

# TN|SDS

true north sustainable development solutions

## RESULTS OF THE GIRWOOD COMMUNITY ARCHAEOLOGICAL SURVEY FOR THE MUNICIPALITY OF ANCHORAGE AND THE ANCHORAGE HISTORIC PRESERVATION COMMISSION

PREPARED FOR:

***Municipality of Anchorage,  
Historic Preservation Commission***

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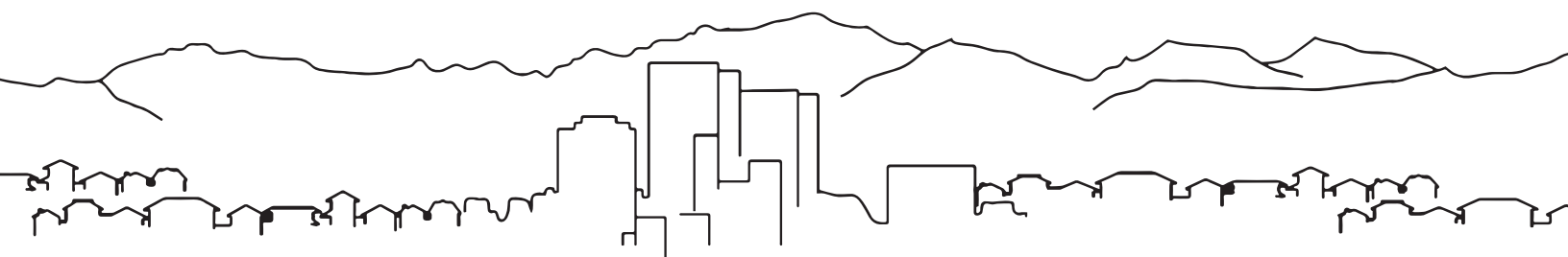
## EXECUTIVE SUMMARY

The Municipality of Anchorage (MOA) on behalf of the Anchorage Historic Preservation Commission (AHPC) contracted True North Sustainable Development Solutions, LLC, (TNSDS) through a term contract with Bettisworth North to complete a synthesis of past cultural resource investigations, conduct cultural resource surveys, and provide a historic properties roster of the built environment within the community boundaries of Girdwood, Alaska. Public meetings and community input identified an interest in an archaeological survey, specifically identifying a known site on State of Alaska land and areas within the Heritage Land Bank (HLB) holdings that are prone to development and/or indicate a high probability for archaeological resources. The archaeological component of this project was not funded under the Certified Local Government (CLG) grant, requiring a contract modification. As such, the results of the archaeological component of the project are presented as Appendix A to the *Final Girdwood Historic Buildings Survey and Historic Properties Roster with Historic Preservation Recommendations for The Municipality of Anchorage and The Historic Preservation Commission*. It is also pertinent that sensitive information pertaining to archaeological resources not be disseminated to the public and, therefore, Appendix A can be removed from the report when warranted.

The archaeological field survey was conducted by TNSDS Project Archaeologists Joan Bayles Burgett, MA, RPA, and Walker Burgett, MA on September 13th, 14th, and 15th, 2021; areas on land owned by the State of Alaska were surveyed on October 7th, 2021. The archaeological survey areas were designated with the input of AHPC members and community engagement meetings, with special focus placed on parcels prone to development. Subsurface testing did not occur on the lands owned and/or managed by the State of Alaska. Soil core testing on HLB land was limited to four tests taken with discretion in areas of high probability observed during pedestrian survey. Two soil core tests were conducted in Survey Area 2, adjacent to identified surface depressions, and two soil core tests were conducted in Survey Area 7, along the bluff overlooking Glacier Creek.

Two sites were recorded in the Office of History and Archaeology (OHA) Alaska Heritage Resource Survey (AHRS) database as a result of these archaeological investigations. The first site, Girdwood Bluff Site 01 (SEW-01753), is located on State of Alaska land, west of the US Forest Service (USFS) Glacier Ranger District Office. This site was previously identified by the community but had not previously received formal documentation or designation in the AHRS database. The features of the site include a wagon trail running east to west across the bluff and multiple surface depressions located between the trail and the bluff's edge. The second site, Girdwood Bluff Site 02 (SEW-01754), is located on HLB property on the east side of the Alyeska Highway and was recorded during the archaeological survey of Survey Area 2. The site contains two surface depressions along a bluff that may have connected to the Girdwood Bluff Site 01 before the construction of the Alyeska Highway.

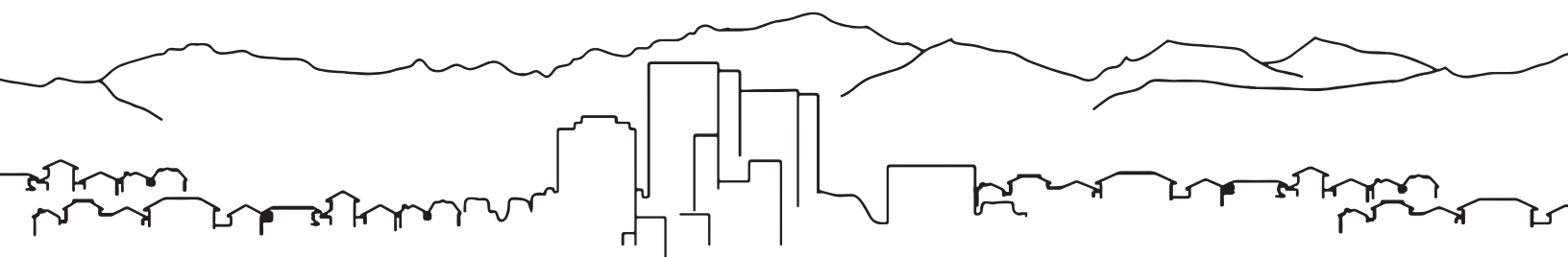
Girdwood has a multitude of historic trails that run throughout the valley, and considerable interest was expressed by the Girdwood community in identifying and inventorying all the trails. It was not feasible under the existing project scope and budget to conduct a complete survey of the many historic trails; however, the locations of historic trails were verified where they intersect the public right-of-way (ROW). In addition to limitations in project scope and funding, there are discrepancies across publicly available GIS trails information; therefore, the Iditarod National Historic Trail (INHT) was the primary focus of the historic trails study as it contained the most reliable location information.





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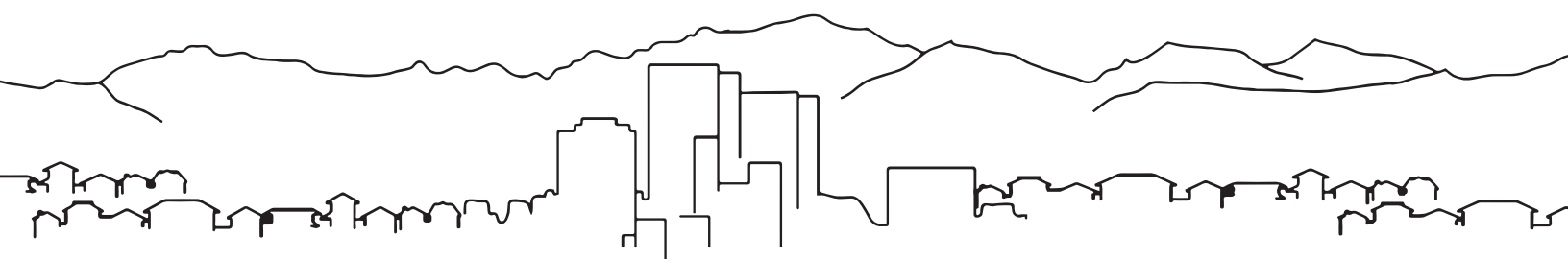
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## ACRONYMS/ABBREVIATIONS

<b>AHPC</b>	Anchorage Historic Preservation Commission
<b>AHPP</b>	Anchorage Historic Preservation Program
<b>AHRS</b>	Alaska Heritage Resources Survey
<b>BLM</b>	Bureau of Land Management
<b>CFR</b>	Code of Federal Regulations
<b>CLG</b>	Certified Local Government
<b>CM</b>	Centimeter
<b>CMBS</b>	Centimeter Below Surface
<b>DOE</b>	Determination of Eligibility
<b>DOT&amp;PF</b>	Department of Transportation and Public Facilities
<b>DNR</b>	Department of Natural Resources
<b>HLB</b>	Heritage Land Bank
<b>GIS</b>	Geographic Information System
<b>GPS</b>	Geographic Positioning System
<b>GTA</b>	Girdwood Trails Alaska
<b>GTC</b>	Girdwood Trails Commission
<b>GTP</b>	Girdwood Trails Plan
<b>GVTMP</b>	Girdwood Valley Trails Management Plan
<b>M</b>	Meter
<b>MOA</b>	Municipality of Anchorage
<b>NHPA</b>	National Historic Preservation Act of 1966, as amended
<b>NPS</b>	National Park Service
<b>NRHP</b>	National Register of Historic Places
<b>NTSA</b>	National Trails System Act
<b>OHA</b>	Office of History and Archaeology
<b>ROW</b>	Right of Way
<b>SCRIP</b>	State Cultural Resources Investigation Permit
<b>SHPO</b>	State Historic Preservation Office
<b>SOI</b>	Secretary of Interior
<b>TNSDS</b>	True North Sustainable Development Solutions, LLC
<b>USFS</b>	United States Forest Service





## INTRODUCTION

The archaeological survey was conducted by TNSDS project archaeologists Joan Bayles Burgett, MA, RPA, and Walker Burgett, MA. The pedestrian survey included limited soil core testing on HLB property and no sub-surface testing was carried out on State of Alaska land, where a site had been previously identified. The testing was determined appropriate in order to limit ground disturbance on HLB property and preserve the integrity of the Girdwood Bluff Site 01 on State of Alaska land. Archaeological survey of the HLB parcels were conducted on September 13th, 14th, and 15th, 2021, and State of Alaska land on October 7th, 2021. Two sites were recorded and documented during the archaeological investigation within Survey Area 1 and Survey Area 2. The first site is the previously identified Girdwood Bluff Site 01 (SEW-01753) on State of Alaska land, and the second Girdwood Bluff Site 02 (SEW-01754) is a site identified southeast of the Girdwood Bluff Site 01, along the same bluff edge, opposite of the Alyeska Highway. AHRs site cards have been completed for these two sites.

### Project Specific and Public Meetings

TNSDS attended a community workshop on June 29th, 2021, prior to finalizing the survey plan for the cultural resource's surveys. TNSDS Principal Historic Properties Consultant, Rob Meinhardt, MA, Project Archaeologist Joan Bayles Burgett and Project Manager Amy Ramirez coordinated this workshop with Municipality of Anchorage (MOA) Senior Planner Kristine Bunnell and Alaska Historic Preservation Commission (AHPC) member Connor Scher to assist with the planning of the archaeological survey. Also in attendance was Heather Hall (resident and US Forest Services Resource Archeologist), Julie Raymond-Yakoubian (resident and AHPC commission member), and Tommy O'Malley (resident).

USFS Archaeologist, Heather Hall, made the TNSDS team aware of a locally known archaeological site consisting of a wagon trail situated atop a bluff on State of Alaska land managed by the Alaska Division of Natural Resources which had not previously been recorded or designated on the AHRs database. Bunnell informed TNSDS that a previous cultural resources investigation was conducted at the site. Further discussion with Hall revealed the known existence of both prehistoric and historic components at the site. The site is located immediately west

of and adjacent to the USFS Glacier Ranger District Office, situated within a grove of trees, parallel to the bluff line. A wagon trail is highly visible and pointed in a north-western trajectory. Surface depressions were identified on the east side of the wagon trail.

The "Girdwood Bluff Complex: A Community Cultural Mapping Project" was prepared by David Guilfoyle and Genevieve Carey for Applied Archaeology International outlining a project design for the Girdwood Bluff site (Guilfoyle 2019). TNSDS inquired about the final report of this investigation, with OHA, but a final report has not yet been submitted to or published with OHA at the time of this current survey. An excavation carried out at the site by David Guilfoyle of Applied Archaeology Australia Party, Inc. resulted in a prehistoric chipped-stone tool (Heather Hall, personal communication to TNSDS, June 29, 2021).

Scher and Bunnell provided information about local HLB properties that are prone to development and in which the Iditarod National Historic Trail (INHT) traverses. The HLB parcels located east of the Girdwood K-8 Elementary School contain high probability areas for archaeological resources along a trail that follows an elevated landform next to Glacier Creek. This guided the development of the archaeological survey areas on HLB property along the INHT and an assessment of the highest probability areas.

Throughout the course of the project, the community expressed considerable interest in mapping and documenting the historic trails in the area. A full survey of the historic trails was not feasible within the scope and budget of this current project; however, TNSDS was able to document the historic trails that intersect with the public right-of-way utilizing the publicly available spatial data and the AHRs database. The INHT was the primary focus of the trail study owing to availability of information about the trail.

### Archaeological Survey Areas

TNSDS applied the information obtained during the public meetings and community input to define the survey areas within Girdwood. These survey areas will potentially provide an understanding of the probability of encountering archaeological resources within Girdwood, along Glacier Creek, and up Crow Creek Road. The



collation of information resulted in eight survey areas total, numbered one through eight. Changes during the course of the project resulted in Survey Area 7 being split to three smaller survey areas designated 7A, 7B, and 7C.

The Girdwood Bluff Site 01 is the only location in the project area that is managed by the State of Alaska and was selected for archaeological survey under this project after community outreach efforts identified undocumented cultural resources on the parcel. Areas within HLB parcels identified through background research as yielding a moderate to high probability for containing archaeological resources were subject to pedestrian survey within feasible limitations.

During initial project planning, survey areas were designated for both archaeological and historic architecture

survey. These survey areas, detailed in *Final Historic Buildings Inventory and Archaeological Survey Plan with Draft Historic Properties Roster for the Municipality of Anchorage and the Community of Girdwood* (Meinhardt, et al. 2021), were further broken down for the archaeological survey into areas of highest probability for archaeological findings (Figure 1).

The archaeological survey areas were further delineated to the highest probability areas that could be feasibly covered by the archaeologists. These final survey areas are as illustrated in Figure 2. The survey areas included a total of 89.85 acres on HLB parcels and 2.84 acres on State of Alaska-owned land. Select survey areas on HLB parcels were not able to be surveyed in their entirety due to accessibility issues and inclement conditions with a lack of ground visibility.

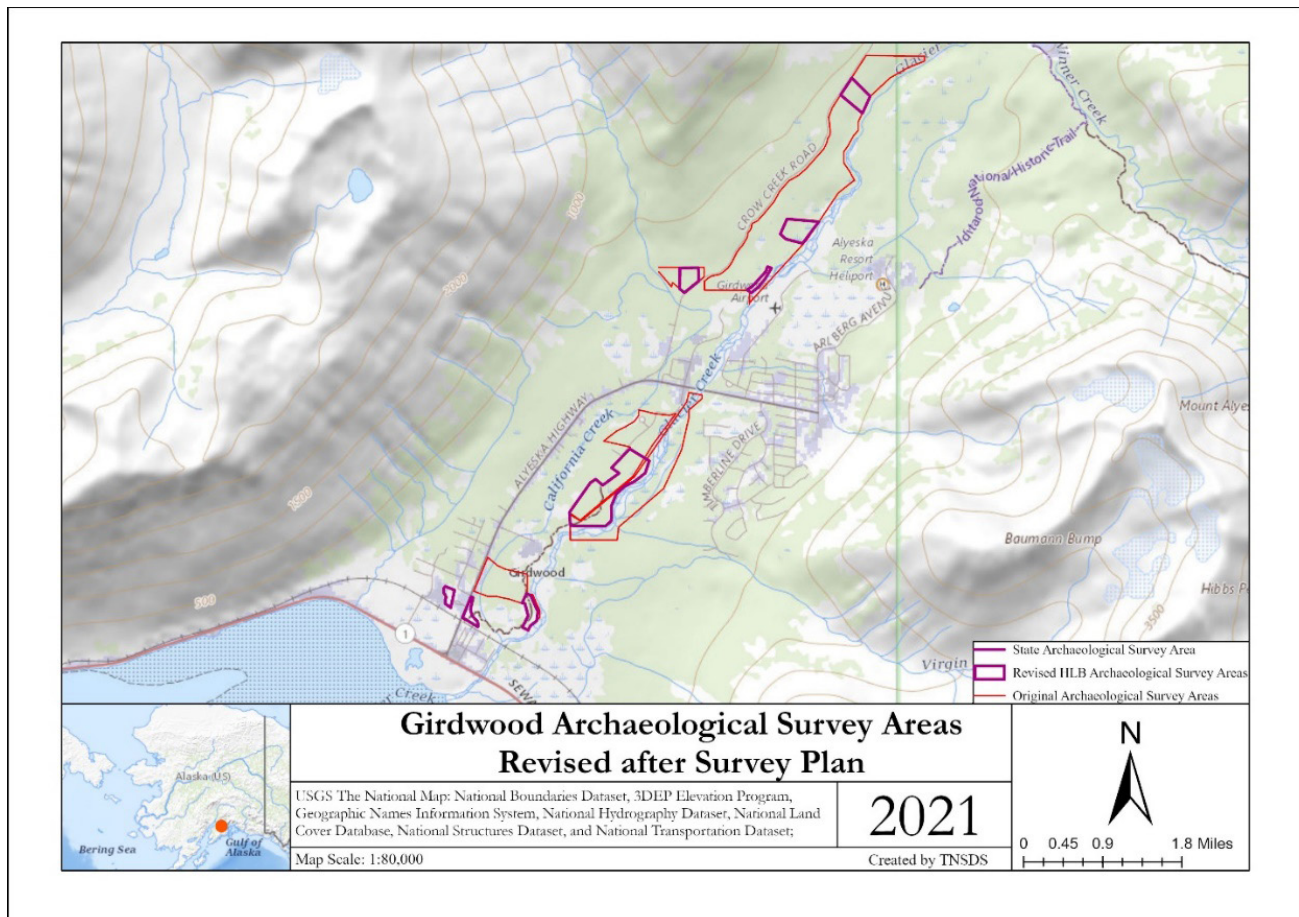


Figure 1. Girdwood archaeological survey areas revisions after survey plan was complete.

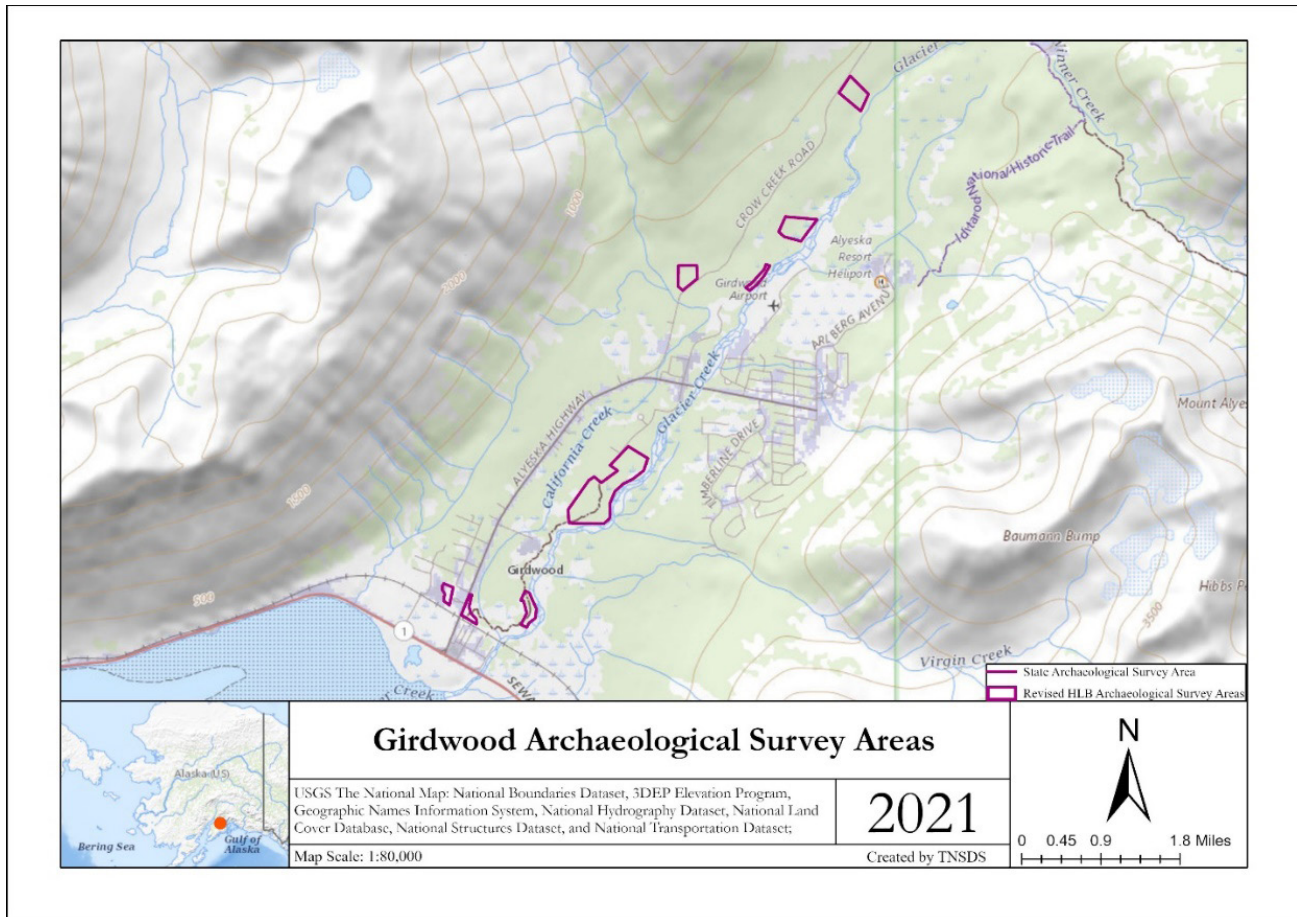


Figure 2. Final Girdwood Archaeological Survey Areas.

## METHODOLOGY

Background research consisted of a desktop review that was intended to identify documented historic buildings, sites, structures, objects, and/or districts within Girdwood. The data was presented to AHPC in April of 2021, under the title *Desktop Review of Past Cultural Resources Investigations and Previously Documented Cultural Resources Located within the Girdwood Community Council Boundaries* (Meinhardt et al. 2021). Data used to direct the development of the survey plan and define proposed survey areas was obtained from the AHPC and OHA. Background research indicated the recorded archaeological sites documented within Girdwood are historic in nature. TNSDS applied this archival search and literature review to create manageable survey areas across Girdwood for archaeological resources. TNSDS ac-

cessed the MOA open data ArcGIS information page for public information including environmental data layers (wetlands, topography, avalanche outwash zones).

## Cultural Resources Survey

Field survey was completed by TNSDS project archaeologists Joan Bayles Burgett, MA, RPA, and Walker Burgett, MA who meet the Secretary of Interior (SOI) Professional Qualification Standards as professional archaeologists. Cultural resource permits were obtained prior to the survey, including the Land Use Permit by the Municipality of Anchorage Real Estate Department Heritage Land Bank (Appendix C) and the State Cultural Resources Investigation Permit (SCRIP) by the Alaska Department of Natural Resources (DNR), Office of History and Archaeology (Appendix D).

Areas warranting archaeological survey based upon probability modeling on HLB parcels were subject to pedestrian survey with transect lines as feasible. Discretionary subsurface soil core testing was conducted at areas of high probability as deemed necessary by the on-site archaeologists. Archaeological resources and/or surface features were documented by photograph and georeferenced using a handheld Global Positioning System (GPS) (Appendices A and B). AHRs site cards have been completed for the two archaeological sites identified in the archaeological survey (Appendix E).

## CONTEXT STATEMENTS

The Anchorage Historic Preservation Program (AHPP) provided TNSDS with draft historic context statements for Girdwood, titled *Girdwood History and Character Summary, Historic Context Statement: Public Review Draft*. TNSDS used these historic context statements throughout the course of the project and added to the existing prehistoric context statements as applicable. Further in-depth research to expand the existing context statements was not undertaken at this time, as it was not included with the current project scope.

### Prehistoric and Ethnographic Context

Prehistoric context of the Girdwood area extends back to early Cook Inlet cultures between 7,500 and 10,000 years ago (Reger 2003). These early cultures predominantly hunted larger land and sea mammals along the coast and are characterized by the stone core and blade tools they used. Some evidence for the occupation of the Turnagain Arm region is found approximately 21 miles northwest of Girdwood at Beluga Point, situated along the Turnagain Arm of Upper Cook Inlet. This archaeological site is an important one for interpreting the timeline in which humans occupied the region (Reger and Faith 2004). Archaeological evidence recovered from this site shows multiple cultures occupied the area through time. The archaeological evidence for the earliest inhabitants is characterized by: stone cores and blades (7,000 to 10,000 BP), stemmed stone points, and chipped knives (5,000 to 4,000 BP), ground slate projectile points (4,000 to 3,500 BP) and later copper implements associated with the Dena'ina peoples (1,000 BP) (Reger and Faith 2004).

The most recent and current indigenous culture to occupy the area are the Dena'ina, who moved into the region for the first time circa 1,500 to 1,000 years ago (Reger 2003). Unlike earlier Cook Inlet peoples, the Dena'ina relied much more on smaller game such as squirrels and rabbits, as well as fish migrations of salmon and trout (Reger 2003). Although there was much activity throughout the area there are no known prehistoric sites located within the current town of Girdwood (Kari and Fall 2003). Ethnographic studies have indicated that a prehistoric trail system going from Portage Bay to the Knik Arm crosses through the Girdwood area near Winner Creek and up Crow Creek (Kari and Fall 2003). Later these trails would become part of the INHT and used as an important trail system for Girdwood's earliest Euro-American residents.

While there were early explorations by both Russian and European parties to the Turnagain area, known occupation of the Girdwood area by these peoples did not occur until the Gold Rush starting around 1895. The original settlement in Girdwood was known as Glacier City and was an important supply camp for miners in the area.

Glacier City would later be renamed Girdwood after James Girdwood, an Irish immigrant and linen merchant who had gold claims on Crow Creek (Girdwood, Inc. 2021). Mining declined after the start of World War I and the population of Girdwood declined with it. After the war, the federal government spurred new growth in Girdwood by beginning railroad construction in 1915 to connect Girdwood to Seward. Trees were felled from the mountain slopes up Crow Creek Road and skidded down Winner Creek, to be milled and used for railroad ties. The Alaska Engineering Commission platted the original townsite in 1916, while completing the railroad link to Seward, which passed along the north edge of town (AHPP 2020).

## RESULTS OF THE ARCHAEOLOGICAL SURVEY

### Survey Area 1

Survey Area 1 is located on a State of Alaska parcel abutting the USFS Glacier Ranger District Office and overlooking the Department of Transportation and Public Facilities (DOT&PF) buildings. Survey Area 1 was defined by



the property boundaries of the State of Alaska Parcel ID 07513231000 (US Survey 3042 LT 73 TR NEG) and covers 2.84 acres (Figure 3). This survey area contains a cultural site previously identified by the community; however, the site has not been documented within the AHRs database and no previous investigation reports have been made available for it. The site features include a segment of a wagon trail and surface depressions of varying size. The survey area measured 526 feet from the northeast corner to the southeast corner and 330 feet at its widest segment from east to west.

The survey area was accessed from the USFS Glacier Ranger District Office parking lot. Site features are not visible from the right-of-way due to tall trees covering the bluff (Figure 4). The southern portion of the area is comprised of tall spruce trees with a high canopy and

minimal underbrush vegetation. The southern half of the survey area had excellent ground visibility with the caveat that brush had recently been cleared around the USFS District Office parking lot and piled within the survey area. It is known that surface depressions were present underneath the piled brush; however, there was too much brush for the archaeologists to clear by hand within the time constraints of the survey. Photographs were taken for documentation of the brush. Any surface depressions present under the cleared brush could not be included within this narrative. The surrounding vegetation of the survey area consists of small willow and alder groves. The landscape of the northern segment of the survey area contains thicker vegetation, alder groves, and small standing wetland areas. The northern boundary of the survey area leads to residential houses and private property.

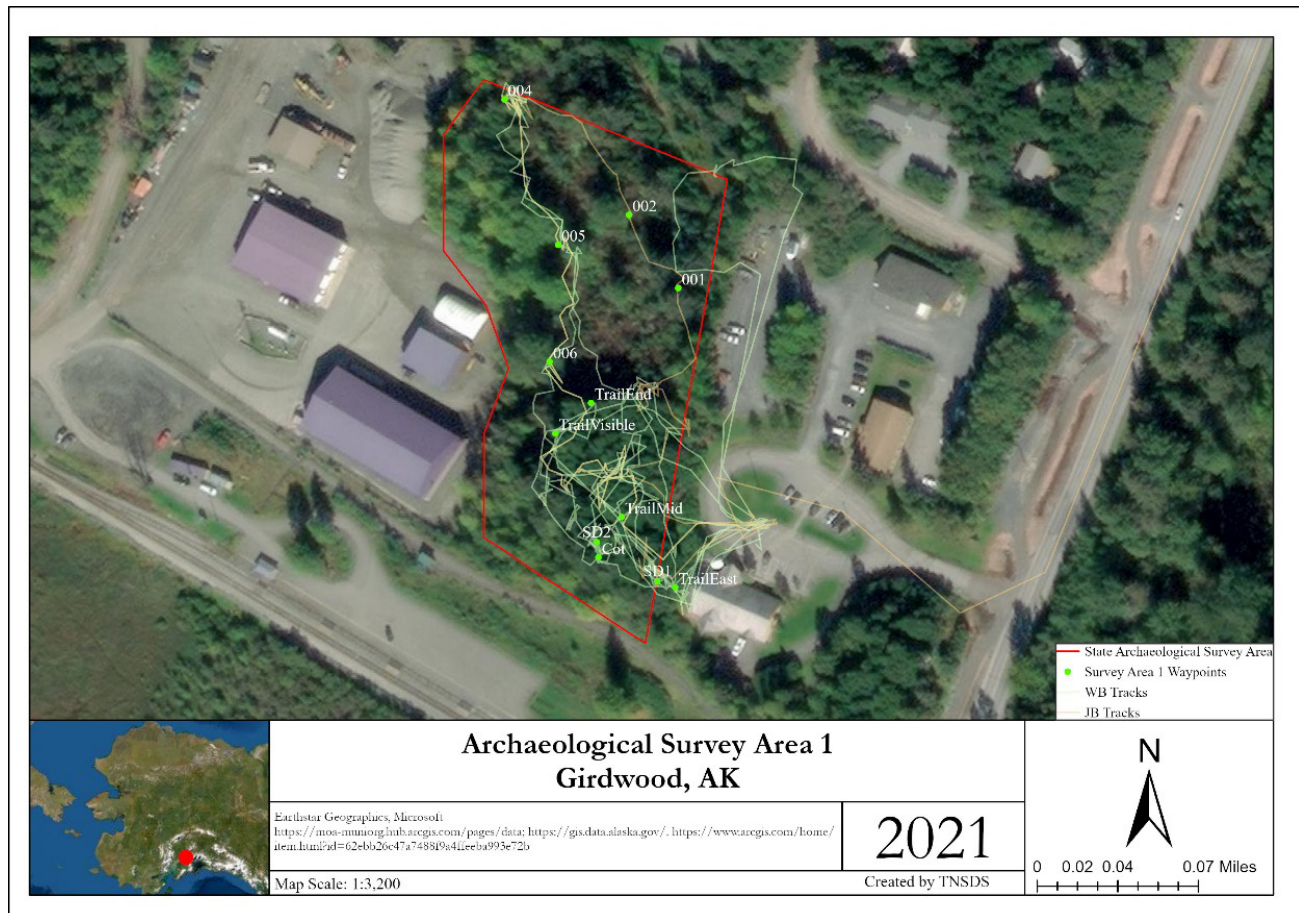


Figure 3. Survey Area 1 boundaries and survey tracks.





Figure 4. Archaeological Survey Area 1 forested area from parking lot, facing southwest (©TNSDS 2021).

The survey began at the wagon trail, which was accessed from the USFS District Office located in the southeast corner of the survey area. The southeastern corner of the survey area and the southern half, contains all the known cultural features in this area. Survey commenced northward to the northern and western boundaries of the survey areas, and no cultural features were identified. The archaeologists attempted to survey where brush piles had been dumped, but the limited ground visibility and amount of brush resulted in only one surface depression identified within the southeast corner. The first surface depression identified is in the eastern extent of the survey area, placed between the wagon trail and the edge of the bluff. The surface depression measured 1m wide and 1.7m long (Figure 5). Previous discussion with the USFS archaeologist revealed that a porpoise corpse was buried in the area during scientific investigations in the 1990s (personal communication, Hall 2021). It is uncertain if the observed surface depression is related to this information.

The survey skirted around the large brush piles within the southeast corner and transects were conducted by both archaeologists on the south side of the wagon trail, along the bluff's edge. The second surface depression identified is significantly larger and deeper, measuring 1.8m wide and 4.3m long, with an average depth of 30cm. A wooden cot frame is located directly east of the depression; it is unknown if there is association between the wood frame and the surface depression (Figure 6). The wooden cot frame measured 67cm wide and 1.9m long (Figure 7). It is unknown if Surface Depression 01 and Surface Depression 02 are related or of the same period or same affiliation.



Figure 5. Surface Depression 01 with flags and scale, view facing southwest (©TNSDS 2021).



Figure 6. Surface Depression 02 with flags and scale, note the wood cot, view facing east (©TNSDS 2021).



Figure 7. Wooden frame with scale located immediately adjacent to surface depression (©TNSDS 2021).

The survey continued parallel to the wagon trail and the bluff's edge. At the end of the bluff, in the southwest corner of the survey area, is a small, level area with no underbrush. An archaeological test unit was reportedly con-



ducted at the site by Applied Archaeology International; the results of that investigation have not been published and TNSDS did not have access to the information during or after this survey. A prehistoric point was reportedly found within the test unit, increasing the archaeological information potential of the site. Currently, only a coffee can with bullet holes is located within the area (Figure 8).

The wagon trail follows the course of the bluff and turns to the north with the edge of the bluff. The wagon trail is highly visible from the property boundary with the USFS District Office (Figure 9). The wagon trail follows the bluff line east to west and at the end of the bluff, the trail curves north and cannot be clearly defined. The archaeologists documented the last clearly visible sign of the wagon trail and conducted a survey on the northern and western portion of the survey area in an attempt to locate any continuation of the trail. Alder groves growing in a cut bank off the bluff made it difficult to assess if the trail would have descended down the bluff, or continued north where erosion, vegetation, and lack of use have covered the trail (Figure 10 - Figure 12).



Figure 8. Southwest corner of survey area; reported location of past archaeological test unit (©TNSDS 2021).

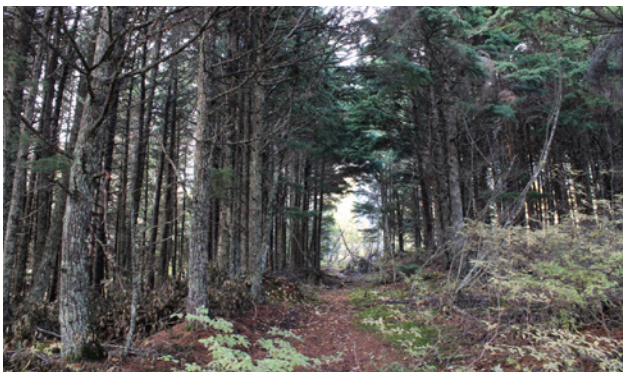


Figure 9. From eastern extent of trail, at property boundary of parcel, view facing west (©TNSDS 2021).



Figure 10. Small alder trees growing at western extent of trail, view facing east (©TNSDS 2021).



Figure 11. Trail curves around bluff, possibly naturally eroded away, view facing south (©TNSDS 2021).



Figure 12. Wagon trail disappears around the bluff edge, view facing north (©TNSDS 2021).

From the western extent of the survey area, the archaeologists conducted survey transects of the area just north of the wagon trail. Within this area, the natural deposition of the soils on the bluff makes the ground very



porous and easy to leave marks on the soil. There are several areas where it is difficult to discern if there are human manufactured surface depressions or the depressions are the result of trees falling naturally and creating these depressions. A sample picture was taken of an area with this phenomenon (Figure 13 and Figure 14). Without systematic archaeological testing, the on-site archaeologists were cautious as to whether to deem these cultural or natural depressions.



Figure 13. Depressions that could not be determined as cultural or natural, view facing northwest (©TNSDS 2021).



Figure 14. Overview of depressions that could not be definitively determined as cultural, view facing northwest (©TNSDS 2021).

Likely not contributing to the site, as no archaeological information can be deemed from these objects, were two trees with boards nailed to them. One tree with three cut 2x4 boards nailed to it, in the fashion of a trail marker, was located on the southern extent of the site, along the bluff's edge (Figure 15). A smaller board on another tree, likely an old sign as well, was located at the northern extent of the site, overlooking the parking lot (Figure 16).



Figure 15. Three boards nailed to tree south of wagon trail, view facing northwest (©TNSDS 2021).



Figure 16. Worn wood sign overlooking USFS District Office parking lot, view facing south (©TNSDS 2021).



Survey continued on the north/ northwest section of the survey area beyond the cut bank where the wagon trail ended. The archaeologists conducted separate transects and surveyed the bluffs edge for the continuation of the wagon trail or additional surface depressions. The northern section of the survey area contained areas with poor drainage and standing water, with denser vegetation in general. Photograph overviews of the landscape and topography were taken with associated waypoints (Table 1: Figure 17 - Figure 24).

Parallel to the eastern Survey Area 1 boundary to the north, the ground becomes increasingly unlevel with dense vegetation at the northern boundary of the survey area (Figure 18 - Figure 19). The treetops of the wagon trail bluff site are visible from this small clearing of trees, as illustrated in Figure 21. Viewshed of the surrounding area was restricted by trees on the northern half of the survey area. The bluff line was surveyed by both archaeologists in attempts to identify a continuation of the wagon trail (Figure 22 - Figure 24). No cultural features were identified on the northern half of the survey area.

**TABLE 1. SURVEY AREA 1 OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.**



Description	Overview Photograph
<p>Figure 17. Survey Area 1 Photograph Overview Waypoint 001, view facing north (©TNSDS 2021).</p>	
<p>Figure 18. Survey Area 1 Photograph Overview Waypoint 002, view facing south (©TNSDS 2021).</p>	



Figure 19. Survey Area 1 Photograph Overview Waypoint 003, view facing east (©TNSDS 2021).



Figure 20. Survey Area 1 Photograph Overview Waypoint 004, view facing west (©TNSDS 2021).



Figure 21. Survey Area 1 Photograph Overview Waypoint 005, view facing east (©TNSDS 2021).





Figure 22. Survey Area 1 Photograph Overview Waypoint 005, view facing south (©TNSDS 2021).



Figure 23. Survey Area 1 Photograph Overview Waypoint 005, view facing west (©TNSDS 2021).



Figure 24. Survey Area 1 Photograph Overview Waypoint 006, view facing south (©TNSDS 2021).





**Girdwood Bluff Site 01**

The Girdwood Bluff Site 01 (SEW-01753) is located on State of Alaska Parcel 0751323100, located west of the Alyeska Highway, abutting the USFS Glacier Ranger District Office (US Survey 3042 LT 73 TR NEG). The site is situated on a natural bluff that overlooks the DOT&PF buildings and comprises a 0.74-acre area. The site contains at least two surface depressions and a wagon trail segment that runs east to west across the bluff. More surface depressions are present but were covered by cleared brush piles at the time of documentation. Surface Depression 01 was designated as the first surface depression, located south of the wagon trail, it measured 1m wide and 1.7m long. Surface Depression 02 is a larger surface depression located south of the wagon trail along the bluff.

It measured 1.8m wide and 4.3m long with a depth of 30cm. A wood frame is located immediately east of the surface depression and measured .67m wide and 1.9m long. There is potential for additional surface depressions on the north side of the wagon trail as well; however, the combination of soft topsoil and uprooted trees made any man-made surface depression unidentifiable from the numerous natural ones in this area. The wagon trail fluctuates from 8 to 12 feet wide and follows the natural bluff line for approximately 200 feet before curving to the north for another 20 to 40 feet before disappearing from trace. The site boundaries include the full length of the visible wagon trail, as well as overlap to the south and north for surface depression features near the wagon trail.

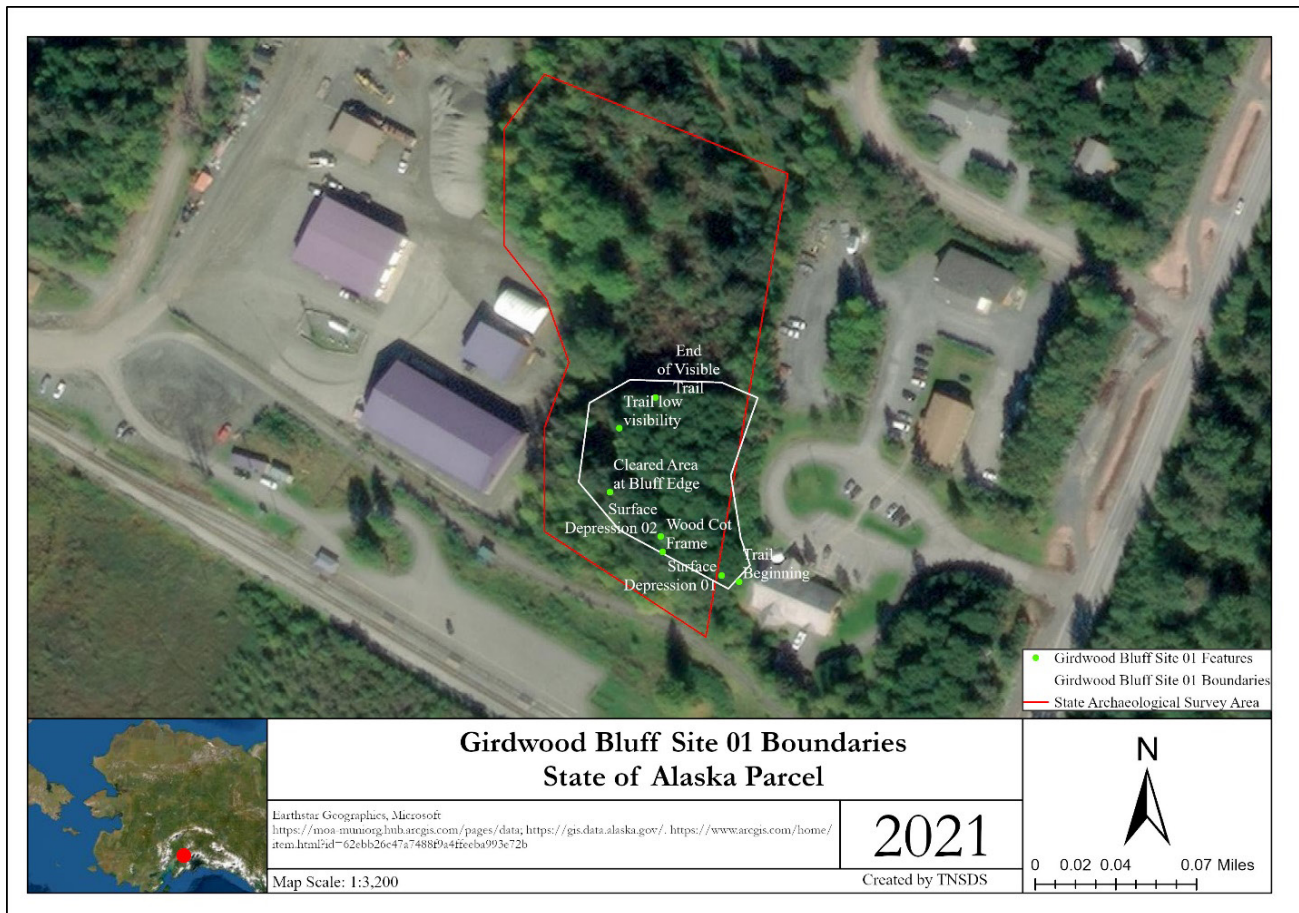


Figure 25. Girdwood Bluff Site 01 site boundaries.

TABLE 2. GIRDWOOD BLUFF SITE 01 FEATURES AND GIS WAYPOINTS.		
Field Waypoint	Description	Latitude, Longitude (NAD83)
Trail Beginning	Beginning of Trail next to USFS Office	60.9443880, -149.1721280
Surface Depression 01	Survey Area 1 Surface Depression 01	60.9444070, -149.1722390
Surface Depression 02	Survey Area 2 Surface Depression 02	60.9445260, -149.1726200
Wood Frame	Wood frame next to Surface Depression 02	60.9444790, -149.1726090
Cleared Area at Bluff Edge	Cleared area where past archaeological test unit was excavated.	60.9446610, -149.1729390
Trail Low Visibility	Trail curves around bluff and begins to disappear.	60.9448560, -149.1728800
End of Visible Trail	End of the visible trail.	60.9448560, -149.1728800

### Survey Area 2

Survey Area 2 was located on HLB property directly east of Survey Area 1 and is the terminus of the same natural bluff. Survey Area 2 measured 665 feet north to south and 519 feet east to west and encompassed an area of 14 acres total (Figure 26). Survey Area 2 is located east of the Alyeska Highway, with the railroad tracks to the south. The landscape is a continuation of the bluff from Survey Area 1 and its terminus, with an elevated portion within

the survey area. The northwest boundary of Survey Area 2 is the Lower Iditarod Trail, referred to as the INHT as well. A utility line cuts through the survey area and on the eastern boundary of the survey area. The INHT connects to Alyeska Highway in the northern portion of the survey area at waypoint 55.

The archaeologists accessed the parcel at the utility line and conducted a survey of the bluff’s edge, which was determined as having the highest probability within the

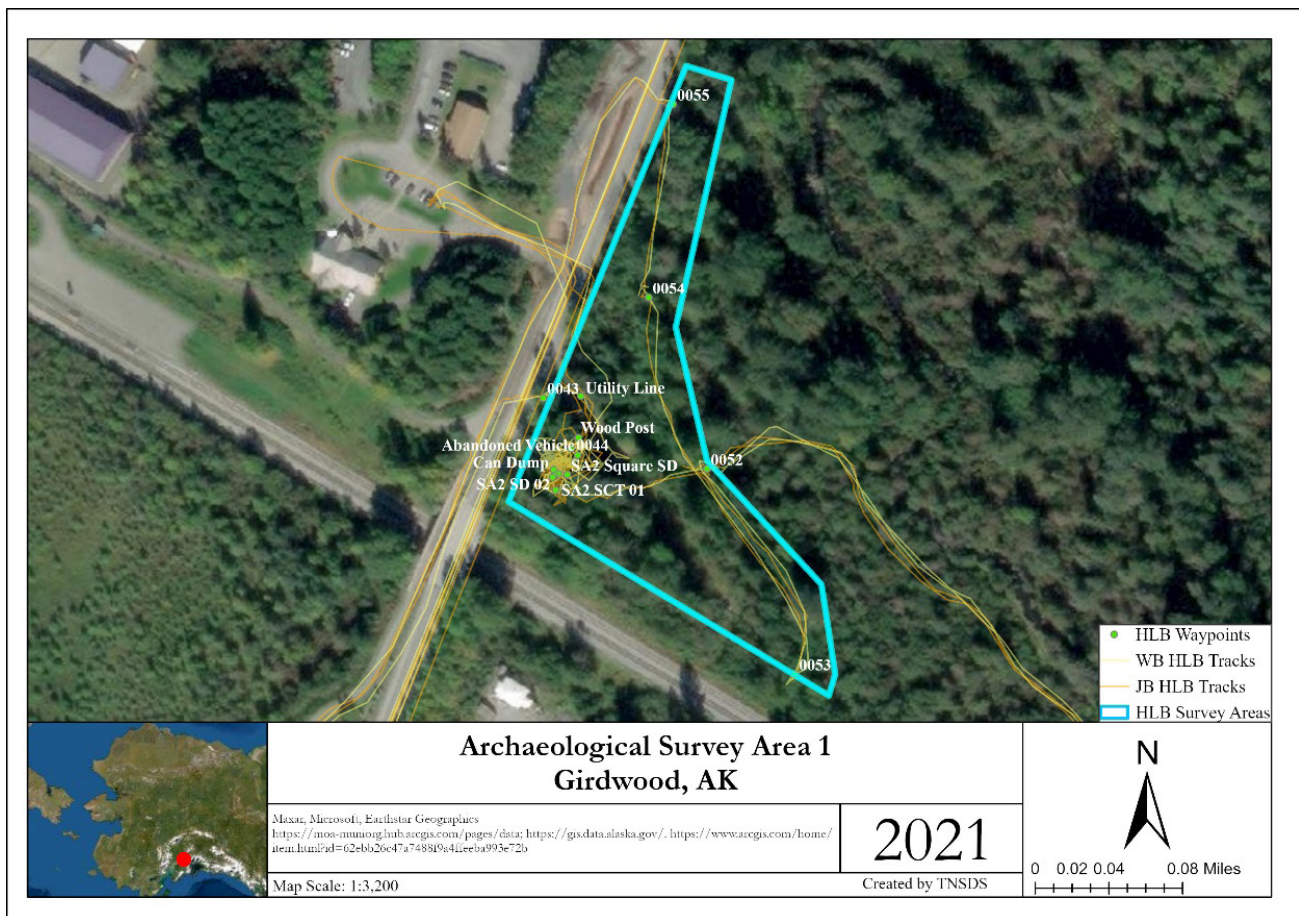


Figure 26. Archaeological Survey Area 2 and survey tracks.



survey area. A site was identified within Survey Area 2 with the presence of two surface depressions along the bluff edge. Located near the surface depressions was a square surface depression indicative of a past archaeological test unit. The archaeologists documented the cultural materials located on top of the bluff at its southeastern terminus. Identified within the survey area delineated as Girdwood Bluff Site 02 was an old automobile, possibly a Chevy Coup from the 1940s-50s, associated scrap metal, can dump, and two circular surface depressions and one square surface depression (Figure 27 through Figure 35).

The abandoned automobile was oriented east to west, facing the Alyeska Highway (Figure 27). The automobile was in poor condition, with the front missing and all glass broken out. On the driver's door, the word "SMITH" is painted and still visible (Figure 28). The abandoned vehicle has seen recent use as modern garbage was located inside. Associated scrap metal is located within the automobile and scattered to the south of it.



Figure 27. Possible Chevy Coup, view facing southeast (©TNSDS 2021).



Figure 28. "SMITH" painted on driver's door, view facing north (©TNSDS 2021).



Figure 29. Rear view of Chevy Coup, modern trash visible inside, view facing west (©TNSDS 2021).



Figure 30. Overview of abandoned vehicle and associated scrap metal, view facing west (©TNSDS 2021).

To the south of the vehicle, is a square surface depression that is quite visible due to missing top vegetation (Figure 31). The square surface depression measures 1m by 1m (Figure 32). The nature of the removed top vegetation indicates possibly that a recent excavation occurred, likely associated with the 2019 Girdwood Bluff investigations. As mentioned previously, there are no published or accessible reports for the 2019 project to confirm this as a test pit; however, the nature of the depression deems it likely. The location of the square surface depression is 17 ft (5.18m) south of the automobile and 10ft (3.04m) north of the surface depressions.





Figure 31. Square surface depression in relation to vehicle, view facing northwest (©TNSDS 2021).

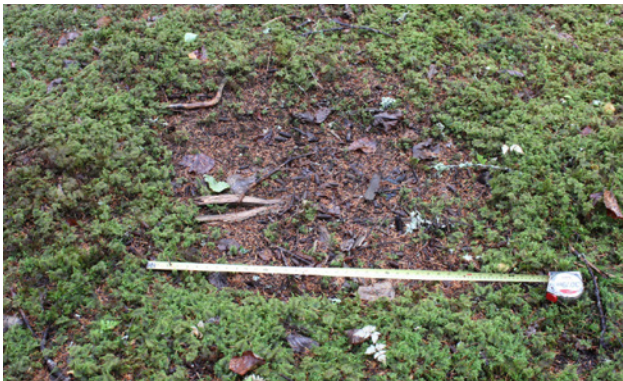


Figure 32. Square surface depression, likely previous archaeological test unit (©TNSDS 2021).

Two additional surface depressions are located near the bluff's edge, to the south of the vehicle and the square surface depression. These depressions are prominent, as they are side by side and contain small trees growing from their centers. The surface depressions are well-defined, with a small wall separating the two (Figure 33). Surface Depression 01 was designated as the northern surface depression and Surface Depression 02 was designated as the southern surface depression, which is also closest to the bluff.

Surface Depression 01 measured 120cm (E-W) by 155cm (N-S) with a 20cm depth. Six small white spruce trees are growing out of the middle of the depression. Two trees separate the surface depressions and are growing out the depression wall. Surface Depression 02 measured 155cm (E-W) by 155cm (N-S) with a 30cm depth. Surface Depression 02 contained four small white spruce trees growing from within (Figure 34). A small can dump was located ten feet to the north of the surface depressions, which included three full cans, one metal cup, and one tin metal bottom (Figure 35).



Figure 33. Two surface depressions with small trees growing from middle, view facing west (©TNSDS 2021).



Figure 34. Close up of two surface depressions, scale behind trees, view facing west (©TNSDS 2021).



Figure 35. Small can dump, plan view with scale (©TNSDS 2021).

Two soil core tests were conducted on the east and west side of the surface depressions (Figure 36 - Figure 39). The first soil core test, Soil Core Test A, was conducted on the east side of the surface depressions, approximately ten feet away from the edge of the surface depressions



(Figure 36, Table 3). Of note, at 12cmbs a grey silty clay inclusion was identified and was assessed as a silt/clay but could be a possible ash deposit from previous volcanic activity (Figure 37). The final depth of Soil Core Test A was 28cmbs and was negative for cultural materials with no clear evidence of soil disturbance.

**TABLE 3. SA2 SOIL CORE TEST 1 GENERAL SOILS PROFILE.**

Depth	Munsell	Description	Results
0 – 12 cm	5 YR 3/2	Dark, reddish brown	Negative
12cm	5 YR 6/1	Grey	Negative
13cm – 24cm	2.5 YR 4/6	Red	Negative
24cm – 28cm	5 YR 5/6	Yellowish Red – Pebbles	Negative



Figure 36. SA2 Soil Core Test 1 in association to surface depressions, view facing west (©TNSDS 2021).

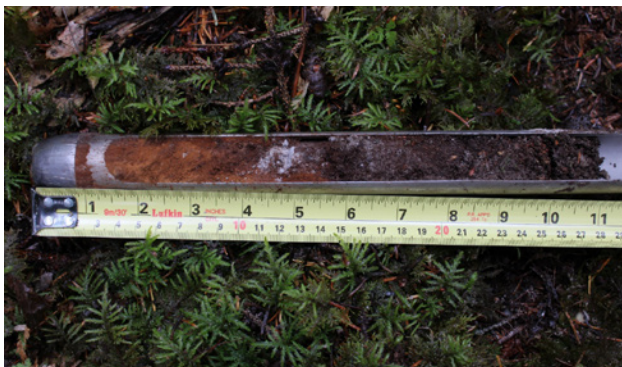


Figure 37. SA2 Soil Core Test 1, plan view with scale (©TNSDS 2021).

Soil Core Test 2 was located west of the surface depressions, approximately ten feet away (Figure 38). The general soils profile of the soil core test contained two soil types: from 0 to 25cm, a reddish brown soil and from 25 to 35cm, a red soil (Figure 39, Table 4). The soil core test resulted negative for cultural materials and did not have any change in stratigraphy or characteristics.

**TABLE 4. SA2 SOIL CORE TEST 2 – GENERAL SOILS PROFILE.**

Depth	Munsell	Description	Result
0 – 25cm	5YR 4/3	Reddish Brown	Negative
25 – 35cm	2.5 YR 4/6	Red	Negative



Figure 38. SA2 Soil Core Test 2 in association to surface depressions, view facing east (©TNSDS 2021).



Figure 39. SA2 Soil Core Test 2, plan view with scale (©TNSDS 2021).

Survey continued around the boundaries of Survey Area 2 to assess the surrounding landscape and if there were other cultural materials located within or adjacent to the survey area. The entire northeastern boundary is the INHT and signage is located at a path intersection (Figure 40 - Figure 43). From the trail signage, the small path was surveyed southeast in direction, bordering the edge of Survey Area 2. The small area between the path and the railroad tracks contains dense alders and evidence of extensive past ground disturbance (Figure 44 - Figure 47). Transects were not feasible, owing to the dense vegetation. The trail was then followed in its entirety to the north and east boundary of the designated Survey Area 2. The trail ascends the small bluff and curves to the north, with steep slopes and thick vegetation (Figure 48). Survey Area 2 coverage was completed at the intersection of the INHT and the Alyeska Highway (Figure 49).



TABLE 5. SURVEY AREA 2 OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.




Description	Overview Photograph
Figure 40. Survey Area 2 Photograph Overview Waypoint 052, view facing north (©TNSDS 2021).	 A gravel path winds through a forest. On the left, a wooden signpost stands on a large rock. On the right, another wooden signpost is visible. The path is covered with fallen leaves.
Figure 41. Survey Area 2 Photograph Overview Waypoint 052, view facing east (©TNSDS 2021).	 A gravel path winds through a forest, surrounded by dense green foliage and trees. The path is covered with fallen leaves.
Figure 42. Survey Area 2 Photograph Overview Waypoint 052, view facing south (©TNSDS 2021).	 A gravel path winds through a forest, surrounded by dense green foliage and trees. The path is covered with fallen leaves.



Figure 43. Survey Area 2 Photograph Overview Waypoint 052, view facing west (©TNSDS 2021).



Figure 44. Survey Area 2 Photograph Overview Waypoint 053, view facing north (©TNSDS 2021).

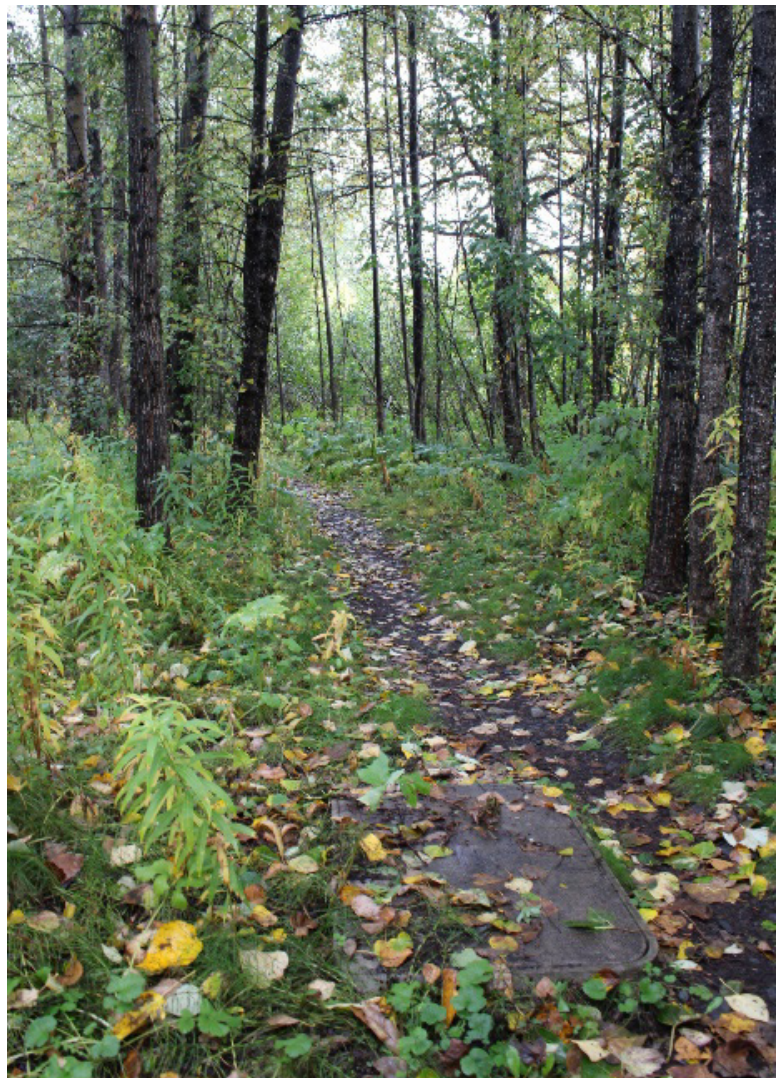




Figure 45. Survey Area 2 Photograph Overview Waypoint 053, view facing east (©TNSDS 2021).



Figure 46. Survey Area 2 Photograph Overview Waypoint 053, view facing south (©TNSDS 2021).



Figure 47. Survey Area 2 Photograph Overview Waypoint 053, view facing west (©TNSDS 2021).





Figure 48. Survey Area 2 Photograph Overview Waypoint 054, view facing north (©TNSDS 2021).



Figure 49. Survey Area 2 Photograph Overview Waypoint 055, view facing south (©TNSDS 2021).



### ***Girdwood Bluff Site 02***

The Girdwood Bluff Site 02 (SEW-01754) is located on HLB Parcel 07513230 located east of the Alyeska Highway and north of the Alaska Railroad (US Survey 3042 LYT 72). The site is located on a small natural bluff that overlooks the railroad tracks to the south and is bordered by the powerline path to the north. This is a small site designated within a 0.14-acre area and contains two circular surface depressions located near the bluff's edge (Figure 61, Table 6). Surface Depression 01 was designated as the surface depression located north and Surface Depression 02 was designated as the surface depression located to the

south, closest to the bluff. Surface Depression 01 measured 1.2m wide and 1.55m long with a 20cm depth and contained six small white spruce trees growing within the middle. Two trees separate the surface depressions. Surface Depression 02 measured 1.55m wide and 1.55m long with a 30cm depth and four small white spruce trees growing from within. To the north of the surface depressions is an abandoned vehicle, possibly 1940-50s Chevy Coup, and metal debris. Located between the circular surface depressions and the abandoned vehicle is a square surface depression, likely a recent archaeological test unit. The Girdwood Bluff Site 02 is surrounded by segments of the INHT.



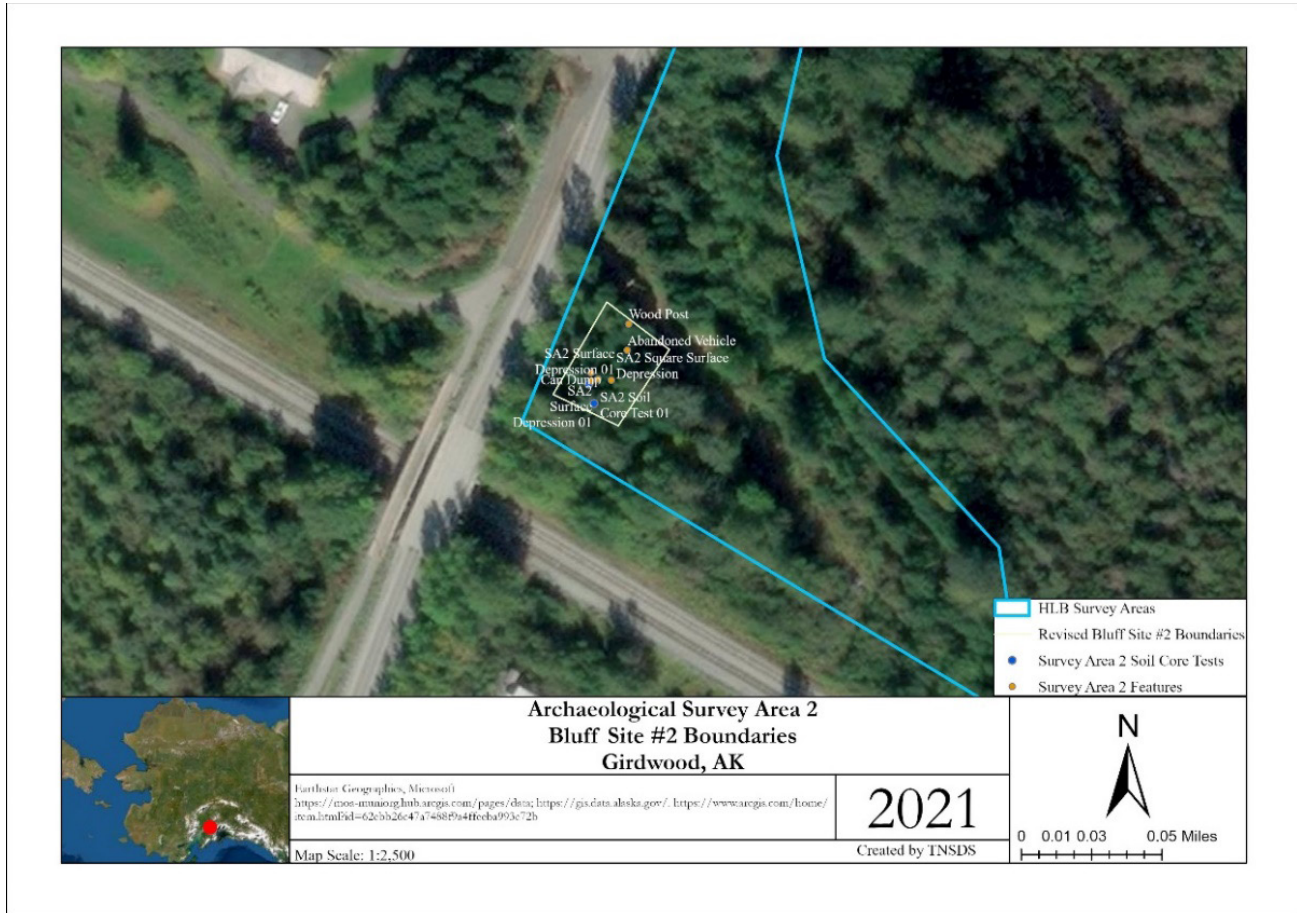


Figure 50. Girdwood Bluff Site 02 boundaries.

TABLE 6. SURVEY AREA 2 FEATURES AND GIS WAYPOINTS.

Field Waypoint	Description	Latitude, Longitude (NAD 9)
Car	Abandoned Vehicle	60.9436140, -149.1699610
SA2 Square SD	Survey Area 2 Square Surface Depression	60.9435390, -149.1700430
SA2 SD 01	Survey Area 2 Surface Depression 01	60.9435420, -149.1701120
SA2 SD 02	Survey Area 2 Surface Depression 02	60.9435380, -149.1701470
Can Dump	Can Dump	60.9435580, -149.1701480
Wood Post	Wood Post	60.9436800, -149.1699550

### Survey Area 3

Survey Area 3 was located 1500 feet east of Survey Area 2, along the banks of Glacier Creek, on the eastern border of the survey area. The survey area measured 1050 feet long and 260 feet wide and encompassed an area of 6.2 acres (Figure 51). The survey area sits on relatively low

land next to Glacier Creek and contains no hill or bluff features as other survey areas do. The nature of this area's low elevation and lack of topographic rise makes it prone to flooding and other natural disturbances, creating an extremely low probability for cultural resources in Survey Area 3.



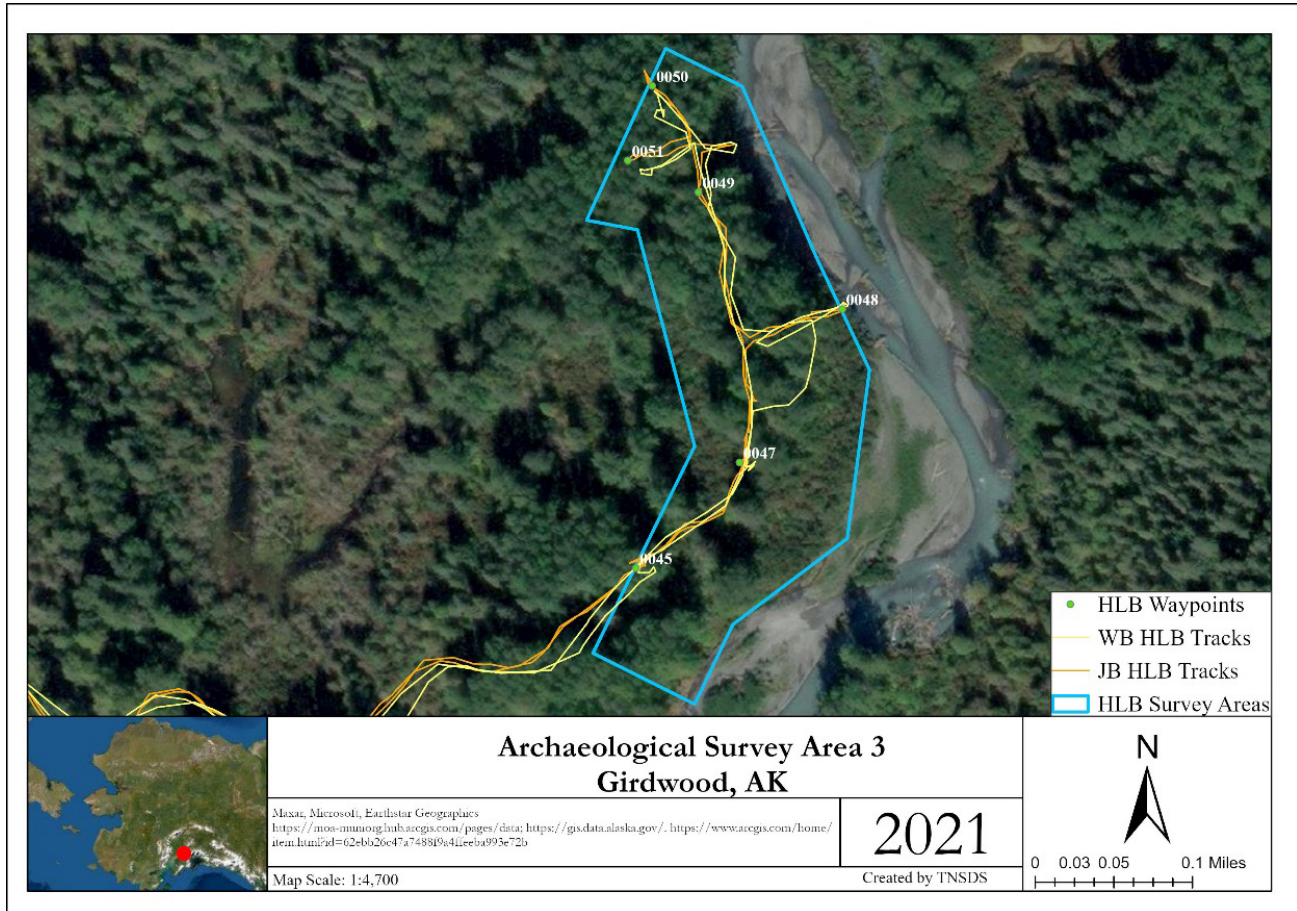


Figure 51. Archaeological Survey Area 3 tracks and waypoints.

The Survey Area 3 contains a section of the INHT which traverses through the survey area, running parallel to Glacier Creek. The survey area was accessed by the INHT from the southern extent, beginning near the railroad tracks (Figure 52- Figure 53). The survey was conducted northward along the trail and was assessed as low probability by the on-site archaeologists. The vegetation is thick and overgrown, with only game trails providing

small foot paths for the archaeologists to leave the developed INHT trail (Figure 54 - Figure 55). Glacier Creek was accessed by game trail and additional game trails were accessed on the northern segment of the survey area. Transect lines were not feasible within the survey area due to the thick vegetation and limited ground visibility. There were no cultural materials or surficial evidence identified within Survey Area 3.



TABLE 7. SURVEY AREA 3 OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.

<i>Description</i>	<i>Overview Photograph</i>
<p>Figure 52. Survey Area 3 Photograph Overview Waypoint 045, INHT, view facing east (©TNSDS 2021).</p>	
<p>Figure 53. Survey Area 3 Photograph Overview Waypoint 045, INHT, view facing west (©TNSDS 2021).</p>	



Figure 54. Survey Area 3 Photograph Overview Waypoint 047, INHT, view facing south (©TNSDS 2021).



Figure 55. Survey Area 3 Photograph Overview Waypoint 048, INHT, view facing south (©TNSDS 2021).



Figure 56. Survey Area 3 Photograph Overview Waypoint 048, INHT, view facing east (©TNSDS 2021).





### Survey Area 4/5

Survey Area 4/5 is the combination of two previously defined areas merged into one large survey area. This area is located between the Alyeska Highway to the west and Glacier Creek on its eastern border (Figure 57). The survey area was approximately 48.7 acres and measured 2,822 feet long from northwest corner to southwest corner, and 1,116 feet wide at its widest portion in the southern half of the area. The eastern edge of the survey area runs along Glacier Creek for 3,447 feet from north to south. Its northwest border is parallel to Karolius Drive, which ends at an access point to the INHT. The INHT travels along the northern border of Survey Area 4/5 for 860 feet before turning south and continuing diagonally through the southern portion of the survey area.

Survey Area 4/5 was accessed via a public road located south of the Girdwood Community Library. The INHT runs through Survey Area 4/5 and is the northern boundary

of the beginning of the pedestrian survey. The survey began at the northern extent and proceeded southeast into Survey Area 4/5 (Figure 58). The area around Photograph Overview Waypoint 009 was characterized by thick underbrush, large cottonwood trees, and thick swathes of alders (Figure 59). Closer to Glacier Creek the foliage changes and is defined by thick ferns, and alders (Figure 60). This terrain merges into wetlands before reaching Glacier Creek around Photograph Overview Waypoint 014 (Figure 61). From this point the survey looped around and continued through wetlands and headed back northwest towards the INHT. The wetlands run throughout the eastern portion of the survey area extending westward from Glacier Creek 100 to 200 feet inland and in some places more (Figure 62). Once the INHT was reached, the survey followed the trail in search of access points into the survey area (Figure 63). The trail runs southwest along the northwest border of Survey Area 4/5 before turning south cutting through the southern portion of Survey

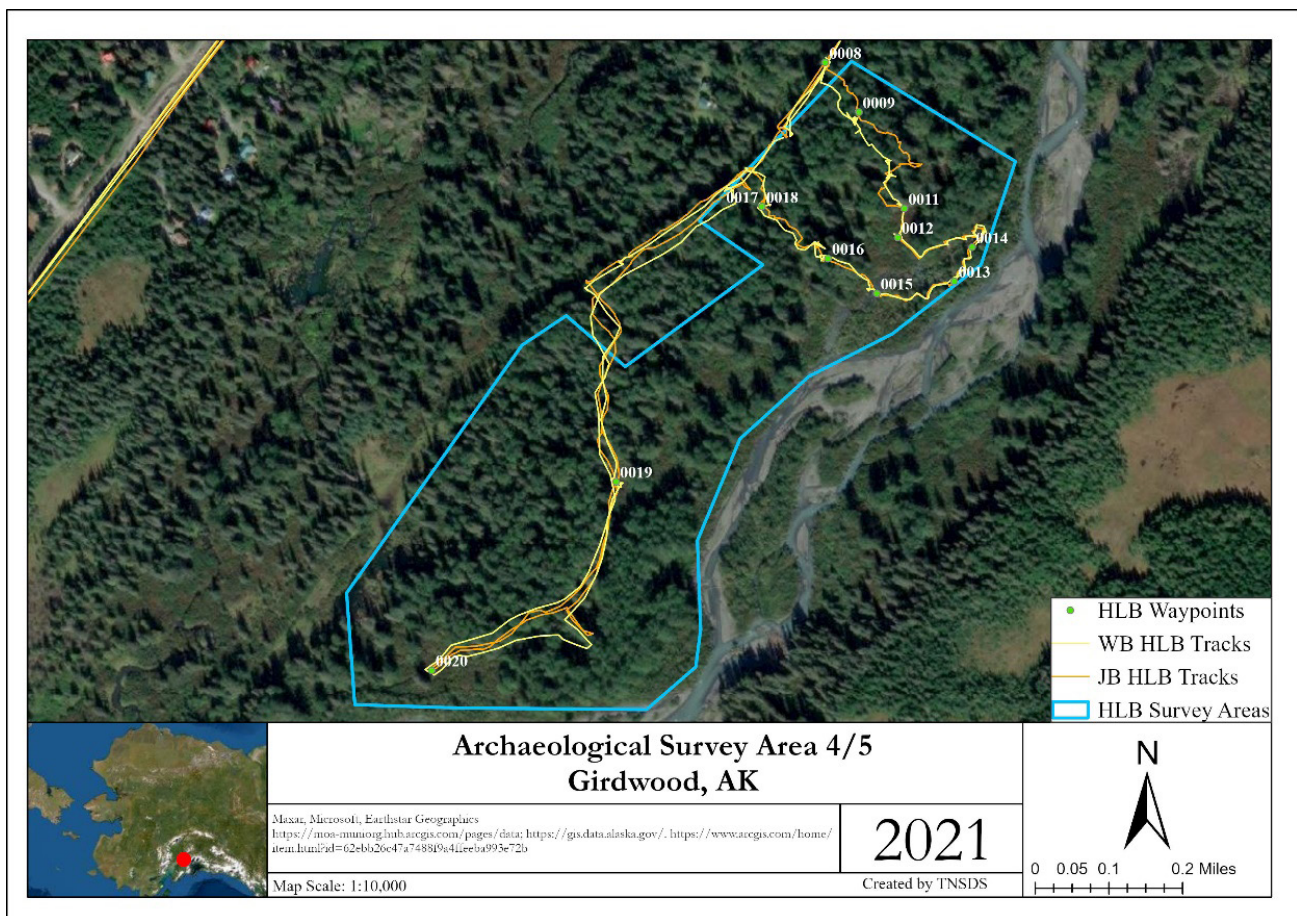


Figure 57. Archaeological Survey Area 4/5 tracks and waypoints.



Area 4/5. East of the trail is characterized by thick underbrush and wetlands, while the west side is slightly more forested with large cottonwood trees and patches of wetland mingled in (Figure 64).

Beginning on the northwest corner, survey was conducted eastward to Glacier Creek, although accessibility issues made straight transect lines infeasible. Wetlands and swamp area was encountered before accessing the creek, and wetlands are not to be included in the survey. The archaeologists deemed Survey Areas 4/5 as very low

probability. The south side of the survey area was not accessed. The archaeologists continued along the INHT to the extent of the survey area to assess if any other access point was feasible. Vegetation is very thick and consists of tall devil's club, willow and alder thickets, and thick fern coverage. Ground visibility was zero due to fallen trees and thick vegetation. Wetlands are also found throughout the survey area. The only cultural material identified were two black tires (garbage) that were noted and photographed (Figure 65).

**TABLE 8. SURVEY AREA 4/5 OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.**



Description	Overview Photograph
<p>Figure 58. Survey Area 4/5 Photograph Overview Waypoint 008, view facing southeast (©TNSDS 2021).</p>	
<p>Figure 59. Survey Area 4/5 Photograph Overview Waypoint 009, view facing east (©TNSDS 2021).</p>	



Figure 60. Survey Area 4/5 Photograph Overview Waypoint 011, view facing south (©TNSDS 2021).



Figure 61. Survey Area 4/5 Photograph Overview Waypoint 014, view facing south (©TNSDS 2021).



Figure 62. Survey Area 4/5 Photograph Overview Waypoint 015, view facing south (©TNSDS 2021).





Figure 63. Survey area 4/5, INHT, view facing southwest (©TNSDS 2021).



Figure 64. Survey Area 4/5 Photograph Overview Waypoint 019, view facing south (©TNSDS 2021).



Figure 65. Archaeological Survey Area 4/5, black tires, view facing west (©TNSDS 2021).





## Survey Area 6

Survey Area 6 is located on the west side of Crow Creek Road, a half mile north of the Alyeska Highway (Figure 66). The area is shaped like a baseball diamond and covers 7.35 acres. At its widest sections, the survey area was 558 ft wide and 720 ft long. The area was accessed off Crow Creek Road and survey proceeded north and west into the survey area (Figure 67). The survey focused on the southern portion of the survey area, as this was the most accessible section.

The survey began on the clearest portion of the area, at the south end. Transects were walked until the clearing gave way to thick vegetation and impassable alder and willow thickets (Figure 68). The terrain was flat with moss clump mounds and thick low brush vegetation such as ferns, devils club, and multiple varieties of low brush trees (Figure 69). Accessibility and ground visibility was only viable in the southern portion of the survey area. The northern and western half of the survey area is cov-

ered in thick vegetation consisting of tall devil's club, very dense willow and alder groves, and high density of fallen trees (Figure 70). Ground visibility is zero due to fallen trees and thick vegetation. Access to the northern section of the area was attempted at Waypoint 063; however, the vegetation became so thick further investigation was not possible (Figure 71).

This parcel is subject to development and the archaeologists noted new PVC pipe installed and orange flagging in the trees to mark the location (Figure 70, Figure 72). A small four-wheeler trail was identified, and old lumber was photographed (Figure 73). The four-wheeler trail was followed by the archaeologists due to ground visibility. The trail was followed until it ended shortly at another PVC pipe installation. Within the vicinity, plastic trash bags (garbage) were found (Figure 74). The trail ended and the archaeologists attempted to conduct transects but the alder and willow groves were too thick, making the majority of the survey area inaccessible (Figure 75).

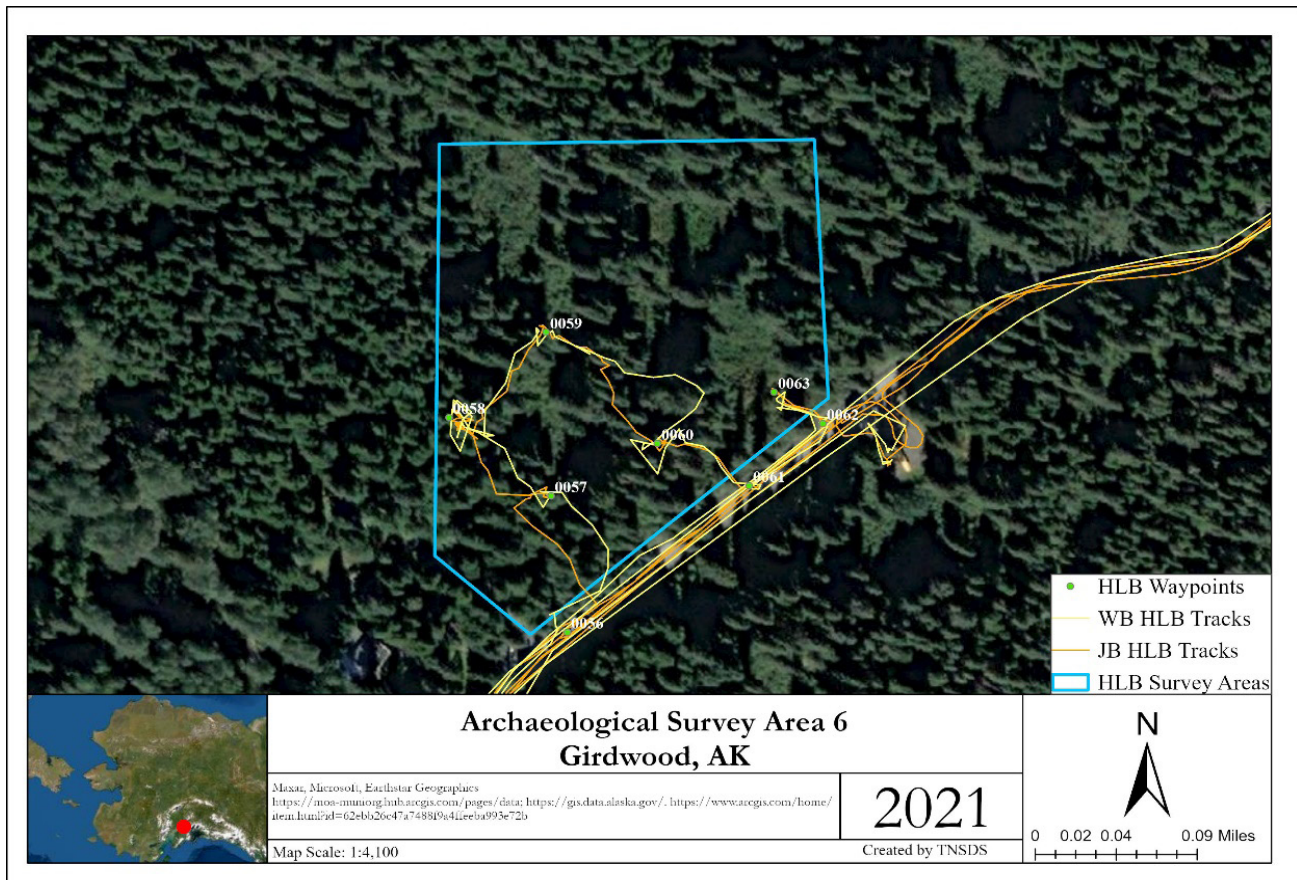


Figure 66. Archaeological Survey Area 6 tracks and waypoints.



TABLE 9. SURVEY AREA 6 OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.




Description	Overview Photograph
<p>Figure 67. Survey Area 6 Photograph Overview Waypoint 056, view facing west (©TNSDS 2021).</p>	
<p>Figure 68. Survey Area 6 Photograph Overview Waypoint 059, view facing north (©TNSDS 2021).</p>	
<p>Figure 69. Survey Area 6 Photograph Overview Waypoint 058, view facing north (©TNSDS 2021).</p>	



Figure 70. Survey Area 6 Photograph Overview Waypoint 059, view facing west (©TNSDS 2021).



Figure 71. Survey Area 6 Photograph Overview Waypoint 063, view facing north (©TNSDS 2021).



Figure 72. Survey Area 6 Photograph Overview Waypoint 059, PVC and tree flagging (©TNSDS 2021).





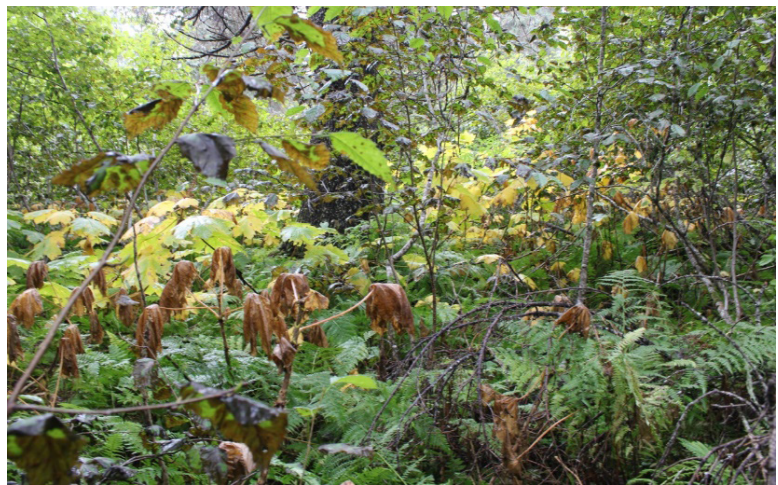
Figure 73. Survey Area 6 Photograph Overview Waypoint 058, four-wheeler path and wood across path (©TNSDS 2021).



Figure 74. Survey area 6 near Photograph Overview Waypoint 059, end of four-wheeler path, black and clear plastic garbage (©TNSDS 2021).



Figure 75. Survey Area 6 Photograph Overview Waypoint 060, view facing east (©TNSDS 2021).





## Survey Area 7A

Survey Area 7A was entered by a small access road that runs perpendicular to Hightower Road. This area is located northeast of the Girdwood Elementary School and west of Glacier Creek. It is a long and narrow area approximately 916ft long and 133ft wide at its widest margin covering an area of 2.65 acres (Figure 76). This area was deemed potentially high in probability due to its elevated topography and vicinity to fresh water sources (Glacier Creek). Survey of the area began on its southern boundary and proceeded northeast through the center of the survey area. Signage indicates the trail through the survey area are parts of the INHT (Figure 77). Transects were conducted on either side of the INHT, the transect furthest east followed the top of the bluff which overlooked Glacier Creek (Figure 78). The areas on the elevated bluff to the west of Glacier Creek were the focus areas as they are above the flood plain while still providing easy access to fresh water.

Terrain beginning in the southern portion was relatively flat, moss-covered undulating surface north to south. The ground surface had good visibility with well-spaced out spruce trees and minimal underbrush (Figure 79). This area sits on top of an elevated bluff, which descends at a very steep grade along the survey areas eastern boundary. The steep grade to the east had a slick moss and decayed vegetative surface with smaller spruce trees and low underbrush speckled in along the bluff edge traveling down to the creeks edge (Figure 80). Towards the west the terrain is a relatively flat moss-covered surface with a slight westward ascent up the mountain valley. Underbrush increases with ferns and devils club towards the west making the ground only visible in small patches (Figure 81). The central portion of the survey area remained similar in terrain to the southern portion. The ground visibility was good with sparse underbrush and spruce trees without their lower limbs making accessibility easy throughout the area (Figure 82). From

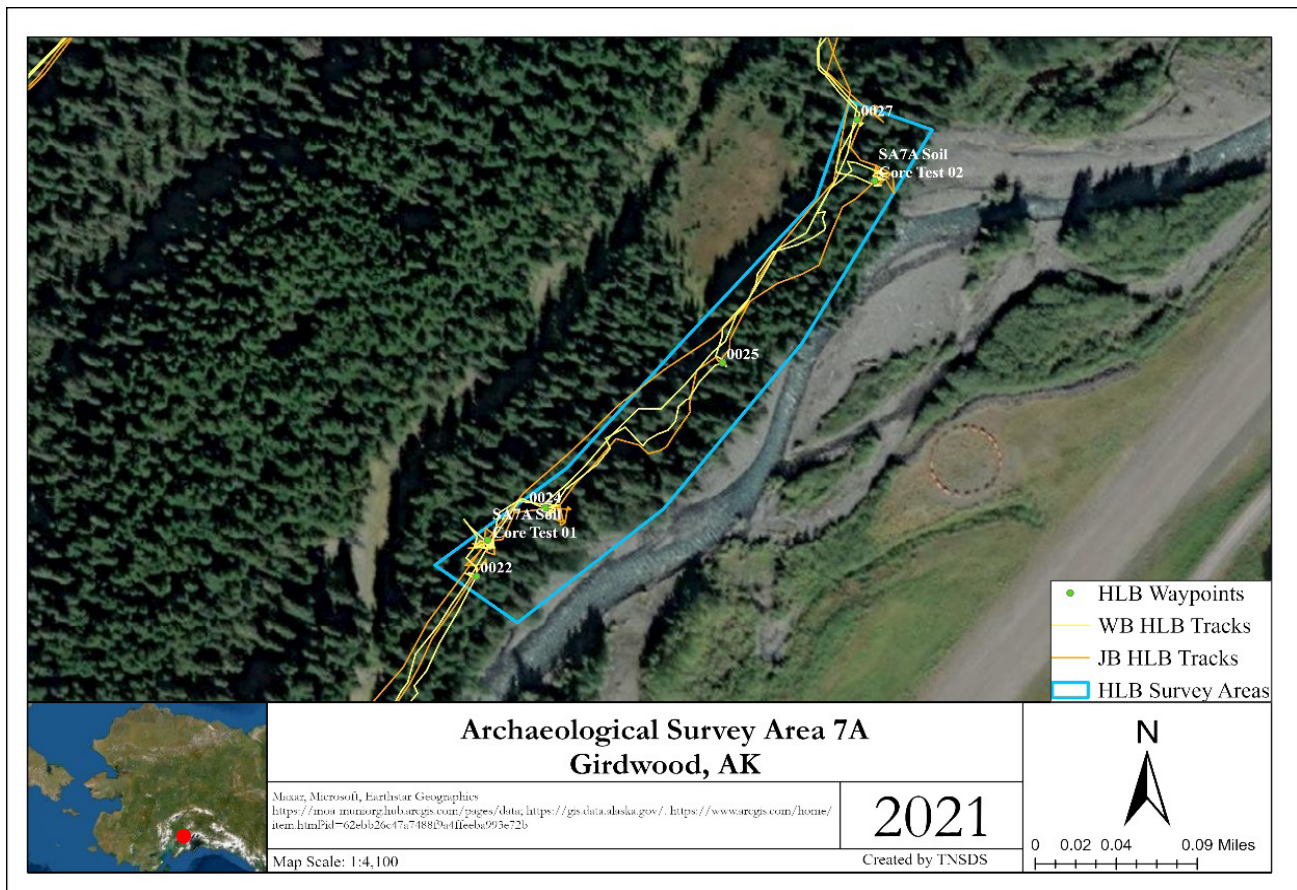


Figure 76. Archaeological Survey Area 7A tracks and waypoints.



Waypoint 025 heading north the survey area drops in elevation sitting beside Glacier Creek rather than above. The northern boundary ends where the elevation has risen back to a bluff. This area remains along the INHT; however, the trail heads in a northwest direction away from the survey area and the lowlands along Glacier Creek

after Waypoint 027 (Figure 83). Vegetation thickened in the northern portion causing minimal ground visibility; however, the terrain remained similar as the rest of area 7A with the elevation gradually rising towards the west and a steeper slope before flattening out along Glacier Creek to the east (Figure 84).

**TABLE 10. SURVEY AREA 7A OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.**


Description	Overview Photograph
<p>Figure 77. Survey Area 7A Photograph Overview Waypoint 022, view facing north (©TNSDS 2021).</p>	
<p>Figure 78. Survey Area 7A Photograph Overview Waypoint 022, view facing east (©TNSDS 2021).</p>	



Figure 79. Survey Area 7A Photograph Overview Waypoint 022, view facing south (©TNSDS 2021).



Figure 80. Survey Area 7A Photograph Overview Waypoint 022, view facing east (©TNSDS 2021).



Figure 81. Survey Area 7A Photograph Overview Waypoint 024, view facing west (©TNSDS 2021).





Figure 82. Survey Area 7A Photograph Overview Waypoint 025, view facing north (©TNSDS 2021).



Figure 83. Survey Area 7A Photograph Overview Waypoint 027, view facing north (©TNSDS 2021).



Figure 84. Survey Area 7A Photograph Overview Waypoint 027, view facing east (©TNSDS 2021).





Two soil core tests were conducted: one in the southern portion at Waypoint 023 and the other in the northern portion at Waypoint 026 (Figure 86). These cores revealed two main sediments layers: a fluffy loamy top soil followed by a silty clay layer. There were no observations of archaeological significance made through out Survey Area 7A. There were no depressions or materials indicating the presence of cultural activity aside from the INHT which runs along the western portion of the survey area as mentioned earlier.



Figure 85. Survey Area 7A Soil Core Test 1 with scale (©TNSDS 2021).

TABLE 11. SA7A SOIL CORE TEST 1 GENERAL SOILS PROFILE.

Depth	Munsell	Description	Results
0 – 5cm	7.5 YR 3/2	Dark Brown	Negative
5 – 25cm	7.5 YR 4/3	Brown Clay	Negative



Figure 86. Survey Area 7A Soil Core Test 2 with scale (©TNSDS 2021).

TABLE 12. SA7A SOIL CORE TEST 2 GENERAL SOILS PROFILE.

Depth	Munsell	Description	Results
0 – 5cm	7.5 YR 3/2	Dark Brown	Negative
5 – 25cm	7.5 YR 4/3	Brown and Grey Clay	Negative

### Survey Area 7B

Survey Area 7B was accessed from the INHT which runs through the survey area. The area was selected out of the larger Survey Area 7 to serve as a probability sample for the larger surrounding area. The survey area measured 680 feet north to south and 790 feet east to west and encompassed an area of 11.6 acres (Figure 87). This area is positioned on top of an elevated plateau that overlooks Glacier Creek to the east and extends up the mountain valley to the west.



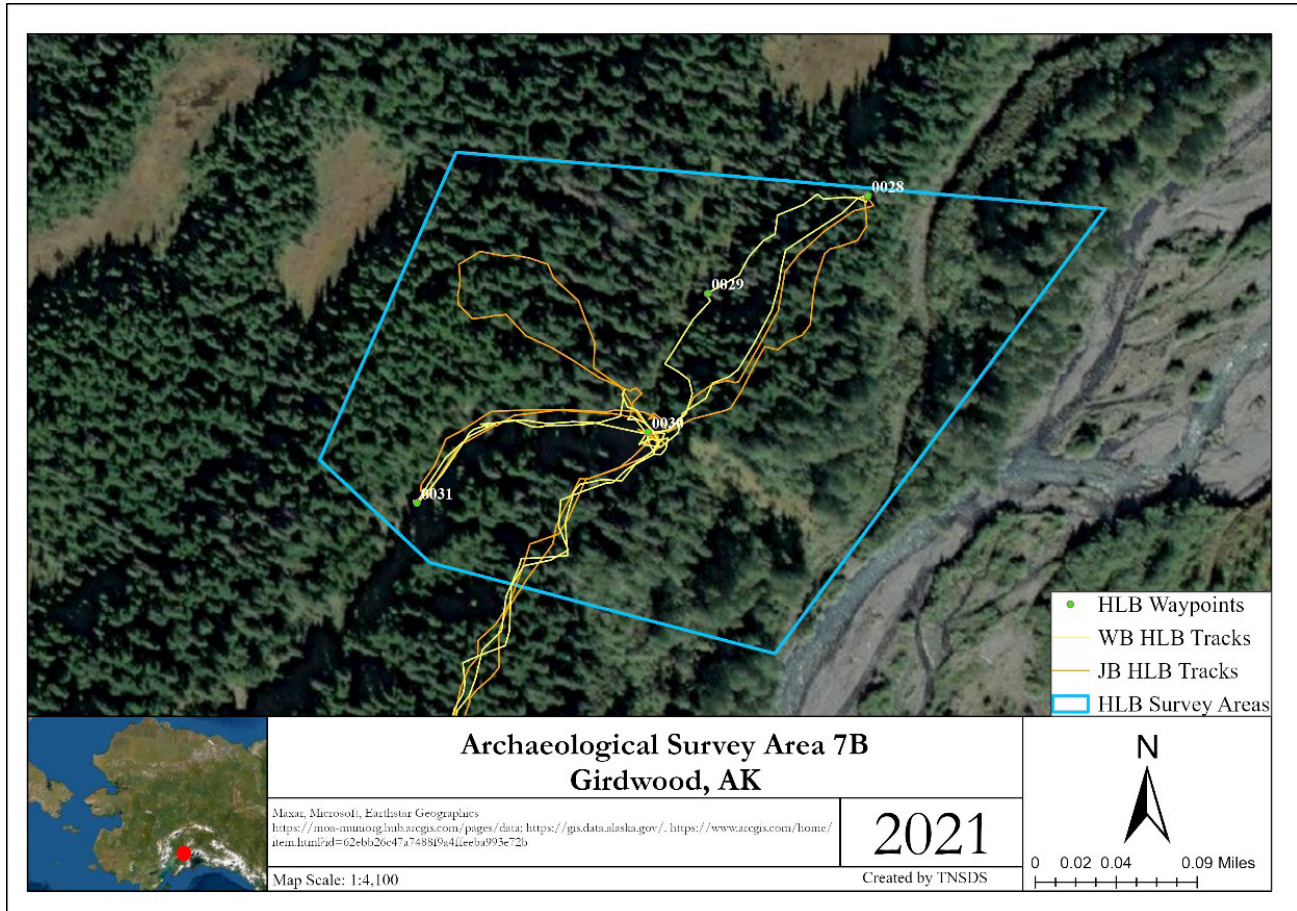


Figure 87. Archaeological Survey Area 7B tracks and waypoints.

Survey began at the southern portion along the INHT and followed the trail through the area to its northern boundary. From there survey proceeded south again through the area to conduct transects on either side of the INHT throughout the area. The terrain allowed for transects on either side of the INHT (Figure 88). The eastern side sloped down to the sand banks along Glacier Creek, while the western side sloped up the mountain valley. The western side of the survey area was heavily forested with few clearings/meadows mixed in (Figure 89).

Central to the survey area at Waypoint 030 there is a convergence of paths where another trail connects with the

INHT from the west (Figure 90). This trail was followed to where it meets the southwest boundary of the survey area near Waypoint 031. The unknown trail intersects the INHT from the west, but quickly curves heading southwest where it starts to parallel the INHT. This trail was wider than the INHT and was likely used for a four wheeled vehicle as indicated by its size and shape (Figure 91). It is plausible that this trail is used for maintenance of a water line buried in the area as indicated by the blue signpost depicted in Figure 90. Several animal dens were also encountered within Survey Area 7B (Figure 92). No other observations were made throughout Survey Area 7B.



**TABLE 13. SURVEY AREA 7B OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.**




Description	Overview Photograph
<p>Figure 88. Survey Area 7B Photograph Overview Waypoint 028, INHT, view facing south (©TNSDS 2021).</p>	 <p>A photograph showing a dirt path winding through a forest. The ground is covered in moss and ferns, and the trees are tall and thin.</p>
<p>Figure 89. Survey Area 7B Photograph Overview Waypoint 029, view facing west (©TNSDS 2021).</p>	 <p>A photograph of a forest scene. A prominent, dead, charred tree trunk stands in the foreground, surrounded by green ferns and other vegetation.</p>
<p>Figure 90. Survey Area 7B Photograph Overview Waypoint 030, view facing south (©TNSDS 2021).</p>	 <p>A photograph of a forest path. A blue marker is visible on the left side of the path. The path is surrounded by tall grass and dense forest.</p>



Figure 91. Survey Area 7B Photograph Overview Waypoint 031, view facing east (©TNSDS 2021).



Figure 92. Animal den in Survey Area 7B, view facing northeast (©TNSDS 2021).



### Survey Area 7C

Survey Area 7C was located two miles up Crow Creek Road from its junction with the Alyeska Highway. The survey area measured 572 feet wide and 798 feet long, encompassing an area of 10 acres. The survey area is bordered by Crow Creek Road on one side and Glacier Creek on the other. Glacier Creek was not accessed within the survey area boundaries, but small creeks run throughout the survey area.

Access to Survey Area 7C was from Crow Creek Road where an active bear was sighted. The archaeologists

did not conduct survey during the active bear sighting and left the area for a safe amount of time before returning to survey. Transects were not attempted in this area for safety purposes and the archaeologists conducted a single transect together through the survey area (Figure 93). The entire survey area contains dense vegetation, with a large quantity of tall devil's club and fallen trees. Thick moss covered the fallen trees and greatly limited ground visibility. Difficult terrain and thick vegetation caused the archaeologists to deviate from the survey area boundaries to return to Crow Creek Road.



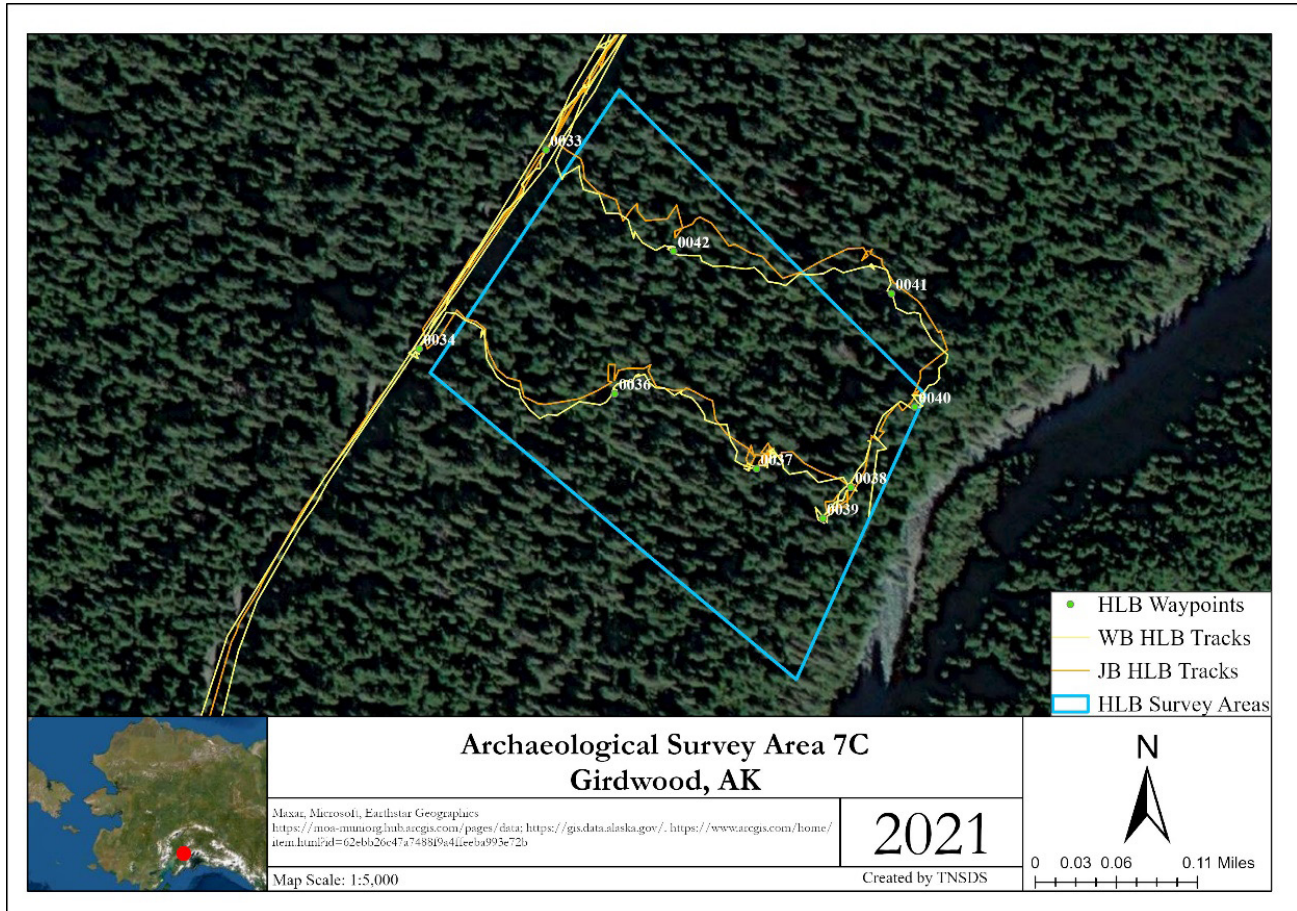


Figure 93. Archaeological Survey Area 7C tracks and waypoints.

The archaeologists began the survey again in the southwest corner of the survey area, along Crow Creek Road and continued in a southeast direction to the bluff line of Glacier Creek (Figure 94). Photograph Overview Waypoints were taken throughout the survey area to document the landscape. Ground visibility was minimal with decaying trees, moss covered forest floor and large devils club, blueberries, and small alders also hindering visibility and access (Figure 95). Small creeks run throughout the survey area and large blueberry patches spread throughout. Extra precaution was taken for bear safety

within the interior of the survey area (Figure 101). The survey was conducted to the southern boundary of the area, where the bluff was encountered (Figure 97 - Figure 99). The top of the bluff was surveyed, and the archaeologists did not descend the bluff due to difficult terrain. The northeastern boundary of the survey area was surveyed, creeks, thick forest vegetation pushed the archaeologists slightly out of the survey area (Figure 100 - Figure 103) There were no cultural materials or surficial evidence identified within Survey Area 7C.



TABLE 14. SURVEY AREA 7C OVERVIEW PHOTOGRAPHS AND ASSOCIATED WAYPOINTS.




Description	Overview Photograph
<p>Figure 94. Survey Area 7C Photograph Overview Waypoint 034, view facing north (©TNSDS 2021).</p>	
<p>Figure 95. Survey Area 7C Photograph Overview Waypoint 036, view facing north (©TNSDS 2021).</p>	
<p>Figure 96. Survey Area 7C Photograph Overview Waypoint 038, view facing south (©TNSDS 2021).</p>	



Figure 97. Survey Area 7C Photograph Overview Waypoint 039, view facing south (©TNSDS 2021).



Figure 98. Survey Area 7C Photograph Overview Waypoint 040, view facing north (©TNSDS 2021).





Figure 99. Survey Area 7C Photograph Overview Waypoint 040, view facing south (©TNSDS 2021).



Figure 100. Survey Area 7C Photograph Overview Waypoint 041, view facing north (©TNSDS 2021).





Figure 101. Survey Area 7C Photograph Overview Waypoint 042, view facing northwest (©TNSDS 2021).

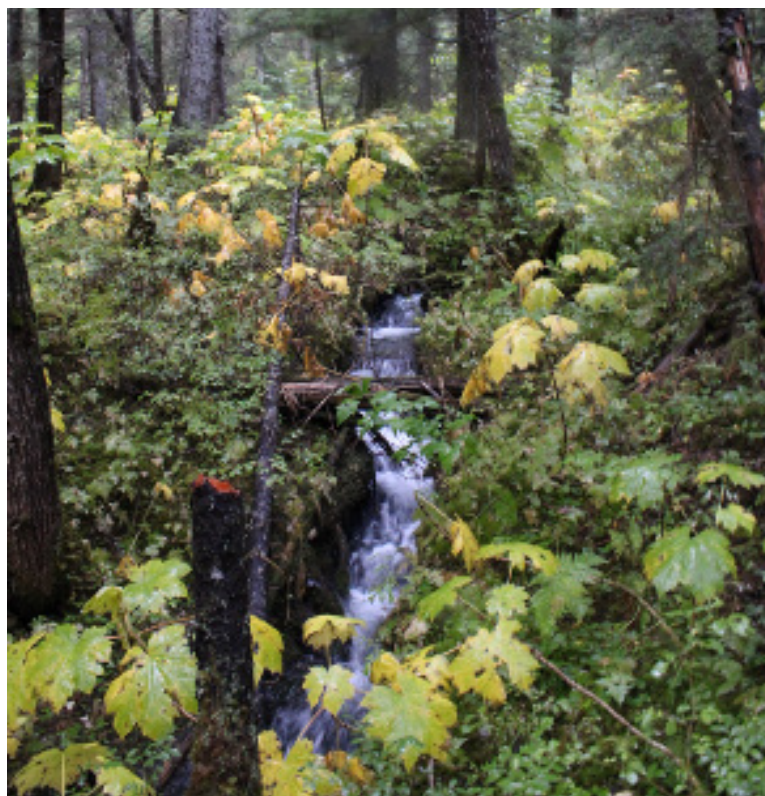


Figure 102. Survey Area 7C Photograph Overview Waypoint 042, view facing east (©TNSDS 2021).

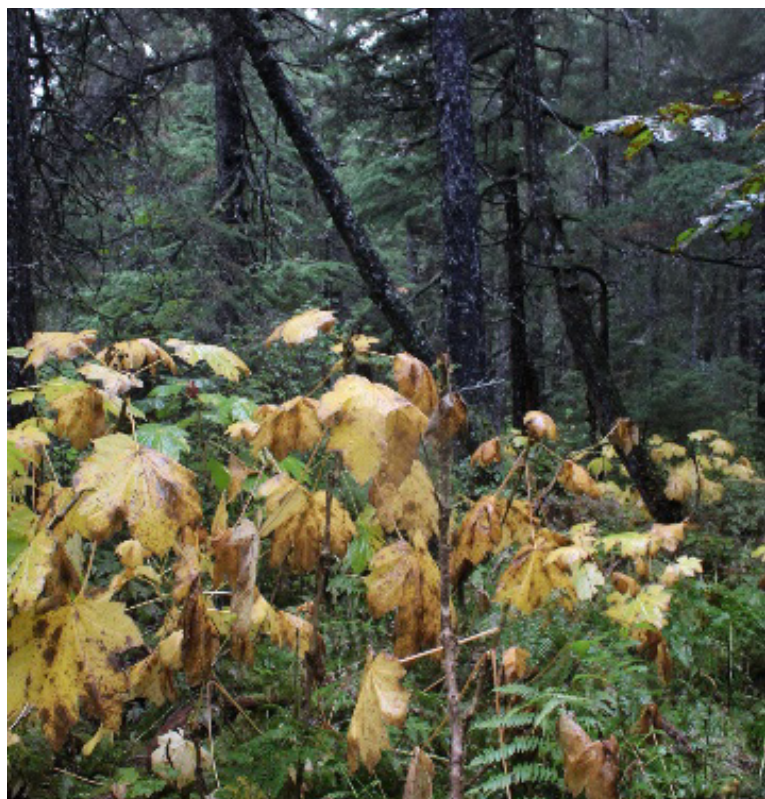




Figure 103. Survey Area 7C Photograph Overview Waypoint 042, view facing west (©TNSDS 2021).



### Girdwood Historic Trails Assessment

The historic trails were identified through the AHRS database using the Mapper RS-2477 Trails, BLM GIS databases, the State and Muni GIS databases. Historic trails have been prone to alter and change through time with development pressures and changing modes of travel. The INHT has different proposed routes according to multiple sources of information and are depicted in Figure 104. According to the AHRS database, there are only three historic trails/roads documented passing through the Girdwood area. There is the Crow Pass Branch of the Iditarod Trail (SEW-00144) which follows the Alyeska Highway into town and then heads up Crow Pass where Crow Creek Road is today. Crow Creek Road (SEW-01237) is also a historic trail used in the early 1900s and later developed into the road it is today. The last historic trail on AHRS database is the Girdwood-Crow Creek Trail Segment (SEW-00834), which was used to access the mines before the road was built in 1923. These segments are likely recognized as parts of the historic INHT, as both trails were used to access the same areas and changed routes over time. Though historically the INHT is a winter trail, the trail segments within the boundaries of the Girdwood community are developed and used during the summer. This trails assessment focused on summer trails and did not include winter trails, due to time of the year.

The Girdwood Trails Plan (GTP) Info Packet and the Girdwood Trails Plan (GTP) Public Review Draft (June 2021) were utilized for a preliminary assessment of the Girdwood trail network. The Girdwood Trails Plan (GTP) is a 10-to-15-year planning document for the Girdwood trails and natural spaces; this community-developed plan has provided information on the existing conditions of the trails and the future plans for the trail systems. Improvements to the trail network systems include trailhead signage and upgrades, parking, development, and construction of new connecting trails (GTP 2021). The GTP contains the most comprehensive and up-to-date information about the Girdwood trails system. Girdwood contains a number of recreational trails on public land and on private land, such as the Alyeska Resort. The Girdwood Valley Trails Management Plan (GVTMP) assessed the current conditions of trails and utilized the USFS trail class system that is referenced within this assessment for the trail conditions and type (Table 15).

As mentioned earlier, there are only three historic trails recorded on the AHRS database within the Girdwood area. For this reason, there is no distinction between historic trails and recently developed trails where historic



trails may have been. For example, there are many signs indicating segments of the INHT, although some of these extensions are not historic segments of the trail and have been pushed over as development has covered the original path through town.

TABLE 15. TRAIL CONDITION CLASSIFICATION	
USFS Trail Class System as classified in the Draft Girdwood Trails Plan	
Trail Class 1 – Minimally Developed	
Trail Class 2 – Moderately Developed	
Trail Class 3 – Developed	
Trail Class 4 – Highly Developed	
Trail Class 5 – Fully Developed	

The National Trails System Act of 1968, as amended, establishes four classes of trails: national scenic trails, national historic trails, national recreation trails, and side and connection trails. The INHT was designated in 1978 as a national historic trail, and the Girdwood-Eagle River connecting trail of the INHT runs through the valley. The INHT is managed by several different federal agen-

cies and the State of Alaska, with management guided by the 1986 Iditarod National Historic Trail Seward to Nome Route: A Comprehensive Management Plan (BLM 2021).

The INHT is a historic, complex trail system that covers over 1,000 miles to connect Seward to Nome. The INHT contains an additional 1,400 miles of connecting trails linking communities and historic sites across Alaska (BLM 2021). The use of this segment of the INHT likely stopped in 1916 with the construction of the railroad from Seward to Anchorage. After the construction of the railroad, these segments of the trail were still used to access the mines up Crow Creek. Use of the original trails likely stopped with the construction of the Crow Creek Road (SEW-01237) from 1922 to 1928.

TNSDS documented trailheads and locations of historic trails intersecting with the public road system right-of-way (ROW) (Figure 104). The INHT crosses public land and is quite accessible from the public ROW. The INHT was heavily documented, as it was also within the designated survey areas from lower Glacier Creek and runs next to Glacier Creek and Crow Creek Road.

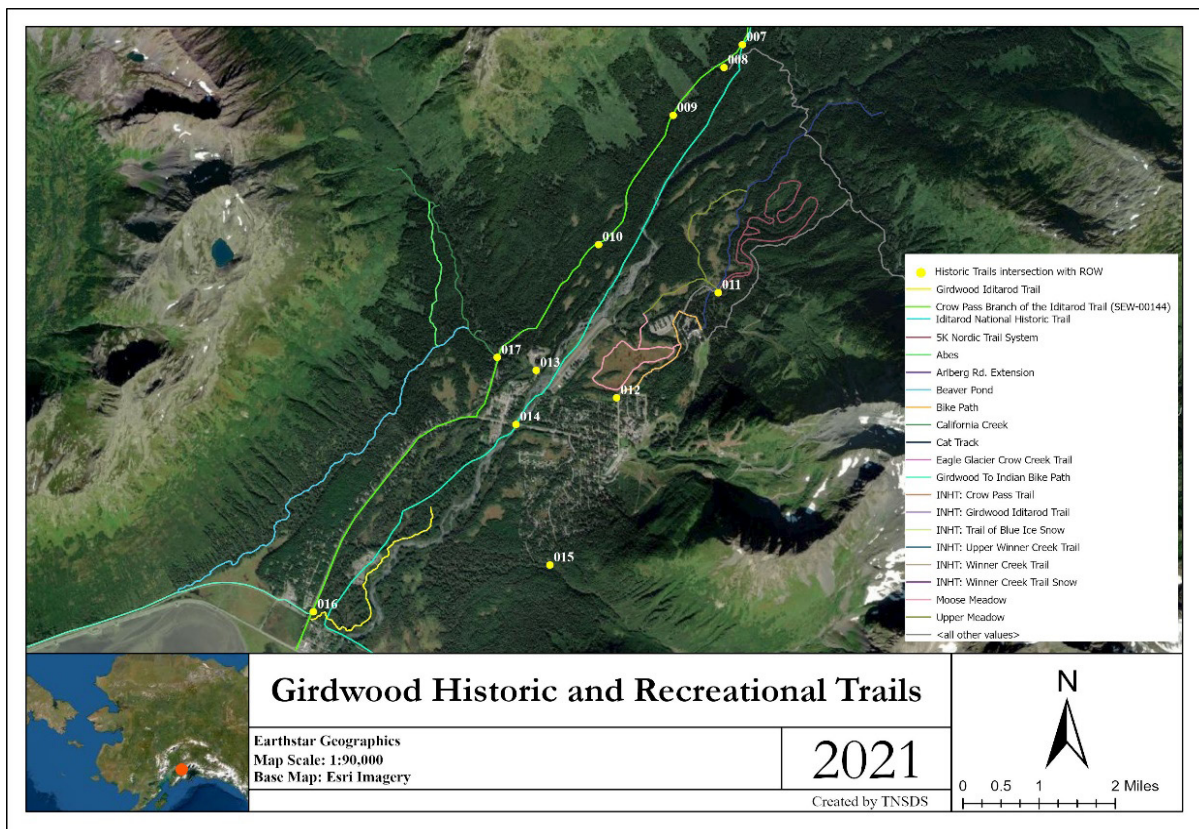


Figure 104. Girdwood historic and recreation trails mapped to date intersecting with public road system.



The Crow Pass Branch of the Iditarod Trail (SEW-00144) is a contributing feature of the Crow Pass Historic District (ANC-01206), which is a contributing feature of the Iditarod National Historic Trail Multiple Property Nomination (OHA 2021). The 42-mile trail runs from Girdwood, along Glacier Creek, to Crow Pass, along Raven Creek to Eagle River. Mining activity and roadhouse evidence is documented along the trail (OHA 2021).

**TABLE 16. AHRs DESIGNATED HISTORIC TRAILS INTERSECTION WITH PUBLIC ROAD SYSTEM.**

Way-point	Trail Name	Public Road Intersection	Latitude, Longitude (NAD83)
007, 009, 010	Crow Pass Branch of the Iditarod Trail (SEW-00144)	Crow Creek Road	60.997562, -149.088658 60.990884, -149.101773 60.978689, -149.11950
007, 009, 010	Crow Creek Road (SEW-01237)	Crow Creek Road	60.997562, -149.088658 60.990884, -149.101773 60.978689, -149.11950
009, 010	Girdwood-Crow Creek Trail Segment (SEW-00834)	Crow Creek Road	60.990884, -149.101773 60.978689, -149.11950



Figure 105. Crow Creek Mine entrance, Waypoint 007, view facing northeast (©TNSDS 2021).



Figure 106. INHT crossing ROW of Crow Creek Rd, Waypoint 009, view facing west (©TNSDS 2021).



Figure 107. INHT crossing ROW of Crow Creek Rd, Waypoint 009, view facing east. (©TNSDS 2021).





Figure 108. INHT crossing ROW of Crow Creek Rd, Waypoint 010, view facing west (©TNSDS 2021).



Figure 109. View of Glacier Creek facing north, from Glacier Creek Bridge, Waypoint 014. (©TNSDS 2021).

**TABLE 17. RECREATIONAL TRAILS INTERSECTION WITH PUBLIC ROAD SYSTEM.**

Way-point	Trail Name	Public Road Intersection	Latitude, Longitude (NAD83)
015	Virgin Falls Trailhead	Timberline Drive	60.948368, -149.125214
011	Multi-use Nordic Loop	Arlberg Avenue	60.974141, -149.093269
012	Stumpy's Trail	Arlberg Avenue	60.964180, -149.112538
008	Winner Creek Trail	Crow Creek Road	60.995400, -149.092176
017	California Creek Trail/ Abe's Trail	Crow Creek Road	60.968000, -149.135197

The Virgin Creek Falls trailhead was documented as part of the trails assessment, as there is development occurring near the trailhead. There is limited parking with a small sign indicating the trail (Figure 110). Based on background research it was determined that this was a recreation trail, as no historic documentation was found.

The Virgin Creek Falls trail is classified as a Trail Class 3 (Developed) within the Girdwood Trails Plan existing trails assessment. The Girdwood Trails Plan includes the Virgin Creek Falls Access Study that will reduce traffic impacts to the neighborhood, improve connectivity between Lower Virgin Creek and Upper Virgin Creek Trails, and resolve traffic, parking, and trailhead conflicts (GTP Info 2021).

Trails located at the end of Arlberg Street were documented. The trailhead includes the 5K Nordic Trail System. The Girdwood Nordic Trails are centered around the Alyeska Ski Resort. The trail intersections with the public ROW of Arlberg Avenue were documented; however, the trail heads located on land owned by Alyeska Ski Resort were not accessed. Trail heads at the end of Arlberg Avenue were documented (Figure 111).



Figure 110. Virgin Falls Trailhead, Waypoint 015, view facing east. (©TNSDS 2021).



Figure 111. Multi-use Nordic Loop, Waypoint 011, view facing east (©TNSDS 2021).



Stumpy's Trailhead sign is located at Moose Meadow Park, along Arlberg Avenue, and was documented as part of this survey (Figure 112). Scher brought this trail to TNSDS's attention during the archaeological review and included that there is a possibility it has historic significance that has not yet been documented (Scher 2021, personal communication to TNSDS, June 29, 2021). This trail is connected to the Snowcat Trail and the Nordic Loop, which are winter trails that cross through woods and snowy fields, eventually ending at Winner Creek Gorge (GTC 2011).

The Winner Creek Trail is an access trail to the INHT, leading to the Winner Creek Gorge. The Winner Creek trailhead was accessed at MP 2.9 of Crow Creek Road (Figure 113). The Winner Creek trailhead located behind the Alyeska Resort was not accessed.

The California Creek Trailhead is located at the California Creek Bridge (Figure 114). Abe's Trail is connected to California Creek Trail. This is a trail dating to the 1940s and is associated with Abe Bursiel of Girdwood. California Creek was subject to mining and logging activities and Bursiel connected mining and logging trails to create Abe's Trail (GTA 2021).



Figure 112. Stumpy's Trail, Waypoint 012, view facing northwest (©TNSDS 2021).



Figure 113. Winner Creek Trailhead, Waypoint 08, view facing north (©TNSDS 2021).



Figure 114. Beaver Pond Trail/ California Creek Trailhead, at the California Creek Bridge (SEW-01236), Waypoint 017 (©TNSDS 2021).



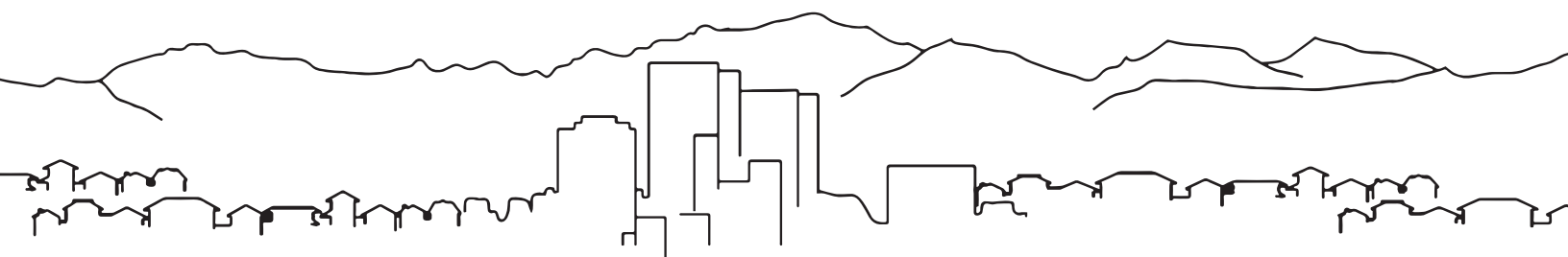
## RECOMMENDATIONS

The Girdwood Bluff has the potential to shed light on the prehistoric and historic activities and uses of the Girdwood Valley, as it has an excellent viewshed of Turnagain Arm and the Girdwood Valley. TNSDS recommends that if archaeological investigations occur along the Girdwood Bluff, then the full research design should include expanding prehistoric, historic and ethnographic contexts for Girdwood and the trail, and defining cultural horizons and associations between the Girdwood Bluff Site 01 (SEW-01753) and Girdwood Bluff Site 02 (SEW-01754). Likewise, identifying the origins of the surface depressions will provide context and greater understanding of the past human activity within this area. An updated preservation plan would be recommended to include the Girdwood Bluff sites, with interpretive signage for educational visits and tours.

It is important to recognize that the lack of recorded archaeological sites in Girdwood does not reflect a lack of prehistoric and/or historic activity. The Girdwood Valley consists of extensive trail networks connecting the Kenai Peninsula to the Cook Inlet. Turnagain Arm has an extensive prehistoric record, as demonstrated at the Beluga Point Site and others. Extensive archaeological investigations around the two newly identified sites in the Girdwood Bluff area could help to better understand the prehistoric and historic significance of the Girdwood area. Any additional archaeological field survey in the upper areas of the Girdwood Valley, such as Crow Creek

Road and up Glacier Creek, is recommended in spring when vegetation is low. During spring, the forest is covered in moss, but the slower growth of devil's club allows for greater access, bear safety, and ground visibility. The scopes of future archaeological investigations should be outlined in a stand-alone identification and treatment plan focusing on both archaeological resources and culturally-sensitive areas within the Girdwood Community Boundaries. Any such plan should be developed through additional research and involve input from stakeholders who may have interest in or traditional knowledge of the landscape. As previously mentioned, the community of Girdwood would also benefit from the development of in-depth prehistoric and historic contexts against which any resources can be evaluated and assessed for their significance and possible inclusion in the National Register of Historic Places (NRHP).

Girdwood has an extensive network of trails through the valley and the surrounding mountains. The community currently has a Girdwood Trails Plan, and TNSDS would recommend development of context statements pertaining to historic trails. There is no distinction in the existing plan between historic trails and recently developed recreational trails. It is further recommended a separate plan be developed and include a comprehensive inventory of historic trails within the Girdwood Community Boundaries. Involving stakeholders with local and traditional knowledge of the landscape and trails systems would be beneficial to the development of a plan aimed at preserving historic trail systems in Girdwood especially since there was only a small area of Girdwood surveyed during this project. This was due to budget constraints and scope of the study.





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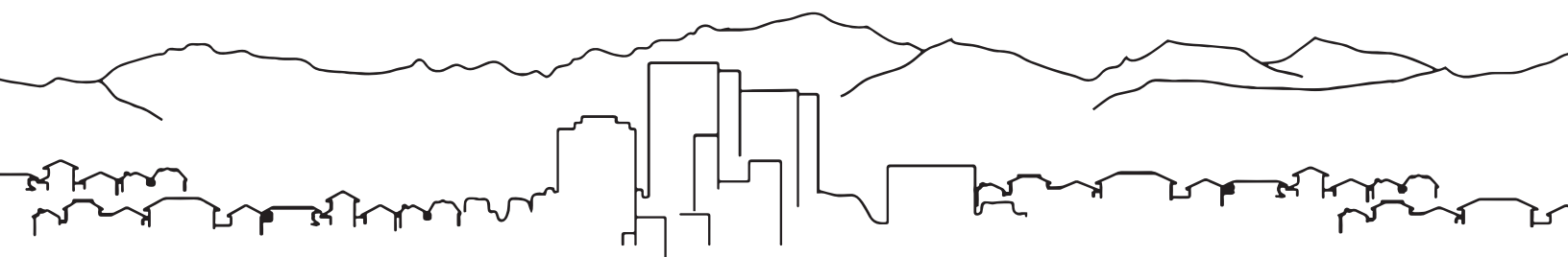
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**APPENDIX A: PHOTOGRAPH LOG**





## PHOTOGRAPHIC RECORD

### PROJECT: Girdwood Archaeological Survey

**Field date(s):** September 14th, 15th and October 7, 2021

**Film type:** Canon Digital

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/14/21	8074	Survey Area 4 Photograph Waypoint 008	E
9/14/21	8075	Survey Area 4 Photograph Waypoint 008	SE
9/14/21	8076	Survey Area 4 Photograph Waypoint 009	S
9/14/21	8077	Survey Area 4 Photograph Waypoint 009	S
9/14/21	8078	Survey Area 4 Photograph Waypoint 009	W
9/14/21	8079	Survey Area 4 Photograph Waypoint 009	N
9/14/21	8080	Survey Area 4 Photograph Waypoint 009	E
9/14/21	8081	Survey Area 4 Photograph Waypoint 009	E
9/14/21	8082	Survey Area 4 Photograph Waypoint 011	N
9/14/21	8083	Survey Area 4 Photograph Waypoint 011	E
9/14/21	8084	Survey Area 4 Photograph Waypoint 011	S
9/14/21	8085	Survey Area 4 Photograph Waypoint 011	W
9/14/21	8086	Survey Area 4 Photograph Waypoint 012 - unknown trail	E
9/14/21	8087	Survey Area 4 Photograph Waypoint 012- unknown trail	W
9/14/21	8088	Survey Area 4 Cut tree along trail with scale	S
9/14/21	8089	"Same as above"	S
9/14/21	8090	Survey Area 4 Photograph Overview	N
9/14/21	8091	Survey Area 4 Photograph Overview	E
9/14/21	8092	Survey Area 4 Photograph Overview	S
9/14/21	8093	Survey Area 4 Photograph Overview	W
9/14/21	8094	Survey Area 4 beaver clearing with felled trees	NW
9/14/21	8095	Survey Area 4 Photograph Waypoint 013 Retake	N
9/14/21	8096	Survey Area 4 Photograph Waypoint 013 Retake	E
9/14/21	8097	Survey Area 4 Photograph Waypoint 013 Retake	S
9/14/21	8098	Survey Area 4 Photograph Waypoint 013 Retake	W
9/14/21	8099	Survey Area 4 Photograph Waypoint 015	N

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/14/21	8100	Survey Area 4 Photograph Waypoint 015	E
9/14/21	8101	Survey Area 4 Photograph Waypoint 015	S
9/14/21	8102	Survey Area 4 Photograph Waypoint 015	W
9/14/21	8103	Survey Area 4 Photograph Waypoint 016 - two black tires	W
9/14/21	8104	Survey Area 4 Photograph Waypoint 016 - two black tires	W
9/14/21	8105	Survey Area 4 Photograph Waypoint 016 - two black tires	W
9/14/21	8106	Survey Area 4 Photograph Waypoint 017	N
9/14/21	8107	Survey Area 4 Photograph Waypoint 017	E
9/14/21	8108	Survey Area 4 Photograph Waypoint 017	S
9/14/21	8109	Survey Area 4 Photograph Waypoint 017	W
9/14/21	8110	Survey Area 4/5 - INHT Trail	S
9/14/21	8111	Survey Area 4/5 Vegetation Overview	
9/14/21	8112	Survey Area 4/5	
9/14/21	8113	Survey Area 4/5	
9/14/21	8114	Survey Area 4/5	
9/14/21	8115	Survey Area 4 Photograph Waypoint 019	N
9/14/21	8116	Survey Area 4 Photograph Waypoint 019	E
9/14/21	8117	Survey Area 4 Photograph Waypoint 019	S
9/14/21	8118	Survey Area 4 Photograph Waypoint 019	W
9/14/21	8119	Survey Area 4 Photograph Waypoint 020	N
9/14/21	8120	Survey Area 4 Photograph Waypoint 020	E
9/14/21	8121	Survey Area 4 Photograph Waypoint 020	S
9/14/21	8122	Survey Area 4 Photograph Waypoint 020	W
9/14/21	8124	Photograph Waypoint 021 - INHT Trail	N
9/14/21	8125	Photograph Waypoint 021 - INHT Trail	E
9/14/21	8126	Photograph Waypoint 021 - INHT Trail	S
9/14/21	8127	Photograph Waypoint 021 - INHT Trail	W
9/14/21	8128	Survey Area 7A Photograph Waypoint 022	N
9/14/21	8129	Survey Area 7A Photograph Waypoint 022	E
9/14/21	8130	Survey Area 7A Photograph Waypoint 022	S
9/14/21	8131	Survey Area 7A Photograph Waypoint 022	W
9/14/21	8132	Survey Area 7A Existing Survey Markers	NW
9/14/21	8133	Survey Area 7A Core Sample 01 - GPS Waypoint 023	Plan
9/14/21	8134	Survey Area 7A Core Sample 01 - GPS Waypoint 023	Plan



Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/14/21	8135	Survey Area 7A small bridge crossing	N
9/14/21	8136	Survey Area 7A Photograph Waypoint 024	N
9/14/21	8137	Survey Area 7A Photograph Waypoint 022	E
9/14/21	8138	Survey Area 7A Photograph Waypoint 022	S
9/14/21	8139	Survey Area 7A Photograph Waypoint 022	W
9/14/21	8140	Survey Area 7A Photograph Waypoint 025	N
9/14/21	8141	Survey Area 7A Photograph Waypoint 025	E
9/14/21	8142	Survey Area 7A Photograph Waypoint 025	S
9/14/21	8143	Survey Area 7A Photograph Waypoint 025	W
9/14/21	8144	Survey Area 7A Core Sample 02 - GPS Waypoint 026	Plan
9/14/21	8145	Survey Area 7A Core Sample 02 - GPS Waypoint 026	Plan
9/14/21	8146	Survey Area 7A Core Sample Area - GPS Waypoint 026	W
9/14/21	8147	Survey Area 7A Core Sample Area - GPS Waypoint 026	NW
9/14/21	8148	Survey Area 7A Core Sample Area - GPS Waypoint 026	N
9/14/21	8149	Survey Area 7A Core Sample Area - GPS Waypoint 026	E
9/14/21	8150	Survey Area 7A Core Sample Area - GPS Waypoint 026	S
9/14/21	8151	Survey Area 7A Core Sample Area - GPS Waypoint 026	W
9/14/21	8152	Survey Area 7A Photograph Waypoint 027	N
9/14/21	8153	Survey Area 7A Photograph Waypoint 027	E
9/14/21	8154	Survey Area 7A Photograph Waypoint 027	S
9/14/21	8155	Survey Area 7A Photograph Waypoint 027	W
9/14/21	8156	Survey Area 7B Photograph Waypoint 028	N
9/14/21	8157	Survey Area 7B Photograph Waypoint 028	E
9/14/21	8158	Survey Area 7B Photograph Waypoint 028	S
9/14/21	8159	Survey Area 7B Photograph Waypoint 028	W
9/14/21	8160	Survey Area 7B Photograph Waypoint 029	N
9/14/21	8161	Survey Area 7B Photograph Waypoint 029	E
9/14/21	8162	Survey Area 7B Photograph Waypoint 029	S
9/14/21	8163	Survey Area 7B Photograph Waypoint 029	W
9/14/21	8165	Survey Area 7B Photograph Waypoint 030	N
9/14/21	8166	Survey Area 7B Photograph Waypoint 030	E
9/14/21	8167	Survey Area 7B Photograph Waypoint 030	S
9/14/21	8168	Survey Area 7B Photograph Waypoint 030	W
9/14/21	8170	Survey Area 7B Photograph Waypoint 031	N

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/14/21	8171	Survey Area 7B Photograph Waypoint 031	E
9/14/21	8172	Survey Area 7B Photograph Waypoint 031	S
9/14/21	8173	Survey Area 7B Photograph Waypoint 031	W
9/14/21	8175	Bear Den located within Survey Area	NE
9/14/21	8176	Survey Area 7B Overview Photograph	W
9/14/21	8178	Photograph Waypoint 032 - INHT Overview b/w Survey Areas 7A and 7B	N
9/14/21	8179	Photograph Waypoint 032 - INHT Overview b/w Survey Areas 7A and 7B	E
9/14/21	8180	Photograph Waypoint 032 - INHT Overview b/w Survey Areas 7A and 7B	S
9/14/21	8181	Photograph Waypoint 032 - INHT Overview b/w Survey Areas 7A and 7B	W
9/14/21	8182	Landscape Photograph - Hightower Rd access to INHT	W
9/14/21	8186	Survey Area 7C Photograph Waypoint 033	N
9/14/21	8187	Survey Area 7C Photograph Waypoint 033	E
9/14/21	8188	Survey Area 7C Photograph Waypoint 033	S
9/14/21	8189	Survey Area 7C Photograph Waypoint 033	W
9/14/21	8192	Survey Area 7C Photograph Waypoint 034	S
9/14/21	8194	Survey Area 7C Photograph Waypoint 036	N
9/14/21	8195	Survey Area 7C Photograph Waypoint 036	E
9/14/21	8196	Survey Area 7C Photograph Waypoint 036	S
9/14/21	8200	Survey Area 7C Photograph Waypoint 036	W
9/14/21	8201	Small Creek Running through Survey Area 7C	NW
9/14/21	8205	Survey Area 7C Photograph Waypoint 038	N
9/14/21	8206	Survey Area 7C Photograph Waypoint 038	E
9/14/21	8207	Survey Area 7C Photograph Waypoint 038	S
9/14/21	8208	Survey Area 7C Photograph Waypoint 038	W
9/14/21	8209	Survey Area 7C Photograph Waypoint 039	W
9/14/21	8210	Survey Area 7C Photograph Waypoint 039	N
9/14/21	8211	Survey Area 7C Photograph Waypoint 039	E
9/14/21	8212	Survey Area 7C Photograph Waypoint 039	S
9/14/21	8214	Survey Area 7C Photograph Waypoint 040	N
9/14/21	8215	Survey Area 7C Photograph Waypoint 040	S
9/14/21	8220	Survey Area 7C Photograph Waypoint 041	N
9/14/21	8224	Survey Area 7C Photograph Waypoint 042	N
9/14/21	8225	Survey Area 7C Photograph Waypoint 042	E
9/14/21	8226	Survey Area 7C Photograph Waypoint 042	S



Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/14/21	8227	Survey Area 7C Photograph Waypoint 042	W
9/15/21	8230	Survey Area 2 Photograph Waypoint 043	N
9/15/21	8231	Survey Area 2 Photograph Waypoint 043	E
9/15/21	8232	Survey Area 2 Photograph Waypoint 043	S
9/15/21	8233	Survey Area 2 Photograph Waypoint 043	W
9/15/21	8234	Survey Area 2 Photograph Waypoint 044 - Car and Debris	E
9/15/21	8235	Survey Area 2 - Car with Scale on Roof	S
9/15/21	8236	Survey Area 2 - Car with Scale on Roof	N
9/15/21	8237	Survey Area 3 Photograph Waypoint 045	N
9/15/21	8238	Survey Area 3 Photograph Waypoint 045	E
9/15/21	8239	Survey Area 3 Photograph Waypoint 045	S
9/15/21	8240	Survey Area 3 Photograph Waypoint 045	W
9/15/21	8241	Survey Area 3 Photograph Waypoint 047	N
9/15/21	8242	Survey Area 3 Photograph Waypoint 047	E
9/15/21	8243	Survey Area 3 Photograph Waypoint 047	S
9/15/21	8244	Survey Area 3 Photograph Waypoint 047	W
9/15/21	8245	Survey Area 3 Photograph Waypoint 048	N
9/15/21	8246	Survey Area 3 Photograph Waypoint 048	E
9/15/21	8247	Survey Area 3 Photograph Waypoint 048	S
9/15/21	8248	Survey Area 3 Photograph Waypoint 048	W
9/15/21	8249	Survey Area 3 Photograph Waypoint 049	N
9/15/21	8250	Survey Area 3 Photograph Waypoint 049	E
9/15/21	8251	Survey Area 3 Photograph Waypoint 049	S
9/15/21	8252	Survey Area 3 Photograph Waypoint 049	W
9/15/21	8253	Glacier Creek	E
9/15/21	8254	Survey Area 3 Photograph Waypoint 050	N
9/15/21	8255	Survey Area 3 Photograph Waypoint 050	E
9/15/21	8256	Survey Area 3 Photograph Waypoint 050	S
9/15/21	8257	Survey Area 3 Photograph Waypoint 050	W
9/15/21	8258	Survey Area 3 Photograph Waypoint 050 South Retake	S
9/15/21	8259	Survey Area 3 Photograph Waypoint 051	N
9/15/21	8260	Survey Area 3 Photograph Waypoint 051	E
9/15/21	8261	Survey Area 3 Photograph Waypoint 051	S
9/15/21	8262	Survey Area 3 Photograph Waypoint 051	W

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/15/21	8263	Survey Area 3 Photograph Waypoint 051 West Retake	W
9/15/21	8264	Lower Girdwood Iditarod Trailhead Sign	
9/15/21	8265	Lower Iditarod Trailhead Map Sign	
9/15/21	8266	Lower Iditarod Trail - Old Girdwood Junction Trailhead	
9/15/21	8267	Survey Area 2 Photograph Waypoint 052	N
9/15/21	8268	Survey Area 2 Photograph Waypoint 052	E
9/15/21	8269	Survey Area 2 Photograph Waypoint 052	S
9/15/21	8270	Survey Area 2 Photograph Waypoint 052	W
9/15/21	8271	Survey Area 2 Photograph Waypoint 053	N
9/15/21	8272	Survey Area 2 Photograph Waypoint 053	E
9/15/21	8273	Survey Area 2 Photograph Waypoint 053	S
9/15/21	8274	Survey Area 2 Photograph Waypoint 053	W
9/15/21	8275	Survey Area 2 Photograph Waypoint 054	N
9/15/21	8276	Survey Area 2 Photograph Waypoint 054	E
9/15/21	8277	Survey Area 2 Photograph Waypoint 054	S
9/15/21	8278	Survey Area 2 Photograph Waypoint 054	W
9/15/21	8279	Survey Area 2 Photograph Waypoint 055	N
9/15/21	8280	Survey Area 2 Photograph Waypoint 055	E
9/15/21	8281	Survey Area 2 Photograph Waypoint 055	S
9/15/21	8282	Survey Area 2 Photograph Waypoint 055	W
9/15/21	8283	Survey Area 6 Photograph Waypoint 056	N
9/15/21	8284	Survey Area 6 Photograph Waypoint 056	E
9/15/21	8285	Survey Area 6 Photograph Waypoint 056	S
9/15/21	8286	Survey Area 6 Photograph Waypoint 056	W
9/15/21	8287	Survey Area 6 Photograph Waypoint 057	N
9/15/21	8288	Survey Area 6 Photograph Waypoint 057	E
9/15/21	8289	Survey Area 6 Photograph Waypoint 057	S
9/15/21	8290	Survey Area 6 Photograph Waypoint 057	W
9/15/21	8291	Survey Area 6 Photograph Waypoint 057 - PVC Pipe	Plan
9/15/21	8292	Survey Area 6 Photograph Waypoint 058	N
9/15/21	8293	Survey Area 6 Photograph Waypoint 058	E
9/15/21	8294	Survey Area 6 Photograph Waypoint 058	S
9/15/21	8295	Survey Area 6 Photograph Waypoint 058	W
9/15/21	8296	Trail 1.5x1.5m Boards with Scale at Waypoint 058	Plan



Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/15/21	8297	Survey Area 6 Photograph Waypoint 059	N
9/15/21	8298	Survey Area 6 Photograph Waypoint 059	E
9/15/21	8299	Survey Area 6 Photograph Waypoint 059	S
9/15/21	8300	Survey Area 6 Photograph Waypoint 059	W
9/15/21	8301	Survey Area 6 Photograph Waypoint 059 – PVC and tree flagging	Plan
9/15/21	8302	Survey Area 6 Photograph Waypoint 0059 – Trash dump - black bags	N
9/15/21	8303	Survey Area 6 Photograph Waypoint 060	N
9/15/21	8304	Survey Area 6 Photograph Waypoint 060	E
9/15/21	8305	Survey Area 6 Photograph Waypoint 060	S
9/15/21	8306	Survey Area 6 Photograph Waypoint 060	W
9/15/21	8307	Survey Area 6 Photograph Waypoint 061	N
9/15/21	8308	Survey Area 6 Photograph Waypoint 061	E
9/15/21	8309	Survey Area 6 Photograph Waypoint 061	S
9/15/21	8310	Survey Area 6 Photograph Waypoint 061	W
9/15/21	8311	Survey Area 6 Photograph Waypoint 062	N
9/15/21	8312	Survey Area 6 Photograph Waypoint 062	E
9/15/21	8313	Survey Area 6 Photograph Waypoint 062	S
9/15/21	8314	Survey Area 6 Photograph Waypoint 062	W
9/15/21	8315	Survey Area 6 Photograph Waypoint 063	N
9/15/21	8316	Survey Area 6 Photograph Waypoint 063	E
9/15/21	8317	Survey Area 6 Photograph Waypoint 063	S
9/15/21	8318	Survey Area 6 Photograph Waypoint 063	W
9/15/21	8319	Survey Area 6 Photograph Waypoint 063	
9/15/21	8320	Car and post overview	S
9/15/21	8321	Car overview	N
9/15/21	8322	Car overview	W
9/15/21	8323	Car overview	E
9/15/21	8324	Car overview	Se
9/15/21	8325	Driver car door smith	N
9/15/21	8326	Back door with scale	W
9/15/21	8327	Car overview	NW
9/15/21	8328	Car overview and debris	W
9/15/21	8329	Square depression (likely old test pit) with scale	Plan
9/15/21	8330	Square depression overview - context	N

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
9/15/21	8331	Square depression overview	E
9/15/21	8332	Square depression overview	S
9/15/21	8333	Square depression overview	W
9/15/21	8334	Circle depressions n=2 overview	N
9/15/21	8335	Circle depressions n=2 three-meter scale	N
9/15/21	8336	Circle depressions n=2 overview	E
9/15/21	8337	Circle depressions n=2	E
9/15/21	8338	Circle depressions n=2 overview	S
9/15/21	8339	Circle depressions n=2	S
9/15/21	8340	Circle depressions n=2 overview	W
9/15/21	8341	Circle depressions n=2	W
9/15/21	8342	Circle depressions n=2	Se
9/15/21	8343	Old can dump	S
9/15/21	8344-5	Old can dump with scale	W
9/15/21	8346-7	Survey Area 2 Soil Core Test A	Plan
9/15/21	8348	Survey Area 2 Soil Core Test A	
9/15/21	8349	Survey Area 2 Soil Core Test A and Surface Depressions	W
9/15/21	8350	Survey Area 2 Soil Core Test B and Surface Depressions	E
9/15/21	8351-2	Survey Area 2 Soil Core Test B	Plan
9/15/21	8353	Milled lumber	W
9/15/21	8355	Milled lumber	S
9/15/21	8356	Survey Area 2 Site overview	W
9/15/21	8357-8	Survey Area 2 Site overview	N
10/7/21	8359	Wagon Trail Overview	W
10/7/21	8360	Wagon Trail Overview	W
10/7/21	8361	Wagon Trail Overview	W
10/7/21	8362	Surface Depression 01 underneath brush	SW
10/7/21	8363	Surface Depression 01	W
10/7/21	8364	Brush within site boundaries and covering surface depressions	E
10/7/21	8365	Surface Depression 02 and old cot	E
10/7/21	8366	Surface Depression 02	N
10/7/21	8367	Surface Depression 02	W
10/7/21	8368	Surface Depression 02 and old cot with scale	W
10/7/21	8369	Surface Depression 02 and old cot with scale	A



Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
10/7/21	8370	Tree with three small wood beams nailed with scale	N
10/7/21	8371	Surface rises overview	NW
10/7/21	8372	Survey Area 1 Photograph Waypoint 001	E
10/7/21	8373	Survey Area 1 Photograph Waypoint 001	N
10/7/21	8374	Survey Area 1 Photograph Waypoint 001	W
10/7/21	8375	Survey Area 1 Photograph Waypoint 001	S
10/7/21	8376	At end of bluff - wagon trail overview	E
10/7/21	8377	At end of bluff - wagon trail overview	E
10/7/21	8378	Landscape overview	S
10/7/21	8379	Landscape overview - bluff edge	W
10/7/21	8380	Photograph Overview - Waypoint TrailMid	N
10/7/21	8381	Photograph Overview - Waypoint TrailMid	E
10/7/21	8382	Photograph Overview - Waypoint TrailMid	S
10/7/21	8383	Photograph Overview - Waypoint TrailMid	W
10/7/21	8384	Trail leading north at edge of bluff	N
10/7/21	8385	Trail at edge of bluff on western edge of site	S
10/7/21	8386	Landscape overview of bluff edge western edge	N
10/7/21	8387	Trail Overview	E
10/7/21	8388	Trail Overview	E
10/7/21	8389	Trail Overview	E
10/7/21	8390	Trail Overview	W
10/7/21	8391-2	Viewshed from Wagon Trail across Turnagain Arm	S
10/7/21	8393	Northeast corner of Survey Area 1 - Landscape Overview	N
10/7/21	8394	Northeast corner of Survey Area 1 - Landscape Overview	E
10/7/21	8395	Northeast corner of Survey Area 1 - Landscape Overview	S
10/7/21	8396	Northeast corner of Survey Area 1 - Landscape Overview	W
10/7/21	8397	Small board sign nailed to tree with scale	S
10/7/21	8398	Small board sign nailed to tree	S
10/7/21	8399	Small board sign nailed to tree	S
10/7/21	8400	Alder groves present within Survey Area 1	N
10/7/21	8401	Alder groves present within Survey Area 1	E
10/7/21	8402	Alder groves present within Survey Area 1	S
10/7/21	8403	Alder groves present within Survey Area 1	W
10/7/21	8405	Survey Area 1 Photograph Waypoint 001	N

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
10/7/21	8406	Survey Area 1 Photograph Waypoint 001	E
10/7/21	8407	Survey Area 1 Photograph Waypoint 001	S
10/7/21	8408	Survey Area 1 Photograph Waypoint 001	W
10/7/21	8410	Survey Area 1 Photograph Waypoint 002	N
10/7/21	8411	Survey Area 1 Photograph Waypoint 002	E
10/7/21	8412	Survey Area 1 Photograph Waypoint 002	S
10/7/21	8413	Survey Area 1 Photograph Waypoint 002	W
10/7/21	8414	Survey Area 1 Photograph Waypoint 002	W
10/7/21	8416	Survey Area 1 Photograph Waypoint 003	N
10/7/21	8417	Survey Area 1 Photograph Waypoint 003	E
10/7/21	8418	Survey Area 1 Photograph Waypoint 003	S
10/7/21	8419	Survey Area 1 Photograph Waypoint 003	W
10/7/21	8421	Survey Area 1 Photograph Waypoint 004	N
10/7/21	8422	Survey Area 1 Photograph Waypoint 004	E
10/7/21	8423	Survey Area 1 Photograph Waypoint 004	S
10/7/21	8424	Survey Area 1 Photograph Waypoint 004	W
10/7/21	8426	Survey Area 1 Photograph Waypoint 005	N
10/7/21	8427	Survey Area 1 Photograph Waypoint 005	E
10/7/21	8428	Survey Area 1 Photograph Waypoint 005	S
10/7/21	8429	Survey Area 1 Photograph Waypoint 005	W
10/7/21	8431	Survey Area 1 Photograph Waypoint 006	N
10/7/21	8432	Survey Area 1 Photograph Waypoint 006	E
10/7/21	8433	Survey Area 1 Photograph Waypoint 006	S
10/7/21	8434	Survey Area 1 Photograph Waypoint 006	W
10/7/21	8435	Sampling Area of unknown surface depressions with flags	N
10/7/21	8436	Sampling Area of unknown surface depressions with flags	N
10/7/21	8437	Sampling Area of unknown surface depressions with flags	N
10/7/21	8438	Sampling Area of unknown surface depressions with flags	N
10/7/21	8439	Moose Meadows	W
10/7/21	8440	Virgin Creek Trailhead	E
10/7/21	8441	Virgin Creek Trailhead	SE
10/7/21	8442	Trailhead	NE
10/7/21	8443	Trailhead	E
10/7/21	8444	Trailhead	E



Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
10/7/21	8445	Moose Meadows Landscape Overview	W
10/7/21	8446	Moose Meadows Landscape Overview	W
10/7/21	8447	Moose Meadows Landscape Overview	W
10/7/21	8449	Stumpy Faulkner Winter Trail	NW
10/7/21	8450	Stumpy Faulkner Winter Trail	
10/7/21	8451	Stumpy Faulkner Winter Trail	
10/7/21	8452	INHT Cross over Crow Creek Road at Crow Creek Mine	N
10/7/21	8453	INHT Cross over Crow Creek Road at Crow Creek Mine	E
10/7/21	8454	INHT Cross over Crow Creek Road at Crow Creek Mine	S
10/7/21	8455	INHT Cross over Crow Creek Road at Crow Creek Mine	W
10/7/21	8456	Winner Creek Trailhead	N
10/7/21	8457	Winner Creek Trailhead	N
10/7/21	8458	Intersection of Crow Creek Road and Pull in for Winner Creek Trailhead	N
10/7/21	8459	Intersection of Crow Creek Road and Pull in for Winner Creek Trailhead	E
10/7/21	8460	Intersection of Crow Creek Road and Pull in for Winner Creek Trailhead	S
10/7/21	8461	Intersection of Crow Creek Road and Pull in for Winner Creek Trailhead	W
10/7/21	8462	INHT Cross over Crow Creek Road	N
10/7/21	8463	INHT Cross over Crow Creek Road	E
10/7/21	8464	INHT Cross over Crow Creek Road	S
10/7/21	8465	INHT Cross over Crow Creek Road	W
10/7/21	8466	INHT Cross over Crow Creek Road	W
10/7/21	8467	INHT Trailhead	E
10/7/21	8468	INHT Trailhead	E
10/7/21	8469	INHT Cross over Crow Creek Rd	N
10/7/21	8470	INHT Cross over Crow Creek Road	E
10/7/21	8471	INHT Cross over Crow Creek Road	S
10/7/21	8472	INHT Cross over Crow Creek Road	W
10/7/21	8473	INHT Cross over Crow Creek Road	W
10/7/21	8474	Beaver Pond and California Creek Trailhead	N
10/7/21	8475	Beaver Pond and California Creek Trailhead	N
10/7/21	8476	Beaver Pond and California Creek Trailhead	E
10/7/21	8477	Beaver Pond and California Creek Trailhead	S
10/7/21	8478	Beaver Pond and California Creek Trailhead	W
10/7/21	8479	Beaver Pond Trail System Sign	

Date	Exp./Frame	Subject/Description (if a building please list Address or Block and Lot numbers)	View Toward
10/7/21	8480	Beaver Pond Trail System Sign	
10/7/21	8481	Beaver Pond and California Creek Trail	W
10/7/21	8482	Lower Iditarod Trail	S
10/7/21	8483	Lower Iditarod Trail	S
10/7/21	8484	Corner of Hightower Rd and Alyeska Hwy	NW
10/7/21	8485	Corner of Hightower Rd and Alyeska Hwy	E
10/7/21	8486	Corner of Hightower Rd and Alyeska Hwy	S
10/7/21	8487	Corner of Hightower Rd and Alyeska Hwy	W
10/7/21	8488	Alyeska Hwy	E
10/7/21	8489	Glacier Creek Bridge	E
10/7/21	8490	Glacier Creek	N
10/7/21	8491	Glacier Creek Bridge	E
10/7/21	8492	Glacier Creek Bridge	S
10/7/21	8493	Glacier Creek Bridge	W
10/7/21	8494	Glacier Creek	N
10/7/21	8495	INHT and Hightower Rd	N
10/7/21	8496	INHT and Hightower Rd	N
10/7/21	8497	Wagon Trail Site Overview	SW
10/7/21	8498	Wagon Trail Site Overview	W
10/7/21	8499	Wagon Trail Site Overview	NW
10/7/21	8500	Wagon Trail Site Overview	W
10/7/21	8501	Wagon Trail Site Overview	W



**APPENDIX B: GIS LOG**



## ARCHAEOLOGICAL GIS RECORD

**PROJECT:** Girdwood Archaeological Survey

**Field date(s):** September 14th, 15th and October 7, 2021

**Crew:** Joan Bayles and Walker Burgett

Waypoint	Description	Lat/Long (Decimal/Degree; NAD83)
008	Photograph Waypoint Survey Area 4/5	60.956881, -149.143542
009	Photograph Waypoint Survey Area 4/5	60.956409, -149.142885
011	Photograph Waypoint Survey Area 4/5	60.955494, -149.141991
012	Photograph Waypoint Survey Area 4/5	60.955218, -149.142125
013	Photograph Waypoint Survey Area 4/5	60.954800, -149.141009
014	Photograph Waypoint Survey Area 4/5	60.955124, -149.140665
015	Photograph Waypoint Survey Area 4/5	60.954686, -149.142535
016	Photograph Waypoint Survey Area 4/5	60.955018, -149.143488
017	Photograph Waypoint Survey Area 4/5	60.955511, -149.144780
018	Photograph Waypoint Survey Area 4/5	60.955511, -149.144780
019	Photograph Waypoint Survey Area 4/5	60.952895, -149.147643
020	Photograph Waypoint Survey Area 4/5	60.951101, -149.151263
021	Photograph Waypoint INHT	60.968554, -149.124309
022	Photograph Waypoint Survey Area 7A	60.969514, -149.123383
023	Survey Area 7A Soil Core Test 01	60.969659, -149.123293
024	Photograph Waypoint Survey Area 7A	60.969787, -149.122829
025	Photograph Waypoint Survey Area 7A	60.970367, -149.121404
026	Survey Area 7A Soil Core Test 02	60.971093, -149.120182
027	Photograph Waypoint Survey Area 7A	60.971338, -149.120326
028	Photograph Waypoint Survey Area 7B	60.975043, -149.113863
029	Photograph Waypoint Survey Area 7B	60.974663, -149.115149
030	Photograph Waypoint Survey Area 7B	60.974123, -149.115630
031	Photograph Waypoint Survey Area 7B	60.973848, -149.117484
032	Photograph Waypoint b/w SA 7A & 7B	60.972223, -149.119042
033	Photograph Waypoint Survey Area 7C	60.986152, -149.107225



Waypoint	Description	Lat/Long (Decimal/Degree; NAD83)
034	Photograph Waypoint Survey Area 7C	60.985207, -149.108468
036	Photograph Waypoint Survey Area 7C	60.984994, -149.106552
037	Photograph Waypoint Survey Area 7C	60.984637, -149.105161
038	Photograph Waypoint Survey Area 7C	60.984549, -149.104236
039	Photograph Waypoint Survey Area 7C	60.984401, -149.104512
040	Photograph Waypoint Survey Area 7C	60.984931, -149.103610
041	Photograph Waypoint Survey Area 7C	60.985469, -149.103838
042	Photograph Waypoint Survey Area 7C	60.985670, -149.105974
043	Photograph Waypoint Survey Area 2	60.943831, -149.170232
044	Photograph Waypoint Survey Area 2	60.943639, -149.170014
045	Photograph Waypoint Survey Area 3	60.943043, -149.160268
047	Photograph Waypoint Survey Area 3	60.943514, -149.159316
048	Photograph Waypoint Survey Area 3	60.944198, -149.158371
049	Photograph Waypoint Survey Area 3	60.944718, -149.159693
050	Photograph Waypoint Survey Area 3	60.945193, -149.160117
051	Photograph Waypoint Survey Area 3	60.944860, -149.160342
052	Photograph Waypoint Survey Area 2	60.943561, -149.168947
053	Photograph Waypoint Survey Area 2	60.942781, -149.168255
054	Photograph Waypoint Survey Area 2	60.944213, -149.169403
055	Photograph Waypoint Survey Area 2	60.944947, -149.169212
056	Photograph Waypoint Survey Area 6	60.969341, -149.133749
057	Photograph Waypoint Survey Area 6	60.969891, -149.133881
058	Survey Area 6 – boards – ATV trail	60.970207, -149.134700
059	Survey Area 6 – end of ATV trail	60.970551, -149.133920
060	Photograph Waypoint Survey Area 6	60.970551, -149.133025
061	Photograph Waypoint Survey Area 6	60.969932, -149.132289
062	Photograph Waypoint Survey Area 6	60.970183, -149.131697
063	Photograph Waypoint Survey Area 6	60.970309, -149.132089
Teleline	Utility Line through Survey Area 2	60.943838, -149.169936
Woodpost	Wood post in Survey Area 2	60.943680, -149.169955
SD1	Surface Depression 01 Survey Area 2	60.943542, -149.170112
SD2	Surface Depression 02 Survey Area 2	60.943538, -149.170147
Square	Square Depression Survey Area 2	60.943539, -149.170043
Car	Coup 1940s car	60.943614, -149.169961

Waypoint	Description	Lat/Long (Decimal/Degree; NAD83)
Cans	Can dump	60.943558, -149.170148
SoiltestA	Soil Core Test A Survey Area 2	60.943481, -149.170133
SoiltestB	Soil Core Test B Survey Area 2	60.943529, -149.170159
NW crnr	Northwest corner of site boundaries	60.943707, -149.170031
NE crnr	Northeast corner of site boundaries	60.943623, -149.169768
SE crnr	Southeast corner of site boundaries	60.943454, -149.170038
SW crnr	Southwest corner of site boundaries	60.943501, -149.170240
TrailEast	Eastern extent of Wagon Trail	60.944388, -149.172128
SD1	Surface Depression 01 Survey Area 1	60.9444407, -149.172239
OldCot	Wood frame cot near SD01 Survey Area 1	60.944479, -149.172609
SD2	Surface Depression 02 Survey Area 1	60.944526, -149.172620
0001	Photograph Waypoint Survey Area 1	60.94461, -149.172939
TrailMid	Middle of Wagon Trail	60.944602, -149.172464
TrailEnd1	End of Trail	60.944856, -149.172880
TrailEndBluff	End of Trail at bluff	60.944949, -149.172655
0002	Photograph Waypoint Survey Area 1	60.945000, -149.272391
0003	Photograph Waypoint Survey Area 1	60.945400, -149.172747
0004	Photograph Waypoint Survey Area 1	60.945862, -149.173133
005	Photograph Waypoint Survey Area 1	60.945430, -149.172863
006	Photograph Waypoint Survey Area 1	60.945074, -149.172915
PR1	Site boundary waypoint	60.944375, -149.172180
PR2	Site boundary waypoint	60.944478, -149.172586
PR3	Site boundary waypoint	60.944540, -149.172791
PR4	Site boundary waypoint	60.944694, -149.173028
PR5	Site boundary waypoint	60.944859, -149.172928
PR6	Site boundary waypoint	60.944919, -149.172639
PR7	Site boundary waypoint	60.944755, -149.172084
PR8	Site boundary waypoint	60.944855, -149.172084
PR9	Site boundary waypoint	60.944719, -149.172179
PR10	Site boundary waypoint	60.944513, -149.172127
PR11	Site boundary waypoint	60.944408, -149.172123
007	Crow Creek Mine	60.997562, -149.088658
008	Winner Creek Trail	60.995400, -149.092176
009	INHT – Crow Creek Road	60.990884, -149.101773



Waypoint	Description	Lat/Long (Decimal/Degree; NAD83)
010	INHT – Crow Creek Road	60.978689, -149.11950
011	Multi-use Nordic Trail	60.974141, -149.093269
012	Stumpy's Trail	60.964180, -149.112538
013	INHT	60.966778, -149.127794
014	INHT – Glacier Creek Bridge	60.961682, -149.131614
015	Virgin Creek Falls	60.948368, -149.125214
016	INHT – Alyeska Hwy	60.943940, -149.170098
017	California Creek Trail	60.968000, -149.135197

**APPENDIX C: HLB PERMIT**



DocuSign Envelope ID: 4A91EC59-358F-4E4A-BFCA-82DCB9BD8F59

HLB Permit 2021-11; True North SDS

Municipality of Anchorage  
Real Estate Department \* Heritage Land Bank  
Land Use Permit

HLB Permit: 2021-11

Permittee: True North Sustainable Development Solutions, LLC  
Attn: Robert Meinhardt

Address: 5715 S Settlers Bay Drive, Ste #2  
Wasilla, AK 99623

Permit Area Description: HLB Parcels 6-010, 6-011, 6-015, 6-017, 6-036, 6-040, 6-057F, 6-205  
Parcel IDs: 075-041-31, 075-311-04, 075-021-03, 075-031-34,  
075-104-71, 075-102-44, 075-131-07, 075-132-86

This agreement is between the Real Estate Department, Heritage Land Bank, Municipality of Anchorage, hereinafter "HLB," whose address is P.O. Box 196650, Anchorage, AK, 99519-6650, and **True North Sustainable Development Solutions, LLC**, hereinafter "Permittee."

1. **Permission.** The HLB does hereby grant to the Permittee a non-exclusive, revocable Land Use Permit, hereinafter referred to as "Permit," containing the right, permission and authority to enter upon HLB property in the above-described Permit Area for the limited purpose(s) of: **archaeological survey per Appendices A and B**. Permittee shall notify the HLB of its intent to use the Permit immediately prior to its commencement of above-mentioned activities and comply with any and all restrictions placed upon it under this Permit.

2. **Term.** This Permit shall be for a **term of approximately four days**, commencing on **September 12, 2021** and ending midnight **September 15, 2021** provided that the HLB shall have the absolute right to terminate this Permit at any time, without cause, upon **24 hours' notice** to Permittee. Any continued use of the Permit Area by the Permittee after the expiration of the original term, absent prior to HLB approval, shall be deemed a trespass subject to ejection. The Permittee may abandon the Permit Area and give up all rights under this Permit at any time. The Permittee's obligation to pay an annual fee, and any other affirmative obligations of Permittee under this Permit, shall continue until the Permittee has given written notification to the HLB that Permittee is abandoning all rights under this Permit and has removed any personal property from the Permit Area and has restored the Permit Area pursuant to Paragraph 6 of this Permit.

3. **Fees.** Waived.

4. **Title to property.** This Permit does not create for the Permittee any interest in or title to the above-described property.

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5. **HLB use.** The HLB reserves for itself, its successors, assigns, permittees and licensees, the right to use the Permit Area for any purpose whatsoever, subordinate to the parameters as outlined in Anchorage Municipal Code 25.40.

6. **Restoration of the Permit Area.** Upon the completion of the limited purpose(s) described in section 1, above, or by the date of termination, whichever first occurs, all rights or obligations contained within this Permit shall terminate except for obligations imposed by this Permit on Permittee to repair, replace or restore the Permit Area, structures or improvements thereon, and the indemnity imposed by paragraphs 8, 9 and 11 below. Structures or improvements, if any, currently existing within the Permit Area which are removed or damaged during the Permit period shall be replaced or repaired upon completion of the activities by Permittee, to the satisfaction of the HLB. Upon the expiration, abandonment, or termination of this Permit, the Permittee shall remove from and off the Permit Area all property owned or controlled by the Permittee and restore the Permit Area to its prior condition in a manner satisfactory to HLB. Upon failure to do so, the HLB may perform such work at Permittee's expense. Until said property is removed and the Permit Area restored, either by Permittee or by HLB at the Permittee's expense, this Permit and all terms contained herein, including payment of fees, shall, at HLB's option, remain in effect until said property is removed and the Permit Area is restored to its prior condition.

7. **Alterations to the Permit Area, structures or improvements thereon.** The general physical contour of the Permit Area shall not be altered without prior written approval from the HLB. No unpermitted excavation work shall be performed upon the Permit Area. Permittee's use of the Permit Area shall not interfere with the use or operation of any facility, drainage ditch, or related facilities which may be located upon, over, or under the Permit Area. No structure, improvement or other facility, including but not limited to temporary structures and fences, may be constructed or placed in the Permit Area without prior written approval of HLB. Any construction or placement shall comply with local building and land use regulations. See 21. Special Conditions for exceptions.

8. **Indemnification.** Permittee agrees to indemnify, defend and hold the HLB and the Municipality of Anchorage (MOA) harmless from and against any and all claims arising, directly or indirectly, from Permittee's use and related conduct in the Permit Area or from the conduct of Permittee's business or from any activity, work or things done, permitted or suffered to be done by Permittee in or about the Permit Area. The Permittee further agrees to indemnify and hold HLB and the MOA harmless from and against any and all claims arising from any breach or default in the performance of any obligation on Permittee's part to be performed under the terms of this Permit, or from claims of any of Permittee's agents, contractors, employees, invitees, customers or visitors, and from and against all costs, attorney's fees, expenses and liabilities incurred in the defense of any such claim or any action or proceeding brought thereon. In case any action or proceeding is brought against the HLB or the MOA, Permittee shall defend the same at Permittee's expense by counsel reasonably satisfactory to HLB or the MOA.

9. **Insurance.** Permittee shall deliver to the HLB certificates of liability insurance on or before the effective date of this Permit or at another date as agreed to in writing by the HLB. Insurance shall cover the entire Permit Term. Permittee shall deliver to the HLB photocopies of the policy or policies of insurance, certificates of insurance, or copies of endorsements upon request by the HLB. The policy or



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policies purchased pursuant to this paragraph shall name HLB and Permittee as co-insureds with respect to the Permit Area and the use or business operated by Permittee on the Permit Area.

- A. The Permittee shall maintain in good standing the insurance described in subsection B of this section. Before rendering any activities under the Permit, the Permittee shall furnish the HLB with proof of insurance in accordance with subsection B in a form acceptable to the MOA Risk Manager.
  - B. The Permittee shall provide the following insurance:
    - 1. Workers' compensation and employer's liability coverage in the amount of \$500,000 as required by Alaska law. In addition, the Permittee is also responsible for complying with the laws of the state where Permittee maintains its principal place of business.
    - 2. Commercial general liability, including contractual and personal injury coverages -- \$1,000,000 per occurrence, \$2,000,000 in the aggregate. MOA shall be named as additional insured.
    - 3. Commercial automobile liability per occurrence in the amount of \$1,000,000, single limit to include: owned, hired, and non-owned, if any.
  - C. Policies written on a "claims made basis" must have a two (2) year tail of coverage from the completion of the contract requirements.
  - D. Each policy of insurance required by this section shall provide for no less than thirty (30) days advance notice to the MOA.
  - E. The MOA must be listed as an additional insured on all policies except Professional Liability and Worker's Compensation Policies. The actual policy endorsement shall accompany each Certificate of Insurance.
  - F. All policies except Professional Liability and Worker's Compensation shall contain a waiver of subrogation against the MOA. This policy endorsement should accompany each Certificate of Insurance.
  - G. Any self-insured retentions must be declared to and approved by the MOA.
10. **Performance Bond.** Waived.
11. **Compliance.** Permittee shall, at its own expense, and with all due diligence, comply with all of the provisions of local, state, and federal law which are now in effect or may later be adopted by any governmental authority applicable to the Permit Area and Permittee's use thereof.
12. **Taxes.** During the term of this Permit, Permittee shall be responsible for and shall timely pay all personal property taxes for Permittee's personal property at the Premises, if any. In addition, in the event that taxes are at any time imposed on Permit fee payments, Permittee shall be responsible for timely payment of such. Permittee shall be responsible for all real property and improvement taxes,

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HLB Permit 2021-11; True North SDS

assessments and charges imposed that are associated with the Permittee's use of public property by private parties, if any.

Permittee shall have the right to protest an assessment of taxes or other assessments or charges provided, prior to such protest, Permittee shall deposit with Permitter any sum in dispute, to insure payment in the event such contest is not successful.

**13. Assignment.** This Permit is personal to Permittee and may not be assigned or transferred in any manner, including by operation of law, without prior written consent of the HLB. Any attempt to assign or transfer this Permit shall cause an immediate termination of this Permit.

**14. Notices.**

- A. All notices required or permitted in this Permit shall be deemed to have been fully given or made or sent in writing and deposited in the United States mail, registered or certified mail, and postage prepaid. All notices and other communications provided for herein shall be in writing and shall be delivered by hand or overnight courier service, mailed by certified or registered mail or sent by telecopy or other electronic means of communication as follows:

To HLB:           ATTN: Heritage Land Bank  
Municipality of Anchorage  
P.O. Box 196650  
Anchorage, AK 99519-6650  
[wwwhlb@muni.org](mailto:wwwhlb@muni.org)

To Permittee:   ATTN: Robert Meinhardt  
True North Sustainable Development Solutions, LLC  
5715 S Settlers Bay Drive, Ste #2  
Wasilla, AK 99623

- B. The address for notice for either party may be changed by written notice given by that party to the other party as above provided.

**15. Environmental Considerations.** Permittee must, at its own expense, comply with all laws, ordinances, regulations and administrative agency or court orders relating to health, safety, noise, environmental protection, waste disposal, hazardous or toxic materials, and water and air quality. In the event any discharge, leakage, spillage, emission or pollution of any type occurs upon or from the Permit Area during the Permit Term or any holdover thereafter, Permittee shall immediately notify HLB and shall, at Permittee's own expense, clean and restore the Permit Area to the satisfaction of HLB and any governmental body or court having jurisdiction of the matter.

- A. Condition of the Property. Based on HLB's use, on-site inspection, and knowledge of an information acquired about the Permit Area, and upon reasonably diligent inquiry, HLB has no knowledge, evidence or information of the possible existence of toxic or hazardous



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HLB Permit 2021-11; True North SDS

substances, as defined below, on the Permit Area property or in the Permit Area surface or subsurface soils or groundwater and that no toxic or hazardous substances are known to HLB to now exist on, in or under the Permit Area property.

- B. Environmental Indemnity. Permittee agrees to indemnify, hold harmless and defend HLB against all liability, cost and expense (including, without limitation, any fines, penalties, diminution in value of the Permit Area, assessment and clean-up costs, judgments, litigation costs and attorneys' fees) incurred by or levied against HLB as a result of Permittee's breach of this paragraph or as a result of any discharge, leakage, spillage, emission or pollution on or discharged from the Permit Area, without regard to whether such liability, cost or expense arises during or after the Permit Term; provided, however, that Permittee shall not be required to indemnify HLB under this paragraph if the parties agree or a court of competent jurisdiction determines that such liability, cost or expense is caused directly and solely by the negligence of HLB, the MOA, or a third party actor who is not an agent, employee, successor, or independent contractor associated with Permittee. The foregoing indemnity shall survive the expiration or earlier termination of this Permit.
- C. Toxic or Hazardous Substances. For purposes of this Permit, shall be interpreted broadly to include, but not be limited to, any material or substance that is defined or classified under federal, state or local laws as:
1. A "hazardous substance" pursuant to Section 101 of the Comprehensive Environmental Response, Compensation and Liability Act, 42 U.S.C. § 9601(14) or Section 311 of the Federal Water Pollution Control Act, 33 U.S.C. § 1321, each as now or hereafter amended;
  2. A "hazardous waste" pursuant to Section 1004 or Section 3001 of the Resource Conservation and Recovery Act, 42 U.S.C. § 6903, 42 U.S.C. § 6921, as now or hereafter amended;
  3. A toxic pollutant under Section 307(1)(a) of the Federal Water Pollution Control Act, 33 U.S.C. §1317(1)(a);
  4. A "hazardous air pollutant" under Section 112 of the Clean Air Act, 42 U.S.C. § 7412, as now or hereafter amended;
  5. A "hazardous material" under the Hazardous Material Transportation Act, 49 U.S.C. §1802(2), as now or hereafter under the aforementioned laws; or
  6. Presenting a risk to human health or the environment under other applicable federal, state or local laws, ordinance, or regulations, as now or as may be passed or promulgated in the future. "Toxic or Hazardous Substances" shall also mean any substance that after release into the environment and upon exposure, ingestion, inhalation or assimilation, either directly from the environment or indirectly by ingestion, inhalation or assimilation, either directly from the environment or indirectly by ingestion through food chains, will or may reasonably be anticipated to cause death, disease, behavior abnormalities, cancer or genetic abnormalities. "Toxic or Hazardous Substances" specifically includes, but is not limited to, asbestos, polychlorinated biphenyls (PCBs), petroleum based products and derivatives, flammable explosives, radioactive materials and urea formaldehyde.

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HLB Permit 2021-11; True North SDS

- D. Environmental Testing. Permittee agrees that it shall be solely responsible for all costs and expenses associated with the performance of environmental testing of the Permit Area, which may be required at the HLB's sole discretion, upon the expiration or other termination of this Permit. Such environmental testing, conducted by a recognized engineering or environmental consulting firm acceptable to the HLB, shall be the basis for determining the extent of any environmental impairment caused by the Permittee's use and occupancy of the Permit Area.

**16. Default and Remedies.** The occurrence of any one or more of the following events shall constitute a material default by Permittee:

- A. The failure to make any payments required to be made by Permittee herein, as and when due.
- B. The failure to observe or perform any of the covenants, conditions or provisions of this Permit, including the following:
1. Any general arrangement or general assignment by Permittee for the benefit of creditors;
  2. Permittee becomes a debtor in bankruptcy;
  3. Appointment of a trustee or receiver to take possession of substantially all of Permittee's assets;
  4. Attachment, execution or other judicial seizure of substantially all of Permittee's assets;
  5. Providing HLB any financial statement including a materially false financial statement from any assignee of Permittee, any successor in interest of the Permittee or any guarantor of Permittee's obligation herein, was materially false at the time given;
  6. Vacation or abandonment of the Permit Area by the Permittee;
  7. Failure to maintain the required insurance coverage;
  8. Assignment, attempted assignment, or other transfer of this Permit without written consent from HLB;
  9. Waste or damage to the Permit Area, including any storage, use, discharge, leak, spill, emission or pollution of, on, or in the Permit Area of hazardous material or petroleum products.
- C. In the event of any material default by the Permittee, the HLB may at any time thereafter, without notice or demand and without limiting HLB in the exercise of any right or remedy which the HLB may have by reason of such default:
1. Terminate Permittee's rights under this Permit and pursue any remedies now or hereafter available to the HLB under this Permit in the Anchorage Municipal Code and Regulations, the laws or judicial decisions of the State of Alaska, or laws or judicial decisions of the United States; and





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HLB Permit 2021-11; True North SDS

**21. Special Conditions.**

1. Any additional required approvals regarding the work to be performed by authority of this permit must be in the form of a letter or memorandum issued by HLB. Emails are not valid approvals; however, approvals in correct form may be transmitted by email as an attachment.
2. Disturbance of wetlands on HLB property is prohibited.
3. Disturbance of floodways on any HLB or MOA property is prohibited.
4. Disturbances larger than 12" in diameter are prohibited.
5. All disturbances shall be repaired with native soil and vegetation.
6. No culturally or historically significant artifacts shall be removed.
7. Any location or identification of significant cultural or historical value shall be reported to HLB staff within 24 hours and must include GPS coordinates and be marked at that location with surveyor's stake and/or surveyor's tape.
8. HLB to receive a copy of all documentation resultant from field work on any HLB land (leased or owned) and a summary report of investigation within 30 days of permit termination.

MUNICIPALITY OF ANCHORAGE

Date: 09/09/2021

By:   
Christina C. Hendrickson  
Director

True North Sustainable Development Solutions, LLC

Date: 9/2/2021

DocuSigned by:  
  
2007887AED47415  
By: Robert Meinhardt  
Its: Manager  
Address: 5715 S Settlers Bay Drive, Ste #2  
Wasilla, AK 99623  
Phone: 907-841-4096  
E-mail: Robert.meinhardt@truenorthsds.com





### Certificate Of Completion

Envelope Id: 4A91EC59358F4E4ABFCA82DCB9BD8F59

Status: Completed

Subject: Please DocuSign: HLB-TNSDSLUP-210902.pdf

Source Envelope:

Document Pages: 8

Signatures: 1

Envelope Originator:

Certificate Pages: 1

Initials: 0

Shelley Rowton

AutoNav: Enabled

632 W 6th Ave

EnvelopeId Stamping: Enabled

Anchorage, AK 99501

Time Zone: (UTC-09:00) Alaska

shelley.rowton@anchorageak.gov

IP Address: 209.193.41.5

### Record Tracking

Status: Original

Holder: Shelley Rowton

Location: DocuSign

9/9/2021 10:49:13 AM

shelley.rowton@anchorageak.gov

Security Appliance Status: Connected

Pool: StateLocal

Storage Appliance Status: Connected

Pool: MOA

Location: DocuSign

### Signer Events

Christina Hendrickson

christina.hendrickson@anchorageak.gov

Real Estate Director

MOA

Security Level: Email, Account Authentication  
(None)

### Signature

Signature Adoption: Pre-selected Style  
Using IP Address: 209.193.41.5

### Timestamp

Sent: 9/9/2021 10:50:36 AM

Viewed: 9/9/2021 10:54:45 AM

Signed: 9/9/2021 10:54:54 AM

Electronic Record and Signature Disclosure:  
Not Offered via DocuSign

### In Person Signer Events

### Signature

### Timestamp

### Editor Delivery Events

### Status

### Timestamp

### Agent Delivery Events

### Status

### Timestamp

### Intermediary Delivery Events

### Status

### Timestamp

### Certified Delivery Events

### Status

### Timestamp

### Carbon Copy Events

### Status

### Timestamp

### Witness Events

### Signature

### Timestamp

### Notary Events

### Signature

### Timestamp

### Envelope Summary Events

### Status

### Timestamps

Envelope Sent

Hashed/Encrypted

9/9/2021 10:50:36 AM

Certified Delivered

Security Checked

9/9/2021 10:54:45 AM

Signing Complete

Security Checked

9/9/2021 10:54:54 AM

Completed

Security Checked

9/9/2021 10:54:54 AM

### Payment Events

### Status

### Timestamps

**APPENDIX D: SCRIP PERMIT**



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**State Cultural Resources Investigation Permit (SCRIP) Application**Permit #: 2021-38**Alaska Department of Natural Resources, Office of History and Archaeology**

550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565

Questions about State Permits should be directed to the State Archaeologist either by email at oha.permits@alaska.gov or by phone at (907) 269-8728.

A. Applicant Section (refer to instructions before completing form)	
1. Applicant: <u>Robert Meinhardt MA</u>	2. Date Submitted: <u>8/6/21</u>
3. Institutional Affiliation: <u>True North Sustainable Development Solutions, LLC (TNSDS)</u>	
4. Contracting Agency: <u>Municipality of Anchorage, Planning Dept.</u>	
5. Project Name: <u>Girdwood Historic and Cultural Resources Survey Study</u>	
6. Brief Description of Project Area: <u>Girdwood Avalanche Office, USS 3042, LT 7; MOA Parcel ID 07513231000</u>	
7. Contact Information: <u>Meinhardt 907-841-4096</u>	
8. Dates of Proposed Work: <u>August 9 to October 30, 2021</u>	9. USGS Map Sheet(s): <u>Seward D-6</u>
10. MTRS: (ex. S021N005W): <u>S10N02E Sec 19</u>	11. Acres to be Investigated: <u>~4</u>
12. Permit Type: <u>Survey</u> If other, please specify: <u>Documentation</u>	
<p><b>Note:</b> A Curation Agreement is Required for all Survey with Testing; collection Prohibited Unless; a) the repository is approved by OHA, and b) a Provisional Curation Request or a letter signed by the accepting repository is attached.</p>	13. Proposed Artifact Repository: _____
	14. Curation Agreement Attached: _____
<p>The following items must be attached to the permit application:</p> <p>(1) <b>Research Design:</b> The length and complexity of the research design should be a suitable match for the scope of the project. For example, small reconnaissance surveys of a confined space may require no more than a few paragraphs whereas large data recovery projects may require many pages.</p> <p>(2) <b>Purpose and Character of Proposed Work:</b> For example, is the work being undertaken to fulfill Section 106 responsibilities? Academic research?</p> <p>(3) <b>Location of Work:</b> Attach a 1:63,360 USGS (ITM or "inch to mile") map that depicts the location(s) or area(s) of the proposed work. Project (i.e., "engineering") maps are desirable but should be supplemented by an ITM map. Substitutes (such as military maps) are acceptable only if ITMs are not available.</p> <p>(4) <b>AHRS Cultural Resources:</b> List all known AHRS Sites that will be subject to investigation under the permit.</p> <p>(5) <b>Copy of Land Use Permit from Land Manager Agency:</b> (UA, MHTLO, ADF&amp;G, etc)</p>	
<p><b>Applicant Signatures:</b> By signing this document, the applicant confirms that they have read and agreed to comply with the provisions AS 41.35.080 and 11 AAC 16.020 - 16.090., as well as the instructions and stipulations for the Alaska SCRIP.</p>	
15. Signature of Applicant: _____	16. Date: <u>8/6/2021</u>
18. Signature of Field Supervisor: _____	19. Date: <u>8/6/2021</u>
B. Agency Land Manager Authorization	
1. Signature of Land Manager: _____	2. Date: <u>8.10.21</u>
3. Signature of Land Manager: _____	3. Date: _____
C. Office of History and Archaeology Authorization	
1. Signature of DPOR Director: <u>Judith Bittner</u>	2. Date: <u>8/11/21</u>
3. Expiration Date of Permit: <u>12/31/2021</u>	

Reset Form

Version: April 2018

**APPENDIX E: AHRIS SITE CARDS**



**Alaska Heritage Resources Survey Site Form**

Date Received: 11/30/2021

Alaska Department of Natural Resources, Office of History and Archaeology  
 550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565  
 Phone: (907) 269-8718; Fax (907) 269-8908  
<http://www.dnr.state.ak.us/parks/ohia/index.htm>

1. **Type of Form:** New
2. **AHRS Number:** SEW-01753
3. **Site Name:** Girdwood Bluff Site 01
4. **Description:** The Girdwood Bluff Site 01 is located on State of Alaska Parcel 0751323100, located west of the Alyeska Highway, abutting the USFS Glacier Ranger District Office (US Survey 3042 LT 73 TR NEG). The site is situated on a natural bluff that overlooks the DOT&PF buildings and comprises of a 0.74-acre area. The site contains at least two surface depressions and a wagon trail segment that runs east to west across the bluff. More surface depressions are present but were covered by cleared brush piles at the time of documentation. Surface Depression 01 was designated as the first surface depression, located south of the wagon trail, it measured 1m wide and 1.7m long. Surface Depression 02 is a larger surface depression located south of the wagon trail along the bluff, it measured 1.8m wide and 4.3m long with a depth of 30cm. A wood frame is located immediately east of the surface depression and measured .67m wide and 1.9m long. There is potential for additional surface depressions on the north side of the wagon trail as well however the combination of soft topsoil and uprooted trees made any man-made surface depression unidentifiable from the numerous natural ones in this area. The wagon trail fluctuates from 8 to 12 feet wide and follows the natural bluff line for approximately 200 feet before curving to the north for another 20 to 40 feet before disappearing from trace. The site boundaries include the full length of the visible wagon trail as well as overlap to the south and north for surface depression features near the wagon trail.
5. **Cultural Significance:** The Girdwood Bluff Site 01 is culturally significant for its potential for archaeological information and could provide greater understanding and insight to the historic and/or prehistoric context of the Girdwood Valley and historic uses of the land.
6. **Associations:** [Click or tap here to enter text.](#)
7. **Location Information:** S10N022E Sec 19 - GPS Coordinates (NAD83) 60.944602, -149.172464
8. **Location Reliability:** Location Exact and Site Existence Verified (1)
9. **AHRS Resource Nature:** Site
10. **Resource Nature Subtype:** Default Site
11. **Resource Keywords:** Historic trail, surface depressions
12. **Site Area (Acres):** .74 Acres
13. **Period Codes:** Historic [Choose an item.](#) [Choose an item.](#)
14. **Associated Dates:** [Click or tap here to enter text.](#)
15. **Cultures:** [Click or tap here to enter text.](#)
16. **Prehistoric/Historic Function:** [Click or tap here to enter text.](#)
17. **Current Function:** [Click or tap here to enter text.](#)
18. **Condition Code:** Disturbed site, degree unknown or Modified building degree unknown (B)
19. **Destruct Codes:** [Choose an item.](#) [Choose an item.](#) [Choose an item.](#)
20. **Destruct Year:** [Click or tap here to enter text.](#)

Page 1 of 5

**Alaska Heritage Resources Survey Site Form**

Date Received: 11/30/2021

Alaska Department of Natural Resources, Office of History and Archaeology  
550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565

Phone: (907) 269-8718; Fax (907) 269-8908

<http://www.dnr.state.ak.us/parks/bia/index.htm>

21. Owner Info: State of Alaska

22. Source Reliability: Professional Reports, Records, and Field Studies (A)

23. Form Author: TNSDS/Joan Burgett

24. Date Completed: 11/22/2021

25. Record Status: Complete

26. Other Number(s): [Click or tap here to enter text.](#)

27. Artifact Repository: [Click or tap here to enter text.](#)

28. Attachments (File Name): [Click or tap here to enter text.](#)



**Alaska Heritage Resources Survey Site Form**

Date Received: 11/30/2021

Alaska Department of Natural Resources, Office of History and Archaeology  
550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565

Phone: (907) 269-8718; Fax: (907) 269-8908

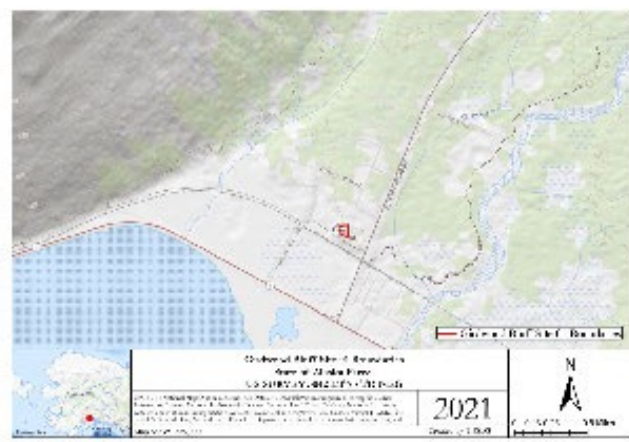
<http://www.dnr.state.ak.us/parks/ohar/index.htm>29. Location Information (Decimal Degrees, NAD 83 Datum):

Latitude: 60.944602 Longitude: -149.172464

30. Attach a portion of appropriate Aerial Photograph and U.S.G.S Quad Map or detailed sketch map showing the location of the site relative to surrounding natural landforms, water bodies and/or city or town landmarks. (Either include it in the space provided or attach in a separate file).



Caption: Aerial Imagery of Girdwood Bluff Site 02, Map Scale 1:3,000



Caption: Topographic Map of Girdwood Bluff Site 01, Map Scale 1:25,000

**Alaska Heritage Resources Survey Site Form**

Date Received: 11/30/2021

Alaska Department of Natural Resources, Office of History and Archaeology  
550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565

Phone: (907) 269-8718; Fax (907) 269-8908

<http://www.dnr.state.ak.us/parks/bia/index.htm>31. Summary Artifact Tables (Insert table that notes artifact type, material, count, and any notes, including associated date ranges, if appropriate). Replace representative table if appropriate.

Artifact Type	Artifact Material	Number of Artifacts	Notes



**Alaska Heritage Resources Survey Site Form**

Date Received: 11/30/2021

Alaska Department of Natural Resources, Office of History and Archaeology  
550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565

Phone: (907) 269-8718; Fax: (907) 269-8908

<http://www.dnr.state.ak.us/parks/bia/index.htm>

32. Representative Site Photos (Caption photos, note direction taken, add as many as necessary)



Caption: Trail following the bluff line, running east-west, view facing west

Caption: Large surface



depressions with flags, view facing east.

**Alaska Heritage Resources Survey Site Form**

Date Received: 11/30/2021

Alaska Department of Natural Resources, Office of History and Archaeology  
 550 W. 7th Ave., Suite 1310 Anchorage, AK 99501-3565  
 Phone: (907) 269-8718; Fax (907) 269-8908  
<http://www.dnr.state.ak.us/parks/ohia/index.htm>

1. **Type of Form:** New
2. **AHRS Number:** SEW-01754
3. **Site Name:** Girdwood Bluff Site 02
4. **Description:** The Girdwood Bluff Site 02 is located on HLB Parcel 07513230 located east of the Alyeska Highway and north of the Alaska Railroad (US Survey 3042 LYT 72). The site is located on a small natural bluff that overlooks the railroad tracks to the south and bordered by the powerline path to the north. This is a small site, designated within an 0.14-acre area and contains two circular surface depressions located near the bluff's edge. Surface Depression 01 was designated as the surface depression located north and Surface Depression 02 was designated as the surface depression south, closest to the bluff. Surface Depression 01 measured 1.2m wide and 1.55m long with a 20cm depth and contained six small white spruce trees growing within the middle. Two trees separate the surface depressions. Surface Depression 02 measured 1.55m wide and 1.55m long with a 30cm depth and four small white spruce trees growing from within. To the north of the surface depressions is an abandoned vehicle, possibly 1940-50s chevy coup, and metal debris. Located between the circular surface depressions and the abandoned vehicle is a square surface depression, likely a recent archaeological test unit. The Girdwood Bluff Site 02 is surrounded by segments of the Iditarod National Historic Trail.
5. **Cultural Significance:** The Girdwood Bluff Site 02 is culturally significant for the potential for archaeological information and could provide greater understanding and insight to the historic and/or prehistoric context of the Girdwood Valley and the historic uses of the land.
6. **Associations:** [Click or tap here to enter text.](#)
7. **Location Information:** S10N022E Sec 19 - GPS Coordinates (NAD) 83 60.943577, -149.170084
8. **Location Reliability:** Location Exact and Site Existence Verified (1)
9. **AHRS Resource Nature:** Site
10. **Resource Nature Subtype:** Default Site
11. **Resource Keywords:** Surface depressions
12. **Site Area (Acres):** 0.14 Acres
13. **Period Codes:** Historic [Choose an item.](#) [Choose an item.](#)
14. **Associated Dates:** [Click or tap here to enter text.](#)
15. **Cultures:** [Click or tap here to enter text.](#)
16. **Prehistoric/Historic Function:** [Click or tap here to enter text.](#)
17. **Current Function:** [Click or tap here to enter text.](#)
18. **Condition Code:** Disturbed site, degree unknown or Modified building degree unknown (B)
19. **Destruct Codes:** [Choose an item.](#) [Choose an item.](#) [Choose an item.](#)
20. **Destruct Year:** [Click or tap here to enter text.](#)
21. **Owner Info:** Municipality of Anchorage Heritage Land Bank

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**Alaska Heritage Resources Survey Site Form**

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22. **Source Reliability:** Professional Reports, Records, and Field Studies (A)

23. **Form Author:** TNSDS/Joan Burgett

24. **Date Completed:** 11/22/2021

25. **Record Status:** Complete

26. **Other Number(s):** [Click or tap here to enter text.](#)

27. **Artifact Repository:** [Click or tap here to enter text.](#)

28. **Attachments (File Name):** [Click or tap here to enter text.](#)

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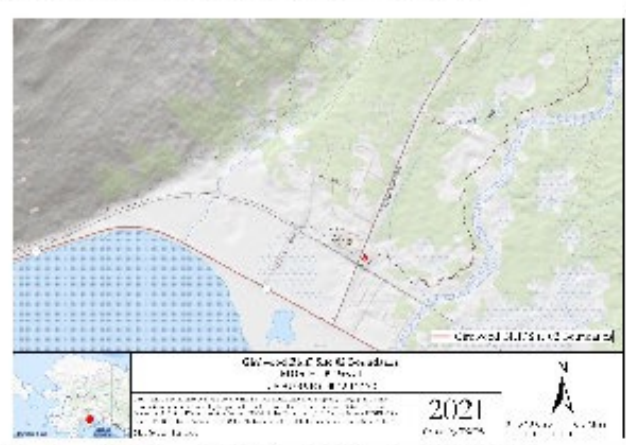
Phone: (907) 269-8718; Fax (907) 269-8908

<http://www.dnr.state.ak.us/parks/bia/index.htm>29. Location Information (Decimal Degrees, NAD 83 Datum):

Latitude: 60.943577 Longitude: 149.170084

30. Attach a portion of appropriate Aerial Photograph and U.S.G.S Quad Map or detailed sketch map showing the location of the site relative to surrounding natural landforms, water bodies and/or city or town landmarks. (Either include it in the space provided or attach in a separate file).

Caption: Aerial Imagery of Girdwood Bluff Site 02, Map Scale 1:3,000



Caption: Topographic Map of Girdwood Bluff Site 02, Map Scale 1:25,000



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<http://www.dnr.state.ak.us/parks/bia/index.htm>31. Summary Artifact Tables (Insert table that notes artifact type, material, count, and any notes, including associated date ranges, if appropriate). Replace representative table if appropriate.

Artifact Type	Artifact Material	Number of Artifacts	Notes

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Artifact Type	Artifact Material	Number of Artifacts	Notes



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32. Representative Site Photos (Caption photos, note direction taken, add as many as necessary)



Caption: Two surface depressions along bluff's edge, view facing west



Caption: Abandoned vehicle and associated debris, view facing northwest.

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