

NATURAL FEATURES AND WETLANDS REPORT

for

U-Haul at Falcon Development Project El Paso County, CO

PREPARED FOR:

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1.0 INTRODUCTION

AMERCO Real Estate Co./U-Haul International ("Applicant") has retained Bristlecone Ecology, LLC ("B.E." or "Agent") to perform an environmental assessment and routine wetland delineation and prepare a Natural Features and Wetlands Report for the proposed U-Haul at Falcon development project ("Project"), located in unincorporated El Paso County (EPC), Colorado. Contact information for both Applicant and Agent is provided below:

Applicant

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1.1. Purpose and Goals

The purpose of this Natural Features and Wetlands Report is to find and document natural resources and existing site conditions in order to identify potential environmental constraints that may affect the development of the Project. In addition, a goal of this report is to provide guidance on regulatory issues that could influence site development in accordance with development planning and application submittals in EPC. Environmental resources and constraints addressed include:

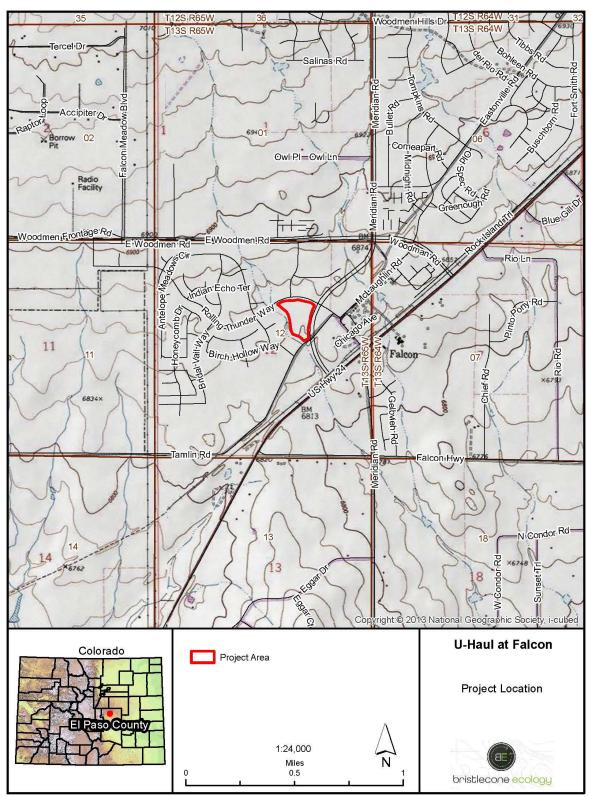
- Vegetation
- Soils
- Aquatic Resources/Wetlands/Waters of the U.S. (WOTUS)
- Wildfire Hazard
- Flood Hazard
- Wildlife Impacts
- Federal and State Listed Threatened and Endangered (T&E) Species

1.2. Project Description and Site Location

The Project will involve construction of a U-Haul rental facility on approximately 11.82 acres northwest of U.S. Highway 24 in the Town of Falcon, Colorado. The Project will include two buildings, one including a loading ramp and dock, roadways, paved parking areas, utilities, stormwater detention facilities, and other associated facilities. The Project is located west of Meridian Road and south of Rolling Thunder Way; it is east of an unnamed tributary to Black Squirrel Creek No. 2 in the Town of Falcon, and it is bounded on all sides by scattered rural residential and commercial development (**Figure I:** *Project Location Map*). The site is located on a portion of Section 12, in Township 13S, Range 65W, and can be found on the U.S. Geological Survey's (USGS) Falcon 7.5-minute quadrangle (USGS 2020). Topography of the Project consists of flat to rolling disturbed foothills grasslands approximately four miles from the pine-oak woodlands of the Black Forest to the northwest. A portion of the site was formerly graded as a road.



Figure 1: Project Location Map



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2.0 METHODOLOGY

B.E. performed a desktop review to gather background information about the environmental setting of the Project area. Publicly available data sources queried via desktop included:

- U.S. Fish and Wildlife Service (USFWS) Information for Planning and Conservation (IPaC) data
- USFWS Critical Habitat Portal
- Species profiles and spatial data from Colorado Parks and Wildlife (CPW)
- USFWS National Wetland Inventory (NWI) data
- USGS National Hydrography Dataset (NHD)
- USGS aerial imagery
- Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map (FIRM) panels
- Google Earth current and historic aerial imagery
- Colorado State Forest Service (CSFS) Wildfire Hazard Maps
- National Resources Conservation Service (NRCS) county soil survey data
- Colorado Natural Heritage Program (CNHP) Survey of Critical Biological Resources

Following the desktop review of these resources, a site reconnaissance was conducted on September 12th, 2022, to field-verify results of the review and identify potential impacts to these resources and constraints to development. The field reconnaissance focused on identifying and mapping wetland habitat and WOTUS, on classifying vegetation communities on the site, and on identifying suitable wildlife habitat, particularly that which could support T&E species.



3.0 ENVIRONMENTAL SETTING

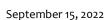
The Project area is located within the Foothill Grasslands ecoregion in Colorado (Chapman et al. 2006). Topography of the Project consists mainly of flat to rolling grasslands that have been previously disturbed, bordered on the west side by an unnamed tributary to Black Squirrel Creek No. 2; pine woodlands interspersed with a few shrubs are located about four miles to the northwest of the site in the Black Forest. The Foothills Grasslands Ecoregion is composed of a mixture of tall and mid-grasses and isolated pine woodlands (Chapman et al. 2006). Dominant species include little bluestem (Schizachyrium scoparium), big bluestem (Andropogon gerardii), switchgrass (Panicum virgatum), and yellow Indiangrass (Sorghastrum nutans; Chapman et al. 2006).

Elevations of the Project site range between approximately 6,845 and 6,865 feet above mean sea level (AMSL). The Project site contains no Colorado Natural Heritage Conservation Areas (CAs) or Potential Conservation Areas (PCAs) according to the CNHP (2022), though the Fountain Creek/Big Johnson Reservoir PCA is a few hundred feet west of the site. According to the USFWS' Information for Planning and Conservation (IPaC; 2022), the site does not contain Wildlife Refuges or Hatcheries. The area has been used historically as rangeland, but residential and commercial development surrounds the site and is still increasing steadily.

3.1. Vegetation

The entire Project site is within the Foothill Grasslands, with the predominant vegetation present corresponding to that ecoregion. Blue grama (Bouteloua gracilis), switchgrass (Panicum virgatum), little bluestem (Schizachyrium scoparium), needle-and-thread (Hesperostipa comata), Junegrass (Koeleria macrantha), and lambsquarters (Chenopodium album), a weed, were the dominant species in uplands throughout the site. Other upland species present included big bluestem (Andropogon gerardii), slender wheatgrass (Elymus trachycaulus), sand dropseed (Sporobolus cryptandrus), purple threeawn (Aristida purpurea), showy milkweed (Asclepias speciosa), fringed sage (Artemisia frigida), soapweed yucca (Yucca glauca), pussytoes (Antennaria sp.), and hairy false goldenaster (Heterotheca villosa), among others. Sandbar willows (Salix exigua) were scattered along the banks of the drainage to the west, and a few were present at the south end of the site, near the drainage. Within wetter areas, including wetlands, artic rush (Juncus arcticus) and Nebraska sedge (Carex nebrascensis) were the dominant species, with Drummond's rush (Juncus drummondii) and clustered field sedge (Carex praegracilis) also commonly occurring. The wettest areas surprisingly supported three-square bulrush (Schoenoplectus pungens) and narrowleaf cattail (Typha latifolia). Other than the few sandbar willows saplings, there were no shrubs or trees present on the site. Much of the site appeared to be nearly undisturbed grasslands, and vegetative cover was relatively thick and extensive. Diversity was moderate for this ecoregion, and the structure of vegetation in the uplands was relatively highly developed due to a lack of prior disturbance. Riparian and wetland habitats to the west were established and relatively healthy, though subject to scour and infrequent flooding/inconsistent hydrology.

Several noxious weeds were present at the site, mostly scattered throughout the property in low densities. Weed species listed on the Colorado Noxious Weed List (CWMA 2020) that were





observed on the site included Canada thistle (*Cirsium arvense*), which was by far the most widespread and abundant weed, as well as Scotch thistle (*Onopordum acanthium*), and common mullein (*Verbascum thapsus*). Other weeds not listed on the state list as noxious were also observed. Russian thistle (*Salsola tragus*), which forms tumbleweeds in autumn, was observed mainly along Rolling Thunder Way to the north of the site. Smooth brome (*Bromus inermis*), a non-native grass, was present in limited quantities in areas of higher disturbance along the periphery of the site, near roadways. Lambsquarters, a weedy annual not on the Colorado noxious weed list, was abundant at the site. See **Appendix A:** *Colorado Noxious Weed List*.

B.E. reviewed CNHP data for the Falcon 7.5-minute quadrangle, which summarizes vegetation communities in Colorado by USGS quadrangle. Data were reviewed to determine the probability of the presence/absence of significant natural communities, rare plant areas, or riparian corridors that may be within the Project area. Based on CNHP's data and the site reconnaissance, the probability of these plant communities being impacted by Project development is described below in Table 1.

Table 1. Potentially Impacted Vegetation Communities (CNHP 2022)

Plant Community (Type)	Status ¹	Presence and Location	Probability of Impacts
Andropogon gerardii - Sporobolus heterolepis Western Foothills Grassland (Xeric Tallgrass Prairie)	G2, S1	Mesic habitats of the Rocky Mountain foothills and riverine habitats. This type is a regional endemic found only in eastern Colorado, western Oklahoma, and possibly elsewhere. Reportedly occurs in the nearby Black Forest.	None. This community is not present in the Project area.
Bouteloua gracilis - Bouteloua dactyloides Grassland (Shortgrass Prairie)	G4, S2	Found in flat to rolling uplands throughout much of the central and southern Great Plains. Soil type is often sandy loam. A variety of other short graminoids make up much of the remaining habitat.	None. This community was likely present historically, but the site now supports a thicker grassland type consisting largely of other grasses.
Hesperostipa comata – Bouteloua gracilis – Carex filifolia Grassland (Montane Grasslands)	G5, S2	Occurs in relatively mesic savanna habitats, on gentle to moderate southand west-facing slopes. Dense habitat occurs in some areas of the Black Forest.	None. The Project area lies on the fringe of this community.
Pinus ponderosa - Quercus gambelii Woodland (Foothills Ponderosa Pine Scrub Woodlands)	G5, S5	This is a widely distributed and broadly defined habitat type in the foothills and mountains. Present in the Black Forest in Colorado wherever ponderosa pine overstory coincides with at least 5% cover of Gambel oak	None. Due north and northwest this is the primary wooded community present, but it does not extend to the Project site.

¹G=Global; S=State

¹⁼Critically Imperiled; 2=Imperiled; 3=Rare or Uncommon; 4=Widespread, Abundant, and Apparently Secure; 5=Demonstrably Widespread, Abundant, and Secure.



3.2. Soils

Soil survey data and reports were reviewed to determine the potential for the presence of geologic hazards within the Project (NRCS 2022a). NRCS soil survey data indicate that the site is composed entirely of the Blakeland-Fluvaquentic Haplaquolls consociation (**Figure 2:** NRCS SSURGO Soils Map), generally consisting of loamy coarse sand (NRCS 2022a). The Blakeland series is typically found on sandy foothills and flats while Fluvaquentic Haplaquolls are typically associated with drainages, meaning the site is likely entirely composed of Blakeland loamy sand. While these two soil types are the dominant series occupying the Project area, there are minor components (called "inclusions") within each series or consociation that could contribute to the overall soil composition at the site.

The NRCS provides information on soil properties that would influence the development of building sites for small commercial buildings, including the selection of the site, the design of the structure, construction, performance after construction, and maintenance. Qualitative soil ratings are assigned to each major soil group and include 'Not Limited', 'Somewhat Limited', and 'Very Limited'. 'Not Limited' indicates that the soil type has properties that are very favorable for the specified type of construction. 'Somewhat Limited' indicates that the soil type has properties that are moderately favorable for the specified type of construction. These limitations can generally be overcome through planning and design considerations. 'Very Limited' indicates that the soil type has properties that cannot generally be overcome through design and planning considerations (NRCS 2022b). Based on the soils present, the entire site is rated 'Somewhat Limited' for small commercial buildings (NRCS 2022b). The 'Somewhat Limited' rating is based on the potential for slopes steeper than 14%, which are not present (NRCS 2022b); site inspection confirmed the slopes present can be overcome via grading.

B.E. reviewed the hydric soil ratings for all soil components present on the Project site to aid in the identification of wetland habitats during the site reconnaissance. Hydric soils are those that form under conditions of saturation, flooding, or ponding long enough during the growing season to develop anaerobic conditions, and their formation is required in order for wetlands to become established. The Blakeland-Fluvaquentic Haplaquolls consociation is described as having a moderate hydric rating El Paso County with an overall value of 39. Hydric ratings are on a scale of 1 to 100, with 100 having greater hydric components and zero having no hydric components (NRCS 2022a). The Pleasant soil series, a minor component of the primary series on the site, is rated as hydric in El Paso County and is typically found in depressions and drainages where ponding can regularly occur (NRCS 2022c). Based on these ratings, the overall suitability of the site for the development of hydric soils, and thus the presence of wetlands, is moderate, with the exception of the drainage west of the site where the suitability is higher and wetlands are expected.

The Blakeland-Fluvaquentic-Haplaquolls consociation is grouped into Hydrologic Group A, according to NRCS soils data (NRCS 2022d). The 'A' grouping includes soils that have a high infiltration rate, which results in the soil having a corresponding high rate of surface and ground water transmission. Additional, detailed soil data for the Project will be presented in a soils/geology/geotechnical report that will be submitted separately.





Figure 2: NRCS SSURGO Soils





3.3. Aquatic Resources

Aquatic resources include jurisdictional wetlands and other regulated Waters of the U.S. (WOTUS) such as streams/rivers, ponds/lakes, and ditches, as well as non-regulated wetlands, streams/rivers, ponds/lakes, ditches, and other surface water features. The USFWS' NWI and USGS' NHD datasets were reviewed for the possible presence of wetlands and streams, respectively, within the Project area. Aerial imagery (USDA 2019 and Google 2021) was reviewed to locate water features not depicted in the NWI and NHD datasets. NHD and NWI data are notoriously inaccurate, necessitating field inspection to verify the presence or absence of the resources depicted in these datasets. One aquatic feature was depicted in the data and can be seen in **Figure 3**: Aquatic Resources Desktop Review. This feature is described as follows:

• An intermittent stream (unnamed tributary to Black Squirrel Creek No. 2) is mapped in the NHD data running generally northwest to southeast along the entire western boundary of the Project site. The NWI data shows a riverine wetland (R4SBC) associated with the tributary's corridor. This area is located west of the Project site.

Because these desktop data are often inaccurate, the watercourse and other aquatic features identified in the preliminary desktop analysis were inspected in the field to assess their jurisdictional potential. A site reconnaissance and routine wetland assessment were conducted on September 11th, 2022. The wetland assessment revealed that the features identified in the NHD and NWI data along the unnamed tributary to Black Squirrel Creek No. 2 were generally present in locations matching the desktop review data. The wetlands associated with this tributary are assumed to be jurisdictional. Because the aquatic features in the tributary west of the site could be affected by planned stormwater outfall facilities, a formal wetland delineation was performed to document the boundaries of these features. During the wetland delineation, wetlands were also confirmed covering large portions of the Project areas where none were expected (see **Figure 4**: Wetland Location Map, and **Appendix B**: Photographic Log). These additional aquatic features were delineated (**Figure 4**) and soil test pits were taken (**Appendix C**: Wetland Determination Data Forms). Aquatic resources on the site are described as follows:

- The unnamed tributary just west of the site is generally present as mapped in the NHD stream data, forming the western Project area boundary as it runs from northwest to southeast. The NHD/NWI classification of 'intermittent' is likely accurate as flowing water was present in the absence of a precipitation event. Either way, the unnamed tributary, along with its associated wetlands, is likely to be considered jurisdictional by the U.S. Army Corps of Engineers (USACE) under the Clean Water Act (CWA).
- The NWI data depict a narrow corridor of wetlands associated with the unnamed tributary, and this is mostly confirmed by the site investigation. However, upon inspection, wetlands were generally more extensive than depicted in the NWI data, extending further out from the active stream channel, particularly to the immediate southwest of the Project area (see **Figure 4** and **Appendix B).** These wetlands are classified as Riverine, Intermittent-Streambed, Seasonally Flooded wetlands (R4SBC).
- A Palustrine, Emergent, Seasonally Flooded (PEM1C) wetland labeled 'Wetland 1' in
 Figure 4 below was present in the northeast corner of the site stretching southwest to
 the approximate center of the site along a shallow swale. This wetland is still forming, as



soils were only mildly hydric, though wetland vegetation was extensive and hydrologic indicators were strong. The source of hydrology is almost exclusively a culvert under Rolling Thunder Way that was installed sometime in late 2006 when Rolling Thunder Way was constructed. Evidence from historical imagery shows that the swale where Wetland 1 is located was itself dug out in 2006 when the road and culvert were installed; images from April 2006 show undisturbed grasslands with no grading and no wetlands. Presently, stormwater from the developments to the north and east collects in the low-lying area north of Rolling Thunder Way and east of Foxtail Meadow Lane, which either intentionally or unintentionally serves as a detention basin, before draining through the culvert and onto the site. This hydrologic source is entirely artificial, and field observations confirmed that no wetland would exist in this location if stormwater flows were not piped to the site by others. The flows from this culvert do not reach the drainage to the west of the site, but rather disperse across the site as overland sheets flows once leaving the humanmade swale. Thus, Wetland 1 is almost certainly non-jurisdictional under the CWA.

A second Palustrine, Emergent, Seasonally Flooded wetland (Wetland 2) was present at the north-center of the site along Rolling Thunder Way, and just east of an embankment of sorts that also appeared to be humanmade. Aerial imagery from 2006 shows grading at this location as well, likely using materials dug out to form the swale that contains Wetland 1. The area appears in aerial images as though it was intended as an extension to Foxtail Meadow Lane running south through the site, but that the roadway was never built. As a result, another low-lying area has been created by the embanked roadway grading, allowing water to pond for significant periods of time following precipitation events and forming wetlands. There appears to be no other source of hydrology. It is possible that a small wetland existed here prior to the construction of Rolling Thunder Way in 2006 and was cut off from wetlands further north – aerial imagery from 1999 shows darker vegetation at this location that may indicate the presence of wetlands. However, like Wetland 1, this wetland does not extend south or west far enough to connect with wetlands along the unnamed tributary to Black Squirrel Creek No. 2. It is unlikely that a significant nexus exists between Wetland 2 and the distant wetlands along the creek; therefore, it is unlikely that Wetland 2 is jurisdictional.

Based on the information obtained from the site reconnaissance, it is unlikely there are wetlands on the site associated with the current Project that would be considered jurisdictional by the USACE. Wetland 1 is an artificial wetland because its hydrologic source is entirely anthropogenic. Wetland 2 may be naturally occurring, but likely does not connect to downstream WOTUS and thus would not be jurisdictional. The riverine wetland depicted in the NWI data is confirmed as a wetland, but it lies to the west of the site boundary. The unnamed tributary running west of the site appears to maintain hydrologic connection to downstream tributaries/wetlands and is therefore likely jurisdictional. There are extensive wetlands associated with the unnamed tributary to the west, but these will not be affected by development of the site. While only the USACE may determine the regulatory status of aquatic features under the CWA, it is B.E.'s professional opinion that there are no jurisdictional wetlands or other jurisdictional aquatic resources on the site, and that the only jurisdictional aquatic resources are in the drainage to the immediate west of the site.

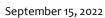
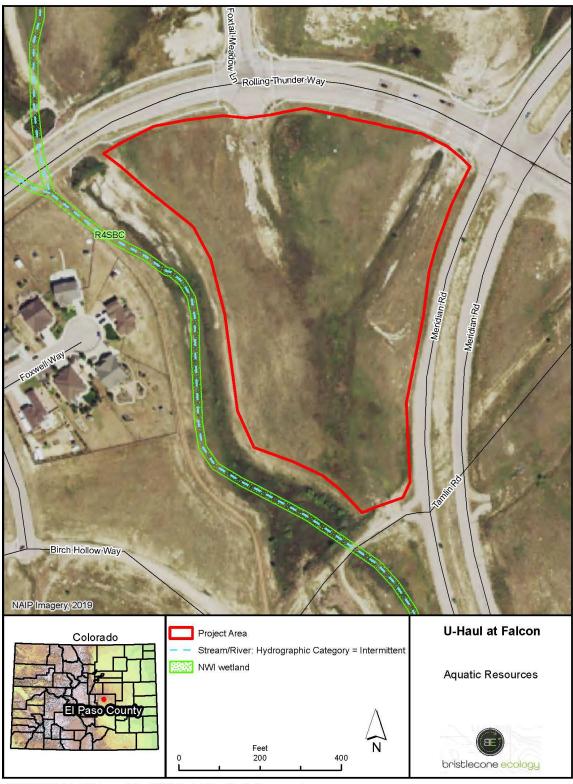




Figure 3: Aquatic Resources Desktop Review



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Figure 4: Wetland Location Map



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3.4. Noxious Weeds

B.E. surveyed the site for noxious weeds in accordance with state and EPC requirements for noxious weed control and management. Noxious weeds are defined as those non-native plants that aggressively invade and are detrimental to native vegetation communities and ecosystems. The Colorado State Noxious Weed Act (Colorado Revised Statute 35-5.5-103) developed a list of plants considered noxious in the state of Colorado (Appendix A) that should be targeted for control by various methods dependent on list category (A, B, or C). Site-specific noxious weed management tiers to the requirements set forth by the El Paso County Noxious Weed Management Plan (EPC 2017), and the El Paso County Noxious Weeds and Control Methods report (EPC 2018a), which contain guidelines for the control and treatment of noxious weeds found in the County. EPC requires that commercial or industrial projects that include ground disturbing activities address noxious weed management in order to prevent the spread of noxious weeds in EPC.

Noxious weeds are present on the Project site in several areas ranging from limited distribution to isolated, and no large, monotypic concentrations of noxious weeds present. Other scattered populations of noxious weeds were found throughout various portions of the site. Noxious weeds that were detected during the site reconnaissance included:

List B

- Canada thistle
- Scotch thistle

List C

• Common mullein

Canada thistle was sparsely but widely distributed throughout wetter areas, including wetlands. Both Scotch thistle and common mullein were observed in small quantities throughout most of the site. It is possible that additional noxious weed populations may be present on the site. A site inventory to identify and map noxious weeds during the growing season would be required to accurately catalogue all populations on the site.

3.5. Wildfire Hazard

In the 2018 El Paso County Development Standards, the stated purpose and intent for fire protection and wildfire mitigation is to ensure that proposed development is reviewed for wildfire risks and adequate fire protection (EPC 2018b). No permit or approval associated with development, construction, or occupancy shall be approved or issued until the provisions of these standards are satisfied. The Project area is located within the Falcon Fire Protection District (FPD). The Falcon FPD has six subdistricts and five staffed fire stations within the district; the two closest fire stations servicing the Project area are:

- Station 3, 7020 Old Meridian Road, Peyton, CO (0.41 mile from the site)
- Station 1, 12072 Royal County Down Road, Peyton, CO (2.89 miles from the site)



The two closest fire stations in the Falcon FPD each have the following operations equipment available:

Station 3:

- 1 fire engine (Type 1, 750 gallons)
- 1 brush truck (300 gallons)
- 1 tender (2,000 gallons)
- 1 ambulance

Station 1:

- 1 fire engine (Type 1, 750 gallons)
- 1 pumper/tender (2,000 gallons)
- 1 brush truck (300 gallons)
- 1 tender (2,000 gallons)
- 1 ambulance
- Command vehicles

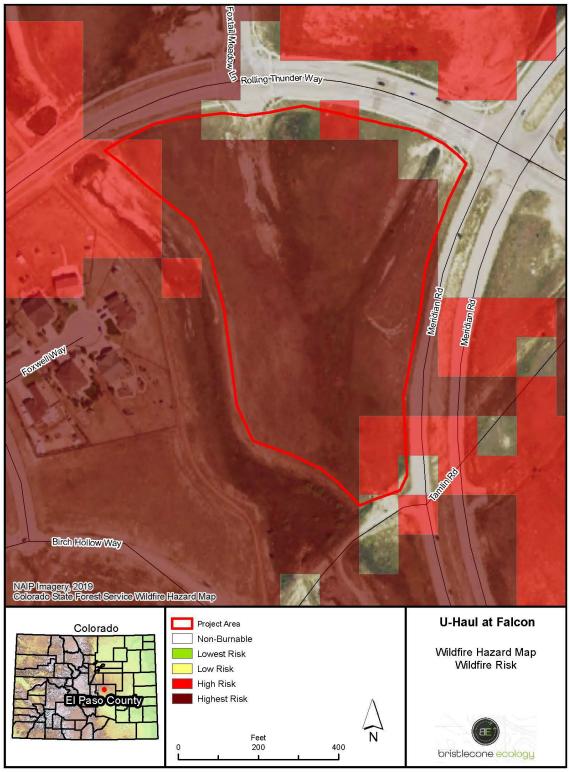
Wildfire hazard for the Project site was evaluated using the Colorado State Forest Service's (CSFS) online Wildfire Risk Assessment Portal (WRAP; CSFS 2020). WRAP allows professionals, planners, and the public to access the best scientific information regarding wildfire risk and establish prevention and mitigation measures accordingly. According to WRAP, the wildfire risk for the Project site is approximately 80% "Highest Risk" and approximately 20% "High Risk", (CSFS 2020; **Figure 5**: *Wildfire Hazard Map – Wildfire Risk*). "Wildfire Risk" is determined by CSFS by combining the burn probability rating of a site with the values-at-risk rating. While the Project site has a low rating of values and assets that would be adversely impacted by wildfire, the burn probability for the entire site is rated as "High" (CSFS 2020; **Figure 6**: *Wildfire Hazard Map – Burn Probability*). The areas rated for higher burn probability and higher risk are generally those furthest from previously developed nearby areas. Based on field observations, the site is generally uniform in vegetation density and type except the drainageway along the unnamed tributary to the west, which had denser vegetation but was also more mesic, and thus potentially less of a burn risk.

3.6. Flood Hazard

Flood hazard maps and flood insurance rate maps (FIRM) from the Federal Emergency Management Agency (FEMA) were reviewed to determine the potential for flood hazard at the site. Areas along the unnamed tributary to Black Squirrel Creek No. 2 on the western boundary of the site are located in a Zone A flood hazard zone, indicating an approximate one percent (1%) annual risk of flooding. The site itself is buffered from this drainage and does not contain any of the flood hazard areas along the creek. The site where development planned is not located in a flood hazard zone, indicating that flood risk for the majority of the site is deemed by FEMA to be 'minimal' (Figure 7: Flood Hazard Map).



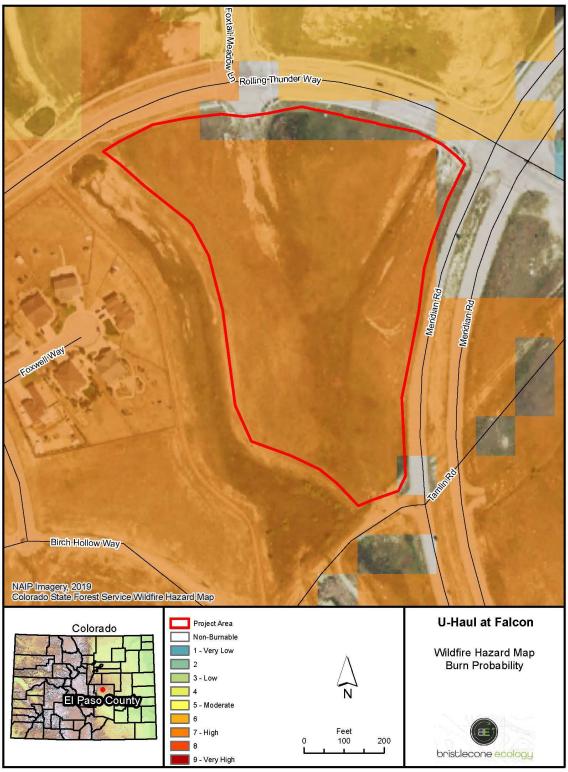
Figure 5: Wildfire Hazard Map - Wildfire Risk



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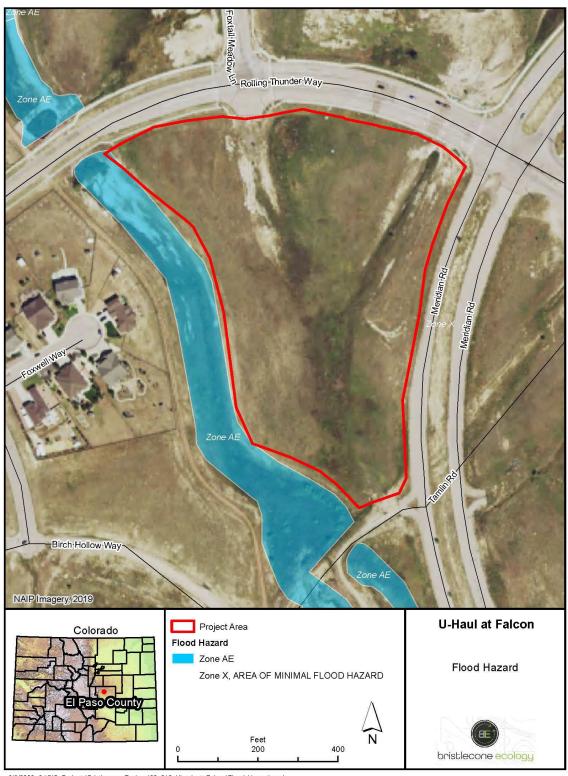
Figure 6: Wildfire Hazard Map – Burn Probability



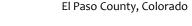
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Figure 7: Flood Hazard Map



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3.7. Wildlife Communities

The Project site provides moderate to low quality habitat for some grassland wildlife, including birds, mammals, reptiles, and possibly amphibians. There is healthy riparian habitat to the immediate west of the Project site in the drainage that contains the unnamed tributary to Black Squirrel Creek No. 2. Development of the site would inevitably affect some foothills grassland habitat for wildlife, but based on the findings of the site reconnaissance, B.E. has classified the expected impacts to grassland species as relatively low, and to riparian species as negligible. Wildlife that could be affected were identified first by referencing CPW's Species Activity Mapping (SAM) spatial data to assess the likelihood of occurrence for state T&E species, state species of concern (SC), and other general wildlife, including big game species. The Colorado Natural Heritage Program (2022) also provides species status data from tracked natural animal and plant communities in the state. The review indicated that there is potential for the occurrence of 15 mammals, 16 birds, and 15 reptiles, including one SC mammal, one state- and federally threatened mammal, one state threatened bird, and one federally protected bird (Table 2: SAM Wildlife Potential for Occurrence).

Table 2. SAM Wildlife Potential for Occurrence (CPW 2022; CNHP 2022)

Common Name	Scientific Name	Type of Occurrence (CPW 2022)	Status ^{1,2}
Mammals			
Big brown bat	Eptesicus fuscus	Overall range	n/a
Black bear	Ursus americanus	Overall range Human conflict area	n/a
Black-tailed prairie dog	Cynomys ludovicianus	Overall range Potential colony occurrence	SC, S ₃
Dwarf shrew	Sorex nanus	Overall range	G4, S2
Hoary bat	Lasiurus cinereus	Overall range	n/a
Little brown myotis	Myotis lucifugus	Overall range	n/a
Mountain lion	Puma concolor	Overall range Peripheral range	n/a
Mule deer	Odocoileus hemionus	Overall range	n/a
Olive-backed pocket mouse	Perognathus fasciatus	Overall range	G5, S3
Preble's meadow jumping mouse	Zapus hudsonius preblei	Overall range	FT, ST, S1
Pronghorn	Antilocapra americana	Overall range Resident population area	n/a
Silver-haired bat	Lasionycteris noctivagans	Overall range	n/a
Western red bat	Lasiurus blossevillii	Overall range	n/a
White-tailed deer	Odocoileus virginianus	Overall range Concentration Area	n/a
White-tailed jackrabbit	Lepus townsendii	Overall range	n/a

¹FT=Federally Threatened; ST=State Threatened; SC=State Species of Concern; BGEPA=Bald and Golden Eagle Protection Act

²State (S) or Global (G) CNHP Status: 1=Critically Imperiled; 2=Imperiled; 3=Vulnerable; 4=Apparently Secure, but Cause for Long Term Concern; 5=Demonstrably Secure; B=Breeding; N=Non-breeding

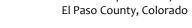




Table 2. SAM Wildlife Potential for Occurrence, Continued (CPW 2022; CNHP 2022)

Common Name	Scientific Name	Type of Occurrence (CPW 2022)	Status ^{1,2}
Birds		,	
Band-tailed pigeon	Patagioenas fasciata	Breeding range	S4B
Brewer's sparrow	Spizella breweri	Breeding range	S4B
Burrowing owl	Athene cunicularia	Breeding range	ST
Cassin's sparrow	Peucaea cassinii	Breeding range	n/a
Golden eagle	Aquila chrysaetos	Breeding range	BGEPA, S ₃ S ₄ B
Grasshopper sparrow	Ammodramus savannarum	Breeding range	S ₃ S ₄ B
Lark bunting	Calamospiza melanocorys	Breeding range	S4
Lazuli bunting	Passerina amoena	Breeding range	S ₅ B
Lesser sandhill crane	Antigone canadensis ssp. canadensis	Overall range	n/a
Lewis' Woodpecker	Melanerpes lewis	Breeding range	G4, S4
Mountain plover	Charadrius montanus	Breeding range	G3, S2
Northern harrier	Circus hudsonius	Breeding range	S ₃ B
Prairie falcon	Falco mexicanus	Breeding range	S4B, S4N
Rufous hummingbird	Selasphorus rufus	Migration range	n/a
Swainson's hawk	Buteo swainsoni	Breeding range	S ₅ B
Virginia's warbler	Oreothlypis virginiae	Breeding range	S ₅
Reptiles and Amphibian	is		
Bullsnake	Pituophis catenifer sayi	Overall range	n/a
Coachwhip	Masticophis flagellum	Overall range	n/a
Common Lesser Earless Lizard	Holbrookia maculata	Overall range	n/a
Greater short-horned lizard	Phrynosoma hernadesi	Overall range	n/a
Milksnake	Lampropeltis elapsoides	Overall range	n/a
Many-lined skink	Plestiodon multivirgatus	Overall range	n/a
Ornate box turtle	Terrapene ornata ornata	Overall range	n/a
Painted turtle	Chrysemys picta	Overall range	n/a
Plains garter snake	Thamnophis radix	Overall range	n/a
Prairie lizard	Sceloporus consobrinus	Overall range	n/a
Plateau fence lizard	Sceloporus tristichus	Overall range	n/a
Prairie rattlesnake	Crotalus viridis	Overall range	n/a
Six-lined Racerunner	Aspidoscelis sexlineata	Overall range	n/a
Smooth greensnake	Opheodrys vernalis	Overall range	n/a
Terrestrial gartersnake	Thamnophis elegance	Overall range	n/a

¹FT=Federally Threatened; ST=State Threatened; SC=State Species of Concern; BGEPA=Bald and Golden Eagle **Protection Act**

²State (S) or Global (G) CNHP Status: 1=Critically Imperiled; 2=Imperiled; 3=Vulnerable; 4=Apparently Secure, but Cause for Long Term Concern; 5=Demonstrably Secure; B=Breeding; N=Non-breeding

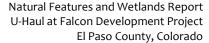


Following the review of the SAM data, a site reconnaissance was performed to field-verify the information provided in the data and perform a general wildlife survey. In general, the site provides moderate quality habitat for wildlife. The site is dominated by one primary vegetation community, represented by typical Foothill Grasslands vegetation such as blue gramma, prairie Junegrass, little bluestem, and switchgrass. While this community is relatively well-developed and healthy at the site, it is fragmented and relatively isolated from surrounding habitats by the extensive development that has already occurred in the area. Riparian and wetland vegetation is scarce to nonexistent except along the unnamed tributary to Black Squirrel Creek No. 2 to the west of the site where it is well established. The site has been previously disturbed, apparently by grading for a future roadway that was never built, and in the form of a human-constructed swale allowing for stormwater outfall/dispersal on the site from developments to the north and east. Invasive weeds such as Canada thistle and lambsquarters are spread throughout the site in relatively low and moderate numbers, respectively, with no noticeable concentration areas.

While some of the species listed in the SAM data likely occur on the site, few were observed, and the majority are either not expected to occur, or may occur only rarely based on the limited habitat available. The only species in the SAM data that was observed was mule deer (Odocoileus hemionus): three were observed along the drainage west of the site. Other species, such as Swainson's hawk (Buteo swainsoni), silver-haired bat (Lasionycteris noctivagans), hoary bat (Lasiurus cinereus), grasshopper sparrow (Ammodramus savannarum), lark bunting (Calamospiza melanocorys), common lesser earless lizard (Holbrookia maculata), plains garter snake (Thamnophis radix), prairie lizard (Sceloporus consobrinus), and plateau fence lizard (Sceloporus tristichus) are species in the SAM data that might be expected to occur on-site in the appropriate seasons and in the appropriate habitats.

State-listed and state sensitive species were not observed. Of note, the site is located within the Colorado Springs Block Clearance Zone for the state-listed Preble's meadow jumping mouse (Zapus hudsonius preblei), meaning the presence of this species is precluded (Appendix D: Preble's Meadow Jumping Mouse Block Clearance Map). There is grassland habitat available for the state sensitive black-tailed prairie dog (Cynomys ludovicianus), but none were observed during the site reconnaissance and no burrows were detected. The site is suitable for the state-threatened burrowing owl (Athene cunicularia), though this species is closely associated with abandoned burrows in prairie dog colonies, which were not observed. Golden Eagle (Aquila chrysaetos), which receives federal protections under the Bald and Golden Eagle Protection Act (BGEPA) and nests mostly on cliffs, is unlikely to occur except accidentally in migration. Adverse effects to these species are not anticipated.

Birds were the most common wildlife observed on the site during the reconnaissance. Species included American goldfinch (Spinus tristis), black-billed magpie (Pica hudsonia), common raven (Corvus corax), great blue heron (Ardea herodias), horned lark (Eremophila alpestris), house finch (Haemorphous mexicanus), northern flicker (Colaptes auratus), red-tailed hawk (Buteo jamaicensis), red-winged blackbird (Agelaius phoeniceus), western meadowlark (Sturnella neglecta), and Wilson's warbler (Wilsonia pusilla). These species tend to prefer open grassland





habitats, ponds/marshes, or riparian corridors similar to the predominant habitats present onsite.

The site provides little potential nesting habitat for raptors, mostly of which occurs as habitat for northern harrier (*Circus hudsonius*), which nests on the ground in grasslands (this species was not observed during the site reconnaissance). The riparian corridor west of the site provides marginal substrate for tree-nesting raptors such as Swainson's hawk, and the cavitynesting American kestrel (*Falco sparverius*). No signs of nests were found in any of the trees along the creek to the west.

The Project area also provides habitat for mammals including rodents, deer, and carnivores. Other than approximately three mule deer, mammals were not observed during the site reconnaissance, but a few other species may be expected to occur, including coyote (*Canis latrans*), gray fox (*Urocyon cinereoargenteus*), and/or red fox (*Vulpes vulpes*). Evidence of fossorial mammals was minimal, but a few eskers (mounds) were observed, presumably of pocket gophers (family *Geomidae*). The area is suitable year-round range for mule deer throughout the site, and perhaps white-tailed deer (*Odocoileus virginianus*), particularly along the riparian corridor to the west. The site also has potential to provide foraging and breeding habitat for predators such as coyote, red fox, and potentially black bear (*Ursus americanus*); it is also listed as a potential human conflict area for black bear, though this species is unlikely to occur, and a concentration area for white-tailed deer.

3.8. Federally Listed T&E Species

The USFWS IPaC database (USFWS 2021) was used to determine the likelihood of occurrence of federally listed T&E species within the Project area. The IPaC query listed seven species, including two birds, one mammal, two fishes, one insect, and one flowering plant with the potential to occur within or be affected by activities in the Project area (Table 3: Federally Listed T&E Species Potentially Impacted by the Project). B.E. has provided our professional opinion regarding each species' probability of occurrence at the Project site and the probability of each species being impacted by Project development. Preble's meadow jumping mouse was not included in the species list because the site is within the Block Clearance Zone for Preble's for Colorado Springs (Appendix D).



Table 3. Federally Listed T&E Species Potentially Impacted by the Project (USFWS 2022)

Common Name	Scientific Name	Habitat Requirements and Likelihood of Impacts	Federal Status ¹
Birds	110		
Piping plover	Charadrius melodus	Water-related activities/use in the N. Platte, S. Platte and Laramie River Basins may affect listed species in Nebraska. Specifically, water depletions have been shown to effect habitat for this species downstream in the watersheds listed. Likelihood of impacts: None, Project is not within the watersheds listed.	FT
Eastern black rail	Laterallus jamaicensis ssp. jamaicensis	Eastern black rail is a subspecies of black rail that occurs east of the Rocky Mountains in North America. Black rails are small, cryptic marsh/wetland specialists, and depend entirely upon these habitats to support their resource needs. Requires dense overhead cover (usually cattails [Typha spp.] or bulrushes [Schoenoplectus / Scirpus spp.]) and moist to saturated soils. Eastern black rails have been expanding their range in Colorado. There is negligible suitable habitat on the Project site. Likelihood of impacts: None, suitable habitat is not available on-site.	FT
Mammals	,		
Gray wolf	Canis lupus	Lone, dispersing gray wolfs may be present throughout Colorado. This species must only be considered if a project has a predator control program. The Project does not have a predator control program. Likelihood of impacts: None, does not apply.	FE
Fishes			
Greenback cutthroat trout	Oncorhynchus clarkii stomias	Cold, clear, gravely headwater streams and mountain lakes. Genetic sampling has confirmed that the only remaining native pure-strain population occurs in a four mile stretch of creek outside of its native range in Bear Creek (Metcalf et al. 2012). Reintroduction efforts are ongoing in the South Platte River system. Likelihood of impacts: None, habitat not present.	FT
Pallid sturgeon	Scaphirhynchus albus	Water-related activities/use in the N. Platte, S. Platte and Laramie River Basins may affect listed species in Nebraska. Likelihood of impacts: Likelihood of impacts: None, Project is not within the watersheds listed.	FE
Insects			
Monarch butterfly	Danaus plexippus	Monarch butterfly is a candidate species for listing under the ESA. The USFWS determined listing the species was warranted but precluded by work on higher priority listing actions. The species will remain a candidate for listing and reviewed yearly. There are no requirements for candidate species, but due diligence is encouraged. Likelihood of impacts: None, suitable habitat is not available on-site.	C

¹FE= Federally Endangered; FT=Federally Threatened; C=Candidate for Listing



Table 3, Cont. Federally Listed T&E Species Potentially Impacted by the Project (USFWS 2022)

Common Name	Scientific Name	Habitat Requirements and Likelihood of Impacts	Federal Status ¹
Flowering	Plants		
Ute ladies'- tresses orchid	Spiranthes diluvialis	Primarily occurs along seasonally flooded river terraces, sub- irrigated or spring-fed abandoned stream channels, and lakeshores. May also occur along irrigation canals, berms, levees, irrigated meadows, gravel pits, borrow pits, and other human-modified wetlands. There are no known populations in El Paso County, and the site does not support the required habitat types (USFWS 1992). Likelihood of impacts: None, habitat not present.	FT

¹FE= Federally Endangered; FT=Federally Threatened; C=Candidate for Listing





4.0 SUMMARY OF IMPACTS

4.1. Vegetation

Vegetation will be unavoidably disturbed through development of the Project site. The vast majority of the site is classified as Foothill Grasslands, which is the primary ecosystem type that will be impacted. The site is generally of moderate quality and impacts are not expected to imperil or substantially harm this ecosystem, though development of the site will result in the loss of a few acres of grasslands. No globally sensitive vegetation communities are present, and some remnants of one state-sensitive vegetation community are no longer present (Shortgrass Prairie), according to CNHP data for sensitive vegetation communities and site reconnaissance (CNHP 2022). The Project site is on the fringe of the Ponderosa Pine Woodlands, a globally and state stable vegetation community, but the site does not contain any pine trees and impacts are not expected. Development of the site will likely increase and improve arboreal habitat through the planting of trees landscaped areas and open spaces. There are riparian and wetland areas along the unnamed tributary to the west, and these areas are higher quality habitats, but this corridor is not a part of the Project site.

4.2. Aquatic Resources

There are no aquatic resources on the site, and all wetlands and streams observed were located outside of the Project boundary, to the immediate west of the site along the drainage containing the unnamed tributary to Black Squirrel Creek No. 2. Wetlands mapped in NHD/NWI data were generally confirmed during the wetland delineation to be in the same locations as depicted (see **Appendix B** and **Figure 4**). All field-delineated wetlands shown in **Figure 4** are expected to be considered isolated by the USACE. Since these resources will not be disturbed by Project construction, a Section 404 permit from the USACE is not expected to be necessary.

4.3. Noxious Weeds

Noxious weeds are present on the Project site in several areas but in generally limited quantities. There were no large concentrations of noxious weeds, but scattered noxious weeds were found throughout various portions of the site. List A Species, which require reporting and eradication by Colorado law (Colorado Department of Agriculture [CDA] 2006), were not detected. List B Species require either eradication, containment, or suppression; List C Species require control through either public education or chemical control. List B and List C Species that were detected during the site reconnaissance included:

List B

- Canada thistle
- Scotch thistle

List C

• Common mullein



It is possible that additional noxious weed populations may be present on the site. A site inventory to identify and map noxious weeds during the growing season would be required to accurately catalogue all populations on the site. A Noxious Weed Management Plan detailing recommendations for identifying and controlling the spread of noxious weeds prior to, during, and/or post-construction may be required by EPC.

4.4. Wildfire

Roughly 80% of the Project area is mapped as "Highest" wildfire risk while the remaining 20% is mapped as "High" risk. The "High" risk areas of the site are generally around the perimeter of the property where nearby development has already limited available fuels. The site is rated low in terms of values and assets present that could be lost to wildfire; it is rated "High" in terms of burn probability based on the available fuels at the site, nearly all of which are grasslands. The nearest fire response is Station 3 in the Falcon FPD, which is located 0.41 miles from the site; the second closest station is Station 1 in the Falcon FPD, which is 2.89 miles away.

Development of the site would result in a reduction of the available fuels for wildfires, while simultaneously increasing the values and assets present on the site. As such, the overall wildfire risk index for the Project is expected to be similar or lower than the current ratings after development.

4.5. Wildlife

Similar to the impacts for vegetation, some wildlife will inevitably be affected by development of the Project area. Designated open spaces will also conserve some of the open grassland habitats that are currently available, but open, undisturbed grasslands will be reduced on the whole. Implementation of a stormwater management plan will assist in protecting water quality in downstream reaches, which will provide additional benefits to aquatic species including invertebrates. Detention facilities may add seasonal water features that could support additional wildlife such as waterfowl. Negligible impacts to forest species are expected as no trees will be cleared for construction. Since grasslands are the most dominant habitat type, grassland species are expected to experience the greatest adverse impacts. Deer, foxes, bears, raccoons, and skunks may experience adverse effects from the increase in development in close proximity to wildland areas, such as the Black Forest. Few sensitive species were present and only in small numbers, and thus are not expected to be affected any more than other species. No state listed species were present.

4.6. Federally Listed T&E Species

Federally listed T&E species are not expected to occur on the Project. All species listed occur in habitats that were not present on the site or would only be affected if development were to involve water depletions that are known to affect downstream populations in different river systems. Preble's meadow jumping mouse habitat is not present on the site because the entire site is within the Colorado Springs Block Clearance Zone. Based on the absence of listed species or their habitats, consultation with the USFWS is not warranted.



5.0 RECOMMENDATIONS

Upon completion of a desktop review, site reconnaissance, and routine wetland delineation, B.E. finds that some environmental constraints are present within the Project area. Constraints are summarized below within the regulatory context that they apply, and recommendations are provided.

5.1. Clean Water Act

Section 404 of the Clean Water Act prohibits the discharge of dredge or fill material into WOTUS (including wetlands) without a valid permit. Wetland habitat, as well as jurisdictional WOTUS lacking wetlands, are not present on the site, and thus development is not expected to affect any jurisdictional aquatic resources. The storm sewer line and outfall will be placed in a previously constructed detention basin south of the site in order to avoid any disturbance to wetlands in the drainage west of the site. Based the preliminary site layout and lack of aquatic resources on the site, permitting pursuant to Section 404 of the CWA will not be required. No further action is recommended.

5.2. Endangered Species Act

Section 9(a)(1) of the Endangered Species Act prohibits the take of federally listed species and their habitats, and defines such take as "to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct" (16 U.S.C. § 1531). There is no suitable habitat for listed species on the site. The site is within the Colorado Springs Block Clearance Zone for Preble's. Other federally listed species are not present, or they would not be affected because the Project will not involve water depletions from the river basins where these species occur. No impacts to any federally listed species are anticipated from site development and no further due diligence recommendations are provided.

5.3. Migratory Bird Treaty Act and Bald and Golden Eagle Protection Act

Migratory birds, and the parts, nests, or eggs of such birds receive statutory protection under the Migratory Bird Treaty Act, which prohibits the intentional take of migratory birds. Bald eagles (*Haliaeetus leucocephalus*) and golden eagles receive additional statutory protection from accidental take and disturbance under the BGEPA. Both acts particularly apply to nesting birds and their nests. There were no nests observed on the site, but some nesting substrates for raptors and other migratory birds are available west of the site along the unnamed tributary to Black Squirrel Creek No. 2 in the riparian corridor. There are no trees large enough to be suitable nesting substrate for bald or golden eagles. Further nesting substrates for other migratory birds are present in the form of open grasslands, as well as willows along the creek west of the site, all of which are expected to be used by some migratory birds during the nesting season. Songbirds nesting offsite in the riparian corridor are not expected to be affected by development. Raptors, if nests are present offsite along the riparian corridor, could potentially be affected if development occurs in close proximity to occupied nests during the nesting season.



It is recommended that vegetation clearing/grubbing of the site occur outside of the nesting season (March 15th to July 31st) to avoid disturbing nesting migratory birds. If such timing restrictions are not possible, B.E. recommends conducting a migratory bird nesting survey during the nesting season to ensure impacts to nesting birds do not occur. In particular, if occupied raptor nests are present along the unnamed tributary to Black Squirrel Creek No. 2, B.E. recommends following CPW's guidance for establishing buffer zones to protect nesting raptors from disturbance.

5.4. Colorado Noxious Weed Act

In order to ensure Project compliance with the Colorado Noxious Weed Act, and to comply with the requirements of El Paso County's Noxious Weed Management Plan Act, noxious weed control efforts should be implemented during construction, and further site-specific weed management should be implemented on an ongoing basis following development of the site. In particular, control of both thistles observed (and any other List B noxious weeds observed on the site) is required by Colorado law.

5.5. Non-Statutory Considerations

There is potential for other wildlife, including some big game, to occur within the site. However, no big game migratory routes traverse the Project. In addition, ranges for several migratory birds, including the state-threatened burrowing owl, overlap the Project area, though habitat for burrowing owls is not present based on the lack of prairie dog presence. B.E. recommends coordination with CPW to determine the appropriate avoidance measures to take during and after construction regarding general wildlife. Impacts to wildlife should be reduced as much as practical through the implementation of typical covenants and best management practices, such as using bear-resistant trash containers and fencing that allows safe passage for game animals.

Should you have any questions regarding the information or recommendations provided in this report, please feel free to contact Bristlecone Ecology at dmaynard@bristleconeecology.com.

Sincerely,

Bristlecone Ecology, LLC

Tom Muguel

Daniel Maynard

Ecologist



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APPENDIX A

COLORADO NOXIOUS WEED LIST

(Alphabetized by common name)

List A Species (25)

Common	Scientific
African rue	(Peganum harmala)
Bohemian knotweed	(Fallopia x bohemicum)
Camelthorn	(Alhagi maurorum)
Common crupina	(Crupina vulgaris)
Cypress spurge	(Euphorbia cyparissias)
Dyer's woad	(Isatis tinctoria)
Elongated mustard	(Brassica elongata)
Flowering rush	(Butomus umbellatus)
Giant knotweed	(Fallopia sachalinensis)*
Giant reed	(Arundo donax)
Giant salvinia	(Salvinia molesta)
Hairy willow-herb	(Epilobium hirsutum)
Hydrilla	(Hydrilla verticillata)
Japanese knotweed	(Fallopia japonica)
Meadow knapweed	(Centaurea x moncktonii)
Mediterranean sage	(Salvia aethiopis)
Medusahead	(Taeniatherum caput-medusae)
Myrtle spurge	(Euphorbia myrsinites)
Orange hawkweed	(Hieracium aurantiacum)
Parrotfeather	(Myriophyllum aquaticum)
Purple loosestrife	(Lythrum salicaria)
Rush skeletonweed	(Chondrilla juncea)
Squarrose knapweed	(Centaurea virgata)
Tansy ragwort	(Senecio jacobaea)
Yellow starthistle	(Centaurea solstitialis)

^{*}Scientific name is correct here, and the Administrative Rule will be updated during the next cycle (2022).

List B Species (38)

Common	Scientific
Absinth wormwood	(Artemisia absinthium)
Black henbane	(Hyoscyamus niger)
Bouncingbet	(Saponaria officinalis)
Bull thistle	(Cirsium vulgare)
Canada thistle	(Cirsium arvense)
Chinese clematis	(Clematis orientalis)
Common tansy	(Tanacetum vulgare)
Common teasel	(Dipsacus fullonum)

Cutleaf teasel (Dipsacus laciniatus)

Dalmatian toadflax, broad-leaved (Linaria dalmatica)

Dalmatian toadflax, narrow-leaved (Linaria genistifolia)

Dame's rocket (Hesperis matronalis)

Diffuse knapweed (Centaurea diffusa)

Eurasian watermilfoil (Myriophyllum spicatum)

Hoary cress (Lepidium draba)

List B Species Continued (38)

Common	Scientific
Houndstongue	(Cynoglossum officinale)
Jointed goatgrass	(Aegilops cylindrica)
Leafy spurge	(Euphorbia esula)
Mayweed chamomile	(Anthemis cotula)
Moth mullein	(Verbascum blattaria)
Musk thistle	(Carduus nutans)
Oxeye daisy	(Leucanthemum vulgare)
Perennial pepperweed	(Lepidium latifolium)
Plumeless thistle	(Carduus acanthoides)
Russian knapweed	(Rhaponticum repens)
Russian-olive	(Elaeagnus angustifolia)
Salt cedar	(Tamarix. ramosissima)
Salt cedar	(T. chinensis)
Scentless chamomile	(Tripleurospermum inodorum)
Scotch thistle	(Onopordum acanthium)
Scotch thistle	(O. tauricum)
Spotted knapweed	(Centaurea stoebe ssp. micranthos)
Spotted x diffuse knapweed hybrid	: (Centaurea x psammogena)
Sulfur cinquefoil	(Potentilla recta)
Wild caraway	(Carum carvi)
Yellow nutsedge	(Cyperus esculentus)
Yellow toadflax	(Linaria vulgaris)

List C Species (16)

Common	Scientific
Bulbous bluegrass	(Poa bulbosa)
Chicory	(Cichorium intybus)
Common burdock	(Arctium minus)
Common mullein	(Verbascum thapsus)
Common St. Johnswort	(Hypericum perforatum)
Downy brome, cheatgrass	(Bromus tectorum)
Field bindweed	(Convolvulus arvensis)
Halogeton	(Halogeton glomeratus)
Johnsongrass	(Sorghum halepense)
Perennial sowthistle	(Sonchus arvensis)

Yellow x Dalmatian toadflax hybric (Linaria vulgaris x L. dalmatica)

Poison hemlock (Conium maculatum)
Puncturevine (Tribulus terrestris)
Quackgrass (Elymus repens)
Redstem filaree (Erodium cicutarium)
Velvetleaf (Abutilon theophrasti)
Wild proso millet (Panicum miliaceum)

Watch List Species (19)

These species are not regulated by the Noxious Weed Act/Rule.

Common	Scientific
Baby's breath	(Gypsophila paniculata)
Caucasian bluestem	(Bothriochloa bladhii)
Common bugloss	(Anchusa officinalis)
Common reed	(Phragmites australis)
Garden loosestrife	(Lysimachia vulgaris)
Garlic mustard	(Alliaria petiolata)
Himalayan blackberry	(Rubus armeniacus)
Hoary alyssum	(Berteroa incana L.)
Meadow hawkweed	(Hieracium caespitosum)
Onionweed	(Asphodelus fistulosus)
Siberian elm	(Ulmus pumila)
Scotch broom	(Cytisus scoparius)
Swainsonpea	(Sphaerophysa salsula)
Syrian beancaper	(Zygophyllum fabago)
Tree of Heaven	(Ailanthus altissima)
Ventenata grass	(Ventenata dubia)
White bryony	(Bryonia alba)
Yellow bluestem	(Bothriochloa ischaemum)
Yellow flag iris	(Iris pseudacorus)



APPENDIX B

PHOTOGRAPHIC LOG





Photo 1 – Overview of typical habitat taken from the central portion of the site, facing north. Vegetation at this location is an odd mix of typical grassland species such as little bluestem (visible on the left and right as taller, redder grasses) and blue grama, invasives such as Canada thistle (scattered throughout) and wetland plants such as Baltic rush (at center, codominant). This point marks the furthest south extent of Wetland 1.



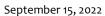


PHOTO 2 – View of Wetland 1 south of the culvert under Rolling Thunder Way that supplies its hydrology. The altered nature of the area is evident as a graded swale that is lower than the surrounding areas, supporting wetland plants that normally would not be present (darker vegetation).

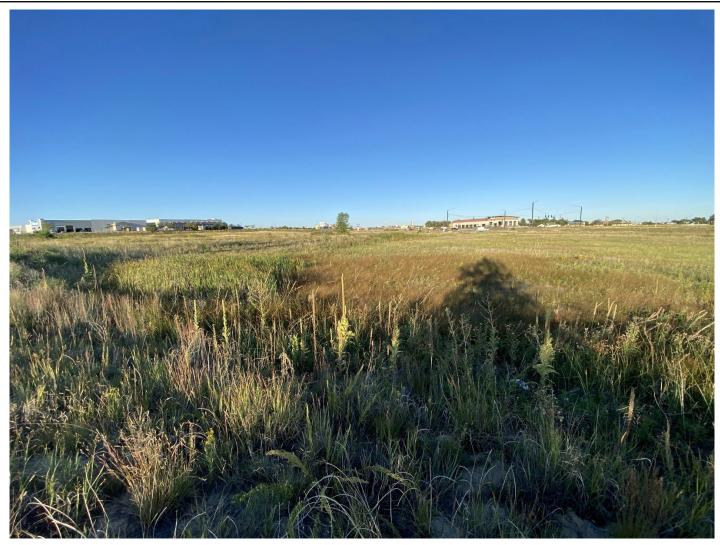




РНОТО 3 – Photo of Wetland 1 and the culvert under Rolling Thunder Way near the intersection with Meridian Road. Narrowleaf cattails, three-square bulrushes, sedges, rushes, and other wetland plants are obvious. This area would naturally support prairie grasses similar to the rest of the site if not for this artificial source of hydrology.







Рното 4 – View of Wetland 2, another odd feature, facing east. The extensive cattails are obvious at the lefthand side of the photo in the lowest area that is subject to ponding. Aerial photos from 2006 show that the higher area where the photographer is standing was constructed, probably as a future roadway, creating the low lying area in the photo where ponding now regularly occurs and wetlands have formed.





Photo 5 – View of the western boundary of the site and the drainage just to the west where the healthy riparian and wetland corridor exists. Note the topographic similarities between this humanmade drainageway and the one containing Wetland 1 (see Photo 2).



September 15, 2022

APPENDIX C

WETLAND DETERMINATION DATA FORMS

	Section, Township, F Local relief (concave Lat; 38.935443	State: CO Sampling Date: 9/11/22 State: CO Sampling Point: 5P1 Range: Sec. [2, 1135, R654 e, convex, none): COncave Slope (%): 41 Long: 104.613677 Datum: UGS SUSTINESSITE (S) NWI classification: N/A
Are climatic / hydrologic conditions on the site typical for this Are Vegetation	significantly disturbed? Are acturally problematic? (If	e "Normal Circumstances" present? Yes No needed, explain any answers in Remarks.)
Hydrophytic Vegetation Present? Hydric Soil Present? Yes N	lo Is the Sample within a Wet	land? Yes No
VEGETATION – Use scientific names of plan		Dominance Test worksheet
Tree Stratum (Plot size: 30'x30') 1.	Absolute Dominant Indicato ** Cover Species? Status	
3	C = Total Cover	Total Number of Dominant Species Across All Strata: Percent of Dominant Species (B)
Sapling/Shrub Stratum (Plot size: 15 × 15) 1.		That Are OBL, FACW, or FAC:
34		
Herb Stratum (Plot size: 5/25) 1. Agrestis aigantea	D = Total Cover	FAC species x 3 = FACU species x 4 =
2. Juneus baldious 3. Schoenoplectus pungens	43 V Acu 20 V OBL	
4. Panicum Vilgatum 5. Hordeum jubatum 6.	5 FAC	Hudronbutic Vagatation Indicators:
7		3 - Prevalence Index is ≤3.0¹4 - Morphological Adaptations¹ (Provide supporting data in Remarks or on a separate sheet)
Woody Vine Stratum (Plot size: 30' x30') 1.	= Total Cover	Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
% Bare Ground in Herb Stratum	= Total Cover	Hydrophytic Vegetation Present? Yes No
Remarks: US Army Corps of Engineers		Great Plains – Version 2.0

12	-		
•	u	88.	

Sampling Point: 5P1

Profile Description: (Describe to the depth	needed to document the indicator or c	onfirm the absence of in	idicators.)
Depth Matrix	Redox Features		•
(inches) Color (moist) %	Color (moist) % Type ¹ L	oc ² Texture	Remarks
0-5" WYR 311 100.		- SCL	
6-18" 10 VR 4/2 100		- LS	
			3/
¹ Type: C=Concentration, D=Depletion, RM=R	educed Matrix, CS=Covered or Coated Sa	and Grains. ² Location	n: PL=Pore Lining, M=Matrix.
Hydric Soil Indicators: (Applicable to all LF	Rs, unless otherwise noted.)	Indicators for F	Problematic Hydric Soils ³ :
Histosol (A1)	Sandy Gleyed Matrix (S4)	1 cm Muck	(A9) (LRR I, J)
Histic Epipedon (A2)	Sandy Redox (S5)		ie Redox (A16) (LRR F, G, H)
Black Histic (A3)	Stripped Matrix (S6)		ce (S7) (LRR G)
# Hydrogen Sulfide (A4)	Loamy Mucky Mineral (F1)		Depressions (F16)
Stratified Layers (A5) (LRR F) 1 cm Muck (A9) (LRR F, G, H)	Loamy Gleyed Matrix (F2)		outside of MLRA 72 & 73)
Depleted Below Dark Surface (A11)	Depleted Matrix (F3)Redox Dark Surface (F6)	Reduced Ve	
Thick Dark Surface (A12)	Depleted Dark Surface (F7)	Red Parent	w Dark Surface (TF12)
Sandy Mucky Mineral (S1)	Redox Depressions (F8)	Other (Expl	
2.5 cm Mucky Peat or Peat (S2) (LRR G, I	High Plains Depressions (F16)		drophytic vegetation and
5 cm Mucky Peat or Peat (S3) (LRR F)	(MLRA 72 & 73 of LRR H)		rology must be present,
		5	rbed or problematic.
Restrictive Layer (if present);			
Type: N/A	_		-
Depth (inches): N/A		Hydric Soil Pres	ent? Yes No
Remarks:			
Strong 425 00	lor		
11 ong 112 00			
HYDROLOGY			
Wetland Hydrology Indicators:			
Primary Indicators (minimum of one required; c	heck all that apply)	Secondary Inc	dicators (minimum of two required)
★ Surface Water (A1)	Salt Crust (B11)		Soil Cracks (B6)
High Water Table (A2)	Aquatic Invertebrates (B13)		Vegetated Concave Surface (B8)
± Saturation (A3)	Hydrogen Sulfide Odor (C1)		
Water Marks (B1)	Dry-Season Water Table (C2)		Patterns (B10)
Sediment Deposits (B2)	Oxidized Rhizospheres on Living F		Rhizospheres on Living Roots (C3)
Drift Deposits (B3)	(where not tilled)		
	Presence of Reduced Iron (C4)		Burrows (C8)
Iron Deposits (B5)	Thin Muck Surface (C7)		n Visible on Aerial Imagery (C9)
Inundation Visible on Aerial Imagery (B7)	Other (Explain in Remarks)		hic Position (D2) tral Test (D5)
Water-Stained Leaves (B9)	Other (Explain in Remarks)	the state of the s	ave Hummocks (D7) (LRR F)
Field Observations:	The state of the s	Frost-Hea	ave Hummocks (D7) (LRR F)
	Double (Section)		
Construction of the said of th	Depth (inches):		
Water Table Present? YesNo	Depth (inches):	0.	
Saturation Present? Yes No	Depth (inches): Cap. Fring	Wetland Hydrology Pres	sent? Yes No
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor	oring well, aerial photos, previous inspecti	ions) if available:	
l and the second	Hour dougle broken broken	ono), ii avallable.	
Remarks:			
Hydrology appea	ine totally artifician	al Supplied	by a culvert
, Claring a copper			L.VIV.I
// _ '/) 11. 11-7 15	1 10/1	11 11:	(1)
under Rolling Thunder	irs totally artifica - Way that dumps	stormwater	on this site

WEILAND DETERMINATION DATA FORM -	orout riamo riogion
Soil Map Unit Name: Blakeland CTomorthentic Haplus- Are climatic / hydrologic conditions on the site typical for this time of year? Yes No Are Vegetation	State: CO Sampling Point: SP2 Inge: Sec. 12, T135, R65W Inge: Sec. 12, T135, R65W Inge: Sec. 12, T135, R65W Slope (%): 61/2 Long: 104-6137-56 Datum: W65 8 Hol(s) NWI classification: N/A (If no, explain in Remarks.) Normal Circumstances" present? Yes No eded, explain any answers in Remarks.)
SUMMARY OF FINDINGS – Attach site map showing sampling point le	ocations, transects, important leatures, etc.
Hydrophytic Vegetation Present? Hydric Soil Present? Wetland Hydrology Present? Remarks: Artificial hydrology	V
VEGETATION – Use scientific names of plants.	
Tree Stratum (Plot size: 30 x 30) Absolute % Cover Species? Status 1.	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC (excluding FAC-): Total Number of Dominant Species Across All Strata: Percent of Dominant Species That Are OBL, FACW, or FAC: (A/B)
1. 2. 3. 4. 5. Herb Stratum (Plot size: 5/x5') 1. Panicum virgatum 2. Agrosfis gigantea 3. Schizachyrium scoparium 4. Lambsquarters (Chenepolium sp.) 7 FACU 5. Calamagrottis 9. 6. Dineus palticus 7. Cirsium allense 2. FACU FACU	Prevalence Index worksheet:
8. Ther grasses 9. Ther forbs 10. Woody Vine Stratum (Plot size: 30' \times 30') 1. 2. Bare Ground in Herb Stratum Remarks:	4 - Morphological Adaptations¹ (Provide supporting data in Remarks or on a separate sheet) Problematic Hydrophytic Vegetation¹ (Explain) ¹Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic. Hydrophytic Vegetation Present? Yes No
US Army Corps of Engineers	Great Plains – Version 2.0

Profile Description: (Describe to the dep	th needed to document the in	idicator or	confirm	the absence of in	dicators.)
Depth Matrix	Redox Features		12	T	Damarka
(inches) Color (moist) %	Color (moist) %	Type [†]	Loc ²	SL_	Remarks
0-8" 10 /R 3/1 100	2 12 2		A A	<u> </u>	
8-12" 10 YR 4/2 97	7.54R 5/8 3	<u></u>	M	DL_	
12-18+" 104R 4/2 100				LS	
	·				0.24110yy-14-12-2-34(1)-2-3-13-1-3-3-4(1)
				-	
					
¹ Type: C=Concentration, D=Depletion, RM	=Reduced Matrix, CS=Covered	or Coated	Sand Gr	ains. ² Location	: PL=Pore Lining, M=Matrix.
Hydric Soil Indicators: (Applicable to all		the state of the s			Problematic Hydric Soils ³ :
Histosol (A1)	Sandy Gleyed Mat			1 cm Muck	(A9) (LRR I, J)
Histic Epipedon (A2)	Sandy Redox (S5)				ie Redox (A16) (LRR F, G, H)
Black Histic (A3)	Stripped Matrix (S6			THE RESERVE OF THE PARTY OF THE	ce (S7) (LRR G)
Hydrogen Sulfide (A4)	Loamy Mucky Mine	eral (F1)		High Plains	Depressions (F16)
Stratified Layers (A5) (LRR F)	Loamy Gleyed Mat	trix (F2)		(LRR H	outside of MLRA 72 & 73)
1 cm Muck (A9) (LRR F, G, H)	→ Depleted Matrix (F.	3)		Reduced Ve	ertic (F18)
Depleted Below Dark Surface (A11)	Redox Dark Surface			그림 그 그는 그 그리고 하면 되었다. 그렇게 다 보고 있다.	Material (TF2)
Thick Dark Surface (A12)	Depleted Dark Sur				w Dark Surface (TF12)
Sandy Mucky Mineral (S1)	Redox Depression	(2) (2)			ain in Remarks)
2.5 cm Mucky Peat or Peat (S2) (LRR		1,5,5			drophytic vegetation and
5 cm Mucky Peat or Peat (S3) (LRR F)	(MLRA 72 & 73	3 OI LKK F	1)	and the second s	rology must be present, irbed or problematic.
Restrictive Layer (if present):					
Type: NA,					
Depth (inches):	9			Hydric Soil Pres	sent? Yes V
Remarks:				1.7	
Very faint;	hydric soils t to inundat	still	form	ning in	an area not
typically Subjec	t to inundat	ion (+10a	dital pon	ding
HYDROLOGY					9
Wetland Hydrology Indicators:	*				
Primary Indicators (minimum of one require	d; check all that apply)			Secondary In	dicators (minimum of two required)
Surface Water (A1)	Salt Crust (B11)			Surface :	Soil Cracks (B6)
High Water Table (A2)	Aquatic Invertebrates	(B13)			Vegetated Concave Surface (B8)
Saturation (A3)	Hydrogen Sulfide Od				Patterns (B10)
Water Marks (B1)	Dry-Season Water Ta				Rhizospheres on Living Roots (C3)
Sediment Deposits (B2)	T Oxidized Rhizosphere		a Roots		tilled)
Drift Deposits (B3)	(where not tilled)		3		Burrows (C8)
Algal Mat or Crust (B4)	Presence of Reduced	d Iron (C4)			n Visible on Aerial Imagery (C9)
Iron Deposits (B5)	Thin Muck Surface (0	er engligter i morte en			phic Position (D2)
Inundation Visible on Aerial Imagery (B				A STATE OF THE PARTY OF THE PAR	utral Test (D5)
mandadon visible on Acriai imagery (b	Other (Explain in the	riarnoj		The second secon	ave Hummocks (D7) (LRR F)
- Water-Stained Leaves (B9)			1		
Water-Stained Leaves (B9) Field Observations:	^				
Field Observations:	No. Peoth (inches):				
Field Observations: Surface Water Present? Yes	NoDepth (inches):		-		_
Field Observations: Surface Water Present? Yes Water Table Present? Yes	No Depth (inches):		-	and Hudralagu Des	nearth Voc V
Field Observations: Surface Water Present? Yes Water Table Present? Yes Saturation Present? Yes			- - Wetl	and Hydrology Pre	esent? Yes No
Field Observations: Surface Water Present? Yes Water Table Present? Yes	No Depth (inches): No Depth (inches):	evious insp			esent? Yes No
Field Observations: Surface Water Present? Yes Water Table Present? Yes Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, m	No Depth (inches): Depth (inches): onitoring well, aerial photos, pre		ections),	if available:	
Field Observations: Surface Water Present? Yes Water Table Present? Yes Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, m	No Depth (inches): Depth (inches): onitoring well, aerial photos, pre		ections),	if available:	
Field Observations: Surface Water Present? Yes Water Table Present? Yes Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, m	No Depth (inches): Depth (inches): onitoring well, aerial photos, pre		ections),	if available:	- under Madany

WETLAND DETERMINATION DATA FORM -	Great Plains Region
Project/Site: V-Haul at Falcon City/County: El Pa	SD County Sampling Date: 9/11/22
Applicant/Owner: AMERCO / U-Haul In+1.	State: Sampling Point: SP3
	nge: Sec. 12, T135, R65W
Landform (hillslope, terrace, etc.): Meadow Local relief (concave, of	convex, none): Concave Slope (%): 218
	Long: 104.613946 Datum: WGS 8
Soil Map Unit Name: Blake (and (Tornior thertic Haplust	olls) NWI classification:
Are climatic / hydrologic conditions on the site typical for this time of year? Yes No	(If no, explain in Remarks.)
Are Vegetation, Soil, or Hydrology significantly disturbed? Are "	Normal Circumstances" present? Yes V No
Are Vegetation	eded, explain any answers in Remarks.)
SUMMARY OF FINDINGS - Attach site map showing sampling point le	ocations, transects, important features, etc
Hydrophytic Vegetation Present? Yes No Is the Sampled	Area
Hydric Soil Present? Yes No within a Wetlar	d? Yes No
Wetland Hydrology Present? Yes No	
Remarks: Artificial hydrology	
()	
	Lary and April 1997 and the amount of the second
VEGETATION – Use scientific names of plants. Absolute Dominant Indicator	Dominance Test worksheet:
Tree Stratum (Plot size: 30 × 30') Absolute Dominant Indicator % Cover Species? Status	Number of Dominant Species
1	That Are OBL, FACW, or FAC (excluding FAC-): (A)
2	Company of the second of the s
3	Total Number of Dominant Species Across All Strata: (B)
= Total Cover	Percent of Dominant Species /DO
Sapling/Shrub Stratum (Plot size: 15×15) = Total Cover	That Are OBL, FACW, or FAC: (A/B)
1	Prevalence Index worksheet:
2	Total % Cover of: Multiply by:
4.	OBL species 25 x1 = 25
5.	FACW species 50 $x2 = 100$ FAC species 10 $x3 = 30$
Herb Stratum (Plot size: 5'X5') = Total Cover	FAC species
1. Harostis algantea 20 V FACW	UPL species
2. Carex nebrascensis 25 % OBL	Column Totals: 95 (A) 195 (B)
3. Junous balticus 20 FACW	Prevalence Index = B/A = 2.05
4. Civaium aneuse 5 FACU	Hydrophytic Vegetation Indicators:
5. Notentilla sp. 5 FAC 6. Halcopias Speciosa 3 FAC	士 1 - Rapid Test for Hydrophytic Vegetation
6. Aslecpias speciosa 3 FAC 7. Rumex crisous 2 FAC	2 - Dominance Test is >50%
8. Carex praearacilis 10 FACW	± 3 - Prevalence Index is ≤3.01
9. Schizachynism Scoparium 5 FACU	4 - Morphological Adaptations (Provide supporting data in Remarks or on a separate sheet)
10. Other for by	Problematic Hydrophytic Vegetation¹ (Explain)
Woody Vine Stratum (Plot size: 30 X 30)	¹Indicators of hydric soil and wetland hydrology must
Woody Vine Stratum (Plot size: 30 X 30')	be present, unless disturbed or problematic.
2.	Hydrophytic
7 = Total Cover	Vegetation Present? Yes No
% Bare Ground in Herb Stratum	100 - 100 -
4	

C	0	ı	
v	u	8	_

Sampling Point: SP3

Profile Description: (Describe to the de	Redox Featu	ıres		n the absence	of indicators.)
(inches) Color (moist) %	Color (moist) %	Type ¹	_Loc ²	<u>Texture</u>	Remarks
0-6" OYR 3/2 98	7.5YR 5/8 2		M	SL	Fine
6-10" 10 YR 3/1 100				LS	Fine
10-18" 10 YR Z/2 100				SI	Med - Fine
10 10 11 11 10			-		119. 4740
				-	**************************************
					E COMMON CONTRACTOR
			-		
¹ Type: C=Concentration, D=Depletion, RN	I=Reduced Matrix CS=Cove	red or Coate	nd Sand G	raine ² l oc	cation: PL=Pore Lining, M=Matrix.
Hydric Soil Indicators: (Applicable to al			o Sand G		for Problematic Hydric Soils ³ :
⊥ Histosol (A1)	Sandy Gleyed				fluck (A9) (LRR I, J)
Histic Epipedon (A2)	Sandy Redox (100			Prairie Redox (A16) (LRR F, G, H)
Black Histic (A3)	Stripped Matrix			1	urface (S7) (LRR G)
Hydrogen Sulfide (A4)	Loamy Mucky	Mineral (F1)			lains Depressions (F16)
Stratified Layers (A5) (LRR F)	Loamy Gleyed	Matrix (F2)		(LR	R H outside of MLRA 72 & 73)
1 cm Muck (A9) (LRR F, G, H)	Depleted Matri	(5) (2)		000 minutes	ed Vertic (F18)
Depleted Below Dark Surface (A11)	Redox Dark Su	120 20		The second second	arent Material (TF2)
Thick Dark Surface (A12) Sandy Mucky Mineral (S1)	Depleted Dark	22.)		hallow Dark Surface (TF12)
2.5 cm Mucky Peat or Peat (S2) (LRR	Redox Depress G, H) High Plains De		16)		Explain in Remarks) of hydrophytic vegetation and
5 cm Mucky Peat or Peat (S3) (LRR F		& 73 of LRR	240 A		d hydrology must be present,
	(meror re	a ro or Entire)		disturbed or problematic.
Restrictive Layer (if present): Type:	<u> </u>				/
Depth (inches):	t_			Hydric Soil	Present? Yes V No
HYDROLOGY	H) P300-55-0-14-0-1-55-0-1-83-1-12-0-1-5-0	881111			
Wetland Hydrology Indicators:					
Primary Indicators (minimum of one require	ed: check all that apply)			Seconda	ry Indicators (minimum of two required)
Surface Water (A1)	Salt Crust (B11)				ace Soil Cracks (B6)
High Water Table (A2)	Aquatic Invertebra	ates (B13)			rsely Vegetated Concave Surface (B8)
Saturation (A3)	Hydrogen Sulfide				nage Patterns (B10)
─ Water Marks (B1)	Dry-Season Wate				lized Rhizospheres on Living Roots (C3)
Sediment Deposits (B2)		20 2			here tilled)
Torift Deposits (B3)	(where not tille			N N N	rfish Burrows (C8)
Algal Mat or Crust (B4)	Presence of Redu		1)	100000000000000000000000000000000000000	ration Visible on Aerial Imagery (C9)
Iron Deposits (B5)	Thin Muck Surfac		35		morphic Position (D2)
Inundation Visible on Aerial Imagery (E	37) _ Other (Explain in	Remarks)		+ FAC	-Neutral Test (D5)
Water-Stained Leaves (B9)				= Fros	t-Heave Hummocks (D7) (LRR F)
Field Observations:	,				
Surface Water Present? Yes	No Depth (inches): _		_		
Water Table Present? Yes	No Depth (inches):				
Saturation Present? Yes	No Depth (inches):			and Hydrology	/ Present? Yes No
(includes capillary fringe)	7. 7. 2.				
Describe Recorded Data (stream gauge, m	onitoring well, aerial photos,	previous ins	pections),	if available:	
Remarks: Arch Civial hy	dialogue - a	ee D	atac	Laget #	1
Artificial h	in orga	- V	- درحرج	Meet (1	1

Landform (hillslope, terrace, etc.): Meadow Subregion (LRR): LPR 6 Soil Map Unit Name: 3 (a kel and Convert Are climatic / hydrologic conditions on the site typical for this	Section, Township, Ran Local relief (concave, of Lat: 38-934888 Here The Haplus foll setting of year? Yes No	(If no, explain in Remarks.)
Are Vegetation, Soil, or Hydrology s		"Normal Circumstances" present? Yes Vo No No
Are Vegetation		eeded, explain any answers in Remarks.) ocations, transects, important features, etc.
Hydrophytic Vegetation Present? Hydric Soil Present? Wetland Hydrology Present? Remarks: Wetter than expected see prior datashee:	Is the Sampled within a Wetlan	I Area nd? Yes No
VEGETATION – Use scientific names of plan	ts.	
Tree Stratum (Plot size: 30'X30') 1. 2. 3. 4. Sapling/Shrub Stratum (Plot size: 15 X 15') 1. 2. 3. 4. 5. Herb Stratum (Plot size: 5 X 5') 1. JUNCUS GOLFICUS 2. Circium arvense 3. Schizachynum scopanim 4. Agrostis giagantea	Absolute % Cover Species? Indicator Species? Status O = Total Cover O = Total Cover O FACU FACU FACU FACU FACU	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC (excluding FAC-): Total Number of Dominant Species Across All Strata: Percent of Dominant Species That Are OBL, FACW, or FAC: Prevalence Index worksheet: Total % Cover of: OBL species FACW species FACW species FAC species FAC uspecies FACU species UPL species Column Totals: Number of Dominant Species Multiply by: X1 = O Waltiply by: X1 = O FAC Species FAC x2 = Waltiply Species FACU species FA
5. Procepiad speciosa 6. Potentilla sp. 7. Toa prafentsis 8. There sources 10	2 FAC 2 FAC 3 FAC 3 FAC	Hydrophytic Vegetation Indicators: 1 - Rapid Test for Hydrophytic Vegetation 2 - Dominance Test is >50% 3 - Prevalence Index is ≤3.0¹ 4 - Morphological Adaptations¹ (Provide supporting data in Remarks or on a separate sheet) Problematic Hydrophytic Vegetation¹ (Explain) ¹Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
2	= Total Cover	Hydrophytic Vegetation Present? Yes No No
Remarks: US Army Corps of Engineers		Great Plains – Version 2.0

Depth Matrix Color (moist) % O - 11 " O - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11 - 18 + " 10 - 12 10 0 11	Redox Features Color (moist) % Type [†] Le	Texture SL SL	Remarks
Type: C=Concentration, D=Depletion, RM=F Hydric Soil Indicators: (Applicable to all L Histosol (A1) Histic Epipedon (A2) Black Histic (A3) Hydrogen Sulfide (A4) Stratified Layers (A5) (LRR F) 1 cm Muck (A9) (LRR F, G, H) Depleted Below Dark Surface (A11) Thick Dark Surface (A12) Sandy Mucky Mineral (S1) 2.5 cm Mucky Peat or Peat (S2) (LRR G,	RRs, unless otherwise noted.) Sandy Gleyed Matrix (S4) Sandy Redox (S5) Stripped Matrix (S6) Loamy Mucky Mineral (F1) Loamy Gleyed Matrix (F2) Depleted Matrix (F3) Redox Dark Surface (F6) Depleted Dark Surface (F7) Redox Depressions (F8)	Indicators for Problema 1 cm Muck (A9) (LRI Coast Prairie Redox Dark Surface (S7) (I High Plains Depressi	RI, J) (A16) (LRR F, G, H) LRR G) ons (F16) of MLRA 72 & 73)) (TF2) urface (TF12) marks) vegetation and ust be present,
Restrictive Layer (if present): Type: Depth (inches): Remarks:		Hydric Soil Present?	1
HYDROLOGY			
Wetland Hydrology Indicators:	The state of the s		
Primary Indicators (minimum of one required;	check all that apply)	Secondary Indicators (minimum of two required)
Surface Water (A1)	Salt Crust (B11)	Surface Soil Crack	s (B6)
High Water Table (A2)	Aquatic Invertebrates (B13)		d Concave Surface (B8)
Saturation (A3)	Hydrogen Sulfide Odor (C1)	Drainage Patterns	
Water Marks (B1)	Dry-Season Water Table (C2)		neres on Living Roots (C3)
Sediment Deposits (B2)	Oxidized Rhizospheres on Living F		J
Drift Deposits (B3)	(where not tilled)	Crayfish Burrows	(C8)
Algal Mat or Crust (B4)	Presence of Reduced Iron (C4)	[선명 전기 및 전기 및 전기 및 경기 역시 및 전기 및 전	on Aerial Imagery (C9)
Iron Deposits (B5)	Thin Muck Surface (C7)	Geomorphic Posit	
Inundation Visible on Aerial Imagery (B7)		FAC-Neutral Test	
Water-Stained Leaves (B9)	201700000000000000000000000000000000000		mocks (D7) (LRR F)
Field Observations:			The second secon
	Denth (inches)		
Surface Water Present? Yes N	Depth (inches):		7
Water Table Present? Yes N Saturation Present? Yes N (includes capillary fringe)	Depth (inches):	Wetland Hydrology Present?	Yes No
Describe Recorded Data (stream gauge, mon	itoring well, aerial photos, previous inspect	ions), if available:	
Remarks: Artificial hyperitarian hyperitaria	drology - see Do	stasheef #1	

Applicant/Owner: AMERCO / U-Haul Int Investigator(s): Dan Maynard Section, Township, Rai Landform (hillslope, terrace, etc.): Meadow Local relief (concave, of Subregion (LRR): LRR G Lat: 38.936365 Soil Map Unit Name: Blakeland Fornionthertic Haplustoll Are climatic / hydrologic conditions on the site typical for this time of year? Yes No Are Vegetation N, Soil N, or Hydrology N significantly disturbed? Are	(If no, explain in Remarks.) Normal Circumstances" present? Yes No edded, explain any answers in Remarks.)
SUMMARY OF FINDINGS - Attach site map showing sampling point in	ocations, transects, important reatures, etc.
Hydrophytic Vegetation Present? Hydric Soil Present? Wetland Hydrology Present? Remarks: Confusing location. Wetland Nydric Soils and no hydrology.	nd? Yes No
VEGETATION – Use scientific names of plants.	
Tree Stratum (Plot size: 30 x 35) Absolute % Cover Species? Status Absolute % Cover Species? Status Dominant Indicator Species? Status 1. 2. 3. 4. 5. Herb Stratum (Plot size: 5 x 5) Herb Stratum (Plot size: 5 x 5) Location of the species of the species of the species? Status Total Cover Species? Status Dominant Indicator Species Status Dominant Indicato	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC (excluding FAC-): Total Number of Dominant Species Across All Strata: Percent of Dominant Species That Are OBL, FACW, or FAC: Prevalence Index worksheet: Total % Cover of: Multiply by: OBL species FACW species FACU speci
9	data in Remarks or on a separate sheet) Problematic Hydrophytic Vegetation¹ (Explain) ¹Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic. Hydrophytic Vegetation
% Bare Ground in Herb Stratum	Present? Yes V No e - where is the water Great Plains - Version 2.0

ARM.	-		
-	<i>6</i> 3	63	
1	•	8 R.	_

Sampling Point: SP5

Depth (inches) Color (moist) % O-12" (0 12 3/7 100	Redox Features	Texture	Remarks
12-18+" 10 YR 5/3 100		_ <u>LS</u>	
			- Administration of the control of t
¹ Type: C=Concentration, D=Depletion, RM= Hydric Soil Indicators: (Applicable to all I			Problematic Hydric Soils ³ :
\$ 100.00 to 100.	48 III 😘 Dalay - San Sandar - Alan Sandar (1970)	1	1954 2004 - Maria Maria Maria Maria Maria Maria
A Histosol (A1)	Sandy Gleyed Matrix (S4)		(A9) (LRR I, J)
Histic Epipedon (A2)	Sandy Redox (S5)	TO 1000	ie Redox (A16) (LRR F, G, H)
Black Histic (A3)	Stripped Matrix (S6)		ce (S7) (LRR G) Depressions (F16)
Hydrogen Sulfide (A4) Stratified Layers (A5) (LRR F)	Loamy Mucky Mineral (F1) Loamy Gleyed Matrix (F2)		outside of MLRA 72 & 73)
1 cm Muck (A9) (LRR F, G, H)	Depleted Matrix (F3)	Reduced V	Sand Market Market State of the Control of the Cont
Depleted Below Dark Surface (A11)	Redox Dark Surface (F6)		Material (TF2)
Thick Dark Surface (A12)	Depleted Dark Surface (F7)		w Dark Surface (TF12)
Sandy Mucky Mineral (S1)	Redox Depressions (F8)	Other (Expl	ain in Remarks)
2.5 cm Mucky Peat or Peat (S2) (LRR G	i, H) High Plains Depressions (F16)	3Indicators of hy	drophytic vegetation and
5 cm Mucky Peat or Peat (S3) (LRR F)	(MLRA 72 & 73 of LRR H)	100 miles 100 mi	Irology must be present,
Restrictive Layer (if present):		umoso disk	rbed or problematic.
ALLIA			
Depth (inches):		Hydric Soil Pres	sent? Yes No
Remarks: No evidence loes the water co	of hydric soils ome from??	. Still for	rming? Where
IYDROLOGY		3	
Wetland Hydrology Indicators:			
Primary Indicators (minimum of one required	; check all that apply)	Secondary Ir	dicators (minimum of two required)
Surface Water (A1)	Salt Crust (B11)	Surface	Soil Cracks (B6)
High Water Table (A2)	Aquatic Invertebrates (B13)	Sparsely	Vegetated Concave Surface (B8)
Saturation (A3)	Hydrogen Sulfide Odor (C1)	Drainage	Patterns (B10)
Water Marks (B1)	Dry-Season Water Table (C2)	Oxidized	Rhizospheres on Living Roots (C3
Sediment Deposits (B2)	Oxidized Rhizospheres on Living I	Roots (C3) (where	tilled)
Drift Deposits (B3)	(where not tilled)	Crayfish	Burrows (C8)
Algal Mat or Crust (B4)	Presence of Reduced Iron (C4)	Saturation	on Visible on Aerial Imagery (C9)
Iron Deposits (B5)	Thin Muck Surface (C7)		ohic Position (D2)
Inundation Visible on Aerial Imagery (B7)	Other (Explain in Remarks)	T FAC-Ne	utral Test (D5)
Water-Stained Leaves (B9)		Frost-He	eave Hummocks (D7) (LRR F)
Field Observations:			
Surface Water Present? Yes 1	No Depth (inches):		7
Water Table Present? Yes 1	No		
Saturation Present? Yes I (includes capillary fringe)	No Depth (inches):	Wetland Hydrology Pro	esent? Yes V No No
Describe Recorded Data (stream gauge, mo	nitoring well, aerial photos, previous inspec	tions), if available:	
Remarks: Surface Soil	cracks present & he water come f	1955es FAC	-Neutral fest.
but where does t	he water come t	tom: ??	

Applicant/Owner: AMERCO (U-Haul Int). Investigator(s): Dan Maynard Section, Township, Ra Landform (hillslope, terrace, etc.): Meadow Local relief (concave, Subregion (LRR): Lat: 38.935834 Soil Map Unit Name: Blakeland CTombartheric Haplus to C Are climatic / hydrologic conditions on the site typical for this time of year? Yes No Are Vegetation N, Soil N, or Hydrology N significantly disturbed? Are	convex, none):
Hydrophytic Venetation Precent? Ves 3 No.	
Hydric Soil Present? Yes No within a Wetlar	1
Wetland Hydrology Present? Yes No V	
Remarks: Paired Sample point with SPS	
the location where hydrophytes no le	onger predominate
VEGETATION – Use scientific names of plants. Absolute Dominant Indicator	Dominance Test worksheet:
Tree Stratum (Plot size: 30' x 30') Absolute Dominant Indicator % Cover Species? Status	Number of Dominant Species
1	That Are OBL, FACW, or FAC (excluding FAC-): (A)
3	Total Number of Dominant 2
4	Species Across All Strata: (B)
Sapling/Shrub Stratum (Plot size: 15 x 15') = Total Cover	Percent of Dominant Species That Are OBL, FACW, or FAC: 50 6 (A/B)
1	Prevalence Index worksheet:
3	Total % Cover of: Multiply by:
4.	OBL species x 1 =
5	FACW species 25 x2 = 50 FAC species 33 x3 = 99
Herb Stratum (Plot size: 5'X5') = Total Cover	FACU species 47 x4 = 188
1. JENIZACHYPIUM SCOPERIUM ZO V/ IACO	UPL species 5 x 5 = 25
2 Juneus balticus 25 V FACW	Column Totals:(A)
3. Kanicum virgatum 15 FACU	Prevalence Index = B/A = 3.62
5. Aster Sp. MS FACU	Hydrophytic Vegetation Indicators:
6. Asclepias speciosa 18 FAC	1 - Rapid Test for Hydrophytic Vegetation 2 - Dominance Test is >50%
7. Antennaria Sp. 2 FACU	3 - Prevalence Index is ≤3.0¹
8. Elymus elymoides 5 UPL	4 - Morphological Adaptations (Provide supporting
10	data in Remarks or on a separate sheet) Problematic Hydrophytic Vegetation¹ (Explain)
Woody Vine Stratum (Plot size: $30' \times 30'$) Total Cover	¹Indicators of hydric soil and wetland hydrology must
1. Plot size: 10 × 70	be present, unless disturbed or problematic.
2.	Hydrophytic
% Bare Ground in Herb Stratum	Vegetation Present? Yes No
Remarks:	
9	
US Army Corps of Engineers	Great Plains – Version 2.0

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Sampling Point: SP6

Depth Matrix		Redox Features		
(inches) Color (moist)		olor (moist) % Type ¹ L	_oc²Texture	Remarks
0-10" loyn 41	2 100		- >L	
10-14" to YR 51	3 100 -		- SL	
		The state of the s	-	
		CONTRACTOR NAMED OF THE OWNER, THE		
**************************************			Acceptance of the second of th	
				20 214 1 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2
		uced Matrix, CS=Covered or Coated S		ation: PL=Pore Lining, M=Matrix.
lydric Soil Indicators: (App	licable to all LKKS	The same of the sa		or Problematic Hydric Soils ³ :
Histosol (A1)		Sandy Gleyed Matrix (S4)		uck (A9) (LRR I, J)
Histic Epipedon (A2) Black Histic (A3)		Sandy Redox (S5) Stripped Matrix (S6)		rairie Redox (A16) (LRR F, G, H) urface (S7) (LRR G)
Hydrogen Sulfide (A4)		Loamy Mucky Mineral (F1)		ains Depressions (F16)
Stratified Layers (A5) (LR	R F)	Loamy Gleyed Matrix (F2)		R H outside of MLRA 72 & 73)
1 cm Muck (A9) (LRR F, C		Depleted Matrix (F3)	The second secon	d Vertic (F18)
Depleted Below Dark Surf	Control of the Contro	Redox Dark Surface (F6)	AND 1887 100 100 100 100 100 100 100 100 100 10	rent Material (TF2)
Thick Dark Surface (A12)	(/	Depleted Dark Surface (F7)		allow Dark Surface (TF12)
Sandy Mucky Mineral (S1)	Redox Depressions (F8)		Explain in Remarks)
2.5 cm Mucky Peat or Pea		High Plains Depressions (F16)		f hydrophytic vegetation and
5 cm Mucky Peat or Peat	(S3) (LRR F)	(MLRA 72 & 73 of LRR H)	wetland	hydrology must be present,
			unless	disturbed or problematic.
Type: Depth (inches):	NA		Hydric Soil I	Present? Yes No
Type: Depth (inches):	NA		Hydric Soil I	Present? Yes No
Type: Depth (inches): Remarks:	NANIA		Hydric Soil I	Present? Yes No
Type: Depth (inches): Remarks: YDROLOGY	NIA		Hydric Soil I	Present? Yes No
Type: Depth (inches): Remarks: YDROLOGY Wetland Hydrology Indicato	N/A N/A	ck all that apply)		Present? Yes No
Type: Depth (inches): Remarks: YDROLOGY Vetland Hydrology Indicato	N/A N/A	ck all that apply)	Seconda	
Type: Depth (inches): Remarks: YDROLOGY Vetland Hydrology Indicato Primary Indicators (minimum of	N/A N/A		Secondar Surfa	y Indicators (minimum of two required
Type: Depth (inches): Remarks: YDROLOGY Vetland Hydrology Indicator Primary Indicators (minimum of minimum	W/A W/A rs: of one required; che	Salt Crust (B11)	Secondal Surfa	y Indicators (minimum of two required
Type: Depth (inches): Remarks: YDROLOGY Vetland Hydrology Indicator Primary Indicators (minimum of the company Indicators (Minimum of the com	W/A W/A rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13)	Secondal Surfa Surfa Spar	y Indicators (minimum of two required ace Soil Cracks (B6) sely Vegetated Concave Surface (B8) age Patterns (B10)
Type: Depth (inches): Remarks: YDROLOGY Vetland Hydrology Indicato Primary Indicators (minimum of the continuo	W/A W/A rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1)	Secondal Surfa Spar Drair Oxidi	y Indicators (minimum of two required ace Soil Cracks (B6) sely Vegetated Concave Surface (B8) age Patterns (B10)
Type: Depth (inches): Remarks: YDROLOGY Vetland Hydrology Indicato Primary Indicators (minimum of the continuo	W/A W/A rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3)	y Indicators (minimum of two required nce Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (C
Type:	N/A N/A rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (WI	y Indicators (minimum of two required ace Soil Cracks (B6) sely Vegetated Concave Surface (B8) age Patterns (B10) zed Rhizospheres on Living Roots (Ca
Type:	W/A W/A rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4)	Secondar Surfa Spar Spar Drair Oxidi Roots (C3) (wl	y Indicators (minimum of two required ace Soil Cracks (B6) sely Vegetated Concave Surface (B8) age Patterns (B10) zed Rhizospheres on Living Roots (Ca acre tilled)
Type:	W/A W/A rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl	y Indicators (minimum of two required toe Soil Cracks (B6) sely Vegetated Concave Surface (B8) tage Patterns (B10) zed Rhizospheres on Living Roots (Conere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9)
Type:	rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl Cray Satur Geor FAC	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) age Patterns (B10) zed Rhizospheres on Living Roots (Cinere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2)
Type:	rs: of one required; che	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl Cray Satur Geor FAC	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (Conere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2)
Type:	rs: of one required; che al Imagery (B7)	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl Cray Satur Geor FAC	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (Conere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2)
Depth (inches): Remarks: YDROLOGY Wetland Hydrology Indicator Primary Indicators (minimum of the content of	rs: of one required; che al Imagery (B7) Yes No _	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl Cray Satur Geor FAC	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (C3) nere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2)
Type:	rs: of one required; che al Imagery (B7) Yes No Yes No	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks) Depth (inches): Depth (inches):	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl Cray Satur Geor FAC	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (Conere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2) Neutral Test (D5) -Heave Hummocks (D7) (LRR F)
Type:	rs: of one required; che al Imagery (B7) Yes No Yes No	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks)	Secondal Surfa Spar Spar Drair Oxidi Roots (C3) (wl Cray Satur Geor FAC	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (C3) nere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2)
Type: Depth (inches): Remarks: YDROLOGY Netland Hydrology Indicato Primary Indicators (minimum of the content	rs: of one required; che al Imagery (B7) Yes No Yes No Yes No	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks) Depth (inches): Depth (inches):	Secondar Surfa Spar Spar Drair Oxidi Roots (C3) (wl Satur Geor FAC Frost	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (C3) nere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2) Neutral Test (D5) -Heave Hummocks (D7) (LRR F)
Type:	rs: of one required; che al Imagery (B7) Yes No Yes No Yes No	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks) Depth (inches): Depth (inches):	Secondar Surfa Spar Spar Drair Oxidi Roots (C3) (wl Satur Geor FAC Frost	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (C3) nere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2) Neutral Test (D5) -Heave Hummocks (D7) (LRR F)
Type: Depth (inches): Premarks: Proposition (A3) Water Marks (B1) Sediment Deposits (B2) Drift Deposits (B3) Algal Mat or Crust (B4) Iron Deposits (B5) Inundation Visible on Aeri Water-Stained Leaves (B5) Inundation Visible on Aeri Water-Stained Leaves (B5) Water Table Present? Saturation Present?	rs: of one required; che al Imagery (B7) Yes No Yes No Yes No	Salt Crust (B11) Aquatic Invertebrates (B13) Hydrogen Sulfide Odor (C1) Dry-Season Water Table (C2) Oxidized Rhizospheres on Living (where not tilled) Presence of Reduced Iron (C4) Thin Muck Surface (C7) Other (Explain in Remarks) Depth (inches): Depth (inches):	Secondar Surfa Spar Spar Drair Oxidi Roots (C3) (wl Satur Geor FAC Frost	y Indicators (minimum of two required noe Soil Cracks (B6) sely Vegetated Concave Surface (B8) nage Patterns (B10) zed Rhizospheres on Living Roots (Cinere tilled) fish Burrows (C8) ration Visible on Aerial Imagery (C9) norphic Position (D2) Neutral Test (D5) -Heave Hummocks (D7) (LRR F)



September 15, 2022

APPENDIX D

PREBLE'S MEADOW JUMPING MOUSE BLOCK CLEARANCE MAP

