

Closure Cost Estimate
Waste Disposal

Project Name: Grassy Mountain Mine - Reclamation Plan
Date of Submittal: October 2022
File Name: SRCE_2.0_GrassyMountain_Beta05_Phil_TSF_Updated_no_STG0.xlsm
Model Version: Version 2.0
Cost Data: User Data
Cost Data File: SRCE_Cost_data-USR_v2.0_Imperial_Metric_GrassyMountain_20210610.xlsm
Cost Estimate Type: LOM Cost Basis: Northern Nevada - Imperial Units

Waste Disposal - LOM Cost Summary					
	Labor \$	Equipment \$	Materials \$	Fees \$	Totals \$
Solid Waste - On Site	0	0	N/A	N/A	0
Solid Waste - Off Site	N/A	290,567	N/A	N/A	290,567
Solid Waste Total	0	290,567	0		290,567
Hazardous Materials	N/A	N/A	N/A	73,264	73,264
Hydrocarbon Contaminated Soils	0	0	N/A	4,419	4,419
TOTALS	0	290,567	0	77,683	368,250

Waste Disposal - User Input - Solid Waste															
												Landfill (Bulk) Disposal		Dumpster	
	Description (required)	ID Code	Construction Year	Facility/Activity Type	Phases	Locations	Properties	Cost Type	Waste Type (select)	Disposal Method (select)	Quantity cy	Distance to Landfill ft	Slope to Landfill % grade	Number of Trucks (user override)	Months Dumpster Rental months
1	Misc. Site Clean-Up		2035	Process Plant	Stg1			LOM	Waste Mgmt & Disposal	Dumpster	5	34.4			3
2	TWRSF - Solid Disposal	WD01	2035	Temporary Waste Rock Storage	Stg1			LOM	Waste Mgmt & Disposal	Dumpster	2,500	34.4			1
3	Process Plant Site Off-site Disposal following Demo		2035	Process Plant	Stg1			LOM	Waste Mgmt & Disposal	Dumpster	5,737	34.4			3

- Notes:
- All Physical parameters must be input even if manual overrides for volume or area are used.
 - If Slope from facility to borrow source is >20, downhill travel time may be underestimated due to limitation of uphill travel time curves and downhill speed tables from CAT Handbook (see Productivty Sheet)

Waste Disposal - User Input - Hazardous Materials															
	Description (required)	ID Code	Construction Year	Facility/Activity Type	Phases	Locations	Properties	Cost Type	Waste Type (select)	Container Type (select)	Vacuum Truck Size (select)	Liquid Quantity gallons	Soild Quantity cy	One Way Travel Distance to Disposal Site mi	One Way Travel Time to Disposal Site hr
1	Misc. Solid Hazardous Waste		2035	Process Plant	Stg1			LOM	Waste Mgmt & Disposal	Solid Bulk			22	250	5.0
2	Misc. Liquid Hazardous Waste		2035	Process Plant	Stg1			LOM	Waste Mgmt & Disposal	Liquid Bulk	Small (2,200 ga	26,671		250	5.0

- Notes:
- Use Other Demo & Equip Removal Sheet for tank removal
- Hazard Waste based on total storage capacity at site assuming all full at time of closure

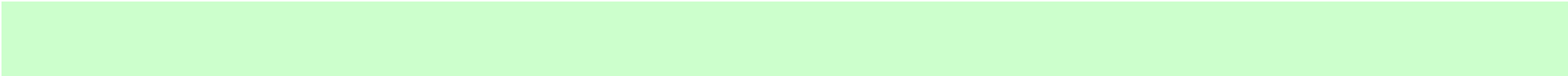
Waste Disposal - User Input - Hydrocarbon Contaminated Soils												
	Description (required)	ID Code	Construction Year	Facility/Activity Type	Phases	Locations	Properties	Cost Type	Waste Type (select)	Disposal Method (select)	Quantity cy	Travel Distance to Offsite Disposal mi
1	Misc. Hydrocarbon Contaminated Soils		2035	Process Plant	Stg1			LOM	Waste Mgmt & Disposal	Off site	5	250

- Notes:
- Use Yards or Landfills Sheets for bioremediation facility reclamation

Closure Cost Estimate
Waste Disposal

Project Name: Grassy Mountain Mine - Reclamation Plan
Date of Submittal: October 2022
File Name: SRCE_2.0_GrassyMountain_Beta05_PhII_TSF_Updated_no_STG0.xlsm
Model Version: Version 2.0
Cost Data: User Data
Cost Data File: SRCE_Cost_data-USR_v2.0_Imperial_Metric_GrassyMountain_20210610.xlsm
Cost Estimate Type: LOM Cost Basis: Northern Nevada - Imperial Units

Waste Disposal - LOM Cost Summary					
	Labor \$	Equipment \$	Materials \$	Fees \$	Totals \$
Solid Waste - On Site	0	0	N/A	N/A	0
Solid Waste - Off Site	N/A	290,567	N/A	N/A	290,567
Solid Waste Total	0	290,567	0		290,567
Hazardous Materials	N/A	N/A	N/A	73,264	73,264
Hydrocarbon Contaminated Soils	0	0	N/A	4,419	4,419
TOTALS	0	290,567	0	77,683	368,250



Waste Disposal - Assumptions & Calculations	
Solid Waste Disposal Off site disposal assumes use of average rolloff dumpster [30 cy (m3), 10 ton (tonne)] On site disposal assumes use of small loader/truck fleet for haulage Average density for on site disposal = 2,600 lb/cy (1,540 kg/m3) For on site disposal only 1 truck is required unless total truck hours > 8, only 2 trucks unless total truck hours are > 16	
Hazardous Materials Disposal Assumes all hazardous materials are known Enter EITHER solid or liquid quantity each line. If container type = 55 gallon (200 liter) drum then solid waste hauling costs apply Average density for solids assumed to be 2,600 lb/cy (1,540 kg/m3) Vacuum truck sizes: small = 2,200 gal (~8,300 litres), large = 5,000 gal (~19,000 litres) Vacuum truck on site for 4 hours for each load	
Hydrocarbon Contaminated Soils Disposal Assumes all hazardous materials are known On site disposal assumes biopad treatment Exavation productivity =45 cy./hr (35 m3/hr) (Means Heavy Construction, 2006: 02315-424-0360)	

Waste Disposal - Solid Waste Disposal											
								Off-Site	On-Site		
	Description (required)	Waste Volume cy	Number of Off Site Dumpster Loads	Landfill Fleet Equipment	Landfill Fleet Productivity LCY/hr	Number of Trucks	Total Fleet Hours hrs	Total Dumpster Cost \$	Total Labor Cost \$	Total Equipment Cost \$	Total Waste Disposal Cost \$
1	Misc. Site Clean-Up	5	1				0	1,086	0	0	1,086
2	TWRSF - Solid Disposal	2,500	84				0	81,010	0	0	81,010
3	Process Plant Site Off-site Disposal following Demo	5,737	192				0	208,471	0	0	208,471
		8,242					0	290,567	0	0	290,567

Waste Disposal - Hazardous Materials Disposal	

Closure Cost Estimate
Waste Disposal

Project Name: Grassy Mountain Mine - Reclamation Plan
Date of Submittal: October 2022
File Name: SRCE_2.0_GrassyMountain_Beta05_PhII_TSF_Updated_no_STG0.xlsm
Model Version: Version 2.0
Cost Data: User Data
Cost Data File: SRCE_Cost_data-USR_v2.0_Imperial_Metric_GrassyMountain_20210610.xlsm
Cost Estimate Type: LOM Cost Basis: Northern Nevada - Imperial Units

Waste Disposal - LOM Cost Summary					
	Labor \$	Equipment \$	Materials \$	Fees \$	Totals \$
Solid Waste - On Site	0	0	N/A	N/A	0
Solid Waste - Off Site	N/A	290,567	N/A	N/A	290,567
Solid Waste Total	0	290,567	0		290,567
Hazardous Materials	N/A	N/A	N/A	73,264	73,264
Hydrocarbon Contaminated Soils	0	0	N/A	4,419	4,419
TOTALS	0	290,567	0	77,683	368,250

	Description (required)	Liquid Waste Volume gallons	Solid Waste Volume cy	Number of Truck Loads	Tons of Waste Tons	Pick-up Fees \$	Transport Fees \$	Disposal Fees \$	Total Hazardous Material Cost \$
1	Misc. Solid Hazardous Waste		22	2	28	0	2,582	8,668	11,250
2	Misc. Liquid Hazardous Waste	26,671		13	111	0	28,217	33,796	62,013
		26,671	22		139	0	30,799	42,464	73,264

Waste Disposal - Hydrocarbon Contaminated Soils									
	Description (required)	Quantity cy	Total Fleet Hours hrs	Treatment Cost \$	Transport Fees \$	Disposal Fees \$	Total Labor Cost \$	Total Equipment Cost \$	Total Waste Disposal Cost \$
1	Misc. Hydrocarbon Contaminated Soils	5	0	0	2,948	1,471	0	0	4,419
		5	0	0	2,948	1,471	0	0	4,419