

то:	CHAIR AND MEMBERS CIVIC WORKS COMMITTEE MEETING ON MAY 12, 2014
FROM:	JOHN LUCAS, P. ENG. DIRECTOR OF WATER AND WASTEWATER & TREATMENT
SUBJECT:	SOUTHWEST AREA TRUNK SANITARY SEWER DETAILED DESIGN APPOINTMENT OF CONSULTING ENGINEER: PHASE 1 - WONDERLAND ROAD SOUTH (DINGMAN DRIVE TO WHARNCLIFFE ROAD SOUTH) & HAMLYN STREET (WONDERLAND ROAD SOUTH TO CAMPBELL STREET)

# **RECOMMENDATION**

That, on the recommendation of the Director of Water and Wastewater & Treatment, the following actions **BE TAKEN** with respect to the Phase 1 Southwest Area Sanitary Sewer Detailed Design (ES5260 & ES5247):

:

- (a) AECOM Canada Limited **BE APPOINTED** Consulting Engineers in the amount of \$399,926, including 10% contingency, excluding HST, based upon the Fee Guideline for Professional Engineering Services, recommended by the Ontario Society of Professional Engineers; and in accordance with Section 15.2 (e) of the City of London's Procurement of Goods and Services Policy;
- (b) the financing for the project **BE APPROVED** in accordance with the "Sources of Financing Report" <u>attached</u> hereto as Appendix "A";
- (c) the Civic Administration **BE AUTHORIZED** to undertake all the administrative acts that are necessary in connection with this project;
- (d) the approvals given herein **BE CONDITIONAL** upon the Corporation entering into a formal contract; and,
- (e) the Mayor and City Clerk **BE AUTHORIZED** to execute any contract or other documents, if required, to give effect to these recommendations.

### PREVIOUS REPORTS PERTINENT TO THIS MATTER

2014-02-03 Notice of Completion of the Southwest Area Sanitary Servicing Master Plan:

Municipal Class Environmental Assessment for the Southland Wastewater

Treatment Plan and Proposed Sanitary Servicing of the Southwest Area
(ES5260)

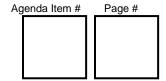
2013-02-25 Southwest Area Sanitary Servicing Master Plan: Appointment of Consulting Engineer (ES5260)

2012-12-04 Strategic Priorities and Policy Committee. Growth Management Implementation Strategy (GMIS): 2013 Annual Update and Review.

# **BACKGROUND**

### Purpose:

To retain an engineering consultant to prepare the Southwest Area Sanitary Sewer Detailed Design for Phase 1: Wonderland Road South (Dingman Drive to Wharncliffe Road South) and Hamlyn Street (Wonderland Road South to Campbell Street). These trunk sewers will ultimately service lands within the westerly portion of the Southwest Area Secondary Plan.



# **Background:**

Southwest Area Sanitary Servicing Master Plan

The Southwest Area Sanitary Servicing (SASS) Master Plan was Council Approved on February 13, 2014. The Master Plan provides a high level servicing strategy for the Lambeth, North Lambeth, North Talbot and Bostwick neighbourhoods as defined by the Southwest Area Secondary Plan (SWAP). The SASS Master Plan considered four alternatives for the sanitary servicing strategy for growth within the study area. All alternatives were evaluated in accordance with the Master Planning requirements of the Municipal Class Environmental Assessment (EA) process. This report addresses the first phase of implementing the preferred alternative of the Master Plan.

#### **Discussion:**

# **Construction Phasing of Sanitary Servicing**

The proposed trunk sewers will primarily serve future development of large areas of residential and non-residential lands within the Southwest area of the City as well as existing lands. See Appendix B for limits of design in 2014 and the current construction schedule.

# Sections 1 and 2 (SS3A & SS14A)

In accordance with the 2014 Growth Management Implementation Strategy (GMIS), the first phase of implementing the SASS Master Plan involves construction of two sections of trunk sanitary sewer:

- 1. **SS14A Wonderland Road South** (Dingman Drive to Hamlyn Street); 826 m of 1200 mm diameter sewer (ES5247)
- 2. **SS3A Hamlyn Street** (Wonderland Road South to Campbell Street); 1320 m of 825-900 mm diameter sewer (ES5260)

These two sections represent a total project length of over 2 km of sanitary sewer which will effectively connect the Lambeth, North Lambeth, North Talbot neighbourhoods to the Wonderland Pumping Station. These sewers will also allow for the opportunity for servicing the Wonderland Enterprise Corridor from approximately Dingman Drive to Exeter Road.

Two trenchless crossings are anticipated as part of the sanitary sewer alignment on Hamlyn Street: the east leg or Thornicroft Drain (located approximately 500m west of Wonderland Road) and the west leg of Tributary 'D' (located approximately 300m east of Campbell Street). Trenchless crossings were recommended in the SASS Master Plan to avoid disturbing the Natural Heritage System.

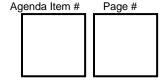
From a non-growth perspective, the trunk sewers will enable future decommissioning of the Southland Wastewater Treatment Plant (WTP), which presently has operational costs up to 13 times higher than other City of London wastewater treatment facilities and is sensitive to loading because of its small size. In the SASS Schedule B EA, this facility is recommended to be converted to a pumping station, which will outlet to the new trunk sewer on Hamlyn Street.

# Timing of Sections 1 and 2 - 2015

A sanitary sewer to serve the functions described above was previously identified as SS3A in the 2009 Sanitary Servicing Development Charge (DC) Update and Growth Management Implementation Strategy (GMIS) and scheduled for 2015. The 2014 GMIS and draft 2014 DC Background Study Update have confirmed the 2015 construction timeline.

# Section 3 (SS13B)

A third section of 825 m of 675-825 mm diameter trunk sanitary sewer on Wonderland Road South between Hamlyn Street and Wharncliffe Road South has also been included in the design of this consultant assignment. This length of sewer would further extend the availability of servicing along the Wonderland Enterprise Corridor from Exeter Road to Wharncliffe Road South.



Timing of Section 3 – 2018 (or earlier)

The section of sewer from Hamlyn Street to Wharncliffe Road South is currently scheduled for 2018 in the 2014 GMIS as part of reach SS13B; however, the timing of this sewer may be changed depending on the ability to successfully stage construction, demand within the service area, and/or budgeting within the 2015 GMIS.

The feasibility of changing the schedule of construction for this section of the Wonderland Road sewer will be assessed during the design process. Since these works were not scheduled until 2018, the design budget for this component has been sourced from SS14A (ES5247) for which there was additional available budget. The construction budget would need to be reviewed through the GMIS process.

# Other Design Elements

In addition to trunk sanitary sewer works, this assignment also involves establishing the alignment of future watermain works and road restoration. Both Wonderland Road and Hamlyn Street will maintain a rural cross section at this time. As a result, no additional storm sewers, sidewalks, or street lighting will be constructed; however, existing drainage patterns will be identified, preserved and enhanced, where possible. In addition, paved shoulders and traffic calming measures will be assessed for implementation on Hamlyn Street.

#### **Public Consultation:**

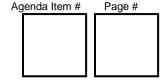
The SASS Master Plan process established the routing of the project sewers. This process included engagement of residents, local businesses, and land developers in the study area through notices, two public meetings and individual stakeholder meetings. As part of the detailed design component, appropriate notification and one public meeting is expected in Fall 2014 for affected property owners as per City Council Public Notification Policy for Construction Projects (Chapter 7).

### **Consultant Selection Process:**

The consultant selection process consisted of a two-stage process in accordance with the Procurement of Goods and Services Policy section 15.2 (e) for assignments greater than \$500,000. The first stage was an open advertised request for expressions of interest/request for qualifications using the Biddingo website. Seven submissions were submitted and evaluated by an Evaluation Team consisting of representatives from Wastewater and Drainage Engineering, Transportation and Construction Administration divisions, with the assistance of Purchasing. Three consulting firms were shortlisted and invited to submit detailed proposals for the project. The shortlisted firms responded with written proposals including a summary of the project tasks, schedule and cost estimate for the design. The Evaluation Team reviewed the consultant submissions for the project and ranked the firms based on evaluation criteria.

The Evaluation Team assessed AECOM's proposal as demonstrating a clear understanding of the project's goals and objectives. The opportunities and constraints were clearly identified along with additional measures to manage structural crossings, trenchless construction, dewatering, and agency approvals. The proposal provided a comprehensive and well thought-out design process to facilitate the successful completion of the works at the best value to the City. AECOM also has extensive background knowledge in this area through its completion of the Southwest Area Secondary Plan Background Studies for Transportation, Stormwater Management, Water and Sanitary Servicing (May 2010).

In accordance with City of London's Procurement of Goods and Services Policy, Section 15.2 (e), City staff recommend AECOM Canada Ltd., 250 York Street, Citiplaza, Suite 410, London, Ontario, N6A 6K2, be appointed the consulting engineer to complete the Southwest Area Sanitary Sewer Detailed Design for Phase 1: Wonderland Road South (Dingman Drive to Wharncliffe Road South) and Hamlyn Street (Wonderland Road South to Campbell Street).



### **Conclusions:**

The Southwest Area Sanitary Sewer Detailed Design will allow for the near term construction of the sewers which will accommodate future growth in the Lambeth, North Lambeth, North Talbot, Bostwick neighbourhoods, as well as the southerly component of the Wonderland Enterprise Corridor (SS3A and SS14A). This project will also reduce future City operating costs by providing an outlet for the Southland WTP conversion to a pumping station. The schedule for the Wonderland Trunk Sanitary Sewer (SS13B) extension from Hamlyn Street to Wharncliffe Road South will be reviewed during the detailed design stage.

It is recommended to appoint AECOM to complete Phase 1 of the Southwest Area Sanitary Sewer Detailed Design as they demonstrated the best understanding of the project area, and will provide the best value to the City.

# **Acknowledgements:**

This report was prepared within the Wastewater and Drainage Engineering Division by Erik Veittiaho, P.Eng. and Shawna Chambers, P.Eng., Environmental Services Engineer.

SUBMITTED BY:	RECOMMENDED BY:
TOM COPELAND, P. ENG. DIVISION MANAGER WASTEWATER AND DRAINAGE ENGINEERING	JOHN LUCAS, P.ENG. DIRECTOR OF WATER AND WASTEWATER & TREATMENT
REVIEWED & CONCURRED BY:	
JOHN BRAAM, P.ENG. MANAGING DIRECTOR	
ENVIRONMENTAL AND ENGINEERING SERVICES & CITY ENGINEER	

May 6, 2014

ev/scc

Attach: Appendix A – Sources of Financing

Appendix B – Figures

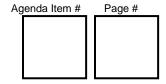
c.c. Pat Shack, Budget Analyst

Peter Christiaans, Director of Development Finance Geordie Gauld, Division Manager of Wastewater Treatment Doug MacRae, Division Manager of Transportation

Justin Lawrence, Division Manager of Construction Administration

Agenda Item #	Page #

APPENDIX A Sources of Financing



APPENDIX B
Phase 1 Design and Construction Timing

