob Vent Well																				
		Gob Vent Well 1, 3, 4, 5, 5A, 6, 7, 8, 9																				73980
		Gob Vent Well 5B, 8A, 7A																				24660
		Subtotal																				98640
2679		Vent Shaft Blowing Fan																				48537
2679		Aberdeen Substation																				2110
		Subtotal																				50847
		Total																				305778

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Loadout Bin No 01																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF		20	20	20								FT		8000	CF	1600
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1600
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1600

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Concrete No 02																			
		Structure's Demolition Cost																			
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			
		Equipment 's Disposal Cost																			
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97 /CY		20	26	0.75								FT		16	CY	84
		Concrete's Vol. Demolished																1.3	21	CY	29
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39 /CY														21	CY	29
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. rd. tri	02315 490 0320	3.44 /CY														21	CY	72
		Disposal Costs	On site disposal	02220 240 5550	7.6 /CY														21	CY	160
		Subtotal																			325
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			325

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Reclaim No 03																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	8	12	150										14400	CF	2880
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			2880
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			2880

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Conveyor No 04																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF		4	4	250								FT		4000	CF	800
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			800
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			800

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Hopper No 05																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF		20	20	15								FT		6000	CF	1200
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1200
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1200

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Conveyor No 06																				
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF		5	5	200							FT		8500	CF	1300	
		Structure's Vol. Demolished																				
		Rubble's Weight (exclde steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				1300
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				1300

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Tunnel No 07																			
		Structure's Demolition Cost	Steel Bid. Large	02220 110 0012	0.2	/CF	8	12	90								FT		8640	CF	1728
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1728
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1728

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Fan No 08																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	8	20	20								FT		3200	CF	640
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			640
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			640

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Substation No 09																			
		Structure's Demolition Cost																			
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			
		Equipment 's Disposal Cost	Mechanical equipment heavy	15055 300 3600	805 /ton												2 EA		2 EA		1610
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			1610
		Equipment 's Disposal Cost	Chain link removes 8'-10'	02220 220 1700	2.92 /LF		104										FT		104 FT		304
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			304
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1914

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Water Tank No 10																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF						941					CF		941	CF	188
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			188
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			188

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Portals No 11																			
		Structure's Demolition Cost	Steel Bid, Large	02220 110 0012	0.2	/CF	20	20	8							4	CF		12800	CF	2560
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			2560
		Portals are already sealed																			
		Equipment's Disposal Cost	Seal Portals	AML1	5200	EA										0	EA		0	EA	0
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			0
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			2560

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Main Office No 12																				
		Office's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21 /CF		32	80	16								FT		30720	CF	8451	
		Trailer's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21 /CF		8	12	70								FT		8720	CF	1411	
		Water Tank's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF							706					CF		706	CF	141	
		Structure's Vol. Demolished nonsteel																0.35	485	CY		
		Structure's Vol. Demolished steel																0.1	3	CY		
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel	City Services	City Service Price	4 /CY															485	CY	1940
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																			9943	
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97 /CY							47.15								47	CY	187
		Concrete's Vol. Demolished																	1.3	81	CY	
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39 /CY															81	CY	85
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. rd. tri	02315 490 0320	3.44 /CY															81	CY	210
		Disposal Costs	On site disposal	02220 240 5550	7.8 /CY															81	CY	484
		Subtotal																			946	
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																			10889	

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Bath House No 13																				
		Bath House 1's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	14	65	8								FT		7280	CF	1529	
		Bath House 2's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	12	50	8								FT		4800	CF	1008	
		Trailer's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	12	42	8								FT		4032	CF	847	
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF							941				2	CF	1882	CF	376	
		Structure's Vol. Demolished non steel																				
		Structure's Vol. Demolished steel																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel	City Services	City Service Price		4	/CY											0.35	177	CY	708	
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																			4488	
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97	/CY	14	65	0.5								FT		17	CY	67	
		Concrete's Vol. Demolished																1.3	22	CY	22	
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39	/CY														22	CY	31
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. md. tri	02315 490 0320	3.44	/CY														22	CY	76
		Disposal Costs	On site disposal	02220 240 5550	7.6	/CY														22	CY	167
		Subtotal																			341	
		Concrete Demolition																				
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97	/CY	14	65	0.5								FT		17	CY	67	
		Concrete's Vol. Demolished																1.3	22	CY	22	
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39	/CY														22	CY	31
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. md. tri	02315 490 0320	3.44	/CY														22	CY	76
		Disposal Costs	On site disposal	02220 240 5550	7.6	/CY														22	CY	167
		Subtotal																			341	
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																			5150	

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Substation No 14																			
		Structure's Demolition Cost																			
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			
		Transformers																			
		Equipment's Disposal Cost	Mechanical equipment heavy	15055 300 3600	805 /ton											3 EA			3 EA		2415
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			2415
		Chain Link Fence																			
		Equipment's Disposal Cost	Chain link removes 8'-10"	02220 220 1700	2.92 /LF		328										FT		328 FT		958
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			958
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			3373

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Loadout Bin No 15																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	20	20	24								FT		9600	CF	1920
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1920
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97	/CY	20	24	0.75								FT		16	CY	64
		Concrete's Vol. Demolished																1.3	21	CY	29
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39	/CY													21	CY	72
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. rd. tri	02315 490 0320	3.44	/CY													21	CY	160
		Disposal Costs	On site disposal	02220 240 5550	7.6	/CY													21	CY	325
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			2245

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Conveyor No 16																			
		Structure's Demolition Cost	Steel Bid. Large	02220 110 0012	0.2 /CF		4	4	200								FT		3200	CF	640
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			640
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			640

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Reclaim No 17																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	8	12	24								FT		2304	CF	481
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			481
		Equipment 's Disposal Cost																			
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			481

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Hopper No 18																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	10	24	24								FT		5760	CF	1152
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1152
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1152

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Conveyor No 19																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	4	5	185								FT		3700	CF	740
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			740
		Equipment 's Disposal Cost																			
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			740

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Tunnel No 20																				
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	8	12	90											8640	CF	1728
		Structure's Vol. Demolished																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				1728
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				1728

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Water Tank No 21																			
		Structure's Demolition Cost	Steel Bid, Large	02220 110 0012	0.2	/CF						1412					CF		1412	CF	282
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			282
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			282
		Total																			282

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Rock Dust Tank No 22																				
		Structure's Demolition Cost	Steel Bid, Large	02220 110 0012	0.2	/CF						1570					CF		1570	CF	314	
		Structure's Vol. Demolished																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				314
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				314

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Trailers No 23																				
		Structure's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	10	55	8								FT		4400	CF	924	
		Structure's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	10	50	8								FT		4000	CF	840	
		Structure's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	10	40	8								FT		3200	CF	672	
		Structure's Vol. Demolished																0.35	150	CY		
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel	City Services	City Service Price		4	/CY													150	CY	600
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				3036
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				3036

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Portals No 24																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	20	20	8							4	FT		12800	CF	2560
		Structure's Vol. Demolished																			
		Rubble's Weight (exclde steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			2560
		Equipment 's Disposal Cost	Seal Portals (Cost /sqft)	AML 4	25	/SqFt	20	6								4	FT		480	Sq. Ft	12000
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			12000
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			14560

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Office No 25																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	24	42	8								FT		8064	CF	1613
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1613
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97	/CY	24	42	0.5								FT		19	CY	75
		Concrete's Vol. Demolished																1.3	25	CY	
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39	/CY													25	CY	35
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. md. tr	02315 490 0320	3.44	/CY													25	CY	86
		Disposal Costs	On site disposal	02220 240 5550	7.6	/CY													25	CY	190
		Subtotal																			386
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1999

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Portals No 26																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	20	20	7							3	FT		8400	CF	1680
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1680
		Equipment 's Disposal Cost	Seal Portals (Cost /sqft)	AML 4	25	/Sq Ft	20	4								3	EA		240	Sq. Ft.	6000
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			6000
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			7680

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Shop Warehouse No 27																				
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF		150	60	18								FT		162000	CF	32400	
		Structure's Vol. Demolished																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				32400
		Equipment 's Disposal Cost																				
		Dismantling Cost																				
		Equipment 's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97 /CY		150	60	1													
		Concrete's Vol. Demolished																	1.3	333	CY	1322
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39 /CY																433	CY
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 ml. md. tfr	02315 480 0320	3.44 /CY																433	CY
		Disposal Costs	On site disposal	02220 240 5550	7.6 /CY																433	CY
		Subtotal																				6705
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				39105

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Loadout No 28																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF		20	20	18								FT		7200	CF	1440
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1440
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97 /CY		20	20	0.75								FT				
		Concrete's Vol. Demolished																	1.3		11 CY
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39 /CY																14 CY
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. rd. tri	02315 490 0320	3.44 /CY																14 CY
		Disposal Costs	On site disposal	02220 240 5550	7.8 /CY																14 CY
		Subtotal																			106
		Subtotal																			217
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1657

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Conveyor No 29																			
		Structure's Demolition Cost	Steel Bid, Large	02220 110 0012	0.2	/CF	4	4	350								FT		5600	CF	1120
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1120
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1120

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Reclaim No 30																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF		8	12	170							FT		16320	CF	3264
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			3264
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			3264

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Hopper No 31																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	CF	24	24	18								FT		9218	CF	1843
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1843
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1843

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Conveyor No 32																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	5	4	250								FT		5000	CF	1000
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			1000
		Subtotal																			
		Equipment 's Disposal Cost																			
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1000

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Tunnel No 33																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	8	12	125								FT		12000	CF	2400
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			2400
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			2400

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Portals No 34																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF	20	20	8							4	FT		9600	CF	1920
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1920
		Equipment's Disposal Cost	Seal Portals (Cost /sqft)	AML 4	25	/SqFt	20	8								4	EA		480	Sq. Ft.	12000
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			12000
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			13920

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Water Tank No 35																			
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2	/CF						941					CF		941	CF	188
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			188
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			188

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Shed No 36																				
		Structure's Demolition Cost	Steel Bld. Large	02220 110 0012	0.2 /CF		10	50	8								CF		4000	CF	800	
		Structure's Vol. Demolished																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				800
		Subtotal																				
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				800

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Magazines No 37																				
		Structure's Demolition Cost	Steel Bld, Large	02220 110 0012	0.2	/CF	4	4	6								2 FT		192 CF		38	
		Structure's Vol. Demolished																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				38
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				38

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
		Substation No 38																				
		Structure's Demolition Cost	Mechanical equipment heavy	15055 300 3600	805	/ton											2	EA		2	EA	1610
		Structure's Vol. Demolished																				
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				1610
		Fence																				
		Equipment 's Disposal Cost	Chain link remove 6'-10'	02220 220 1700	2.92	/LF	105										FT		105	FT	307	
		Dismantling Cost																				
		Equipment 's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				307
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				1917

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Office No 39																			
		Structure's Demolition Cost	Mixed Materials Bld. Large	02220 110 0100	0.21	/CF	25	40	8								FT		8000	CF	1680
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel	City Services	City Service Price	4	/CY															
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			1680
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost	Concrete demolition	ConcreteDemo1	3.97	/CY	25	40	0.5								FT		19	CY	75
		Concrete's Vol. Demolished																			
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.39	/CY															
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 ml. md. tri	02315 490 0320	3.44	/CY															
		Disposal Costs	On site disposal	02220 240 5550	7.6	/CY															
		Subtotal																			75
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			1765

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Portals No 40																			
		Structure's Demolition Cost	Steel Bid, Large	02220 110 0012	0.2 /CF		20	25	8								FT		4000	CF	800
		Structure's Demolition Cost	Steel Bid, Large	02220 110 0012	0.2 /CF		20	20	8								2 FT		8400	CF	1280
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			2080
		Equipment 's Disposal Cost	Seal Portals (Cost /sqft)	AML 4	25 /SqFt		20	8									2 EA		240	Sq. Ft.	6000
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			6000
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			8080

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Culverts No 41																			
		12 inch culvert remove	Excavation Bulk Bank 2 CY (322BL)	02315 424 0260	1.7	/CY	290	4	2										77	CY	131
		12 inch culvert backfill	Backfill Trench Mininal Haut 2 1/4 CY	02315 810 3080	1.53	/CY													77	CY	118
		18 inch culvert remove	Excavation Bulk Bank 2 CY (322BL)	02315 424 0260	1.7	/CY	1340	4	3										596	CY	1013
		18 inch culvert backfill	Backfill Trench Mininal Haut 2 1/4 CY	02315 810 3080	1.53	/CY													596	CY	912
		24 inch culvert remove	Excavation Bulk Bank 2 CY (322BL)	02315 424 0260	1.7	/CY	330	4	4										196	CY	333
		24 inch culvert backfill	Backfill Trench Mininal Haut 2 1/4 CY	02315 810 3080	1.53	/CY													196	CY	300
		36 inch culvert remove	Excavation Bulk Bank 2 CY (322BL)	02315 424 0260	1.7	/CY	1885	4	6										1676	CY	2849
		36 inch culvert backfill	Backfill Trench Mininal Haut 2 1/4 CY	02315 810 3080	1.53	/CY													1676	CY	2564
		42 inch culvert remove	Excavation Bulk Bank 2 CY (322BL)	02315 424 0260	1.7	/CY	2950	4	7										3059	CY	5200
		42 inch culvert backfill	Backfill Trench Mininal Haut 2 1/4 CY	02315 810 3080	1.53	/CY													3059	CY	4680
		Subtotal																			18100
		Subtotal																			
		Subtotal																			
		Subtotal																			
		Subtotal																			
		Total																			18100

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Job Vent Well 1, 3, 4, 5, 5A, 6, 7, 8, 9																			
		Structure's Demolition Cost	Mechanical equipment heavy	15055 300 3600	805	/ton							36				tons		36	tons	28980
		Plug Well	Plug Well	AML3	5000	EA.											9 EA		9	EA	45000
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			73980
		Equipment 's Disposal Cost																			
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			73980

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
2359		Gob Vent Well 5B, 8A, 7A																				
		7A is a redrill																				
		Structure's Demolition Cost	Mechanical equipment heavy	15055 300 3600	805 /ton									12			tons		12	tons	9660	
		Plug Well	Plug Well	AML3	5000 EA.												3 EA		3	EA	15000	
		Rubble's Weight (exclude steel)																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Non Steel Truck																				
		Transportation Cost Non Steel Drive																				
		Disposal Cost Non Steel																				
		Steel's Weight																				
		Truck's Capacity																				
		Haulage																				
		Transportation Cost Steel Truck																				
		Transportation Cost Steel Truck Drive																				
		Disposal Cost Steel																				
		Subtotal																				24660
		Equipment's Disposal Cost																				
		Dismantling Cost																				
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																				24660

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost	
	2879	Vent Shaft Blowing Fan																				
		Structure's Demolition Cost																				
		Structure's Vol. Demolished							370	16							FT		2755	CY		
		Truck's Capacity										16					CY	0.2	3308	CY		
		Total Truck Hours														1	HR		18	CY		
		Number of Trips																	1	HR		
		Transportation Cost Truck	Truck dump 16 ton payload	01 54 33 20 5300	435.96	/day													207	Trips		
		Transportation Cost Truck Driver	Truck Driver, Heavy	Trfv	\$43.30	HR													25.9	day	11291	
		Place Backfill	Excavation Bulk Bank 2 CY (322BL)	02315 424 0280	1.74	/CY													207	HR	8963	
		Backfill at pit	Centennial Backfill	Centennial 001	3.31	CY													3306	CY	5752	
		Backfill at pit	Centennial Backfill	Centennial 001	3.31	CY													3306	CY	10943	
		Subtotal																			36949	
		Fan																				
		Equipment's Disposal Cost																				
		Dismantling Cost	Mechanical equipment heavy	15055 300 3600	850	/ton										5	ton			5	ton	4250
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																			4250	
		Transformer																				
		Equipment's Disposal Cost																				
		Dismantling Cost	Mechanical equipment heavy	15055 300 3600	850	/ton										2	ton			2	ton	1700
		Equipment's Vol. Demolished																				
		Loading Costs																				
		Transport Costs																				
		Disposal Costs																				
		Subtotal																			1700	
		Concrete Demolition																				
		Demolition Cost	Concrete demolition	ConcreteDemo1	6.81	/CY						242										
		Concrete's Vol. Demolished																				
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.43	/CY														1.3	315	CY
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. rd. tri	02315 490 0320	3.49	/CY															315	CY
		Disposal Costs	On site disposal	02220 240 5550	7.75	/CY															315	CY
		Subtotal																			5638	
		Concrete Demolition																				
		Demolition Cost																				
		Concrete's Vol. Demolished																				
		Loading Cost																				
		Transportation Cost																				
		Disposal Costs																				
		Subtotal																				
		Total																			48537	

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
2879		Aberdeen Substation																			
		Structure's Demolition Cost																			
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			
		Equipment 's Disposal Cost																			
		Dismantling Cost	Chain link remove 8'-10'	02220 220 1700	3.05	/LF	105										ft		105	ft	320
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			320
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Transformer																			
		Equipment 's Disposal Cost	Mechanical equipment heavy	15055 300 3600	850	/ton										2	ton		2	ton	1700
		Dismantling Cost																			
		Equipment 's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			1700
		Concrete Demolition																			
		Demolition Cost	Concrete demolition	ConcreteDemo1	6.81	/CY	10	10	1								ft		4	CY	27
		Concrete's Vol. Demolished																1.3		5	CY
		Loading Cost	Front end loader 3 CY	02315 424 1300	1.43	/CY														5	CY
		Transportation Cost	12 CY (16 Ton) Dump Truck 1/2 mi. rd. tri	02315 490 0320	3.49	/CY														5	CY
		Disposal Costs	On site disposal	02220 240 5550	7.75	/CY														5	CY
		Subtotal																			90
		Total																			2110

Task ID	Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
		Structure's Demolition Cost																			
		Structure's Vol. Demolished																			
		Rubble's Weight (exclude steel)																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Non Steel Truck																			
		Transportation Cost Non Steel Drive																			
		Disposal Cost Non Steel																			
		Steel's Weight																			
		Truck's Capacity																			
		Haulage																			
		Transportation Cost Steel Truck																			
		Transportation Cost Steel Truck Drive																			
		Disposal Cost Steel																			
		Subtotal																			
		Equipment's Disposal Cost																			
		Dismantling Cost																			
		Equipment's Vol. Demolished																			
		Loading Costs																			
		Transport Costs																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Concrete Demolition																			
		Demolition Cost																			
		Concrete's Vol. Demolished																			
		Loading Cost																			
		Transportation Cost																			
		Disposal Costs																			
		Subtotal																			
		Total																			

Task ID	Equipment Cost	Hourly Operating Costs	Equipment Overhead	Operator's Hourly Wage Rate	Hourly Cost	Number of Men or Eq.	Total Eq. & Lab. Costs	Units	Quantity	Units	Production Rate	Units	Equip. + Labor Time/Dls.	Units	Cost
Centennial Mine															
Mine Site															332737
Gob Hole															43414
2359 Gob Hole 5A, 8A, 7A															11758
Total															367909

Task ID	Equipment Cost	Hourly Operating Costs	Equipment Overhead	Operator's Hourly Wage Rate	Hourly Cost	Number of Men or Eq.	Total Eq. & Lab. Costs	Units	Quantity	Units	Production Rate	Units	Equip. + Labor Time/Dis.	Units	Cost
Mine Site															
Grading															
Backfill and rough grade pond, canyon and bench areas															
D8R Semi-U EROPS (9-54) (2H04)	17115	72.3	0.1	52	238.5	1	238.5 \$/HR		81912	CY	144	CY/HR	568.8	HR	135659
CLAB					41.55	0.5	20.78 \$/HR						568.8	HR	11820
Subtotal															147479
Backfill and grade benches, out slope and highwalls															
Use dozer productivity for time estimate															
D8R Series II Semi-U EROPS (9-55) (2nd04)	13720	53.4	0.1	52	196.49	1	196.49 \$/HR		386	Scrapper/Hr	4	Scrapper	96.5	HR	18961
627G EROPS (9-52) (2nd04)	16080	84.6	0.1	52	245.56	4	982.24 \$/HR		81913	CY	212.5	CY/HR	96.5	HR	94786
CLAB					41.55	2	83.1 \$/HR						96.5	HR	8019
Subtotal															121786
Haul and spread topsoil															
D8R Series II Semi-U EROPS (9-55) (2nd04)	13720	53.4	0.1	52	196.49	1	196.49 \$/HR		118	Scrapper/Hr	4	Scrapper	29.5	HR	5796
627G EROPS (9-52) (2nd04)	16080	84.6	0.1	52	245.56	4	982.24 \$/HR		27568	CY	235	CY/HR	29.5	HR	28976
Excavator for packing															
CAT 325BL (10-7)(3Q00)	9780	26.05	0.1	45.95	135.73	1	135.73 \$/HR						29.5	HR	4004
CLAB					41.55	2	83.1 \$/HR						29.5	HR	2451
Subtotal															41227
Ripping															
D7R Series II (9-55) (2nd2004)	10565	41.1	0.1	52	163.24	1	163.24 \$/HR		110352	CY	3083.8	CY/HR	35.8	HR	5844
Multi-Shank Ripper 190-259 P (9-61) (2nd04)	1635	5.95	0.1	0	18.01	1	18.01 \$/HR						35.8	HR	645
CLAB					41.55	0.5	20.78 \$/HR						35.8	HR	744
Subtotal															7233
Support Personnel															
Foreman Average, Outside					57.3	1	57.3 \$/HR						96.5	HR	5529
Pickup Truck Crew 4x4 1 ton (20-17) (2N04)	820	7.8	0.1	0	13.71	1	13.71 \$/HR						96.5	HR	1323
4,000 gal H2O truck Diesel (20-18) (2N04)	3350	19.85	0.1	42	84.77	1	84.77 \$/HR						96.5	HR	8180
Subtotal															15032
Total															332737

Task ID	Equipment Cost	Hourly Operating Costs	Equipment Overhead	Operator's Hourly Wage Rate	Hourly Cost	Number of Men or Eq.	Total Eq. & Lab. Costs	Units	Quantity	Units	Production Rate	Units	Equip. + Labor Time/Dis.	Units	Cost
Centennial Mine															
1, 3, 4, 5, 5A, 6, 7, 8, 9															
Grading															
Backfill and rough grade pond, canyon and bench areas															
D7R Series II (9-55) (2nd2004)	10565	41.1	0.1	52	163.24	1	163.24 \$/HR		45000	CY	250	CY/HR	180	HR	29383
Subtotal															29383
Haul and spread topsoil															
D7R Series II (9-55) (2nd2004)	13720	53.4	0.1	52	196.49	1	196.49 \$/HR		14400	CY	250	CY/HR	57.6	HR	11318
Subtotal															11318
Support Personnel															
4,000 gal H2O truck Diesel (20-16) (2N04)	3350	19.85	0.1	42	84.77	1	84.77 \$/HR						32	HR	2713
Subtotal															2713
Total															43414

Task ID	Equipment Cost	Hourly Operating Costs	Equipment Overhead	Operator's Hourly Wage Rate	Hourly Cost	Number of Men or Eq.	Total Eq. & Lab. Costs	Units	Quantity	Units	Production Rate	Units	Equip. + Labor Time/Dis.	Units	Cost
2359															
Gob Hole 5A, 6A, 7A															
7A is a redrill															
Grading															
Backfill and rough grade pond, canyon and bench areas															
D7R Series II (9-55) (2nd2004)	10565	41.1	0.1	52	163.24	1	163.24	\$/HR	10000	CY	250	CY/HR	40	HR	6530
Subtotal															6530
Haul and spread topsoil															
D7R Series II (9-55) (2nd2004)	13720	53.4	0.1	52	196.48	1	196.48	\$/HR	3200	CY	250	CY/HR	12.8	HR	2515
Subtotal															2515
Support Personnel															
4,000 gal H2O truck Diesel (20-16) (2N04)	3350	19.85	0.1	42	84.77	1	84.77	\$/HR					32	HR	2713
Subtotal															2713
Total															11758

Ref.	Description	Materials	Means Reference Number	Unit Cost	Unit	Length	Width	Height	Diameter	Area	Volume	Weight	Density	Time	Number	Unit	Swell Factor	Quantity	Unit	Cost
	Vegetation																			
	Slopes																			
	Ground Preparation																			
	Gouging/Pocking	Excavation Bulk Bank 2 CY (322BL)	M023154240280	1.7	/CY						29201					CY		29201	CY	49642
	Assume vol = area(18.1 AC) x 1 ft.																			
	Seed for hydromulch	Seed Mix for Centennial Drainage	Centennial 001	447.7	\$/AC					18.1						AC		18.1	AC	8103
	Hydroseed application	Hydro Spreader (equip. & labor) B-81 80MS	Reveg002	19.13	/MSF					18.1						AC		788	MSF	15074
	Mulch material	Hay 1" material only 029105000250	Reveg001	68	/MSF					18.1						AC		18.1	AC	1231
	Hydroseed application	Hydro Spreader (equip. & labor) B-81	Reveg005	19.13	/MSF					18.1						AC		788	MSF	15074
	Flat Areas																			
	Ground Preparation																			
	Scarify Area	75 HP Dozerw/scarifiers	M029107103100	3.87	MSF					15.02						AC		654	MSF	2531
	Seed for drilling	Seed Mix for Centennial Slopes	Centennial 002	560.55	\$/AC					15.02						AC		15.02	AC	8419
	Drill seeding	Tractor Spreader (equip. & labor) B-86	Reveg004	10.5	/MSF					15.02						AC		654	MSF	6867
	Drainages																			
	Seedlings material cost	Transplants for Centennial Mine	Centennial 003	2835	\$/AC					2.15						AC		2.15	AC	8095
	Seedlings labor	Common Labor	CLAB	41.55	/HR									16		HR		16	HR	665
	Gob Hole																			
	Ground Preparation																			
	Gouging/Pocking	Excavation Bulk Bank 2 CY (322BL)	M023154240280	1.7	/CY						3600					CY		3600	CY	6120
	Assume vol = area(18.1 AC) x 1 ft.																			
	Seed for hydromulch	Seed Mix for Centennial Drainage	Centennial 001	447.7	\$/AC					9						AC		9	AC	4029
	Hydroseed application	Hydro Spreader (equip. & labor) B-81 80MS	Reveg002	19.13	/MSF					9						AC		392	MSF	7499
	Mulch material	Hay 1" material only 029105000250	Reveg001	68	/MSF					9						AC		9	AC	612
	Hydroseed application	Hydro Spreader (equip. & labor) B-81	Reveg005	19.13	/MSF					9						AC		392	MSF	7499
2679	Gob Hole																			
2679	Ground Preparation																			
2679	Gouging/Pocking	Excavation Bulk Bank 2 CY (322BL)	M023154240280	1.7	/CY						800					CY		800	CY	1360
2679	Assume vol = area(18.1 AC) x 1 ft.																			
2679	Seed for hydromulch	Seed Mix for Centennial Drainage	Centennial 001	447.7	\$/AC					2						AC		2	AC	895
2679	Hydroseed application	Hydro Spreader (equip. & labor) B-81 80MS	Reveg002	19.13	/MSF					2						AC		87	MSF	1664
2679	Mulch material	Hay 1" material only 029105000250	Reveg001	68	/MSF					2						AC		2	AC	136
2679	Hydroseed application	Hydro Spreader (equip. & labor) B-81	Reveg005	19.13	/MSF					2						AC		87	MSF	1664
	Subtotal																			145179
	Reseeding																			36295
	Assume 25% reseeding rate																			
	Subtotal																			36295
	Total																			181474