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2025 Dry Weather Screening Report
APDES Permit No. AKS052558

FINAL REPORT

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MUNICIPALITY OF ANCHORAGE

WATERSHED MANAGEMENT SERVICES

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WATERSHED MANAGEMENT

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Table of Contents

Table of Contents i
1.0 Introduction 1
1.1 Background 1
1.2 Problem Definition 1
1.3 Screening Program 1
2.0 Project Summary 2
2.1 Outfall Evaluation and Prioritization 2
2.2 Screening Locations 3
2.3 Screening Parameters 8
2.4 Monitoring Procedures 8
2.4.1 Field Preparation 9
2.4.2 Monitoring Activities 11
2.4.3 Follow-Up Activities 12
2.5 Chain of Custody Records 12
2.6 Laboratory Sampling Procedures 12
3.0 Results 12
3.1 Screening Results 12
3.2 Quality Assurance and Quality Control 14
3.3 Data Validation 14
4.0 Discussion 15
4.1 Threshold Exceedances ..... **Error! Bookmark not defined.**
4.1.1 Follow Up Investigation ..... **Error! Bookmark not defined.**
5.0 References 16

Tables

Table 1. Outfalls Investigated During 2025 DWS Program 4
Table 2. Sampling Methods, Reporting Ranges, and Thresholds for Measured Parameters 8
Table 3. Sample Results for Field Parameters and Laboratory Analyses 13
Table 4. Comparison of Replicate Samples to Primary Samples 15

Figures

Figure 1. Monthly Precipitation in Anchorage, Summer 2025 9
Figure 2. Daily Precipitation in Anchorage, Summer 2025 10

Appendices

Appendix A Outfall Prioritization Results

Appendix B Watershed Maps

Appendix C Field Data Forms

Appendix D Outfall Sampling Photographs

Appendix E Laboratory Analysis Reports

Introduction

Background

The U.S. Environmental Protection Agency (EPA) issued the Municipality of Anchorage (MOA) and the Alaska Department of Transportation and Public Facilities (DOT&PF) a Municipal Separate Storm Sewer System (MS4) permit under the National Pollutant Discharge Elimination System (NPDES) in 1999. To meet the requirements of the permit, the MOA Watershed Management Services (WMS) initiated a Dry Weather Screening (DWS) program to identify potential illicit discharges to the MS4. This program was conducted during the dry season (typically May through mid-July) each year through 2009.

The EPA re-issued the permit in 2009 prior to the State of Alaska receiving primacy to operate the NPDES program. The re-issued permit became effective February 1, 2010, under the administration of the Alaska Department of Environmental Conservation (ADEC) as an Alaska Pollutant Discharge Elimination System (APDES) MS4 permit. ADEC reissued APDES Permit No. AKS052558, with revisions, on August 1, 2015, and August 1, 2020. Although the current permit was originally set to expire on July 31, 2025, it is now administratively extended and remains in effect until ADEC finalizes the next reissuance.

The APDES MS4 permit continues the requirement of dry weather screening and subsequent follow-up actions to identify illicit discharges and associated pollutants to the MS4. The 2025 program was completed in accordance with the *2021 Monitoring, Evaluation, and Quality Assurance Plan* (QAP; MOA 2021a).

Problem Definition

Section 3.5 of the MS4 permit requires that the MOA implement an illicit discharge management program to reduce the unauthorized and illegal discharge of pollutants to the MS4. An illicit discharge is defined as any discharge to a MS4 that is not entirely composed of stormwater.[1] Illicit discharges, such as those from industrial process wastewater, domestic wastewater, car wash water, and other sources, can inadvertently introduce pollutants both directly and indirectly to the storm sewer system. Flow from storm drain outfalls during dry weather is generally an indicator of illicit discharges to the MS4.

Screening Program

Dry weather screening is conducted to identify and eliminate illicit discharges to the MS4 within the MOA. To identify potential illicit discharges, approved field screening and laboratory testing methods are used to identify pollutant concentrations of known parameters typically found in the illicit discharges described in Section 1.2. Guidance on illicit discharge screening identifies a list of 15 indicator parameters that can be used to confirm the presence of illicit discharges, noting

[1] Excepting any discharges authorized under a NPDES permit and discharges resulting from fire-fighting activities (40 Code of Federal Regulations [CFR] §122.26(b)(2)).

that generally only three to five of these parameters need to be used to characterize the discharge for subsequent identification and elimination of the discharge (CWP and Pitt 2004).

Section 3.5.4 of the MS4 permit establishes minimum requirements for the DWS program. The QAP for the MS4 permit monitoring programs includes the full *DWS Monitoring Plan*. The QAP, including the DWS program methodology, was updated in 2021 to comply with the re-issued permit (MOA 2021a).

The MS4 permit requires the MOA to survey a minimum of 30 outfalls a year for illicit discharges. Surveyed outfalls must be geographically dispersed and represent all major land uses within the municipality. Monitoring of the following seven parameters must be conducted at outfalls where illicit discharges are suspected: pH; total chlorine; detergents; total copper; phenols; fecal coliform bacteria; and turbidity. Benchmark or threshold exceedances are used to trigger MOA investigative action and provide information to support that action.

Project Summary

Outfall Evaluation and Prioritization

The QAP requires that outfalls from the MS4 be evaluated and scored for monitoring under the DWS program at the beginning of the 5-year permit cycle. The QAP contains the full methodology for evaluating and prioritizing outfalls (MOA 2021a).

Before beginning field activities, HDR Engineering, Inc. (HDR) evaluated outfalls for suitability for inclusion in the DWS program in a geographic information system (GIS) using the MOA hydrography geodatabase (HGDB; MOA 2021b) and field observations on outfall condition and location made during previous years' monitoring programs. GIS evaluation consisted of reviewing the outfalls and drainageway network within each subbasin of the MS4 as mapped within the HGDB. Outfalls were considered not suitable for monitoring under the DWS program if the subbasin is not drained by closed conveyances that are part of the MS4 infrastructure owned and maintained by MOA and/or DOT&PF (i.e., the subbasin is drained only by open conveyances such as drainage ditches or surface runoff or the HGDB does not show a mapped network of closed conveyances within the subbasin); if a segment of piped stream is co-routed with the MS4 through the subbasin; or if the outfall is located below a road or other infrastructure. Review of previous years' field observations identified additional outfalls that were excluded from the DWS program for reasons, including access constraints (private property, safety considerations), damage to the outfall that prevents monitoring or sampling, significant backwater flow into the outfall, the outfall is partially or fully submerged within a creek or waterbody, or inability to locate the outfall.

Once outfalls suitable for inclusion in the DWS program were identified, HDR scored and prioritized them for monitoring. Outfalls were given a numerical score based on factors that may contribute to the likelihood of illicit discharges within the outfall's contributing area (i.e., subbasin). The following datasets were used in GIS to score the outfalls according to the procedures in the QAP:

- 2021 HGDB (MOA 2021b)
- MOA zoning designations mapping (MOA 2021c)
- Urban impervious surface mapping from the National Land Cover Database (MRLC 2016)
- Previous threshold exceedances documented under the DWS program (MOA 2016b, 2017, 2018, 2019, 2020, 2021d, 2022, 2023, 2024)
- Previous reports to 2021 of illicit discharge investigated by WMS (MOA 2021e)[2]
- Alaska 303(d) Impaired Waters List (ADEC 2020)

HDR evaluated all 935 outfalls mapped in the HGDB for inclusion in the DWS program and determined 331 outfalls were suitable for monitoring under the DWS program and 7 would require field reconnaissance to confirm suitability for inclusion. An additional 14 outfalls that are not mapped in the HGDB but have been identified through GIS evaluation or field reconnaissance are also included. These 352 outfalls were scored and prioritized for the 5-year permit cycle. The results of the outfall prioritization are included in Appendix A.

For the 2025 program, additional datasets were used in GIS to update the previous prioritization.

- 2024 HGDB (MOA 2024a)

Screening Locations

In 2025, field crews surveyed 44 outfalls but were unable to access or locate 14 targeted outfalls. Of the 14 inaccessible outfalls, four were submerged, three required permissions to access, and the remaining seven were unlocatable. An additional 14 outfalls were investigated as replacements for the original targets. The investigated outfalls are listed in Table 1 and shown on the maps included in Appendix B.

[2] Duplicate records or reports where no enforcement action or violation was substantiated were not included.

Table 1. Outfalls Investigated During 2025 DWS Program

Outfall Code	Latitude	Longitude	Prioritization Score	Location Description	Condition	Water flowing?
Campbell Creek						
207-3	- 149.7338911	61.2090931	16	Accessible from E 56th Ave.	Good condition; Metal with collar; Iron oxidizing bacteria found in stream and outfall.	Yes
1454-2	- 149.8769499	61.1628173	19	Accessible from Lynwood Dr.	Good condition; Metal with collar and grate; Moss and algae growth found along collar.	Yes
1466-1	- 149.8645084	61.1517994	9	Accessible from Old Seward Hwy and E 76th Ave.	Good condition; Cement outfall built into wall.	No
579-1	- 149.8721530	61.1713421	17	Accessible from Fairbanks St.	Good condition; Metal; Appears to be another pipe inside pf this outfall; Surrounded by vegetation.	No
651-1	- 149.9155330	61.1424281	24	Accessible from Greenhill Wy.	Excellent condition; Bottom of culvert above stream substrates around 12 inches.	No
475-1	- 149.8582871	61.1484580	13	Accessible from E 80th Ave.	Metal with metal collar; Organic debris buildup on collar.	No
105-1	- 149.8676281	61.1724303	18	Accessible from Old Seward Hwy.	Good condition; Significant pollen buildup; Natural sheen from muck. Outfall grate partially blocked from trash and leaf litter.	Yes
Chester Creek						
489-357	- 149.8866846	61.2034219	25	Accessible from C St and W 20th Ave.	Good condition; Concrete with concrete collar.	Yes
554-2	- 149.7817704	61.1932063	16	Accessible from E 30th Ave.	Good condition; Concrete; Large rocks in outfall.	Yes
3-1	- 149.7263721	61.2083325	14	Accessible from Northview Dr.	Good; Metal with collar and grate; Surface scum from pollen residues found from nearby willows.	No

Outfall Code	Latitude	Longitude	Prioritization Score	Location Description	Condition	Water flowing?
86-1	- 149.8685028	61.2015782	14	Accessible from Seward Hwy.	Good condition; Concrete; Metallic smell from nearby culvert; Rust stain found inside of outfall.	Yes
884-1	- 149.7395039	61.2073553	11	Accessible from Creekside Center DR.	Good condition; Plastic HDPE with collar; Organic leaf buildup in collar; Metal grate compromised.	No
4-1	- 149.8051484	61.1848475	16	Accessible from Elmore Rd.	Excellent condition; Metal Standing water from University Lake.	No
1449-1	- 149.7402269	61.2071449	11	Accessible from Creekside Center Dr.	Good condition; HDPE with collar. Surface scum of organic matter found in collar. Debris and trash found in collar. Maintenance required.	No
654-1	- 149.8877860	61.2034656	23	Accessible from C St.	Good condition; Metal with metal collar.	Yes
Eagle River						
1335-1	- 149.5422549	61.2996157	18	Accessible from E Eagle River Loop Rd.	Good condition; CMP in concrete headwall with grate.	Yes
1375-1	- 149.5704775	61.3150488	10	Accessible from Eagle River Rd.	HDPE with grate and thaw pipe; Leaf litter found in grate.	No

Outfall Code	Latitude	Longitude	Prioritization Score	Location Description	Condition	Water flowing?
1451-1	- 149.5085361	61.2996488	10	Accessible from Riverside Dr.	Good condition; Plastic with collar and grate; Minor leaf and trash buildup in pipe.	Yes
Fish Creek						
388-197	- 149.9283392	61.1786468	21	Accessible from Northwood Dr.	Good condition; HDPE with metal collar. Heavy algae growth on substrate outside of outfall. Heavy pollen on surface.	Yes
682-1	- 149.9283778	61.1958622	21	Accessible from Lahonda Dr.	Excellent condition; Concrete; Mud substrate backed up into culvert; Trash found in front of outfall.	No
1287-994	- 149.9250299	61.1933594	24	Accessible from Willow St.	Fair condition: Collar corroded; Flow too low to sample; Rust and algae on substrate; Significant leaf litter buildup.	Yes
1278-1	- 149.9424898	61.1799007	13	Accessible from Wisconsin St.	Good condition; Metal with collar.	No
573-48	- 149.8386215	61.1826381	15	Accessible from E 42nd Ave.	Good condition; Plastic; Iron oxidizing bacteria in stream and outfall; Newly constructed outfall and banks.	Yes
Furrow Creek						
1345-1	- 149.8710227	61.1085466	7	Accessible from Clipper Ship Ct.	Good condition; Plastic with plastic collar; Gravel in culvert.	Yes
306-1	- 149.8643730	61.1081359	10	Accessible from Old Seward Hwy.	Good condition; Metal; Trash debris found at base of outfall.	Yes
Hood Creek						
609-218	- 149.9593493	61.1976839	12	Accessible from Clay Products Dr.	Good condition; Plastic with grate and collar; Densely covered by vegetation.	Yes

Outfall Code	Latitude	Longitude	Prioritization Score	Location Description	Condition	Water flowing?
502-16	- 149.9503348	61.2024581	7	Accessible from W Marston Dr.	Excellent condition; Plastic culvert, ~4 inch perch.	Yes
Rabbit Creek						
745-86	- 149.8140262	61.0958464	16	Accessible from Matthews Dr.	Good condition; HDPE with collar.	No
Ship Creek						
396-1	- 149.8849273	61.2237363	19	Accessible from N. A St.	Metals; Double grated; Absorbent bags found in outfall.	Yes
571-1	- 149.9087149	61.2179312	19	Accessible from W 5th Ave.	Good condition; Metal; Sediment buildup in pipe; 2 ft boulder inside pipe.	Yes

Note: Dr. = Drive; Cir. = Circle; Rd. = Road; Ln. = Lane; St. = Street; Ave. = Avenue; Pl. = Place; Blvd. = Boulevard; CMP = corrugated metal pipe; EOP = end of pipe; GW = groundwater; HDPE = High-density polyethylene; DS = downstream

Screening Parameters

Table 2 lists the screening parameters required by the permit and the sampling methods, reporting ranges, and the program thresholds for each parameter. Appendix E, *DWS Monitoring Plan*, of the QAP (MOA 2021a) provides rationale for screening parameter thresholds. The thresholds for all parameters were maintained from the previous MS4 permit cycle (MOA 2016b). Thresholds are established at concentrations measurably distinct from authorized discharges to detect potential illicit discharges. In a guidance manual, the Center for Watershed Protection and Robert Pitt (2004) recommend benchmarks (thresholds) orders of magnitude higher than ambient stormwater quality to reduce the incidences of false positives. Thresholds in Table 2 were established based on available environmental data and field test kit specifications. Values below the threshold are considered to be within an acceptable range for background concentrations. Values at or above the threshold concentration for a parameter indicate that the parameter may be above background concentrations. Outfalls with results that exceeded the threshold (or are outside the pH range) for one or more of the pollutant indicators are targeted for follow-up action.

Table 2. Sampling Methods, Reporting Ranges, and Thresholds for Measured Parameters

Parameter	Method	Sensitivity	Reporting Range	Threshold
Turbidity	Hach 2100P Turbidimeter, EPA method 180.1 Rev 2.0	0.01 for 0 - 9.99 NTU 0.1 for 1 - 10 NTU 1 for 100 - 1000 NTU	0.1 - 1,000 NTU	≥ 250 NTU
Fecal Coliform	SM 9222D	1 cfu/100 mL	1 cfu/100 mL – too numerous to count	≥ 400 cfu/100 mL
Hach Stormwater Test Kit, Model SW-1 #2481300				
pH	Hach Pocket Pro pH Tester, ion selective electrode, EPA method 150.2	0.1 units	0 - 14 STD	≤ 4 or ≥ 9 STD
Total Chlorine	Hach Method 8167[a], DPD/Color Disc, SM 4500-Cl G	0.1 mg/L	0.1 – 3.4 mg/L	≥ 1.0 mg/L
Detergents	Hach Model DE-2, Toluidine Blue-O Chloroform Colormetric (Analytical Chemistry #38-791)	0.05 mg/L	0.05 – 1.2 mg/L	≥ 1.0 mg/L
Total Copper	Hach Methods 8506 and 8026[a], Bicinchoninate/Color Disc, SM 3500-Cu C or E	0.1 mg/L	0.1 – 4.0 mg/L	≥ 1.0 mg/L
Total Phenols	Hach Method 8047[a]: 4-Aminoantipyrine/Color Disc, EPA method 420.1	0.1 mg/L	0.1 - 5 mg/L	≥ 0.5 mg/L

Notes: NTU = nephelometric turbidity; SM = Standard Method; cfu = colony forming unit; mL = milliliters; STD = standard units; mg/L = milligrams per liter

[a] Test kit uses equivalent or adapted method.

Monitoring Procedures

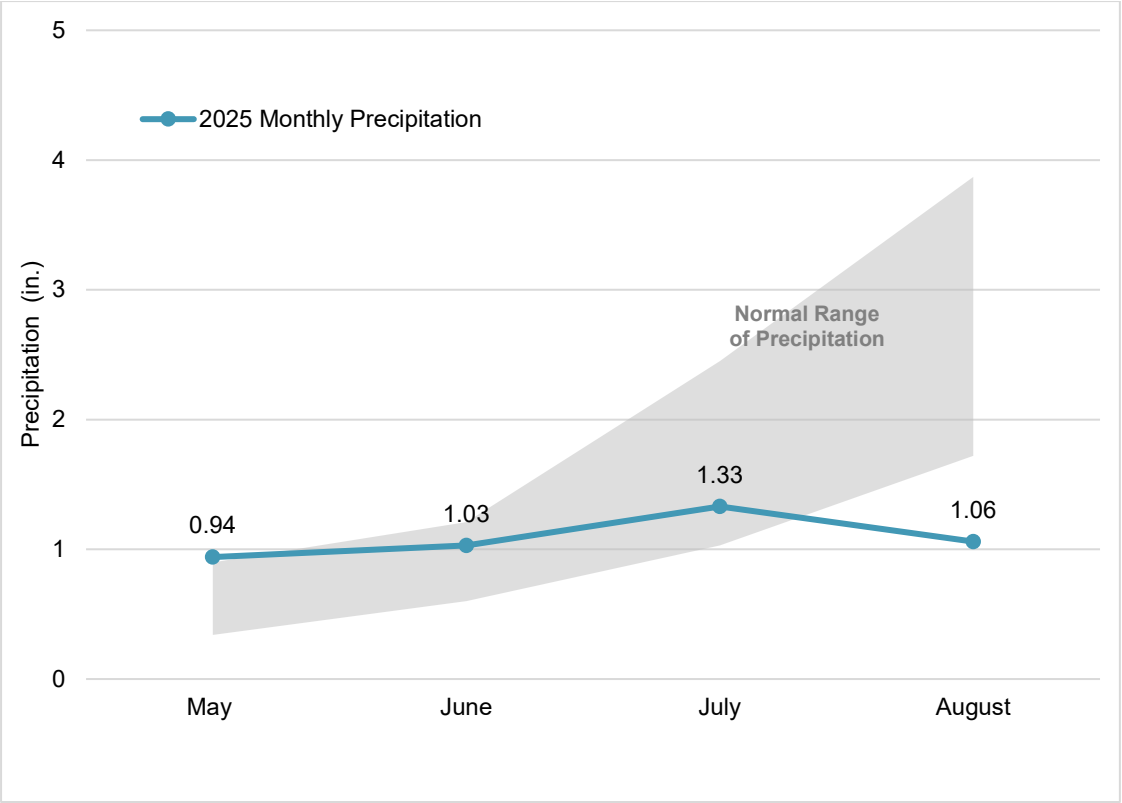
HDR conducted monitoring in accordance with the monitoring procedures and methodology outlined in the QAP.

Field Preparation

The MS4 permit stipulates that dry weather screening should be conducted between June 1 and August 30 of each year, following at least 48 hours of dry weather after any storm event that created runoff in the MS4.[3] Precipitation levels in the Anchorage area during May, June, and July 2025 remained near historical norms, with a slight upward trend observed as summer progressed (Figure 1).

HDR conducted monitoring on five separate days across June and July, consulting recent precipitation recorded by the National Weather Service at the Ted Stevens Anchorage International Airport to determine appropriate monitoring timing, when necessary (NWS 2025a). All sampling events occurred prior to the slight increase in precipitation in late July. Figure 2 shows the daily precipitation and 48 hour running total precipitation for summer 2025. The dates when sampling occurred are indicated by the black arrows.

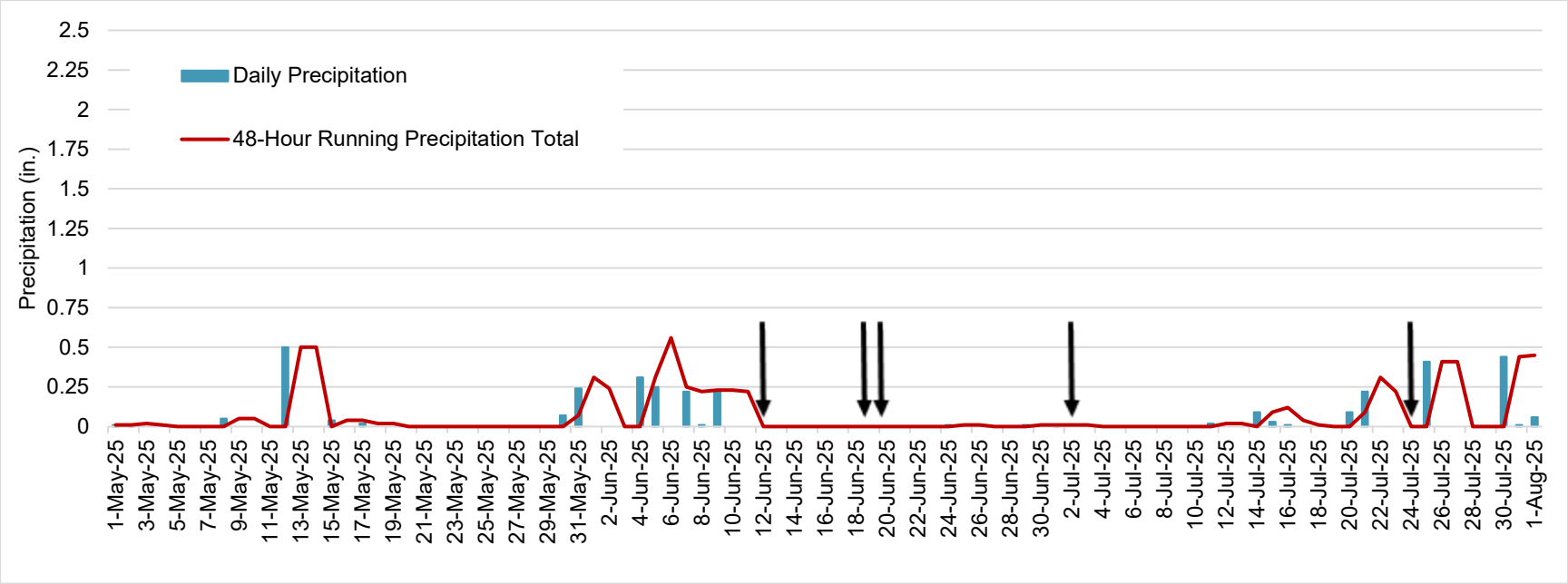
Figure 1. Monthly Precipitation in Anchorage, Summer 2025



Notes: 2025 monthly precipitation data recorded at Ted Stevens International Airport. Source: NWS 2025b. Normal range of precipitation shown is the range between the 25th and 75th percentiles of monthly precipitation averages recorded at the Ted Stevens International Airport for the 30-year period from 1991 to 2020. Source: NOAA 2021.

[3] Precipitation greater than 0.1 inches typically generates runoff.

Figure 2. Daily Precipitation in Anchorage, Summer 2025



Notes: Daily precipitation data recorded at Ted Stevens International Airport. Source: NWS 2025c.
Black arrows indicate monitoring dates.

The field team conducted calibration and equipment blank analyses at the beginning of each day of sampling prior to entering the field. This equipment blank analysis examined each test kit by testing deionized water. The calibration and field test kit equipment blank data were recorded on the field data forms and are provided in Appendix C.

Each day before departing for field sampling the field team conducted a safety briefing. The team took the following items into the field:

- List of targeted outfalls
- Global positioning system (GPS)-enabled iPad loaded with HGDB and aerial imagery
- Field forms with guidelines
- Water quality analysis protocols (included in the QAP)
- Field sampling supplies
- Personal protective equipment
- Hach Pocket Pro pH tester
- pH test strips
- Hach water quality field test kits
- Laboratory-supplied fecal coliform bottles
- Hach turbidimeter
- Job Hazard Analysis and Travel Safety Forms

Monitoring Activities

Monitoring activities conducted at each outfall consisted of recording visual observations about the condition of the outfall and the discharging water (if flowing), taking photographs of the outfall, and measuring or qualitatively describing the flow of the discharging water. Observations were recorded on field data forms.

At outfalls that were flowing during dry weather conditions, field crews considered previous observations of dry weather flow from the outfall, if any had been documented, to determine whether the observed flow was consistent with baseline conditions that may originate from groundwater infiltration. Based on the visual observations and flow analysis, the field crew determined whether the dry weather flow from the outfall was suspected to be an illicit discharge. When an illicit discharge was suspected, field crews collected a sample for laboratory analysis of fecal coliform and two grab samples to measure all other parameters using field test kits or water quality meters. Detailed sampling methodology, including instructions for the field test kits, is included in the QAP (MOA 2021a).

The sample bottle for laboratory analysis of fecal coliform and grab samples for field test kits were filled directly from the outfall flow. Samples were collected using clean sample bottles as required by the QAP. Field test kits were recorded as soon as possible after sample collection, and field measurements were recorded and compared against the thresholds described in Table 2.

The field team conducted replicate sample analyses at a rate of at least 15 percent per day per parameter (minimum of one per day). The field team also collected replicate samples for the laboratory analysis of fecal coliform at a rate of 15 percent per day (minimum of one per day).

Completed data sheets are included as Appendix C, and photographs of sampled outfalls are included as Appendix D.

Follow-Up Activities

The QAP outlines notification procedures and follow-up activities to be performed when a sample exceeds the program threshold for any parameter (MOA 2021a). As an additional measure, HDR provided results of the field measurements to the MOA WMS immediately following every sampling day. SGS North America Inc, Anchorage, an ADEC approved laboratory, provided results of the fecal coliform analysis to HDR as soon as the results were available (typically within 24 hours), and HDR provided these results to the MOA WMS.

Chain of Custody Records

The field team leader completed a chain-of-custody record, which included each fecal coliform sample collected during a single field day for sample tracking. The original form was delivered with the samples to SGS. Copies of the chain-of-custody records are included in the laboratory analysis reports provided in Appendix E.

Laboratory Sampling Procedures

The field team collected fecal coliform samples in laboratory-supplied sample bottles, clearly marking each with the project name, sample ID, and sample date and time on the sample bottle labels. Samples were stored in a cooler with gel ice and a temperature blank while in the field. The samples were delivered to SGS within 6 hours to satisfy the short hold time of the fecal coliform samples. Fecal coliform was analyzed using standard method (SM) 9222D.

SGS provided results of the laboratory analysis to HDR via email or telephone immediately after the analysis was complete (typically within 24 hours). The expedited turn-around time allows for expedited follow-up sampling in the event of an exceedance of the fecal coliform threshold. SGS provided a full report of the analysis within a week.

Results

Screening Results

In 2025, field crews screened a total of 30 outfalls. None of the outfalls exhibited signs of illicit discharge. As part of routine quality assurance, two outfalls were randomly selected for sampling, despite showing no indications of contamination. Analytical results from these samples are summarized in Table 3. Complete laboratory analysis reports are provided in Appendix E.

Table 3. Sample Results for Field Parameters and Laboratory Analyses

Watershed	Outfall ID	Date	Flow	pH	Total Chlorine (mg/L)	Detergents (mg/L)	Total Copper (mg/L)	Total Phenols (mg/L)	Turbidity (NTU)	Fecal Coliform (colonies/100mL)
Campbell Creek	105-1	6/12/2025	-	7.3	-	-	-	-	116	ND
	105-1 DUP	6/12/2025	-	-	-	-	-	-	-	ND
Hood Creek	502-1	6/12/2025	-	6.9	-	-	-	-	17.2	ND

Notes: mg/L = milligram per liter; NTU = nephelometric turbidity; mL = milliliters; R = replicate sample; DUP = Duplicate; TNTC = too numerous to count; ND = Analyte is not detected.

Quality Assurance and Quality Control

Field crews followed quality assurance and quality control (QA/QC) procedures according to the QAP (MOA 2021a). The procedures included analytical checks (field replicates, equipment blanks), instrument calibration, and procedures to assess data for precision, accuracy, representativeness, comparability, and completeness.

SGS is certified by the EPA and the Alaska Drinking Water Program and has an approved QA/QC program. Analytical methods and testing procedures were in adherence with the QAP (MOA 2021a) and standard methods (APHA 2005).

Data Validation

SGS conducted verification analyses for laboratory parameters. The data review was focused on criteria for the following QA/QC parameters and their overall effects on the data:

- Data validation
- Sample handling (chain of custody)
- Holding time compliance
- Field replicate comparison

Field crews collected samples from the water flowing from the end of pipe (EOP) at the outfall to avoid mixing with the stream water. Field analyses met the sensitivities prescribed in the QAP (MOA 2021a).

Field crews collected replicate samples at a rate of at least one per day or 15 percent to determine field precision and variability. For the field test kits, the QAP requires that the relative percent difference between primary and replicate samples be calculated. For the fecal coliform samples analyzed at the laboratory, the QAP requires that relative percent difference between the primary and replicate samples be within 60 percent. For turbidity, the QAP requires that the absolute difference between the primary and replicate samples be within 1 NTU. The variance between the primary and replicate samples is presented in Table 4. Additionally, the results of the primary and replicate samples need to be within the precision of the equipment used.

Table 4. Comparison of Replicate Samples to Primary Samples

Parameter		pH	Total Chlorine (mg/L)	Detergents (mg/L)	Total Copper (mg/L)	Total Phenols (mg/L)	Turbidity (NTU)	Fecal Coliform (colonies/100mL)
Units		**pH Units**	**%**	**%**	**%**	**%**	**NTU**	**%**
QAP standard		± 0.1	30%	30%	30%	30%	± 1 NTU	60%
Watershed	**Outfall ID**	**pH Units**	**%**	**%**	**%**	**%**	**NTU**	**%**
Campbell Creek	105-1	N/A	N/A	N/A	N/A	N/A	± 0.0	-

Note: **Bold** values indicate replicate variance that exceeds the QAP standard.
'NA' indicates that a replicate sample was not collected at the site.
'-' indicates that both the primary and replicate samples were below the method detection limit.
[a] Either the primary or replicate sample was not detected at or above the method detection limit.

In 2025, Campbell Creek outfall 105-1 was sampled for pH and turbidity. The primary sample results were below exceedance thresholds and were not flagged for follow-up action. Although no replicate samples were collected during the 2025 monitoring period, variability in pH and turbidity measurements may still occur due to the heterogeneous nature of flow from storm sewer outfalls.

Fecal coliform was not detected in either the primary or replicate samples collected at Campbell Creek outfall 105-1. As both results were non-detect, they met the QAP standards for allowable variation and did not trigger any follow-up action.

Sample custody was adequately maintained for the samples. The coolers transporting the fecal coliform samples were chilled with gel ice to maintain temperatures of less than 8 degrees Celsius (°C). The holding times were met for all samples.

Discussion

Under the 2025 Dry Weather Screening (DWS) program, field teams monitored a total of 30 outfalls. Of these, 18 were observed to be flowing during dry weather conditions, qualifying them for further evaluation. Ten targeted outfalls could not be accessed or located due to site constraints such as overgrowth, infrastructure changes, or safety concerns. Additionally, four outfalls were submerged in receiving waters, making dry weather screening infeasible. To maintain coverage, 14 alternate outfalls were investigated in place of the original targets.

Only two outfalls were randomly selected for sampling in 2025. This limited sampling effort reflects the low incidence of suspected illicit discharge. Random sampling is conducted primarily for quality assurance and to validate field observations. Given the consistent absence of contamination indicators in recent years, a reduced sampling footprint is considered appropriate and cost-effective.

The low number of suspected illicit discharges observed in 2025 aligns with a broader trend seen over the past several DWS cycles. This improvement is likely attributable to sustained public outreach efforts, increased awareness of stormwater pollution, and proactive

management by the Municipality of Anchorage. Educational campaigns, enforcement of proper waste disposal practices, and infrastructure upgrades have collectively contributed to a decline in illicit discharge occurrences.

As the program continues, the Municipality should remain committed to refining its monitoring strategy, maintaining compliance with MS4 permit requirements, and promoting community engagement to protect water quality across Anchorage.

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Appendix A

Outfall Prioritization

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Table A-1. Outfall Prioritization for the 2021-2025 APDES Permit Cycle

Watershed	Outfall ID	Subbasin ID	Total Score
Campbell Creek	1488-1	1007	29
Chester Creek	489-2	523	25
Chester Creek	489-357	523	25
Campbell Creek	651-1	817	24
Fish Creek	1287-994	775	24
Chester Creek	654-1	594	23
Chester Creek	179-1	475	22
Fish Creek	388-197	1178	21
Fish Creek	388-201	1178	21
Fish Creek	682-1	772	21
Chester Creek	295-56	575	20
Campbell Creek	1454-1	1449	19
Campbell Creek	1454-2	1449	19
Ship Creek	<Null>	1001	19
Ship Creek	1338-1	999	19
Ship Creek	396-1	1001	19
Ship Creek	571-1	999	19
Ship Creek	96-2	998	19
Campbell Creek	105-1	1221	18
Campbell Creek	556-1	830	18
Eagle River	1335-1	1294	18
Fish Creek	7-1	1023	18
Furrow Creek	292-192	675	18
Ship Creek	71-1	979	18
Campbell Creek	579-1	804	17
Eagle River	1383-1	1147	17
Campbell Creek	207-3	805	16
Chester Creek	2-2	130	16
Chester Creek	4-1	1251	16
Chester Creek	464-1	616	16
Chester Creek	554-2	527	16
Rabbit Creek	745-1	701	16
Rabbit Creek	745-86	701	16
Chester Creek	299-20	133	15
Chester Creek	299-22	133	15
Chester Creek	484-1	133	15
Fish Creek	573-156	788	15
Fish Creek	573-48	788	15
Ship Creek	550-2	961	15
Campbell Creek	111-2	835	14
Campbell Creek	17-1	1372	14

Watershed	Outfall ID	Subbasin ID	Total Score
Campbell Creek	463-1	886	14
Campbell Creek	548-1	863	14
Chester Creek	3-1	598	14
Chester Creek	86-1	549	14
Fish Creek	391-1	1031	14
Fish Creek	686-1	1024	14
Fish Creek	686-167	1024	14
Furrow Creek	34-26	916	14
Furrow Creek	34-54	916	14
Campbell Creek	1001-16	1333	13
Campbell Creek	1478-1	1195	13
Campbell Creek	1493-1	1382	13
Campbell Creek	475-1	349	13
Campbell Creek	485-1	828	13
Campbell Creek	485-98	828	13
Campbell Creek	593-1	821	13
Chester Creek	1298-275	489	13
Chester Creek	25-1	492	13
Chester Creek	296-1	495	13
Chester Creek	549-1	555	13
Chester Creek	552-105	619	13
Chester Creek	553-1	513	13
Chester Creek	577-1	515	13
Eagle River	541-1	1295	13
Fish Creek	1278-1	1269	13
Ship Creek	436-1	978	13
Campbell Creek	569-1	811	12
Campbell Creek	675-1	250	12
Chester Creek	103-1	568	12
Chester Creek	30-1	127	12
Hood Creek	609-218	1011	12
Ship Creek	1414-1	976	12
Ship Creek	245-1	989	12
Campbell Creek	100-1	1224	11
Campbell Creek	1479-1	1222	11
Campbell Creek	271-1	1317	11
Campbell Creek	44-1	1194	11
Campbell Creek	468-1	1318	11
Chester Creek	1449-1	1459	11
Chester Creek	568-1	479	11
Chester Creek	884-1	597	11
Fish Creek	1003-1	1044	11

Watershed	Outfall ID	Subbasin ID	Total Score
Campbell Creek	1014-41	1235	10
Campbell Creek	1056-8	1217	10
Campbell Creek	1339-1	826	10
Campbell Creek	1339-38	826	10
Campbell Creek	1438-2	862	10
Campbell Creek	1494-1	1386	10
Campbell Creek	175-1	1375	10
Campbell Creek	18-107	299	10
Campbell Creek	279-1	878	10
Campbell Creek	279-55	878	10
Campbell Creek	383-1	323	10
Campbell Creek	400-1	864	10
Campbell Creek	435-9	1444	10
Campbell Creek	490-1	890	10
Campbell Creek	490-93	890	10
Campbell Creek	490-95	890	10
Campbell Creek	585-1	870	10
Campbell Creek	608-39	779	10
Campbell Creek	656-31	290	10
Chester Creek	188-1	494	10
Chester Creek	318-1	562	10
Chester Creek	347-1	505	10
Chester Creek	482-1	173	10
Chester Creek	645-1	623	10
Chester Creek	678-1	541	10
Eagle River	<Null>	1439	10
Eagle River	1336-1	1142	10
Eagle River	1375-1	752	10
Eagle River	1417-1	1425	10
Eagle River	1451-1	1439	10
Eagle River	1482-1	1347	10
Eagle River	1483-1	1346	10
Fish Creek	27-1	767	10
Fish Creek	462-1	773	10
Furrow Creek	1343-2	1396	10
Furrow Creek	281-1	177	10
Furrow Creek	306-1	1111	10
Furrow Creek	348-1	1103	10
Furrow Creek	407-1	184	10
Furrow Creek	407-2	177	10
Furrow Creek	407-24	184	10
Ship Creek	119-1	962	10

Watershed	Outfall ID	Subbasin ID	Total Score
Ship Creek	46-1	1437	10
Ship Creek	47-1	972	10
Ship Creek	491-1	963	10
Campbell Creek	1348-1	1196	9
Campbell Creek	1466-1	460	9
Campbell Creek	1466-17	460	9
Campbell Creek	300-1	462	9
Chester Creek	236-1	590	9
Chester Creek	282-1	496	9
Chester Creek	282-3	496	9
Chester Creek	499-1	132	9
Chester Creek	499-17	132	9
Chester Creek	527-1	506	9
Fish Creek	411-8	733	9
Furrow Creek	5-1	1104	9
Ship Creek	81-73	960	9
Campbell Creek	1489-1	1371	8
Campbell Creek	317-1	376	8
Campbell Creek	447-64	322	8
Campbell Creek	62-1	255	8
Campbell Creek	701-4	389	8
Campbell Creek	10-1	799	7
Campbell Creek	<Null>	1314	7
Campbell Creek	112-1	1202	7
Campbell Creek	113-1	785	7
Campbell Creek	120-13	1040	7
Campbell Creek	120-22	1040	7
Campbell Creek	122-1	884	7
Campbell Creek	1347-1	1314	7
Campbell Creek	1349-1	1223	7
Campbell Creek	1351-1	1384	7
Campbell Creek	1352-1	1385	7
Campbell Creek	1352-14	1385	7
Campbell Creek	1367-1	1369	7
Campbell Creek	1367-26	1369	7
Campbell Creek	1410-1	1456	7
Campbell Creek	1441-1	1441	7
Campbell Creek	1464-1	1313	7
Campbell Creek	1467-1	1442	7
Campbell Creek	1490-1	1378	7
Campbell Creek	1495-1	838	7
Campbell Creek	190-1	288	7

Watershed	Outfall ID	Subbasin ID	Total Score
Campbell Creek	21-1	737	7
Campbell Creek	219-1	887	7
Campbell Creek	220-1	855	7
Campbell Creek	243-24	268	7
Campbell Creek	297-1	854	7
Campbell Creek	305-1	824	7
Campbell Creek	320-5	324	7
Campbell Creek	401-1	876	7
Campbell Creek	417-1	877	7
Campbell Creek	474-1	815	7
Campbell Creek	495-1	853	7
Campbell Creek	496-1	365	7
Campbell Creek	500-1	1367	7
Campbell Creek	500-6	1367	7
Campbell Creek	506-1	881	7
Campbell Creek	546-2	1200	7
Campbell Creek	565-1	1198	7
Campbell Creek	581-1	843	7
Campbell Creek	588-1	259	7
Campbell Creek	602-1	794	7
Campbell Creek	616-1	837	7
Campbell Creek	642-1	866	7
Campbell Creek	673-1	883	7
Campbell Creek	673-16	883	7
Campbell Creek	84-1	896	7
Chester Creek	117-1	564	7
Chester Creek	1267-251	1248	7
Chester Creek	258-1	131	7
Chester Creek	302-2	554	7
Chester Creek	314-23	219	7
Chester Creek	339-1	586	7
Chester Creek	376-1	612	7
Chester Creek	399-1	521	7
Chester Creek	416-1	517	7
Chester Creek	418-1	560	7
Chester Creek	509-12	128	7
Chester Creek	519-1	599	7
Chester Creek	525-2	554	7
Chester Creek	53-1	129	7
Chester Creek	547-1	596	7
Chester Creek	578-1	499	7
Chester Creek	679-21	134	7

Watershed	Outfall ID	Subbasin ID	Total Score
Chester Creek	683-1	546	7
Chester Creek	700-10	584	7
Chester Creek	98-2	221	7
Eagle River	303-1	754	7
Fish Creek	1310-201	1278	7
Fish Creek	1312-19	1280	7
Fish Creek	137-1	1260	7
Fish Creek	228-1	1030	7
Fish Creek	234-1	867	7
Fish Creek	32-1	774	7
Fish Creek	37-1	1020	7
Fish Creek	429-1	761	7
Fish Creek	480-1	1018	7
Fish Creek	555-1	816	7
Fish Creek	584-1	782	7
Fish Creek	595-1	777	7
Fish Creek	595-8	777	7
Fish Creek	661-26	1273	7
Fish Creek	79-353	1267	7
Furrow Creek	1345-1	1102	7
Furrow Creek	216-10	1046	7
Furrow Creek	293-1	673	7
Furrow Creek	332-1	1050	7
Furrow Creek	34-2	915	7
Furrow Creek	395-1	1109	7
Furrow Creek	402-1	1051	7
Furrow Creek	592-1	725	7
Furrow Creek	617-1	905	7
Furrow Creek	634-1	1028	7
Furrow Creek	95-2	915	7
Hood Creek	502-16	1013	7
Ship Creek	1363-1	1335	7
Ship Creek	690-1	956	7
Chester Creek	574-1	490	6
Chester Creek	575-1	490	6
Fish Creek	191-1	783	6
Campbell Creek	<Null>	1331	5
Campbell Creek	1477-1	1201	5
Campbell Creek	65-2	410	5
Campbell Creek	685-1	875	5
Campbell Creek	685-7	875	5
Campbell Creek	703-1	1331	5

Watershed	Outfall ID	Subbasin ID	Total Score
Chester Creek	163-5	136	5
Chester Creek	244-2	136	5
Chester Creek	319-1	220	5
Chester Creek	321-1	557	5
Chester Creek	361-1	606	5
Fish Creek	1277-59	1279	5
Campbell Creek	<Null>	1443	4
Campbell Creek	1432-1	1432	4
Campbell Creek	1456-1	1433	4
Campbell Creek	1465-1	1377	4
Campbell Creek	1474-1	1311	4
Campbell Creek	181-1	836	4
Campbell Creek	285-1	1205	4
Campbell Creek	40-4	1310	4
Campbell Creek	405-1	849	4
Campbell Creek	408-1	326	4
Campbell Creek	433-1	844	4
Campbell Creek	433-14	844	4
Campbell Creek	446-1	1206	4
Campbell Creek	461-16	403	4
Campbell Creek	487-1	834	4
Campbell Creek	505-1	897	4
Campbell Creek	529-1	874	4
Campbell Creek	551-1	309	4
Campbell Creek	586-1	277	4
Campbell Creek	598-18	404	4
Campbell Creek	60-1	889	4
Campbell Creek	619-1	888	4
Campbell Creek	626-1	892	4
Campbell Creek	626-5	892	4
Campbell Creek	732-1	894	4
Campbell Creek	99-1	898	4
Chester Creek	115-1	486	4
Chester Creek	1265-40	1246	4
Chester Creek	139-1	565	4
Chester Creek	140-1	565	4
Chester Creek	1462-1	1458	4
Chester Creek	218-1	580	4
Chester Creek	259-1	615	4
Chester Creek	26-14	519	4
Chester Creek	301-1	174	4
Chester Creek	304-1	603	4

Watershed	Outfall ID	Subbasin ID	Total Score
Chester Creek	415-1	528	4
Chester Creek	419-6	510	4
Chester Creek	488-1	508	4
Chester Creek	492-1	545	4
Chester Creek	517-17	225	4
Chester Creek	587-1	168	4
Chester Creek	665-1	488	4
Chester Creek	889-1	617	4
Eagle River	1390-2	1297	4
Eagle River	1391-1	1298	4
Eagle River	1455-1	1287	4
Eagle River	646-71	1292	4
Fire Creek	1392-1	1299	4
Fire Creek	1393-1	1300	4
Fish Creek	1054-1	1190	4
Fish Creek	264-1	798	4
Fish Creek	494-1	762	4
Fish Creek	610-1	739	4
Fish Creek	684-1	759	4
Furrow Creek	1344-8	1393	4
Hood Creek	1264-37	1264	4
Hood Creek	142-1	768	4
Hood Creek	315-2	1014	4
Hood Creek	486-1	765	4
Ship Creek	1431-1	1436	4
Ship Creek	278-1	1250	4
Campbell Creek	1019-2	1352	2
Campbell Creek	155-3	1203	2
Campbell Creek	183-8	736	2
Campbell Creek	290-46	1324	2
Campbell Creek	364-1	296	2
Campbell Creek	427-2	163	2
Campbell Creek	501-4	1326	2
Campbell Creek	612-1	1204	2
Campbell Creek	74-2	1327	2
Chester Creek	125-1	529	2
Chester Creek	378-3	571	2
Chester Creek	387-1	620	2
Chester Creek	542-1	610	2
Chester Creek	580-11	622	2
Chester Creek	624-4	611	2
Hood Creek	249-1	781	2

Watershed	Outfall ID	Subbasin ID	Total Score
Campbell Creek	692-15[a]	-	-
Campbell Creek	692-24[a]	-	-
Glacier Creek	-[b]	-	-

[a] Outfalls 692-15 and 692-24 drain to Campbell Creek at E. 68th Ave. between Brayton Dr. and Meadow St. As of May 23, 2022, the HGDB does not have the subbasin that drains to the outfall mapped. The HGDB needs to be updated and the outfalls need to receive a prioritization score.

[b] An unnumbered outfall drains to Glacier Creek at Girdwood Pl. and Holmgren Pl. This outfall and the connected drainageways were added to the HGDB on August 20, 2020. As of May 23, 2022, a subbasin for this network has not delineated in the HGDB. The HGDB needs to be updated and the outfall needs to receive a prioritization score.

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Appendix B

Watershed Maps

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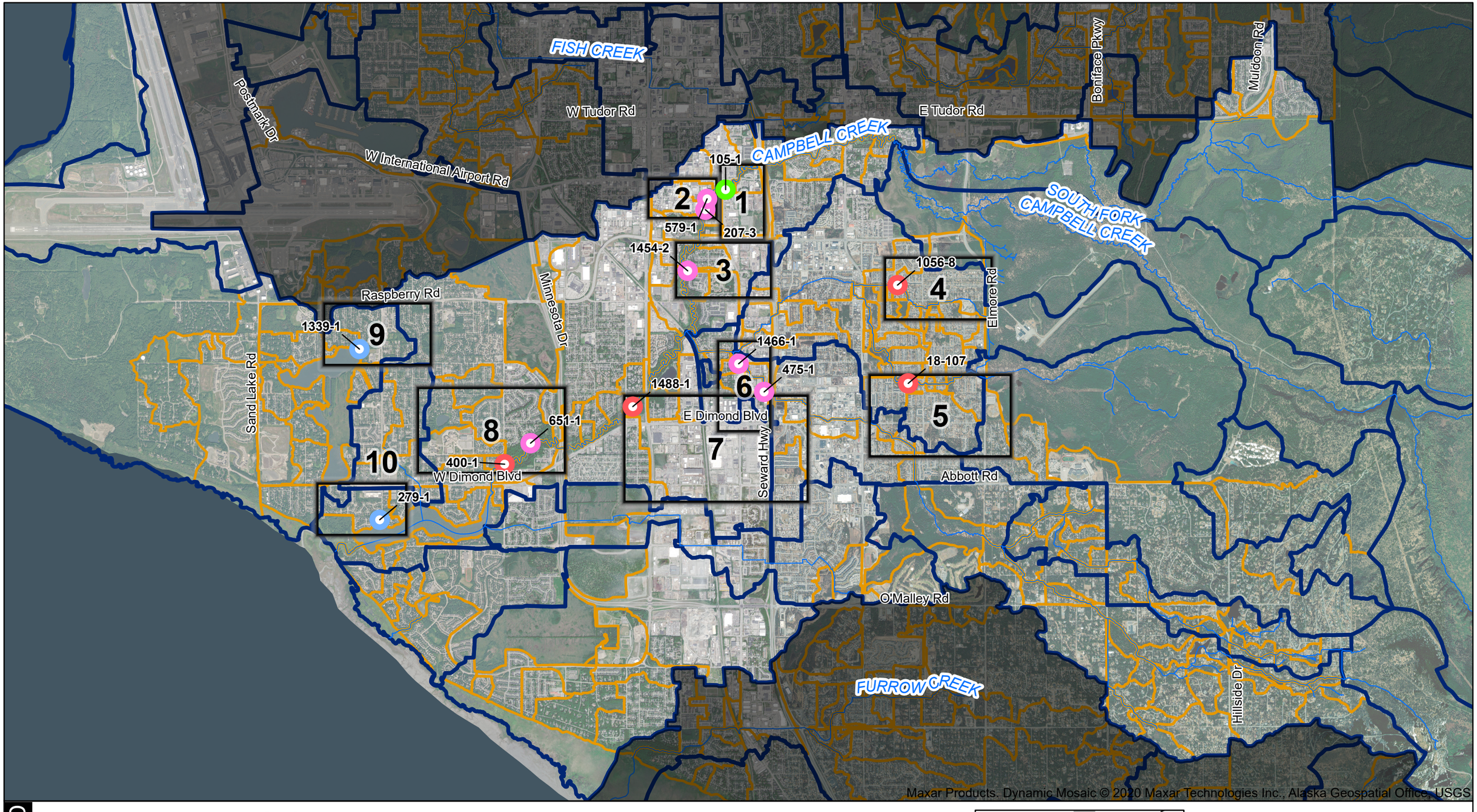
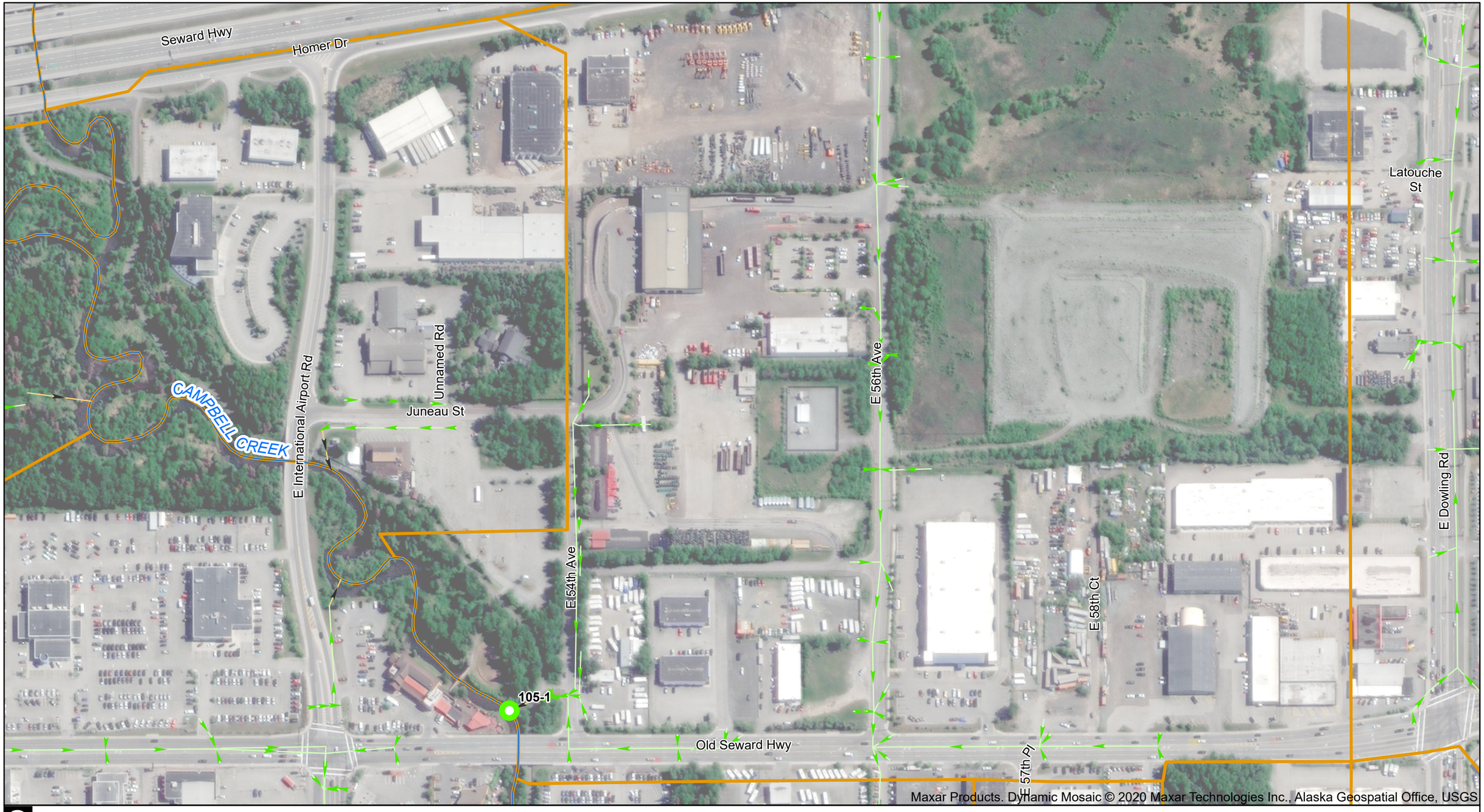

FISH CREEK
Postmark Dr
W Tudor Rd
E Tudor Rd
Boniface Pkwy
Muldoon Rd
W International Airport Rd
CAMPBELL CREEK
SOUTH FORK CAMPBELL CREEK
105-1
2
1
579-1
207-3
1454-2
3
1056-8
4
Elmore Rd
Minnesota Dr
Raspberry Rd
1339-1
9
1466-1
6
475-1
18-107
5
1488-1
E Dimond Blvd
7
Seward Hwy
Sand Lake Rd
8
651-1
10
400-1
W Dimond Blvd
Abbott Rd
279-1
O'Malley Rd
FURROW CREEK
Hillside Dr
Maxar Products. Dynamic Mosaic © 2020 Maxar Technologies Inc., Alaska Geospatial Office, USGS
LEGEND
Stream
Watershed
MS4 Subbasin
2025 Outfalls
Screened
Sampled
Could Not Locate
Inaccessible
N
0
1
Miles
Anchorage
Cook Inlet
Dry Weather Screening 2025
Campbell Creek Overview
Attempted Outfall Locations
HDR Engineering, Inc.
9/3/2025
HDR



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

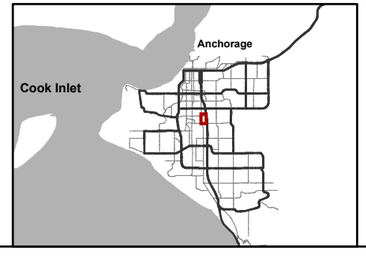
- Sampled

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Campbell Creek

Page 1 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025

W International Airport Rd
E International Airport Rd
Eagle St
W 53rd Ave
E 53rd Ave
Cordova St
Fairbanks St
CAMPBELL CREEK
C St
B St
A St
E 54th Ave
579-1
W Potter Dr
E 56th Ave
207-3
E Potter Dr
Denali St
Unnamed Rd
E 57th
Maxar Products. Dynamic Mosaic © 2020 Maxar Technologies Inc., Alaska Geospatial Office, USGS

LEGEND

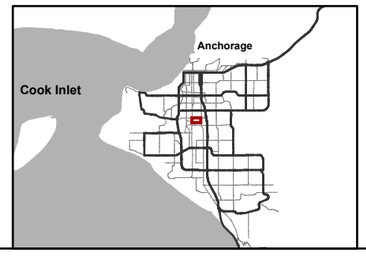
- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls
- Screened

MS4 Drainageway
- Closed Conveyance
- Open Conveyance

N

0 500 Feet



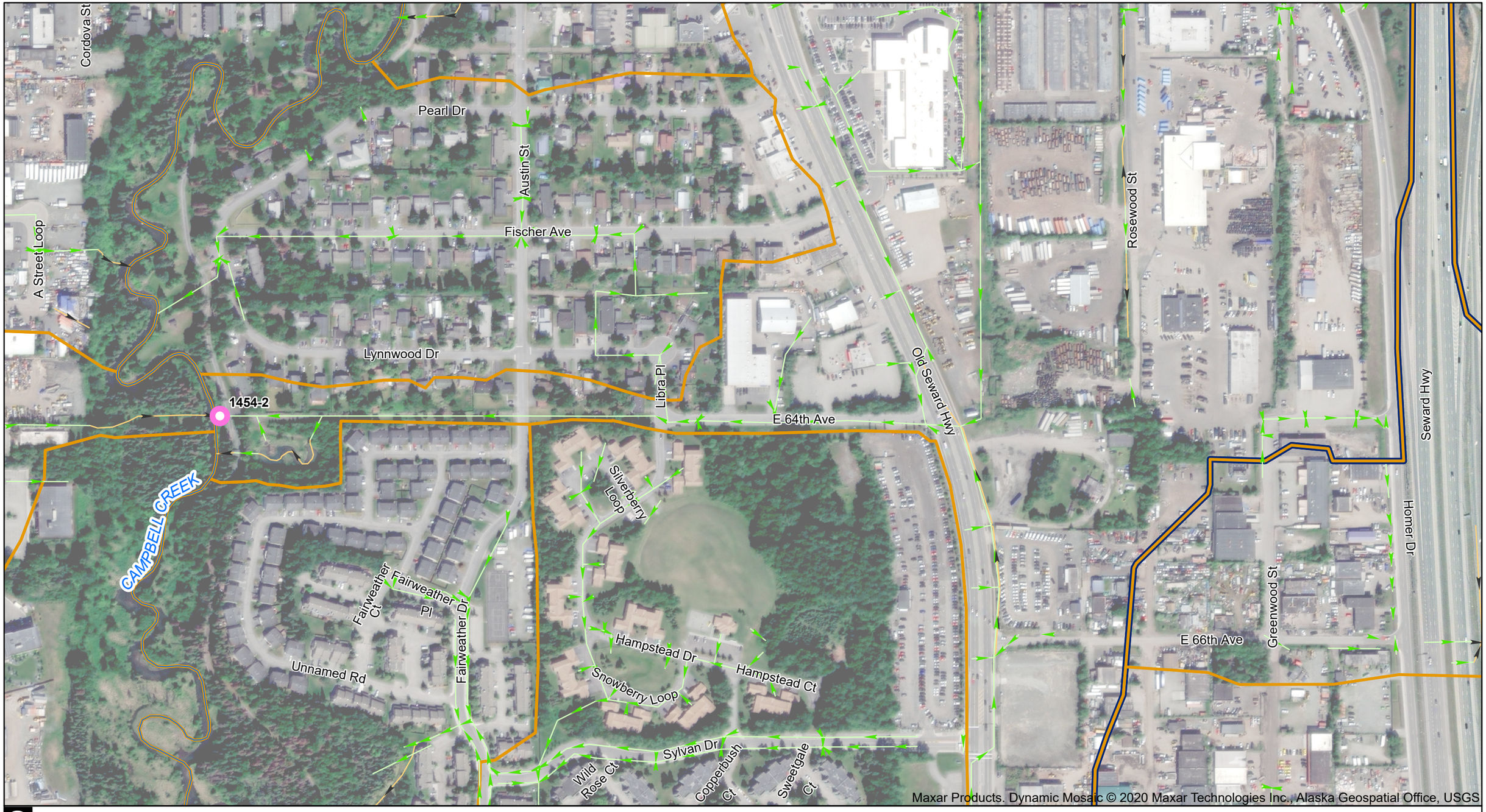
Dry Weather Screening 2025

Campbell Creek

Page 2 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

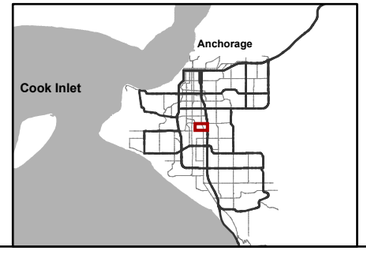
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



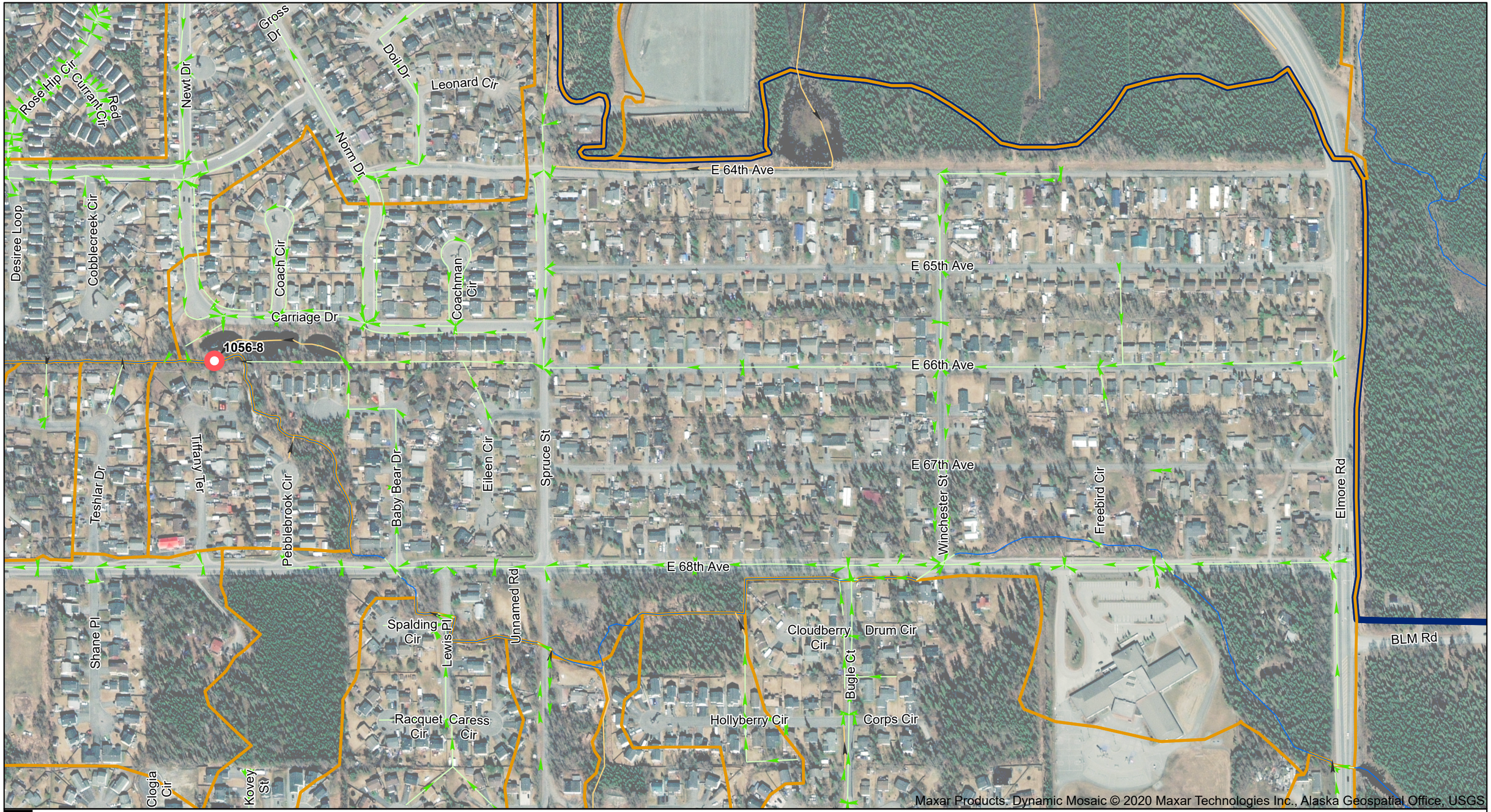
Dry Weather Screening 2025

Campbell Creek

Page 3 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

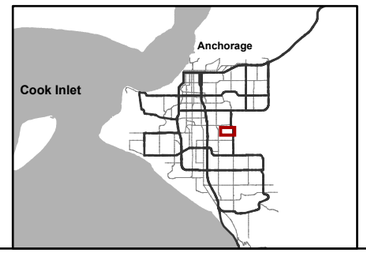
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



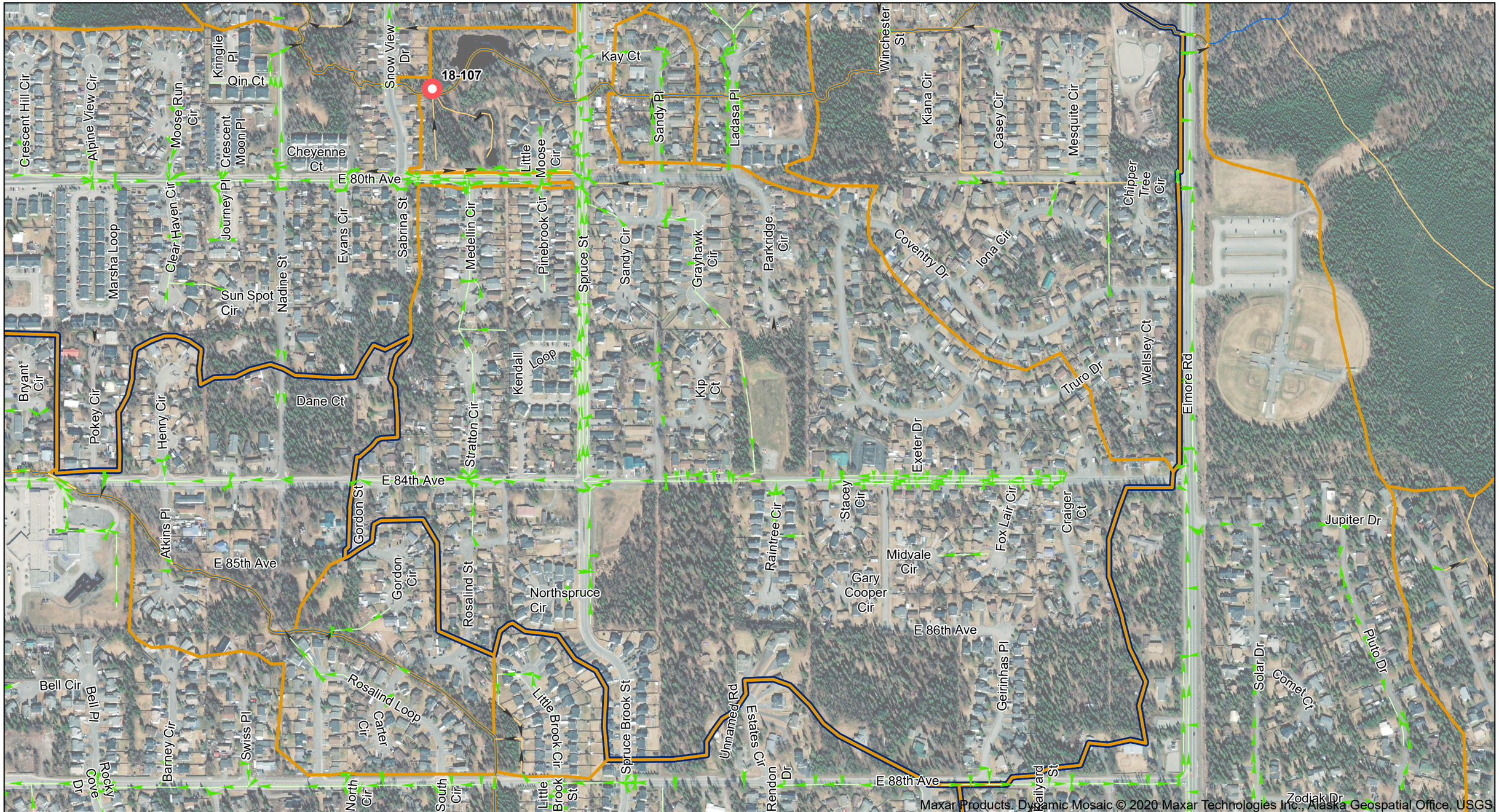
Dry Weather Screening 2025

Campbell Creek

Page 4 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

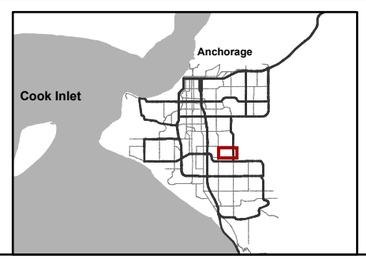
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



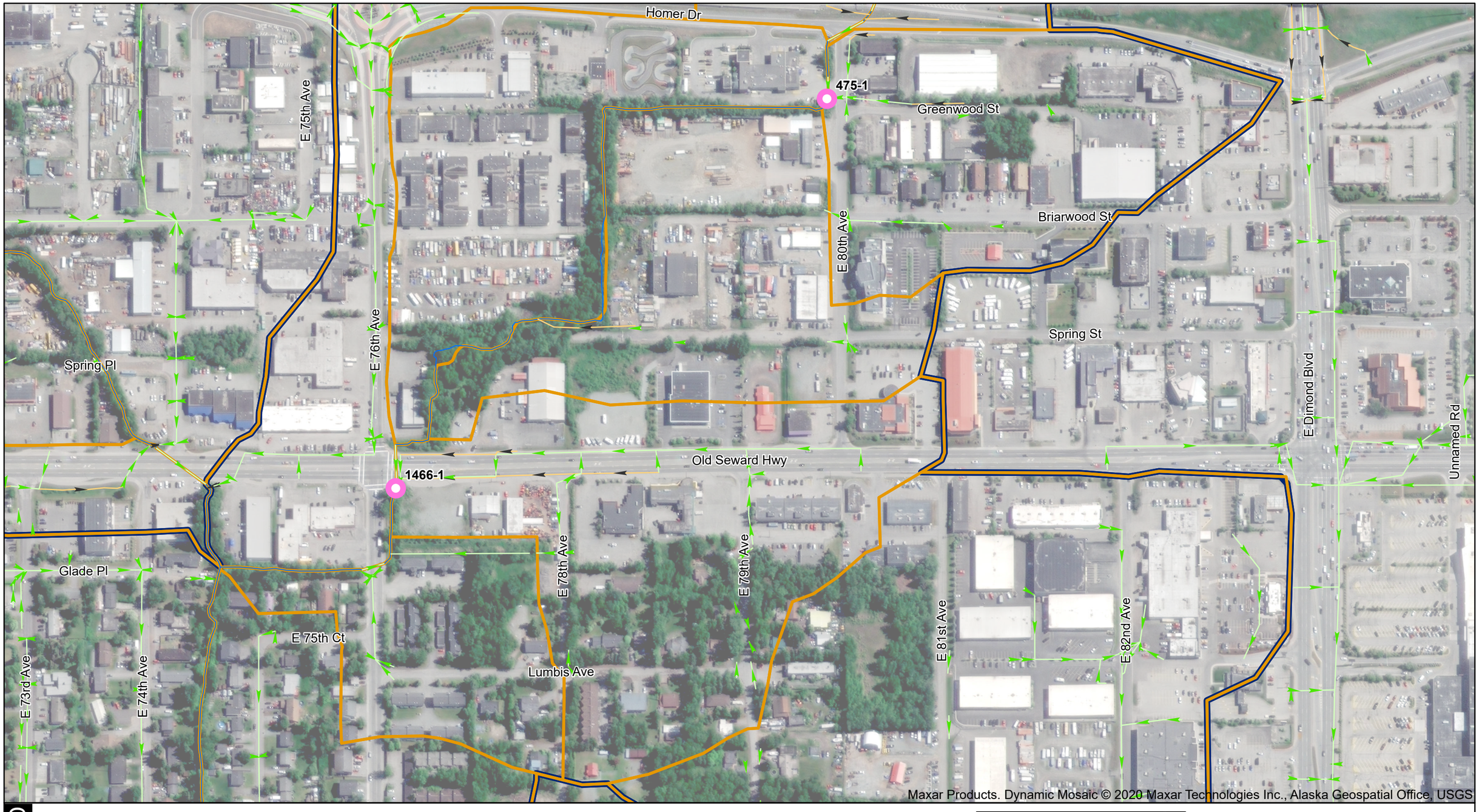
Dry Weather Screening 2025

Campbell Creek

Page 5 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

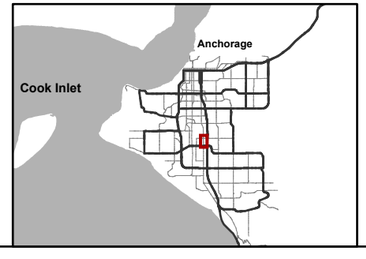
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Campbell Creek

Page 6 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025

CAMPBELL CREEK
1488-1
Queen Victoria Dr
Sorcerer Ct
Jesters Pl
Jesters Cir
Calista Ct
Schoon St
Stormy Pl
Rainy Pl
Arctic Slope Ave
E 81st Ave
E 82nd Ave
Spring St
BrianWood St
Greenwood St
Homer Dr
Sandlewood Pl
E 84th Ave
Hartzell Rd
W Dimond Blvd
E Dimond Blvd
Dimond Center Dr
E Dimond Cir
Arctic Blvd
W 86th Ct
W 86th Ave
Midland Pl
W 87th Ave
Dimond D Cir
Lavelle Dr
E 87th Ave
King St
Old Seward Hwy
Erin St
Corbin Dr
E 85th Ct
Abbott Rd
E 88th Ave
W 88th Ave
Vernon St
C St
Otis Pl
N Heather Meadows Loop
Moss Creek Ave
S Heather Meadows Loop
Unnamed Rd
Seward Hwy
Brayton Dr
Zircon Cir
Crystal St
W 89th Ave
Topaz St
W 90th Ave
A St
Cameo Dr
W 91st Ave
W 92nd Ave
E 92nd Ave
Scooter Ave
Stub Pl
Calamity Ct
Gambell St
Short St
Long St
Contrary Ct
Academy Dr
Cometa Loop
Emily Jo Heglean Loop
Courage Dr
Vanguard Dr
Flintlock St
E 94th Ct
E 94th Ave

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

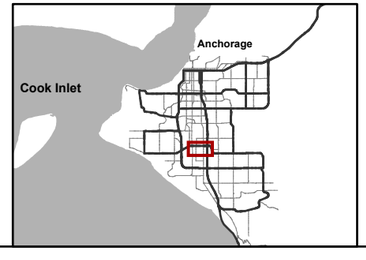
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



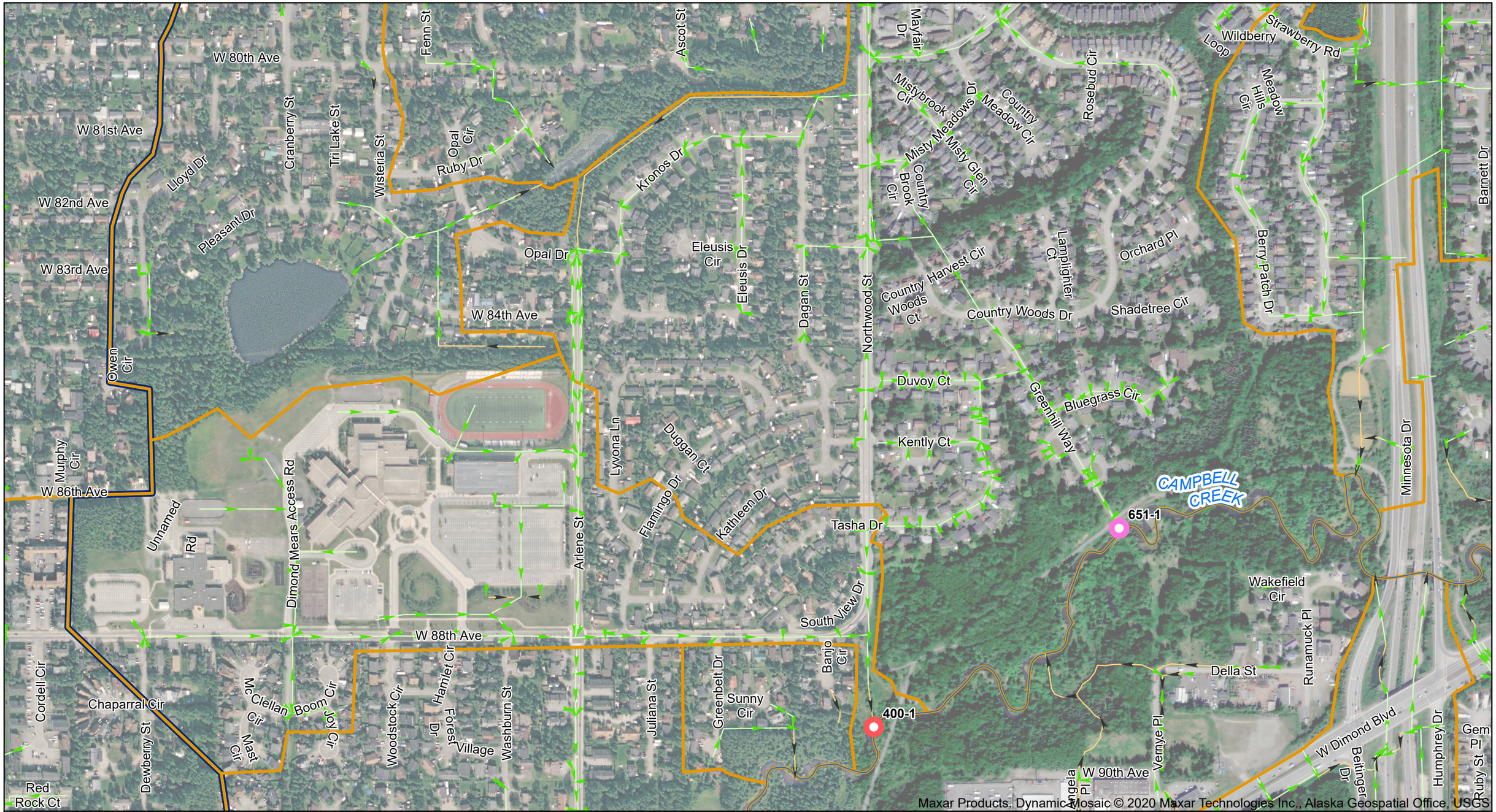
Dry Weather Screening 2025

Campbell Creek

Page 7 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

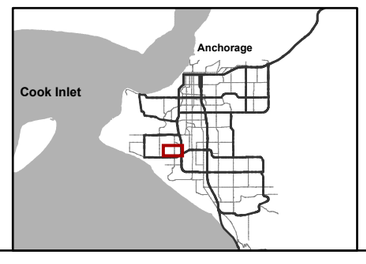
- Screened
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



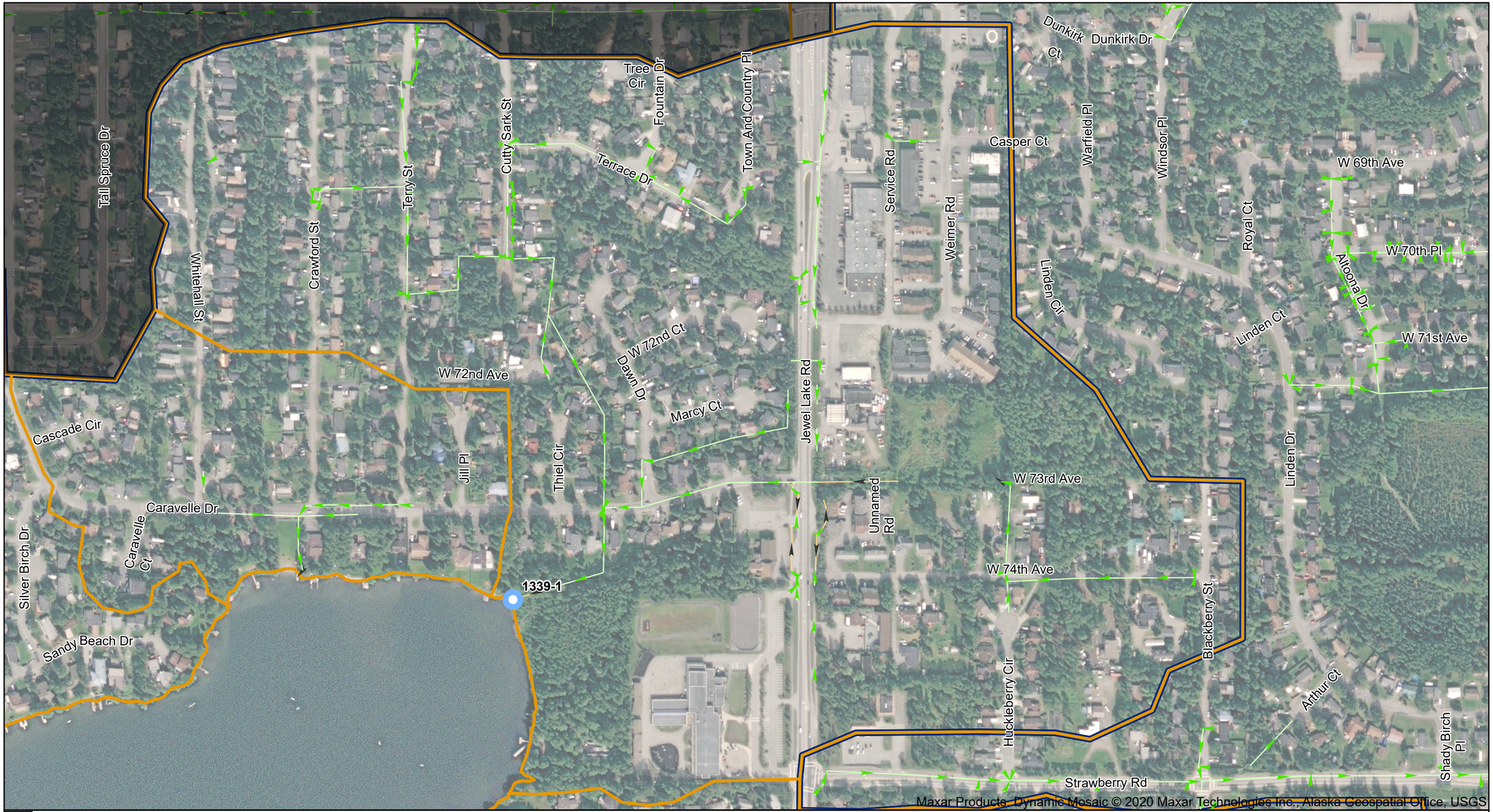
Dry Weather Screening 2025

Campbell Creek

Page 8 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



LEGEND

- MS4 Subbasin
- Watershed

2025 Outfalls

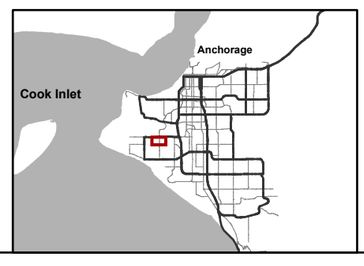
- Inaccessible

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Campbell Creek

Page 9 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025

W Dimond Blvd
Noble Cir
Emerald St
Elgin Cir
Kirkwall Cir
Macalister Dr
Bothwell Cir
Strathmore Dr
Jewel Lake Rd
Runestad Cir
Mere Cir
Montrose Cir
Edinburgh Dr
Kylie Cir
Dundee Cir
Selkirk Dr
Lennox Dr
North Point Dr
North Point Cir
279-1
Tahoe Dr
Unnamed Rd
CAMPBELL CREEK

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

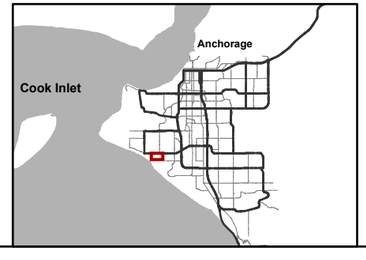
- Inaccessible

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



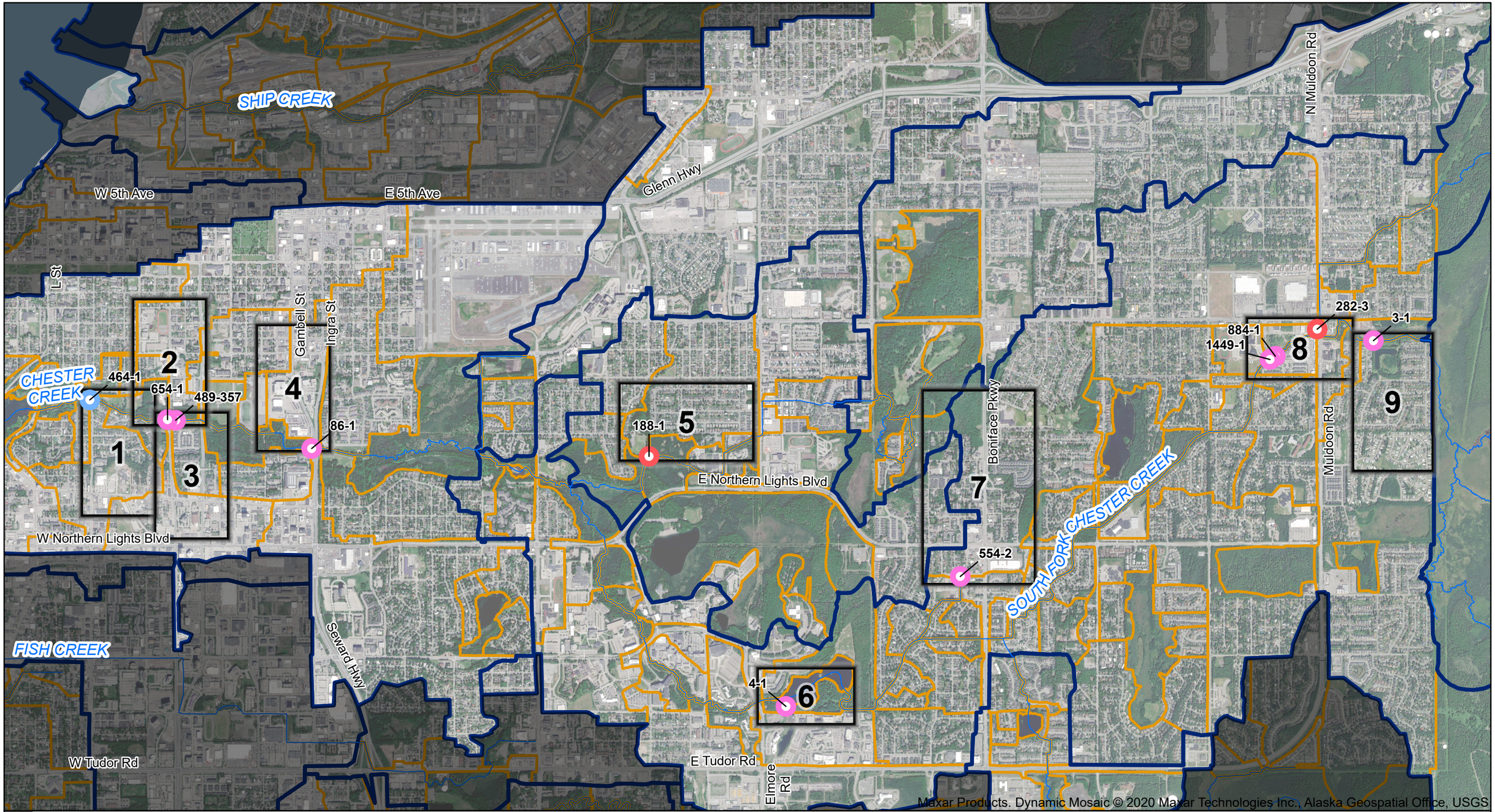
Dry Weather Screening 2025

Campbell Creek

Page 10 of 10

Attempted Outfall Locations

HDR Engineering, Inc.
9/3/2025



LEGEND

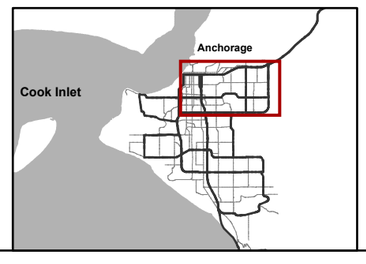
- Stream
- Watershed
- MS4 Subbasin

2025 Outfalls

- Screened
- Could Not Locate
- Inaccessible

N

0 1 Miles



Dry Weather Screening 2025

Chester Creek Overview

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

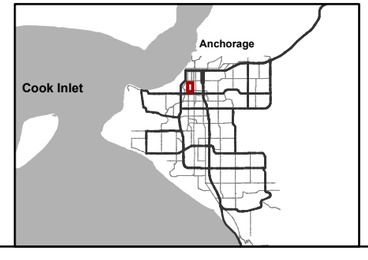
- Inaccessible

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



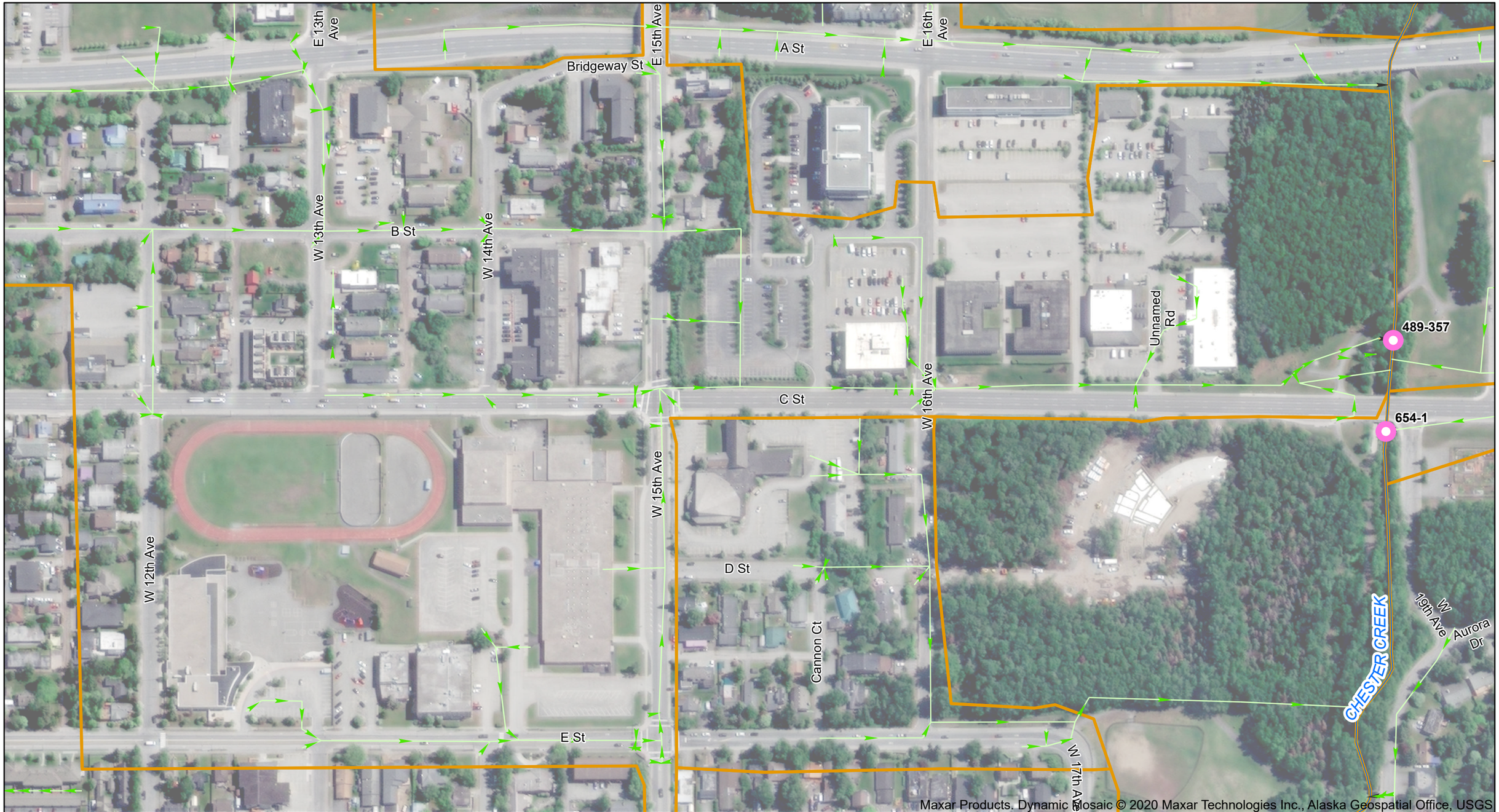
Dry Weather Screening 2025

Chester Creek

Page 1 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

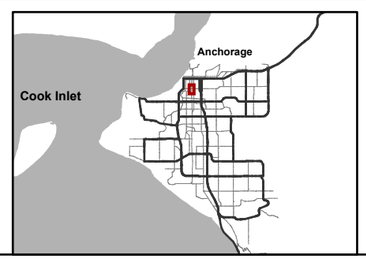
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Chester Creek

Page 2 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

CHESTER CREEK
E 23rd Ave
Smith Dr
E 24th Ave
E Fireweed Ln
Barrow St
E 26th Ave
A St
Glenview St
Salmonberry Pl
Clover Hollow Ct
W 24th Ave
W 22nd Ave
W 23rd Ave
W 24th Pl
Miller Pl
W Fireweed Ln
W 20th Ave
Fiddlehead Pl
489-357
654-1
C St
Unnamed Rd
Margies Pl
W 19th Ave
W 21st Ave
D St
Eide St
Aurora Dr
W 26th Ave
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LEGEND

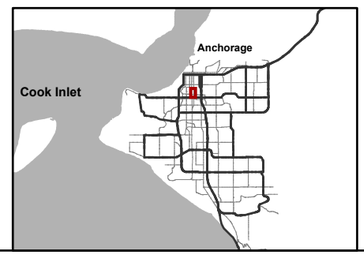
- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls
- Screened

MS4 Drainageway
- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Chester Creek

Page 3 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

Juneau Dr
Ingra St
E 20th Ave
Seward Hwy
86-1
Hyder St
Unnamed Rd
Gambell St
E 13th Ave
E 14th Ave
E 15th Ave
CHESTER CREEK
Fairbanks St
Vista Glen Ct
Eyak Dr
E 16th Ave
Eagle St

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

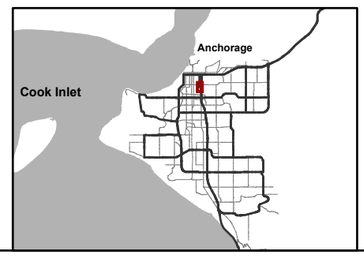
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



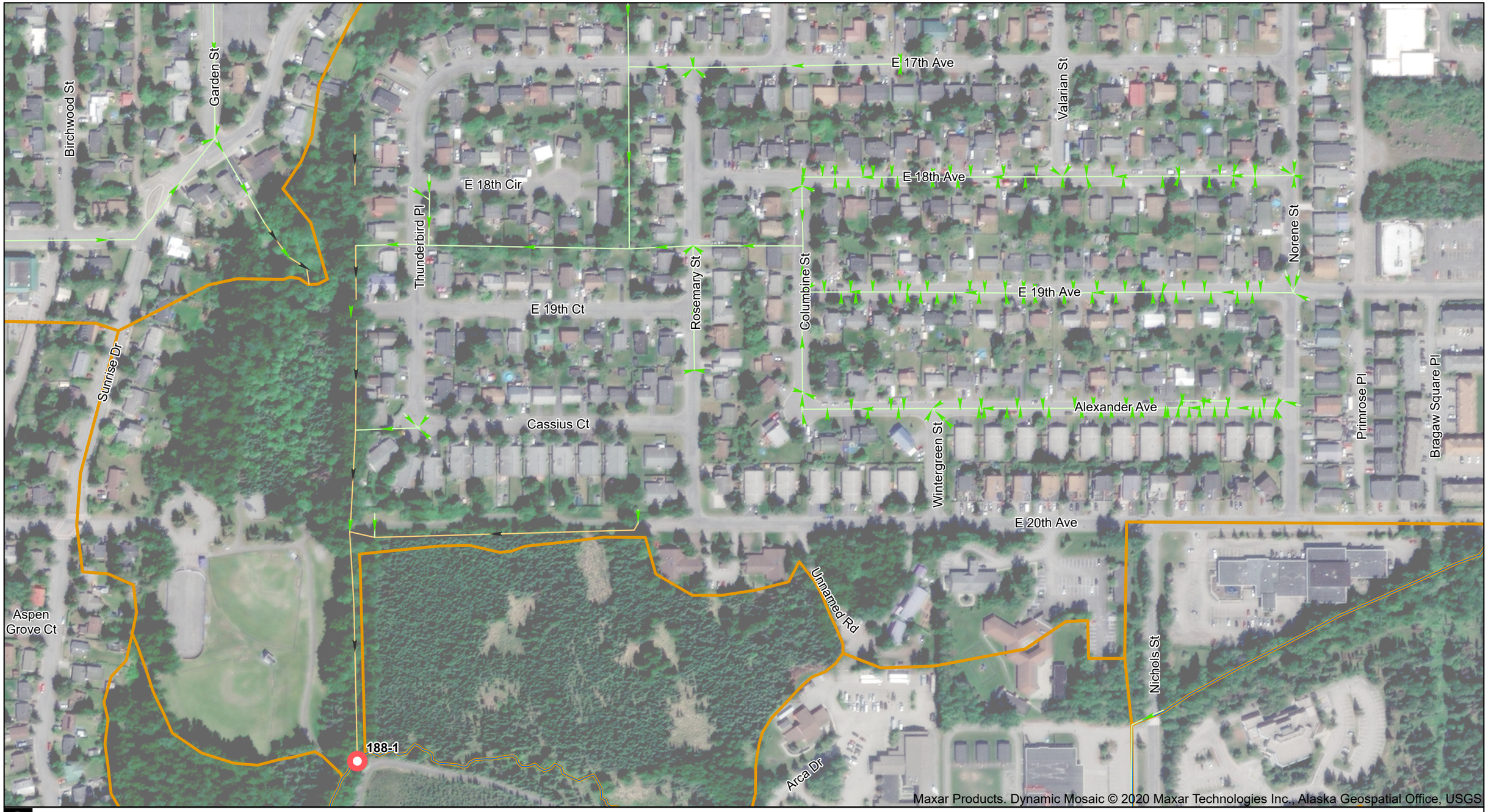
Dry Weather Screening 2025

Chester Creek

Page 4 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

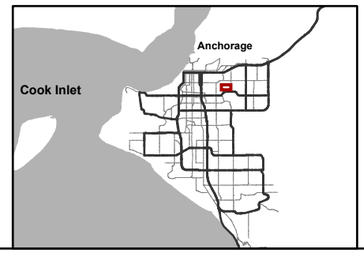
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Chester Creek

Page 5 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

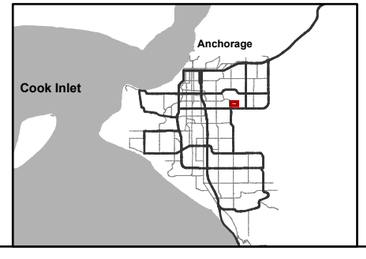
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Chester Creek

Page 6 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

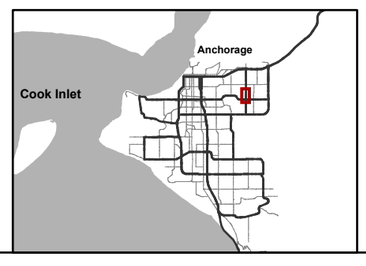
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



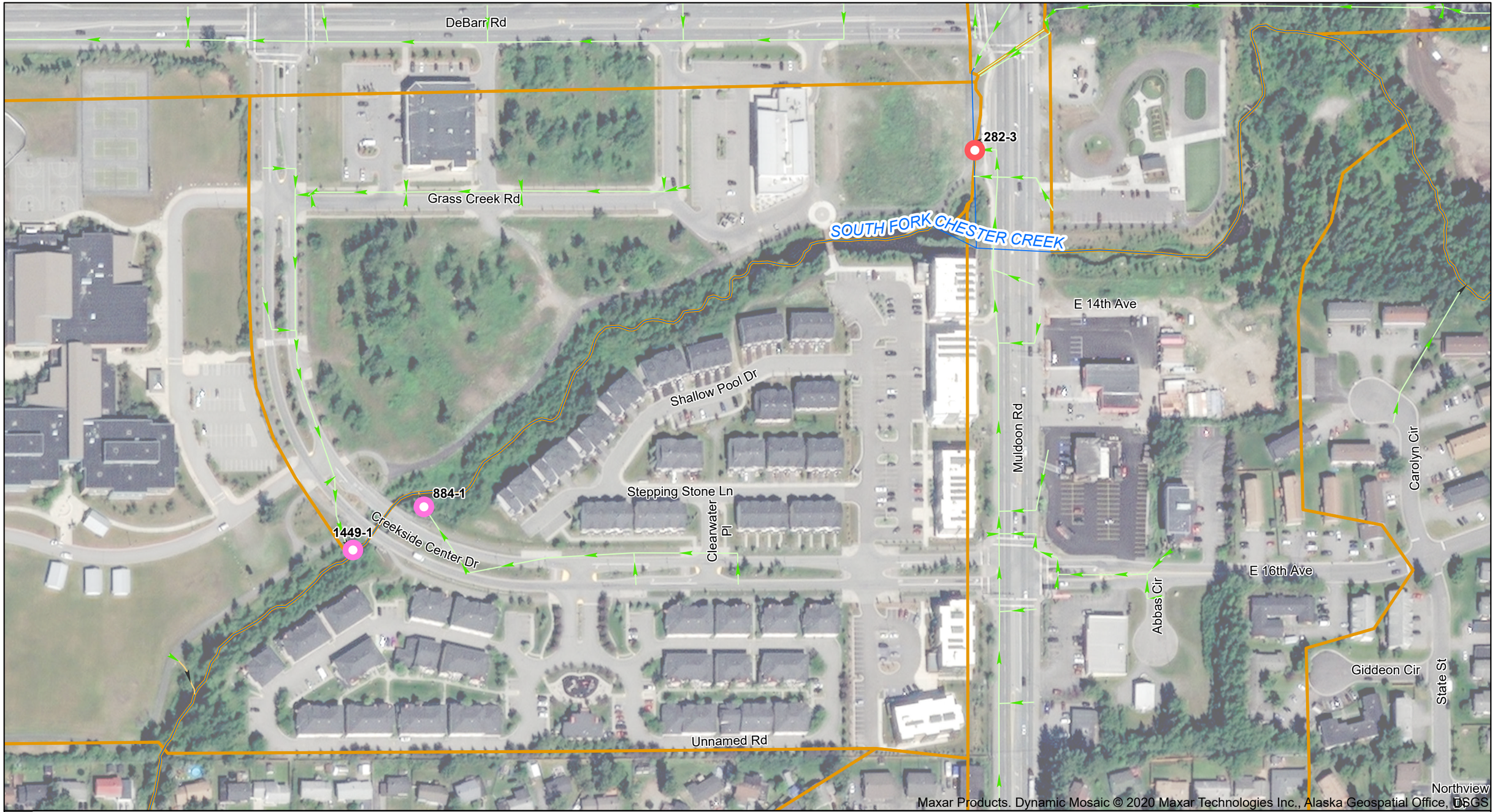
Dry Weather Screening 2025

Chester Creek

Page 7 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

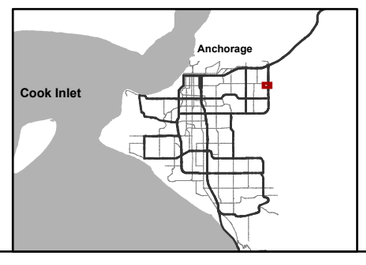
- Screened
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Chester Creek

Page 8 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

Early View Dr
Turf Ct
Moss Ct
Shrub Ct
E 17th Ave
Short St
East View Dr
Hidden View Ct
Andrew Cross St
Halligan St
Owen St
Molly O St
Popcary Dr
Bryan Way
Rebel Ridge Dr
E 20th Ave
Westview Cir
3-1
Northview Dr
E 16th Ave
E 18th Ave
Greendale Dr
E 19th Cir
Glen Caren Trailer Ct
Byrne Dr
Halligan Cross St

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

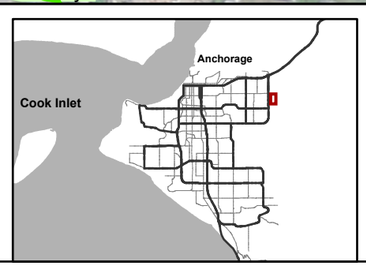
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



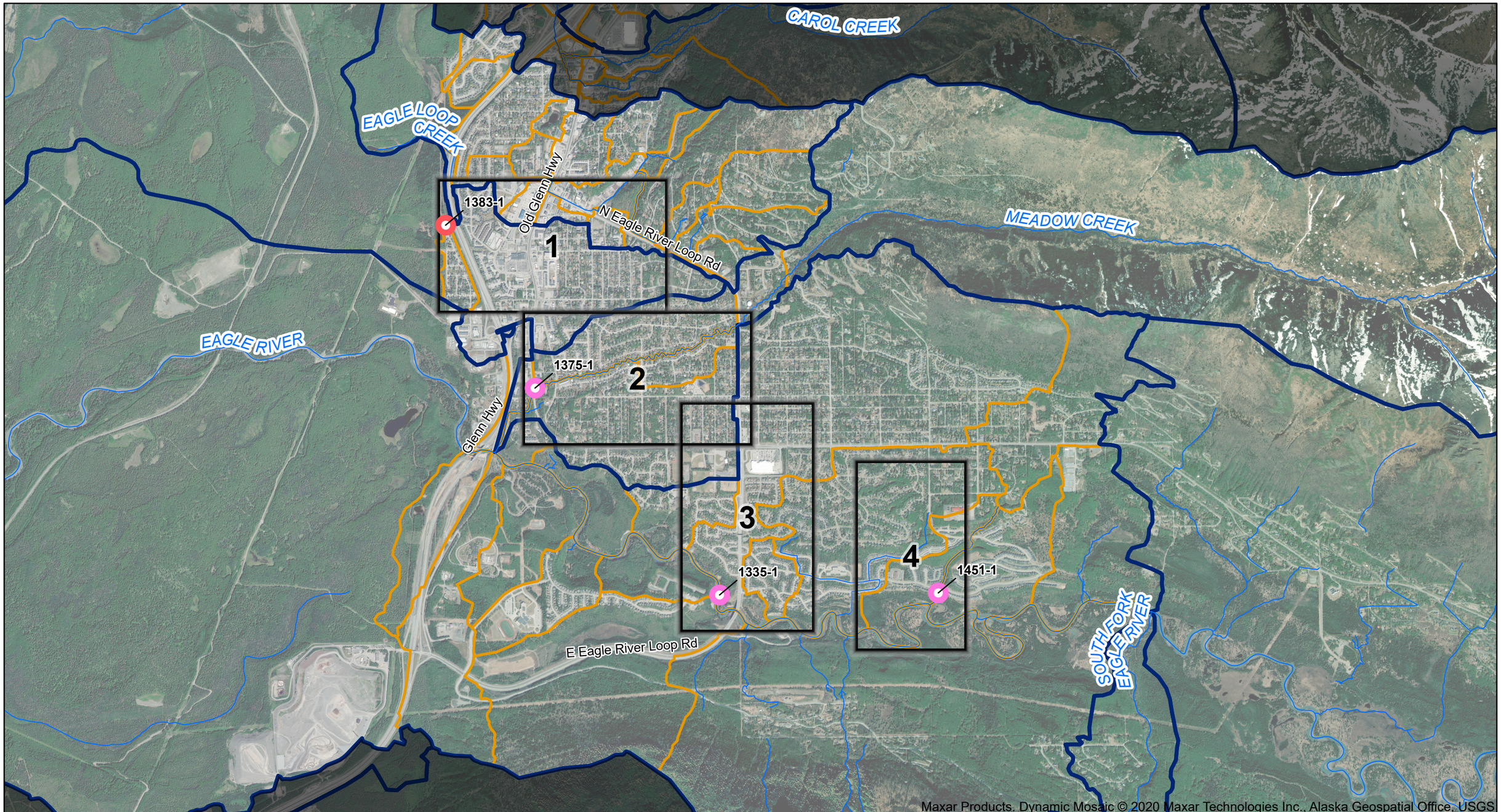
Dry Weather Screening 2025

Chester Creek

Page 9 of 9

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

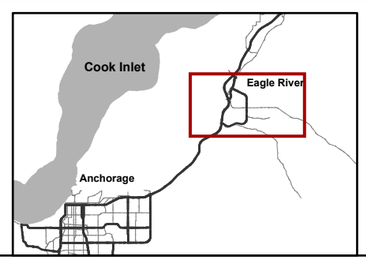
- Stream
- Watershed
- MS4 Subbasin

2025 Outfalls

- Screened
- Could Not Locate

N

0 1 Miles

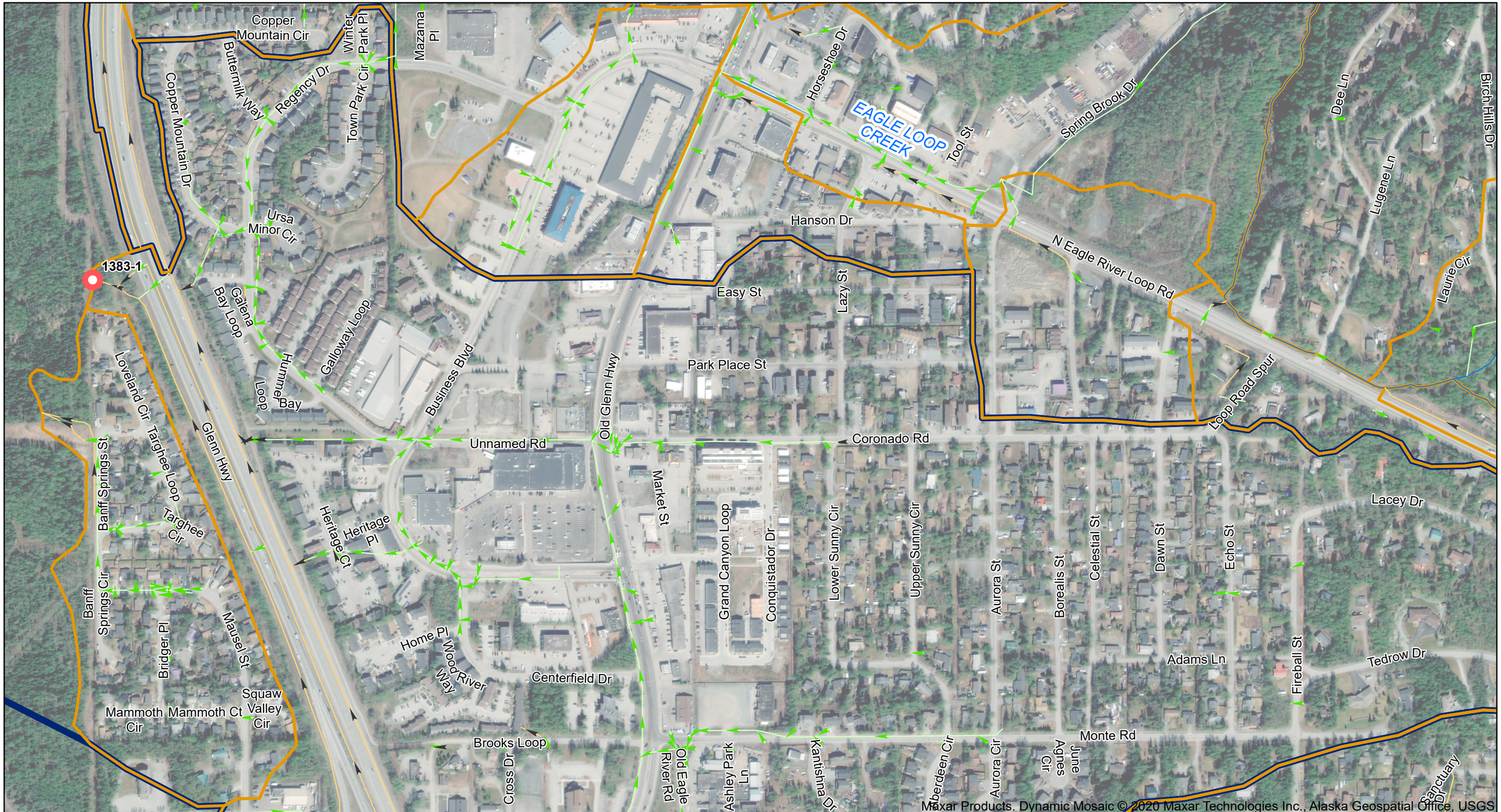


Dry Weather Screening 2025

Eagle River Overview

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

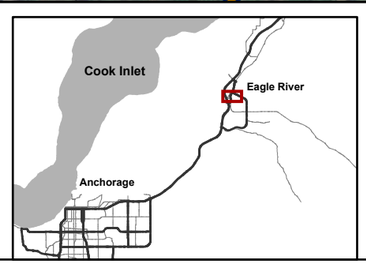
- Could Not Locate

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Eagle River

Page 1 of 4

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

Old Glenn Hwy
Lynne Dr
Hannah Jane Pl
Splendor Loop
Tsusena Cir
Bonasila Cir
Katlian Dr
Sanctuary Dr
Kantishna Dr
Buskin Cir
Gulkana Cir
Gakona Cir
Idlatrol Cir
Talarik Dr
Kinship Ln
Klutina Cir
Ludlow Cir
Hideaway Ridge Dr
Kahiltna Dr
Goodpaster Cir
Delta Cir
Anvik Cir
Teklanika Dr
VFW Rd
Seabolt Pl
Old Eagle River Rd
Briggs Cache Cir
Edgewood Cir
Vanover Cir
Fire House Ln
MEADOW CREEK
Meadow Creek Dr
Tokositna Cir
Chisana St
Sanford Cir
Oshetna Cir
Tonsina Ct
Chatanika Loop
E Eagle River Loop Rd
Sun Beau Dr
Whirlaway Rd
1375-1
Eagle River Rd
Palos Verdes Dr
Palos Verdes Cir
Chain of Rock St
Holitna Cir
Chilkat Ct
Nabesna Cir
Man O War Rd
Baronoff Ave
Colville St
Citation Rd
Lieselotte Cir
Big Horn Cir
Willis Dr
Young Dr
Unnamed Rd
Foothill Ave
Genora St
Baffin St
Lee St
Wildwood St
Caribou St
Chandalar St
Chickaloon St
Second St
River Heights Loop
Bear Paw Cir
River's Edge Ln

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

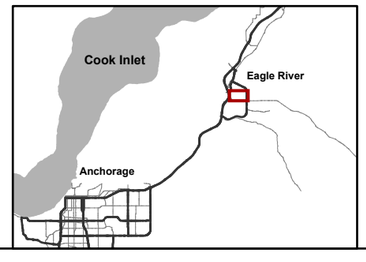
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Eagle River

Page 2 of 4

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

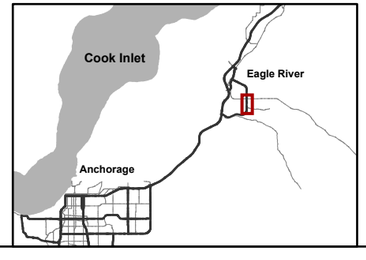
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Eagle River

Page 3 of 4

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

Raven Dr
Ptarmigan Blvd
Eagles Nest Ct
Eagle River Ln
Unnamed Rd
Glacier Park Cir
Riverside Dr
Grey Owl Way
Eagle Place Loop
1451-1
EAGLE RIVER
Meadow Park Cir
Nizki Cir
Unimak Cir
Kalka Fairmount Cir
Annette Cir
Shemya Dr
Samalga Cir
Belknap Cir
Birch Park Cir
Driftwood Bay Dr
Highland Ridge Dr
Afognak Cir
S Montague Loop
Revilla Cir
Shumagin Cir
Pribilof Loop
N Montague Loop
Big Diomede Cir
Delphin Cir
Little Diomede Cir
N Mitkof Loop
S Mitkof Loop
Northwood Park Cir
Chisik Cir
Ostovia Cir
Wingham Cir
Marble Cir
Trail Bay Dr
Takli Cir
Atka Cir
Eaglewood Loop
Middleton Loop

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

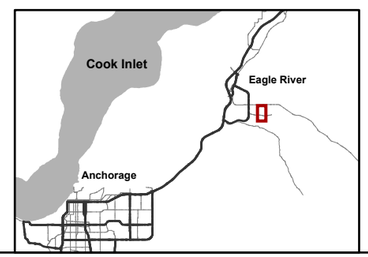
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



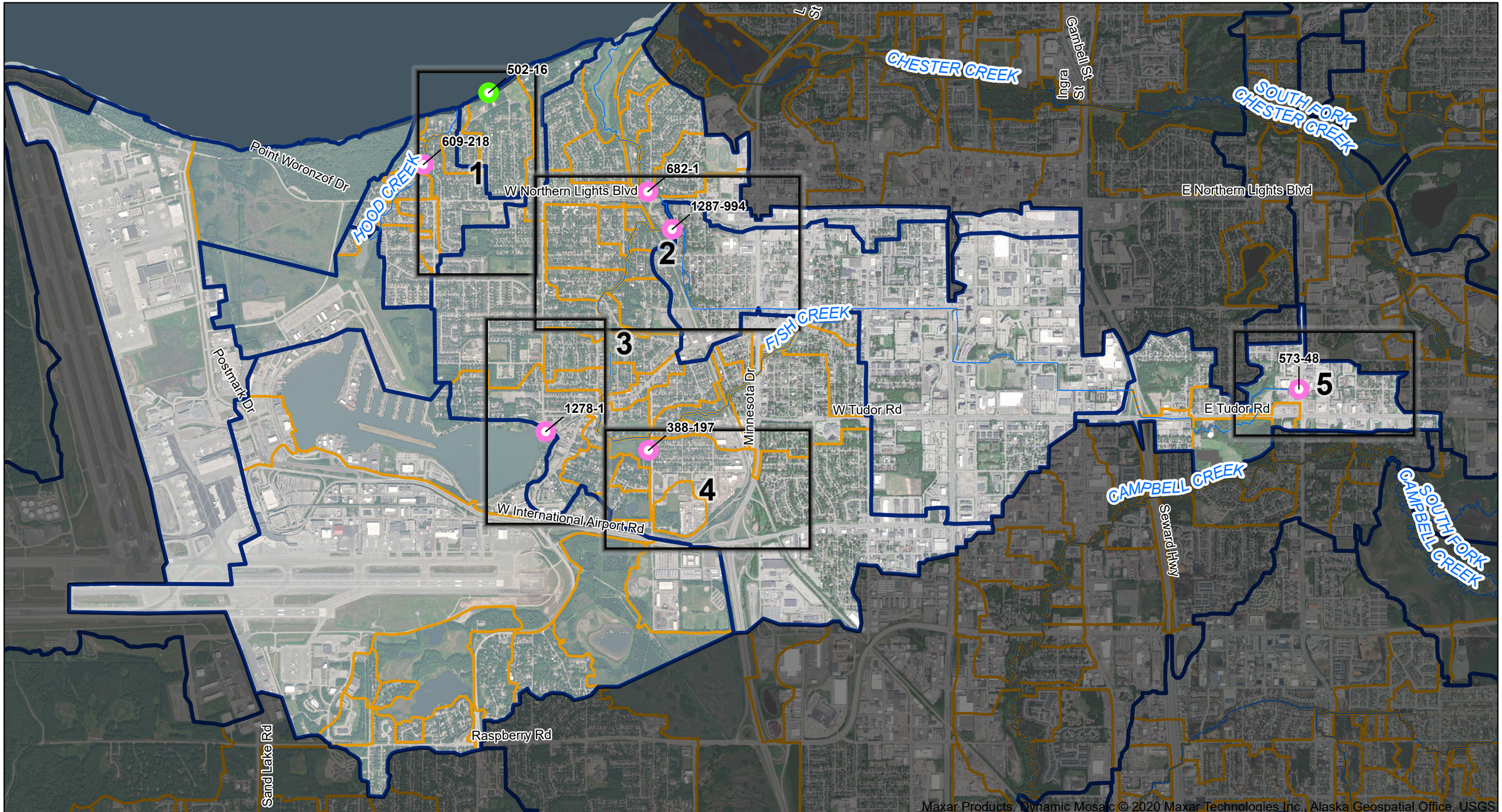
Dry Weather Screening 2025

Eagle River

Page 4 of 4

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

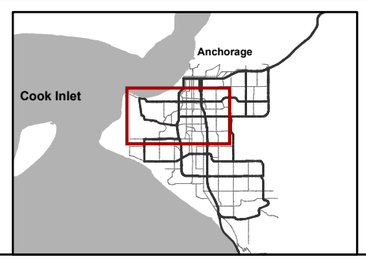
- Stream
- Watershed
- MS4 Subbasin

2025 Outfalls

- Screened
- Sampled

N

0 1 Miles



Dry Weather Screening 2025

Fish Creek and Hood Creek Overview

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

Susitna View Ct
Douglas Dr
Redoubt Ct
W 28th Ct
W 29th Ave
Illiamna Ave
Foraker Dr
Seppala Dr
W 30th Ave
W 31st Ave
W 32nd Ave
Susitna Dr
Knik Ave
502-16
Mc Kenzie Dr
Challenger Cir
Tulik Dr
W Marston Dr
W Northern Lights Blvd
Carleton Ave
Jefford Pl
W 27th Ave
Leighton St
Pete's Pl
Sonstrom Dr
Clay Products Dr
Galactica Dr
Milky Way Cir
Spurr Ln
Howe Pl
Malaspina Cir
Unnamed Rd
Ward Pl
Katmai Cir
Aquarius Cir
Telequana Dr
Aero Ave
Kisse Ct
HOOD CREEK
609-218
Westwood Dr
W 29th Pl
Starburst Cir
Hood Ct
Pribilof St
Moronzof Dr
Westland Ave
Ursa Cir
Astro Cir

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

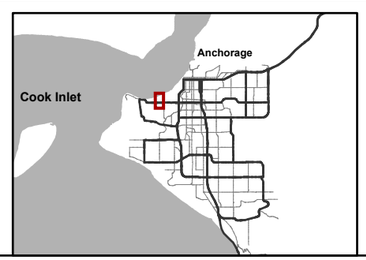
- Screened
- Sampled

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



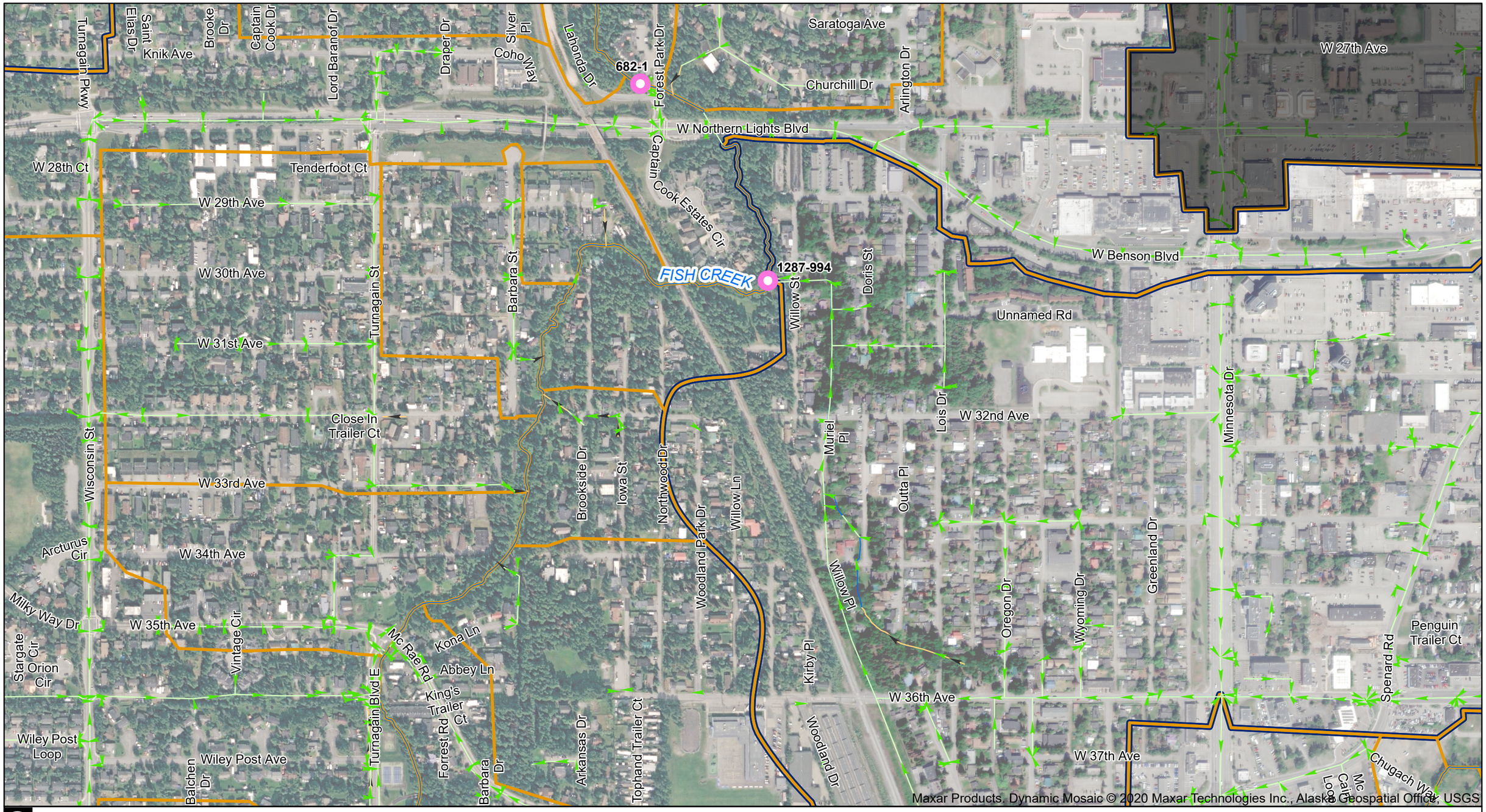
Dry Weather Screening 2025

Fish Creek and Hood Creek

Page 1 of 5

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

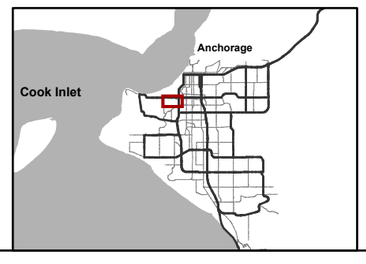
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Fish Creek and Hood Creek

Page 2 of 5

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

FISH CREEK
Turnagain Blvd E
Merrill Dr
Gillam Cir
Borland Dr
Borland Cir
Bennett Ave
Wiley Post Ave
Carroll Ln
Will Rogers Pl
W 42nd Ave
Balchen Dr
Crosson Cir
Crosson Dr
Wisconsin St
Wispen Cir
Wiley Post Loop
W 40th Ave
Lake Park Cir
Sagan Cir
Grissom Cir
Andre'e Dr
Mc Kenzie Dr
W 41st Ave
Unnamed Rd
Constellation Ave
Lakeshore Dr
Iris Dr
Tundra Ct
Lichen Pl
Aspen Dr
Valleywood Dr
Malibu Rd
Melvin Ave
Klamath Falls Ln
Malibu Meadows Way
Klamath Dr
White Birch Ln
Breezewood Dr
Spenard Rd
Lake Spenard Dr
Tanglewood Dr
1278-1
N Frontage St
Jewel Lake Rd
W International Airport Rd
Old International Airport Rd
Aviation Ave

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

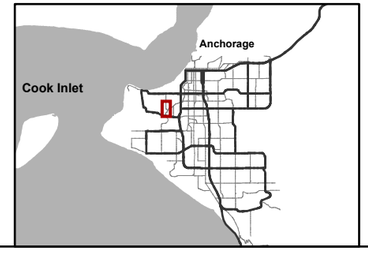
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



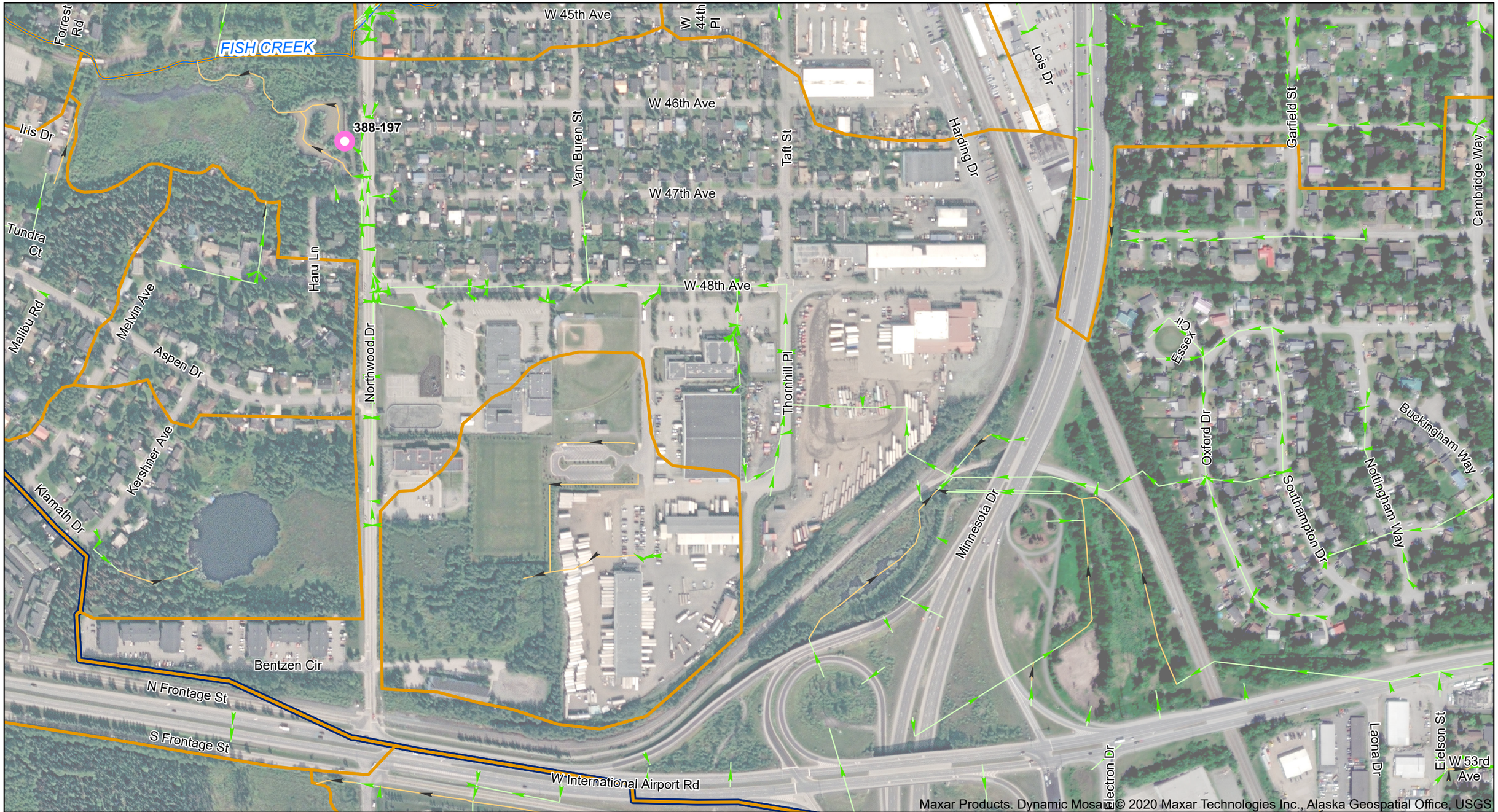
Dry Weather Screening 2025

Fish Creek and Hood Creek

Page 3 of 5

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

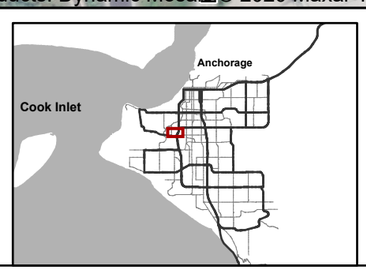
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



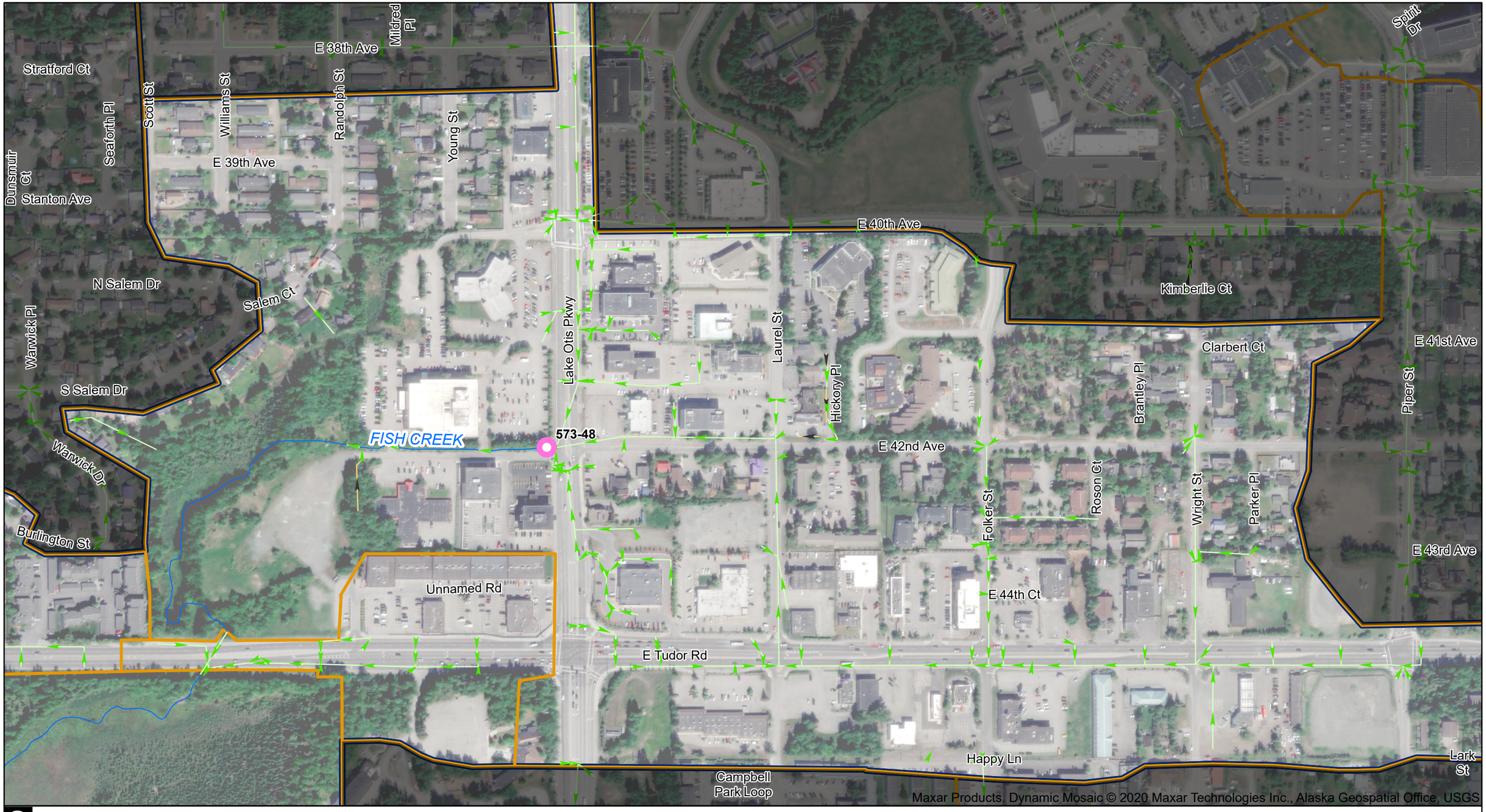
Dry Weather Screening 2025

Fish Creek and Hood Creek

Page 4 of 5

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

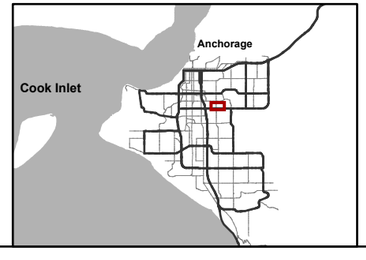
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Fish Creek and Hood Creek

Page 5 of 5

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

Minnesota Dr
O'Malley Rd
FURROW CREEK
1
2
3
1345-1
306-1
745-86
Seward Hwy
RABB/T CREEK
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LEGEND

Stream
Watershed
MS4 Subbasin

2025 Outfalls
Screened

N

0 1 Miles

Anchorage
Cook Inlet

Dry Weather Screening 2025

Furrow Creek and Rabbit Creek Overview

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

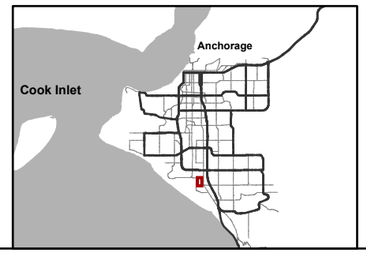
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Furrow Creek and Rabbit Creek

Page 1 of 3

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

FURROW CREEK
306-1
Briny Cir
Breakwater Cir
Harbor Cir
Lighthouse Ct
Nora Dr
Industry Way
Huffman Rd
Huffman Park Dr
Unnamed Rd
Silver Fox Ln
Old Seward Hwy
Yuna Kim Way
Bona Kim Loop
Snow Fox Ln
Brandon St
Hace St
Tanada Loop
Landmark St
Kruge Ave

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LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

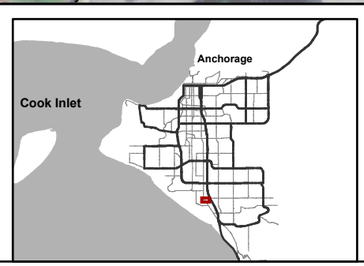
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



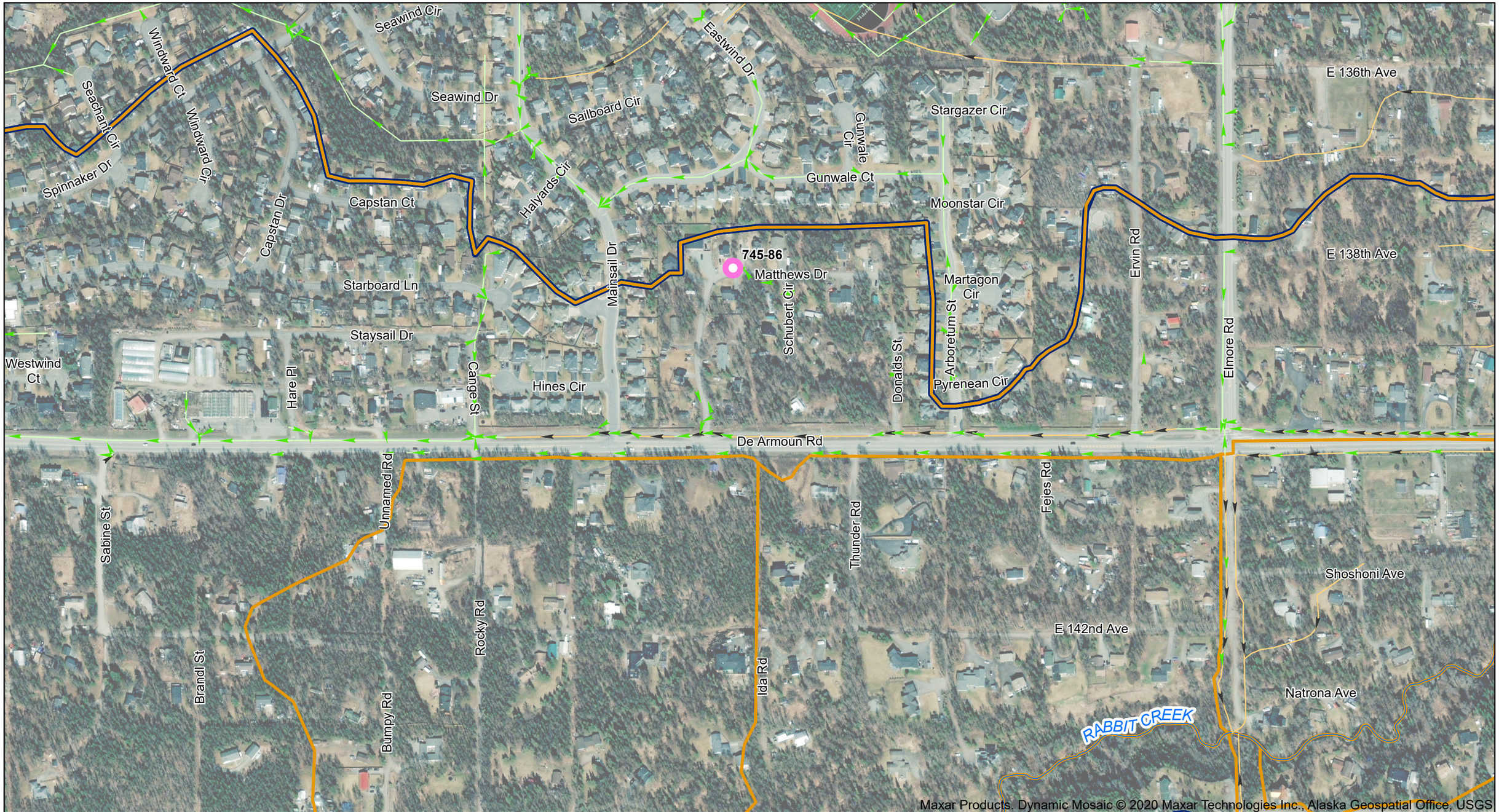
Dry Weather Screening 2025

Furrow Creek and Rabbit Creek

Page 2 of 3

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

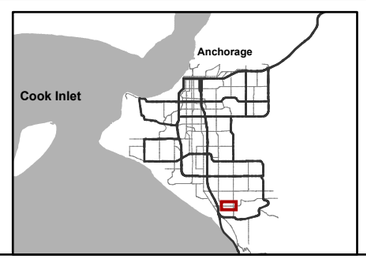
- Screened

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



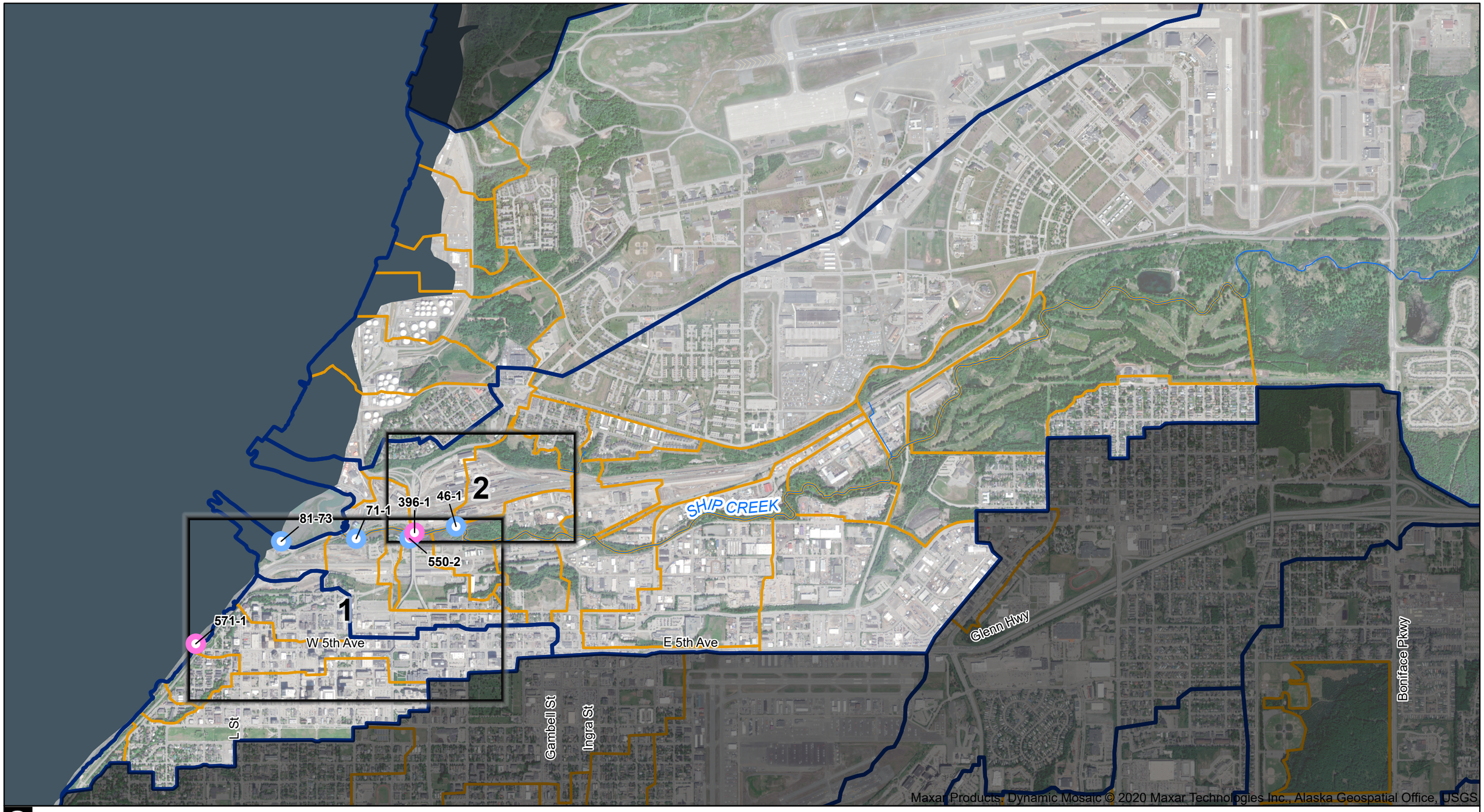
Dry Weather Screening 2025

Furrow Creek and Rabbit Creek

Page 3 of 3

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

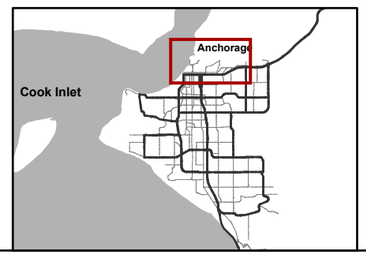
- Stream
- Watershed
- MS4 Subbasin

2025 Outfalls

- Screened
- Inaccessible

N

0 1 Miles

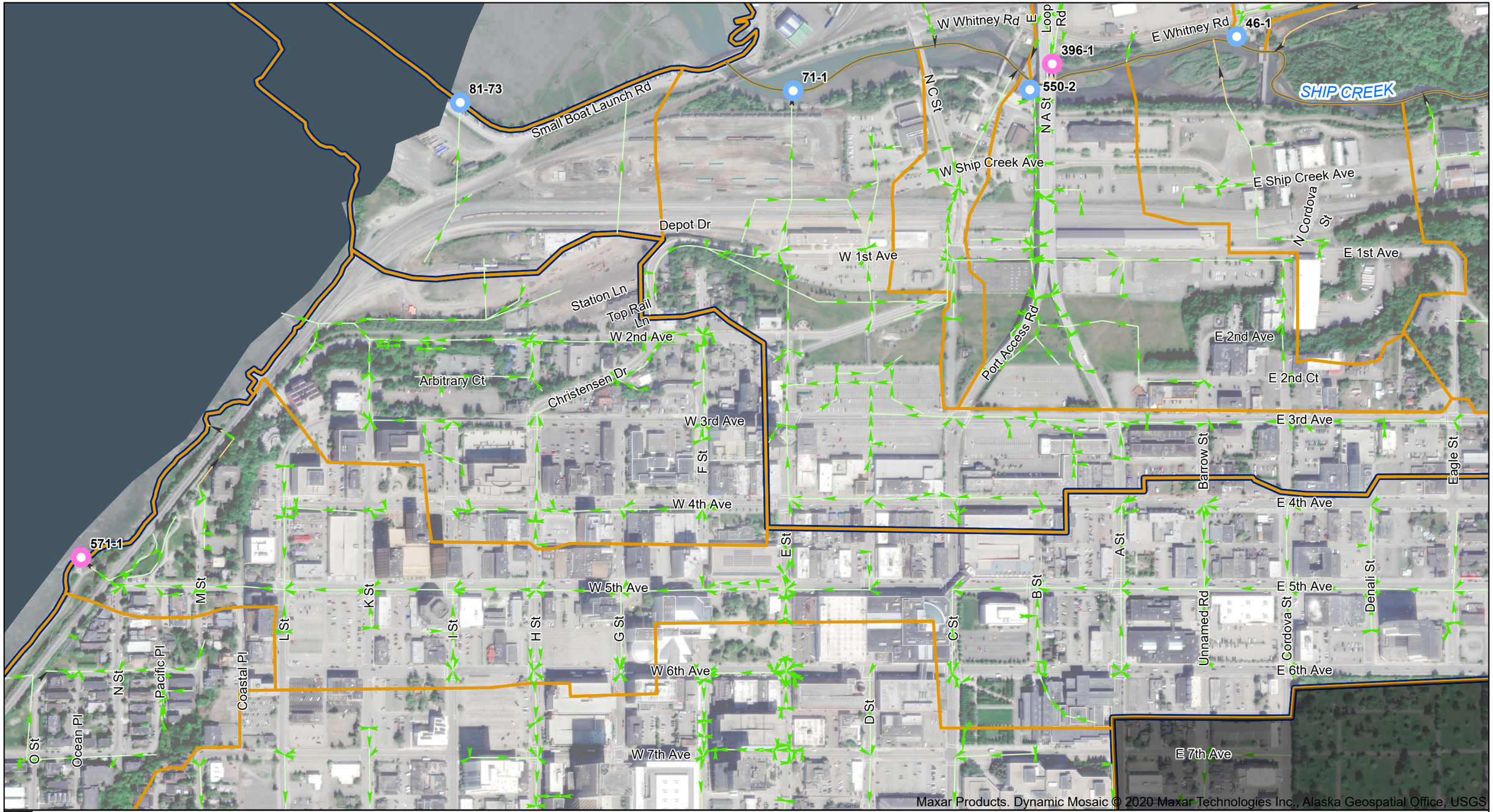


Dry Weather Screening 2025

Ship Creek Overview

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

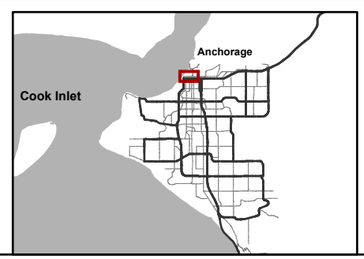
- Screened
- Inaccessible

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Ship Creek

Page 1 of 2

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025



LEGEND

- Stream
- MS4 Subbasin
- Watershed

2025 Outfalls

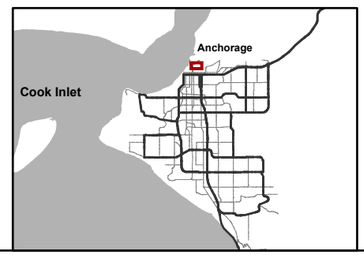
- Screened
- Inaccessible

MS4 Drainageway

- Closed Conveyance
- Open Conveyance

N

0 500 Feet



Dry Weather Screening 2025

Ship Creek

Page 2 of 2

Attempted Outfall Locations

HDR Engineering, Inc.
9/4/2025

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Appendix C

Field Data Forms

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Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Campbell Creek **Outfall Number:** 105-1

Part 1. General Information.

1. Date 6/12/2025 Time 05:50
2. Field Crew JB, MD Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 06/10 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 24" 7. Structural Condition: Good
8. Photographs (include camera name/#) Yes, iphone JB
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 3"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☑ Colored rust

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last monitored 2021 (medium flow with standing water in EOP).
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☑ Yes for Fecal coliform only

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	7.3 units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	116 NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Significant/heavy pollen buildup
Natural sheen from muck
Outfall grate partial blockage from trash and leaf litter
Temperature = 13.7°C

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Campbell Creek **Outfall Number:** 207-3

Part 1. General Information.

1. Date 7/21/25 Time 11:03
2. Field Crew CK / MZ Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 16" 7. Structural Condition: metal with collar ; good
8. Photographs (include camera name/#) CK iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 0.5"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation moss on collar 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2021, steady low flow
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

iron oxidizing bacteria in stream and outfall

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Campbell **Outfall Number:** 475-1

Part 1. General Information.

1. Date 7/2/2025 Time 11:17
2. Field Crew CK/MZ Water quality analyses conducted by ——
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 20" 7. Structural Condition: metal with metal collar
8. Photographs (include camera name/#) CK iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☐ No ☐ Yes Color? ☐ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation 13. Biology

Part 3. Field Analyses

14. Flow _____gal/min OR ☐ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2023 - poor condition & not sampled
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

organic debris buildup on collar

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: CAM **Outfall Number:** 579-1

Part 1. General Information.

1. Date 6/19/25 Time 14:30
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUL 06/10/25 08:00AM

Part 2. Visual Observations

6. End of pipe diameter 24 inches 7. Structural Condition: good ; metal
8. Photographs (include camera name/#) iPhone
9. Suitable for sampling under DWS Program? ☐ No ☒ Yes
10. Water flowing from end of pipe? ☒ No ☐ Yes If yes, depth of water in end of pipe ~~backwatered~~ 10 inches MZ-06/19/25

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☒ No ☐ Yes Color? ☒ Clear ☐ Cloudy/Muddy Clarity? ☒ Clear ☐ Colored

Floatables? ☒ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation Yes - grass ~6in in front of outfall 13. Biology None

Part 3. Field Analyses

14. ~~Flow ____ gal/min OR ☐ Low ☐ Medium ☐ High~~ standing water
15. Previous observations of baseline dry weather flow? last examined 2021, low flow, partially submerged
16. Is an illicit discharge suspected at the outfall? ☒ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Appears to be another pipe inside of this outfall.

Surrounded by lots of vegetation.

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Campbell Creek **Outfall Number:** 651-1

Part 1. General Information.

1. Date 6/12/2025 Time 10:10
2. Field Crew JB, MD Water quality analyses conducted by JB
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTVV 06/10 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 42" 7. Structural Condition: Excellent, metal
8. Photographs (include camera name/#) Iphone JB
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe 12" ~~(Backwater)~~ JB 06/13

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation NA- 13. Biology N/A

Part 3. Field Analyses

14. Flow NA gal/min OR ☐ Low ☐ Medium ☐ High and sampled in
15. Previous observations of baseline dry weather flow? examined 2021, medium flow, suspected GW influence.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Bottom of culvert above stream substrate ~12"

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: CAM **Outfall Number:** 1454-2

Part 1. General Information.

1. Date 6/19/25 Time 14:06
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 06/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 48 inches 7. Structural Condition: good ; metal with collar & grate
8. Photographs (include camera name/#) MZ iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 2 inches

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation yes 13. Biology none

Part 3. Field Analyses

14. Flow ____ gal/min OR ☐ Low ☑ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined & sampled 2021 ; no exceedances
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

moss/algae growth along collar

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: CAM **Outfall Number:** 1466-1

Part 1. General Information.

1. Date 6/19/25 Time 15:18
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 06/10/25 08:00AM

Part 2. Visual Observations

6. End of pipe diameter 18 inches 7. Structural Condition: good ; outfall built into wall (cement)
8. Photographs (include camera name/#) MZ iPhone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe ~~backwatered~~ 1 inch MZ 06/19/25

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow ~~gal/min OR ☐ Low ☐ Medium ☐ High~~ standing water
15. Previous observations of baseline dry weather flow? examined and sampled 2019. medium flow in 2019
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 3-1

Part 1. General Information.

1. Date 6/19/25 Time 11:42
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 06/10/25 08:00AM

Part 2. Visual Observations

6. End of pipe diameter 36 inches 7. Structural Condition: good ; metal with collar and grate
8. Photographs (include camera name/#) MZ iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe ~~pact watered~~ 1 inch MZ 06/19/25

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☑ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology none

Part 3. Field Analyses

14. ~~Flow gal/min OR ☐ Low ☐ Medium ☐ High~~ standing water
15. Previous observations of baseline dry weather flow? examined 2016 - no historical data
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

surface scum: pollen residues from nearby willows.

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester Creek **Outfall Number:** 4-1

Part 1. General Information.

1. Date 6/12/2025 Time 09:35
2. Field Crew JB / MD Water quality analyses conducted by JB
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTVV 06110 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 30" 7. Structural Condition: Excellent, metal pipe and collar
8. Photographs (include camera name/#) JB iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe 3"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation – NA – 13. Biology – NA –

Part 3. Field Analyses

14. Flow NA gal/min OR ☐ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined and sampled in 2021; low flow; fecal detected no exceedances
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Standing Water from University Lake

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 8b-1

Part 1. General Information.

1. Date 6/20/25 Time 13:10
2. Field Crew JB/MZ Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 6/10/25 08:00

Part 2. Visual Observations

6. End of pipe diameter 42" 7. Structural Condition: Good ; concrete
8. Photographs (include camera name/#) JB ; phone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 2"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☐ Low ☑ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined & sampled 2016; no historical data.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

- metallic smell from nearby culvert
- rust stain inside of outfall

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 489-357

Part 1. General Information.

1. Date 6/20/2025 Time 12:47
2. Field Crew MZ / JB Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00

Part 2. Visual Observations

6. End of pipe diameter 54" 7. Structural Condition: Good; concrete with concrete collar
8. Photographs (include camera name/#) JB iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 14"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2021, not sampled
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 554-2

Part 1. General Information.

1. Date 6/20/25 Time 13:31 pm
2. Field Crew JB / MZ Water quality analyses conducted by ——
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 6/10/25 08:00

Part 2. Visual Observations

6. End of pipe diameter 36" 7. Structural Condition: Good ; concrete
8. Photographs (include camera name/#) JB iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 22"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation 13. Biology

Part 3. Field Analyses

14. Flow _____gal/min OR ☐ Low ☑ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2023, not sampled.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

- large rocks in outfall

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 654-1

Part 1. General Information.

1. Date 6/20/2025 Time 12:41
2. Field Crew MZ / JB Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 6/10/25 08:00

Part 2. Visual Observations

6. End of pipe diameter 42 inches 7. Structural Condition: Good; metal with metal collar
8. Photographs (include camera name/#) JB iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 9"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☑ Colored rust

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☐ Low ☑ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined & sampled 2021 → no exceedances.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 884-1

Part 1. General Information.

1. Date 6/19/25 Time 11:58
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 18 inches 7. Structural Condition: Good ; plastic HDPE with collar
8. Photographs (include camera name/#) MZ iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☐ No ☐ Yes Color? ☐ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. ~~Flow ____ gal/min OR ☐ Low ☐ Medium ☐ High~~ standing water
15. Previous observations of baseline dry weather flow? last examined 2016 - dry
16. Is an illicit discharge suspected at the outfall? ☐ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

organic leaf build up in collar
metal grate compromised

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Chester **Outfall Number:** 1449-1

Part 1. General Information.

1. Date 6/19/25 Time 1203
2. Field Crew MZ1 CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 24 inches 7. Structural Condition: Good HDPE with collar
8. Photographs (include camera name/#) Phone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe 1.5 debris at outlet, blocking water flow

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☒ No ☐ Yes Color? ☒ Clear ☐ Cloudy/Muddy Clarity? ☒ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☑ Surface scum ☐ Soapy suds ☑ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow ~~gal/min OR ☐ Low ☐ Medium ☐ High~~ Standing water
15. Previous observations of baseline dry weather flow? last examined 2016 - no flow
16. Is an illicit discharge suspected at the outfall? ☒ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

- Surface scum = organic matter
- debris = trash
- needs maintenance

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Eagle River **Outfall Number:** 1335-1

Part 1. General Information.

1. Date 7/2/2025 Time 9:32
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 5 ft 7. Structural Condition: Good, CMP in concrete headwall with grate
8. Photographs (include camera name/#) CK iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 1 inch

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology none

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2021; medium flow
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

leaf litter and trash build up in grate; downstream of outfall are down branches

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Eagle River **Outfall Number:** 1375-1

Part 1. General Information.

1. Date 7/2/2025 Time 9:56
2. Field Crew MZ / OK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 20" 7. Structural Condition: HDPE with grate and thaw pipe
8. Photographs (include camera name/#) MZ iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☐ No ☐ Yes Color? ☐ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation none 13. Biology none

Part 3. Field Analyses

14. Flow _____gal/min OR ☐ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined and sampled 2022 - no exceedances
16. Is an illicit discharge suspected at the outfall? ☐ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

No flow

leaf litter in grate

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Eagle River **Outfall Number:** 1451-1

Part 1. General Information.

1. Date 7/21/2025 Time 09:12
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☐ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 6/10/25 08:00AM

Part 2. Visual Observations

6. End of pipe diameter 18" 7. Structural Condition: good condition plastic with collar and grate
8. Photographs (include camera name/#) CK iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 0.5 inches

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☑ Debris ☐ Other (describe) See comments

12. Vegetation None 13. Biology none

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined and sampled in 2022 - no exceedances
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

minor leaf buildup in pipe

minor trash buildup in pipe

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Fish Creek **Outfall Number:** 388-197

Part 1. General Information.

1. Date 6/20/2025 Time 11:55
2. Field Crew MZ / JB Water quality analyses conducted by JB
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUV 06/19/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 36" 7. Structural Condition: Good : HDPE with metal collar
8. Photographs (include camera name/#) JB iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 5"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☑ Colored rust

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation N/A 13. Biology N/A

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2023 - not sampled
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample		Duplicate Sample	Equipment Blank	Program Threshold
pH	7.0	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine		mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents		mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper		mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols		mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	20.1	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

- temp: 15.9° C
- heavy algae on substrate outside of outfall
- heavy pollen on surface

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Fish **Outfall Number:** 573-48

Part 1. General Information.

1. Date 7/2/2025 Time 11:34
2. Field Crew MZ/CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 42" 7. Structural Condition: good, plastic
8. Photographs (include camera name/#) CK iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 5"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation 13. Biology

Part 3. Field Analyses

14. Flow gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2022 – low flow (flow was orange)
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

- iron oxidizing bacteria in stream and outfall (orange/reddish deposits)
- newly constructed / new banks

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Fish Creek **Outfall Number:** 682-1

Part 1. General Information.

1. Date 6/12/2025 Time 10:30
2. Field Crew JB, MD Water quality analyses conducted by JB
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0-.23 inches 5. Measured at weather station KTUV 06/10 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 30" 7. Structural Condition: excellent, concrete
8. Photographs (include camera name/#) iphone (JB)
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe 2" ~~backwater~~ JB 06/13

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation - NA- 13. Biology NA

Part 3. Field Analyses

14. Flow NA gal/min OR ☐ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2021 – low flow
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Mud substrate backed up into culvert
Trash in front of outfall

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Fish **Outfall Number:** 1278-1

Part 1. General Information.

1. Date 7/21/2025 Time 11:52
2. Field Crew MZ / CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 24" 7. Structural Condition: metal with collar; good
8. Photographs (include camera name/#) CK iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☐ No ☐ Yes Color? ☐ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation 13. Biology

Part 3. Field Analyses

14. Flow _____ gal/min OR ☐ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? Jan examined 2022 – dry
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

next to weir gate

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Fish Creek **Outfall Number:** 1287-994

Part 1. General Information.

1. Date 6/12/2025 Time 11:15
2. Field Crew JB/MD Water quality analyses conducted by JB
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 06/10 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 12" 7. Structural Condition: <1" water, culvert fair, ends corroded
8. Photographs (include camera name/#) Yes iphone, JB
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe <1"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation NA 13. Biology NA

Part 3. Field Analyses

14. Flow ~~NA~~ gal/min OR ☑ Low ☐ Medium ☐ High Too low to sample
15. Previous observations of baseline dry weather flow? last examined 2021 - low flow, suspected GW influence
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☑ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Flow too low to sample

Rust/algae on substrate

Significant leaf litter buildup

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Furrow **Outfall Number:** 306-1

Part 1. General Information.

1. Date 6/19/25 Time 10:00
2. Field Crew MZ/CK Water quality analyses conducted by N/A
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 36 7. Structural Condition: good; metal
8. Photographs (include camera name/#) MZ iPhone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe <0.5inch

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☑ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2022 → low flow, organic scum & oily sheen observed.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

debris = trash at base of outfall.

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Fwyrow **Outfall Number:** 1345-1

Part 1. General Information.

1. Date 07/24/2025 Time 01:27
2. Field Crew CK JB Water quality analyses conducted by JB
3. Time since last rain event ☒ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.07 inches 5. Measured at weather station KTVA 7/21

Part 2. Visual Observations

6. End of pipe diameter 24 7. Structural Condition: good, plastic w/ plastic collar
8. Photographs (include camera name/#) iphone
9. Suitable for sampling under DWS Program? ☐ No ☒ Yes
10. Water flowing from end of pipe? ☐ No ☒ Yes If yes, depth of water in end of pipe 1"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☒ No ☐ Yes Color? ☒ Clear ☐ Cloudy/Muddy Clarity? ☒ Clear ☐ Colored

Floatables? ☒ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation N/A 13. Biology N/A

Part 3. Field Analyses

14. Flow _____ gal/min OR ☒ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2019; medium flow; no exceedances
16. Is an illicit discharge suspected at the outfall? ☒ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

very good condition, gravel in culvert.

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Hoot Creek **Outfall Number:** 502-16

Part 1. General Information.

1. Date 6/12/2025 Time 10:50
2. Field Crew JB/MD Water quality analyses conducted by JB
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 06/10 08:00AM

Part 2. Visual Observations

6. End of pipe diameter 24" 7. Structural Condition: Excelent, plastic culvert, ~4" perch
8. Photographs (include camera name/#) Yes, iphone JB
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe <1"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☐ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation 13. Biology algae (Filamentous)

Part 3. Field Analyses

14. Flow gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined and sampled 2020; no exceedances low flow.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☑ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	6.9 units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	17.2 NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

nearby Culvert on opposite side of coastal trail some distance away. Unsure if there is connection

T = 10.3°C

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Hood Creek **Outfall Number:** 609-218

Part 1. General Information.

1. Date 7/2/2025 Time 12:20
2. Field Crew MZ/CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 06/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 24" 7. Structural Condition: good; plastic with grate and collar
8. Photographs (include camera name/#) CK iPhone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 0.5"

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation 13. Biology

Part 3. Field Analyses

14. Flow _____ gal/min OR ☐ Low ☑ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2023.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

densely covered by vegetation

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Rabbit Creek **Outfall Number:** 745 - 86

Part 1. General Information.

1. Date 6/19/25 Time 9:37
2. Field Crew MZ / CK Water quality analyses conducted by N/A
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station 6/10/25 KTUU 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 14 7. Structural Condition: Good ; HDPE with collar
8. Photographs (include camera name/#) MZ iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☑ No ☐ Yes If yes, depth of water in end of pipe

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☐ Clear ☐ Cloudy/Muddy Clarity? ☐ Clear ☐ Colored N/A

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☐ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2022 ; dry
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: Ship **Outfall Number:** 396-1

Part 1. General Information.

1. Date 6/19/25 Time 12:53
2. Field Crew MZ/CK Water quality analyses conducted by —
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 08:00 AM 6/10/25

Part 2. Visual Observations

6. End of pipe diameter 36 inches 7. Structural Condition: metals, double gated
8. Photographs (include camera name/#) MZ iphone
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 4 inches

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow _____ gal/min OR ☐ Low ☑ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined and sampled 2021; no exceedances in 2021.
16. Is an illicit discharge suspected at the outfall? ☑ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

absorbant bags found in outfall

Dry Weather Screening Field Data Form

Municipality of Anchorage APDES Monitoring Program

Watershed: SHIP **Outfall Number:** 571-1

Part 1. General Information.

1. Date 6/19/25 Time 13:35
2. Field Crew MZ / CK Water quality analyses conducted by ____
3. Time since last rain event ☑ More than 48 hours ☐ Less than 48 hours
4. Size of last rain event 0.23 inches 5. Measured at weather station KTUU 6/10/25 08:00 AM

Part 2. Visual Observations

6. End of pipe diameter 24 inches 7. Structural Condition: Good ; metal
8. Photographs (include camera name/#) ____
9. Suitable for sampling under DWS Program? ☐ No ☑ Yes ____
10. Water flowing from end of pipe? ☐ No ☑ Yes If yes, depth of water in end of pipe 3 inches

If No, take photographs of outfall and record any pertinent observations in comments. If Yes, continue.

11. Does the discharging water exhibit any of the following (if yes, describe in comments):

Odors? ☑ No ☐ Yes Color? ☑ Clear ☐ Cloudy/Muddy Clarity? ☑ Clear ☐ Colored ____

Floatables? ☑ None ☐ Moving oily sheen ☐ Surface scum ☐ Soapy suds ☐ Debris ☐ Other (describe)

12. Vegetation None 13. Biology None

Part 3. Field Analyses

14. Flow ____ gal/min OR ☑ Low ☐ Medium ☐ High
15. Previous observations of baseline dry weather flow? last examined 2023 - no flow.
16. Is an illicit discharge suspected at the outfall? ☐ No ☐ Yes

If No, proceed to next outfall. If Yes, continue. Describe any additional monitoring recommendations in comments.

17. Water Quality Analyses Duplicate sample collected? ☐ No ☐ Yes

Parameter	Primary Sample	Duplicate Sample	Equipment Blank	Program Threshold
pH	units	units	units	≤ 4.0 or ≥ 9.0
Total chlorine	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Detergents	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total copper	mg/L	mg/L	mg/L	≥ 1.0 mg/L
Total phenols	mg/L	mg/L	mg/L	≥ 0.5 mg/L
Turbidity	NTU	NTU	NTU	≥ 250 NTU

Part 4. Comments

- sediment buildup in pipe
- 2 foot boulder inside pipe

Appendix D

Outfall Sampling Photographs



Campbell Creek 105-1. June 12, 2025.



Campbell Creek 207-3. July 2, 2025.



Campbell Creek 475-1. July 2, 2025.



Campbell Creek 579-1. June 19, 2025.



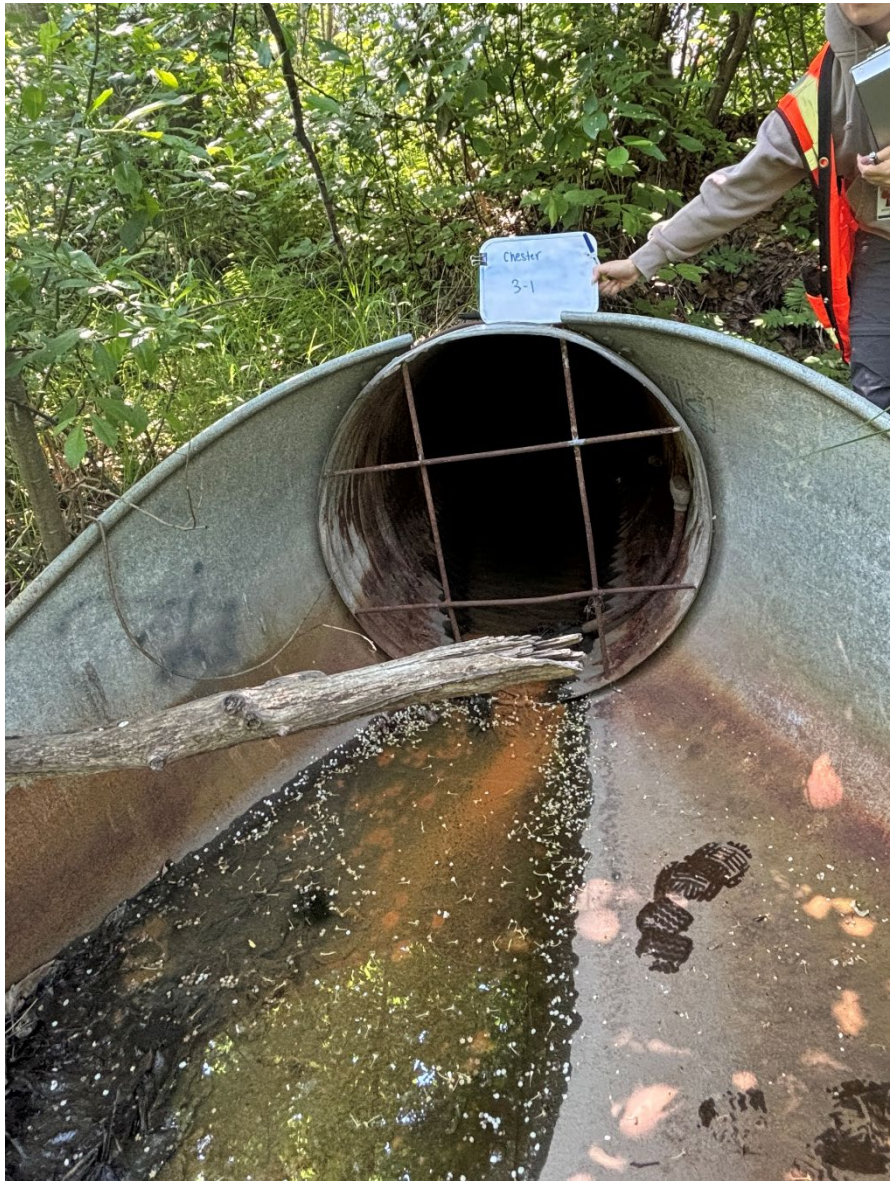
Campbell Creek 651-1. June 12, 2025.



Campbell Creek 1454-2. June 19, 2025.



Campbell Creek 1466-1. June 19, 2025.



Chester Creek 3-1. June 19, 2025.



Chester Creek 4-1. June 12, 2025.



Chester Creek 86-1. June 20, 2025.



Chester Creek 489-357. June 20, 2025.



Chester Creek 554-2. June 20, 2025.



Chester Creek 654-1. June 20, 2025.



Chester Creek 884-1. June 19, 2025.



Chester Creek 1449-1. June 19, 2025.



Eagle River 1335-1. July 2, 2025.



Eagle River 1375-1. July 2, 2025.



Eagle River 1451-1. July 2, 2025.



Fish Creek 388-197. June 20, 2025.



Fish Creek 573-48. July 2, 2025.



Fish Creek 682-1. June 12, 2025.



Fish Creek 1278-1. July 2, 2025.



Fish Creek 1287-994. June 12, 2025.



Furrow Creek 306-1. June 19, 2025.



Furrow Creek 1345-1. July 24, 2025.



Hood Creek 502-16. June 12, 2025.



Hood Creek 609-218. July 2, 2025.



Rabbit Creek 745-86. June 19, 2025.



Ship Creek 396-1. June 19, 2025.



Ship Creek 571-1. June 19, 2025.

Appendix E

Laboratory Analysis Reports

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Laboratory Report of Analysis

To: HDR Alaska, Inc.
582 E. 36th Suite 500
Anchorage, AK 99503
(907) 891-1028

Report Number: **1252732**

Client Project: **MOA Dry Weather Screening**

Dear Cindy Helmericks,

Enclosed are the results of the analytical services performed under the referenced project for the received samples and associated QC as applicable. The samples are certified to meet the requirements of the National Environmental Laboratory Accreditation Conference Standards. Copies of this report and supporting data will be retained in our files for a period of ten years in the event they are required for future reference. All results are intended to be used in their entirety and SGS is not responsible for use of less than the complete report. Any samples submitted to our laboratory will be retained for a maximum of fourteen (14) days from the date of this report unless other archiving requirements were included in the quote.

If there are any questions about the report or services performed during this project, please call Justin at (907) 562-2343. We will be happy to answer any questions or concerns which you may have.

Thank you for using SGS North America Inc. for your analytical services. We look forward to working with you again on any additional analytical needs.

Sincerely,
SGS North America Inc.

_____

Justin Nelson Date
Project Manager
Justin.Nelson@sgs.com

Case Narrative

SGS Client: **HDR Alaska, Inc.**
SGS Project: **1252732**
Project Name/Site: **MOA Dry Weather Screening**
Project Contact: **Cindy Helmericks**

Refer to sample receipt form for information on sample condition.

*QC comments may be associated with the field samples found in this report. When applicable, comments will be applied to associated field samples.

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Laboratory Qualifiers

Enclosed are the analytical results associated with the above work order. The results apply to the samples as received. All results are intended to be used in their entirety and SGS is not responsible for use of less than the complete report. This document is issued by the Company under its General Conditions of Service accessible at <http://www.sgs.com/en/Terms-and-Conditions.aspx>. Attention is drawn to the limitation of liability, indenmification and jurisdiction issues defined therein.

Any holder of this document is advised that information contained hereon reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. Any unauthorized alteration, forgery or falsification of the context or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law.

SGS maintains a formal Quality Assurance/Quality Control (QA/QC) program. A copy of our Quality Assurance Plan (QAP), which outlines this program, is available at your request. The laboratory certification numbers are AK00971 (DW Chemistry & Microbiology (Chemistry Provisional Cert for DOC/TOC SM5310B as of 5/29/25)) & 17-021 (CS) for ADEC and 2944.01 for DOD ELAP/ISO17025 (RCRA methods: 1020B, 1311, 3010A, 3050B, 3520C, 3550C, 5030B, 5035A, 6020B, 7470A, 7471B, 8015C, 8021B, 8082A, 8260D, 8270E, 8270E-SIM, 9040C, 9045D, 9056A, 9060A, AK101 and AK102/103). SGS is only certified for the analytes listed on our Drinking Water Certification (DW methods: 200.8, 2130B, 2320B, 2510B, 300.0, 4500-CN-C,E, 4500-H-B, 4500-NO3-F, 4500-P-E and 524.2) and only those analytes will be reported to the State of Alaska for compliance. Except as specifically noted, all statements and data in this report are in conformance to the provisions set forth by the SGS QAP and, when applicable, other regulatory

The following descriptors or qualifiers may be found in your report:

*	The analyte has exceeded allowable regulatory or control limits.
!	Surrogate out of control limits.
B	Indicates the analyte is found in a blank associated with the sample.
CCV/CVA/CVB	Continuing Calibration Verification
CCCV/CVC/CVCA/CVCB	Closing Continuing Calibration Verification
CL	Control Limit
DF	Analytical Dilution Factor
DL	Detection Limit (i.e., maximum method detection limit)
E	The analyte result is above the calibrated range.
GT	Greater Than
IB	Instrument Blank
ICV	Initial Calibration Verification
J	The quantitation is an estimation.
LCS(D)	Laboratory Control Spike (Duplicate)
LLQC/LLIQC	Low Level Quantitation Check
LOD	Limit of Detection (i.e., 3/4 of the LOQ)
LOQ	Limit of Quantitation (i.e., reporting or practical quantitation limit)
LT	Less Than
MB	Method Blank
MS(D)	Matrix Spike (Duplicate)
ND	Indicates the analyte is not detected.
RPD	Relative Percent Difference
TNTC	Too Numerous To Count
U	Indicates the analyte was analyzed for but not detected.

Note: Sample summaries which include a result for "Total Solids" have already been adjusted for moisture content. All DRO/RRO analyses are integrated per SOP.

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Sample Summary

Client Sample ID	Lab Sample ID	Collected	Received	Matrix
HODD502-1	1252732001	06/12/2025	06/12/2025	Water (Surface, Eff., Ground)
CMP105-1	1252732002	06/12/2025	06/12/2025	Water (Surface, Eff., Ground)
CMP105-1	1252732003	06/12/2025	06/12/2025	Water (Surface, Eff., Ground)

Method	Method Description
SM21 9222D	Fecal Coliform (MF)

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Results of **HODD502-1**

Client Sample ID: **HODD502-1**
Client Project ID: **MOA Dry Weather Screening**
Lab Sample ID: 1252732001
Lab Project ID: 1252732

Collection Date: 06/12/25 10:05
Received Date: 06/12/25 13:16
Matrix: Water (Surface, Eff., Ground)
Solids (%):
Location:

Results by **Microbiology Laboratory**

Parameter	Result	Qual	LOQ/CL	DL	LOD	Units	DF	Allowable Limits	Date Analyzed
Fecal Coliform	9.90	U	9.90	9.90	7.43	col/100mL	1		06/12/25 16:59

Batch Information

Analytical Batch: BTF21737
Analytical Method: SM21 9222D
Analyst: HBL
Analytical Date/Time: 06/12/25 16:59
Container ID: 1252732001-A

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Results of **CMP105-1**

Client Sample ID: **CMP105-1**
Client Project ID: **MOA Dry Weather Screening**
Lab Sample ID: 1252732002
Lab Project ID: 1252732

Collection Date: 06/12/25 09:10
Received Date: 06/12/25 13:16
Matrix: Water (Surface, Eff., Ground)
Solids (%):
Location:

Results by **Microbiology Laboratory**

Parameter	Result	Qual	LOQ/CL	DL	LOD	Units	DF	Allowable Limits	Date Analyzed
Fecal Coliform	250	U	250	250	188	col/100mL	1		06/12/25 16:59

Batch Information

Analytical Batch: BTF21737
Analytical Method: SM21 9222D
Analyst: HBL
Analytical Date/Time: 06/12/25 16:59
Container ID: 1252732002-A

Print Date: 06/16/2025 2:14:43PM

J flagging is activated

Results of **CMP105-1**

Client Sample ID: **CMP105-1**
Client Project ID: **MOA Dry Weather Screening**
Lab Sample ID: 1252732003
Lab Project ID: 1252732

Collection Date: 06/12/25 09:12
Received Date: 06/12/25 13:16
Matrix: Water (Surface, Eff., Ground)
Solids (%):
Location:

Results by **Microbiology Laboratory**

Parameter	Result	Qual	LOQ/CL	DL	LOD	Units	DF	Allowable Limits	Date Analyzed
Fecal Coliform	250	U	250	250	188	col/100mL	1		06/12/25 16:59

Batch Information

Analytical Batch: BTF21737
Analytical Method: SM21 9222D
Analyst: HBL
Analytical Date/Time: 06/12/25 16:59
Container ID: 1252732003-A

Print Date: 06/16/2025 2:14:43PM

J flagging is activated

Method Blank

Blank ID: MB for HBN 1913181 [BTF/21737]
Blank Lab ID: 1826225

Matrix: Water (Surface, Eff., Ground)

QC for Samples:
1252732001, 1252732002, 1252732003

Results by **SM21 9222D**

Parameter	Results	LOQ/CL	DL	LOD	Units
Fecal Coliform	1.00U	1.00	1.00	1.00	col/100mL

Batch Information

Analytical Batch: BTF21737
Analytical Method: SM21 9222D
Instrument:
Analyst: HBL
Analytical Date/Time: 6/12/2025 4:59:00PM

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1252732

SGS North America Inc.
CHAIN OF CUSTODY RECORD

SGS North America Inc.
200 West Potter Drive
Anchorage, AK 99518
engage.sgs.com
www.us.sgs.com

SGS LIMS Profile: 427671 VGSW

Instructions: Sections 1 - 5 must be filled out. Omissions may delay the onset of analysis.

Section 1

CLIENT: HDR Inc	
CONTACT: Cindy Helmericks	PHONE #:
PROJECT NAME: MOA Dry Weather Screening	Project/Permit Number:
	NPDL Number(DOD):
REPORTS TO: Cindy Helmericks	E-MAIL: cynthia.helmericks@hdrinc.com
INVOICE TO: Cindy Helmericks	QUOTE #:
	P.O. #:

Section 2

Section 3 — Preservative: Sodium Thiosulfate

RESERVED for lab use	SAMPLE IDENTIFICATION	DATE mm/dd/yy	TIME HH:MM	MATRIX/ MATRIX CODE	# CONTAINERS	Sample Type: Comp / Grab / MI	Analysis*: Fecal Coliforms	REMARKS/LOC ID
1A	HODD502-1 b	06/12/25	10:50	SW	1	G	X	
2A	CMP 105-1	06/12/25	09:10	SW	1	G	X	
3A	CMP105-1	06/12/25	09:12	SW	1	G	X	

NOTE:
*The following analyses require specific method and/or compound list: BTEX, Metals, PFAS

Comments:

Section 4

DOD Project? YES NO

Data Deliverables Requested

DataView SEDD EQUIS
Level 4 ERPIMS Other:_____

Turnaround Time Requested

Standard
Rush
Requested Rush Report Date:_____

SGS Sample Receipt (Lab Use Only)

Delivery Method: Client Commercial

Did each cooler have a corresponding COC? Yes No

Chain of Custody Seal Condition: INTACT BROKEN ABSENT

COC Seal Location(s):_____

Section 5

RELINQUISHED BY:	DATE:	TIME:	RECEIVED BY:
	6/12/25	1314	

Laboratory Use Only

Cooler ID	Temperature (°C)	Therm. ID
1. 1	0.1	DS3
2.		
3.		

If more than three coolers are received, or for documentation of non-compliant coolers, use form FS-0029.

Note: If temp. is outside 0-6° and samples were not taken <8 hours ago OR are waste samples, Client or PM should initial here or attach an email change order to proceed with analysis. If ice is present, note on form F102B.

Intials:_____

http://www.sgs.com/terms-and-conditions

SGS

1252732

SAMPLE RECEIPT FORM

Project Manager Completion				
Was all necessary information recorded on the COC upon receipt? (Temperature, COC seals, etc.?)	Yes	No	N/A	
Was temperature between 0-6° C?	Yes	No	N/A	If "No", are the samples either exempt* or sampled <8 hours prior to receipt?
Were all analyses received within holding time*?	Yes	No	N/A	
Was a method specified for each analysis, where applicable? If no, please note correct methods.	Yes	No	N/A	
Are compound lists specified, where applicable? For project specific or special compound lists please note correct analysis code.	Yes	No	N/A	
If rush was requested by the client, was the requested TAT approved?	Yes	No	N/A	If "NO", what is the approved TAT?
If SEDD Deliverables are required, were Location ID's and an NPDL Number provided?	Yes	No	N/A	*If "NO", contact client for information.*
Sample Login Completion				
Do ID's on sample containers match COC?	Yes	No	N/A	
If provided on containers, do dates/times collected match COC?	Yes	No	N/A	Note: If times differ <1 hr., record details below and login per COC.
Were all sample containers received in good condition?	Yes	No	N/A	
Were proper containers (type/mass/volume/preservative) received for all samples? **See form F-083 "Sample Guide"*	Yes	No	N/A	*Note: If 200.8/6020 Total Metals are received unpreserved, preserve, and note HNO3 lot here:* *If 200.8/6020 Dissolved Metals are received unpreserved, log in for LABFILTER and do not preserve.* *For all non-metals methods, inform Project Manager.*
Were Trip Blanks (VOC, GRO, Low-Level Hg, etc.) received with samples, where applicable*?	Yes	No	N/A	
Were all VOA vials free of headspace >6mm?	Yes	No	N/A	
Were all soil VOA samples received field extracted with Methanol?	Yes	No	N/A	
Did all soil VOA samples have an accompanying unpreserved container for % solids?	Yes	No	N/A	
If special handling is required, were containers labelled appropriately? e.g. MI/ISM, foreign soils, lab filter, Ref Lab, limited volume	Yes	No	N/A	
For Rush/Short Holding time, was the lab notified?	Yes	No	N/A	
For any question answered "NO", was the Project Manager notified?	Yes	No	N/A	PM Initials:
Was Peer Review of sample numbering/labelling completed?	Yes	No	N/A	Reviewer Initials:
Additional Notes/Clarification where Applicable, including resolution of "No" answers when a change order is not attached:				

Sample Containers and Preservatives

Container Id	Preservative	Container Condition	Container Id	Preservative	Container Condition
1252732001-A	Na2S2O3 for Chlorine Redu	OK			
1252732002-A	Na2S2O3 for Chlorine Redu	OK			
1252732003-A	Na2S2O3 for Chlorine Redu	OK			

Container Condition Glossary

Containers for bacteriological, low level mercury and VOA vials are not opened prior to analysis and will be assigned condition code OK unless evidence indicates than an inappropriate container was submitted.

OK - The container was received at an acceptable pH for the analysis requested.
BU - The container was received with headspace greater than 6mm.
DM - The container was received damaged.
FR - The container was received frozen and not usable for Bacteria or BOD analyses.
IC - The container provided for microbiology analysis was not a laboratory-supplied, pre-sterilized container and therefore was not suitable for analysis.
NC- The container provided was not preserved or was under-preserved. The method does not allow for additional preservative added after collection.
PA - The container was received outside of the acceptable pH for the analysis requested. Preservative was added upon receipt and the container is now at the correct pH. See the Sample Receipt Form for details on the amount and lot # of the preservative added.
PH - The container was received outside of the acceptable pH for the analysis requested. Preservative was added upon receipt, but was insufficient to bring the container to the correct pH for the analysis requested. See the Sample Receipt Form for details on the amount and lot # of the preservative added.
QN - Insufficient sample quantity provided.