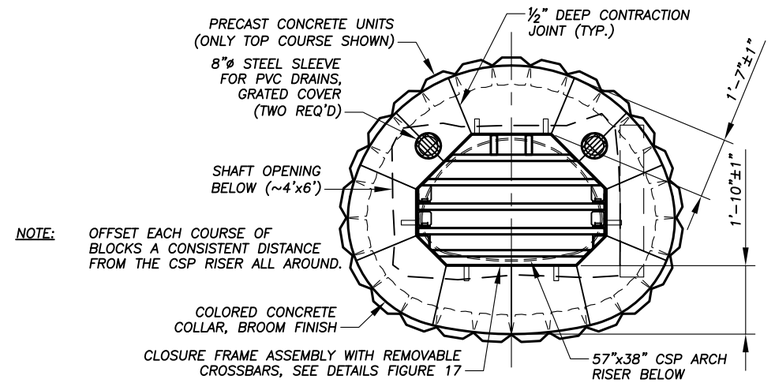
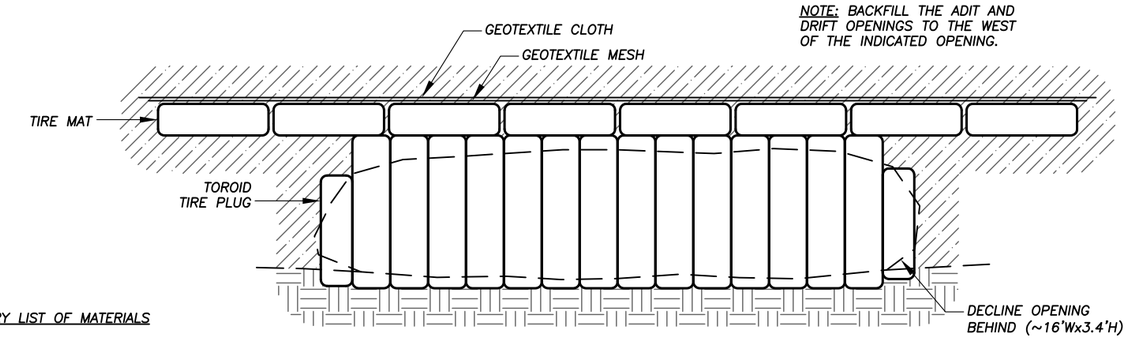


PLAN – HORIZONTAL BAT GATE

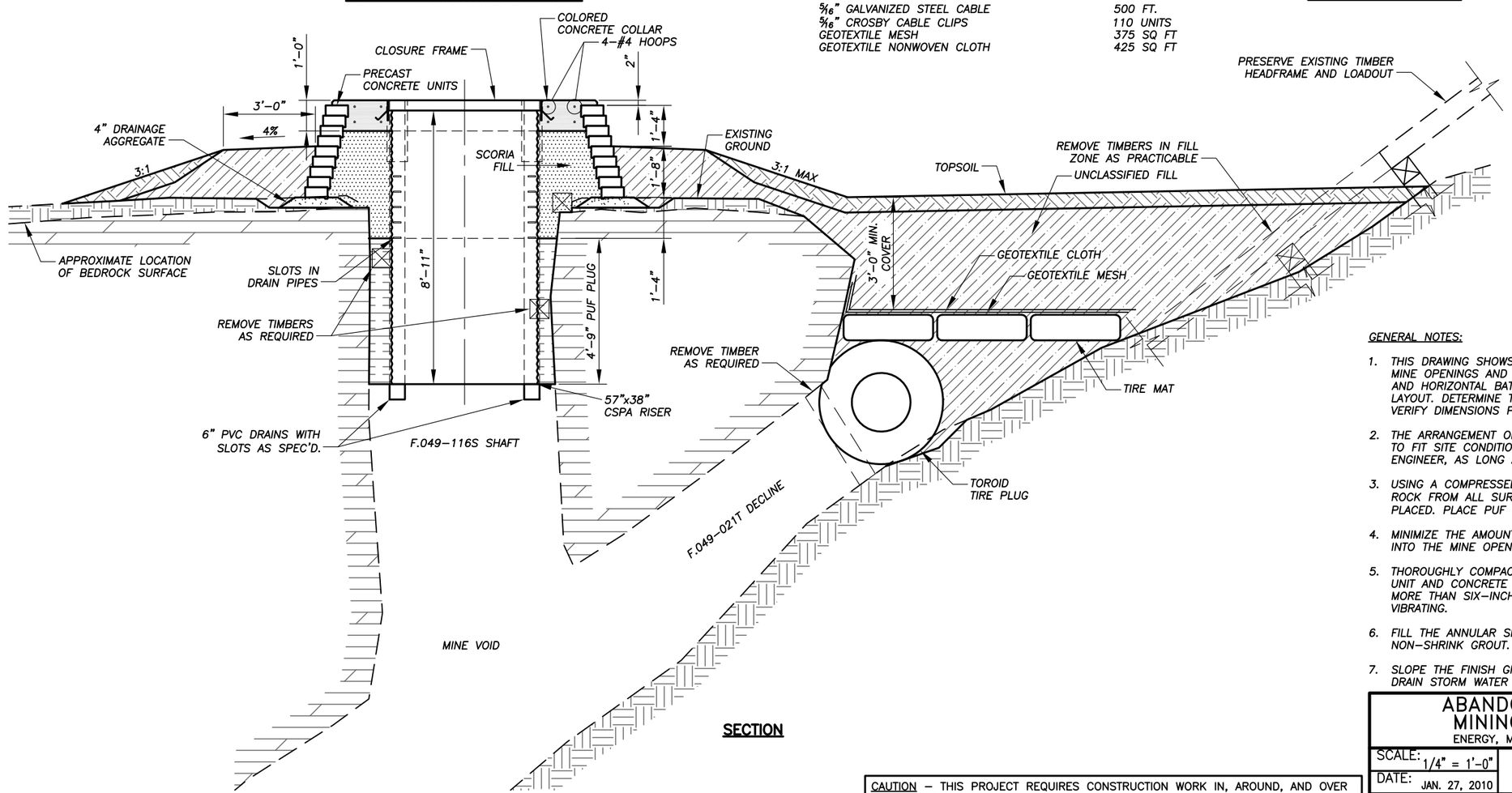


NOTE: BACKFILL THE ADIT AND DRIFT OPENINGS TO THE WEST OF THE INDICATED OPENING.

ELEVATION – TOROID TIRE PLUG AND MAT

PRELIMINARY LIST OF MATERIALS

MEDIUM TOROID PLUG UNITS --	4' DIA	14 UNITS
SMALL TOROID PLUG UNITS --	3' DIA	2 UNITS
SMALL TOROID MAT UNITS		24 UNITS
5/16" GALVANIZED STEEL CABLE		500 FT.
5/16" CROSBY CABLE CLIPS		110 UNITS
GEOTEXTILE MESH		375 SQ FT
GEOTEXTILE NONWOVEN CLOTH		425 SQ FT



SECTION

FEATURE 049-021T DECLINE TOROID TIRE PLUG AND FEATURE 049-116S SHAFT BAT COMPATIBLE CLOSURE

CAUTION – THIS PROJECT REQUIRES CONSTRUCTION WORK IN, AROUND, AND OVER HAZARDOUS AND UNPROTECTED MINE SHAFTS, STOPES, ADITS, AND OTHER OPENINGS WHICH MAY BE OPEN TO THE SURFACE OR HIDDEN FROM VIEW BY TRASH, DEBRIS, OR THIN AND UNSTABLE LAYERS OF SURFACE MATERIALS OR ROCK. THE CONSTRUCTOR SHALL BE RESPONSIBLE FOR THOROUGHLY INVESTIGATING THE SITE CONDITIONS AND SCHEDULING HIS EQUIPMENT, EQUIPMENT OPERATIONS, PERSONNEL, AND SAFETY PROCEDURES TO PREVENT ACCIDENTS AND INJURIES.

GENERAL NOTES:

1. THIS DRAWING SHOWS THE GENERAL SHAPES AND APPROXIMATE SIZES OF THE MINE OPENINGS AND THE CORRESPONDING LAYOUT OF THE TOROID PLUG, CSPA AND HORIZONTAL BAT GATE. THE DRAWING SHALL BE USED AS A GUIDE FOR FIELD LAYOUT. DETERMINE THE ACTUAL LAYOUT OF THE CLOSURES IN THE FIELD. FIELD VERIFY DIMENSIONS PRIOR TO FABRICATION.
2. THE ARRANGEMENT OF TIRES IN THE PLUG MAY BE VARIED FROM THAT INDICATED TO FIT SITE CONDITIONS AND TIRE AVAILABILITY, AS APPROVED BY PROJECT ENGINEER, AS LONG AS THE FUNCTIONALITY OF THE PLUG IS NOT COMPROMISED.
3. USING A COMPRESSED AIR LANCE OR EQUIVALENT, REMOVE DIRT AND LOOSE ROCK FROM ALL SURFACES AGAINST WHICH POLYURETHANE FOAM (PUF) WILL BE PLACED. PLACE PUF AGAINST CLEAN, DRY SURFACES.
4. MINIMIZE THE AMOUNT OF ROCK, EARTH, TIMBER AND OTHER DEBRIS THAT FALLS INTO THE MINE OPENINGS DURING CONSTRUCTION.
5. THOROUGHLY COMPACT ALL FILL UNDERNEATH THE PRECAST CONCRETE MASONRY UNIT AND CONCRETE COLLAR. PLACE SCORIA AND DRAINAGE AGGREGATE IN NOT MORE THAN SIX-INCH LAYERS AND COMPACT BY SLICING WITH A SHOVEL OR VIBRATING.
6. FILL THE ANNULAR SPACE BETWEEN THE CLOSURE FRAME AND CSP RISER WITH NON-SHRINK GROUT. SLOPE TOP OF GROUT TO DRAIN INTO CSP.
7. SLOPE THE FINISH GRADES AT A MINIMUM OF 4% AND A MAXIMUM OF 3:1 TO DRAIN STORM WATER AWAY FROM THE TOROID PLUG AND BAT GATE INSTALLATIONS.

ABANDONED MINE LAND PROGRAM
MINING AND MINERALS DIVISION
ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

SCALE: 1/4" = 1'-0"	COLUMBIA LODE (HEMA DECLINE)	DRAWN BY: JAK
DATE: JAN. 27, 2010		REVISED:

TOROID PLUG AT F. 049-021T DECLINE & BAT GATE AT F. 049-116S SHAFT

LAKE VALLEY MINE SAFEGUARD PROJECT – PH. IV

DRAWING NUMBER: FIGURE 16

049-021 HEMA DECLINE BAT COMPATIBLE_049-116 SHAFT PLUG.DWG (PLOT1) PLOT SCALE 1 = 48