

Tyrone Mine Closure/Closeout Facility Characteristics Form

1A/1B Leach Stockpiles

Function	Ore stockpiles Active
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater: <ul style="list-style-type: none"> • 1A/1C: 100 to 580 feet, direction of flow is NE and Gettysburg Pit • 1B: 100 to 250 feet, direction of flow is SE Medium upwind fetch, limited downwind fetch In Mimbres Basin drainage
Construction Method	End dumped Top surface bermed
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached
Existing Engineering Measures	1A and 1B are addressed concurrently, interior slopes inside of the OPSDA and waiver areas will not be reclaimed

Matrix of Costs Capital Cost/Facility¹

Reclaimed Area (Acres)	273.0
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$1,262,102
Pullback or Backfill	-
Top/Outslope Adjustment	\$137,653
Revegetation	\$224,943
Channels and Benches	\$1,974,383
Other	-
Capital Cost Totals	\$3,599,081
Capital Cost/Acre	\$13,183

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

Tyrone Mine Closure/Closeout Facility Characteristics Form

2A/2B Leach and 2B Waste Stockpiles

Function	Ore stockpiles (2A and 2B leach) Waste rock stockpile (2B waste)
Location Characteristics	No upstream issues Major channel along outslopes (i.e., Deadman Canyon) Regional depth to groundwater is approximately 500 feet, direction of flow is E-NE Medium upwind fetch, medium downwind fetch Interior slopes are inside of OPSDA and waiver areas
Construction Method	End dumped Top surface bermed
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached (2A leach) Non-leach (2B waste)
Existing Engineering Measures	PLS collection system to be maintained, and seepage collection system to be maintained or modified to accommodate new footprint Stormwater controls Interior slopes of 2A Stockpile inside of the OPSDA and waiver areas will be reclaimed, interior slopes of 2B Stockpile inside of the OPSDA and waiver areas will not be reclaimed

Matrix of Costs Capital Cost/Facility¹

Reclaimed Area (Acres)	487.0
<u>Item</u>	Capital Cost
Cover Material	\$3,231,529
Pullback or Backfill	-
Top/Outslope Adjustment	\$2,732,058
Revegetation	\$401,266
Channels and Benches	\$3,769,644
Other	-
Capital Cost Totals	\$10,134,497
Capital Cost/Acre	\$20,810

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated April 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

2C, 4A, 4B, and 7B Leach Stockpiles

Function	Ore stockpiles
Location Characteristics	No upstream issues Regional depth to groundwater is approximately 500 feet, direction of flow is E-NE Medium upwind fetch, medium downwind fetch Interior slopes are inside of OPSDA and waiver areas / open pit
Construction Method	End dumped Top surface bermed
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached
Existing Engineering Measures	Interior slopes of 2C and 4A stockpiles inside of the OPSDA and waiver areas will not be reclaimed; slopes of all other stockpiles and stockpile areas will be reclaimed

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	375.0
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$2,488,386
Pullback or Backfill	-
Top/Outslope Adjustment	\$727,232
Revegetation	\$308,988
Channels and Benches	\$1,402,817
Other	-
Capital Cost Totals	\$4,927,423
Capital Cost/Acre	\$13,140

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

3A Leach Stockpile and 3B Waste Stockpile

Function	Ore stockpile
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater is approximately 100 to 350 feet, direction of flow is toward Main Pit and into Gila River Basin to existing perched and regional collection systems Medium upwind fetch, medium downwind fetch In Gila River Basin drainage
Construction Method	End dumped Top surface bermed
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached
Existing Engineering Measures	PLS collection system, seepage collection system (to be relocated before regrading), existing regional and perched zone collection systems Interior slopes of 3B Stockpile inside of the OPSDA and waiver areas will not be reclaimed; slopes of all other stockpiles and stockpile areas will be reclaimed

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	455.0
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$2,852,290
Pullback or Backfill	\$15,627,400
Top/Outslope Adjustment	\$1,383,464
Revegetation	\$374,906
Channels and Benches	\$2,966,801
Other	\$1,733,627
Capital Cost Totals	\$24,938,487
Capital Cost/Acre	\$54,810

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

4C Leach Stockpile

Function	Ore stockpile
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater is less than 50 feet, direction of flow is NE Medium upwind fetch, medium downwind fetch
Construction Method	End dumped
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached
Existing Engineering Measures	PLS collection system Seepage collection system

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	183.0
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$1,338,660
Pullback or Backfill	-
Top/Outslope Adjustment	\$847,618
Revegetation	\$150,786
Channels and Benches	\$1,396,231
Other	-
Capital Cost Totals	\$3,733,295
Capital Cost/Acre	\$20,401

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

Tyrone Mine Closure/Closeout Facility Characteristics Form

5A Waste/Overburden Stockpile

Function	Overburden and waste stockpile
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater is greater than 400 feet, direction of flow is towards Main Pit Medium upwind fetch, limited downwind fetch Portions of interior slopes within OPSDA and waiver areas
Construction Method	End dumped
Physical Characteristics	Coarse to very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Non-leach
Existing Engineering Measures	Stormwater controls Portion of interior slopes within OPSDA and waiver areas will not be reclaimed

Matrix of Costs Capital Cost/Facility¹

Reclaimed Area (Acres)	371.0
<u>Item</u>	Capital Cost
Cover Material	\$1,528,495
Pullback or Backfill	-
Top/Outslope Adjustment	\$2,413,902
Revegetation	\$305,692
Channels and Benches	\$1,538,580
Other	-
Capital Cost Totals	\$5,786,669
Capital Cost/Acre	\$15,597

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

6B Leach Stockpile

Function	Ore stockpile
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater is approximately 500 feet, direction of flow is toward Gettysburg Pit and Main Pit Medium upwind fetch, medium downwind fetch Within the OPSDA and waiver areas
Construction Method	End dumped
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached
Existing Engineering Measures	Stormwater controls Slopes inside of the OPSDA and waiver areas will not be reclaimed

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	54.0
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$276,817
Pullback or Backfill	-
Top/Outslope Adjustment	\$33,631
Revegetation	\$44,494
Channels and Benches	\$326,391
Other	-
Capital Cost Totals	\$681,333
Capital Cost/Acre	\$12,617

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

6C Leach Stockpile

Function	Ore stockpile
Location Characteristics	Former Gettysburg In-Pit Stockpile No upstream issues No downstream issues Regional depth to groundwater is approximately 500 feet, direction of flow is toward Gettysburg Pit Medium upwind fetch, medium downwind fetch Interior slopes within the OPSDA and waiver areas / open pit
Construction Method	End dumped
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Currently leached
Existing Engineering Measures	Stormwater controls Interior slopes within the OPSDA and waiver areas will not be reclaimed

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	66.0
<u>Item</u>	Capital Cost
Cover Material	\$371,540
Pullback or Backfill	-
Top/Outslope Adjustment	\$161,388
Revegetation	\$54,382
Channels and Benches	\$326,701
Other	-
Capital Cost Totals	\$914,011
Capital Cost/Acre	\$13,849

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

8C Stockpile

Function	Waste Rock Stockpile
Location Characteristics	Inside Main Pit, former Main Pit Stockpile No upstream issues No downstream issues Regional depth to groundwater is 1200 feet below the current stockpile surface, Main Pit collects groundwater within pit sump Limited upwind fetch, limited to downwind fetch Located within OPSDA and waiver areas
Construction Method	End dumped
Physical Characteristics	In-pit dumping Medium to high saturated hydraulic conductivity
Leach Status	Non-leach
Existing Engineering Measures	Stormwater controls Only top surface will be reclaimed

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	47.4
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$197,479
Pullback or Backfill	-
Top/Outslope Adjustment	\$8,774
Revegetation	\$39,023
Channels and Benches	-
Other	-
Capital Cost Totals	\$245,276
Capital Cost/Acre	\$5,179

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

9A Overburden Stockpile

Function	Overburden stockpile
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater is approximately 100 to 350 feet, direction of flow is toward Main Pit and into Gila River Basin Medium upwind fetch, medium downwind fetch NW portion of stockpile is in Gila River Basin drainage
Construction Method	End dumped at initial 3 to 1 slope
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Non-leach
Existing Engineering Measures	Stormwater controls

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	129.0
<u>Item</u>	<u>Capital Cost</u>
Cover Material	-
Pullback or Backfill	-
Top/Outslope Adjustment	\$54,112
Revegetation	\$106,292
Channels and Benches	\$1,115,581
Other	-
Capital Cost Totals	\$1,275,984
Capital Cost/Acre	\$9,891

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

9AX Overburden Stockpile

Function	Overburden stockpile
Location Characteristics	No upstream issues No downstream issues Regional depth to groundwater is approximately 100 to 350 feet, direction of flow is toward Main Pit and into Gila River Basin Medium upwind fetch, medium downwind fetch NW portion of stockpile is in Gila River Basin drainage
Construction Method	End dumped at initial 3 to 1 slope
Physical Characteristics	Very coarse grained Medium to high saturated hydraulic conductivity
Leach Status	Non-leach
Existing Engineering Measures	Stormwater controls

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	63.7
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$115,945
Pullback or Backfill	-
Top/Outslope Adjustment	\$193,129
Revegetation	\$52,487
Channels and Benches	\$118,553
Other	\$4,271
Capital Cost Totals	\$484,385
Capital Cost/Acre	\$7,604

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Savanna Pit

Function	Mined pit
Location Characteristics	No upstream issues No downstream issues Main Pit and Gettysburg Pit dewatering capture zone controls regional groundwater level and flow direction
Construction Method	Blasting, shoveling, and hauling rock in 50-foot benches
Physical Characteristics	Solid, intrusive, and skarn rocks with low primary permeability and medium fracture permeability
Leach Status	Not applicable
Existing Engineering Measures	Pit dewatering contains regional groundwater All perimeter runoff bermed Partially backfilled with Savanna In-Pit Leach Stockpile as part of mine plan (EOY 2014); costs included for reclamation of the interior flat area and some interior slopes of Savanna In-Pit Leach Stockpile

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	65.0
<u>Item</u>	Capital Cost
Cover Material	\$271,033
Pullback or Backfill	-
Top/Outslope Adjustment	\$23,522
Revegetation	\$53,558
Channels and Benches	-
Other	-
Capital Cost Totals	\$348,113
Capital Cost/Acre	\$5,356

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

San Salvador Pit

Function	Mined pit
Location Characteristics	No upstream issues No downstream issues Main Pit and Gettysburg Pit dewatering capture zone controls regional groundwater level and flow direction
Construction Method	Blasting, shoveling, and hauling rock in 50-foot benches
Physical Characteristics	Solid, intrusive, and skarn rocks with low primary permeability and medium fracture permeability
Leach Status	Not applicable
Existing Engineering Measures	Pit dewatering contains regional groundwater All perimeter runoff bermed Partially backfilled as part of mine plan (EOY 2014); costs included for reclamation of the backfilled interior flat area

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	115.0
<u>Item</u>	Capital Cost
Cover Material	\$736,297
Pullback or Backfill	\$2,896,038
Top/Outslope Adjustment	\$360,482
Revegetation	\$94,756
Channels and Benches	\$551,972
Other	-
Capital Cost Totals	\$4,639,545
Capital Cost/Acre	\$40,344

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Exploration Holes, Monitoring & Extraction Wells

Function	Exploration, Monitoring, Extraction
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	-
<u>Item</u>	Capital Cost
Cover Material	-
Pullback or Backfill	-
Top/Outslope Adjustment	-
Revegetation	-
Channels and Benches	-
Other	\$1,758,065
Capital Cost Totals	\$1,758,065
Capital Cost/Acre	-

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Fencing, Signs, and Vehicle Gates Around Pits

Function	N/A
Location Characteristics	Pit perimeters (Main, Savanna, Gettysburg, and Copper Mountain Pits)
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	-
<u>Item</u>	Capital Cost
Cover Material	-
Pullback or Backfill	-
Top/Outslope Adjustment	-
Revegetation	-
Channels and Benches	-
Other	\$1,343,904
Capital Cost Totals	\$1,343,904
Capital Cost/Acre	-

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Demolition (including Pipeline Closures)

Function	Pipeline closures; demolition of electrical infrastructure, buildings, fire hydrants, and Tailing Launder Line culverts and steel trestle
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	Pipelines (HDPE process water, PLS, and raffinate during operational phase and during PSE system operation and water treatment); above-ground electrical lines, power poles, telephone lines, fire hydrants, buildings and associated structures/facilities, and Tailing Launder Line culverts and steel trestle
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	-
<u>Item</u>	Capital Cost
Cover Material	-
Pullback or Backfill	-
Top/Outslope Adjustment	-
Revegetation	-
Channels and Benches	-
Other (Demolition)	\$5,040,149
Capital Cost Totals	\$5,040,149
Capital Cost/Acre	-

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

1C Top (Haul Road)

Function	Haul Road
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	17.0
<u>Item</u>	Capital Cost
Cover Material	\$95,723
Pullback or Backfill	-
Top/Outslope Adjustment	-
Revegetation	\$14,011
Channels and Benches	-
Other	-
Capital Cost Totals	\$109,734
Capital Cost/Acre	\$6,453

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Surface Impoundments

Function	Water Management
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	21.7
<u>Item</u>	<u>Capital Cost</u>
Cover Material	\$118,435
Pullback or Backfill	-
Top/Outslope Adjustment	\$7,405
Revegetation	\$17,888
Channels and Benches	-
Other	-
Capital Cost Totals	\$143,729
Capital Cost/Acre	\$6,620

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

**Tailing Launder Line
Tailing Dam 1 Reclaim Water Pumphouse
Tailing Repositories Borrow Areas**

Function	Reclamation of areas associated with past tailing management; tailing repositories borrow areas
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	183.5
<u>Item</u>	Capital Cost
Cover Material	\$256,620
Pullback or Backfill	-
Top/Outslope Adjustment	\$21,047
Revegetation	\$73,419
Channels and Benches	\$6,974
Other	\$234,184
Capital Cost Totals	\$592,245
Capital Cost/Acre	\$3,227

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Seep 5E Collection System

Function	Water Management
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	-
<u>Item</u>	<u>Capital Cost</u>
Cover Material	-
Pullback or Backfill	-
Top/Outslope Adjustment	-
Revegetation	-
Channels and Benches	-
Other	\$133,356
Capital Cost Totals	\$133,356
Capital Cost/Acre	-

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.

**Tyrone Mine Closure/Closeout
Facility Characteristics Form**

Unplanned Disturbance Area

Function	Unforeseen changes to the mine plan including but not limited to small staging areas, utility corridors, haul roads, pull-offs, stockpile expansions, or other miscellaneous facilities
Location Characteristics	Mine Area
Construction Method	N/A
Physical Characteristics	N/A
Leach Status	N/A
Existing Engineering Measures	N/A

**Matrix of Costs
Capital Cost/Facility¹**

Reclaimed Area (Acres)	125.0
<u>Item</u>	Capital Cost
Cover Material	\$697,333
Pullback or Backfill	-
Top/Outslope Adjustment	\$8,040
Revegetation	\$102,996
Channels and Benches	-
Other	-
Capital Cost Totals	\$808,369
Capital Cost/Acre	\$6,467

¹Costs are based on Telesto Solutions Inc. Earthwork Cost Estimate dated May 2019.