MARKHAM

Report to: Development Services   Meeting Date: July 5, 2022

SUBJECT: Award of Proposal 080-R-21 Consulting Services – Supply,
                      Implementation and Ongoing Support of a Drupal Web
                      Development and Managed Service Solution

PREPARED BY: Rob Cole, Ext. 4868
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RECOMMENDATION:

1)   THAT the report entitled "Award of Proposal 080-R-21 Consulting Services –
        Supply, Implementation and Ongoing Support of a Drupal Web Development and
        Managed Service Solution; and,

2)   THAT the contract for Consulting Services – Supply, Implementation and Ongoing
        Support of a Drupal Web Development and Managed Service Solution (One-time -
        implementation, training and Year 1 software subscription license, hosting, support
        & maintenance) be awarded to the highest ranked/second lowest priced bidder, OPIN
        Software Inc. in the amount of $411,846.05 inclusive of HST; and,

3)   THAT a contingency in the amount of $32,947.68 inclusive of HST be established to
        cover any additional project costs, and that authorization be granted to approve
        expenditures of this contingency amount up to the specified limit in accordance with
        the Expenditure Control Policy; and,

4)   THAT the capital costs ($411,846.05 + $32,947.68) for implementation, training and
        Year-1 software subscription license, support & maintenance to the upset limit
        amount of $444,793.73 be funded from capital project 21186, Portal Platform, GL
        account 400-101-5399-21186 with an available budget of $447,700.00; and,

5)   THAT a capital budget of $150,000.00 inclusive of HST be approved to cover
        additional project costs for quality assurance and technical consulting to support the
        project implementation; and,

6)   THAT a capital budget of $130,000.00 inclusive of HST be approved to cover the
        costs of additional resources to migrate content from the existing portal to the new
        portal; and,

7)   THAT the budget shortfall in the amount of $277,093.73 ($150,000.00 + $130,000.00
        less budget remaining of $2,906.27 from Recommendation #4) in capital project
        21186 be funded from Life Cycle Replacement and Capital Reserve; and,

8)   THAT a capital budget of $203,500.00 inclusive of HST be approved to cover the
        Tivoli support for the existing portal platform for 2 years; and,

9)   That the budget for Tivoli support of the existing portal platform in the amount of $203,500.00 be funded from Ramp up Reserve; and,

10)   THAT the cost of the software subscription license, hosting, support and maintenance fee for five (5) years (2024-2028) in the amount of $638,544.00 inclusive of HST and $510,835.20 for the four (4) additional optional years (2029-2032) be funded from GL account 400-400-5361 with current annual budget of $180,306.00 and subject to Council approval of the 2023-2032 operating budgets in the amounts of;

   a. Year 2 (2024) - $ 127,708.80
   b. Year 3 (2025)   - $ 127,708.80
   c. Year 4 (2026) - $ 127,708.80
   d. Year 5 (2027) - $ 127,708.80
   e. Year 6   (2028) - $ 127,708.80
   f.   Year 7   (2029) - $ 127,708.80*
   g. Year 8   (2030) - $ 127,708.80*
   h. Year 9   (2031) - $ 127,708.80*
   i.   Year 10 (2032) - $ 127,708.80*
                  Total - $1,149,379.20

The years identified assume Year 1 maintenance begins in 2023 and is subject to change
* Optional Year Renewal

11)   THAT the Chief Information Officer and Senior Manager Procurement & Accounts Payable be authorized to execute the additional renewal years for the life cycle of the project (at the sole discretion of the City); and,

12)   THAT OPIN Software Inc be designated as the preferred vendor for the City's Drupal service needs and for Drupal hardware and software products for the term of this contract; and,

13)   THAT the purchase orders may be adjusted to acquire additional software to support growth and/or future Drupal portal platform upgrade or integration related projects, subject to the Expenditure Control Policy and budget approval; and,

14)   THAT the Chief Information Officer and Senior Manager, Procurement & Accounts Payable be authorized to approve any new purchases related to this contract needed due to growth and/or Drupal portal platform upgrade due to change in technology or system integration with other applications related to the project during the term of this contract; subject to the Expenditure Control Policy and budget approval; and,

15)   THAT Staff be authorized and directed to do all things necessary to give effect to this resolution.

PURPOSE:
The purpose of this report is to obtain approval to award the contract for "080-R-21 Consulting Services – Supply, Implementation and Ongoing Support of a Drupal Web

Development and Managed Service Solution" to the highest ranked / second priced bidder, OPIN Software Inc., for a term of six (6) years with an option to renew for an additional four (4) year term.

This award covers the work to setup, configure and host the new Drupal Content Management System (CMS) environment and to recreate the Markham.ca website on a new Drupal hosting platform. The work that OPIN will perform, will exclude the hosting of our existing portal forms (known as 'Leap' forms), which will need to be hosted on a separate platform. A separate award report will be produced to reflect any additional costs for the Portal Program (primarily the hosting of the Leap platform on HCL's cloud and any required integration back to Markham's Data Centre).

BACKGROUND:
The City's current portal system - IBM WebSphere Portal, version 8.5, is an enterprise content management software used to build and manage web portals. It provides access to web content and applications, while delivering personalized experiences for users. Since 2011, the City of Markham and the Regional Municipality of York ("Region") have been partners in the Joint Portal program, and shared a 50/50 cost sharing arrangement for the existing hosting and managed services contract with Compugen Inc.   This arrangement has reached the end of its term and the Joint Portal Hosting and Managed Services platform is well past its expected service life. York and Markham have jointly decided to exit this environment and separately seek a new platform for their respective portal environments. In addition, IBM has sold the Portal and Forms Experience Builder (FEB – now rebranded as 'Leap') software to a third party company (HCL), causing both York and Markham to seek different Content Management System platforms and options, due to the fact that some of the components that remained with IBM are no longer supported.

The Joint York-Markham Platform is hosted by Compugen and last year the Hardware was put on extended support. The manufacturer has long discontinued production and support for the hardware components, and technical support and system updates are no longer available from the manufacturer. Compugen has been forced to find hardware components on the used market from 3rd party suppliers. York Region has already moved the majority of their internal and public portals to a new Drupal platform. The current Joint contract with Compugen has been extended to April 2023. Beyond this time, it is expected that Markham will have to negotiate any further extensions to this date without York region - driving up Markham's cost of hosting our existing portal. Costs to extend the current portal beyond March 2023 have not been negotiated yet, but we do expect it to be significantly higher than what we are currently paying – given York's exit from the platform, thus increasing the urgency to move forward with this project and move off the existing platform.

If the City were to consider staying on the current platform, software and hardware upgrades would be required to maintain the status quo. This is not a recommended approach.

The Portal replacement project is a program to replace the existing City of Markham website with a new website built on a Drupal Content Management System. This program will include the following projects:

a) Recreate (Build) the new website on the Drupal Content Management system
b) A new managed platform – replacing Compugen – to host the new website
c) Rebuild of our Portlet applications to Java/JavaScript, and a new hosting environment for these applications
d) Rewrite of the Mobile application to point to the new CMS
e) Migrate the Portal (Leap) forms to a new hosting environment

This award resolves items a) and b) above. Items c) & d) will be developed in-house by our Markham ITS team. Item e) will be covered under a separate procurement process.

To facilitate the move to a new platform, the City of Markham issued an RFP to obtain proposals that will provide the City with a solution to replace the current Web Content Management System, (IBM WebSphere Portal ver. 8.5) with a Drupal CMS hosted on a cloud based platform. For clarity, the primary goal of this project is to re-create the existing City website (www.markham.ca) – as is, using Drupal with opportunities for optimization and re-architecture of the existing environment as required making the site functional and ready for future growth. The City is not seeking a re-design of the website *or* a re-branding of the website (which are both outside the scope of work of this RFP).

The scope of the issued RFP covers the underlining technology and platform change from IBM Portal Technology hosted on Compugen to a Drupal based CMS. The solution shall support the website to make it user-friendly and intuitive for City staff, residents, and business partners. The solution shall meet the City's functional and non-functional requirements and enable the City to expand the website with future functions and capabilities in a cost-effective and efficient manner. City business requirements also included support and maintenance of the system for a term of six (6) years, with an option to renew the contract for additional four (4) years

BID INFORMATION:

Bid closing date	August, 10 2021
Number picking up documents	17
Number responding to bid	7

PROPOSAL EVALUATION

The bid evaluation team was comprised of staff from ITS department, with Procurement staff acting as the facilitator. The Stage 1 technical proposals were evaluated against pre-established evaluation criteria as outlined in the RFP: 15 points for Experience and Qualification of the Bidder and Project Team; 20 points for Project Understanding, Methodology and Delivery Management; 35 points for Technical Requirements; and 30 points for Price, totaling 100 points. Staff evaluated seven (7) proposal submissions. Proponents for the top three ranked proposals were invited for demo/interview sessions.

Bidder	Total Score Technical and Financial (out of 100)	Score for Demo (Out of 10)	Final Score (Out of 110)
OPIN Software Inc.	90.79	9.64	100.43

OPIN Software Inc. ("OPIN") was the highest ranked, second lowest priced bidder. Scoring highest on its technical submission, OPIN also demonstrated a thorough understanding of the project and its requirements via the Interview and Question/Answer Segment. The City is receiving a complete solution including installation and support to ensure a successful deployment and positive transition to the new solution. OPIN's proposed solution includes: full implementation and training services, full support model of the entire solution for 10 years; local and dedicated sales and support teams; intimate customer support experience to ensure the City of Markham transitions to the new communication systems smoothly.

OPTIONS/ DISCUSSION:
The City's public facing website (www.markham.ca) is an important component of the platform supporting delivery of services to City residents and businesses. It is a critical service for City operations.

The primary objectives of this project includes (at a minimum) the following provisions:

- Professional services to re-architect, design, build, configure and re-create the City's public facing website (www.markham.ca) using the latest version of Drupal which includes but not limited to theme, look & feel, layouts, wireframes, content types, content, corporate brand, etc.

- The proposed solution's re-creation of the City's public facing website (www.markham.ca) shall include (but not limited to),
    - Web Content Accessibility Guideline 2.1 (WCAG 2.1) Level AA compliant as legislated by the Accessibility for Ontarians with Disabilities Act (AODA);
    - fully responsive and support viewing across all platforms, devices, display resolutions, browsers and browser settings, with attention paid to mobile optimization;
    - Easy to use content management system;
    - Embedding of non-text content elements such as video, maps, dashboards, etc.;
    - Optimization for performance with minimal page load times
    - Search solution with a customized search results page for the proposed solution;
    - Search Engine Optimization (SEO) shall be built using SEO best practices and industry standards for the re-created website (www.markham.ca);
    - The Search Engine is configured to crawl third-party sites used by the main site (www.markham.ca);
    - Integrates with Google Analytics and Google Tag Manager, so that City staff can obtain usage statistics;

- The proposed solution is scalable and fully redundant with improved security and high level of availability to meet dynamic business requirements and services and aligned to cloud technology;

- Content authors shall be able to enter content that can be consumed by the mobile app as well as the site in general (www.markham.ca), for example – current events, parks, etc.

The scope of this initiative also includes:
- Supply, install, configure and deploy the required Drupal platform and software subscription license, and the provision of setup, configuration, installation, system integration, data migration and functional testing of the proposed solution;
- Prepare a detailed design document and implementation strategy for solution to provide scalable and fully redundant with improved security and high level of availability to meet dynamic business requirements and services;
- Provide an Authentication and Authorization solution for both Staff and Citizens for protected areas of the site;
- Training and knowledge transfer services and develop documentation/manuals;
- Warranty, maintenance and on-going support services.

Based on these factors, staff recommends that the OPIN Software Inc. be awarded the contract 080-R-21 Consulting Services – Supply, Implementation and Ongoing Support of a Drupal Web Development and Managed Service Solution.

FINANCIAL CONSIDERATIONS
The cost of award includes 2 components:
- One-time costs - implementation, training and Year 1 software subscription license, hosting and support & maintenance;
- Recurring operating costs - starting in Year 2 for software subscription license, hosting and support & maintenance for 5 years, with an option to renew the contract for additional 4 years.

Capital Costs
The one-time cost in the amount of $444,793.73 ($411,846.05 + $32,947.68), inclusive of HST impact, will be funded from Capital Project 21186, Portal Platform, with an available budget of $447,700.00.

The project will require an additional budget over and above the award to OPIN as follows:

- Quality Assurance and Technical Consulting ($150,000 inclusive of HST)
  As the Drupal CMS will be built on a Drupal only platform, other components required for the Markham website will need to be deployed and connected to the Drupal site outside of the platform provided by OPIN. It requires a Cloud Architect who will help us configure an Amazon Web Services (AWS) cloud environment to deploy the rewritten portlet code onto a new AWS Cloud platform.

  This funding will also be used to assist ITS to connect the City's Forms Database to the back end applications housed in Markham's Data Centre. In addition, Quality Assurance (QA) testers are required to assist with AODA verification and QA testing of the new site and other functions developed by ITS. This will free up the business area's resources, allowing them to focus on other important projects.

- Content Migration ($130,000.00 inclusive of HST)

This funding is required to hire Drupal content specialists to assist the team by manually moving any content from the existing Markham website that cannot be migrated via an automated process.

- Tivoli Support ($203,500.00 inclusive of HST)
  As IBM has sold WebSphere Portal but they did not sell Tivoli Directory Services, we need to purchase support for Tivoli until the Drupal platform is implemented, which is estimated to take 2 years.

These additional items are required to increase the probability of the success of this program.

Project	Amount	
Budget Available from 21186 – Portal Platform	**$447,700.00**	(A)
One-Time Implementation, Training, Year 1 Software Subscription License, hosting and Support & Maintenance	411,846.05	(B)
Contingency (8%)	32,947.68	(C)
QA, Consulting and Content Migration	280,000.00	(D)
Tivoli Support	203,500.00	(E)
	928,293.73	(F) = (B)+(C)+(D)+(E)
Project shortfall	**(480,593.73)**	(G) = (A) - (F)

Of the budget shortfall of $480,593.73, it is recommended that 277,093.73 will be funded from the Life Cycle Replacement and Capital Reserve and $203,500.00 will be funded from the Ramp Up Reserve.

Operating Costs
The award includes services of software subscription license, hosting, support and maintenance for 5 additional years (2024-2028) and 4 optional years (2029-2032), for a total amount of $1,149,379.20, inclusive of HST impact, to be funded from GL account 400-400-5361, subject to Council approval of annual operating budget from 2024 to 2032. The terms are as follow:

	Maintenance Costs		
Year of Term*	Annual	Total Over Term	
Year 2 to 6 (2024-2028)	$127,708.80	$ 638,544.00	(H)
Year 7 to 10 (2029-2032)	$127,708.80	510,835.20	(I)
Maintenance Costs over the Term		**1,149,379.20**	(J) = (H) + (I)

*The years identified assume Year 1 maintenance begins in 2023 and is subject to change.

The Year 2 annual operating cost is $127,708.80. The ITS current operating budget for City's public facing website (www.markham.ca) is $180,306.00. The existing budget includes portal hosting (as recommended with this award) and Leap forms hosting (which is outside

of this recommendation). The remaining operating budget after this award is $52,597.20. These funds will be retained in the account to fund the cost to host the Leap forms on a separate platform, which will be awarded separately.

	Year 2 Budget Impact	
Current Annual Budget for Maintenance	$ 180,306.00	(K)
Year-2 Maintenance Cost	127,708.80	(L)
Remaining Operating Budget*	**52,597.20**	(M) = (K) - (L)

*The remaining operating budget will be retained in the account to fund the additional costs for the Portal Program (primarily the hosting of the Leap platform and any required integration back to Markham's Data Centre).

HUMAN RESOURCES CONSIDERATIONS
Not applicable

ALIGNMENT WITH STRATEGIC PRIORITIES:
Not applicable

BUSINESS UNITS CONSULTED AND AFFECTED:
Corporate Communications & Community engagement were invited in the workshops to discuss and gather their requirements prior to preparing the RFP.

RECOMMENDED BY:

Sumon Acharjee   Trinela Cane
Chief Information Officer, ITS   Commissioner, Corporate Services

ATTACHMENTS:
None