Peabody Sage Creek Mining, LLC

Peabody Sage Creek Mine
PO Box 250
36600 Routt County Road 27
Hayden, CO. 81639

October 05, 2022

Tabetha Lynch
Colorado Division of Reclamation, Mining and Safety
1313 Sherman St., Room 215
Denver, CO 80203

RE: 3rd Quarter and Annual Pond Inspections – Sage Creek Mine (C 2009-087)

Ms. Lynch:

Enclosed are the 3rd quarter 2022 and Annual pond inspection reports for the Peabody Sage Creek Mine. I personally inspected each pond and have provided a Professional Engineer's Statement on the following page of this letter to accompany the inspection reports. Please contact me if there are any questions or if you need any additional information.

Best Regards,

Miranda Kawcak

Miranda Kawcak
Environmental Manager
Peabody, Colorado Operations

Attachments:
Professional Engineer Certification (Miranda Lynn Kawcak, P.E.)
Inspection Reports

CERTIFICATION

I, Miranda Lynn Kawcak, a registered engineer in the State of Colorado do hereby certify that I have reviewed the attached Sage Creek Mine Sediment Pond Reports covering the third quarter of 2022, and that they are true and correct to the best of my knowledge and belief.

Miranda Kawcak

10/05/2022

Miranda Lynn Kawcak
CO P.E. No. 59419

Date

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		**DATE: 9/14/2022**		
NPDES I.D. NO.: CO-0048275 D.P. 002				
FACILITY CONFIGURATION: Incised Pond		**DATE LAST INSPECTION: 6/21/2022**		
SITE NAME: Wadge Impoundment #002		**LOCATION: NW¼ NE¼, Sec. 2, T5N, R87W**		
MINE NAME: Peabody Sage Creek Mine		**LOCATION: 7.1 mi. SE of Hayden, CO**		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		**OWNER'S REP.: Miranda Kawcak**		
	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	**YES**	**NO**	**N/A**
1	Foundation preparation (removal of vegetation, stumps, topsoil:			x
2	Lift thickness:			x
3	Compaction according to approved plan:			x
4	Burning (specify extent and location):			x
5	Angle of slope:_____upstream, _____downstream	Total = N/A		
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes			x
	At natural hillside:			x
	Over widespread areas:			x
	From downstream foundation area:			x
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:			x
8	Cracks or scarps on slope:			x
9	Sloughing or bulging on slope:			x
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:			x
13	*Water impounded against toe:			x
14	Existing embankment freeboard = **0 feet**			
15	_____ *Increase* _____ *Decrease in water level:* ***Same***			
16	Cracks, bulging, or erosion on upstream face:			x
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:		x	
19	*Cracking or crushing of pipes			
	Spillway pipes:			x
	Decant system:			x
20	Trash racks clear and in place:			x
21	Discharge rate (gpm) = **~20**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **Flume needs sealed with bentonite to stop water from flowing under flume

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments

INSPECTOR'S NAME: Miranda Kawcak	**DATE: 9/14/2022**
NPDES I.D. NO.: CO-0048275 D.P. 003	
FACILITY CONFIGURATION: Diked Pond	**DATE LAST INSPECTION: 6/21/2022**
SITE NAME: Wadge Impoundment #003	**LOCATION: SE¼ SW¼, Sec. 27, T6N, R87W**
MINE NAME: Peabody Sage Creek Mine	**LOCATION: 7.1 mi. SE of Hayden, CO**
MINE I.D. NO.: CMLRD Permit No. C-2009-087	**OWNER'S REP.: Miranda Kawcak**

	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	YES	NO	N/A
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness = **12 inches**			
3	Compaction according to approved plan:	x		
4	Burning (specify extent and location):		x	
5	Angle of slope: **2:1** upstream, **3:1** downstream	**Total = 5:1**		
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes		x	
	At natural hillside:		x	
	Over widespread areas:		x	
	From downstream foundation area:		x	
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:		x	
8	Cracks or scarps on slope:		x	
9	Sloughing or bulging on slope:		x	
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:		x	
13	*Water impounded against toe:		x	
14	Existing embankment freeboard (4.9' is normal) = 5.4**'**			
15	_____ *Increase* _____ *Decrease in water level:* ***Same***			
16	Cracks, bulging, or erosion on upstream face:		x	
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:		x	
19	*Cracking or crushing of pipes			
	Spillway pipes:			x
	Decant system:			x
20	Trash racks clear and in place:	x		
21	Discharge rate (gpm) = 0 **gpm**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* ***Rodent burrows need to occasionally be filled in - ongoing maintenance. Weir needs replaced, still operable by hand but should be replaced* .

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		**DATE: 9/14/2022**		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Incised Pond		**DATE LAST INSPECTION: 6/21/2022**		
SITE NAME: Spill Control Pond #2		**LOCATION: NW¼ NE¼, Sec. 34, T6N, R87W**		
MINE NAME: Peabody Sage Creek Mine		**LOCATION: 7.1 mi. SE of Hayden, CO**		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		**OWNER'S REP.: Miranda Kawcak**		
	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	**YES**	**NO**	**N/A**
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness = **N/A**			
3	Compaction according to approved plan:			x
4	Burning (specify extent and location):			x
5	Angle of slope:___upstream, ____downstream		N/A	
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes		x	
	At natural hillside:		x	
	Over widespread areas:		x	
	From downstream foundation area:		x	
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:		x	
8	Cracks or scarps on slope:		x	
9	Sloughing or bulging on slope:		x	
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:		x	
13	*Water impounded against toe:		x	
14	Existing embankment freeboard (7.0' is normal) = 7**.0'**			
15	_____ *Increase* ___*Decrease in water level: DRY*			
16	Cracks, bulging, or erosion on upstream face:		x	
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:			x
19	*Cracking or crushing of pipes			
	Spillway pipes:			x
	Decant system:			x
20	Trash racks clear and in place:			x
21	Discharge rate (gpm) = **0**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **None

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		DATE: 9/14/2022		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Final Pit Impoundment		DATE LAST INSPECTION: 6/23/2022		
SITE NAME: Pecoco Reservoir		LOCATION: SW¼ NW¼, Sec. 2, T5N, R87W		
MINE NAME: Peabody Sage Creek Mine		LOCATION: 7.1 mi. SE of Hayden, CO		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		OWNER'S REP.: Miranda Kawcak		
	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	YES	NO	N/A
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness = **None - Pit Impoundment**			
3	Compaction according to approved plan:	x		x
4	Burning (specify extent and location):		x	
5	Angle of slope: **5:1** upstream, **2:1** downstream	**Total = 7:1**		
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes		x	
	At natural hillside:		x	
	Over widespread areas:		x	
	From downstream foundation area:		x	
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:		x	
8	Cracks or scarps on slope:		x	
9	Sloughing or bulging on slope:		x	
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:		x	
13	*Water impounded against toe:		x	
14	Existing embankment freeboard (6.1' is normal) = **6.1'**			
15	_____ *Increase* _____ *Decrease in water level: Consistant discharge elev.*			
16	Cracks, bulging, or erosion on upstream face:		x	
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:			x
19	*Cracking or crushing of pipes			
	Spillway pipes:		x	
	Decant system:			x
20	Trash racks clear and in place:			x
21	Discharge rate (gpm) = **~50 GPM**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **None

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		DATE: 9/14/2022		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Diked Pond		DATE LAST INSPECTION: 6/23/2022		
SITE NAME: Lower Sump		LOCATION: SE¼, Sec. 34, T6N, R87W		
MINE NAME: Peabody Sage Creek Mine		LOCATION: 7.1 mi. SE of Hayden, CO		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		OWNER'S REP.: Miranda Kawcak		

	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	YES	NO	N/A
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness =			
3	Compaction according to approved plan:	x		
4	Burning (specify extent and location):		x	
5	Angle of slope:___upstream, ____downstream		N/A	
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes		x	
	At natural hillside:		x	
	Over widespread areas:		x	
	From downstream foundation area:		x	
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:		x	
8	Cracks or scarps on slope:		x	
9	Sloughing or bulging on slope:		x	
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:		x	
13	*Water impounded against toe:		x	
14	Existing embankment freeboard = Dicharging at spillway elev.			
15	_____ *Increase* ___*Decrease in water level: NO Change*			
16	Cracks, bulging, or erosion on upstream face:		x	
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:		x	
19	*Cracking or crushing of pipes			
	Spillway pipes:			x
	Decant system:			x
20	Trash racks clear and in place:	x		
21	Discharge rate (gpm) = **~40 gpm**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **None

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		DATE: 9/14/2022		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Incised Pond		DATE LAST INSPECTION: 6/23/2022		
SITE NAME: Truck Wash Settling Pond		LOCATION: NW¼ NE¼, Sec. 34, T6N, R87W		
MINE NAME: Peabody Sage Creek Mine		LOCATION: 7.1 mi. SE of Hayden, CO		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		OWNER'S REP.: Miranda Kawcak		
	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	YES	NO	N/A
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness = **N/A**			
3	Compaction according to approved plan:			x
4	Burning (specify extent and location):			x
5	Angle of slope:___upstream, ____downstream		N/A	
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes			x
	At natural hillside:			x
	Over widespread areas:			x
	From downstream foundation area:			x
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:			x
8	Cracks or scarps on slope:			x
9	Sloughing or bulging on slope:			x
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:			x
12	*Erosion of toe:			x
13	*Water impounded against toe:			x
14	Existing embankment freeboard (5.0' is normal) = Dry			
15	_____ *Increase* _____ *Decrease in water level:* **No Change**			
16	Cracks, bulging, or erosion on upstream face:			x
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:			x
19	*Cracking or crushing of pipes			
	Spillway pipes:		x	
	Decant system:			x
20	Trash racks clear and in place:	x		
21	Discharge rate (gpm) = **0**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **None

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		DATE: 9/14/2022		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Diked Pond		DATE LAST INSPECTION: 6/23/2022		
SITE NAME: Upper Sump		LOCATION: NW¼, Sec. 3, T5N, R87W7W		
MINE NAME: Peabody Sage Creek Mine		LOCATION: 7.1 mi. SE of Hayden, CO		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		OWNER'S REP.: Miranda Kawcak		

	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	YES	NO	N/A
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness =			
3	Compaction according to approved plan:	x		
4	Burning (specify extent and location):		x	
5	Angle of slope:___upstream, ____downstream		N/A	
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes		x	
	At natural hillside:		x	
	Over widespread areas:		x	
	From downstream foundation area:	x		
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:		x	
8	Cracks or scarps on slope:		x	
9	Sloughing or bulging on slope:		x	
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:		x	
13	*Water impounded against toe:		x	
14	Existing embankment freeboard = Discharging at spillway elev.			
15	_____ *Increase* ___*Decrease in water level:* **No Change**			
16	Cracks, bulging, or erosion on upstream face:		x	
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:			x
19	*Cracking or crushing of pipes			
	Spillway pipes:		x	
	Decant system:			x
20	Trash racks clear and in place:	x		
21	Discharge rate (gpm) = **~50 GPM**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **None

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		**DATE: 9/14/2022**		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Diked Pond		**DATE LAST INSPECTION: 6/23/2022**		
SITE NAME: Portal Sump #1 (upper north)		**LOCATION: NW¼, Sec. 3, T5N, R87W**		
MINE NAME: Peabody Sage Creek Mine		**LOCATION: 7.1 mi. SE of Hayden, CO**		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		**OWNER'S REP.: Miranda Kawcak**		
	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	**YES**	**NO**	**N/A**
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness = **12"**			
3	Compaction according to approved plan:	x		
4	Burning (specify extent and location):		x	
5	Angle of slope:___upstream, ____downstream		N/A	
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes			x
	At natural hillside:			x
	Over widespread areas:			x
	From downstream foundation area:			x
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:			x
8	Cracks or scarps on slope:			x
9	Sloughing or bulging on slope:			x
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:			x
13	*Water impounded against toe:			x
14	Existing embankment freeboard = **No Change**			
15	_____ *Increase* ___*Decrease in water level:*			
16	Cracks, bulging, or erosion on upstream face:			x
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:			x
19	*Cracking or crushing of pipes			
	Spillway pipes:		x	
	Decant system:			x
20	Trash racks clear and in place:			x
21	Discharge rate (gpm) = 0 **GPM**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **None

PERIODIC INSPECTION FORM: Water, Sediment, or Slurry Impoundments				
INSPECTOR'S NAME: Miranda Kawcak		DATE: 9/14/2022		
NPDES I.D. NO.: N/A				
FACILITY CONFIGURATION: Diked Pond		DATE LAST INSPECTION: 6/23/2022		
SITE NAME: Portal Sump #2 (Lower South)		LOCATION: NW¼, Sec. 3, T5N, R87W		
MINE NAME: Peabody Sage Creek Mine		LOCATION: 7.1 mi. SE of Hayden, CO		
MINE I.D. NO.: CMLRD Permit No. C-2009-087		OWNER'S REP.: Miranda Kawcak		
	CIRCLE OR WRITE IN APPROPRIATE RESPONSE:	YES	NO	N/A
1	Foundation preparation (removal of vegetation, stumps, topsoil:	x		
2	Lift thickness = **12"**			
3	Compaction according to approved plan:	x		
4	Burning (specify extent and location):		x	
5	Angle of slope:___upstream, ____downstream	N/A		
6	*Seepage (specify location, color, and approximate volume)			
	From underdrain pipes			x
	At isolated points on embanckement slopes			x
	At natural hillside:			x
	Over widespread areas:			x
	From downstream foundation area:			x
	"Boils" beneath stream or ponded water:		x	
7	Cracks or scarps on crest:			x
8	Cracks or scarps on slope:			x
9	Sloughing or bulging on slope:			x
10	*Major erosion problems:		x	
11	Surface movements in valley bottom or on hillside:		x	
12	*Erosion of toe:			x
13	*Water impounded against toe:			x
14	Existing embankment freeboard = **No Change**			
15	____ *Increase* ____*Decrease in water level:*			
16	Cracks, bulging, or erosion on upstream face:			x
17	Visible sumps or sinkholes in slurry surface:			x
18	*Clogging			
	Spillway channels and pipes:		x	
	Decant system:			x
	Diversion ditches:			x
19	*Cracking or crushing of pipes			
	Spillway pipes:		x	
	Decant system:			x
20	Trash racks clear and in place:			x
21	Discharge rate (gpm) = **0**			

Major adverse changes in these items could cause instability and should be reported to the Engineering Manager and Mine Superintendent for further evaluation. Adverse conditions noted in these items should normally be described (extextent, location, volume, etc.) here:* **Not Pumping