

Bunker Hill  
 AMD Mitigation Concepts  
 2.3: Sidehill Diversion above Guy Cave  
 Order of Magnitude Cost Opinion

DATE: 06/13/2000  
 PROJECT NO.: 152215.FS.02  
 ESTIMATE BY: D. Hedglin

DESCRIPTION	QTY	UNIT	TOTAL UNIT COST	TOTAL COST	COMMENTS
<b>Access Roads</b>					
Clear & Grub	940	LF	8.62	\$8,098	asm 30'w & 50'/hour
Grade, Fill & Compact	940	LF	76.32	\$71,745	60% rock
Crushed Surfacing Base Course	348	CY	21.65	\$7,537	
Erosion matting & mulch on all disturbed cut slopes	47,000	SF	1.00	\$47,000	jute mat & hydroseed-allow
Ditch Lining System	940	LF	47.90	\$45,024	
Construct Screen Intake Structure	20	CY	500.90	\$10,018	
Erosion & Sedimentation Control	1	LS	9,400.00	\$9,400	\$/LF allowance for ditches, culverts, silt fences, sed ponds, etc
<b>SUBTOTAL</b>				<b>\$198,823</b>	
<b>MISC ALLOWANCE</b>	<b>10%</b>			<b>\$19,882</b>	
<b>SUBTOTAL</b>				<b>\$218,705</b>	
<b>CONTINGENCY</b>	<b>50%</b>			<b>\$109,352</b>	
<b>SUBTOTAL</b>				<b>\$328,057</b>	
<b>MOBILIZATION</b>	<b>15%</b>			<b>\$49,209</b>	
<b>CONSTRUCTION TOTAL</b>				<b>\$377,266</b>	
<b>SALES TAX ON MATERIALS</b>	<b>5.0%</b>			<b>\$2,306</b>	
<b>ENGINEERING AND SUPPORT</b>	<b>20%</b>			<b>\$75,453</b>	
<b>CONST MANAGEMENT</b>	<b>8%</b>			<b>\$30,181</b>	
<b>CAPITAL TOTAL (ROUNDED)</b>				<b>\$490,000</b>	
<b>ANNUAL O&amp;M COST</b>			<b>\$11,700</b>		
<b>NPV OF ANNUAL O&amp;M COSTS (30 YEARS @ 7% INTEREST)</b>				<b>\$145,000</b>	
<b>TOTAL 30-YEAR PRESENT WORTH COST @ 7% INTEREST</b>				<b>\$635,000</b>	

**NOTES:**

Misc Allowance markup is to include items known to exist but cannot be quantified at this time.  
 Contingency is for scope changes that are presently unforeseen.  
 Mobilization includes bonds, insurance, temporary facilities, health & safety, demobilization, etc.