



PROFESSIONAL SERVICES AGREEMENT
SDC1590000 – 108th Avenue NE Pipe Installation Project –
Design Services



The City of Kirkland, Washington, a municipal corporation ("City") and Stantec Consulting Services Inc, whose address is 13980 Collections Center Dr, Chicago, IL 60693 ("Consultant"), agree and contract as follows.

In consideration of the mutual benefits and conditions set forth below, the parties agree as follows:

I. SERVICES BY CONSULTANT

- A. The Consultant agrees to perform the services described in Attachment A to this Agreement, which attachment is incorporated herein by reference.
- B. All services and duties shall be conducted and performed diligently, completely and in accordance with professional standards of conduct and performance.

II. COMPENSATION

- A. The total compensation to be paid to Consultant for these services shall not exceed \$ 231,164.50, as detailed in Attachment B.
- B. Payment to Consultant by the City in accordance with the payment ceiling specified above shall be the total compensation for all services performed under this Agreement and supporting documents hereto as well as all subcontractors' fees and expenses, supervision, labor, supplies, materials, equipment or the use thereof, reimbursable expenses, and other necessary incidentals.
- C. The Consultant shall be paid on the basis of invoices submitted. Invoicing will be on the basis of percentage complete or on the basis of time, whichever is applicable in accordance with the terms of this Agreement.
- D. The City shall have the right to withhold payment to Consultant for any services not completed in a satisfactory manner until such time as Consultant modifies such services to the satisfaction of the City.
- E. Unless otherwise specified in this Agreement, any payment shall be considered timely if a warrant is mailed or is available within 45 days of the date of actual receipt by the City of an invoice conforming in all respects to the terms of this Agreement.

III. TERMINATION OF AGREEMENT

The City or the Consultant may terminate or suspend this Agreement at any time, with or without cause, by giving ten (10) days' notice to the other in writing. In the event of termination, all finished or unfinished reports, or other material prepared by the Consultant pursuant to this Agreement, shall be provided to the City. In the event the City terminates prior to completion without cause, consultant may complete such analyses and records as may be necessary to place its files in order. Consultant shall be entitled to receive just and equitable compensation for any satisfactory services completed on the project prior to the date of termination, not to exceed the payment ceiling set forth above.

IV. OWNERSHIP OF WORK PRODUCT

- A. Ownership of the originals of any reports, data, studies, surveys, charts, maps, drawings, specifications, figures, photographs, memoranda, and any other documents which are developed, compiled or produced as a result of this Agreement, whether or not completed, shall be vested in the City. Any reuse of these materials by the City for projects or purposes other than those which fall within the scope of this Agreement or the project to which it relates, without written concurrence by the Consultant will be at the sole risk of the City.
- B. The City acknowledges the Consultant's plans and specifications as instruments of professional service. Nevertheless, the plans and specifications prepared under this Agreement shall become the property of the City upon completion of the services. The City agrees to hold harmless and indemnify consultant against all claims made against Consultant for damage or injury, including defense costs, arising out of any reuse of such plans and specifications by any third party without the written authorization of the Consultant.
- C. Methodology, materials, software, logic, and systems developed under this Agreement are the property of the Consultant and the City, and may be used as either the consultant or the City sees fit, including the right to revise or publish the same without limitation.
- D. The Consultant at such times and in such forms as the City may require, shall furnish to the City such statements, records, reports, data, and information as the City may request pertaining to matters covered by this Agreement. All of the reports, information, data, and other related materials, prepared or assembled by the Consultant under this Agreement and any information relating to personal, medical, and financial data will be treated as confidential only as allowed by Washington State laws regarding disclosure of public information, Chapter 42.56 RCW

The Consultant shall at any time during normal business hours and as often as the City may deem necessary, make available for examination all of its records and data with respect to all matters covered, directly or indirectly, by this Agreement and shall permit the City or its designated authorized representative to audit and inspect other data relating to all matters covered by this Agreement. The City shall receive a copy of all audit reports made by the agency or firm as to the Consultant's activities. The City may, at its discretion, conduct an audit, at its expense, using its own or outside auditors, of the Consultant's activities which relate, directly or indirectly, to the Agreement.

Consultant will provide all original operation and maintenance manuals, along with all warranties, from the manufacturer for any equipment or items installed or supplied to the City as part of this contracted project.

The Consultant shall maintain accounts and records, including personnel, property, financial, and programmatic records, which sufficiently and properly reflect all direct and indirect costs of any nature expended and services performed pursuant to this Agreement. The Consultant shall also maintain such other records as may be deemed necessary by the City to ensure proper accounting of all funds contributed by the City to the performance of this Agreement.

The foregoing records shall be maintained for a period of seven years after termination of this Agreement unless permission to destroy them is granted by

the Office of the Archivist in accordance with RCW Chapter 40.14 and by the City.

V. GENERAL ADMINISTRATION AND MANAGEMENT

The Capital Project Engineer/ Coordinator for the City of Kirkland shall review and approve the Consultant's invoices to the City under this Agreement, shall have primary responsibility for overseeing and approving services to be performed by the Consultant, and shall coordinate all communications with the Consultant from the City.

VI. COMPLETION DATE

The estimated completion date for the Consultant's performance of the services specified in Section I is December 31st, 2026.

Consultant will diligently proceed with the services contracted for, but consultant shall not be held responsible for delays occasioned by factors beyond its control which could not reasonably have been foreseen at the time of the execution of this Agreement. If such a delay arises, Consultant shall forthwith notify the City.

VII. SUCCESSORS AND ASSIGNS

The Consultant shall not assign, transfer, convey, pledge, or otherwise dispose of this Agreement or any part of this Agreement without prior written consent of the City.

VIII. NONDISCRIMINATION

Consultant shall, in employment made possible or resulting from this Agreement, ensure that there shall be no unlawful discrimination against any employee or applicant for employment in violation of RCW 49.60.180, as currently written or hereafter amended, or other applicable law prohibiting discrimination, unless based upon a bona fide occupational qualification as provided in RCW 49.60.180 or as otherwise permitted by other applicable law. Further, no person shall be denied or subjected to discrimination in receipt of the benefit of any services or activities made possible by or resulting from this Agreement in violation of RCW 49.60.215 or other applicable law prohibiting discrimination.

IX. HOLD HARMLESS/INDEMNIFICATION

To the greatest extent allowed by law the Contractor shall defend, indemnify and hold the City, its officers, officials, employees and volunteers harmless from any and all claims, injuries, damages, losses or suits including attorney fees, arising out of or in connection with performance of this Agreement, except for injuries and damages caused by the sole negligence of the City.

Should a court of competent jurisdiction determine that this Agreement is subject to RCW 4.24.115, then, in the event of liability for damages arising out of bodily injury to persons or damages to property caused by or resulting from the concurrent negligence of the Contractor and the City, its officers, officials, employees, and volunteers, the Contractor's liability hereunder shall be only to the extent of the Contractor's negligence. It is further specifically and expressly understood that the indemnification provided herein constitutes the Contractor's waiver of immunity under Industrial Insurance, Title 51 RCW, solely for the purpose of this indemnification.

This waiver has been mutually negotiated by the parties. The provisions of this section shall survive the expiration or termination of this Agreement.

X. LIABILITY INSURANCE COVERAGE

The Consultant shall procure and maintain for the duration of the Agreement, insurance against claims for injuries to persons or damage to property which may arise from or in connection with the performance of the work hereunder by the Consultant, its agents, representatives, or employees. A failure to obtain and maintain such insurance or to file required certificates and endorsements shall be a material breach of this Agreement.

Consultant's maintenance of insurance as required by the agreement shall not be construed to limit the liability of the Consultant to the coverage provided by such insurance, or otherwise limit the City's recourse to any remedy available at law or in equity.

A. Minimum Scope of Insurance

Consultant shall obtain insurance of the types described below:

1. Automobile Liability insurance covering all owned, non-owned, hired and leased vehicles. Coverage shall be as least as broad as Insurance Services Office (ISO) form CA 00 01 or a substitute form providing equivalent liability coverage. If necessary, the policy shall be endorsed to provide contractual liability coverage.
2. Commercial General Liability insurance shall be as least as broad as ISO occurrence form CG 00 01 and shall cover liability arising from premises, operations, stop-gap independent contractors and personal injury and advertising injury. The City shall be named as an additional insured under the Consultant's Commercial General Liability insurance policy with respect to the work performed for the City using an additional insured endorsement at least as broad as ISO CG 20 26.
3. Workers' Compensation coverage as required by the Industrial Insurance laws of the State of Washington.
4. Professional Liability insurance appropriate to the Consultant's profession.

B. Minimum Amounts of Insurance

Consultant shall maintain the following insurance limits:

1. Automobile Liability insurance with a minimum combined single limit for bodily injury and property damage of \$1,000,000 per accident.
2. Commercial General Liability insurance shall be written with limits no less than \$1,000,000 each occurrence, \$2,000,000 general aggregate.
3. Professional Liability insurance shall be written with limits no less than \$1,000,000 per claim and \$1,000,000 policy aggregate limit.

C. Other Insurance Provisions

The insurance policies are to contain, or be endorsed to contain, the following provisions for Automobile Liability and Commercial General Liability insurance:

1. The Consultant's insurance coverage shall be primary insurance as respects the City. Any insurance, self-insurance, or self-insured pool coverage maintained by the City shall be excess of the Consultant's insurance and shall not contribute with it.
2. The Consultant shall provide the City and all Additional Insureds for these services with written notice of any policy cancellation, within two business days of their receipt of such notice.

D. Acceptability of Insurers

Insurance is to be placed with insurers with a current A.M. Best rating of not less than A:VII.

E. Verification of Coverage

Consultant shall furnish the City with original certificates and a copy of the amendatory endorsements, including but not necessarily limited to the additional insured endorsement, evidencing the insurance requirements of the Consultant before commencement of the services.

F. Failure to Maintain Insurance

Failure on the part of the Consultant to maintain the insurance as required shall constitute a material breach of agreement, upon which the City may, after giving five business days' notice to the Consultant to correct the breach, immediately terminate the agreement or, at its discretion, procure or renew such insurance and pay any and all premiums in connection therewith, with any sums so expended to be repaid to the City on demand, or at the sole discretion of the City, offset against funds due the Consultant from the City.

G. City Full Availability of Consultant Limits

If the Consultant maintains higher insurance limits than the minimums shown above, the City shall be insured for the full available limits of Commercial General and Excess or Umbrella liability maintained by the Consultant, irrespective of whether such limits maintained by the Consultant are greater than those required by this agreement or whether any certificate of insurance furnished to the City evidences limits of liability lower than those maintained by the Consultant.

XI. COMPLIANCE WITH LAWS/BUSINESS LICENSE

The Consultant shall comply with all applicable State, Federal, and City laws, ordinances, regulations, and codes. Consultant must obtain a City of Kirkland business license or otherwise comply with Kirkland Municipal Code Chapter 7.02.

XII. FUTURE SUPPORT

The City makes no commitment and assumes no obligations for the support of Consultant activities except as set forth in this Agreement.

XIII. INDEPENDENT CONTRACTOR

Consultant is and shall be at all times during the term of this Agreement an independent contractor and not an employee of the City. Consultant agrees that he or she is solely responsible for the payment of taxes applicable to the services performed under this Agreement and agrees to comply with all federal, state, and local laws regarding the reporting of taxes, maintenance of insurance and records, and all other requirements and obligations imposed on him or her as a result of his or her status as an independent contractor. Consultant is responsible for providing the office space and clerical support necessary for the performance of services under this Agreement. The City shall not be responsible for withholding or otherwise deducting federal income tax or social security or for contributing to the state industrial insurance or unemployment compensation programs or otherwise assuming the duties of an employer with respect to the Consultant or any employee of Consultant.

XIV. EXTENT OF AGREEMENT/MODIFICATION

This Agreement, together with all attachments and addenda, represents the final and completely integrated Agreement between the parties regarding its subject matter and supersedes all prior negotiations, representations, or agreements, either written or oral. This Agreement may be amended only by written instrument properly signed by both parties.

XV. ADDITIONAL WORK

The City may desire to have the Consultant perform work or render services in connection with the project other than provided for by the express intent of this Agreement. Any such work or services shall be considered as additional work, supplemental to this Agreement. This Agreement may be amended only by written instrument properly signed by both parties.

XVI. NON-ENDORSEMENT

As a result of the selection of a consultant to supply services to the City, the consultant agrees to make no reference to the City in any literature, promotional material, brochures, sales presentation or the like without the express written consent of the City.

XVII. NON-COLLUSION

By signature below, the Consultant acknowledges that the person, firm, association, co-partnership or corporation herein named, has not either directly or indirectly entered into any agreement, participated in any collusion, or otherwise taken any action in restraint of free competitive bidding in the preparation or submission of a proposal to the City for consideration in the award of a contract on the specifications contained in this Agreement.

XVIII. WAIVER

Waiver by the City of any breach of any term or condition of this Agreement shall not be construed as a waiver of any other breach.

XIX. ASSIGNMENT AND SUBCONTRACT


The Consultant shall not assign or subcontract any portion of the services contemplated by this Agreement without the prior written consent of the City.

XX. DEBARMENT

Recipient certifies that it is not suspended, debarred, proposed for debarment, declared ineligible or otherwise excluded from contracting with the federal government, or from receiving contracts paid for with federal funds.

IN WITNESS WHEREOF, the parties hereto have executed this Agreement on the dates written below:

CONSULTANT:


Signature: 

Printed Name: Stephen Nuss

Title: Senior Principal, Practice Leader

Date: 07/02/2025

CITY OF KIRKLAND:

Signature:  Julie Underwood (Jul 2, 2025 14:20 PDT)

Printed Name: Julie Underwood

(Type City Staff Name)

Title: Deputy City Manager

Date: 07/02/2025

**SCOPE OF WORK
CITY OF KIRKLAND****108TH AVENUE NE PIPE INSTALLATION PROJECT****DESIGN SERVICES
June 2025****General Description of Project**

Near the intersection of 108th Avenue NE and NE 120th Street in the Juanita neighborhood of Kirkland, there are three connected catch basins (Asset Numbers 1792, 8061, and 1834) that do not currently connect to a greater stormwater conveyance system and are the cause of localized flooding of a property adjacent to Asset 1792. A site visit to the location revealed that the disconnected catch basins are located at a localized low point and the natural drainage path for the surcharged facilities is directly west onto a private residential property as stated in the Request for Qualifications (RFQ).

Secondary to the concern of relieving the local drainage issue, the City desires to provide storm drainage infrastructure along NE 120th Street as there is currently no storm drain system along the dead-end road and storm water currently sheet flows to the path of least resistance. The current lack of storm drainage infrastructure does not allow for future redevelopment of any of the properties located along NE 120th Street.

Scope of Services

The following scope of services outlines the tasks associated with the design of the storm drainage improvements. In general, the Consultant will prepare construction documents for the proposed improvements and lead the permitting with support from the City. Ancillary services that will be provided by the Consultant and its subconsultants include utility locating and potholing, topographic surveying, geotechnical engineering, and arborist services.

The storm drainage improvements and restoration of features disturbed by construction of the new drainage facilities will be designed and constructed in accordance with the requirements of the 2021 King County Surface Water Design Manual (KCSWDM), the City of Kirkland Addendum to the KCSWDM, the Kirkland Municipal Code, and the current construction codes and amendments as listed on the City of Kirkland's Construction Codes web page.

Task 1 – Project Management**1.1 Design Phase Project Management**

- Prepare and communicate a Project Management Plan (PMP).
- Manage scope, budget, schedule and all tasks, staff, and subconsultants/subcontractors for design services.

- Conduct bi-weekly meetings with City regarding design progress, issues, costs, and schedule.
- Maintain change management and decision log and request amendments as necessary (up to two (2) total) for changes in City scope requirements.
- Administer monthly Consultant invoicing to City for services provided and prepare monthly Project Status Report, including budget summary, earned value reporting, change management and decision log, updated milestone schedule and project status narrative by task as required.

1.2 Kickoff Meeting

- Conduct Kickoff meeting on project site with City. Two (2) Stantec staff will attend.

1.3 Internal Kick-off Meeting and Design Team Meetings

- Conduct an internal Team Kickoff meeting and periodic design meetings to review assignments, responsibilities, expectations, and schedules and conduct periodic project team coordination meetings.

Assumptions

- Coordination with the City will be via email, virtual meetings, and telephone calls. In-person coordination meetings with the City will not be required for this task with the expectation of the Kickoff Meeting.
- Standard Microsoft Project (City Template) will be used for schedules.

City Responsibilities

- City staff at Kickoff Meeting will include City Development Services Engineer for discussion of future development considerations relative to pipe alignment.

Deliverables

- Monthly invoices with associated status reports.
- Updated project schedule at design deliverables.
- Project related correspondence.

Task 2 – Field Survey

2.1 Topographic Survey/Utility Locates and Preparation of Base Drawings

- Field topographic survey will be performed by S&F Land Services to identify existing surface conditions within the project limits including topography, pavement limits, catch basins,

manholes, water meters, hydrants, and other utility appurtenances and significant features located within the public right-of-way or an accessible easement.

- Field survey to include available underground-utility paint mark locates and surface indications of underground features (through services of a subcontractor to the Consultant) prior to topographic survey. Field survey does not include potholing underground utilities.
- Preliminary research and review of available City and utility companies' record drawings to confirm approximate locations.
- Reduce field data and prepare base drawings for design. Base drawings will be established using 1 inch = 20 feet drawing scale and will include two-foot contour intervals.
- Horizontal and vertical control will be compatible with City's current standard control network for GIS; NAD 83(1991) Horizontal datum and NAVD 88 Vertical Datum. GPS surveying methodology will be employed where practical and feasible.
- Base drawings will be developed using County Assessors map GIS boundary lines; therefore, locations of right-of-way boundaries and property lines shown on the drawings will be based on available GIS information and Stantec will not be responsible for verifying the accuracy of this information based on deeds or land exchanges.

Assumptions:

- GIS is not considered survey grade.
- Record of survey will not be required.
- Trees 6-inches diameter at breast height (DBH) or greater within the survey limits will be located and identified as evergreen or deciduous. Determining tree dripline limits is not included.
- Surveyor will develop and implement traffic control plan measures and obtain Kirkland ROW permit for survey within arterial streets requiring traffic control.
- Consultant will adhere to the City's standards for survey control and CAD deliverables.
- Monuments will not be disturbed by the design team; therefore, monument destruction forms/permits will not be required. The Contractor shall be responsible for preparing and submitting these forms should the design require, or the Contractor's work disturbs, any monuments.

City Responsibilities:

- Provide City of Kirkland with water, sewer and storm GIS maps and water grid map AutoCAD files.
- Provide copies of existing recorded easements.
- Provide relevant record drawings.

2.2 Survey of Pothole Locations

- S&F Land Services will provide survey of pothole locations identified in Task 6.

Task 3 – Design Services

3.1 Obtaining Franchise Utility Maps

- Consultants will collect all franchise utility maps from franchise utility companies for all sites for double check of the survey.

3.2 Downstream Analysis

- Gather and review utility purveyor record drawings.
- Visit site to perform field reconnaissance and to verify locations of existing features and conditions as they relate to design.
- Perform downstream analysis and calculations to confirm pipe sizing.

Deliverables:

- Downstream analysis and pipe sizing calculations (PDF)

3.3 60% Contract Documents

- Prepare 60% Contract Drawings.
- Develop plan for limited potholing of water main, water services and other impacted utilities, for purposes of design, and submit the plan to the City for review and authorization. Coordinate design potholing by Stantec's potholing subcontractor.
- Site visits to verify locations of existing features and conditions as they relate to the design.
- Prepare 60% level Contract Specifications using City's boiler plate specification. City's standard details will be included in Appendix A of the boiler plate specification.
- Prepare AACE Class 3 Opinion of Probable Construction Cost (OPCC) showing bid items, quantities, unit costs, and total probable costs for construction of proposed improvements.
- Prepare Draft Stormwater Technical Information Report (TIR).
- Conduct in-house quality assurance (QA) reviews.
- Submit 60% design drawings, design Specifications, OPCC to City for review and comment.
- Meet with City staff to discuss City's 60% review comments. Up to two (2) Stantec team members to attend.

City Responsibilities:

- Provide electronic files of the City's existing water, sewer, and storm water utility grid maps for each site in GIS or AutoCAD format (City's preference).
- Provide electronic copies (MS Word) of the City's standard boilerplate Contract Documents.
- Provide a consolidated set of written review comments on design submittals.
- Review and approve potholing plan within three weeks of submittal.

Deliverables:

- The 60% submittal will include electronic versions of the following items:
 - Design drawings (PDF)
 - Design calculation as needed.
 - Contract Specifications (PDF and Microsoft Word)
 - OPCC (PDF and Excel) AACE Class 3 with quantity take off, basis of estimate.
 - Draft Stormwater TIR (PDF)
 - Updated schedule (PDF)

3.4 90% Contract Documents

- Incorporate City's 60% design review comments into drawings, specifications, and OPCC.
- Continue coordination with subcontractor for design potholing.
- Provide final details on drawings, complete project-specific details and notes including ones pertaining to pavement restoration; and standard construction and TESC notes.
- Prepare Contract Documents. These documents will include the intended date for the bid opening and a detailed bid proposal form.
- Prepare AACE Class 2 90% OPCC.
- Prepare Final Stormwater Technical Information Report.
- Conduct in-house quality assurance (QA) reviews.
- Submit 90% Design Documents, OPCC, and updated schedule to City for review and comment.
- Meet with City staff to discuss City's 90% review comments. Up to two (2) Stantec team members to attend.

Deliverables:

- The 90% submittal will include one electronic version of the:
 - Design Drawings (PDF)
 - Contract Documents (PDF and Microsoft Word), including Appendices.
 - OPCC (PDF and Excel)
 - Final TIR (PDF)

- Updated schedule (PDF)

3.5 Final Contract Documents

- Finalize drawings and Contract Documents for bidding by incorporating City's 90% Design review comments.
- Prepare the Final stamped and signed Contract Drawings.
- Prepare the Final stamped and signed Contract Specifications.
- Prepare Final OPCC.
- Conduct in-house quality assurance (QA) reviews.
- Submit final Contract Documents and OPCC to City for bidding.

Deliverables:

- The final submittals will include one electronic copy of the Drawings, Contract Documents and OPCC:
 - Design Drawings in AutoCAD.
 - Contract Documents in Microsoft Word and PDF format, including Appendices.
 - OPCC in Microsoft Excel and PDF format together with the quantity take off.

3.6 Bidding Support Services

- Answer bidder questions during bid period, if necessary.
- Assist City in preparing bid addenda as needed for distribution to prospective bidders, if necessary (one assumed).

City Responsibilities:

- Administer the advertisement and distribution of the bid/contract documents to prospective bidders.
- Distribute addenda.
- Receive, open, and process the bids, including the preparation of the bid tabulation, reviewing the apparent low bidder references, preparing a recommendation for contract award, and awarding the contract to the lowest responsible bidder.

Assumptions:

- Construction documents will consist of plans (drawings), the City's boiler plate specifications, as modified/tailored by the Consultant for the needs of the specific construction project, and appendices containing City standard water details and project specific documents including approved permits, easement documents, studies and reports, copies of select correspondence, and traffic control plans.

- Stormwater Technical Information Report will be developed for the 2021 King County Surface Water Design Manual (KCSWDM) and the City of Kirkland Addendum to the KCSWDM.
- Downstream analysis will be a Level 2 analysis for a flow path of ¼ mile downstream of the site per the KCSWDM.
- Water quality treatment and water flow control facilities will not be required.
- Drawings will be prepared using AutoCAD/Civil 3D 2025 and meet the following standards:
 - Developed for plotting at full size (22" x 34") and half size (11" x 17"). Using the City's CAD Standards
- The Contract Specifications will be based on the City of Kirkland Utility Department's boiler plate specifications.
- Construction restoration will consist of hot mixed asphalt (HMA) patches within the traveled right of way and in-kind restoration of surface features outside the traveled right of way. The City of Kirkland's standard details will be used to restore pavement. Design of an asphalt pavement overlay to the disturbed streets is excluded from this scope of services.
- Design for replacement of any driveway, curb ramps, or sidewalks directly impacted by installation of the proposed stormwater pipeline will be per current City of Kirkland and ADA standards,
- OPCCs will be developed and will show the list of bid items and associated quantities, unit costs, and total probable costs for construction of the project. The Consultant will make reasonable efforts to provide an accurate OPCC with each submittal. However, the actual costs bid by contractors is beyond the Consultant's control and may vary significantly from Consultant's final OPCC.
 - Final Design OPCC will not include an allowance for indeterminates or contingency.
- The City shall consolidate all review comments and provide them to the Consultant via email. An Excel spreadsheet summary of consolidated City review comments will be created by the City. Consultant responses will be documented through the Excel spreadsheet summary.
- Design review meetings are assumed to be virtual.

Task 4 – Geotechnical Services

We understand that the preferred alignment consists of Route 3 as described our original proposal, where the storm line will extend from 108th Avenue NE to 106th Avenue NE via 120th Street NE. The proposed alignment is approximately 700 feet long. The majority of the alignment within NE 120th Street will be constructed with conventional cut and cover methods and the western-most 250 feet may be constructed using trenchless methods to avoid construction on the vegetated slope that is between the end of 120th Street NE and 106th Avenue NE. The slope is approximately 50 feet tall according to elevations provided by Google Earth.

4.1 Subsurface Investigation

- The proposed subsurface investigation program will include five (5) boreholes along the proposed pipeline alignment to characterize the site's subsurface conditions and estimate engineering properties of subsurface materials.

4.2 Safety Planning

- Stantec will prepare a site-specific Health and Safety Plan (HASP) for field activities in accordance with Stantec safety policy. The plan will establish key contacts, field procedures, personal protective equipment (PPE) requirements, emergency procedures, and task-specific job safety assessments (JSAs).

4.3 Utility Clearance, Permitting, and Geotechnical Investigation

A. Utility Clearance

This subtask includes locating borehole sites, clearing for utilities, and preparing the area for soil boring advancement. The components of this task are described below.

- **Site Reconnaissance.** Stantec staff will coordinate with the City through phone and email communications to identify the locations of the boreholes and will mark the locations in the field. The locations will be modified as needed for access, with City's approval.
- **Utility Clearance.** Stantec will contact Washington 811 at least 72 hours before mobilization in accordance with State law. Stantec will request the City to provide us with any available plans of underground utilities to help in clearing exploration locations. Stantec will also contract a private utility locator to check all boring locations.

B. Permitting and Traffic Control

Stantec will obtain any permits required for sample borings in the City ROW. Stantec will subcontract a traffic control subcontractor to provide traffic control plans and traffic control for borings in or adjacent to roadways.

C. Field Exploration

Stantec will conduct a field exploration program to characterize site subsurface conditions and estimate engineering properties of subsurface materials. The field exploration program will consist of five boreholes. Four of the five borings will extend to depths of 10 to 20 feet below the existing ground surface and one boring at the top of the slope will extend to a depth of 50 feet below the existing ground surface. Drilling will be performed by Holt Services.

The purpose of the boreholes will be to collect physical samples of the soils for laboratory index and strength testing, which will be used to identify physical and engineering properties of site soils. The boreholes will be advanced using mud-rotary drilling. Split-spoon sampling and Standard Penetration Testing (SPT) at 2.5-foot intervals will be conducted to a depth of 10 feet below the existing ground surface and at 5-foot intervals until termination thereafter in accordance with ASTM D1586. A maximum of two (2) relatively undisturbed thin-wall tube samples will be collected in fine-grained material for advanced laboratory testing in accordance with ASTM D1587. Field torvane/pocket penetrometer tests will be conducted on selected SPT samples and on all Shelby tube samples. Stantec has assumed that contaminated materials will not be encountered during field explorations and that screening of soil samples with an organic vapor meter (PID) will not be required.

Utility Location

The top five feet of each boring will be cleared by APS using a vacuum truck for the purpose of utility location.

Spoils from Drilling

Spoils from drilling will be drummed and disposed of offsite.

Borehole Completion

After planned termination depth, water levels will be measured with a plumb line or water level indicator. The boreholes will be backfilled upon completion in accordance with local and state regulations. Approximate borehole location coordinates will be established by Stantec using hand-held GPS equipment providing an accuracy of ± 15 feet. Borehole locations will be clearly marked for subsequent surveying by others if greater accuracy is required.

Stantec will provide full-time oversight of the field exploration program by an engineer or geologist to coordinate activities with facility personnel and to modify the field-testing program, if necessary, based on the encountered subsurface conditions. Stantec staff will log borings, direct soil sampling, and package samples for transport to the laboratory. Stantec has budgeted for a maximum of two (2) days on-site to provide field drilling and sampling oversight. Prior to the commencement of the field work, Stantec and the City will mutually agree upon the exploration locations and planned depths.

4.4 Laboratory Testing and Data Processing

A. Laboratory Testing

The samples recovered from the boreholes will be returned to our Stantec's laboratory for testing. Soil index and classification testing including moisture content, gradation (sieve and hydrometer), Atterberg Limits, and organic content will be performed where applicable. Testing on Shelby tube samples may include dry unit weight.

All samples taken for tests will be retained by the laboratory for up to 60 days after the submittal of the geotechnical report prior to disposal.

B. Field Data Processing

Stantec will prepare borehole logs, pertinent profiles, and laboratory test tabulations using the data generated by the investigation. Stantec will implement levels of Quality Assurance / Quality Control (QA/QC) appropriate to the amount of data collected during the field investigation program.5.2-
Geotechnical Engineering Analysis and Report

Stantec will prepare a Geotechnical Engineering Report (GER). The GER will present the information obtained from the field and laboratory investigation and summarize the ground conditions encountered. The report will provide Stantec's interpretation of the site stratigraphy, summarize results of engineering calculations as applicable, and provide recommendations for design and construction of the proposed infrastructure.

In general, the GER will address the following as applicable:

- Project information
- Discussion of geology and topography.
- Discussion of site stratigraphy and groundwater conditions
- Engineering Analysis / Recommendations, including:
- Evaluation of the suitability of site soils for proposed construction methods.
 - Slope stability.
 - Earthwork (site preparation, excavation, material specifications, placement and compaction requirements, re-use).
 - Miscellaneous construction considerations related to encountered subsurface conditions.
 - Recommendations for trenchless construction methods.
- Figures / Appendices
 - Aerial plan of boring locations.
 - Formal logs of boreholes.
 - Laboratory test results.

The GER will be prepared under the supervision of a licensed Professional Engineer in the State of Washington experienced in geotechnical engineering.

Assumptions:

- Only one revision of the report will be necessary to incorporate City comments.
- The Geotechnical Data Report will be included as an appendix to the Construction Documents
- Bore holes will be sealed with asphalt.

Deliverables:

- Draft Geotechnical Data Report, electronic (PDF) and Microsoft Word.

- Final Geotechnical Data Report, electronic (PDF).

Task 5 – Design Potholing

Design potholing will be performed by APS on an as-needed basis. Compensation for potholing services will be paid on a time and materials (T&M) basis based on their current rate sheet. Consultant coordination time with potholing subcontractor is included in other tasks.

- Develop permit applications, including traffic control plans, and obtain right-of-way permits from governing authority.
- Coordinate with One-Call services for locating and marking of buried utilities.
- Furnish traffic control labor and devices.
- Sawcut, core or jack hammer asphalt pavement as required.
- Pothole using hydro excavation/vactor excavation technique.
- Temporarily fill and patch holes, including cold mix patch for asphalt pavement surfaces.

Assumptions:

- The budget for this task is a placeholder dollar amount as the actual amount of required work is unknown. When needs are identified, a review of the proposed cost will be performed and communicated to the City. The initial number of potholes assumed, for purposes of establishing an initial planning level potholing budget, is five. The actual number performed may differ significantly based on the approved Potholing Plan and the factors affecting costs.
- Potholes and excavations in asphalt pavement will be backfilled with compacted crushed rock and patched with hot mix. No additional asphalt restoration will be required or installed by the Consultant except potholes within arterial streets will receive permanent HMA pavement patches per ROW permit requirements.
- Potholing will only be performed within public rights of way, easements, or City-owned properties.
- Potholing results record will include pothole designation (corresponding to number shown on design drawings), type, size, and depth of cover for each utility and thickness of pavement.
- Factors affecting costs for potholes include locations (in travel lanes vs. shoulder), local access roads vs arterial streets, type of surface (grass, dirt or gravel, asphalt, concrete, asphalt over concrete), surface restoration requirements, including temporary patch vs permanent patch. The proposed budget submitted to the City for authorization will be based on the estimated costs to implement the authorized Potholing Plan. Actual costs may vary from estimated costs based on difficulty of locating the target buried utilities.
- Utility locates and potholing are based on information available at the time the decision was made to pothole. The Consultant will develop a potholing plan that provides recommendations

on pothole locations, but the City is responsible for deciding on the final pothole locations based on its acceptance of the potholing plan. The potholing plan will be sent to the potholing Contractor and surveyor to obtain an estimate of the associated potholing costs and associated survey, mapping, and permanent asphalt patch. The potholing plan will then be modified to fit within the budget allotment, or the City will provide written authorization via the Change Management Log to address additional costs before they are incurred. The Consultant shall not be responsible if utilities are later discovered during construction that were not identified by the design phase utility locates or potholing.

City Responsibilities

- Review and approve the potholing plan and authorize the associated potholing request.

Deliverables

- Potholing Plan
- Record of Potholing results (PDF)
- Pothole pictures
- Pothole locations shown on the plan view with minimum two dimensions to surveyed surface location such as adjacent light poles, center of storm catch basin cover, manhole cover, etc.

Task 6 – Arborist Services

Arborist services will be performed by Land Meets Water. Services will include the following:

- Tree health assessments along the corridor and impacts outside of the ROW.
- Sheet sets overlaying design, tree protection, and code compliance, initial impacts at 30% Design.
- CAD of critical root zone at 30% Design.
- Draft and Final Arborist Report.

The work will comply with the City of Kirkland Municipal Code, ISA Best Practices, and ANSI A300.

Assumptions:

- Arborist will perform four site visits for tree health assessments.
- The current City of Kirkland Municipal Code will be applied to the project.
- Further work, such as permitting and construction oversight, will require additional scoping and budgeting.

City Responsibilities

- Provide any prior relevant arborist reports.

Deliverables

- Draft Arborist Report (PDF) at 60% Design submittal
- Final Arborist Report at 90% Design Submittal

Services Not Included

The following services are not a part of this Agreement. If the City chooses to add one or more of the following services to this Scope of Services, then this Agreement shall be modified in terms of an addition to the total compensation to be paid to Stantec and an appropriate extension of time (as necessary) to Stantec's schedule.

- Permit investigation and applications.
- Payment of permit fees.
- Stormwater quality or flow control design
- Stream or wetland boundary assessments, delineations, or field staking.
- Development of Critical Area Reports.
- Development of environmental permit applications.
- Underground utility potholing through concrete surfaces.
- Furnishing and placing permanent asphalt pavement patches to restore drill holes.
- Hot mix asphalt pavement grinding and overlay to restore potholed asphalt pavements.
- Distributing bid/contract document sets to prospective bidders, receiving bids, prepare bid tabulation, reviewing apparent low bidder references, and preparing recommendation for contract award.
- Public outreach services.
- Easements and related work.
- Payment for property title reports beyond the assumptions contained in this scope of services.
- Development of temporary or permanent easement exhibits.
- Development of design drawings for replacement of sidewalks, curb ramps, and driveway approaches that are not directly impacted by the project.
- Development of design drawings for moving or replacing retaining walls of any type.
- Development of traffic control plans (TCPs).
- Furnishing and placing permanent asphalt pavement patches to restore drill holes.
- Construction phase services, which are services that occur after bid opening, are not included in the scope and will be negotiated later with the City and will require a contract amendment.

END SCOPE OF SERVICES

FEE ESTIMATE - 108TH Avenue NE Pipe Installation Project

1