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Item No. 15.1.6
Halifax Regional Council
February 26, 2019

TO: Mayor Savage and Members of Halifax Regional Council

SUBMITTED BY: Original Signed by
Jacques Dubé, Chief Administrative Officer

DATE: February 8, 2019

SUBJECT: Cogswell Redevelopment Program- 90% Construction Design

ORIGIN

June 5, 2018 motion of Regional Council:

MOVED by Deputy Mayor Mason, seconded by Councillor Cleary that Halifax Regional Council;

1. Approve the 60% Design Plan for Cogswell District Redevelopment attached to the staff report dated May 2, 2018 as Attachment A and authorize staff to release a Request for Qualifications (RFQ) for Constructor services based on the 60% design plan.
2. Direct the Chief Administrative Officer (CAO) to complete negotiations with landowners for land associated with the proposed Granville Square, Valour Way roundabout, and the proposed park area adjacent the wastewater treatment facility.
3. Direct the CAO to complete the 90% design development and present the final detailed public realm design elements in advance of proceeding to procure Constructor services for the Redevelopment.
4. Initiate the process to consider amendments to the Downtown Halifax Municipal Planning Strategy and Land Use By-law to incorporate necessary changes to address building design requirements within the Cogswell District and follow the public participation program adopted by Council on February 25, 1997 (Attachment F) including additional public engagement to incorporate a collaborative process lead by HRM staff involving key stakeholders, the community, and potentially external design experts, that will result in recommendations for Council respecting the final district public realm design and detailed land use policy.
5. Direct the CAO to provide a report and recommendation through the Audit and Finance Standing Committee which identifies a funding source for flood mitigation measures adjacent to the Karlson's Wharf area, once project scope and budget have been finalized, such that the measures can be implemented in conjunction with the Cogswell District Redevelopment.

LEGISLATIVE AUTHORITY

Halifax Regional Municipality Charter, subsections 61 (3), 322(1), 325 (1), clause 61(5)(a) and section 233

61 (3) The property vested in the Municipality, absolutely or in trust, is under the exclusive management and control of the Council, unless an Act of the Legislature provides otherwise.
(5) The Municipality may… (b) sell property at market value when the property is no

longer required for the purposes of the Municipality;

233 (1) The Municipality may

(a) acquire and assemble land for the purpose of carrying out a development consistent with the municipal planning strategy, whether the development is to be undertaken by the Municipality or not; or

(b) by agreement with the owners of the land, acquire the right to impose easements or other development restrictions on the lands as if it had acquired the title.

(2) The Municipality may subdivide, rearrange and deal with lands described in clause (1)(a) as if it were a private owner and may sell the lands subject to any building restrictions or easements that the Council requires to ensure the development is consistent with the municipal planning strategy.

322 (1) The Council may design, lay out, open, expand, construct, maintain, improve, alter, repair, light, water, clean, and clear streets in the Municipality.

325 (1) The Council may, by policy, permanently close any street or part of a street and the Council shall hold a public hearing before passing the policy.

Administrative Order 50, the *Disposal of Surplus Real Property Administrative Order*.

RECOMMENDATION

It is recommended that Halifax Regional Council authorize the CAO to proceed with procurement of Constructor services, substantially based on the 90% construction design plan (Attachment A) with funding from Project Account CT000007 Cogswell Interchange Redevelopment, as outlined in the Financial Implications section of this report, and return to Regional Council for approval of the contract award.

BACKGROUND

On June 5, 2018, Regional Council approved the 60% design plan for redevelopment of the Cogswell District[1] and directed staff to : 1) release an RFQ for constructor services, 2) complete negotiations with landowners for required land parcels, 3) complete the 90% design and present final detailed public realm design elements to Regional Council prior to procuring Constructor services, 4) initiate an MPS/ LUB amendment process to incorporate necessary changes to building design requirements and 5) provide a report to Audit & Finance Committee identifying a funding source for flood mitigation measures.

The detailed public realm elements as reflected in the 90% construction design plan are presented in Attachment A and are summarized in the “discussion” section of this report. The following is an update on the remaining four elements of Regional Council’s direction stemming from the June 5, 2018 motion.

a) Request for Qualifications (RFQ)

A Request for Qualifications (RFQ) for Constructor Services was released on July 25, 2018. Four responses were received and evaluated. Three proponents successfully met the RFQ requirements and have been added to a constructor short list: EllisDon, Dexter Construction, and Miller Paving. They will be invited to respond to a Request for Proposal (RFP) to provide constructor services for the 90% construction design. A debrief was held with the unsuccessful proponent, ARCP Ltd.

[1] See report: https://www.halifax.ca/sites/default/files/documents/city-hall/regional-council/180605cow3.pdf

b) Land Negotiations

The Cogswell Team, in coordination with HRM Legal Services and Corporate Real Estate, have undertaken negotiations for the land acquisitions required to advance the Cogswell District Redevelopment with Halifax Water, Crombie REIT and DND. A 20-year lease has been negotiated with Halifax Water for 39,773 square feet of land adjacent to the Halifax Wastewater Treatment Facility (HWWTF) to enable development of Poplar Street Park. Negotiations with Crombie REIT for lands required to facilitate the development of Proctor Street, the Transit Hub and Granville Park are on-going as are the negotiations with Department of National Defence (DND) for lands required to enable development of the roundabout at Valour Way. Details regarding these negotiations are provided in the "Risk" section of this report.

c) Flood Mitigation- Karlson's Wharf & Upper Water Street

On November 28, 2018 a staff report was presented to the Audit & Finance Committee[2] recommending $600,000 be included in the 2020/21 capital budget for additional work to the Cogswell District Redevelopment project for flood mitigation measures near the Karlson's Wharf and Casino Nova Scotia sites. The recommendation was supported by the Audit & Finance Committee and subsequently approved by Regional Council on December 5, 2018. Based on this direction, staff will include an additional $600,000 in the 2020/21 Capital Budget for the Cogswell Redevelopment project.

d) Initiation of Downtown Halifax MPS/ LUB Amendments

A Downtown Halifax MPS/ LUB amendment process was initiated in August 2018 as part of the Cogswell 90% design outreach program. Comments were received from the public on urban design rules for new buildings within the Cogswell District and are summarized in the engagement program report. As well, many recommendations and suggestions were brought forth through the Gehl initiative which reviewed the approved 60% design plan. The specifics of the feedback through these two processes are discussed in greater detail in the next section of this report and offer a starting point for consideration and dialogue as the MPS/ LUB process continues. The MPS/ LUB process, being led by Planning and Development, will involve additional opportunities for public input as it continues. The target is to complete the process and have in place the necessary amendments pertaining to building form, design and use, well in advance of completing the construction project or the sale of the first development block.

The northern end of the project site is located within the proposed Centre Plan Package A lands. The Cogswell Team has worked closely with Planning and Development staff to ensure the proposed land use designations and zoning for the portion of the site north of Proctor Street align with the design objectives of the 90% Design Plan. Appropriate zoning provisions will be incorporated into Package A of the draft Centre Plan.

The remainder of this report discusses the 90% construction design details, the incorporation of ideas from the public and Gehl engagement sessions into the design, the construction approach, and schedule.

DISCUSSION

A. DETAILED ELEMENTS OF THE 90% CONSTRUCTION DESIGN PLAN

To facilitate development of the 90% construction design, and specifically the public realm elements within it, staff undertook an intensive public engagement program as per Regional Council's direction. The consulting firm, Fowler, Bauld and Mitchell (FBM), were engaged to assist the Cogswell team with developing and undertaking the engagement program. The program took place between August 10 and October 5, 2018 and included focus group meetings, use of the Shape Your City website, pop-up displays, a multi-day charrette and an expo, with a total of over 1500 interactions across the municipality. The focus

[2] See report at: https://www.halifax.ca/sites/default/files/documents/city-hall/standing-committees/181128afsc1241.PDF

of the engagement program was on two topics- public space design and urban design rules for new buildings. It was expected the input on public space design would be used to inform the final 90% construction design while input regarding urban design rules would provide early input into the newly initiated Downtown Halifax MPS/ LUB process. Attachment B identifies the public space opportunities in the plan that were the focus of the engagement program.

The FBM report (Attachment C) contains a summary of the engagement findings as well as the verbatim comments received through the various interactions. The process generated approximately 98 comments/ directions on design of public realm elements, 50 on building design and 25 ideas covering other topics related to transportation, phasing, community needs, consideration when selling development sites, and ongoing engagement.

The comments and input received through the public engagement program greatly influenced the 90% construction design. Nearly 80% of comments/ ideas received were incorporated in part or fully. For specific details on the public recommendations which helped to shape the plan, see Attachment D.

Gehl Report

Another significant source of input to the 90% construction design came from the Municipality's participation in an external review process carried out in partnership with the Downtown Halifax Business Commission, Develop NS, and 13 key stakeholders. Cogswell staff and WSP worked with Gehl, an external design firm, and the stakeholder group for several months on a critical review of the approved 60% design concept with the objective of identifying changes to be incorporated into the design regarding public realm and building design.

Many recommendations and suggestions from the Gehl report (Attachment E) have been incorporated in the 90% construction design. Attachment F summarizes the recommendations from the report and identifies the key elements that have been incorporated. One of the most significant changes influenced by the Gehl report is the conversion of the southern roundabout to a three-leg intersection. Staff were encouraged to re-evaluate this part of the street network based on arguments that an intersection in this location versus a roundabout would accomplish the following:

- improve the walkability of the block structure
- bring buildings closer to the street creating a better public realm
- demonstrate a concern for pedestrian movement over vehicular movement
- better enable transit priority.

By identifying "gaps" or lack of details in the 60% plan, the Gehl report served as a valuable "checklist" during the 90% design process for evaluating and confirming the assorted items being contemplated for the detailed design. The Gehl report was also instrumental in laying to rest many concerns about certain elements in the 60% design, such as proposed street widths, block sizes, and the need to accommodate truck traffic to the Port of Halifax at the south end of the Peninsula. Lastly, the Gehl report provides some very detailed recommendations regarding building form and design that should be considered through the continuing MPS/ LUB amendment process.

The Plan being presented to Regional Council takes the construction design of the project to a 90% completion level[3] and focuses on the public realm components of the project (Attachment A). The constituent components of the Plan are summarized as follows:

Accessibility

Staff are working closely with the Rick Hansen Foundation on the review of design elements in the 90% plan to determine requirements to meet the target of Gold Designation for the new neighbourhood. A preliminary assessment will be completed prior to proceeding to tender for constructor services.

[3] Minor changes to the 90% construction design may occur following staff's review of the engineering construction drawings before proceeding to tender for constructor services.

Connectivity

- 4 key connections to the Waterfront are highlighted in the 90% plan with enhanced entrances, plazas and pedestrian linkages. Dialogue continues with Develop NS and waterfront property owners regarding improvements that may be undertaken to match those being completed within the project.
- The redeveloping commercial district on Gottingen Street is connected via Cogswell Street and Barrington Street to the commercial centre downtown, mending the gap left by the interchange and creating continuous corridors of pedestrian-oriented retail.
- New pedestrian linkages are provided between the Halifax ferry terminal and Historic Properties and the transit hub through Granville Park.
- A multi-use path connects to the existing trail along Barrington Street north of the development through Poplar Park to Cogswell Street. Future opportunities may include conversion of part of the trail to a new street that connects to Albemarle Street.
- A pedestrian greenway with separated bike lanes connects existing active transportation routes at Barrington Street north of the roundabout, Brunswick Street south of Cogswell Street and Lower Water / Hollis Streets, creating a continuous active transportation network from north to south and east-west. Future improvements to Cogswell Street will complete the network to the Halifax Commons and the AT network west of the downtown.
- East-west connectivity is greatly improved through new pedestrian connections with crosswalks in several locations where there is no current connection, including:
    - Along the waterfront at Historic Properties, Bells Lane, Upper Water Street and Barrington Street, and Cornwallis Street through the roundabout.
    - An improved access with a plaza, stairway and elevator connecting Barrington Street to Upper Water Street through Granville Park.
    - A new park in the former location of Hurds Lane connects the multi-use trail to Barrington Street.
    - Street improvements along Proctor Street and Cornwallis Street enhance connectivity to the North End neighbourhood.
- The extension of Granville Mall along its historic route through Granville Park to Bells Lane.

Art & Commemoration- “Cogswell Moments”- Cultural and Interpretive Features

- Public engagement indicated a strong desire for interpretive and commemorative features to celebrate the history of the neighbourhood and its residents. Through consultation with community groups and organizations, it became clear that certain stories were under-represented and could be told effectively through the new design.
- The commemoration approach is organized as a series of “moments” throughout the community, aligned along streets, the greenways and through parks spaces, allowing residents and visitors to stop and enjoy the unique history, character and culture of the city.
- Key opportunities for commemoration include stories regarding the former neighbourhood, urban renewal, the interchange and resulting displacement of residents; the existing working wharf, DND and the former waterfront; the story of the African Nova Scotian community, with celebration of their history and culture; recognition the new community is sited on the ancestral lands of the Mi’kmaw, with recognition of their stories and celebration of culture; recognition of newcomers strengthening diversity in our community; incorporation of nature, urban agriculture and local plant communities into the streetscapes and parks; celebration of sustainability including Low Impact Development measures incorporated into the design, the district energy system and water treatment plant.
- Details regarding the specific art and commemoration ideas continue to be developed and confirmed. The Cogswell team will continue to work with the African Nova Scotian community, Mi’kmaw community, other community groups, and HRM staff to finalize the details of commemoration and public art opportunities in the District.
- Once direction is obtained from Regional Council on the 90% design, staff will commence the necessary processes to determine the official street and park names within the District.

Parks & Open Space

- The new community introduces new park space, urban plazas and greenways for the benefit of existing and future residents and visitors. Names provided are temporary, as each park will be named through a formal naming process.

Granville Park

- Granville Park is designed as an urban style square with multi-use flexibility. A variety of spaces provide opportunities for active and passive uses, gatherings, markets and festivals. It provides an important destination through historic Granville Mall and linkage between the transit hub and the waterfront ferry terminal.
- The park is laid out on the historic street grid (pre-interchange) with features that remember historic buildings and public spaces. Within the park, interactive fountains provide a destination amenity for children and adults while buffering traffic volume with white noise. A strong connection is provided to the waterfront via a broad promenade walkway with expanded crosswalks, planters and “fairy lights” which also frame and create a “front yard” for Historic Properties. A “great lawn” with a pavilion can be used for passive recreation and larger gatherings.
- A plaza with steps and terraced seating provides a direct pedestrian access to Barrington Street. An accessible route is provided through an elevator in the adjacent building that should be open at all hours, and directly along Bells Lane. The plaza provides a viewing overlook and amenity space at Barrington Street with a shelter for transit, outdoor café space, a seating planter and opportunities for historic commemoration.
- The extension of Granville Mall includes building frontage which can be activated with outdoor cafes, and seating areas with planters. A view terminus for the Mall ends at a significant piece of public art on Bells Lane. The existing traffic triangle becomes a small urban plaza between Hollis and Upper Water Street that provides an important and safe link between Granville Square and the waterfront.
- Granville Park, together with the traffic triangle, create a virtual “front lawn” to Historic Properties, Morse’s Tea building and NSCAD historic facades. Temporary closing of adjoining streets may permit larger festivals and events to occur in these spaces.

Poplar Street Park

- Poplar Street Park provides local community green space for the new District and existing neighbourhoods bordering the area.
- The northern edge of the park is part of the roundabout gateway feature, with colourful plantings and distinctive trees providing year-round identity and demarcating an entrance to the North end.
- The park has significant grade and existing trees which can be preserved and enjoyed via a walking trail. An overlook takes advantage of a view to the water and provides opportunities for commemoration.
- A large community garden provides activity and an opportunity for social interaction as well as a local food source for nearby and new residents. A fence and dense planting buffers the park from the HWWTF building. Edible plants provide additional amenity.
- The multi-use path along Poplar Street enhances connectivity and provides a recreational amenity. A small green area includes opportunities for small play features and/or passive recreation.
- North of Poplar Park, new parkland in front of the existing Spice building includes a roundabout entry plaza, continuation of the multi-use path, and landscaped green space, further enhancing this new gateway area.

Pocket Parks

- The former Hurd’s Lane provides an opportunity for a pocket park (Overlook Park) in the form of a terraced plaza providing connection between the multi-use path and Barrington Street.
- The upper plaza adjacent to the multi-use path provides an expansive view of the waterfront, with opportunities for viewing special events such as firework displays and the tall ships. Terraced steps with multiple landings integrate planters and seating; an integrated ramp between stair flights provides accessibility. The lower plaza at Barrington Street is large enough for small events and gatherings, and includes space for outdoor dining at the adjacent buildings. Adjacent building design should include active uses at the street level, and uses that look out onto the space with windows on the plaza sides.

- A visual sightline connects Overlook Park to a small green space on Upper Water Street adjacent to the municipally-owned water access and Casino Nova Scotia property. This location overlooks the water and the HMCS Scotian wharf and is an opportunity for a parkette and viewing area. The plaza design features an imprint of the historic Halifax Wharf, near this location, with concrete slab benches on the location of former wharves. Signage tells the story of the existing and former waterfront.

Greenways/ Multi-Use Path (MUP)

- The Barrington Greenway and Cogswell Greenway provide major pedestrian and active transportation connections through the community. The Cogswell Greenway is a linear park with significant amenity area along its length. The Barrington Greenway includes seating areas and parkettes to take advantage of the views and outdoor spaces. Sidewalk and a bi-directional cycle track are separated by a planted median with street trees. The sidewalk would be constructed using concrete and the cycle track using asphalt. The planted median area will have paving, sod, decorative planting or a mixture of the various materials.
- Extension of the Cogswell Greenway west of Brunswick Street to the Halifax Commons is a strong recommendation coming from the public engagement process as well as the Gehl report.
- The bikeway within the Barrington Greenway will integrate with the plan for the Hollis Street and Upper Water Street bike lanes.
- Extension of the multi-use path from Cornwallis Street to Gerrish Street can be a future consideration.

Transit Hub

- The area has been designed as a pedestrian-focused transit hub, with expansive linear canopies to provide shelter, seating and signage for pedestrians and transit users. The canopies incorporate colour, lighting and noteworthy design to create a distinctive and identifiable presence along this important streetscape and help to define this area as a transit hub.
- Bus “bays”, organized according to the nature of the route, are clearly designated by lighting and signage. Pedestrian-scale lighting enhances safety and walkability at all hours. The potential exists for indoor waiting areas in adjacent developed buildings to provide all weather shelter for transit users.
- Fixed and media signage can be incorporated into the streetscape and the shelters, with live route information and mapping.
- Special paving and flexible seating with a variety of benches and movable tables and chairs within the transit plaza will create an inviting pedestrian environment. The transit hub will have significant hard surface (paving) and provides opportunities to incorporate special paving features and interpretation of culture/ history along its length. Provision is made for bicycle movement through the plaza area connecting the Cogswell Greenway to transit amenities and Granville Park/ Bells Lane.
- Transit lanes extend along Barrington Street between Duke Street and the Upper Water Street intersection giving transit priority in this area. Transit lanes on Cogswell Street between Barrington and Gottingen Streets are being examined.
- Transit priority further north on Barrington Street can be considered in the future, subject to detailed analysis, by conversion of vehicular lanes, on a temporal or fulltime basis, as demand dictates.

Street Network

- Streets within the Cogswell District are designed to enhance vibrancy, connectivity and active transportation opportunities through implementing a variety of best practice standards for complete street design.
- Narrow lane widths calm traffic and reduce crossing distances at intersections. Lanes are 3.0m, the lowest recommended by Transportation Association of Canada (TAC) for arterial and collector roads, with curb and bus lanes at 3.6 m.
- Sidewalks are separated from traffic lanes with a 2m boulevard, incorporating a variety of streetscape measures such as street trees, street furniture and planters, decorative paving, lighting and informational signage.
- On Upper Water Street, truck traffic is accommodated while maintaining neighbourhood-scale and walkable streets.

- Based on a key recommendation of the Gehl report, the southern roundabout has been converted to an intersection. The intersection prioritizes pedestrian movement, brings the buildings closer to Barrington Street, supports regular block sizes, extends the walkable blocks northwards, and better facilitates transit priority. Land reclaimed from this design change have enlarged the development blocks as well as the size of the two pocket parks.
- A revised traffic analysis indicates the signalized intersection will operate at acceptable levels while reducing crossing distances for pedestrians and cyclists.
- The future potential for extending Poplar Street through the adjacent privately-owned Brunswick Place block is acknowledged per the Gehl report. This realignment can be considered as plans for redevelopment of Brunswick Place become known.

Streetscapes

- The district has several types of streetscapes, each with design features that help define the character of the new neighbourhood. All the street types are urban in form, with variations of hardscape and greenspace.
- All boulevards are 2m with 2-3 m wide sidewalks, except in a few areas where dimension is either constrained or expanded. Sidewalk widths have been increased on Barrington Street to support enhanced pedestrian movement along that portion of the street which may be lined with retail and café spaces.
- Boulevards have a variety of treatments depending on their context as they incorporate a variety of streetscape measures such as street trees, street furniture and planters, decorative paving, lighting and informational signage.
- Street trees will be planted in soil cells with integrated storm water management for optimum health.

Gateways

- The northern roundabout remains a key gateway into the new neighbourhood while slowing traffic entering the downtown and delineating the transition from an arterial thoroughfare to an urban street.
- Landscaping at this gateway will announce the new entrance into the downtown as well as highlight the entrance to the North End on Cornwallis Street.
- This entrance area presents a unique opportunity as a location for a signature piece of public art.

Privately Owned Public Space (POPS)

- Many divergent views were offered on whether POPS should be provided and if so how they should be used. Since they are an integral part of the design of the buildings, which will be located on the development blocks, the future inclusion of these open space features and their design will be determined through the MPS/ LUB amendment process.

B. BUILDING DESIGN

The 90% construction plan does not include design details of the buildings which will be constructed on the new development blocks. It is acknowledged the siting and design of the buildings, as well as the land uses adjacent to the public realm space (i.e. sidewalks), are critical factors in the development of the Cogswell District as a people-oriented space. Having interesting uses at grade, close to the sidewalk with variety in facade articulation, are key to creating great public space. Many suggestions regarding building design have been provided through the public engagement program (Attachment C) and the Gehl report (Attachment E). The comments and recommendations cover topics ranging from height and density, land use, accessibility, the inclusion of units for families, parking, retail use and active street facades, building setbacks, quality architecture, local retail opportunities, and privately owned public space (POPS). Affordable housing and the types of housing units that will be developed in the new neighbourhood were topics that generated a considerable amount of dialogue during both the public engagement program and the Gehl review.

The comments and recommendations regarding building design and use will be reviewed and considered through the MPS/LUB amendment process initiated for the Cogswell District. As mentioned earlier in this

report, the process is being led by Planning and Development and will involve additional opportunities for public input. The target is to complete the process well in advance of the sale of the first development block.

C. CONSTRUCTION APPROACH & EXECUTION

The construction of the Cogswell District poses several challenges which have been identified, analysed and mitigated in the production of the Proposed Construction Phasing Plan. The Plan considers such issues as truck and vehicular traffic, transit and pedestrian flow and access provisions. Also incorporated are the critical continuity of electrical, data, gas and water services to the existing downtown customers. The plan further incorporates the required environmental, site noise and dust control while providing for minimal intrusion to surrounding businesses and occupants.

Project Phasing

A high-level three phased construction staging plan has been developed which maintains key north/south and east/west connections through the project site during all stages of construction as outlined in Attachment G - Proposed Construction Staging Plan. The constructability review was carried out by a team of independent industry specialists at the site location. The review was based upon the industry accepted procedures and review processes outlined in the Ontario Ministry of Transportation's Guide for an Internal Review ("Constructability Review Process Guide, Version 2.0, dated April 2010").

Traffic Management During Construction

The proposed Construction Staging Plan will accommodate traffic through the Cogswell District with four lanes in a north-south alignment and two lanes for east-west traffic movements. Currently, it is anticipated alternate traffic routes beyond the project boundary will not be required during any stage of construction. Pedestrian traffic will principally remain with existing pedway structures and selected crossing intersections as required. CBCL, the project's traffic consultant, has analyzed and reviewed the traffic service levels for each of the three construction stages; the resultant figures are considered acceptable during all stages. The Cogswell team has coordinated with Halifax Transit with respect to the reassignment of bus routes that may be affected by the construction work. Existing routes can be facilitated with some minor route adjustments during all construction stages.

Consultants have been engaged to assist with the development of a project specific Transportation Demand Management (TDM) Plan for the Cogswell District Redevelopment. The plan will assist residents, visitors, local businesses, workers, employers and commuters that are affected by the transportation disruptions from the construction project. The Plan will support the Municipality's goal of increasing the number of trips made by active transportation, transit and ridesharing, as well as help to reduce peak hour demand, encourage off-peak travel, and encourage employers to facilitate flexible work hours and locations, and more. The TDM Plan will also be a foundation for supplementary initiatives that could support a Municipality-wide TDM program. This will also be an opportunity to revitalize and expand the breadth of the SmartTrip program to increase its utility and provide more benefits to its members. It is anticipated the TDM plan will be completed prior to the commencement of construction.

Mitigation of Construction on Surrounding Businesses

Construction activities will incorporate best management practices. The constructor once engaged, will prepare a mitigation plan as part of their construction execution plan that incorporates the requirements for site protection, hoisting, permitting, vehicle and pedestrian safety as well as noise, dust and emissions control per the Administrative Order on Construction Site Management. The construction activity and site management will be monitored to ensure the minimum standards for work within or immediately adjacent to the public Right-of-Way (ROW) or public facilities are maintained at all times.

Schedule

Following acceptance of the 90% construction design by Regional Council, staff will complete construction drawings, specifications, and requirements and work with Procurement to release a Request for Proposal (RFP) for Constructor services to the selected bidder list. It is anticipated the successful bidder will be engaged through a construction contract in fiscal Q2 2019 with construction commencing by the beginning

of fiscal Q3 2019. The Cogswell team will endeavor to ensure construction schedules are aligned with the Quinpool Bridge project to minimize disruption.

Communication
Once the Cogswell District Redevelopment construction commences, proactive and on-going communication regarding the undertaking will be critical throughout all phases. A construction mitigation communications strategy has been developed to ensure residents, visitors, property owners, stakeholders and Regional Council are well informed about the progress of the project as well as any changes to traffic, transit, and pedestrian movements through the site. Information will primarily focus on construction details/ status, timelines and detour routes. Components of the communications strategy include, but are not limited to, leveraging owned and unpaid channels (e.g. Halifax.ca website, public service announcements, social media, digital screen network, and employee intranet) as well as paid channels (e.g. traffic signage as well as advertising via print, radio, digital, social media platforms and Halifax Transit buses).

D. FUTURE PROOFING AND CONNECTIVITY TO OTHER INITIATIVES

As the Cogswell District Redevelopment design has progressed, all efforts have been made to facilitate the future incorporation of various other HRM initiatives. There are several related opportunities for precinct works, which could conceivably be executed and managed while the main Cogswell construction is undertaken but for which no approved scope or budget has been allocated. These potential precinct works, identified in Attachment H, include such aspirations as the extension of the Cogswell Street linear park/greenway and bikeway past Brunswick Street to connect with the North Park multi-use trail and entrance to the Halifax Commons, and extension and enhancements to the Transit Hub. These aspirations were identified during the public engagement program in the fall of 2018 and through the Gehl initiative. Given these opportunities have presented themselves now, staff suggest Regional Council consider including the two-additional precinct works, with supporting budget, in the Cogswell Redevelopment project. This option is presented to Regional Council as Alternative #3 in the last section of this report.

To the extent possible, accommodations will be made to facilitate “smart” features for lights, signals and additional future bus queue jump lanes should the Municipality decide to enact such strategies. Discussions are on-going with HRM Information, Communications & Technology (ICT) regarding these requirements.

In addition to the above-noted connectivity initiatives, Halifax Water is considering the establishment of a District Energy System as a regulated service in conformance with the *Public Utilities Act* as part of the redevelopment project. The decision to proceed will be based on the financial viability of the project and subject to the approval of the Halifax Water Board and Nova Scotia Utility and Review Board. Halifax Water has completed the design of linear system components in step with the completion of the 90% design milestone.

The use of district energy to heat sidewalks within the Cogswell District has been analyzed by Halifax Water. It has been determined the capital and operating costs of such a system is prohibitively high when compared to conventional construction and snow removal techniques. The cost for conventional maintenance of new sidewalks being created within the Cogswell District is estimated to be a $124,000 per year while the cost for heating the sidewalks using district energy is 5-7 times higher.

FINANCIAL IMPLICATIONS

A Class “B” estimate has been prepared by professional cost consultants providing the most up to date and accurate statement of the anticipated project cost. A Class “B” estimate is accurate to within +/- 10%. The estimated project cost has increased from that presented in 2014; this was expected as the design proceeded through progressively more detailed phases. The Class B estimate, however, does provide staff and Regional Council with many more details and hence greater certainty of the costs associated with the project.

Colliers International provided a real estate market assessment report as a component of the 2014 staff report which detailed the potential utilization and value of the newly created development blocks. To ensure market viability of the project, staff engaged Colliers International for two updates to the market assessment as the design progressed from 30% completion to 60% completion. The latest assessment completed in April 2018 indicates the value of the proposed development blocks has increased substantially over the 2014 assessment. The report also speaks to market absorption and timing of release of the new lots. The intention is to release the development blocks at strategic times to ensure quality development and to not detrimentally impact the overall market. Buyback agreements will be utilized to ensure the development blocks, when sold, are developed within a reasonable timeframe.

Based on the most recent cost estimate and real estate market assessment, it is estimated the redevelopment project can be funded 90%-93% from the sale of the development blocks alone, excluding property taxes that will accrue from them. The detailed cost of demolition, reconstruction of municipal infrastructure and public realm components associated with the Cogswell District can be found in the Private and Confidential Information Report dated February 5, 2019, along with the latest estimate of resulting revenues from the disposal of the newly created lots.

It is important to note the existing Cogswell Interchange infrastructure is an aging asset. The existing bridge, overpass and retaining wall structures are over 50 years old. Basic inspections and state of good repair efforts are expected to cost approximately $3,350,000 over the next 15 years. This figure does not include life-cycle analysis and replacement costs for these aging structures. The average life expectancy of such structures is 75 years.

Cogswell District Redevelopment Funding Options

Staff have looked at numerous funding options, including a jurisdictional scan of other municipalities that are involved in selling land for development purposes. There are essentially three models that are available:

1. Sale of Fee Simple Interest
2. Ground lease (or head lease)
3. Hybrid of sale and ground lease

Each model has advantages and disadvantages associated with it.

Option 1 – Sale of Fee Simple Interest

The sale of fee simple interest is very straight forward as the land is placed on the open market, either through a broker, an RFP process, or staff may handle the transaction in house. This tends to yield the highest value because there is no risk to the buyer in this model. The agreed upon price is based on fair market value and what the market is willing to bear at that time. The cash payment is generally received as a one- time payment and results in a direct cash infusion. Pursuant to section 120(3)(a) of the *Halifax Regional Municipality Charter,* the proceeds from the sale must go into the capital reserve account.

The disadvantage of this method is the municipality relinquishes any rights to the land (barring buy-back agreements and right of first refusals). Another disadvantage is the impact of market conditions on the ability to sell the land. If a sale were to occur when there is a down turn in the economy, the Municipality may not receive the full economic benefit of the land, should it not have the ability to strategically hold the property until the market increases.

Option 2 - Ground Lease (or Head Lease)

Ground leases are commonly used by all orders of government and some crown corporations. This method is used primarily for strategic land parcels the government may want to retain a right to in the future, or if the price of land is increasing at such a rate that the government feels they will not be getting the full value of the land if they sell the land out right in the current market.

Both the Halifax International Airport Authority and Develop Nova Scotia use ground leases for their strategic assets. Develop Nova Scotia does not sell any of its waterfront property. Developments that occur on the Halifax Waterfront are done via ground lease; the lease is awarded through several methods such as developer solicitation, RFP.

A ground lease is a long-term lease (it can be for up to 99 years) that conveys a property interest in the land without passing title. To be marketable, the term of the lease must be at least as long or longer than the life of the asset. Because there can be perceived uncertainty with a ground lease, developers and their financiers will be looking for a discount of the lease rate. The discount rate is determined by the term of the lease. For long term leases it is common to have a rate reset in the agreement or an adjustment based on CPI or other inflation measures.

The terms of a ground lease are varied depending on the owner's (government or their agency) objectives in holding the land. Some variations include ownership of the asset at the end of the lease while some leases have the asset passed to the land owner. When this is the case, the lease will also stipulate the condition that the asset should be in. Others require the asset to be removed and the land to be returned as a brownfield property.

Restrictions in the lease terms and conditions will have an impact on the market rate. While the advantage of a ground lease is the Municipality retains ownership of the land, the disadvantage is there can be a discount in the market value of the property. Depending on when the cash is required, a ground lease allows for a stream of payments rather than a lump sum payment.

Option 3 – Hybrid of Sale and Ground Lease

The third method is a combination of direct sale or ground lease. The Municipality would look at the land holdings they have and evaluate which lands they deem to be strategic in nature and would like to retain ownership. In those properties where they do not have an interest, the properties are sold.

Staff are recommending an analysis of the Cogswell Redevelopment land parcels that are available for resale be carried out prior to disposal to determine which lands, if any, are strategic in nature and if those lands should be offered for development through a ground lease.

RISK CONSIDERATION

A risk management plan has been compiled to recognize, quantify and manage the various risk elements that the project will present during both design and construction execution phases. The plan's purpose is to identify, analyse, manage and mitigate project risk in a systematic and iterative process. The cornerstone of the risk management plan is the creation and utilization of the project's risk register document. The project risk register, combined with guidance from Steering Committee meetings, provides a documented basis for how risks will be managed for the project. Risk categories have been considered for the Cogswell District Redevelopment for Pre-Design, 0-30% Design, 30-60% Design, 60-90%, procurement and for each of the three construction Stages. Discreet risk elements have been considered for:

-Legal & Insurance	-Political	-External Stakeholders	
-Organizational & Policy	-Financial	-Environmental, Geological and Historical	
-Construction	-Procurement	-Communications	-Design Scope

These risks have been primarily addressed through the various actions outlined on the Risk Register per HRM Risk Consideration Guidelines.

Risk during the project construction will be managed jointly by the HRM project team, the Constructor as well as the Prime Design Consultant. The constructor will, as part of their Construction Execution Plan, compile a risk management plan that will define the processes, meeting frequency and participants as well

as identify the risk manager who will manage the overall processes and facilitate communication throughout the execution of the risk management cycle. A risk register will be developed for the construction project and will be updated monthly as part of the meeting agenda. Any new or serious risks that are discovered will be addressed and mitigated by the risk team on an ad hoc basis to reduce the possibility and severity of any risks identified. By this means, risks to the project can be identified, categorized and prioritized effectively and expediently by the risk owners.

Land Negotiations
Negotiations with Crombie REIT for lands required to facilitate the development of Proctor Street, the Transit Hub and Granville Park are on-going. The most complex component of these negotiations relates to the lands required for Granville Park. Four options are being discussed which seek to secure the required lands while respecting the existing development rights on their property adjacent to the proposed park. With two of the options, there is some risk around park design. Staff will continue dialogue and negotiations with Crombie REIT while advancing the project. The construction staging plan and procurement approach have been made as flexible as possible in anticipation of potential post award changes based on the final negotiated option. Staff are confident a constructor can be engaged and construction commenced while the negotiation details are finalized. There may be a requirement to negotiate changes to contract price with the successful bidder if a re-design is necessary.

Negotiations with Department of National Defence (DND) for lands required to enable development of the roundabout at Valour Way also are ongoing. DND is a large and complex organization within which it takes considerable time to solidify and confirm direction. Staff consider that sufficient agreement can be reached with DND to accommodate the project's timeline.

COMMUNITY ENGAGEMENT

Public engagement has been an important and on-going part of the Cogswell Redevelopment project. A substantial public engagement program was undertaken in August-October 2018 to gather ideas and input on design details for the public realm components of the District. The input received greatly influenced the 90% construction design presented in this report.

As the project proceeds, the public will continue to be engaged in a variety of ways. Updates on the project and its' progress will be provided through the Halifax.ca website. Assuming acceptance of this report by Regional Council, an open house information session will be held in the coming weeks to share the details of the 90% construction design with the public. Lastly, there will be additional opportunities for the public to dialogue and provide input into the rules that will guide the design and use of buildings on the proposed development blocks, through the MPS/LUB amendment process being led by Planning & Development.

ENVIRONMENTAL IMPLICATIONS

Geotechnical
A preliminary geotechnical and environmental site investigation was performed with a subsequent report released on November 2017. Some minor contaminants were discovered. Following discussion with Nova Scotia Environment, it was determined the nature and amount of the contaminates were acceptable as most of the excavated earth is to be reutilized within the Cogswell site as fill. Since the beginning of 2019, the Prime Design Consultant, WSP, has prepared both Environmental Site Assessment (ESA) Phase 1 and 2 reports for the site. As part of their construction execution plan, the successful proponent will complete an environmental risk and mitigation plan.

Flood Mitigation- Karlson's Wharf & Upper Water Street
A staff report presented to the Audit & Finance Committee on November 28, 2018, identified two areas susceptible to flooding within the Cogswell project boundary and recommended specific flood mitigation measures be undertaken in concert with the construction project. The first area is the section of Upper

Water Street, near the Halifax Waste Water Treatment Facility (HWWTF) and Department of National Defence (DND) wharf property (Karlson's Wharf), which is situated at a low point and experiences flooding during rainfall and coastal flooding events. The lack of an overland drainage route to the Harbour can cause surcharging of the combined sewer system. The frequency of flooding at this location is expected to increase with the increased intensity and frequency of rain events and higher maximum tidal levels resulting from climate change. Given Upper Water Street's status as an entrance to downtown Halifax and as an emergency evacuation route, combined with the redevelopment of the Cogswell District, this site was identified as one of the top 10 risk areas in the National Disaster Mitigation Program (NDMP) Flood Assessment report (WSP, 2018).

The second area includes a section of Upper Water Street near Casino Nova Scotia which was identified as another location prone to future flooding, with the expected increased intensity of rainfall event and higher tidal levels resulting from climate change.

The solution to the Karlson's Wharf drainage problem is to raise the elevation of Barrington Street by about a metre to prevent future flooding of the street. This is consistent with measures identified in Policy E-22 of the Regional Plan, to mitigate the potential impacts of coastal inundation and storm surge events on human safety by placing the elevation of the street above the 3.8 metre elevation. The solution for the second site is a street centerline at a minimum elevation of 3.5 metres, to accommodate the proximity and elevation of the existing parking garage and the Casino entrance. Staff are recommending a modified street cross section and profile, so all new development (on the west side of the street) will be above the 3.8 metre elevation, and redevelopment to the east will be accommodated by modification of the street, if and when the Casino and Purdy's Wharf sites are redeveloped.

The cost estimate to implement the proposed flood mitigation measures in both areas is approximately $600,000, As referenced earlier in this report, Regional Council directed staff to include monies in the 2020/21 capital budget to implement these measures.

ALTERNATIVES

1. Regional Council could choose not to proceed with the Cogswell District Redevelopment and direct staff to cease further project work and release their retained consultants and staff. The implications of this alternative would be:

    a. Regional Council's decision would not be in support of Policies 1, 50, or 60 of the Downtown Halifax Secondary Municipal Planning Strategy. Proceeding with this alternative would present a lost opportunity to create the Cogswell District and reconnect the downtown and the north end of the city.

    b. Regional Council has committed in several policies to many of the objectives that are embraced by the Cogswell District Redevelopment, such as the Integrated Mobility Plan (IMP). These policy objectives will not be realized under this alternative.

    c. Finally, the existing bridge, overpass and retaining wall structures are over 50 years old. Basic inspections and state of good repair efforts are expected to cost approximately $3,350,000 over the next 15 years. This figure does not include life-cycle analysis and replacement costs for these aging structures. The average life expectancy of such structures is 75 years.

2. Regional Council could request additional work be undertaken on the public realm aspects of the 90% construction design. Staff do not support this option as it is felt the current design strongly reflects the desires and wishes of the public as expressed through the extensive public engagement program undertaken at the direction of Regional Council. Additional design details will continue to be fleshed out during the development of the construction drawings. If Regional Council wishes minor design changes to be considered, these can be included in the construction drawings.

3. Regional Council could consider including construction of the linear park/greenway on Cogswell Street between Brunswick Street and the North Park Street roundabout and the Transit hub extension and enhancements, illustrated in Appendix H, as part of the Cogswell District Redevelopment. Staff support this alternative if the additional $12.0 M required to complete these works is provided in addition to the proposed budget for the project as outlined in the Confidential Information Report dated February 5, 2019.

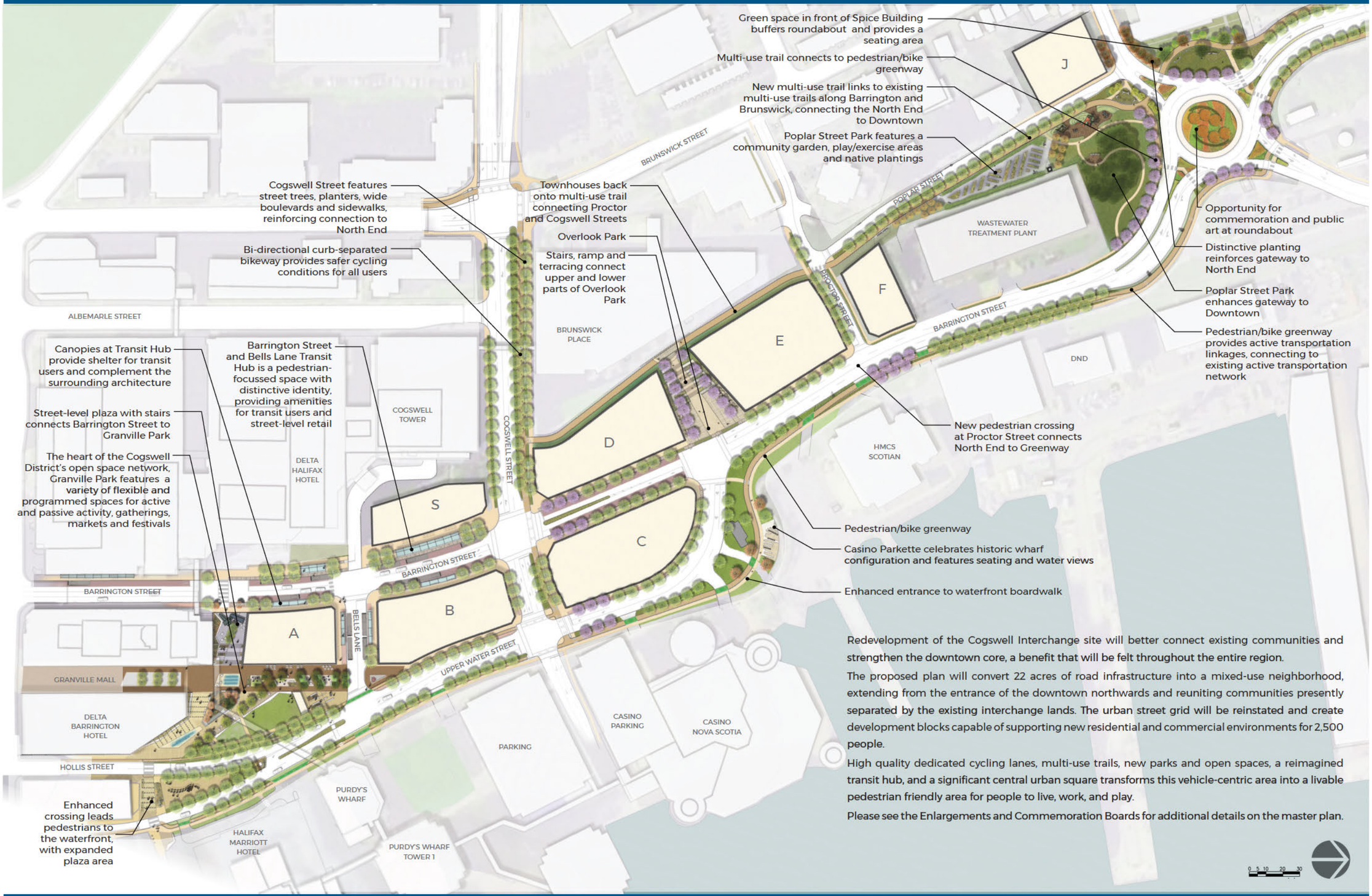
ATTACHMENTS

Attachment A- 90% Construction Design
Attachment B- Public Realm Consultation Map
Attachment C- FBM Report- https://www.shapeyourcityhalifax.ca/5333/documents/12948
Attachment D- Action Taken in 90% Construction Design Based on Public Engagement
Attachment E- Gehl Report-https://www.shapeyourcityhalifax.ca/5333/documents/13759
Attachment F- Action Taken in 90% Construction Design Based on Gehl Report
Attachment G- Proposed Project Construction Phasing Plan
Attachment H- Additional Precinct Works

A copy of this report can be obtained online at halifax.ca or by contacting the Office of the Municipal Clerk at 902.490.4210.

Report Prepared by: Donna Davis, Cogswell Redevelopment Project Manager, 902.476.8486
John Spinelli, Cogswell Redevelopment Director, 902.293-8567

Report Approved by: Jane Fraser, Director of Finance & Asset Management/ CFO, 902.490.4630



Redevelopment of the Cogswell Interchange site will better connect existing communities and strengthen the downtown core, a benefit that will be felt throughout the entire region.

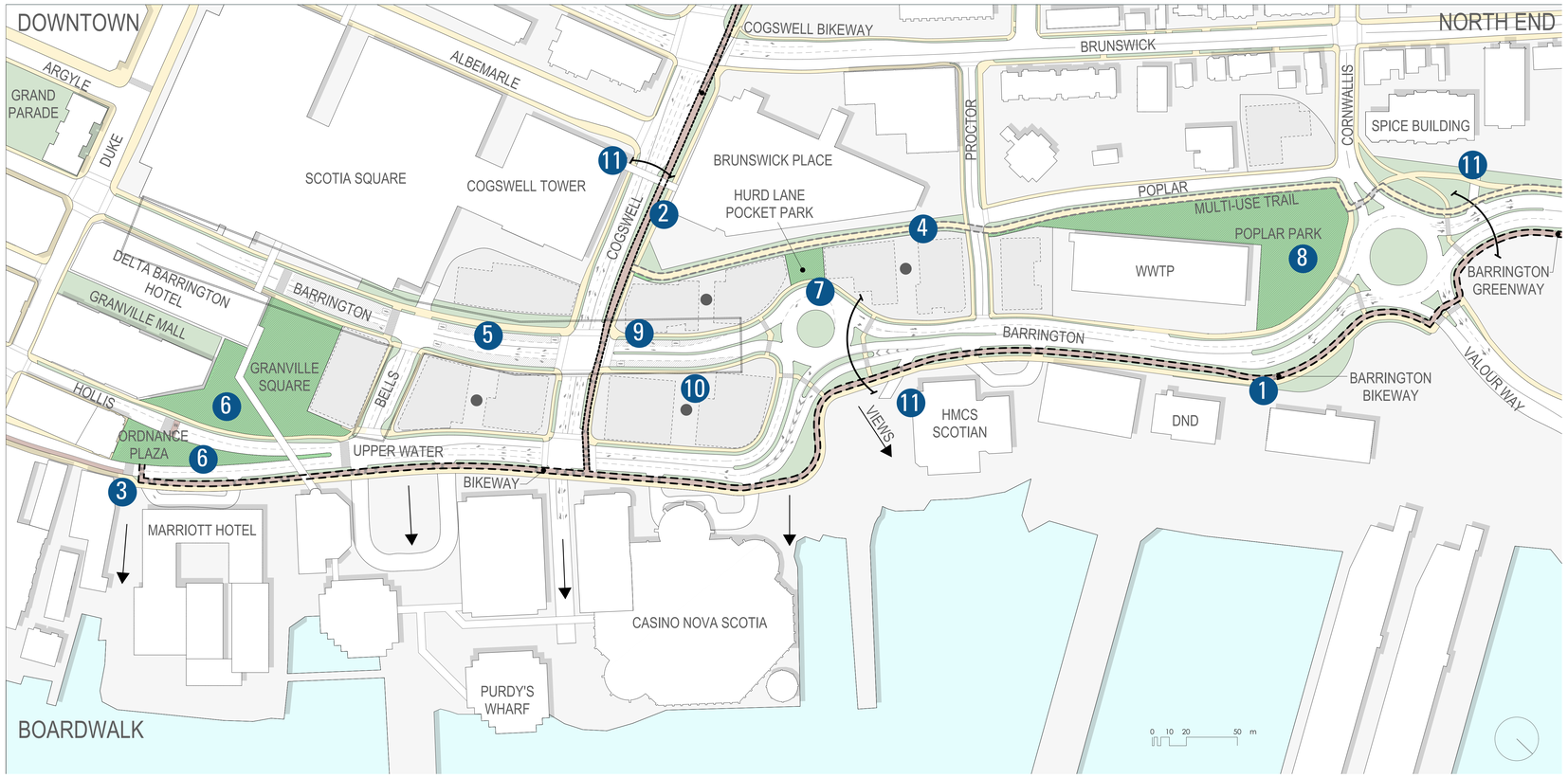
The proposed plan will convert 22 acres of road infrastructure into a mixed-use neighborhood, extending from the entrance of the downtown northwards and reuniting communities presently separated by the existing interchange lands. The urban street grid will be reinstated and create development blocks capable of supporting new residential and commercial environments for 2,500 people.

High quality dedicated cycling lanes, multi-use trails, new parks and open spaces, a reimagined transit hub, and a significant central urban square transforms this vehicle-centric area into a livable pedestrian friendly area for people to live, work, and play.

Please see the Enlargements and Commemoration Boards for additional details on the master plan.

OVERALL MASTER PLAN - PUBLIC REALM - JANUARY 2019

Attachment B- Public Realm Consultation Map



1. Barrington Greenway
2. Cogswell Greenway
3. Connections to waterfront
4. Multi-use trail
5. Transit hub
6. Granville Square and Ordnance Plaza
7. Pocket Park
8. Poplar Park
9. Sidewalks
10. Privately-owned public spaces (POPS)
11. Gateways

ATTACHMENT D- ACTION TAKEN IN 90% CONSTRUCTION DESIGN BASED ON PUBLIC ENGAGEMENT- February 8, 2019

General Design Directions for Streetscape and Public Space

Design Intent	Design Direction		Response (Yes/Partial/No/ Outside Scope)	ACTION TAKEN- 90% Construction Design Adjustments
Streetscape palette sub-areas within the District	1	Reflect in the "Granville Sub-area" a downtown palette, with contemporary design reflecting historic materials	Yes	• Urban streetscape style with hardscape to the curb similar to downtown • Pedestrian scale post-top lighting in key areas, transitioning from the downtown core. Lighting will be contemporary but will blend with the character of the historic lantern style that exists • Granville park is laid out on the historic street grid, with design and commemoration to celebrate and remember the historic city • Patterned paving in the boulevards provide a distinctive theme to each street area
	2	Reflect in the "Central sub-area" a district-specific palette, which blends elements from the Granville sub-area and North sub-area	Yes	• The streetscape transitions to a combination of green planter and patterned hardscape boulevards to allow space for urban uses but provide greenery for residential and commercial units facing the street. • As this area is a gateway to the downtown, the streetscape can include colorful plantings to accentuate the street. • Boulevards areas include “moments” for seating and commemorative features.
	3	Reflect in the "North sub-area" streetscape to match the North End	Yes	• In the North End, the streetscape has extensive green boulevards with sections of patterned hardscape to connect the theme to the adjacent areas and create visual continuity.
Streetscape treatments connecting to adjacent neighbourhoods	4	Extend streetscape and lighting improvements from the North sub-area via Proctor/Portland to strengthen connections to the North End, up to Gottingen Street	Yes	• Streetscape is continued up Proctor. • Proctor is a narrow residential street and bikes can easily share the road with vehicles.
	5	Design streetscape on Upper Water with consideration to promote adjacent change that will enhance the pedestrian experience on this street. Surrounding land uses east of the District are anticipated to renovate to provide retail frontages if Lower Water has an active street character	Yes/ Outside Scope	• Streetscape is enhanced along Upper Water with planters and patterned paved boulevards. • Ideally buildings to be serviced through underground parking with side street access. • Buildings could have a combination of residential /townhome frontage and small-scale commercial.

				• New intersection at Barrington and Upper Water provides more consistent street frontage for pedestrians and more consistent building wall.
	6	Integrate and improve the connection between bus services at the Transit Hub services and bus and ferry services at the Water Street Terminal. Improve the walking and wayfinding experience, through pedways, weather protection, lighting and signage	Partial – full connection to the Ferry Terminal is outside the project area	• A strong connection between the Barrington Street plaza, Granville Park and the waterfront provide this linkage from the waterfront to the transit hub • Extension of the Transit hub to Duke Street is proposed, strengthening the connection to the downtown. • A new streetscape is proposed for the Transit Hub. • Bus bays organized by route will be clearly signed and lit. • The transit hub includes expansive canopies for shelter with lighting and signage. Indoor waiting areas may be expanded to future new buildings.
	7	Improve streetscape treatment and activity along building faces along Barrington Street from the Transit Hub south to George Street	Partial/ Outside study area	• Extension of Transit hub to Duke street is proposed, strengthening the connection to the downtown. • Area south of Duke is beyond scope.
Accessibility and lighting	8	Include required public space design elements to achieve Rick Hansen certification	Yes	• In progress
	9	Include contrasting materials and tactile elements for visually impaired, especially at transit stops	Yes	• Contrasting materials in boulevards and tactile strips at crossings and where bike lanes are adjacent to sidewalks. • Transit stops are designed with proper proportions and clearance for accessibility.
	10	Provide appropriate lighting levels along streets, trails and greenways to both balance the need for safety, as well as ensure resident comfort	Yes	• A complete lighting plan is provided with street lighting and special lighting in key areas such as parks and plazas.

Improved safety and comfort for people of all ages and abilities walking and cycling	11	Introduce additional key pedestrian crossings (including intersection of Proctor and Barrington)	Yes	• 12 new pedestrian crossings are provided at key locations
	12	Ensure all intersections have marked crossings at all four sides	Yes	• All signalized intersections have marked crossings at all sides. At non-signalized intersections crossing mechanisms are provided in accordance with TAC and HRM standards.
	13	Reduce speed limit below 50 kph adjacent to parks and plazas, including Ordnance Plaza	Outside scope	

	14	Introduce pedestrian bump-outs (e.g. across Cogswell) to shorten crossing distance	Partial	• Bump outs are provided on Poplar Street and Bells Lane.
	15	Do NOT require pedestrians to push a button at intersection crossings ("beg" buttons)	Yes	• This is under review by HRM Traffic Service staff.
	16	Introduce measures to slow traffic and prioritize pedestrian movement at key locations (e.g. greenway crossings, Proctor and Barrington, adjacent to parks). Consider measures such as tabletop intersections, change in surface material, and continuing the surface treatment of the parks and greenway across the street	Yes	• Roundabout at Barrington and Upper water has been converted to a full intersection • Lanes are very narrow – most are 3m with 3.6m curb / bus lanes to narrow crossings and slow traffic • Auto turn review was performed to narrow turn radii where possible • 6m wide pedestrian crossing at Granville Park to the waterfront. • All streets have boulevard street trees
	17	Consider including heated sidewalks using district energy system	No	• This was examined. District energy is cost prohibitive for sidewalks
	18	Locate and design driveways to prioritize pedestrian and cyclist safety, while maintaining adequate loading and parking access for development parcels. Providing shared access driveways or service lanes to minimize the number of locations where vehicles cross paths with people walking and cycling	Out of Scope	• Future consideration as part of building design
	19	Include cycle crossings ("cross-rides") at intersections. Through cross-rides, ensure cyclists travelling by bike on the Barrington Greenway can safety and conveniently access Blocks B, C, D, E and F	Yes	• Protected signal crossing phases are provided where bike lanes cross intersections. Cross ride designation subject to legislation change. • All parts for the project are within 60m of either bike facility.
Promoting greater cycling use	20	Include a greater than typical number of bike racks, especially at key junctions or destinations	Yes	• Bike racks will be provided on all streets and clustered in key areas.
	21	Include cyclist supports, such as tool stations, free air	Yes	• This is being examined with AT staff
	22	Include digital cyclist counter/display(s) on bikeways	Yes	• Two locations have been proposed and will be confirmed with AT staff
Smoking areas	23	Include designated smoking areas	Yes	• Smoking areas will be provided in accordance with By-law N 300. Smoking is not permitted in public park spaces.
Driver information	24	Include parking spot availability or other information signs for drivers on Barrington Street	Yes	• Staff will work with Parking Services staff on reinstatement of directional parking signage on Barrington Street
Optimized roundabouts	25	Ensure that roundabout design does not negatively impact transit priority lanes	Yes	• Roundabout at Barrington and Upper water has been converted to a full intersection better enabling transit priority

	26	Improve safety and comfort for pedestrians at roundabouts. Investigate making routes more direct for pedestrians to reach destinations; investigate redesigning slip lanes to improve safety	Yes	• North roundabout has been reviewed for bicycle safety. Multi-use trail connections expanded to allow circumnavigation of the roundabout and links to Barrington Greenway. Bike crossings integrated with pedestrian crossings on three legs of roundabout. Separated bike crossing provided at Valour Way for Barrington Greenway. • Roundabout at Barrington and Upper Water has been converted to a full intersection reducing pedestrian crossing lengths
	27	Improve cyclist safety on roundabouts (e.g. suggestion for bike protected roundabouts with cross-rides)	Yes	See 26
Optimized street networks for pedestrian views	28	Reorient Bell's Lane to align with the Purdy's Wharf dock to allow view from the intersection of Bells and Barrington down to the water This will increase the size of lot A and decrease the size of lot B.	No	• After review, a decision was made to retain the orientation of Bells Lane because of impacts to block sizes, offsets to public street, and the adequacy of the connection between Granville Park and waterfront at this intersection. • Further, the current alignment aids bus turning movement with smaller radii while maintaining appropriate distances between crosswalks on the street.
Beautification and activation of adjacent properties	29	Work with the owners of existing adjacent buildings (e.g. Department of National Defense, Halifax Water Commission, Casino, Brunswick Place, Scotia Square) to seek ways to improve blank facades with plantings, lighting, art, or to renovate with active uses at street level	Yes	• Decorative panels are proposed for the DND fence adjacent to blank facades • Dialogue will continue with property owners regarding improvement of blank facades.
Underground utilities	30	Ensure utility wires are underground	Yes	• All utilities are underground.
Public Wi-Fi	31	Include public Wi-Fi and phone charging stations in public spaces	Yes	• Smart features are proposed for Granville park.

Transit Hub

Design Intent	**Design Direction**			
Increasing transit use through enhancing quality of transit hub experience (See also: "Amenities for	32	Provide a unique transit hub streetscape		• Transit hub has been designed as a pedestrian plaza with unique canopy shelters, enhanced lighting and paving and space for sidewalk cafes • Routes are relocated from Duke and Albemarle to bring more pedestrians to the Hub. • Signed bus bays identity route clusters

transit users" under Building Design Rules and "Transportation" under Other Ideas)				• Indoor waiting areas may be provided in future adjacent buildings
	33	Paint dedicated bus lanes to match the colour of the plaza, reducing apparent width of roadway and slowing traffic. (Ensure contrasting materials and tactile markers for visually impaired transit users)	Partial	• Bus lanes are painted the standard brick red • Crossings provided at Scotia Square entrance, Cogswell and Bells Lane.
	34	Install a transit system map and real-time bus info at the Transit Hub	Yes	• Transit Hub will have system maps and real- time bus info on monitors
	35	Include heated transit shelters	Partial	• Shelters will be open canopies with side panels to provide wind shelter; designs still under consideration • Heated space will be explored in adjacent new buildings
	36	Perform a detailed wind study and respond to microclimate impacts through building design and/or bus shelter design	No - out of scope – requires building massing	• See 35 • Wind studies will be performed for new buildings • Effectiveness against weather elements is being considered in bus shelter design

Greenways, Trails and Waterfront Connections

Design Intent	Design Direction			
Connecting to the greater greenway and trail network	37	Connect Cogswell Greenway to the Halifax Common as part of initial construction, allowing for a connected network for walking and cycling	No	• Future consideration. This is identified as an alternative recommendation/ option in the staff report to Regional Council.
	38	Connect Barrington Greenway to bikeway improvements along Hollis/Lower Water	Yes	• Bi-directional cycle track will integrate with design of proposed bike lanes on Hollis and Lower Water
	39	Consider design of pedestrian connections through Brunswick Place site if redeveloped	Out of Scope	• Proposed as a future action
Promoting better walking and cycling comfort and enjoyment for all ages and abilities	40	Provide places to sit at regular intervals. In designing and locating furniture, consider access to shade, access to daylight, both social and individual uses, movable furniture, and the needs of accessibility community	Yes	• Design has seating areas with special paving, furniture, commemorative and informational elements and planting throughout the community.
	41	Provide along trails and greenways, particularly Barrington Greenway where destinations are infrequent, a variety of sensory experiences and activities (e.g. learning opportunities, large scale art, art created by the community/student population, edible landscaping, lavender/sage/mint, games, free book library, pop-up exhibits, urban agriculture sales, bees, etc.)	Yes	• Design has seating areas with special paving, furniture, commemorative and informational elements and planting throughout the community. • Edible landscaping and community gardens provided at Poplar Park • Granville Park has been designed with spaces for pop-up exhibits and businesses, and festival stalls. • Locations for public art are proposed throughout.
	42	Support dog walking on greenways	Yes	• Dog stations and signage will be provided in detailed design.
	43	Consider grade in the design at junctions along the multi-use trail, to ensure there is not an up and down in grade along the route designed	Partial	• The greenway and multi-use trail have gentle grades going north-south with steeper grades east west to reflect the natural topography of the site. • Multi-use trail aligns to pedestrian/ bike crossings in roundabout design
Wayfinding to the waterfront	44	Provide at connections to waterfront, wayfinding and contemporary interpretation of historic gateways	Yes	• Wayfinding and interpretive signage and pavement markings are proposed at key locations
Edible landscaping, rainwater capture and ecosystem improvement	45	Provide a variety of trees, including large trees and edible landscaping	Yes	• Street trees are provided throughout • Edible landscaping and community gardens provided at Poplar Park
	46	Provide storm water capture feature along Cogswell greenway slope (e.g. stream or steps, bio swales along greenway with retention pond)	Yes	• Storm water management will be provided within streetscapes through soil cell filtration
Connecting multi-use trail to the transit hub	47	Investigate adding a crossing for the multi-use trail across Cogswell to continue between	No	• Multi-use trail is connected to Transit Hub and Barrington Street via Cogswell Greenway and protected signal phases and Barrington Street. Transit

		Building S and Cogswell Tower to meet up with the Transit Hub		plaza includes 3.0m multi-use sidewalk to provide connection to Granville Park. • Possible future connection at Albemarle may be considered

Gateway Elements for those entering the district

Design Intent	Design Direction			
Central roundabout gateway	48	Treat the central roundabout as a prominent entry into downtown, including public art in the roundabout circle as a marker/gateway into the district. Related interpretive information or smaller pieces of public art may be located in the adjacent public realm	Partial	• Central roundabout has been converted to an intersection • The area now features a prominent park and green space connection on both sides, creating a gateway experience.
Northern roundabout opportunity	49	Treat the northern roundabout as an opportunity for public art or naturalized landscape in these areas, potentially connecting design elements to those of Poplar Park or the open space west of the roundabout	Yes	• Public art feature for the roundabout is being explored.
Gateway on Cogswell	50	Apply a creative treatment to the pedway across Cogswell Street marking the gateway to downtown	Outside Scope	• This may be a future consideration when the Trade Mart property redevelops

Intersection of Barrington and Cogswell

Design Intent	Design Direction			
Barrington and Cogswell recognized as heart of the new neighbourhood	51	Provide special streetscape treatment to maximize street activity and interest at intersection of Cogswell and Barrington	Yes	• The intersection has been designed to enhance the significance of the pedestrian environment. • Commemorative features are proposed for this location.
	52	Consider a scramble intersection at Barrington and Cogswell	No	• This was examined and determined that the signalized bike crossing and accessibility requirements add complexity. • A traditional crossing is shown in this location.

Granville Square and Ordnance Plaza

Design Intent	Design Direction			
Improved quality of new public space	53	Design the park and furniture (including movable elements) to allow for both social gathering and individual relaxation. Maximize access to daylight, and allow space for small events and gatherings (e.g. space for food trucks and small music events)	Yes	• The park is designed with a variety of spaces for small and larger gatherings, space for events and markets/festivals, and places for relaxation and social interaction. Moveable elements are included in the design. Building A is sized and oriented to maximize access to sunlight.
	54	Include water feature designed with consideration for masking noise from traffic and for reinforcing a connection to the waterfront	Yes	• Interactive water features are proposed
	55	Include formal tree plantings (e.g. cherry trees)	Yes	• Trees are planted along geometric lines
Historical commemoration and identity of the space as the front yard to Historic Properties (See also: "History, Commemoration and Community Expression" below)	56	Include opportunities for public art, commemoration and community expression at Granville Square	Yes	• A variety of public art opportunities and commemoration are proposed
	57	Include opportunities for historical commemorative antiques, fragments, art, signage or photos at Ordnance Plaza	Yes	• A variety of public art opportunities and commemoration are proposed
	58	Include cobblestone/paver materials as a predominant material on square and plaza	Yes	• Special paving is integrated into the park design
Promoting better walking and cycling comfort and enjoyment for all ages and abilities	59	Match roadway material to square and plaza material and apply a speed table to bring roadway up to pedestrian level, using bollards or other elements as protection for people walking and cycling	No	• A shared street approach is not recommended because of traffic volumes. • Public suggestion is contrary to Gehl recommendation • Pedestrian and cycle edge of Granville Park protected by berm and treed buffer.
	60	Ensure crossing time for the signal will be sufficient for all pedestrians to cross Lower Water, Ordnance Plaza, and Hollis in a single walk phase	No	• This has been examined. Overall crossing times will be reduced in one direction with this approach.
	61	Include unique zebra crossing stripes (e.g. wave symbol or other significant patterns)	No	• Determined this is not allowed under Halifax road design standards. Consistent treatment at crossings is important for both drivers and pedestrians • Wide 6m crossing for pedestrians and bikes between Granville Park and the waterfront

Pocket Park

Design Intent	Design Direction			
Vertical travel between street and multi-use trail	62	Design park to thoughtfully accommodate vertical travel from street to multi-use trail. Considerations for accessibility could include ramping and/or public access to elevators or escalators in the park or in adjacent buildings	Yes	• Overlook Park includes stairs, multiple plazas and an accessible ramp
Place to stop on multi-use trail	63	Design park to integrate with the multi-use trail, allowing for furniture and access to natural light and capitalize on view to the water	Yes	• Park is designed to optimize views and visitor experience

Poplar Park

Design Intent	Design Direction			
Design and amenities that serve community needs and are compatible with existing adjacent uses and landscape	64	Include features to support urban agriculture, such as community gardens, greenhouses, and market space	Yes	• A community garden and orchard are proposed
	65	Include features relating to a naturalized landscape, such as storm water retention, wetlands area integrated with water feature, and Acadian forests plantings	Yes	• The landscape includes woodlots, pollinator meadows and naturalized planting
	66	Consider option for a playground at this location	Yes	• Small play and activity features are included with an option for a larger feature
	67	Consider option for a dog run at this location (either as its own space in Poplar Park, or as a linear use along the multi-purpose trail)	No	• Design will include dog stations and be dog friendly
	68	Consider including an amphitheater or event space, with the potential to integrate park space or screen onto wastewater treatment facility walls or rooftop	No	• Other uses were prioritized
	69	Consider the outdoor space needs of clients at the nearby Turning Point shelter	Partial	• Will continue dialogue with Shelter NS
	70	Develop methods to mitigate wastewater treatment facility smell	Outside Scope	• Discussed with HWWTF Manager. Smells are mitigated through two carbon based odor control systems contained within the treatment facility. Smells can occur if there is a problem with the odor control system (i.e. breakage) or from the trucks hauling solid material from the site. Staff will continue discussions with Halifax Water.

	71	Incorporate into the wastewater treatment facility and park opportunities for education related to ecosystems, urban agriculture, water treatment, district energy, and/or other History, Commemoration and Community Expression topics	Yes	• Interpretive panels can include this information

History, Commemoration and Community Expression

Design Intent	Design Direction			
Methods to explore for historical commemoration and community expression	72	Include public art in parks, plazas, privately-owned public spaces, and along greenways (e.g. interactive art that attracts tourists, excites the senses, including sound and daylight elements)	Yes	• A draft commemoration plan has been provided that includes proposed locations for informational signage, special design features along the street scape and within public spaces to reflect and commemorate historic and cultural elements and opportunities for public art.
	73	Use stamps in concrete or special pavers as tool for historical commemoration	Yes	• Stamps and special paver patterns are proposed in streetscapes and seating areas.
	74	Provide spaces for art work production and exhibition by the local and NSCAD art communities	Yes	• Key locations for public art are proposed, and many more are available and should be considered in the future
	75	Use patterns and colours (e.g. kente cloth) in the public realm to represent important cultures, groups or events	Yes	• Paving in the streetscape boulevards is based on commemorative and cultural patters, subject to ongoing engagement with the African Nova Scotian and Mi'kmaq communities
	76	Provide outdoor event spaces	Yes	• Outdoor event space is provided at Overlook and Granville parks
	77	Use electronic media (e.g. lighting and projections)	Partial	• This is a possibility for both parks, but not included as a permanent feature (i.e. event based).
	78	Include murals on the side of existing and new buildings	Outside Scope	• To be considered as part of a public art program
	79	Improve blank facades on existing buildings and fences, using plantings, lighting, and murals, with a consideration for vantage-points and experiences from greenways and parks. Work with the owners and occupants of the Wastewater Treatment Facility, Department of Defense fence/buildings, Casino, Parkades, Brunswick Place, and Scotia Square, and other adjacent properties to achieve improvements	Partial	• Buildings are outside scope • Decorative fence panels are proposed along the Barrington Greenway

	80	Determine through the Street and Civic Asset Naming Process the final names for new streets, trails and parks	Yes	• Process will be commenced after approval of 90% construction design
	81	Treat pedways as opportunities for public art or gateway markers	No	• This could be a future consideration as part of a public art program
	82	Treat traffic circles as locations for public art or gateway markers	Yes	• Northern roundabout is identified as a key gateway. Options are being reviewed for gateway markers.
Stories of the Mi'kmaq community	83	Continue to consult the Mi'kmaq community regarding possible integration of Mi'kmaq history and culture into the project	Yes	• Engagement is ongoing
Stories of the African Nova Scotian Community	84	Continue to engage the African Nova Scotian community to develop specific design recommendations related to African Nova Scotian culture and commemorative design	Yes	• Engagement is ongoing
	85	Consider Granville Square as a potential location for a significant public art piece to commemorate African Nova Scotian history at this location, with smaller related art or markers on other trails and paths (TBD through further consultation with the community)	Yes	• Engagement is ongoing
The historical shoreline before industry	86	Research and reflect in paving patterns the approximate outline of the shoreline before being filled for the industrial waterfront (potentially along the Barrington Greenway)	Partial	• This was explored. The original shoreline is difficult to demonstrate as much of it would be under buildings • The historic wharf pattern is included in park design
The original North Gate to Halifax	87	Mark where the North Gate to the city existed (c. 1749-63)	Ongoing	• This is being investigated
The buildings and properties that existed before urban renewal in the 1950s/60s	88	Reflect pre-interchange building pattern in paving patterns	Partial	• A variety of information and commemoration of the historic building form and city layout is proposed • Suggested to use an app with VR capability to allow people to walk through the historic city and show the interchange prior to demolition. This could also show the pre-development character of the site.
	89	Recall pre-interchange building outlines through building face design in new buildings that promotes a disjointed rhythm, so that large buildings can feel like multiple smaller buildings, and include smaller alley spaces inside blocks	Outside Scope	• Building design to be considered through the MPS/LUB process initiated for Cogswell.
	90	Include historical photos, such as "then and now" photos of the neighbourhood	Yes	• Should be included in informational signage. • Integration into sidewalks and benches is also possible.
Urban renewal, construction of the interchange,	91	Reflect the path of the Cogswell interchange in paving patterns	No	• Proposal to laser scan the interchange and use an app with VR capability to allow people to walk through the historic city and show the interchange

stopping of Harbour Drive, and the demolition of the interchange				prior to demolition. This could also show the pre-development character of the site.
	92	Keep a fragment of the interchange as commemorative experience (e.g. Berlin wall)	Partial	• See 88/91. Use of VR capability is suggested as most effective way to remember the interchange. A small portion of the interchange could be used as part of public art installation. This can be explored further.
	93	Keep a large fragment of the interchange as park/connection (e.g. existing Cogswell off-ramp as a "highline" concept integrated with Cogswell Greenway)	No	• This was examined. There are street alignment and grading issues and the type of construction precludes partial retention of interchange segments. This would also significantly impact the development blocks.
	94	Reuse interchange demolition materials (e.g. boulders in landscaping) in a way that integrates with commemorative storytelling and sustainable design goals	Yes	• This will be explored further during construction
	95	Consider Ordnance Plaza as a location to include historical commemoration to mark the preservation of Historic Properties and stopping of the Harbour Drive Plan	Yes	• A commemorative "Monument to the Protesters" is proposed for the triangular plaza fronting Historic Properties
Mothers, families and children who lived in the area before demolition of interchange	96	Representation methods TBD (e.g. street names)	Yes	• See #72. All commemoration options are yet to be finalized. Some are proposed in draft plan, and some will be for future development.
Labour, industrial history, military on the working waterfront	97	Representation methods TBD (e.g. DND fence and building faces)	Yes	• See #72. All commemoration options are yet to be finalized. Some are proposed in the draft plan, and some will be for future development.
Wastewater treatment in Halifax	98	Include on or adjacent to the wastewater treatment facility opportunities for education related to ecosystems, water treatment, district energy, and/or other history and commemoration topics	Yes	• See #72. All commemoration options are yet to be finalized. Some are proposed in the draft plan, and some will be for future development.

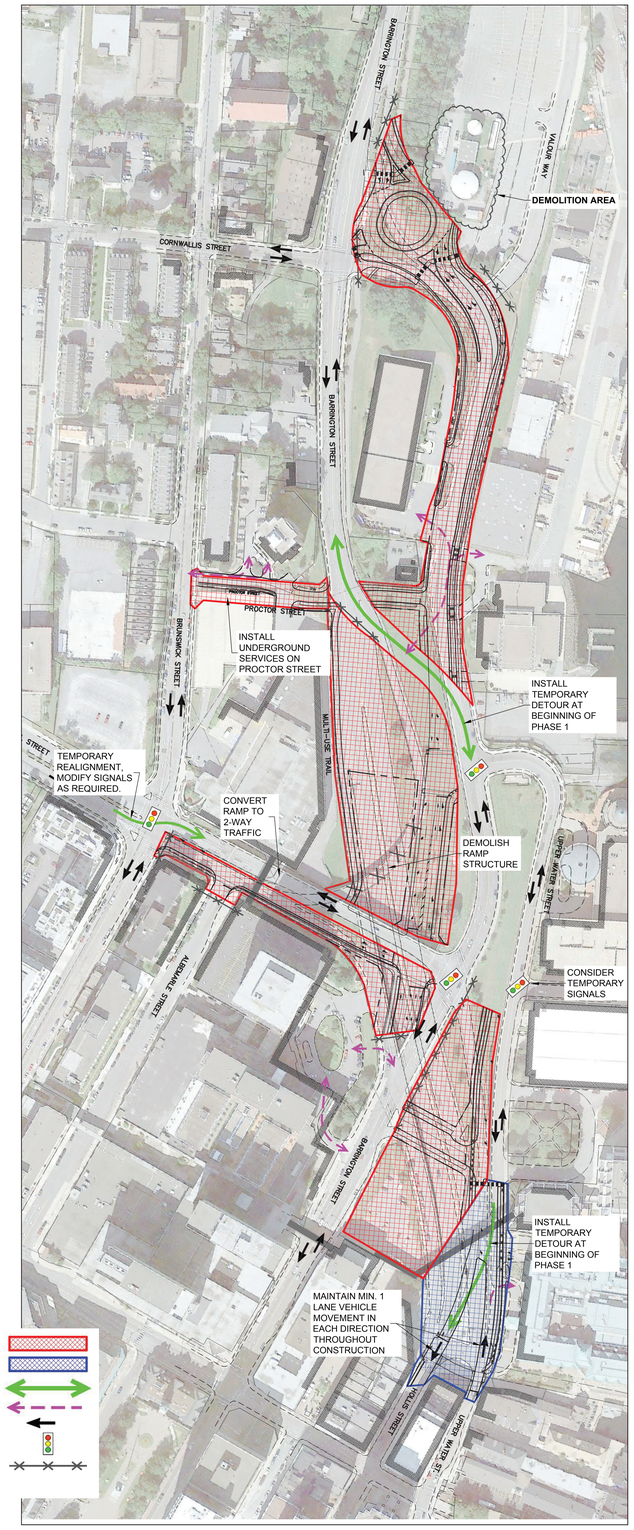
Attachment F- Actions Taken on 90 Percent Construction Design based on Gehl Report

Design Intent		Design Direction	Response (Yes/Partial/No/ Outside Scope)	Action Taken - Plan Adjustment
Connectivity				
1. Improve connectivity within the district.	**1**	Increase number of pedestrian crossings.	Yes	Pedestrian crossing points have been added at the intersection of Cogswell Street and Albermarle Street, and the intersection of Proctor Street and Barrington Street
	2	Create frequent opportunities for east/west crossings.	Yes	Bi-Directional bikeway along Upper Water Street between Cogswell and Bell's Lane now two one-directional bikeways for an easier transition to the Cogswell Street Bikeway going east-west. Overlook Park now features a combined ramp and staircase making pedestrian movement easier up towards Gottingen Street. Pedestrian crossings have been added to the intersection of Proctor Street and Barrington Street.
	3	Replace South Roundabout with a traditional intersection.	Yes	South Roundabout has been replaced with traditional intersection.
	4	Improve protected bike lanes on both sides of Cogswell Street, add additional bike connections on Cornwallis Street.	No	Cogswell Street Bi-directional bikeway remains to link in with network proposed Bi-directional bikewy for Brunswick Street and Barrington Street. Additonal bike connections are not possible on Cornwallis Street due to ROW restrictions.
2. Improve quality of connective tissue.	**1**	Smaller vehicle lanes on Barrington Street and Poplar Street.	Partial	Vehicle Lanes were tightened to increase sidewalk widths on Barrington Street. TAC standards limit ability to reduce vehicle curb lane to less than 3.5 metres on Poplar Street. Therefore, all other ROW elements remain the same.
	2	Create wider sidewalks on Barrington Street, Poplar Street, and Upper Water Street.	Partial	East sidewalk widened from 2.5m to 3m on Barrington Street. TAC standards limit ability to reduce vehicle curb lane to less than 3.5 metres on Poplar Street. Therefore, sidewalks remain the same width. East sidewalk widened from 1.5m to 1.8m on Upper Water Street.
3. Create places for people to connect.	**1**	Design public spaces to encourage a variety of social opportunities.	Yes	Additional seating options (both movable and fixed) were added to public spaces, Granville Park, Overlook Park, Poplar Park. The design allows for public realm enhancements to be added to commemorate African Nova Scotian, Mi'kmaq and built history. Consultation with these communities is on-going.

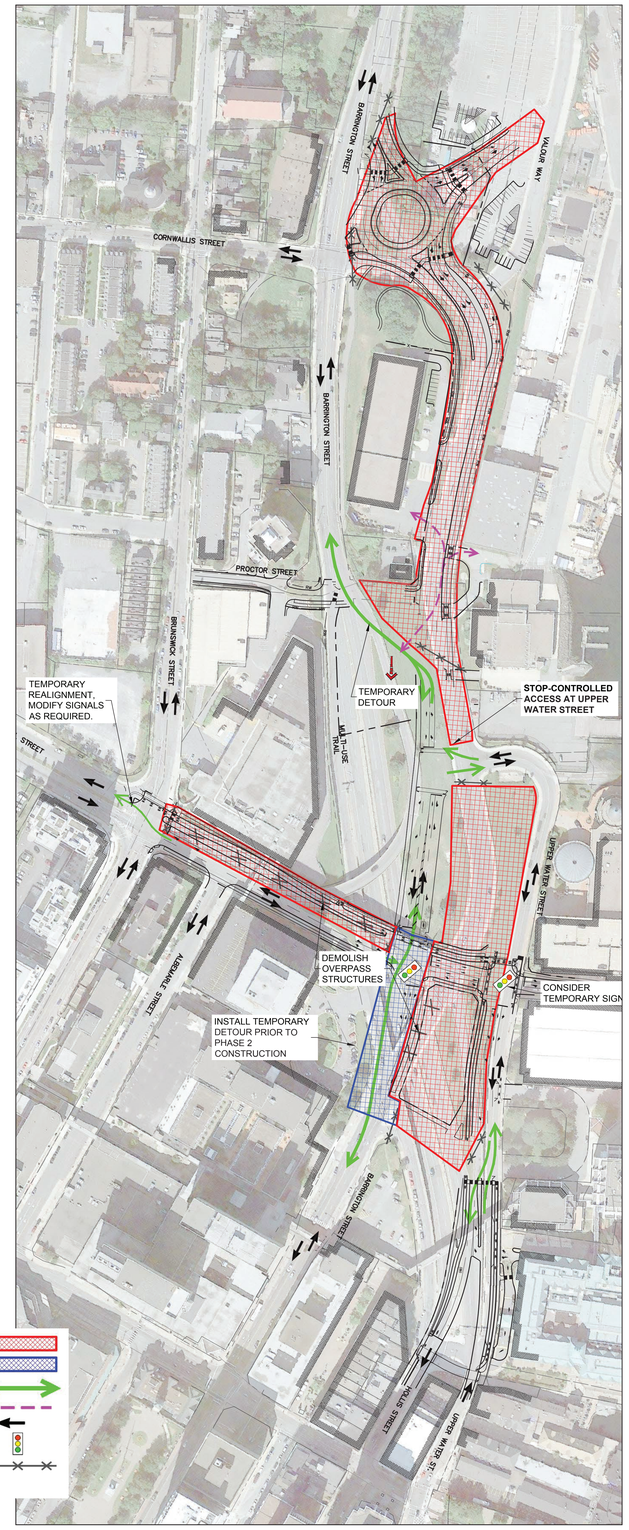
Open Space				
4. Provide a variety of public spaces.	**1**	Clearly define hierarchy of public spaces including privately owned public spaces (POPS), Granville Square, and transit plaza as they relate to the existing open space network.	Yes	Significant design work on the public open spaces has been completed between 60% and 90%. The 90% design outlines what facilities and amenities will be available in each open space, which dictates the activies that can reasonably be conducted in each one, and how they relate to the existing open space network.
	2	Consider mid-block public alleys instead of POPS.	Out of Scope	Will be addressed during the plan amendments phase.
	3	Examine the intended Granville Square as the heart of the community	Yes	The Transit Hub has been redesigned to include canopies, pedestrian lighting, and heating elements to create a pleasant pedestiran experience. Additonally, Granville Square was redesigned to indicate a clear linkage to the Transit Plaza as well as reflect pedestrian desire lines running North/South and East/West. Lastly, vegetation and water features have been added to dampen noise from vehicle traffic.
5. Define access level.	**1**	Clearly define quality criteria and access levels for POPS.	Out of Scope	Will be addressed during the plan amendment phase of the project.
	2	Define the spectrum of public open spaces.	Yes	Significant design work on the public open spaces has been completed between 60% and 90%. The 90% design outlines what facilities and amenities will be available in each open space, which dictates the activies that can reasonably be conducted in each one.
6. Improve human experience.	**1**	Where public spaces are adjacent to vehicle/transit traffic, emphasis should be placed on the comfort of the public space user.	Yes	Vegetated buffers around Poplar Park, Granville Square, and Overlook Park have been added to reduce pedestrian exposure to traffic. Block A has been re-oriented to leverage solar exposure. Water elements have been added to Granville Square to reduce noise and provide physical protection from traffic
	2	Design for comfort in open spaces, maximize sunlight, and protect from wind by adjusting building massing.	Partial	Block A has been re-oriented to leverage solar exposure. Wind tunnel considerations for buildings will be addressed in the plan amendment phase of the project.
	3	Identify opportunities to commemorate culture and heritage.	Partial	The design allows for public realm enhancements to be added to commemorate African Nova Scotian, Mi'kmaq and built history. Consultation with these communities is on-going.

7. Diversify building typology.	**1**	Planning policies and real estate exercises should encourage multiple opportunities for development on smaller parcels with eclectic mix of building types.	Out of Scope	Will be addressed during the plan amendment phase of the project.
8. Create vibrant, defined edges.	**1**	Provide smaller buildings with many entrances.	Out of Scope	Will be addressed during the plan amendment phase of the project.
	2	Create active edges with variety and articulation every six metres.	Out of Scope	Will be addressed during the plan amendment phase of the project.
9. Reflect Halifax identity.	**1**	Reflect existing city fabric of small, fine-grained building frontages.	Out of Scope	Will be addressed during the plan amendment phase of the project.

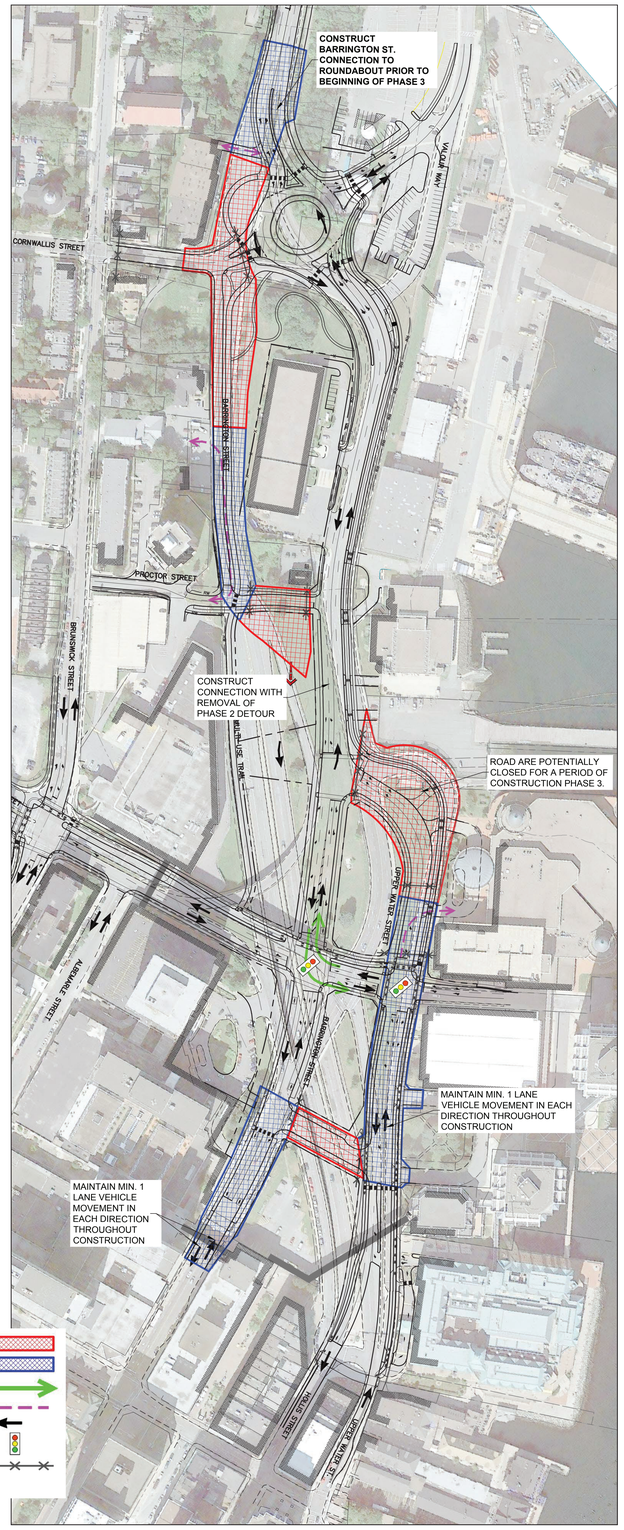
PHASE 1: Fall 2019 - Winter 2020



PHASE 2: Winter 2020 - Winter 2021



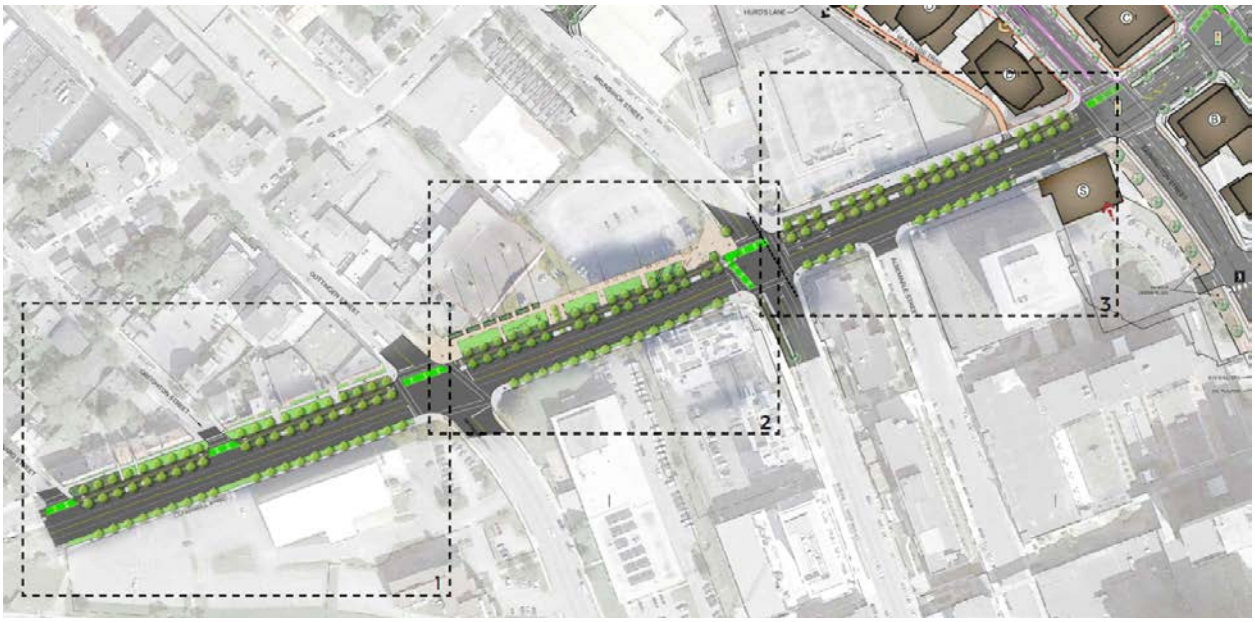
PHASE 3: Winter 2021 - Winter 2022



ATTACHMENT H - PRECINCT WORKS

As the Cogswell District Redevelopment design has progressed, all efforts have been made to facilitate the future incorporation of various other HRM initiatives at some future date. There are several related opportunities for Precinct Works, which could conceivably be executed and managed while the main Cogswell construction was being undertaken but for which no approved scope or budget has been allocated. There are some obvious logistical and cost benefits to performing these work elements at the same time the main construction occurs if funding can be appropriated and the design incorporated in a timely manner. These potential precinct works currently identified are;

Precinct Work A. Extension of Cogswell Street from the current project's western boundary of Brunswick Street to connect with the North Park roundabout. Per the below graphic, section 3 illustrates the work for Cogswell Street that is witihin project scope. The project will transform the current Cogswell street fabric to incorporate two lanes each for westbound and eastbound traffic. The conceived treatment for section 3 will provide a terminus and connector point for the Multi-Use Trail to join with the main Bike Path along Upper Water Street. The separated and tree-lined cycle path continues westward along Cogswell St to the western edge of the project's boundary at Brunswick St. Precinct Work C would continue this design condition to the connection of the North Park Street., truly connecting the downtown core to neighbourhoods north and west as well as the Halifax Commons. This extension would spur development along this route in properties that have not previously had a real connection to the city centre.



EXISTING STREET CHARACTER

1 The existing homes have distinctive character, which should be preserved in the new streetscape. Small gardens could be added adjacent to the steps, in keeping with other homes in the City.

ENHANCED LOTS

2 Homes along the northwestern part of Cogswell Street could have small gardens between the building face and sidewalk, with extra space for the existing steps. Some boulevard plantings could incorporate shrubs and perennials to add colour and sustainability to the streetscape.

STREET TREE BOULEVARDS

3 Buildings set close to the street with a wide tree boulevard creates a more walkable streetscape.

4 Homes with tight setbacks, small front gardens and wide boulevards are important to the character of Halifax neighbourhoods.

GREEN INFRASTRUCTURE

5 The bicycle lane buffer can double as a series of rain gardens, treating and cooling stormwater while providing aesthetic benefit.

6 Trees on the south side of the street balance the streetscape and provide a pedestrian-friendly environment on both sides. A triple row of trees can combine ornamentals and canopy trees. Bold form and fall colour should be implemented at intersections and gateway locations.

VISION:

The vision for Cogswell Street is a complete street, accommodating vehicular movement while emphasizing transit, active transportation, green infrastructure and a significant public realm. Connecting The Common to Downtown Halifax, the new streetscape creates a welcoming gateway between the two destinations. This segment of the street begins with heritage homes, transitioning to pedestrian-scale commercial, big-box retail and onward to future mixed-use parcels within the Interchange Redevelopment area. The Gottingen to Brunswick block is imagined as a linear park, with plazas, sidewalk cafes, public art and interactive fountains and sculpture to create a unique amenity for pedestrians and nearby residents.

NOTE: These diagrams show high-level alternatives for the streetscape layout, with precedent examples to inspire the many possibilities for the streetscape. Further refinement is required to fully develop the concepts.

STREETSCAPE AMENITY SPACES

1 Streetfront amenity spaces with public art and sculptural play elements for residential units. Turf areas provide passive recreation & seating.

2 Streetfront amenity spaces can also include cafe seating and an interactive fountain.

4 A wide walk adjacent to buildings enlivens the street with cafe tables, and benches.

5 Future development may include row houses facing the street, with small gardens.

SIDEWALK AND PATIOS

3 Existing driveways can be included in the streetscape, then retrofitted into plazas by adding plantings, paving and furniture at a later date.

LANDSCAPE ALTERNATIVES

7 Raised Planters with Seating

Transit can be integrated into the streetscape

6 Beds with ornamental plantings

8 Rain gardens / biofiltration planters

NOTE: These diagrams show high-level alternatives for the streetscape layout, with precedent examples to inspire the many possibilities for the streetscape. Further refinement is required to fully develop the concepts.

Precinct Work B- Transit Hub Extension/ Enhancements. There are transit related items that are beyond what the Cogswell budget could sustain and would require additional funding for the project to accommodate. These items relate to:

- Extension of the Transit Hub to Duke Street
- Enhanced shelter treatments associated with creation of the on-street transit hub
- Installation of electronic schedule boards
- Increased signage and wayfinding for route clusters and linkages to Ferry Terminal

Summary. The potential Precinct Works currently identified have the following estimated financial implications*;

A) Extension of Cogswell Street from the current project's western boundary of Brunswick Street to connect with the North Park roundabout. Estimated cost - **$8,900,000**

B) Transit Hub improvements. These include additional and upgraded shelters, electronic schedule boards, and extension of the Transit Hub to Duke Street. Estimated cost - **$ 3,000,000**

*Estimates are at a Class B level and represent an base accuracy of +/- 10%