



STATE OF
COLORADO

Drinkard - DNR, Connor <connor.drinkard@state.co.us>

Potts Pit # 2, M-2006-013, Inspection Report and Reclamation Cost Estimate

1 message

Drinkard - DNR, Connor <connor.drinkard@state.co.us>
To: baxter@kirklandconstruction.us

Thu, Jun 2, 2022 at 12:24 PM

Hi Baxter,

Please see the attached inspection report and reclamation cost estimate and let me know if you have any questions.

Best regards,

--

Connor Drinkard

Environmental Protection Specialist Intern



COLORADO
Division of Reclamation,
Mining and Safety
Department of Natural Resources

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2 attachments



INSP-REPORTM_M2006013_CJD_05092022111952.pdf
5649K




M2006013_2022AprilCostEstimate.pdf
394K



MINERALS PROGRAM INSPECTION REPORT
PHONE: (303) 866-3567

The Division of Reclamation, Mining and Safety has conducted an inspection of the mining operation noted below. This report documents observations concerning compliance with the terms of the permit and applicable rules and regulations of the Mined Land Reclamation Board.

MINE NAME: Potts Pit #2	MINE/PROSPECTING ID#: M-2006-013	MINERAL: Gravel, sand and borrow material for construction	COUNTY: Huerfano
INSPECTION TYPE: Monitoring	INSPECTOR(S): Connor Drinkard, Jared Ebert	INSP. DATE: April 13, 2022	INSP. TIME: 10:15
OPERATOR: Eastern Colorado Aggregates, R.L.L.L.P.	OPERATOR REPRESENTATIVE: Mr. Joe Baxter	TYPE OF OPERATION: 112c - Construction Regular Operation	
REASON FOR INSPECTION: Normal I&E Program	BOND CALCULATION TYPE: Complete Bond	BOND AMOUNT: \$103,200.00	
DATE OF COMPLAINT: NA	POST INSP. CONTACTS: None	JOINT INSP. AGENCY: None	
WEATHER: Clear	INSPECTOR'S SIGNATURE: 	SIGNATURE DATE: June 2, 2022	

The following inspection topics were identified as having Problems or Possible Violations. OPERATORS SHOULD READ THE FOLLOWING PAGES CAREFULLY IN ORDER TO ASSURE COMPLIANCE WITH THE TERMS OF THE PERMIT AND APPLICABLE RULES AND REGULATIONS. If a Possible Violation is indicated, you will be notified under separate cover as to when the Mined Land Reclamation Board will consider possible enforcement action.

INSPECTION TOPIC: Right of Entry

PROBLEM: Failure to maintain legal right of entry per Rule 6.4.14. The Division was told by the operator that a settlement with Bureau of Land Management (BLM) in 2020 occurred regarding the federal mineral material trespass. The Division has not received documentation of the settlement and/or documentation of the operator's legal right of entry with the BLM. The Division is also aware that the previous land owner Todd Potts has sold the land but the Division has not received documentation of a new legal right to enter for the new land owner.

CORRECTIVE ACTIONS: The permittee/operator must provide a letter from BLM documenting the 2020 federal mineral material trespass is resolved, BLM requirements for future activity at the site, along with documentation as described in Rule 6.4.14 if future mining will occur by 7/4/22. The permittee/operator must also provide proof of legal right to enter and conduct mining and reclamation operations with the new land owner as described in Rule 6.4.14 by the corrective action due date.

CORRECTIVE ACTION DUE DATE: 7/4/22

INSPECTION TOPIC: Gen. Compliance With Mine Plan

PROBLEM: Rule 1.13.5 states, if an Operator temporarily ceases production of the mining operation for one hundred eighty (180) days or more, the Operator must file a Notice of Temporary Cessation in writing to the

Office.

CORRECTIVE ACTIONS: The Operator must either reinitiate the mining operation, initiate reclamation or submit a request to the Board for a second period of Temporary Cessation by the corrective action due date.

CORRECTIVE ACTION DUE DATE: 7/4/22

INSPECTION TOPIC: Revegetation

PROBLEM: Tamarisk (salt cedar) trees are present within or have volunteered into the permit area and are becoming established. This is a problem for failure to employ weed control methods for a state listed noxious weed species within the permitted area, and to reduce the spread of weeds to nearby areas as required by Section 3.1.10(6) of the rule.

CORRECTIVE ACTIONS: The operator shall either implement the existing weed control plan, or develop a weed control and management plan in accordance with Section 3.1.10(6) of the Rule. This plan should be developed in consultation with the county extension agency, or weed control district office and should include specific control measures to be applied, a schedule for when control measures will be applied and a post-treatment monitoring plan. **Please provide the Division a plan and timeline for treatment of the tamarisk trees or submit photographic documentation of the weed control activities by the corrective action due date.**

CORRECTIVE ACTION DUE DATE: 7/4/22

INSPECTION TOPIC: Sediment Control

PROBLEM: Erosion gullies and ruts were observed on-site. This is a problem at this time for failure to protect the affected land from erosion pursuant to C.R.S. 34-32.5-116(4)(j).

CORRECTIVE ACTIONS: The operator shall provide photo documentation to the Division verifying erosion gullies and ruts have been repaired, and that the site has have been reconstructed and stabilized to prevent erosion damage by the corrective action date.

CORRECTIVE ACTION DUE DATE: 7/4/22

GENERAL INSPECTION TOPICS

The following list identifies the environmental and permit parameters inspected and gives a categorical evaluation of each. Any person engaged in any mining operation shall notify the office of any failure or imminent failure, as soon as reasonably practicable after such person has knowledge of such condition or of any impoundment, embankment, or slope that poses a reasonable potential for danger to any persons or property or to the environment; or any environmental protection facility designed to contain or control chemicals or waste which are acid or toxic-forming, as identified in the permit.

(AR) RECORDS----- <u>Y</u>	(FN) FINANCIAL WARRANTY----- <u>Y</u>	(RD) ROADS----- <u>Y</u>
(HB) HYDROLOGIC BALANCE----- <u>Y</u>	(BG) BACKFILL & GRADING----- <u>Y</u>	(EX) EXPLOSIVES----- <u>NA</u>
(PW) PROCESSING WASTE/TAILING---- <u>NA</u>	(SF) PROCESSING FACILITIES----- <u>NA</u>	(TS) TOPSOIL----- <u>Y</u>
(MP) GENL MINE PLAN COMPLIANCE- <u>PB</u>	(FW) FISH & WILDLIFE----- <u>Y</u>	(RV) REVEGETATION---- <u>PB</u>
(SM) SIGNS AND MARKERS----- <u>Y</u>	(SP) STORM WATER MGT PLAN---- <u>Y</u>	(RS) RECL PLAN/COMP-- <u>Y</u>
(ES) OVERBURDEN/DEV. WASTE----- <u>Y</u>	(SC) EROSION/SEDIMENTATION--- <u>PB</u>	(ST) STIPULATIONS----- <u>NA</u>
(AT) ACID OR TOXIC MATERIALS----- <u>NA</u>	(OD) OFF-SITE DAMAGE----- <u>Y</u>	(RE) RIGHT OF ENTRY--- <u>PB</u>

Y = Inspected / N = Not inspected / NA = Not applicable to this operation / PB = Problem cited / PV = Possible violation cited

OBSERVATIONS

This was a monitoring inspection of the Potts Pit #2, Division of Reclamation, Mining and Safety (DRMS or Division) permit number M-2006-013, operated by Eastern Colorado Aggregates, R.L.L.L.P. I, Connor Drinkard and Jared Ebert with DRMS conducted the inspection. Mr. Joe Baxter with Eastern Colorado Aggregates, R.L.L.L.P. accompanied us during the inspection.

Right of Entry:

The Division has a copy of a federal mineral material trespass decision letter for Pott Pit #2 from Bureau of Land Management (BLM) to Ms. Ronda Neumeister dated February 12, 2020. The letter states to resolve this trespass, either a total settlement liability payment of \$35,860.48 or a promissory note including an installment agreement must be received within 60 days. The Division has not received documentation of the settlement and/or documentation of the operator's legal right of entry with the BLM. The Division is also aware that the previous land owner Todd Potts has sold the land but the Division has not received documentation of a new legal right to enter for the new land owner.

The permittee/operator must provide a letter from BLM documenting the 2020 federal mineral material trespass is resolved, BLM requirements for future activity at the site, along with documentation as described in Rule 6.4.14 if future mining will occur by 7/4/22. The permittee/operator must also provide proof of legal right to enter and conduct mining and reclamation operations with the new land owner as described in Rule 6.4.14 by 7/4/22.

Gen. Compliance with Mine Plan:

The current active mining area was plotted and shown to be approximately 13.3 acres. The operation is in Phase 1 of the mine plan and reclamation has not begun for Phase 1. No mining activity or equipment was present on site during the inspection. Temporary Cessation 1 (TC1) expired May 2021. Rule 1.13.5 states, if an Operator temporarily ceases production of the mining operation for one hundred eighty (180) days or more, the Operator must file a Notice of Temporary Cessation in writing to the Office. **The Operator must either reinitiate the mining operation, initiate reclamation or submit a request to the Board for a second period of Temporary Cessation by 7/4/22.**

Revegetation:

Vegetation is encroaching into the Phase 1 active mining area indicating site inactivity. Tamarisk (salt cedar) trees are present within or have volunteered into the permit area and are becoming established. This is a problem for failure to employ weed control methods for a state listed noxious weed species within the permitted area, and to reduce the spread of weeds to nearby areas as required by Section 3.1.10(6) of the rule. Figures 3, 4, 10, 15, and 19 show specific problem areas. The substantial establishment in the previous Phase 1 active mining area shown in Figures 15 and 19 is especially concerning. **The operator shall either implement the existing weed control plan, or develop a weed control and management plan in accordance with Section 3.1.10 (6) of the Rule. This plan should be developed in consultation with the county extension agency, or weed control district office and should include specific control measures to be applied, a schedule for when control measures will be applied and a post-treatment monitoring plan. Please provide the Division a plan and timeline for treatment of the tamarisk trees or submit photographic documentation of the weed control activities by 7/4/22.**

Sediment and Erosion Control:

Erosion gullies and ruts were observed on-site. Figures 9, 11, 12, and 19 show specific problem areas. The northwest portion of the active mining area has substantial erosion which is especially concerning. This is a problem at this time for failure to protect the affected land from erosion pursuant to C.R.S. 34-32.5-116(4)(j). **The operator shall provide photo documentation to the Division verifying erosion gullies and ruts have been repaired, and that the site has have been reconstructed and stabilized to prevent erosion damage by 7/4/22.**

Financial Warranty:

The current required financial warranty for the site is \$103,200.00, the Division currently holds a financial warranty in the amount of \$103,200.00 for this site in the form of the Bond from Travelers Casualty and Surety Company of America. The Division has evaluated the reclamation liability for the site and calculated it to be \$153,074.00. This amount is \$49,874.00 more than the financial warranty currently held. **The Division requests the operator review the enclosed reclamation cost estimate and provide the Division any questions or comments by July 4, 2022. The Division may issue a required surety increase notice after this date in accordance with Rule 4.2.1(2). If so, Eastern Colorado Aggregates, R.L.L.P. will have sixty days from the date of this notice to provide the additionally required surety.**

Hydrologic Balance:

No water observed.

Signs and Markers:

The mine identification sign and permit boundary markers were observed.

PHOTOGRAPHS



Figure 1. Looking north from southwest side of affected area.



Figure 2. Looking northeast from west side of affected area.



Figure 3. Looking east at stockpile from west side of affected area. Tamarisk present.



Figure 4. Looking east at stockpiles from west side of affected area. Tamarisk present.



Figure 5. Looking south from northwest side of affected area.



Figure 6. Looking southeast from northwest side of affected area.



Figure 7. Looking southwest from northwest side of affected area.



Figure 8. Looking east at north side of topsoil stockpile.



Figure 9. Rill north of topsoil stockpile.



Figure 10. Looking west from eastern side of affected area. Tamarisk present.



Figure 11. Looking southeast from eastern side of affected area. Prominent rill.



Figure 12. Looking west from eastern side of affected area. Prominent rill coming from stockpiles.



Figure 13. Looking northwest from east side of affected area.



Figure 14. Looking southeast from east side of affected area. Major gully forming at the head of this drainage.



Figure 15. Looking southeast into previous affected area from east side of affected area. Established tamarisk.



Figure 16. Looking northwest from southeast side of affected area.



Figure 17. Looking west from southeast side of affect area.



Figure 18. Looking southwest at access road from southwest side of affected area.

Potts Pit #2, M-2006-013

April 13, 2022 DRMS Inspection

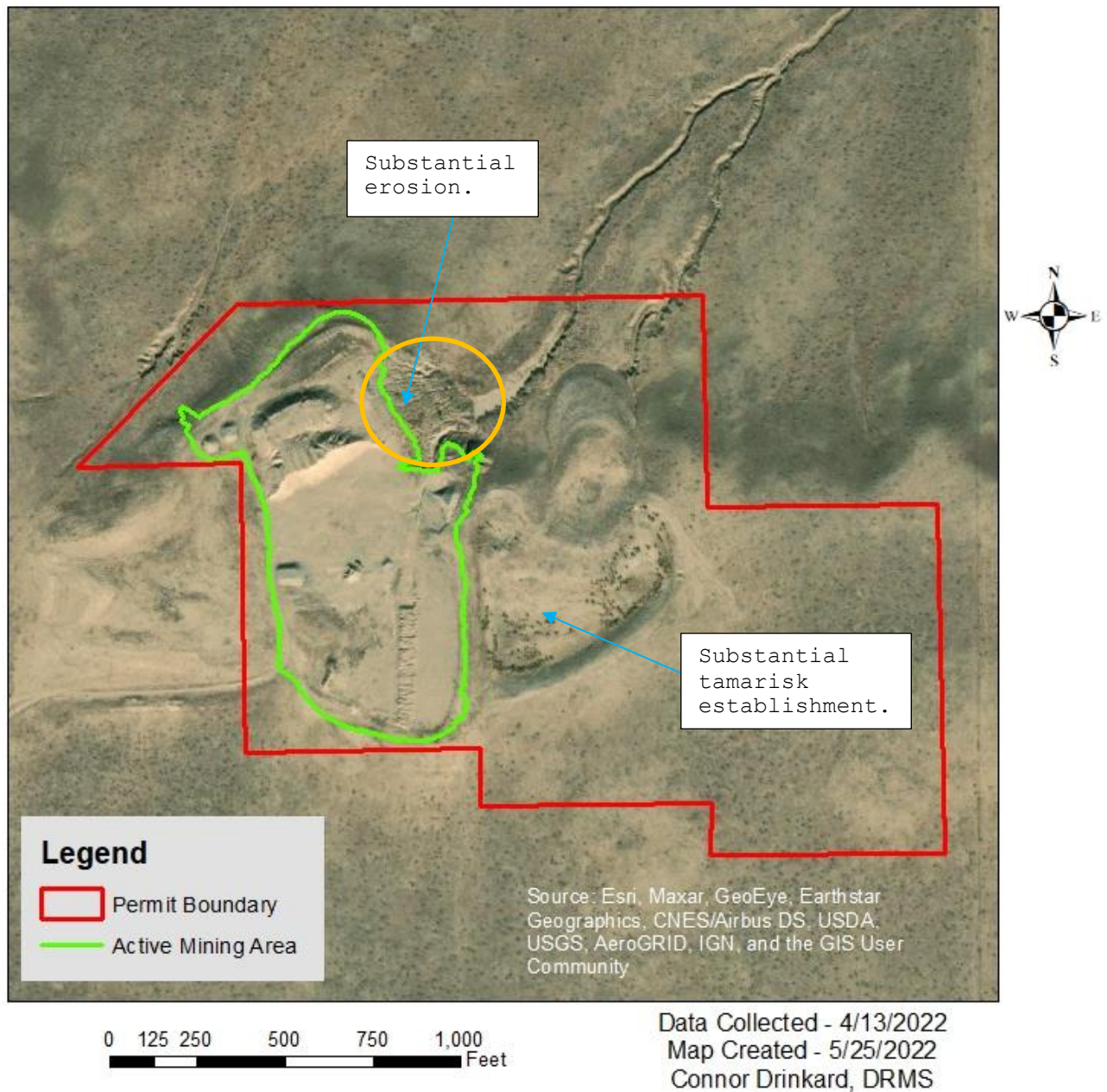


Figure 19. Map of Potts Pit #2. Active Mining Area approx. 13.3 acres.

Inspection Contact Address

Mr. Baxter Kirkland
Eastern Colorado Aggregates, R.L.L.L.P.
PO Box 580
Rye, CO 81069

Enclosure: **Cost Estimate**

CC: None

COST SUMMARY WORK

Task description: Reclaim Potts Pit #2

Site: Potts Pit #2

Permit Action: 2022 April Inspection

Permit/Job#: M2006013

PROJECT IDENTIFICATION

Task #: 022

State: Colorado

Abbreviation: None

Date: 5/22/2022

County: Huerfano

Filename: M013-022

User: CJD

Agency or organization name: DRMS

TASK LIST (DIRECT COSTS)

Task	Description	Form Used	Fleet Size	Task Hours	Cost
001	Spread overburden/waste	SCRAPER1	1	23.74	\$33,913
002	Topsoil 6" over 27 ac	SCRAPER1	1	20.03	\$18,315
003	Reveg - 30 ac	REVEGE	1	16.00	\$52,448
003a	Erosion control	REVEGE	1	20.00	\$4,426
004	Mob/Demob	MOBILIZE	1	7.60	\$10,929
<u>SUBTOTALS:</u>				87.37	\$120,031

INDIRECT COSTS

OVERHEAD AND PROFIT:

Liability insurance: 2.02

Total = \$2,425

Performance bond: 1.05

Total = \$1,260

Job superintendent: 54.66

Total = \$3,937

Profit: 10.00

Total = \$12,003

TOTAL O & P = \$19,625

CONTRACT AMOUNT (direct + O & P) = \$139,656

LEGAL - ENGINEERING - PROJECT MANAGEMENT:

Financial warranty processing (legal/related costs): \$500

Total = \$500

Engineering work and/or contract/bid preparation: 4.25

Total = \$5,935

Reclamation management and/or administration: 5.00

\$6,983

CONTINGENCY: 0.00

Total = \$0

TOTAL INDIRECT COST = \$33,043

TOTAL BOND AMOUNT (direct + indirect) = \$153,074

SCRAPER TEAM WORKTask description: Spread overburden/wasteSite: Potts Pit #2Permit Action: 2022 April InspectionPermit/Job#: M2006013**PROJECT IDENTIFICATION**Task #: 001State: ColoradoAbbreviation: NoneDate: 5/22/2022County: HuerfanoFilename: M013-001User: CJDAgency or organization name: DRMS**HOURLY EQUIPMENT**COSTShift basis: 1 per day

	Equipment Description
-Scraper:	Cat 627G w/push-pull
-Dozer:	Cat D9T - 9SU
Support Equipment -Load Area:	NA
-Dump Area:	Cat D9T - 9SU
Road Maintenance -Motor Grader:	CAT 12M
-Water Truck:	Water Tanker, 5,000 Gal.

Cost Breakdown:

	Scraper Work Team		Support Equipment		Maintenance Equipment	
	Scraper	Dozer	Load Area	Dump Area	Motor Grader	Water Truck
%Utilization-machine:	100	50	NA	50	25	25
Ownership cost/hour:	\$188.81	\$126.01	NA	\$126.01	\$47.01	\$33.45
Operating cost/hour:	\$169.82	\$70.71	NA	\$70.71	\$9.42	\$10.49
%Utilization-ripper:	NA	25	NA	25	NA	NA
Ripper own. cost/hour:	NA	\$19.26	NA	\$19.26	\$0.00	\$0.00
Ripper op. cost/hour:	NA	\$2.87	NA	\$2.87	\$0.00	\$0.00
Operator cost/hour:	\$30.90	\$41.30	NA	\$41.30	\$28.56	\$0.00
Unit Subtotals:	\$389.53	\$260.15	NA	\$260.15	\$84.98	\$43.94
Number of Units:	2	1	0	1	1	1
Group Subtotals:	Work:	\$1,039.21	Support:	\$260.15	Maint:	\$128.92

Total work team cost/hour: \$1,428.28**MATERIAL QUANTITIES**Initial volume: 17,000

CCY

Swell factor: 1.000Loose volume: 17,000

LCY

Source of estimated volume: Division of Reclamation, Mining & SafetySource of estimated swell factor: Cat Handbook**HOURLY PRODUCTION****Scraper Bowl (volume) Basis:**

Material weight:	<u>3,250 lbs/LCY</u>	Struck Volume:	<u>15.70</u>	LCY
Material description:	<u>Gravel - Pitrun</u>	Heaped Volume:	<u>22.00</u>	LCY
Rated Payload:	<u>52,800 pounds</u>	Average Volume:	<u>18.85</u>	LCY
Payload Capacity:	<u>16.25 LCY</u>	Adjusted Capacity:	<u>16.25</u>	LCY

Cycle Time:Scraper Loading Time: 0.90 MinutesManeuver and Spread Time: 0.60 MinutesJob Condition Correction:

Site Altitude: 6000 feet

	Scraper	Push Dozer	Source
Altitude Adj:	1.000	1.000	(CAT HB)
Job Efficiency:	0.830	0.830	(CAT HB)
Net Correction:	0.830	0.830	

Travel Time:Road Condition: Firm, smooth, rolling, dirt/lt. surfaced, watered, maintained 3.0Haul Route:

Seg #	Haul Distance (Ft)	Grade (%)	Roll. Res (%)	Total Res (%)	Velocity (fpm)	Travel Time (min)
1	600.00	2.00	3.00	5.00	2218	0.45

Haul Time: 0.45 minutesReturn Route:

Seg #	Haul Distance (Ft)	Grade (%)	Roll. Res (%)	Total Res (%)	Velocity (fpm)	Travel Time (min)
1	600.00	-2.00	3.00	1.00	2913	0.31

Return Time: 0.31 minutesTotal Scraper team cycle time: 2.26 minutesAdjusted for job conditions: 715.98 LCY/HourSelected Number of Scrapers: 2 Scraper(s)Adjusted single scraper team (unit) hourly production: 715.98 LCY/HourAdjusted multiple scraper team (fleet) hourly production: 715.98 LCY/HourUnadjusted unit production/hour: 862.63 LCY/HourOptimal Number of Scrapers per push
dozer: _____**JOB TIME AND COST**Fleet size: 1 Team(s)Total job time: 23.74 HoursUnit cost: \$1.995 /LCYTotal job cost: \$33,913

SCRAPER TEAM WORKTask description: Topsoil 6" over 27 acSite: Potts Pit #2Permit Action: 2022 April InspectionPermit/Job#: M2006013**PROJECT IDENTIFICATION**Task #: 002State: ColoradoAbbreviation: NoneDate: 5/22/2022County: HuerfanoFilename: M013-002User: CJDAgency or organization name: DRMS**HOURLY EQUIPMENT**COSTShift basis: 1 per day

Equipment Description	
-Scraper:	Cat 627G w/push-pull
-Dozer:	NA
Support Equipment -Load Area:	NA
-Dump Area:	NA
Road Maintenance -Motor Grader:	CAT 12M
-Water Truck:	Water Tanker, 5,000 Gal.

Cost Breakdown:

	Scraper Work Team		Support Equipment		Maintenance Equipment	
	Scraper	Dozer	Load Area	Dump Area	Motor Grader	Water Truck
%Utilization-machine:	100	NA	NA	NA	25	25
Ownership cost/hour:	\$188.81	NA	NA	NA	\$47.01	\$33.45
Operating cost/hour:	\$169.82	NA	NA	NA	\$9.42	\$10.49
%Utilization-ripper:	NA	NA	NA	NA	100	NA
Ripper own. cost/hour:	NA	NA	NA	NA	\$2.95	\$0.00
Ripper op. cost/hour:	NA	NA	NA	NA	\$3.40	\$0.00
Operator cost/hour:	\$30.90	NA	NA	NA	\$28.56	\$0.00
Unit Subtotals:	\$389.53	NA	NA	NA	\$91.33	\$43.94
Number of Units:	2	0	0	0	1	1
Group Subtotals:	Work:	\$779.06	Support:	\$0.00	Maint:	\$135.27

Total work team cost/hour: **\$914.33****MATERIAL QUANTITIES**Initial volume: 14,924

CCY

Swell factor: 1.000Loose volume: **14,924**

LCY

Source of estimated volume: Division of Reclamation, Mining & SafetySource of estimated swell factor: Cat Handbook**HOURLY PRODUCTION****Scraper Bowl (volume) Basis:**

Material weight:	<u>1,600 lbs/LCY</u>	Struck Volume:	<u>15.70</u>	LCY
Material description:	<u>Top Soil</u>	Heaped Volume:	<u>22.00</u>	LCY
Rated Payload:	<u>52,800 pounds</u>	Average Volume:	<u>18.85</u>	LCY
Payload Capacity:	<u>33.00 LCY</u>	Adjusted Capacity:	<u>18.85</u>	LCY

Cycle Time:Scraper Loading Time: 0.90 MinutesManeuver and Spread Time: 0.60 MinutesJob Condition Correction:

Site Altitude: 6000 feet

	Scraper	Push Dozer	Source
Altitude Adj:	1.000	1.000	(CAT HB)
Job Efficiency:	0.830	0.830	(CAT HB)
Net Correction:	0.830	0.830	

Travel Time:Road Condition: Firm, smooth, rolling, dirt/lt. surfaced, watered, maintained 3.0Haul Route:

Seg #	Haul Distance (Ft)	Grade (%)	Roll. Res (%)	Total Res (%)	Velocity (fpm)	Travel Time (min)
1	1000.00	1.00	3.00	4.00	2665	0.56

Haul Time: 0.56 minutesReturn Route:

Seg #	Haul Distance (Ft)	Grade (%)	Roll. Res (%)	Total Res (%)	Velocity (fpm)	Travel Time (min)
1	1000.00	-1.00	3.00	2.00	2905	0.46

Return Time: 0.46 minutesTotal Scraper team cycle time: 2.52 minutesAdjusted for job conditions: 745.02 LCY/HourSelected Number of Scrapers: 2 Scraper(s)Adjusted single scraper team (unit) hourly production: 745.02 LCY/HourAdjusted multiple scraper team (fleet) hourly production: 745.02 LCY/HourUnadjusted unit production/hour: 897.62 LCY/HourOptimal Number of Scrapers per push
dozer: _____JOB TIME AND COSTFleet size: 1 Team(s) Total job time: 20.03 HoursUnit cost: \$1.227 /LCY Total job cost: \$18,315

REVEGETATION WORKTask description: Reveg - 30 acSite: Potts Pit #2Permit Action: 2022 April InspectionPermit/Job#: M2006013**PROJECT IDENTIFICATION**Task #: 003State: ColoradoAbbreviation: NoneDate: 5/22/2022County: HuerfanoFilename: M013-003User: CJDAgency or organization name: DRMS**FERTILIZING****Materials**

Description	Units / Acre	Unit	Cost / Unit	Cost /Acre
Ammonium nitrate, 33-0-0	75.00	pound	\$0.36	\$27.00
Triple superphosphate, 0-46-0	54.00	pound	\$0.46	\$24.84
			Total Fertilizer Materials Cost/Acre	\$51.84

Application

Description	Cost /Acre
Tractor towed spreader (MEANS 32 01 90.13 0120)	\$38.77
Total Fertilizer Application Cost/Acre	\$38.77

TILLING

Description	Cost /Acre
Chisel plowing {DMG}	\$96.50
Weed control spraying (MEANS 31 31 16.13 3100)	\$290.40
Total Tilling Cost/Acre	\$386.90

SEEDING

Seed Mix	Rate – PLS LBS / Acre	Seeds per SQ. FT	Cost /Acre
Blue Grama - Lovington	0.88	14.36	\$14.06
Indian Ricegrass - Paloma	0.74	2.40	\$8.23
Sand Dropseed	0.05	5.97	\$0.49
Sideoats Grama - Vaughn	3.19	10.47	\$26.72
Western Wheatgrass - Arriba	1.60	4.04	\$10.40
Totals Seed Mix	6.46	37.24	\$59.89

Application

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Description	Cost /Acre
Drill Seeding (DRMS Survey Cost)	\$232.00
Total Seed Application Cost/Acre	\$232.00

MULCHING and MISCELLANEOUS**Materials**

Description	Units / Acre	Unit	Cost / Unit	Cost /Acre
Straw, delivered {MEANS 31 25 14.16 1200}	2.00	TON	\$307.02	\$614.04
Total Mulch Materials Cost/Acre				\$614.04

Application

Description	Cost /Acre
Crimping, with tractor {DMG survey data}	\$71.57
Total Mulch Application Cost/Acre	\$71.57

JOB TIME AND COST

No. of Acres:	30	Cost /Acre:	\$1,455.01
Estimated Failure Rate:	30%	Cost /Acre*:	\$977.50
*Selected Replanting Work Items:	SEEDING,MULCHING		

Initial Job Cost:	\$43,650.30
Reseeding Job Cost:	\$8,797.50
Total Job Cost:	\$52,448
Job Hours:	16.00

REVEGETATION WORKTask description: Erosion controlSite: Potts Pit #2Permit Action: 2022 April InspectionPermit/Job#: M2006013**PROJECT IDENTIFICATION**Task #: 003AState: ColoradoAbbreviation: NoneDate: 5/24/2022County: HuerfanoFilename: M013-003aUser: CJDAgency or organization name: DRMS**MULCHING and MISCELLANEOUS****Materials**

Description	Units / Acre	Unit	Cost / Unit	Cost /Acre
Hay, delivered {MEANS 31 25 14.16 1200}	240.00	BALE	\$12.28	\$2,947.20
Total Mulch Materials Cost/Acre				\$2,947.20

Application

Description	Cost /Acre
Hay bales, staked, <3h:1v (MEANS 31 25 14.16 1305)	\$3.17
Total Mulch Application Cost/Acre	\$3.17

JOB TIME AND COST

No. of Acres:	1	Cost /Acre:	\$2,950.37
Estimated Failure Rate:	50%	Cost /Acre*:	\$2,950.37
*Selected Replanting Work Items:		<u>MULCHING</u>	

Initial Job Cost: **\$2,950.37**
 Reseeding Job Cost: **\$1,475.19**
 Total Job Cost: **\$4,426**
 Job Hours: **20.00**

EQUIPMENT MOBILIZATION/DEMOBILIZATIONTask description: **Mob/Demob**Site: **Potts Pit #2**Permit Action: 2022 April InspectionPermit/Job#: M2006013**PROJECT IDENTIFICATION**Task #: 004State: ColoradoAbbreviation: NoneDate: 5/22/2022County: HuerfanoFilename: M013-004User: CJDAgency or organization name: DRMS**EQUIPMENT TRANSPORT RIG COST**Shift basis: 1 per dayCost Data Source: CRG DataTruck Tractor Description: GENERIC ON-HIGHWAY TRUCK TRACTOR, 6X4, DIESEL POWERED,
400 HP (2ND HALF, 2006)Truck Trailer Description: GENERIC FOLDING GOOSENECK, DROP DECK EQUIPMENT
TRAILER (25T, 50T, AND 100T)**Cost Breakdown:**

Available Rig Capacities	0-25 Tons	26-50 Tons	51+ Tons
Ownership Cost/Hour:	\$21.28	\$37.94	\$47.67
Operating Cost/Hour:	\$26.55	\$50.48	\$56.21
Operator Cost/Hour:	\$20.54	\$20.54	\$20.54
Helper Cost/Hour:	\$0.00	\$23.53	\$23.53
Total Unit Cost/Hour:	\$68.37	\$132.49	\$147.95

NON ROADABLE EQUIPMENT:

Machine Description	Weight/ Unit (TONS)	Owner ship Cost/hr/ unit	Haul Rig Cost/hr/unit	Fleet Size	Haul Trip Cost/hr/ fleet	Return Trip Cost/hr/ fleet	DOT Permit Cost/ fleet
Cat 627G w/push-pull	43.48	\$188.81	\$132.49	2	\$642.60	\$264.98	\$250.00
CAT 12M	16.01	\$49.96	\$68.37	1	\$118.33	\$68.37	\$250.00
Drill/Broadcast Seeder with Tractor	25.00	\$7.98	\$68.37	1	\$76.35	\$68.37	\$250.00
Power Mulcher (Bowie LD-90)	6.00	\$14.98	\$68.37	1	\$83.35	\$68.37	\$250.00
Cat D9T - 9SU	66.13	\$145.27	\$147.95	1	\$293.22	\$147.95	\$250.00

Subtotals: **\$1,213.85** **\$618.04** **\$1,250.00****ROADABLE EQUIPMENT:**

Machine Description	Total Cost/hr/ unit	Fleet Size	Haul Trip Cost/hr/ fleet	Return Trip Cost/hr/ fleet
Light Duty Pickup, 4x4, 3/4 T.	\$12.93	1	\$12.93	\$12.93
Fuel Tanker, 4x2, 170 HP	\$29.70	1	\$29.70	\$29.70
Water Tanker, 5,000 Gal.	\$75.41	1	\$75.41	\$75.41
Lube Truck, 4x2, 190 HP	\$35.20	1	\$35.20	\$35.20

Subtotals: **\$153.24** **\$153.24**

EQUIPMENT HAUL DISTANCE and Time

Nearest Major City or Town within project area region: PUEBLO
 Total one-way travel distance: 45.00 miles
 Average Travel Speed: 50.00 mph

Total Non-Roadable Mob/Demob Cost * \$10,652.80
 ** two round trips with haul rig:
 Total Roadable Mob/Demob Cost ** \$275.83
 ** one round trip, no haul rig:

Transportation Cycle Time:

	Non-Roadable Equipment	Roadable Equipment
Haul Time (Hours):	0.90	0.90
Return Time (Hours):	0.90	0.90
Loading Time (Hours):	1.00	NA
Unloading Time (Hours):	1.00	NA
Subtotals:	3.80	1.80

JOB TIME AND COST

Total job time: 7.60 Hours

Total job cost: \$10,929