



July 21, 2025

Sheila Nordyke
P.O. Box 633
Holly, CO 81047

RE: Mayhew Pit, File No. M-2024-054, 112 Construction Materials Reclamation Permit Application, Preliminary Adequacy Review

Ms. Nordyke:

The Division of Reclamation, Mining and Safety (Division) has completed its preliminary adequacy review of your 112 Construction Materials Reclamation Permit Application submitted for the Mayhew Pit located in Bent County. All comment and review periods for the application began on April 23, 2025, when the application was called complete for filing purposes, and ended on June 18, 2025. The decision date for the application is currently set for October 22, 2025.

The Division's review consisted of comparing the application content with the requirements of the Mineral Rules and Regulations of the Colorado Mined Land Reclamation Board for the Extraction of Construction Materials. The Division has identified adequacy items in the application requiring clarification or additional information. These items are identified below under their respective exhibit heading and are numbered sequentially.

Application Form:

- 1) On page 1 of the form, under section 5.2, please state the anticipated end use of primary commodity(ies) to be mined.
- 2) On page 2 of the form, under section 9 – General Description, the elevation is stated as “1,156” with no units. Please provide the approximate elevation of the site in feet.
- 3) On page 2 of the form, under section 10 – Primary Mine Entrance Location, the latitude and longitude coordinates provided plot to the west of the proposed permit area, off County Road JJ. The primary mine entrance should be located at the proposed permit boundary where the main access road enters the mine site. Please provide coordinates for the proposed primary entrance to the mine site.

Exhibit A – Legal Description (Rule 6.4.1):

- 4) Please confirm the proposed acreage for the permit area. The submitted application states 61 acres, but after mapping the mine permit boundary coordinates provided in Exhibit A in Google Earth Pro, the area is approximately 51 acres. The described permit area must match the permitted acres provided on page 1, under section 3 of the application form. Therefore, please provide updated coordinates for



the proposed 61 acre permit boundary and ensure this boundary is reflected on all maps submitted with the application.

- a. If the correct acreage is 61 acres or less, then the operator will not need to submit an Amendment to the Permit Application. If the correct acreage is more than the initially proposed 61 acres, then the operator will need to submit an Amendment to the Permit Application and re-notice the public in accordance with Rule 1.8.
- 5) The coordinates provided for the primary mine entrance plot to the west of the proposed permit area, off County Road JJ. As stated above, the primary mine entrance should be located at the proposed permit boundary where the main access road enters the mine site. Please provide coordinates for the proposed primary entrance to the mine site. (Note this item can be disregarded if the entrance road off of County Road JJ is added to the permit area.)

Exhibit B – Index Map (Rule 6.4.2):

- 6) Please provide a revised Exhibit B that properly titles the 3 maps submitted on April 18, 2025 (see enclosed):
 - a. The map with the USGS topographic map layer needs to have a title related to Exhibit B. For example, if this is the first map for the exhibit, it could be titled “Exhibit B – 1. Topographic Map”.
 - b. The map with the current title of “Exhibit B – Index Map” needs to be retitled in order of the 3 Exhibit B maps. For example, if this map is after the topo map, it could be titled “Exhibit B – 2. Index Map”.
 - c. The aerial photo map with “Mayhew Pit #M2024-054” needs to be retitled in order of the 3 Exhibit B maps. For example, if this map is after the index map, it could be titled “Exhibit B – 3. Mine Entrance Map”.
- 7) In addition to the above items, please revise the following for the Exhibit B maps:
 - a. The USGS topographic map and the index map need to show the correct geometry of the proposed permit area which is shown on the aerial photograph map with the mine entrance coordinates.
 - b. The main entrance to the mine site should be located at the proposed permit boundary where the main access road enters the mine site. Therefore, please update the map with the coordinates to ensure the coordinates reflect the proposed primary entrance to the mine site. (Note this item can be disregarded if the entrance road off of County Road JJ is added to the permit area.)

Exhibit C – Pre-Mining and Mining Plan Map(s) of Affected Lands (Rule 6.4.3):

For the Pre Mining and Mining Plan Map 1 of 2:

- 8) Please show the permit area acreage and the applicant’s name.

- 9) Please show an appropriate scale bar and north arrow.
- 10) Please provide a date prepared and a qualified person's signature.
- 11) Please ensure the correct mine entrance is identified (at the proposed permit boundary). Additionally, please use a different symbol for the mine entrance than the one used for material stockpiles.
- 12) Please show the full extent of the proposed mining area. It is not clear whether the operation will mine just the area north of the existing pasture road or the entire proposed permit area.
- 13) Please show the proposed mine phasing discussed in Exhibit D.
- 14) Please include any proposed mining setbacks or buffers, such as the setback from the permit boundary. The Division does not advise mining up to the permit boundary as this is likely to cause off-site impacts, which would result in enforcement actions. Additionally, it may not provide sufficient space between the pit and the permit boundary to achieve reclamation.
- 15) Please show the proposed affected area, if different than the proposed permit area.

For the Pre Mining and Mining Plan Map 2 of 2:

- 16) This map appears to be a poorly reproduced copy, making it difficult to read the smaller text and identify certain map features. Please provide a more legible map, preferably the electronic version of the original file in pdf format. A hard copy of the larger format version of the map would also be acceptable. Please be advised, due to the poor legibility of this map, the Division may have additional adequacy items once a better map has been provided.
- 17) Please include the applicant's name.
- 18) Please include the scale bar that matches the map scale of 1" = 150'.
- 19) Please ensure the correct mine entrance is identified (at the proposed permit boundary).
- 20) Please show the following:
 - a. The proposed affected area, if different than the permit area.
 - b. The proposed permit acreage.
 - c. The proposed 20 acre mine phases, as described in Exhibit D.
 - d. The proposed location(s) of any fuel/oil storage.
 - e. The proposed location(s) of the truck scale and scale house and/or office.
 - f. Any proposed mining setbacks or buffers.
 - g. The proposed location of any parking or equipment storage areas.

- h. The structure type and owner name for all structures located inside the proposed permit area and within 200 feet of the proposed permit boundary, including the overhead electrical lines/utility poles that lie within 200 feet of the northwestern corner of the permit boundary. The map states “The site has no permanent man-made structures 200 feet of the Mayhew Pit mining area”. Please note, the map must show all structures located on and within 200 feet of the proposed permit area, and not the proposed mining area.
- 21) During the July 15, 2025 pre-operational inspection, the northwest permit boundary marker was not in the same location provided in Exhibit A – Legal Description (Rule 6.4.1) and not in the same location as the Mining Plan Maps. Please clarify the correct coordinates for the northwest permit boundary and whether this permit boundary corner is north or south of the overhead utility line.
 - a. Additionally, the permit boundary marker needs to be relocated to the position to match the correct coordinates and all maps submitted for the permit application.

Exhibit D – Mining Plan (Rule 6.4.4):

- 22) This exhibit includes coordinates for the main mine entrance which plot over 1.5 miles west of the proposed permit area. Additionally, these coordinates do not match the ones provided elsewhere in the application for the main mine entrance. Please correct these coordinates.
- 23) Please provide an approximate timetable to describe the following about the mining operation:
 - a. An estimate of the period of time required for each phase of mining.
 - b. Approximately how many phases of mining will be completed during the life of the mine. (Please ensure the mining plan map correlates with the mine phasing described in this exhibit.)
- 24) Please clarify if the proposed 20-acre mine Phase 1 is the proposed maximum disturbance at any time (to be associated with the required financial warranty), including all disturbances related to the operation (e.g., pits, waste rock areas, stockpile areas, processing areas, equipment storage areas, parking areas, facilities, roads). If the applicant is proposing to set the maximum allowed disturbance at 20 acres, please commit to submitting a Technical Revision to increase the maximum allowed disturbance and update the bond estimate accordingly prior to moving into another phase (or disturbing more than 20 acres). Please ensure the proposed maximum disturbance (and corresponding mine phase) in this exhibit correlates with the bond estimate provided in Exhibit L.
- 25) The exhibit explains reclamation will occur concurrently to mining. Please clarify if the Phase 1 processing area will continue to be utilized as such during mine Phase 2, and so forth. If not, please elaborate where materials processing will occur after the Phase 1 processing area can no longer be used due to reclamation.
- 26) The exhibit states that existing topsoil at the site is 0-6 inches in depth, overburden is an additional 1-3 feet in depth, and the aggregate material to be mined is anticipated to be an additional 10 feet in

depth. This would indicate a maximum mining depth of approximately 14 feet. Please confirm the maximum mining depth that is anticipated for the operation.

- 27) Please provide the seed mixture that will be used to stabilize any topsoil stockpiles.
- 28) Please commit to storing any salvaged topsoil and overburden in separate stockpiles.
- 29) The mining plan map shows an access road from County Road JJ to the proposed permit area. Based on the pre-operational inspection conducted on July 15, 2025, the entrance road that runs from County Road JJ to the permit boundary will need to be upgraded for mining and therefore needs to be included in the affected lands acreage.
 - a. Please add this road to the proposed permit area and update the application form, and all applicable exhibits and maps accordingly.
 - b. Due to the current uncertainty with the proposed permit acreage (either 51 acres or 61 acres), it is not clear whether adding the access road will increase the proposed permit acreage to more than 61 acres. Please clarify if adding the acreage for the access road will increase the total proposed permit acreage to more than 61 acres. If so, then the operator needs to submit an Amendment to the Permit Application in accordance with Rule 1.8.
 - c. Please provide a description of the existing pasture road, including its approximate dimensions and surfacing, and describe how the road will be upgraded to support the mining operation (e.g., widened, surfaced, stormwater management structures added).
- 30) Please provide the approximate dimensions of all proposed roads to be constructed for the operation and describe how they will be surfaced, if at all (e.g., paved, graveled). Please ensure the reclamation of any roads not proposed to remain for reclamation is addressed in Exhibit E and also in the Exhibit L bond estimate.
- 31) Please provide a description, including the approximate dimensions, of any proposed structures that will require demolition and/or removal for reclamation (e.g., scale, buildings with concrete foundations, conveyors with footings, stormwater management structures).
- 32) Please clarify if the applicant is proposing the affected area (all land to be disturbed at some point throughout the life of mine) be set equal to the permit area of 61 acres.
- 33) Please state if this will be an intermittent operation, operating for less than 180 days per year.
- 34) Please include a site-specific weed management plan, either in this exhibit or another applicable exhibit.

Exhibit E – Reclamation Plan (Rule 6.4.5):

- 35) The exhibit states that 4 inches of topsoil will be placed on affected surfaces. Please explain how replacing only 4 inches of topsoil will be sufficient to achieve successful revegetation at the site.

Based on the Division's experience, a topsoil replacement depth of less than 6 inches is typically not sufficient to achieve successful revegetation.

- 36) Please provide the type of manure that will be used and the application method.
- 37) Please confirm the applicant is proposing to be bonded only for Phase 1 (20 acres) disturbance at this time. Additionally, please provide a description of the size and location of each area requiring reclamation under this scenario, including:
 - a. The approximate maximum acreage of disturbance requiring retopsoiling and/or revegetation.
 - b. The approximate maximum acreage of compacted areas (e.g., pit floor, roads, temporary stockpile and/or equipment storage areas) requiring ripping.
- 38) The exhibit states "if necessary, surfaces will be roughened prior to seeding", please elaborate if this will be completed using a ripper, or another piece of equipment.
- 39) Please describe how any structures constructed for the operation (e.g., scale, buildings with concrete foundations, conveyors with footings, stormwater management structures) will be reclaimed, and describe any structures that will remain after reclamation.
- 40) Please clarify if the road within the permit area will remain for reclamation. If it will remain, please include the approximate dimensions and type of surfacing if applicable (e.g., gravel, paved). Please provide this information in this exhibit and ensure the Exhibit F reclamation plan map shows the location of any roads proposed to remain for reclamation. If the landowner later requests changes to the final road configurations, these changes can be proposed through a Technical Revision.
- 41) The exhibit states that the operator will utilize backfilling methods. Please provide the approximate volume of material needed (in cubic yards) to backfill highwalls to the proposed 3H:1V gradient. Additionally, please confirm there will be a sufficient amount of overburden on site to complete this task. If the applicant is proposing to use cut and fill methods to grade highwalls (rather than backfilling with overburden), an appropriate buffer from the permit boundary must be maintained so there is enough space within the permit area to achieve this. This buffer must be specified on the Exhibit C maps. As an example, if the applicant is proposing a maximum highwall height of 14 feet, then a minimum 42 foot buffer from the permit boundary would be needed to achieve a 3H:1V final slope gradient, if cut and fill methods are utilized. Please specify the method(s) that will be used for grading highwalls.

Exhibit F – Reclamation Plan Map (Rule 6.4.6):

- 42) Please provide a revised reclamation plan map that shows the proposed topography of the area with contour lines of sufficient detail to portray the direction and rate of slope of all reclaimed lands.
- 43) Please ensure the revised reclamation plan map includes the following:

- a. A legend describing all outlines and symbols shown on the map, including the permit boundary, mine entrance, what the red dashed line and green square represent, and the road (and any other structures) to remain after reclamation.
 - b. The applicant's name and the site name.
 - c. A scale bar and a north arrow.
 - d. The date prepared and a qualified person's signature.
- 44) The submitted map says "Highwall Area Reclaimed with 1:1 Slope". Please correct this to read "Highwall Area Reclaimed with 3H:1V Slope" based on the Exhibit E – Reclamation Plan.
- 45) Please indicate the areas that will be revegetated for reclamation.
- 46) Please ensure the correct mine entrance is identified (at the proposed permit boundary).

Exhibit G – Water Information (Rule 6.4.7):

- 47) The Exhibit D – Mining Plan states that water for dust suppression will be hauled onsite if necessary; however, this exhibit states the mining operation is not expected to have any project water requirements. Please clarify if water will be utilized by the operation (e.g., dust suppression, material washing).
- 48) Please provide an estimate of the project water requirements, including flow rates and annual volumes for the development, mining, and reclamation phases of the project, as required by Rule 6.4.7(3).
- 49) Please indicate the projected amount from each of the sources of water to supply the project water requirements for the mining operation and reclamation, as required by Rule 6.4.7(4).
- 50) Given the location of the proposed operation along drainages to Graveyard Creek and the Arkansas River, please describe how runoff from disturbed areas, piled material, and operating surfaces will be managed to protect against surface water pollution both during and after the operation.

Exhibit H – Wildlife Information (Rule 6.4.8):

- 51) Colorado Parks and Wildlife (CPW) submitted a comment letter on May 2, 2025 (see enclosed), which included recommendations pertaining to the following:
- a. Minimizing potential impacts to the plugged and abandoned SANTA FE TRAIL #1-34 oil and gas well (API 05-011-06174) located within the southern project boundary, which may be daylighted or structurally compromised by mining activities.
 - b. Avoiding or minimizing impacts to mule deer.
 - c. Avoiding or minimizing impacts to golden eagles and other migratory birds.
 - d. Limiting impacts from fencing (perimeter or internal).
 - e. Limiting impacts from project lighting.
 - f. Topsoil seeding and weed management.

Please provide a response to CPW's comments, committing to the applicable recommendations, and updating the mining and reclamation plans as needed to incorporate their recommendations. For example, the mining plan may need to be updated to limit mining activities adjacent to the plugged and abandoned SANTA FE TRAIL #1-34 well. Additionally, the mining plan should be updated to include a commitment to conduct preconstruction surveys to identify active nests, and if nests are discovered, to ceasing all work and contacting CPW and the U.S. Fish and Wildlife Service (USFWS) for further guidance.

Exhibit J – Vegetation Information (Rule 6.4.10):

- 52) In addition to the present vegetation types, please include quantitative estimates of cover and height for the principal species in each life-form represented (i.e., tall shrubs, low shrubs, grasses, forbs) to address the requirements of Rule 6.4.10(1)(a).
- 53) Please describe the relationship of present vegetation types to soil types, per the requirements of Rule 6.4.10(1)(b). Alternatively, this information can be presented on a map.
- 54) This exhibit states the proposed mining area is characterized as rangeland. However, the application proposes a post-mining land use of pastureland. The reclamation goals for these two types of land use can differ slightly, particularly with the revegetation and management practices. Therefore, please explain why the applicant chose pastureland as the post-mining land use, rather than rangeland, which is the existing land use.

Exhibit L – Reclamation Costs (Rule 6.4.12):

- 55) Under the Grading Highwalls task, please provide the approximate height and linear length of the proposed active highwall and the approximate volume (in cubic yards) of material required to backfill the highwall slope to 3H:1V.
- 56) Under the Placing Topsoil task, please provide the approximate acreage that will require retopsoiling, the replacement depth, and the approximate volume (in cubic yards) of topsoil needed.
- 57) Please provide the approximate haul distance (in feet) from the topsoil and overburden stockpiles to the pit when undergoing reclamation.
- 58) Please add a task for ripping compacted areas (e.g., pit floor, roads, stockpiling areas, processing areas, equipment storage areas), including the approximate acreage to be ripped.
- 59) Under the Seeding task, please change broadcasting to drill-seeding, which is the stated method in the Exhibit E – Reclamation Plan.
- 60) Please provide a manure task under seeding that includes the application rate (in tons per acre) and method.

- 61) If any structures will require reclamation (e.g., scale, stormwater management structures, buildings with concrete foundations, conveyors with footings), please ensure costs for demolishing and/or removing these structures are included in the estimate.
- 62) Please specify the closest location to the proposed operation which rents out the type of equipment that could be used to reclaim the site in the event the state had to complete the reclamation.
- 63) Please ensure the bond estimate correlates with the proposed maximum disturbance in Exhibit D.
- 64) Please ensure the mining plan map, which correlates with the proposed reclamation bond, includes all necessary information in order for the Division to calculate the bond, including proposed topsoil and overburden stockpiles, any proposed material stockpiles to be used for reclamation backfill, estimated acreages for each disturbance area which correlates with the information provided in this exhibit, etc. Alternatively, the applicant may wish to provide this information on a separate Exhibit L map which correlates with the reclamation bond estimate, particularly if the applicant is proposing a phased mining/bond approach.

Exhibit M – Other Permits and Licenses (Rule 6.4.13):

- 65) The exhibit only includes “Special Use Permit” and “Air Quality Emissions Permit”. Are there no other permits, licenses, or approvals required for the proposed operation? For example, similar applications typically include an APEN from the Colorado Department of Public Health and Environment’s (CDPHE), a Stormwater Discharge permit from the CDPHE, Water Quality Control Division, and a well permit and/or Substitute Water Supply Plan from the Division of Water Resources. Please ensure this exhibit includes a list of all permits, licenses, and approvals that are required for the proposed operation.
- 66) Please add the name of the agency from which each of the listed permits, licenses, and approvals will need to be obtained.

Exhibit S – Permanent Man-made Structures (Rule 6.4.19):

- 67) This exhibit states there are no permanent, man-made structures within 200 feet of the affected lands. However, according to the Exhibit C – Pre Mining and Mining Plan Map 2 of 2 and aerial imagery of the site available in Google Earth Pro, there are structures located on and within 200 feet of the proposed permit area, including fences, roads, utility lines, and possibly ditches. Given the poor legibility of the map referenced above, the Division is unable to identify all the applicable structures. Please revise this exhibit to include a list of all structures located within the proposed permit area and also within 200 feet of the proposed permit area, including the name of the owner(s) of each structure.
- 68) Please provide copies of any structure agreements that have been obtained by the applicant (fully executed by the applicant and structure owner). Note that for utilities (e.g. power lines, water lines), the applicant may supply a notarized letter, on utility letterhead, from the owner(s) of the utility that the mining and reclamation activities, as proposed, will have “no negative effect” on their utility.

- 69) For any structures that an agreement could not be obtained:
- a. Please provide copies of the structure agreement forms sent to each structure owner (see enclosed form). This form must be fully filled out and executed by the applicant (including the structure list, the Certification section, and the Notary for Permit Applicant section) prior to sending it to the structure owner(s). Additionally, proof that each structure agreement form was delivered to the appropriate owner(s) must be provided, either by submitting return receipts of a Certified mailing or proof of personal service.
 - b. Please provide an appropriate engineering evaluation that demonstrates that such structure(s) shall not be damaged by activities occurring at the mining operation.
- 70) For any structures that will need to be relocated or removed for the mining operation, please provide a letter from the structure owner acknowledging their acceptance of these activities.

Additional Items:

- 71) On May 2, 2025, the Division received comments on the application from the CPW (see enclosed). Please inform the Division of how the applicant intends to address any concerns expressed by CPW.
- 72) On May 14, 2025, the Division received comments on the application from the Division of Water Resources (DWR; see enclosed). Please inform the Division of how the applicant intends to address any concerns expressed by DWR.
- 73) Pursuant to Rule 1.6.2(e), please submit proof that a copy of the newspaper notice required by Rule 1.6.2(1)(d) was sent to all owners of record of the surface and mineral rights of the affected land and the owners of record of all land surface within 200 feet of the boundary of the affected lands (including all easement owners located on the affected land and within 200 feet of the boundary of the affected lands). Proof of notice may be by submitting return receipts of a Certified Mailing or by proof of personal service.
- 74) Pursuant to Rule 1.6.2(1)(c) and (2), any changes or additions to the application on file in our office must also be reflected in the public review copy which was placed with the local County Clerk and Recorder. Pursuant to Rule 6.4.18, you must provide our office with an affidavit or receipt indicating the date on which the revised application/adequacy response was placed with the local County Clerk and Recorder.

This concludes the Division's preliminary adequacy review of your application. The application decision date is currently set for **October 22, 2025**. If additional time is needed to respond, you must submit an extension request to our office prior to the decision date. Please note, your application may be determined as inadequate and the application denied if all adequacy items identified by the Division are not addressed to the satisfaction of the Division by the decision date.

If you have any questions, you may contact me by telephone at 720-793-3031, or by email at ursula.armstrong@state.co.us.

Sincerely,



Ursula Armstrong
Environmental Protection Specialist

Encl(s): Exhibit B Maps received on April 18, 2025
Comment Letter from Colorado Parks and Wildlife, received on May 2, 2025
Comment Letter from Division of Water Resources, received on May 14, 2025
Structure Agreement Form

Cc: Mark Carrigan, Riverside Aggregates, LLC
Amy Eschberger, DRMS

Mayhew Pit #M2024-054

ArcGIS ▾ USA Topo Maps-Colorado

Details

Add

Basemap

Save

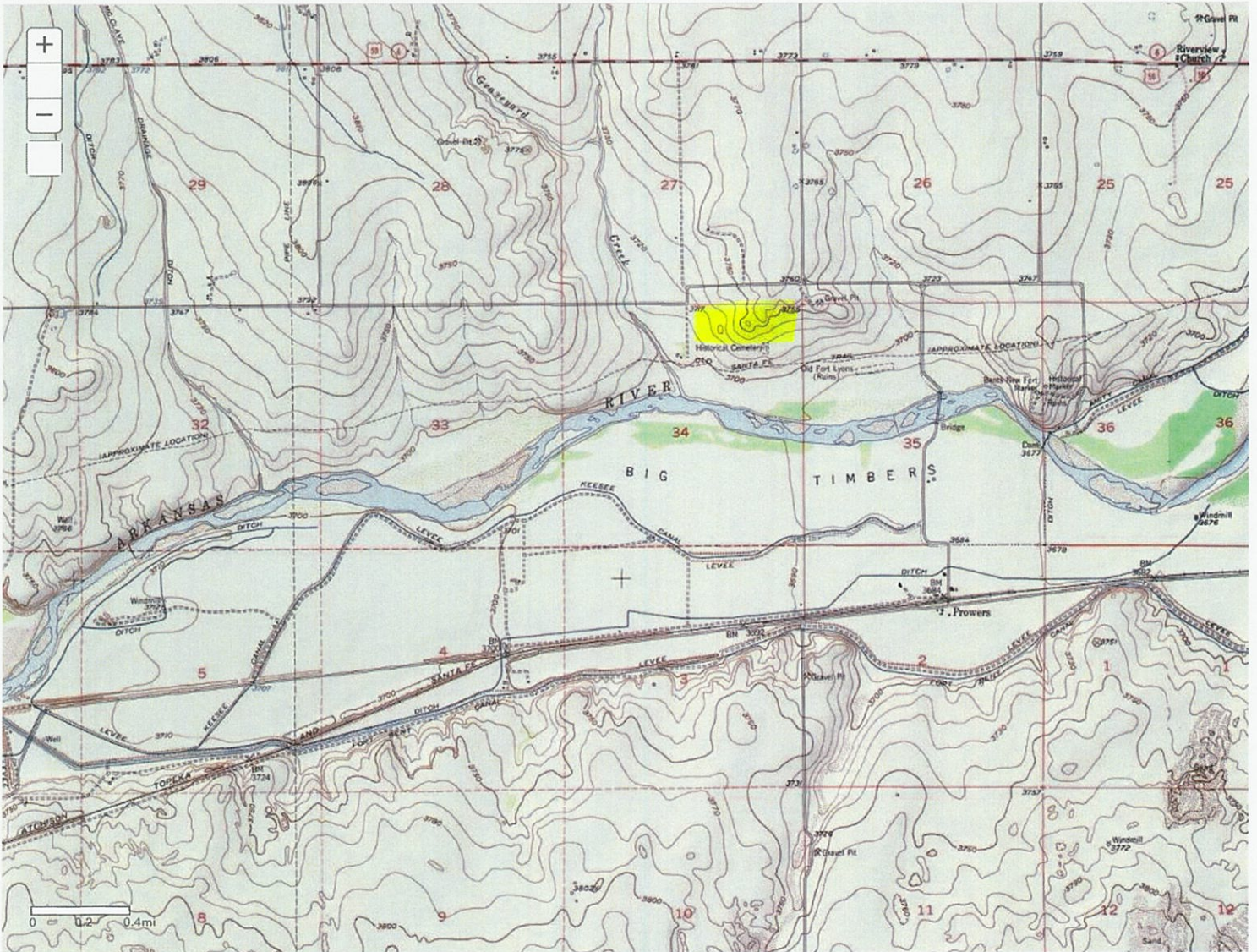
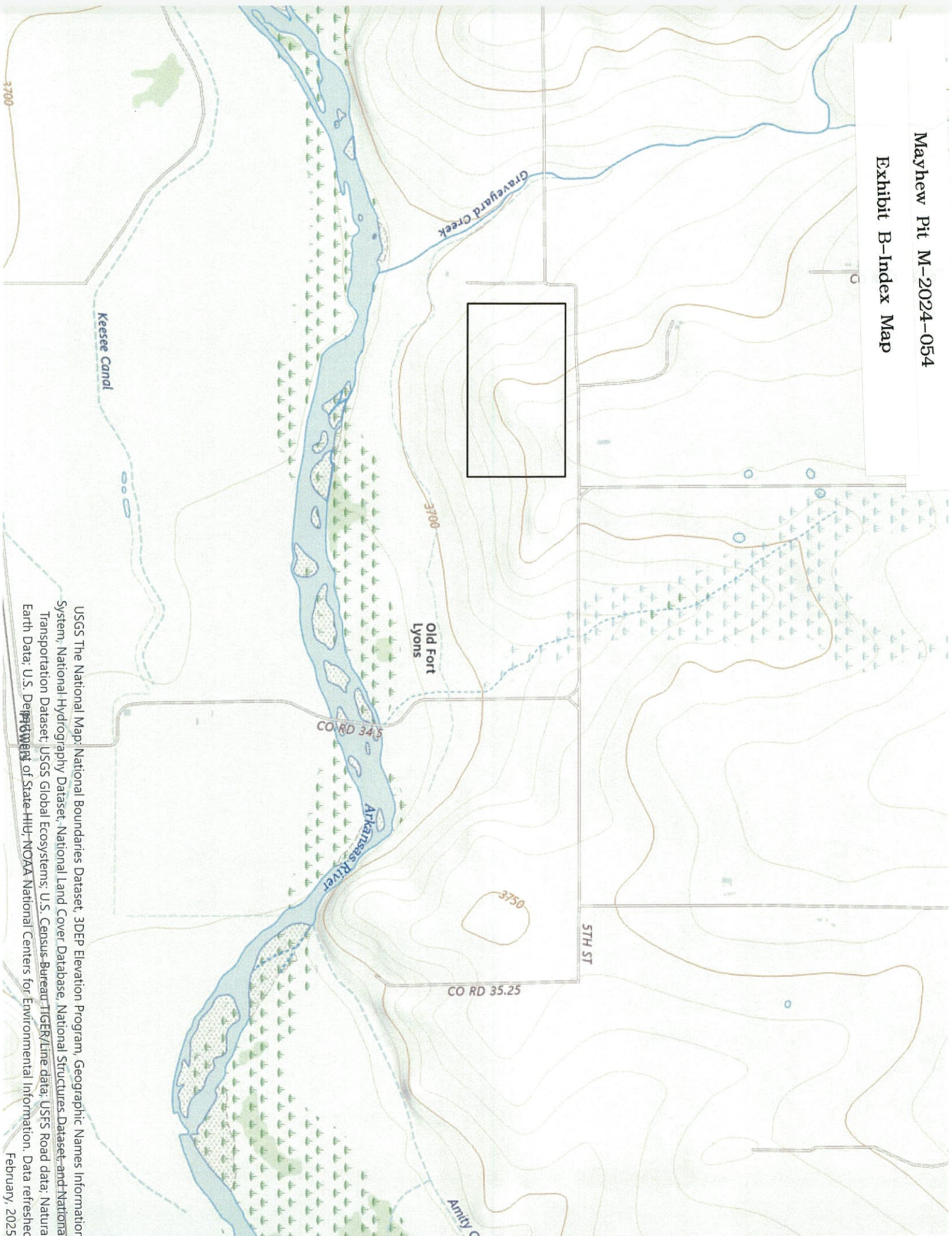


Exhibit B-Index Map



Mayhew Pit #M2024-054

Mine Entrance off Bent County Road 33 5/10
Existing Road is 513' X 12' = .1413 Acres
Road is established and no improvements necessary

38.099943N 102.787137W

County Road JJ

Old Fort Lyons

County Road JJ

County Road 34

County Road 33 5/10

Gravyard Creek





COLORADO

Parks and Wildlife

Department of Natural Resources

Southeast Region
4255 Sinton Road
Colorado Springs, CO 80907
P 719.227.5200

April 29, 2025

Ursula E. Armstrong
Colorado Division of Reclamation, Mining, and Safety
1313 Sherman St., Room 215, Denver, Colorado 80203
ursula.armstrong@state.co.us

Subject: Consideration of 112c Construction Materials Reclamation Permit Application -
Mayhew Pit, File No. M-2024-054

Dear Ms. Armstrong,

Colorado Parks and Wildlife (CPW) appreciates the opportunity to provide comments on the proposed Mayhew Pit, File No. M-2024-054, in Bent County, Colorado. CPW reviewed the application package to evaluate potential impacts to wildlife resources and recommends strategies to avoid, minimize, and mitigate impacts from the proposed development. Our primary wildlife concerns include potential effects on sensitive aquatic habitats, Mule Deer Severe Winter Range, and migratory bird and raptor nesting areas. This letter outlines CPW's statutory responsibilities, our understanding of the project, anticipated wildlife impacts, and recommended conservation measures.

CPW'S STATUTORY RESPONSIBILITY

CPW has statutory responsibility to manage all wildlife species in Colorado and encourages protection of wildlife habitats through responsible energy development and land-use planning. Protecting core wildlife areas, fisheries, big game winter ranges, seasonal migration corridors, and sensitive nesting sites is critically important. CPW recommends evaluating projects carefully to avoid, minimize, or mitigate impacts to sensitive wildlife habitats, federally and state-listed species, big game species (including migration corridors, winter range, and parturition areas), sensitive ground-nesting birds, and raptors sensitive to development. Additionally, the U.S. Fish and Wildlife Service (USFWS) should be consulted regarding federally listed threatened and endangered species potentially present at the site.

UNDERSTANDING OF THE PROJECT

CPW understands Riverside Aggregates, LLC proposes a 61-acre surface mining operation to extract landscape aggregate, gravel, and road base within Section 34, Township 22 South, Range 48 West, Bent County, Colorado. The privately-owned pastureland parcel will be accessed from Bent County Road JJ and 5th Street (38.099856, -102.787136). Mining operations are proposed in phased 20-acre increments, with concurrent reclamation returning



Jeff Davis, Director, Colorado Parks and Wildlife

Parks and Wildlife Commission: Dallas May, Chair · Richard Reading, Vice-Chair · Karen Bailey, Secretary · Jessica Beaulieu
Marie Haskett · Tai Jacober · Jack Murphy · Gabriel Otero · Murphy Robinson · James Jay Tutchton · Eden Vardy

disturbed areas to pastureland. Topsoil will be stockpiled along the western project boundary and seeded to minimize erosion. The project duration is anticipated at 10-15 years, depending on available resources and economic conditions.

POTENTIAL IMPACTS TO WILDLIFE RESOURCES

High Priority Habitats (HPH) are sensitive areas identified using CPW's Species Activity Mapping (SAM) database, which incorporates scientific data and wildlife observations. These publicly available maps inform environmental assessments and planning. Additionally, CPW considers Species of Greatest Conservation Need (SGCN) identified in the State Wildlife Action Plan (SWAP). SGCN are species experiencing population declines, habitat threats, or ecological vulnerabilities requiring proactive conservation. These may include federally or state-listed threatened, endangered, or special-concern species.

The southern boundary of the proposed project area is 0.27 miles north of the Arkansas River, and the western boundary is approximately 0.30 miles east of Graveyard Creek. Both watersheds are designated Aquatic Native Species Conservation Waters (HPH). The project area also lies within Mule Deer Severe Winter Range (HPH).

Several SGCN may be present, including avian, mammalian, and aquatic species. Avian species include American Bittern, Bald Eagle, Black Tern, Brewer's Sparrow, Burrowing Owl, Cassin's Sparrow, Ferruginous Hawk, Golden Eagle, Grasshopper Sparrow, Lark Bunting, Least Tern, Lewis's Woodpecker, Long-billed Curlew, Mountain Plover, Northern Bobwhite, Northern Harrier, Piping Plover, Prairie Falcon, Swainson's Hawk, Veery, and Western Snowy Plover. Aquatic species likely to occur in nearby habitats include Plains Leopard Frog, as well as native and sportfish species. Mammalian SGCN include big game species and native bats, such as Northern Hoary Bat.

CONSERVATION RECOMMENDATIONS

Native Fish and Aquatic Species Conservation Waters

Native Fish and Aquatic Species Conservation Waters include watersheds containing species under population conservation and recovery management. In eastern plains parcels, native fish species of concern include the Arkansas darter, brassy minnow, common shiner, flathead chub, Iowa darter, northern and southern red-belly dace, plains minnow, plains orangethroat darter, plains topminnow, stonecat, and suckermouth minnow. These fish are state-listed as species of special concern, threatened, or endangered.

Additionally, seasonally wet areas adjacent to Graveyard Creek and the Arkansas River provide crucial breeding and foraging habitat for amphibians such as the Plains Leopard Frog.

Because the proposed project area is greater than 500 feet from these watersheds, direct impacts to native aquatic species is unlikely to result from mining operations. However, the plugged and abandoned SANTA FE TRAIL #1-34 oil and gas well (API 05-011-06174), within the southern project boundary, may be daylighted, exposed, or structurally compromised by mining activities. To minimize potential impacts, CPW recommends:

- Limit development and mining adjacent to the plugged and abandoned SANTA FE TRAIL #1-34 well (38.096900, -102.782360). If portions of the cut and capped well are



Jeff Davis, Director, Colorado Parks and Wildlife

Parks and Wildlife Commission: Dallas May, Chair · Richard Reading, Vice-Chair · Karen Bailey, Secretary · Jessica Beaulieu
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daylighted as part of operations, coordinate with the Energy and carbon Management Commission (ECMC) to ensure structural integrity of the retired asset is not compromised.

- Implement erosion and sediment control measures to prevent deposition into waterways.

Mule Deer Severe Winter Range and Mule Deer Winter Concentration Area

Mule Deer Severe Winter Ranges are defined as the parts of the overall winter range where 90% of the population is located when the annual snowpack is at its maximum and/or temperatures are at their minimum during the two worst winters out of ten. Disturbances during winter can lead to poor body condition and displacement to suboptimal habitats, reducing adult survival and neo-natal survival rates (Ciuti et al. 2012).

The phased approach of the project proposal specifies that the site will be developed in 20-acre units with reclamation occurring following extraction completion in each unit. CPW supports this phased approach and believes that ongoing reclamation of mining units not in exploration and development phases will help minimize impacts to mule deer populations in the area.

To avoid or minimize impacts to mule deer, CPW recommends the following:

- Avoid initial ground disturbance between December 1st and April 30th to protect mule deer during critical winter periods.
- Maintain phased reclamation to reduce habitat disruption.

Golden Eagle, Migratory Birds, and Raptors

The project location is identified as suitable habitat for Golden Eagles, Bald Eagles, and other migratory birds. All migratory birds are protected under the Migratory Bird Treaty Act, and the removal or disturbance of any migratory bird nest would require consultation with CPW and the U.S. Fish and Wildlife Service (USFWS) prior to disturbance.

No active nests are mapped within the proposed project area, however, CPW recommends the following measures to avoid or minimize impacts to golden eagles and other migratory birds:

- Conduct preconstruction surveys to identify active nests. If nests are present, avoid construction during the breeding season (March 15th to August 31st).
- Consult with the U.S. Fish and Wildlife Service (USFWS) to ensure compliance with the Migratory Bird Treaty Act and Bald and Golden Eagle Act.
- For raptors, CPW recommends similar measures, including preconstruction surveys, adherence to recommended buffer distances, and seasonal restrictions outlined in CPW's Recommended Buffer Zones and Seasonal Restrictions for Colorado Raptors. If nests are discovered during construction, work should cease, and CPW and USFWS should be consulted for further guidance.



Jeff Davis, Director, Colorado Parks and Wildlife

Parks and Wildlife Commission: Dallas May, Chair · Richard Reading, Vice-Chair · Karen Bailey, Secretary · Jessica Beaulieu
Marie Haskett · Tai Jacober · Jack Murphy · Gabriel Otero · Murphy Robinson · James Jay Tutchton · Eden Vardy

ADDITIONAL RECOMMENDATIONS

Fencing

If fencing (perimeter or internal) is erected during or after the project, it should allow free passage for wildlife. Fencing plans should avoid woven-wire fences, which can trap or restrict wildlife movement. Instead, CPW recommends:

- Using three- or four-strand smooth-wire fencing, with the bottom strand at least 17 inches above ground level and the top strand no higher than 42 inches.
- Install double stays between posts for added flexibility.
- Please refer to CPW's "[Fencing with Wildlife in Mind](#)" brochure for additional details.

Lighting

Nighttime artificial lighting can adversely affect wildlife species of all sizes, from small macroinvertebrates to large mammals. Impacts include disorientation, increased predation risks, and behavioral disruptions, particularly for nocturnal species. To limit potential impacts of project lighting, CPW recommends:

- Install down-shielded fixtures to minimize light pollution.
- Use warm-colored lighting (2200-2700 Kelvin) with longer wavelengths to reduce ecological impacts, as suggested by the U.S. Fish and Wildlife Service and the American Bird Conservancy.
- Dim lights when possible to reduce disturbance.

Reclamation

CPW appreciates the inclusion of NRCS seed mixes in the applicant's reclamation plan. The Mining Plan and Reclamation Plan of the permit application indicates that topsoil will be stockpiled at the western extent of the project boundary and that stockpiles will be seeded "as needed" to minimize the potential for erosion. CPW recommends:

- Seed all topsoil stockpiles that will be present for greater than 45 days to minimize erosion as well as the colonization of invasive and state listed noxious weeds.
- Develop and implement a Weed Management Plan to control for invasive and State-listed Noxious Weeds.



Jeff Davis, Director, Colorado Parks and Wildlife

Parks and Wildlife Commission: Dallas May, Chair · Richard Reading, Vice-Chair · Karen Bailey, Secretary · Jessica Beaulieu
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CPW appreciates this opportunity to review the proposed Mayhew Pit project. Provided that CPW recommendations are adopted before and during mine operation, CPW believes impacts to wildlife from the proposed mineral development are likely to be temporary in nature and highest during the time of disturbance. If the timing or scope of this project changes and/or if you have any questions, comments, or concerns, please contact Carolyn Craveiro de Sá at 719-747-3838 or carolyn.craveirodesa@state.co.us.

Sincerely,



Todd Marriott
Area Wildlife Manager - Area 12
P 719-336-6603 | C 719-688-9241
2500 South Main, Lamar, CO 81052
todd.marriott@state.co.us

Cc: Logan Wilkins, District Wildlife Manager, logan.wilkins@state.co.us
Carolyn Craveiro de Sá, SE Land Use Specialist- carolyn.craveirodesa@state.co.us





Response to Reclamation Permit Application Consideration

DATE: May 14, 2015
TO: Ursula Armstrong, DRMS
CC: Division 2 Office; District 67 Water Commissioners
FROM: Katharine Anderson, E.I.T.
RE: Mayhew Pit, File No. M-2024-054
Operator: Riverside Aggregates, LLC
Contact: Mark Carrigan, (719) 336-3313
Sec. 34, Twp. 22S, Rng. 48W, 6th P.M., Bent County

CONDITIONS FOR APPROVAL

- ☒ The proposed operation does not anticipate exposing groundwater. Therefore, exposure of ground water must not occur during or after mining operations.
- ☒ If storm water is contained on-site, the applicant should be aware that, unless the storm water detention structures can meet the requirements of a “storm water detention and infiltration facility” as defined in section 37-92-602(8), Colorado Revised Statutes, the structure may be subject to administration by this office. The applicant should review DWR’s *Administrative Statement Regarding the Management of Storm Water Detention Facilities and Post-Wildland Fire Facilities in Colorado* (available at: <https://dnrweblink.state.co.us/dwr/electronicfile.aspx?docid=3576581&dbid=0>) to ensure that the notification, construction and operation of the proposed structure meets statutory and administrative requirements. The applicant is encouraged to use *Colorado Stormwater Detention and Infiltration Facility Notification Portal*, located online at: <https://maperture.digitaldataservices.com/gvh/?viewer=cswdif>, to meet the notification requirements.

COMMENTS: There was no Exhibit G for Water Information included in the application, but the application stated the mining was only going to be surface mining. No groundwater may be exposed at the mining site, used for washing, dust suppression, or any other mining uses.

The East Lead Water Commissioner in district 67 is Brandy Cole (Brandy.Cole@state.co.us), and the Ground Water Commissioner in district 67 is Kain DiRezza (Kain.Direzza@state.co.us).



An example Structure Agreement which meets the requirements of the Statutes is shown below.

Structure Agreement

This letter has been provided to you as the owner of a structure on or within two hundred (200) feet of a proposed mine site. The State of Colorado, Division of Reclamation, Mining and Safety (“Division”) requires that where a mining operation will adversely affect the stability of any significant, valuable and permanent man-made structure located within two hundred (200) feet of the affected land, the Applicant shall either:

- a) Provide a notarized agreement between the Applicant and the Person(s) having an interest in the structure, that the Applicant is to provide compensation for any damage to the structure; or
- b) Where such an agreement cannot be reached, the Applicant shall provide an appropriate engineering evaluation that demonstrates that such structure shall not be damaged by activities occurring at the mining operation; or
- c) Where such structure is a utility, the Applicant may supply a notarized letter, on utility letterhead, from the owner(s) of the utility that the mining and reclamation activities, as proposed, will have “no negative effect” on their utility. (*Construction Materials Rule 6.3.12 and Rule 6.4.19 & Hard Rock/Metal Mining Rule 6.3.12 and Rule 6.4.20*)

The Colorado Mined Land Reclamation Board (“Board”) has determined that this form, if properly executed, represents an agreement that complies with Construction Materials Rule 6.3.12(a), Rule 6.4.19(a), and C.R.S. § 34-32.5-115(4)(e) and with Hard Rock/Metal Mining Rule 6.3.12(a), Rule 6.4.20(a), and C.R.S. § 34-32-115(4)(d). This form is for the sole purpose of ensuring compliance with the Rules and Regulations and shall not make the Board or Division a necessary party to any private civil lawsuit to enforce the terms of the agreement or create any enforcement obligations in the Board or the Division.

The following structures are located on or within 200 feet of the proposed affected area:

- 1. _____
- 2. _____
- 3. _____
- 4. _____
- 5. _____

(Please list additional structures on a separate page)

CERTIFICATION

The Applicant, _____ (print applicant/company name),
by _____ (print representative's name), as _____ (print
representative's title), does hereby certify that _____ (structure owner) shall
be compensated for any damage from the proposed mining operation to the above listed structure(s)
located on or within 200 feet of the proposed affected area described within Exhibit A, of the Reclamation
Permit Application for _____ (operation name),
File Number M-____-_____.

***This form has been approved by the Colorado Mined Land Reclamation Board pursuant to its
authority under the Colorado Land Reclamation Act for the Extraction of Construction Materials and
the Colorado Mined Land Reclamation Act for Hard Rock, Metal, and Designated Mining Operations.
Any alteration or modification to this form shall result in voiding this form.***

NOTARY FOR PERMIT APPLICANT

ACKNOWLEDGED BY:

Applicant _____ Representative Name _____

Date _____ Title _____

STATE OF _____)
) ss.
COUNTY OF _____)

The foregoing was acknowledged before me this ____ day of _____, 20____, by
_____ as _____ of _____.

Notary Public My Commission Expires: _____

NOTARY FOR STRUCTURE OWNER

ACKNOWLEDGED BY:

Structure Owner _____ Name _____

Date _____ Title _____

STATE OF _____)

) ss.

COUNTY OF _____)

The foregoing was acknowledged before me this ____ day of _____, 20____, by
_____ as _____ of _____.

_____ My Commission Expires: _____

Notary Public