# SPRING GARDEN WEST Residential Development

Spring Garden Road & Robie Street

Demolition, Excavation and Building Construction

Prepared by Geoff MacLean, P.Eng.

Job No. 38969

### CONSTRUCTION MANAGEMENT PLAN

1	SEP 2025	REVISED TREES AS PER HRM COMMENTS
1	AUG 2025	REVISED AS PER HRM COMMENTS
0	FEB 2025	ISSUED FOR PERMIT
REVISION #	DATE	DESCRIPTION





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# **Revisions Summary**

Revision 1 – Sections; 1.1, 2.1, 2.2, 4.1, 5, 6, 6.1, 7.2, 8.3, 9.1 & 11.1; Appendies A, G, P, Q & S  $\,$ 

Revision 2 – Sections; 7.2; Appendies A, P & Q

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Prepared by G.K. MacLean, P. Eng. In consultation with the developer, contractor traffic control company and HRM.



#### **Section 1: Introduction**

#### 1.1: Project Description and Objectives

The developer is planning to construct an apartment building on the corner of Spring Garden Road and Robie Street and renovate their existing buildings on Carlton Street in Halifax. In preparation for this redevelopment, the existing buildings at civic 1403 Robie Street, 5966-5994 Spring Garden Road and the rear building portions of civic 1478-1494 Carlton Street will be removed to make way for this new development. The new building will house 438 residential units within two 30-storey towers with a common podium and 5 levels of underground parking accessed from Carlton Street. This CMP has been prepared to address demolition, excavation, services and building construction.

Where the new building will have 5 levels of underground parking, deep excavations (+/-50ft) fronting the HRM Right of Way (ROW) are required for the project. Where the building foundation is planned to be set at the ROW along Spring Garden and Robie, distancing the public from the project site is preferred. For public safety from excavation limits and construction activities the project compound is planned in four stages.

Stage 1 will accommodate building demolition, to limits impacts of construction to the surrounding community, building demolition is planned to be grouped in three stages (stage 1a, stage 1b & stage 1c) with initial excavation after the buildings are demolished; a ROW encroachment is not anticipated leaving the sidewalk in front of the project open to the public. However, depending on the stage of demolition, during a brief temporary sidewalk, crosswalk, street lane and parking lane closures while the existing building street walls are demolished.

Stage 2 is anticipated for site excavation, the ROW encroachment will close the sidewalks in front of the project, moving the bus stop, while providing an altered pedestrian route along Robie Street.

Stage 3 for building construction will increase the ROW encroachment to include a portion of the street on Spring Garden allowing for a truck layby along Spring Garden to accommodate large deliveries.

Stage 4 will close the public sidewalk on Carlton Street to provide room for existing building renovation.

These stages setups will allow deliveries to remain within the encroachment while distancing the public from construction activities. These encroachments will close parking in front of the project on Spring Garden, redirect pedestrian traffic across the street using existing marked crosswalks as well maintain Robie with an altered pedestrian route and two-way traffic throughout construction. Concrete deliveries will be stationed off street within the encroachment and on private property. Only during service and driveway installation work do we anticipate short term temporary lane drops. It is anticipated that the tower crane will be assembled and disassembled on private property or within the Spring Garden encroachment.

The project borders residential properties along its southern property line, residential properties to the east opposite Carlton Street, commercial and residential properties opposite Spring Garden that houses the Halifax Professional Center, a commercial property opposite Robie that houses Saint Andrew's United Church. Neighbouring properties will remain undisturbed throughout all construction phases and all neighbours will be notified and updated on construction ahead of time.

This CMP document is intended to be an evolving document to help guide the project team to mitigate impacts to the adjacent community before they arise and to address unforeseen issues. SDMM, together with the developer, contractor, and traffic control company, have prepared this Construction Management Plan (CMP) following HRM's

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CMP (2020) guidelines and administrative order (2018-005-ADM) in an effort to reduce potential negative impacts on the surrounding community, due to construction activities for this project.

The most up-to-date version of this document will be kept on-site at all times during construction. Should ownership or contracting services change throughout the course of this project, HRM will be notified immediately, and new parties will be required to comply with the approved CMP in writing.

#### 1.2: Project Contact Information

The project team for the proposed development consists of:

Role	Name	Contact	Address	Phone
Owner/ Dexel Developments			1245 Barrington Street,	(902) 830-3548
Developer	Limited		Halifax, NS, B3J 1Y2	
Project	Dexel Developments	Kris Skiba	1245 Barrington Street,	(902) 456-5023
Manager	Limited		Halifax, NS, B3J 1Y2	24 Hour Emergency
				Contact
Site Contractor	Atlantic Road	Greg MacDonald	6 Belmont Avenue, P.O. Box 89	(902) 830-6411
	Construction and Paving		Eastern Passage, NS B3G 1M7	
Traffic Control	Traffic Control         Frontline Traffic Services         Tyler Hayman         6 Belmont		6 Belmont Avenue, P.O. Box 89	(902) 818-5548
Company			Eastern Passage, NS B3G 1M7	
Rodent Control	Rentokil Pest Control	Main Office	11 Glendale Avenue, Unit #5, (902) 812-0375	
Company			Lower Sackville, NS, B4C 3P2	

### **Section 2: Project Schedule and Logistics**

The following is a brief summary of anticipated major project milestones broken down by phase:

#### 2.1: Schedule

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Project Phase	Start Date		End Date	Time Period
Rodent Control Program	Jul 15, 2025	-	Jul 15, 2026	12 months
Demolition	Aug 1, 2025	-	Aug 31, 2025	1 month
Site Excavation	Sep1, 2025	-	Jun 30, 2026	10 months
Substructure	Jun 1, 2026	-	Aug 31, 2027	15 Months
Superstructure	Jul 1, 2027	-	Jun 30, 2030	36 Months
<b>Building Renovations</b>	Jul 1, 2029	-	Dec 31, 2029	6 Months
Service Abandonments	Jun 1, 2026	-	Jul 30, 2026	2 weekends
Service installs	Jul 1, 2026	-	Jul 31, 2026	3 weekends
HRM Right of Way Flat Works	Sep 1, 2029	-	Sep 30, 2029	1 month
Site Flat Works	Oct 1, 2029	-	Oct 31, 2029	1 month

#### 2.2: Key Dates

Set up stage 1 fencing along property lines August 1, 2025

• Stage 1a - Building street wall demolition only (1-week)

o Sidewalk closure (Spring Garden)

o Street Lane closure (Spring Garden)

Stage 1b - Building street wall demolition only (1-week)

Sidewalk closure (Spring Garden)

Street Lane closure (Spring Garden)

Stage 1c - Building street wall demolition only (3-days)

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Sidewalk closure (Spring Garden & Robie)

o Crosswalk closure (Spring Garden & Robie)

Street Lane closure (Spring Garden & Robie)

Install stage 2 encroachment
 September 1, 2025

o Sidewalk closure (Spring Garden Road)

Install stage 3 encroachment
 June 1, 2026

Sidewalk closure (Spring Garden Road)

Street Lane closure (Layby – Spring Garden Road)

Install stage 4 encroachment
 July 1, 2029

Sidewalk closure (Spring Garden Road & Carlton Street)

Street Lane closure (Layby – Spring Garden Road)

Finish encroachment
 Duration of encroachment
 58 months

Temporary lane/road closures:

Spring Garden Road service abandonments
 Carlton Street service abandonments
 Spring Garden Road water service install
 Spring Garden Road sewer service install
 July 2026
 July 2026

The encroachment areas are shown in the appendix for reference.

#### 2.3: Hours of Work

Work will generally take place during normal working hours as outlined in HRM's Noise By-Law and Traffic Control Manual Supplement; these are noted below.

Monday to Friday: 7:00 a.m. – 8:00 p.m.
 Saturdays: 8:00 a.m. – 7:00 p.m.
 Sundays & Statutory Holidays: 9:00 a.m. – 7:00 p.m.
 Servicing Work: Noted Above

Although work is not expected to be required outside of the times listed above, if, for any reason, work is anticipated to be required outside of these hours, the contractor will apply to HRM for approval 5 business days (minimum) in advance of such work and obtain approval prior to proceeding. It is noted that HRM's Noise By-Law cannot be altered without HRM council approval; work must adhere to the Noise By-Law. Note that construction noise exemptions may be granted where construction noise is planned to take place during prohibited hours of the N-200 By-law. The developer to apply for this separately under the Construction Noise Exemption process.

# Section 3 - Relevant Regulations & Guidelines

#### 3.1: Occupational Health & Safety Regulations

This CMP shall be utilized in agreement with all applicable Provincial and Federal Occupational Health and Safety Regulations. At a minimum, construction activities must at all times meet the standards of:

a) National Building Code of Canada, as adopted and modified under the Building Code Act and the Nova Scotia Building Code Regulations made under that Act;



- b) Nova Scotia Occupational Health and Safety Act, and the Nova Scotia Occupational Safety General Regulations made under that Act;
- The Transportation Association of Canada (TAC)'s Manual of Uniform Traffic Control Devices for Canada (MUTCDC);
   and
- d) Nova Scotia Temporary Workplace Traffic Control Manual (NSTCM).

#### 3.2: Municipal Regulations & Guidelines

In addition to the Provincial and Federal standards referenced in Section 3.1, this CMP shall be utilized in agreement with and meet, at a minimum, the standards of all relevant municipal by-laws including, but not limited to, the following:

- a) HRM Design Guidelines;
- b) HRM Standard Details;
- c) S-300 Streets;
- d) E-200 Encroachments;
- e) B-201 Building;
- f) N-200 Noise;
- g) T-600 Trees;
- h) S-900 Controlled Access Streets;
- i) T-400 Truck Routes;
- j) B-600 Blasting;
- k) HRM TCM Supplement;
- I) G-200 Grade Alteration and Stormwater management;
- m) Admin Order 2018-005-ADM regarding encroachments; and
- n) Admin Order 2020-010-OP regarding stormwater management standards for development activities.

### **Section 4: Vehicle Management**

Prior to any construction activity, all temporary workplace traffic control devices and signage will be in place as per the Nova Scotia Temporary Workplace Traffic Control Manual (latest edition). The traffic control company will install the signage and ensure that they are maintained throughout the project. This project's Traffic Control Plans (TCPs) are listed in the Appendix.

#### 4.1: Vehicular Traffic Control

A Traffic Control Plan (TCP) has been prepared by the traffic control company and is provided in the Appendix.

Depending on the stage of construction, we are also proposing street encroachments for the project. The street lane on Robie and Spring Garden will be temporarily closed during building street wall demolition only during stage 1c, and close parking in front of the project on Spring Garden in stage 2, 3 & 4. Only during building service work and driveway installation do we anticipate short term temporary lane closures being required. It is anticipated that tower crane assembly and disassembly will be stationed within the private property or the Spring Garden encroachment. Please refer to the appendices for required encroachment plan and traffic control plans.

#### 4.2: Haul Route and Staging Areas

The truck Haul Route Plan has been prepared by the traffic control company and is provided in the appendix.

The selected route is intended to minimize traffic congestion and maximize pedestrian safety. During all construction phases vehicles will enter and exit the site at the gate location(s) which will be clearly marked for function. During construction activities concrete and material deliveries shall be contained within private property and / or the



encroachment area. We anticipate these deliveries entering and exiting the gate on Carlton, entering the gate on Robie Street and exiting the gate on Carlton Street and / or entering the northwest gate and exiting the northeast gate on Spring Garden with traffic flow. Refer to appendix for concrete delivery schematic.

#### 4.3: Vehicular Traffic Notifications

Should any traffic disruptions be required, notifications will be distributed to properties in the impacted area a minimum of five (5) days in advance of vehicular traffic closures. Refer to sample notification letter in the appendix.

#### 4.4: Emergency Vehicles

In the event of unforeseen emergency situations, the site will remain accessible to emergency vehicles at all times.

#### 4.5: Parking

On street parking is permitted in adjacent to and front of the project on all streets. During stages 2, 3, & 4 of construction, on street parking will be closed on the project side of the street along Spring Garden. On street parking will be affected by this project. It is noted that passenger vehicles are not permitted to park within any encroachment areas. To minimize parking requirements in adjacent neighbourhoods, site workers will utilize private property, and workers will be encouraged to carpool or rely on public transit.

#### 4.6: Bus Stops

Bus service that travels along Spring Garden and Robie should not be affected by this project.

#### 4.7: Hazard Assessment

A vehicular and pedestrian hazard assessment is provided in the appendix. Any additional site hazards identified or encountered after work has commenced will be added to this list. All personnel on-site will be required to review this list and encouraged to identify additional potential hazards and hazard mitigation methods.

# **Section 5: Pedestrian Management**

A Pedestrian Management Plan (PMP) has been prepared by the traffic control company and is provided in the appendix.

Depending on the stage of construction, the project will close the sidewalk in front of the development on Robie and Spring Garden during building street wall demolition and crosswalks on the corner on Robie and Spring Garden for demolition during stage 1c, close the sidewalk on Spring Garden and Robie throughout stage 2, 3, &4, while providing a 1.6m wide altered sidewalk route to maintain pedestrian traffic on Robie, relocate the existing Spring Garden bus stop from the front of the project to the front of civic 5880 Spring Garden Road, and additionally close the sidewalk on Carlton in Stage 4. This is to ensure construction and deliveries are kept a safe distance from pedestrians. Pedestrian traffic will be maintained with use of the existing crosswalks at the intersections of Robie, Spring Garden, Carlton Street to access the sidewalk on the opposite side of the street.

#### 5.1: Pedestrian Protection

Pedestrians will be protected by physically distancing them from the project. A combination of rigid fencing, chain link fencing, and F-type concrete barriers with plywood fencing mounted above will delineate the project and encroachment. All fencing will be covered with opaque covering and will extend a minimum 3m from the public right-of-way, to block view of the site. F-type concrete jersey barriers will be positioned on the street demarking the 1.5m temporary on street pedestrian route separating the pedestrians from vehicle traffic. Refer to the appendix for examples of the barriers and fencing.

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#### 5.2: Pedestrian Safety

Pedestrian safety will be maintained by implementing appropriate signage as shown on the PMP. All navigation and safety signage indicating alternative sidewalks and potential hazards will be inspected and maintained regularly.

#### **5.3: Pedestrian Traffic Notifications**

Notifications will be distributed to properties in the impacted area a minimum of five (5) days in advance of pedestrian traffic impacts. A sample traffic notification letter can be found in the appendix. HRM must be notified prior to issuing the notification to neighbours.

#### **5.4: Visually Impaired Persons**

In keeping with CNIB requirements and as outlined on their 'Clearing Our Path' website; various items will be incorporated into the pedestrian management signage and barriers. Such as, high visibility contrasting colours with appropriate font types (mix of upper and lower-case lettering), font sizes (between 16mm to 51mm) and sign colours (orange background with black lettering or white background with black lettering).

The contractor will use bright orange sawhorse barricades complete with bold-font signage to identify sidewalk termination points. Sawhorse barriers will incorporate lower cross members, painted and marked consistent with the rest of the sawhorse, these added cross members will be placed near the ground to aid visually impaired persons using a cane. Reflective tape will also be placed on the ends of fencing, hoarding, sawhorse barricades, and concrete barriers to help delineate pedestrian routes and disruptions. Signage and tape colours will vary but will comply with the colour/brightness contrast as outlined by the CNIB website; examples are black/white, orange/black or dark red/white combinations.

#### 5.5: Accessibility

High visibility signage will be used to assist pedestrians to easily navigate around all project related blocked sidewalks.

#### 5.6: Hazard Assessment

A vehicular and pedestrian hazard assessment is provided in the appendix. Any additional site hazards identified or encountered after work has commenced will be added to this list. All personnel on-site will be required to review this list and encouraged to identify additional potential hazards and hazard mitigation methods.

#### 5.7: Pedestrian Management Plans Rendering (PMPR) Signage

The need for a rendered map displayed for pedestrians showing the detoured pedestrian routes is not anticipated.

#### **5.8: Pedestrian Detour Wayfinding Signage**

The need for pedestrian wayfinding signage directing pedestrians to adjacent businesses is not anticipated.

# **Section 6: Encroachments & Disruptions**

During excavation and building construction stage 2, 3 & 4, we are proposing the project encroachment area will incorporate the public sidewalk and street lane Spring Garden. Additionally, temporary asphalt will be installed with the HRM lawn the on Robie to accommodate a temporary 1.6m altered pedestrian route to access past the encroachment. We are also proposing to incorporate the public sidewalk on Carlton in stage 4. This will relocate the existing Spring Garden Road bus stop, move pedestrians to the temporary 1.6m altered sidewalk route on Robie, reroute pedestrian traffic to the opposite side of the street around the encroachment on using existing crosswalks, narrow the street width to accommodate a truck layby and close on street parking in front of the project on Spring

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Garden Road. These encroachments are to keep the public away from the excavation zone of influence as well as provide additional space for site workers and deliveries within the encroachment area. It is noted that during building street wall demolition (stage 1c), a temporary sidewalk, crosswalk and street lane closure will also be required.

This encroachment is planned to be delineated by a combination of chain link fencing, interlocking F-type concrete barriers complete with plywood fencing on top.

Throughout the project, fencing will be positioned to not obstruct vehicle sight lines. In areas adjacent to the site gates open mesh chain link fence on top of the site barriers to not obstruct sight lines.

Should any utility or traffic disruptions be required, the contractor will first apply to HRM for approval, a minimum of five (5) business days in advance of such work and will then notify neighbours of these disruptions in a timely fashion.

#### 6.1: Demolition

The existing buildings at civic 1403 Robie Street, 5966-5994 Spring Garden Road and the rear building portions of civic 1478-1494 Carlton Street will be removed to make way for this new development. Depending on the stage of demolition, A temporary sidewalk, crosswalk and street lane closure is anticipated for the building street walls to be lowered safely, closing the area from the public. See structural demolition plan prepared by others.

#### **6.2: Site Excavation**

This includes deep excavation and removal of common site material. The development is planned to have 5 levels of underground parking below street grade. If bedrock is found, the contractor will apply for a blasting permit and adhere to the HRM blasting by-law and conditions of the blasting permit. Alternatively, if a blasting permit can not be obtained the site's bedrock will be broken by a series of rock breakers to reach footing elevation.

#### **6.3: Site Services Connection**

This includes installation of new water and sewer laterals to their respective mains, as well as decommissioning existing laterals which will be abandoned. The service installs will require modifications to the encroachment with temporary workplace signage incorporated (refer to the Service Installation Traffic Control Plans (TCP) in the appendix). HRM requires that this service work be limited to weekends only to minimize traffic disruptions. The target dates for this work are provided in the "Key Dates" section above with time of installations adhering to the Noise By-Laws noted above. The intent will be to complete this servicing work and reinstate the street as quickly as possible in order to minimize disruptions to the public.

Before scheduling site services connections, the contractor will notify all neighbouring properties, of the intended timeline for this work. A sample notification letter is included in the appendix.

The contractor intends to reinstate the street cut during the season of work. It is noted that street cuts cannot be left gravel or open. HRM reinstatement specifications must be met, and the travel way must be hard surfaced prior to reopening to the public. Asphalt, concrete curb and sidewalk reinstatement must be completed within 72 hours of disturbance and will be considered temporary if reinstated after October 31<sup>st</sup> or prior to May 1 in which case permanent reinstatement will be completed by June 15.

#### 6.4: Construction Management Plan Element Inspection and Maintenance

Construction management plan elements will be inspected daily to ensure continued adherence to this CMP. Any deficiencies identified will be reinstated immediately. A CMP's TCP & PMP inspection report summary will be

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completed for the project, including information on what maintenance activities were conducted. This report must be kept on site at all times and be available to HRM upon request.

#### 6.5: Changes to the Construction Management Plan

All departures from the CMP regardless of the significance must be submitted to the Municipality 10 days in advance for review and approval. Any required changes or modifications to the approved CMP will be submitted to HRM for review and approval prior to implementation.

#### **Section 7: Environmental Factors**

#### 7.1: Damage to HRM Infrastructure

Existing HRM infrastructure will be reinstated within the encroachment area and/or be completely replaced. This includes reinstatement of the HRM sidewalk, curb and gutter and topsoil and sod post construction. It is anticipated that sidewalks across the street will not be impacted by excavation or other construction activities. However, while efforts will be made to avoid damage, it is anticipated that additional portions of existing curbs, gutters, and sidewalks may become damaged during the construction process which would require repairs or replacement. Pending HRM's review prior to and after construction and subject to damage due to construction activities, the developer acknowledges that items may require to be fully replaced rather than repaired. The developer also acknowledges that any costs incurred to repair or replace this public infrastructure are the responsibility of the owner. For reinstatement timeline requirements, it is noted that asphalt, concrete curb and sidewalk reinstatement must be completed within 72 hours of disturbance and will be considered temporary if reinstated after October 31st or prior to May 1 in which case permanent reinstatement will be completed by June 15 of the following construction season.

#### 7.2: Protection of Trees

There are nine (9) HRM street trees within the Right-of-Way fronting the project site; two (2) on Robie Street, three (3) on Spring Garden Road, and four (4) on Carlton Street. It is noted that HRM street trees shall not be touched prior to approval and/or compensation agreements between the developer and HRM Urban Forestry are in place. Adjacent street trees are to be protected during construction in accordance with the HRM Tree Bylaw (T-600). Refer to HRM tree protection detail in the appendix.

Due to the tree locations, we are proposing to remove six (6) HRM street trees within the Right-of-Way fronting the project site; two (2) on Robie, three (3) on Spring Garden and one (1) on Carlton Street. Tree compensation agreements are to be finalized between developer and HRM Urban Forestry.

In addition, per HRM requirements, the relocated bus stop will impact a declining HRM street tree fronting civic 5880 Spring Garden Road. It is understood, due to the failing health of this street tree compensation is not required prior to its removal.

#### 7.3: Line Painting and Temporary Crosswalks

Temporary line painting such as altered centreline or temporary crosswalk are not anticipated for this project.

#### 7.4: Street and Right-of-Way Cleaning

The portion of public street adjacent to the project will be cleaned daily of any debris from trucks and silt, dirt, or rock that migrates beyond the encroachments. A sweeper truck will be utilized as required. Rock pads will be installed and maintained at all site entrances behind the curb line to knock dirt free from truck tires with aim to reduce off tracking of site soils.

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Where the developer plans to utilize the ROW for their street encroachments the developer is responsible to clear snow from the street side of these encroachment barriers, gates and along sidewalk fencing.

#### 7.5: Protection from Inclement Weather

To protect the public from construction debris during inclement weather, the project site will be enclosed by fencing complete with dust control covering, the site will be regularly reviewed and cleaned, with loose items secured when not in use.

#### 7.6: Storm Water Management

During construction, nearby catch basins may be fitted with silt bags and/or filter fabric to prevent debris from entering the storm system and maintained until final reinstatement is complete. Stormwater collected inside the project site will be directed to temporary stormwater settling ponds situated within the building footprint to allow clean water to be pumped into the existing public wastewater sewer system. Dewatering to municipal systems require a permit from Halifax Water via p2@halifaxwater.ca and must be follow the strict adherence to Halifax Water regulations. The contractor must prevent erosion or siltation of surface runoff from leaving the construction site through the use of erosion and sedimentation controls (See NSECC Erosion and sedimentation control handbook for construction sites). Sediment ponds may be shifted and positioned as desired by the site contractor during mass excavation however will generally be placed in localized low points within the building excavation.

#### 7.7: Noise, Dust and Emission Control

The contractor will at all times adhere to the HRM Noise Bylaw (N-200). unless approved under HRM exemption process No work will take place on the project site outside those hours identified in section 2 of this report, unless HRM grants an exception.

Dust mitigation for this project will be achieved using rock pads for trucks exiting the site. A water truck and sweeper truck will also be utilized to help prevent dust from becoming airborne and, when required, calcium may need to be used to mitigate dust migration. Additionally, mesh on the inside of the fencing will help to contain any airborne dust inside the site.

Breaking of rock may occur and rock faces cleared to form a wall. Mesh will be used on the inside of all construction fencing to mitigate dust control.

All construction vehicles will be required to use the loading area for parking and idling to keep exhaust emissions within the construction zone. Vehicles will be staged so that idling will not occur for more than 3 minutes at a time.

As indicated above, all work shall be completed in accordance with the HRM Noise By-Law.

#### 7.8: Rodent Control

Rodent movement increases during construction activities. The owner has engaged a rodent control company, to utilize the established Rodent Control Plan (RCP) to help mitigate rodent movement prior to and during site demolition, excavation and building construction. The RCP applies to all project phases with the goal of preventing movement of rodents off-site. The RCP will consist of a baiting and monitoring program. Bait stations (traps) will be placed as outlined in the NPMA Pest Management Standards for Food Processing & Handling Facilities.

The RCP was engaged two weeks prior to the commencement of site demolition to help to lower the number of active rodents in the project area. Bait stations positioned along existing buildings and fence lines prior to excavation. Bait stations positioned along the edges of the project and secured in place using wooden stakes (for open sodded and

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dirt locations), weighted patio stones (behind walls and on paved areas), and zip-ties (fixed to fences) as per typical industry standards.

Refer to the appendix for a copy of the Rodent Control Plan.

# **Section 8: Site Protection & Hoarding**

#### 8.1: Barriers & Fences

The encroachment will be delineated with a mix depending on the street and proximity to street trees. A combination of chain link fencing and interlocking F-type concrete jersey barriers complete with plywood fencing with a total height (concrete barrier and fencing structure) being 1.8m or 6ft as per the noted administrative order. This fencing will be open rigid fence or covered with plywood of high quality which will extend a minimum 3m from the public right-of-way. This screening is described in the appendix and will block passersby or tourists view of the construction site. Throughout the project, fencing will be situated to not obstruct vehicle sight lines. In addition, the street tree fronting Carlton Street will be protected as per HRM's tree protection details with orange snow fencing delineating the existing tree lawn between the sidewalk and street curb.

Along the private sidelines where vehicular traffic and non-vehicular traffic is present, the hoarding will be delineated by a combination of concrete waste blocks with rigid fencing mounted on top and rigid fencing being 1.8m or 6ft as per the noted administrative order and weighted modular 1.8m (6ft) high fencing or existing fencing where it is at least 1.8m tall. All fencing will have opaque dust control mesh and must be anchored down to prevent unintentional movement or overturning due to snow or wind loads.

The F-type barriers, concrete waste blocks and fencing that define the encroachment will adhere to the Encroachment Plan which is to scale includes dimensions and can be found in the appendix. These areas can be measured for the administering of applicable fees. Encroachment areas and fees will be based on the areas within the public right-of-way enclosed by the barriers and fencing.

Installation of F-Type concrete barriers, concrete waste blocks, fencing and covering will take place during regular working hours as noted above. This work will be scheduled by the contractor after the HRM's pre-construction meeting has been held. HRM will coordinate this pre-construction meeting; the developer, contractor and traffic control company will attend this site meeting. During the process of erecting and tearing down the traffic barriers, fencing and opaque covering defining the encroachment, traffic control elements will be implemented as per the Traffic Control Plan(s) in the appendix. All work and any traffic interruptions will be coordinated by the contractor who will notify HRM a minimum of 5 business days before work is scheduled to begin.

It is noted that surplus fencing must be stored and installed from private property when relocated for deliveries and be routinely re-established to keep the site secure. Surplus fencing cannot be stored within HRM's right-of-way.

#### 8.2: Snow removal

The developer will be responsible to remove snow and ice as required to ensure that emergency access is maintain to the project site, this includes fire hydrants. The contractor will not dump snow or ice onto adjacent property and will truck snow off site as required to prevent the unsafe build-up of snow piles.

The contractor will clear snow from outside the jersey barriers to keep the edge of the vehicle travel lane clear of snow and ice build up on Robie and Spring Garden and fencing along the Carlton.

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#### 8.3: Gate Access and Egress

The site will be accessible through gates. These gates are the only locations that will receive equipment/materials during construction, gates will remain closed and will be locked at all times after work hours. In cases of emergencies, on-site workers will exit the project site through these gates. These gates will remain unlocked at all times when workers are on site in case of emergency allowing unrestricted emergency response units access to the site.

One (1) construction access gate is planned for the project during stage 1 stationed at the property line on Carlton, two (2) construction access gates are planned for this project during stage 2 stationed at the proposed driveways along the front of sidewalk on Robie and along the back of sidewalk on Carlton that will remain throughout construction, and four (4) construction access gates are planned in stage 3 & 4 with two (2) additional gates stationed at either end of the Spring Garden layby to facilitate deliveries.

Gates are to swing into site, remain closed when not in use and locked after hours.

Any existing fire hydrants located adjacent to the site will remain protected from construction activities. These fire hydrants, along with the existing fire department connections will be accessible to firefighters throughout all phases of the project. Adjacent existing hydrants and fire department connections are not anticipated to be affected by construction.

#### 8.4: Hoarding Aesthetics

The site hoarding will resemble that shown in the appendix; encroachment fee reductions are not anticipated at this time however the developer will revisit this with HRM after the hoarding is installed.

#### 8.5: Sight Lines

Rigid fencing and signage will be installed as per the CMP drawings such that vehicle sight lines are maintained around corners, particularly at driveway access points and existing intersections.

#### 8.6: Project Information and Contacts

To encourage communication between the project team and the public, contact information will be provided on Project Information Boards; these will be posted prominently around the project site on the fencing; refer to the appendix for a copy of the Project Information Board and the Encroachment Plan for the planned locations. Refer to the signage specification within the appendix describing the required size, materials, mounting hardware, etc. of these signs.

# **Section 9: Lifting, Hoisting, and Crane Operations**

#### 9.1: Crane Use Overview

This project will incorporate a tower crane, the crane will be stationed within the project site and will be operated under the direct supervision of a licensed crane operator employed by the formwork contractor. The approximate location of the site's tower crane is shown in the appendix.

It is anticipated that the crane assembly and disassembly will be stationed on private property and within the encroachment area.

The crane swing will extend over neighbouring properties as shown in the Crane Swing Diagrams included in the appendix. The developer will notify adjacent property owners prior to extending the crane over their properties. Refer to the appendix for crane information.

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Depending on the stage of construction, concrete trucks will be stationed within the encroachment area or private property during concrete operations and concrete is anticipated to be hoisted to upper levels by tower crane. (See concrete delivery schematic within the appendix).

If lifting operations are required over the public realm, this area will be closed to access. In all cases of lifting, extreme care will be used to ensure public and worker safety.

#### 9.2: Transport Canada and Nav Canada Regulations

There are two registered aerodromes in the Halifax region; Halifax International Airport and Canadian Forces Base Shearwater Airfield. According to Transport Canada regulations, the project site is outside of the lands to which regulations for these two aerodromes apply.

#### 9.3: Aerodromes

There are several heliport approaches in the Halifax region; both Emergency Hospitals (QEII and IWK) as well as Point Pleasant Park. Given the location of the project site relative to these various approaches we understand Transport Canada notice does not apply.

### **Section 10: On-Site Safety and Security**

#### 10.1: Site Safety and Security Overview

The contractor will adhere to all Occupational Health & Safety requirements throughout the completion of this project. At a minimum, the following safety protocols will be utilized to further enhance site safety and security:

- a) All workers will be required to have proof of up-to-date safety training;
- a) Personal protective equipment (PPE) will be required for all personnel on site;
- b) Adequate signage will be placed outside the hoarding, which will warn of hazards that may exist;
- c) Gates will be locked and the perimeter fencing secured to provide security against public access during off work hours and will be monitored during operation;
- d) Hoarding will clearly state "No Trespassing Construction Personnel Only" & PPE requirements will be clearly identified (e.g., "Hard Hats and Safety Footwear Must Be Worn Beyond This Point");
- e) Regular safety inspections will be conducted to ensure suitability of hoarding and other safety devices;
- f) Emergency contact information to be prominently posted as per the Project Information Board.

#### 10.2: Material Handling: Loading, Unloading, Delivery and Storage

The contractor will adhere to the procedures stipulated in the Haul Route Plan for delivery of materials. Delivery vehicles will use the designated gates for entry and exit. Timing of deliveries will be coordinated to have the least possible negative impact on regular traffic. The staging and delivery area will be coordinated by the delivery companies and site personnel, concrete and material delivery trucks will be housed within encroachment area or private property accessed from Robie, Spring Garden and Carlton Street.

#### 10.3: Emergency Access & Egress

The site will be accessible through gates to facilitate construction vehicle access. In cases of emergencies, on-site workers will exit the project site through these gates. These gates will remain closed but unlocked at all times when workers are on site in case of emergency allowing unrestricted emergency response units access to the site. Gates will be locked and secured afterhours to provide security against public access during off work hour. Emergency contact information will be posted on project information boards surrounding the site, refer to the CMP plan for details.

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Gates are to remain closed at all times unless being used for deliveries to maintain a controlled access site preventing access by the general public to the construction site.

#### **10.4: Security Site Lighting**

Security site lighting is not anticipated for this project.

#### 10.5: Smoking Areas

On site smoking areas will not be provided as this will be a smoke-free site.

#### **10.6: Fire Suppression Systems**

There are two (2) existing fire hydrants in vicinity the project site. One (1) fronting civic 5896 Spring Garden Road and one (1) on the intersection of Robie and Coburg in front of civic 6005 Coburg Road, that remain outside the project area and will be protected from construction activities. These fire hydrants, along with any existing fire department connections will be accessible to firefighters throughout all phases of the project.

The proposed fire department connection and fire hydrant are not available for fire department use until after the water supply lines have been installed, tested and commissioned by the water commission, similar with the fire suppression system. This system will not be active until after the building is near complete and the encroachment fencing has been removed.

### **Section 11: Pre-Construction Consultation & Meeting**

#### 11.1: Pre-CMP Community Consultation

A construction notification letter will be delivered to the properties neighbouring the construction site as well as HRM staff, notifying them of the expected work with contact information for questions and feedback. As part of this notification the surrounding community and businesses will be offered to sign up for a monthly construction project notification from the development. It is understood, HRM requires a confirmation letter from the applicant confirming delivery of notification letters to affected residents. A map indicating these properties has been included in the appendix.

#### 11.2: Project Information and Contacts

To encourage communication between the project team and the public, contact information will be provided on Project Information Boards; these will be posted prominently around the project site on the fencing; refer to the appendix for a copy of the Project Information Board and the CMP Plan for the planned locations. Information on signage size and materials is outlined in the appendix.

#### 11.3: Preconstruction Meeting

Prior to construction the developer, contractor and traffic control company will attend a pre-construction meeting with HRM staff to review the CMP document on site. HRM's engineering technician will confirm the date and time of this meeting; and may wise to waive the requirement.

#### 11.4: Construction Notification

Approximately five (5) business days prior to the encroachment, an additional notification will be circulated to the neighbouring properties, notifying them that work is starting on site.

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## **Section 12: Summary**

This construction management plan was prepared with the goal to minimize negative impacts to the community, pedestrians, and traffic throughout the scope of this project. This plan will be used as a minimum standard and any further safety protection required or methods to provide a more positive environment will be used throughout construction work as necessary.

Should you have any questions or comments related to this document, please contact SDMM. For all construction-related inquiries, please contact the developer, contractor, or traffic control service provider.

Regards,

Servant, Dunbrack, McKenzie & MacDonald Ltd.

Geoff MacLean, P.Eng.

Project Engineer

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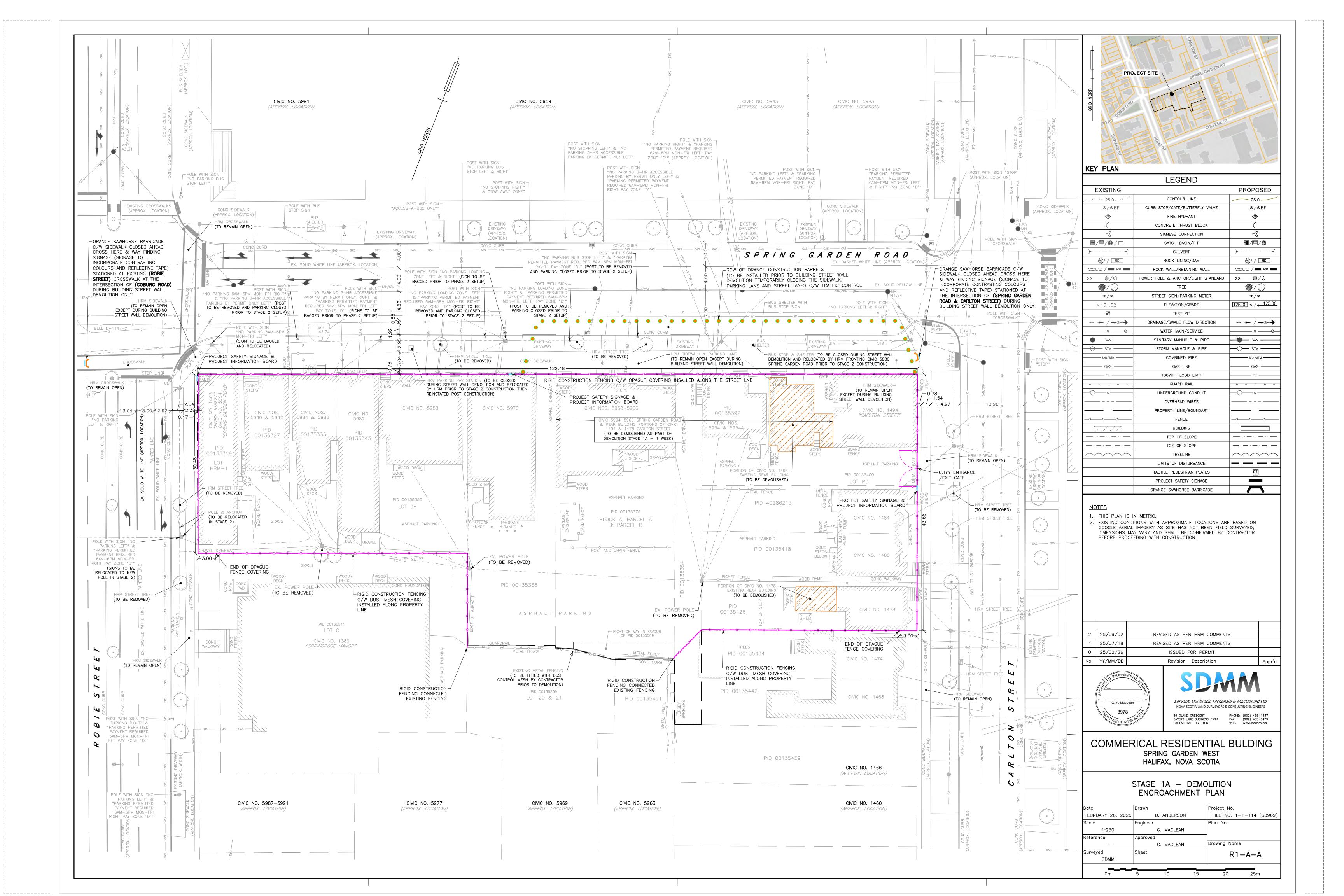
# **APPENDIX**

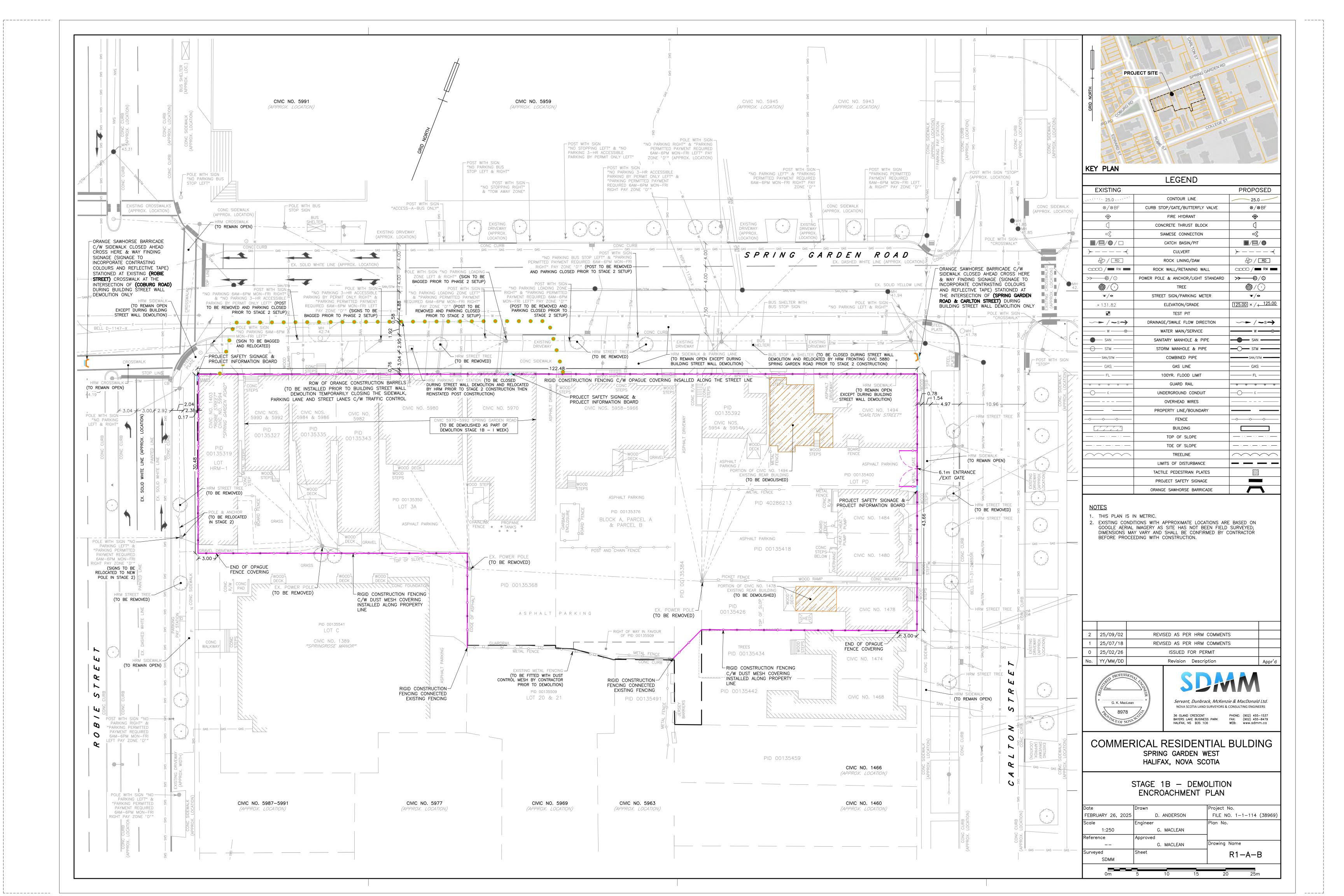
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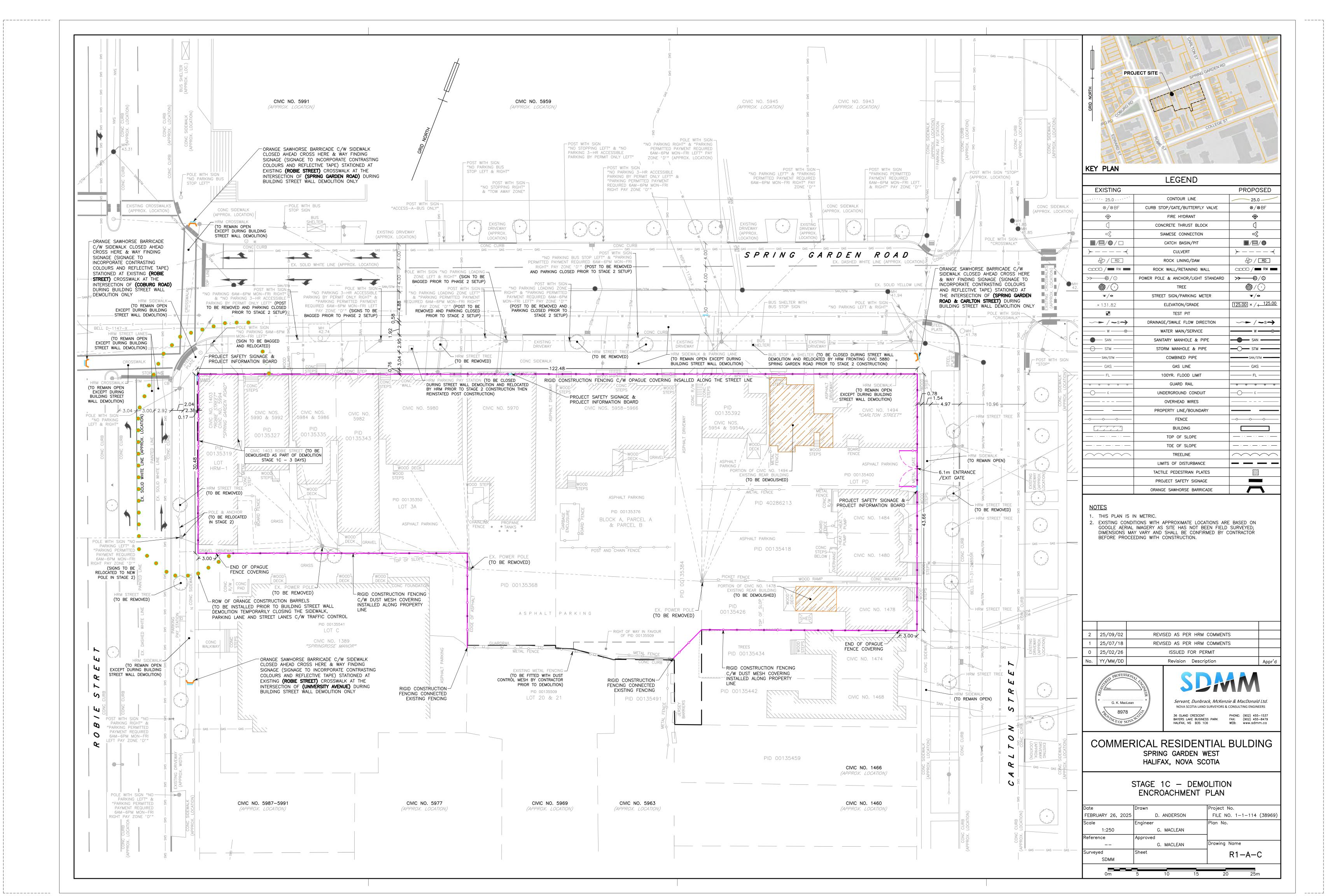


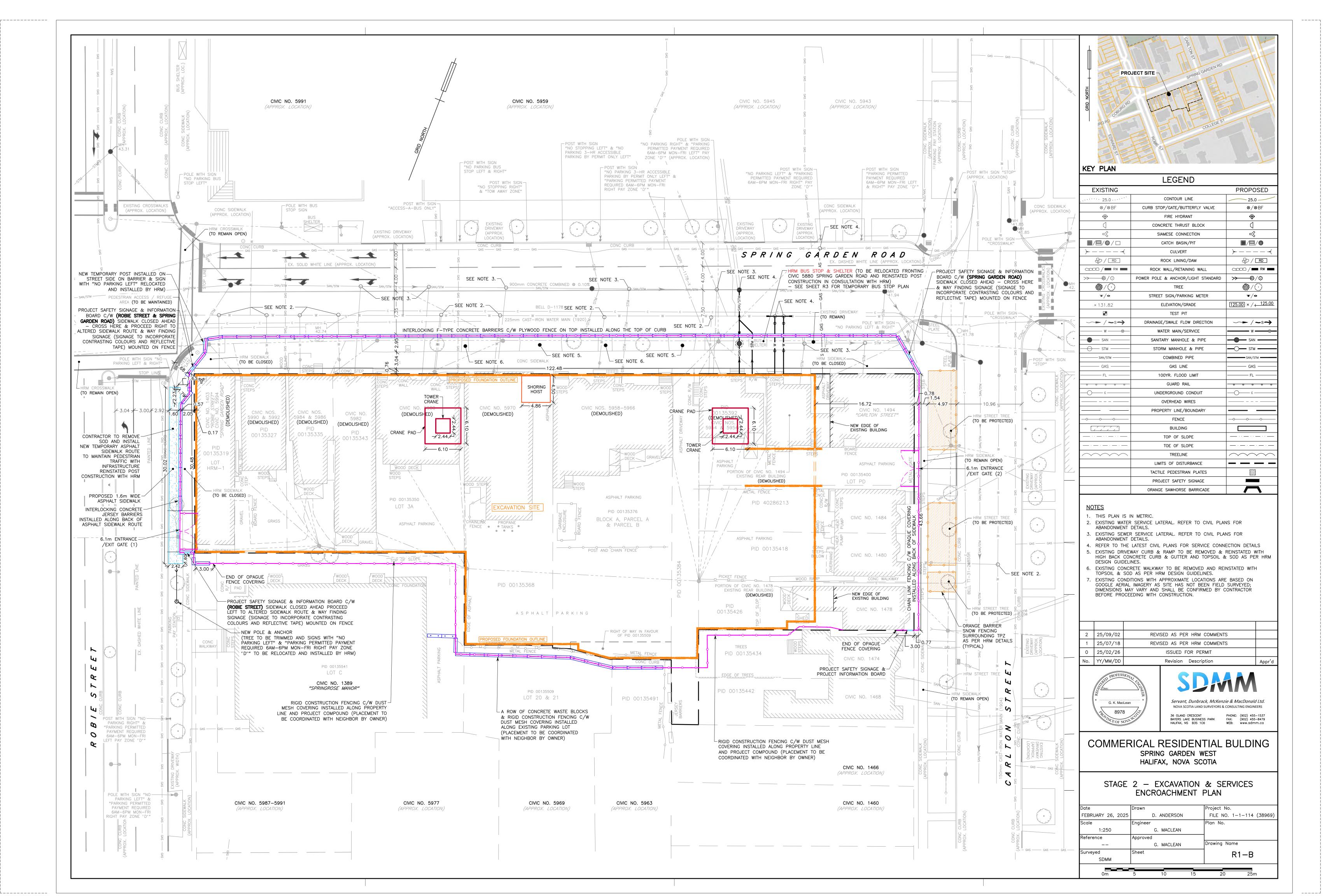
# Appendix A – Encroachment Plan

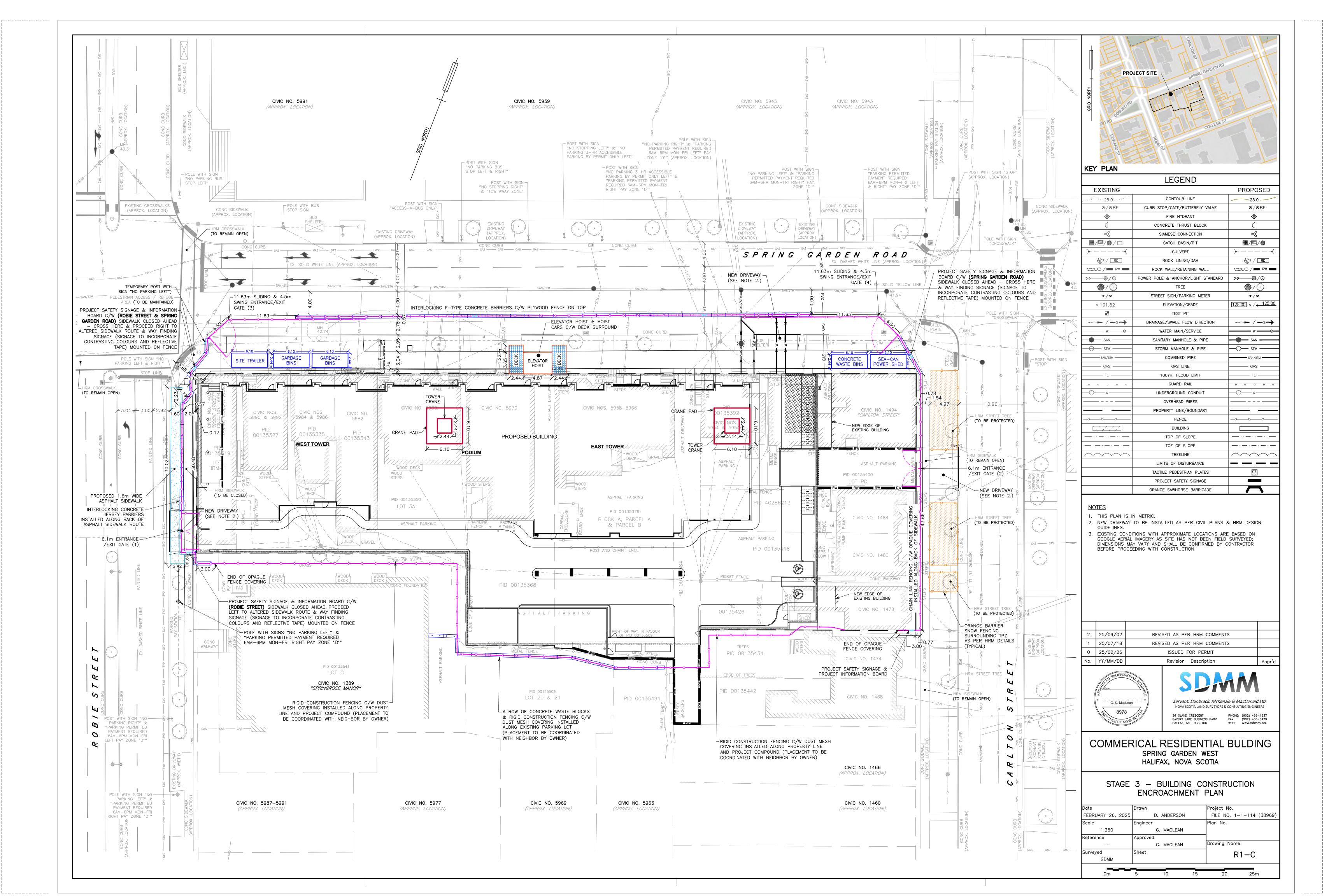
Page | A Job No. 38969

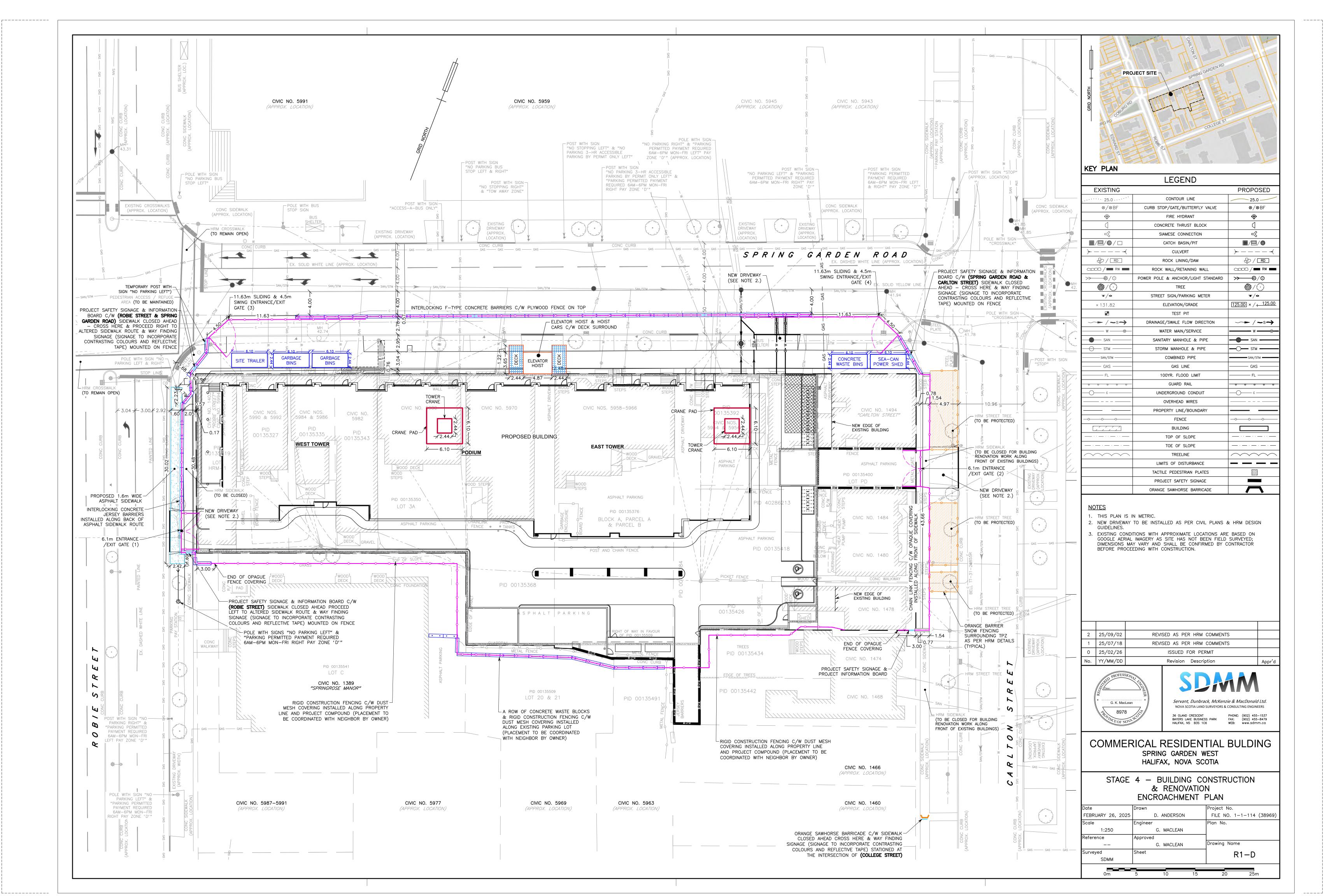








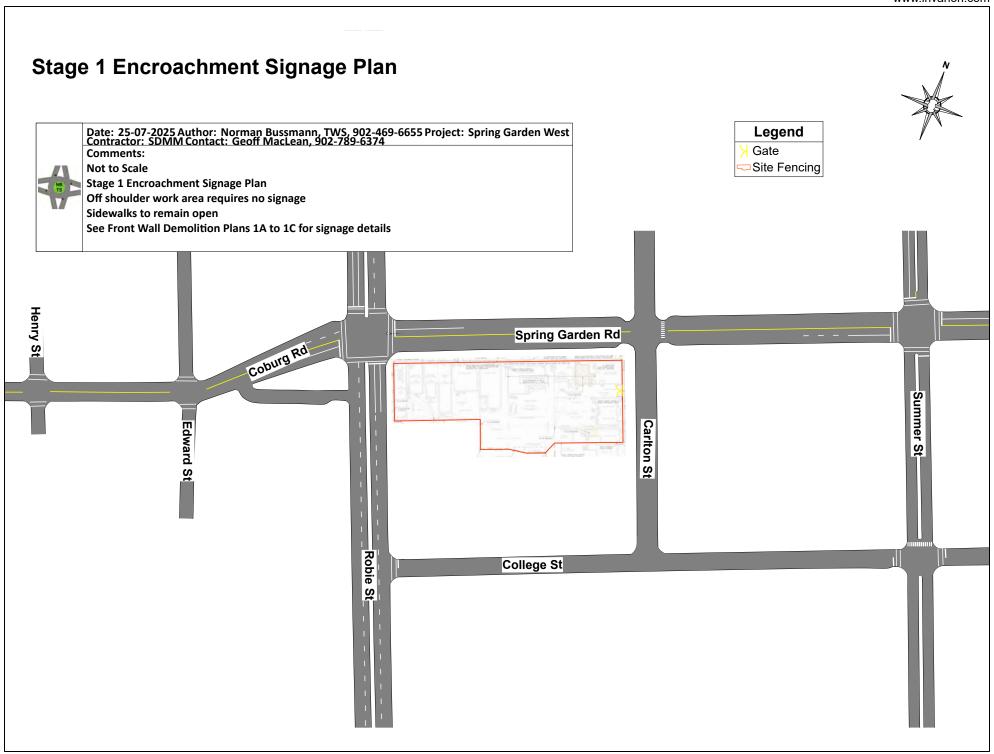






# Appendix B – Traffic Control Plans TCP

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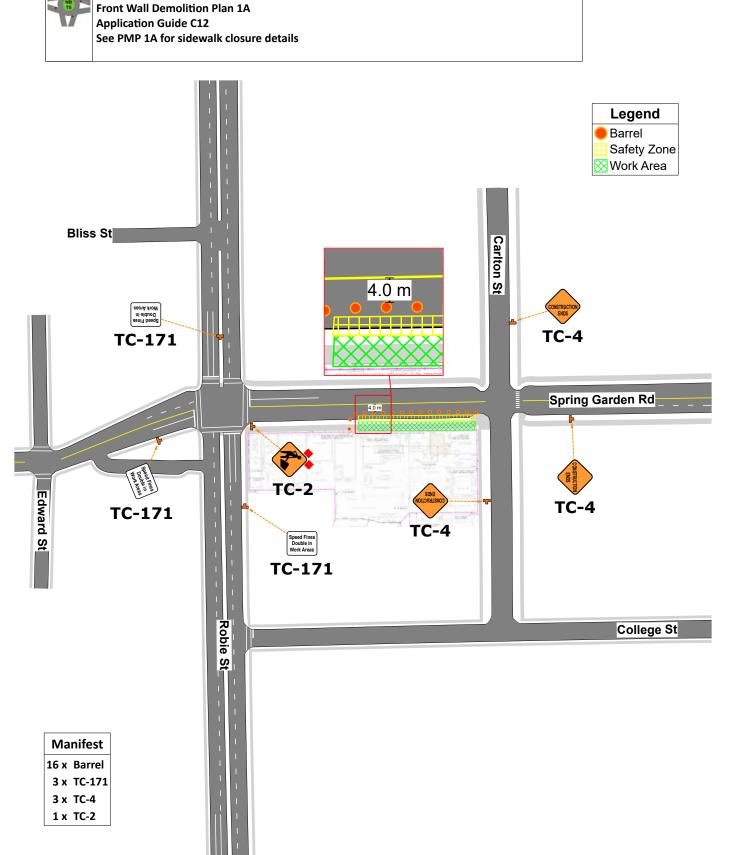


# Front Wall Demolition Plan 1A

Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374

Comments:

Not to Scale



# Front Wall Demolition Plan 1B Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374 **Comments:** Not to Scale Front Wall Demolition Plan 1B **Application Guide C12** See PMP 1B for sidewalk closure details Bliss St Carlton St TC-171 4.0 m Spring Garden Rd Coburg Rd Edward St TC-171 TC-171 Robie St College St **University Ave**

# Front Wall Demolition Plan 1C



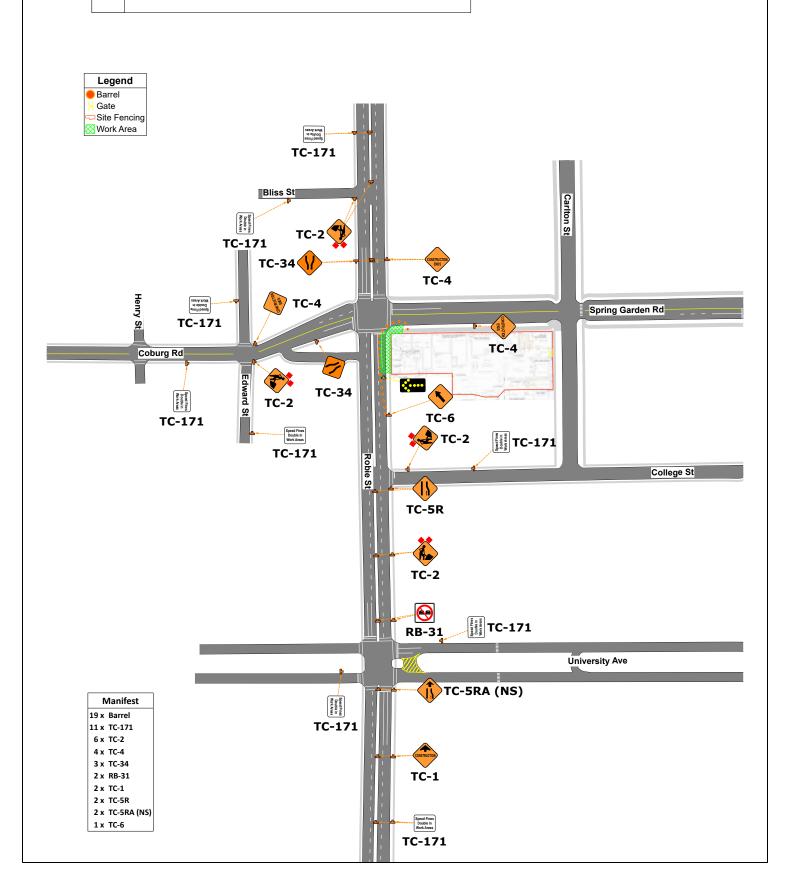
Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374
Comments:

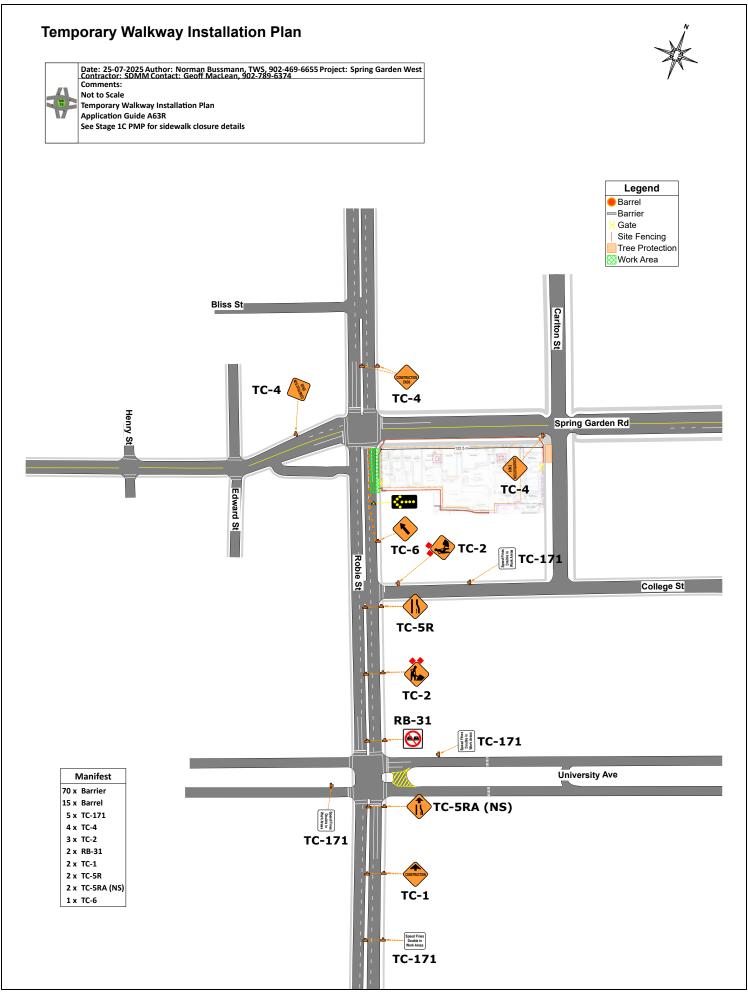
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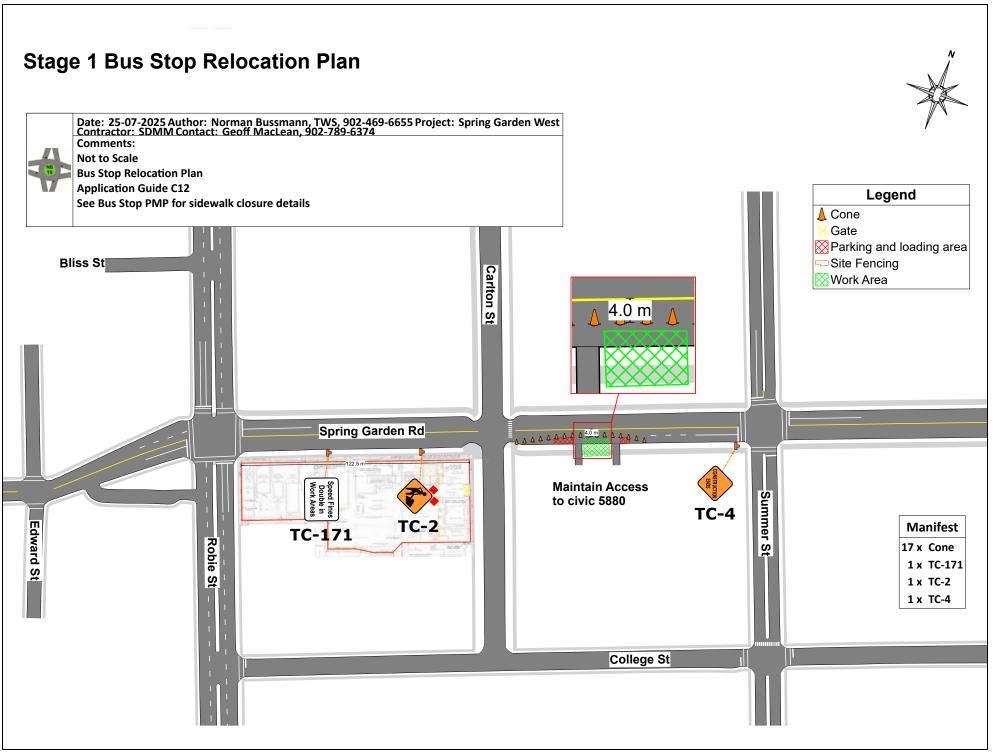
Front Wall Demolition Plan 1C Application Guides A63R, C22

See PMP 1C for sidewalk closure details









# Spring Garden **Closure Plan**





Date: 2025-08-22 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374
Comments:

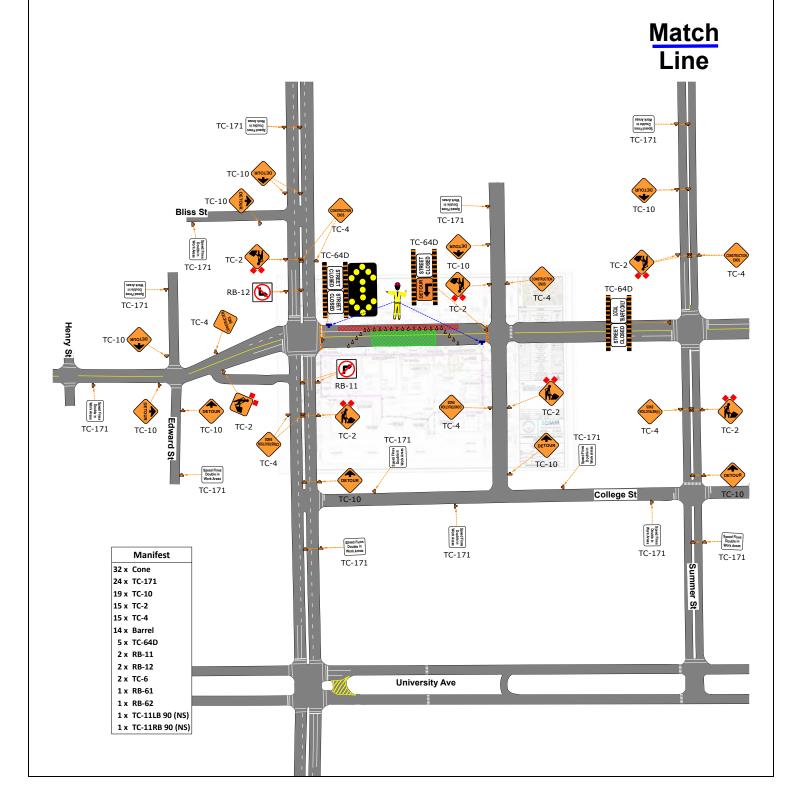
Not to Scale

Spring Garden Closure Plan

Application Guide C114

See Detour Wayfinding Plan for Route and tab placement details



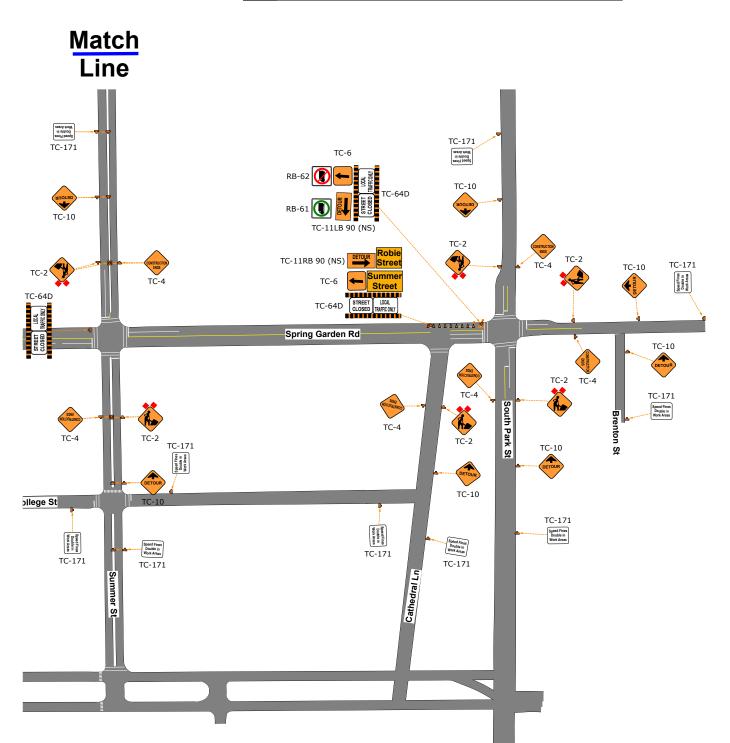




# Spring Garden Closure Plan 2



Date: 2025-08-22 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374
Comments:
Not to Scale
Spring Garden Closure Plan
Application Guide C114
See Detour Wayfinding Plan for Route and tab placement details









Date: 2025-08-22 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374
Comments:

Not to Scale

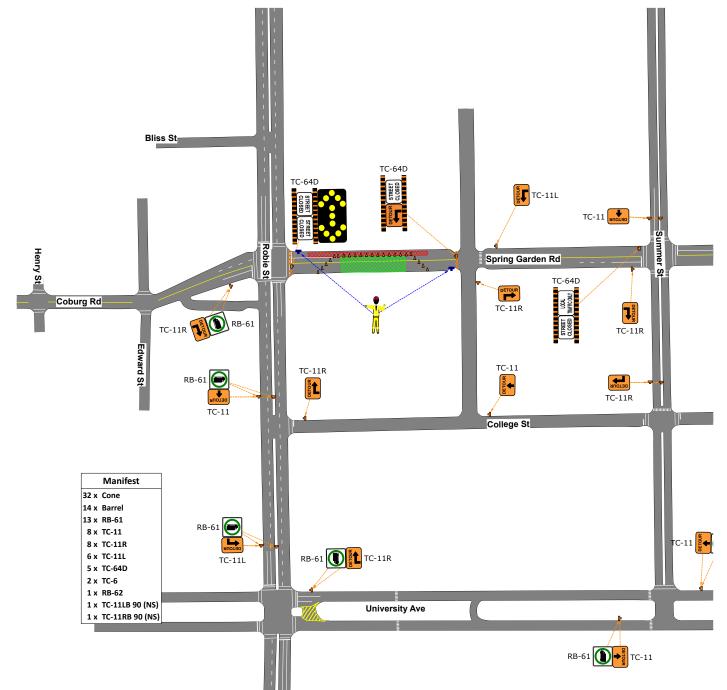
Spring Garden Rd Detour Wayfinding Plan

Application Guide C77

RB-61 Truck Route Signs added to detour tabs to give clear directions for large vehicles Red Travel Lane is for maintaining access to parking and residences. All Traffic MUST come in from the Carltons St side and exit via the Robie St end. This information should be included in the letters of intent to be distributed in the area

Legend Barrel ₹Barricade Superviso Travel Lane Work Area

> Match Line





## **Detour Wayfinding Plan (2)**





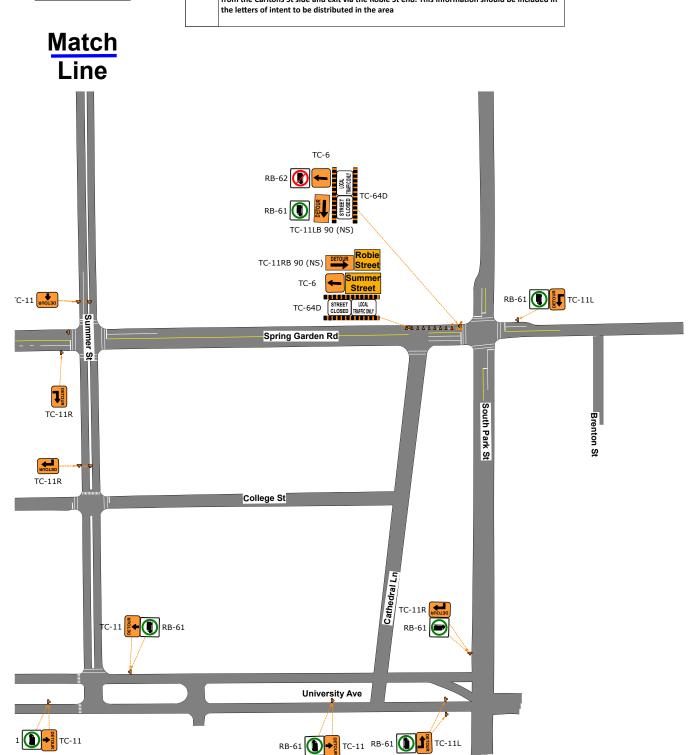
Date: 2025-08-22 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374

Not to Scale

Spring Garden Rd Detour Wayfinding Plan

Application Guide C77

RB-61 Truck Route Signs added to detour tabs to give clear directions for large vehicles Red Travel Lane is for maintaining access to parking and residences. All Traffic MUST come in from the Carltons St side and exit via the Robie St end. This information should be included in



### **Barrier Installation and Removal Plan**



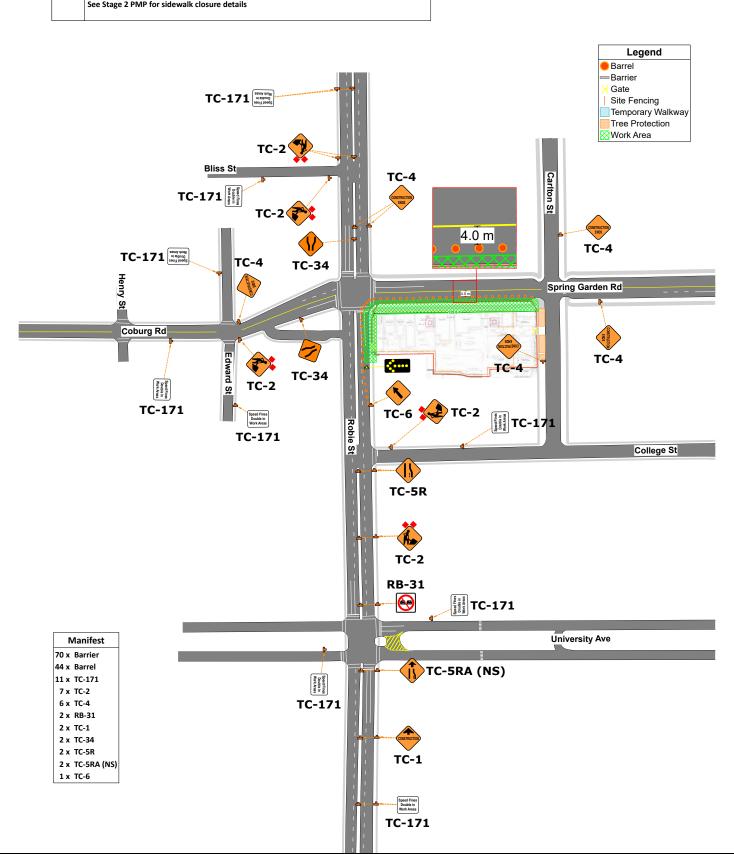


Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374

Comments:
Not to Scale

Barrier Installation and Removal Plan Application Guides A63R, C22

See Stage 2 PMP for sidewalk closure details



### **Laterals Installation Plan**





Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374
Comments:

Not to Scale

Laterals Installation Plan

Application Guides C22 and C112

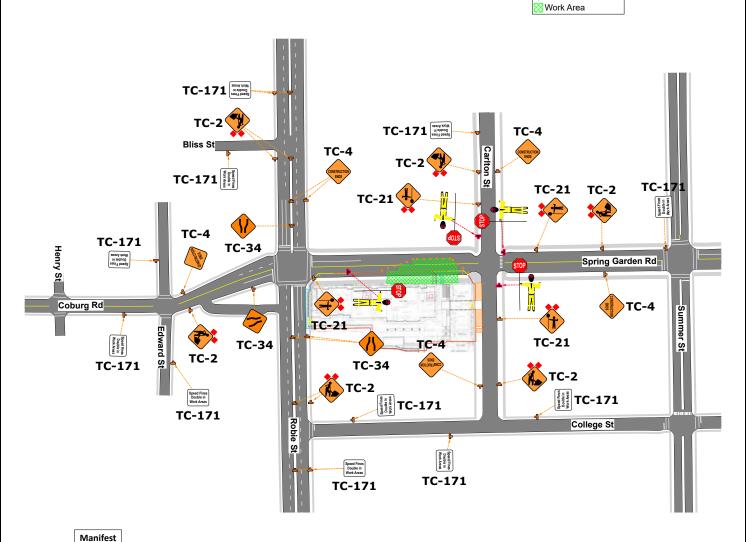
See Stage 2 PMP for sidewalk closure details

Legend

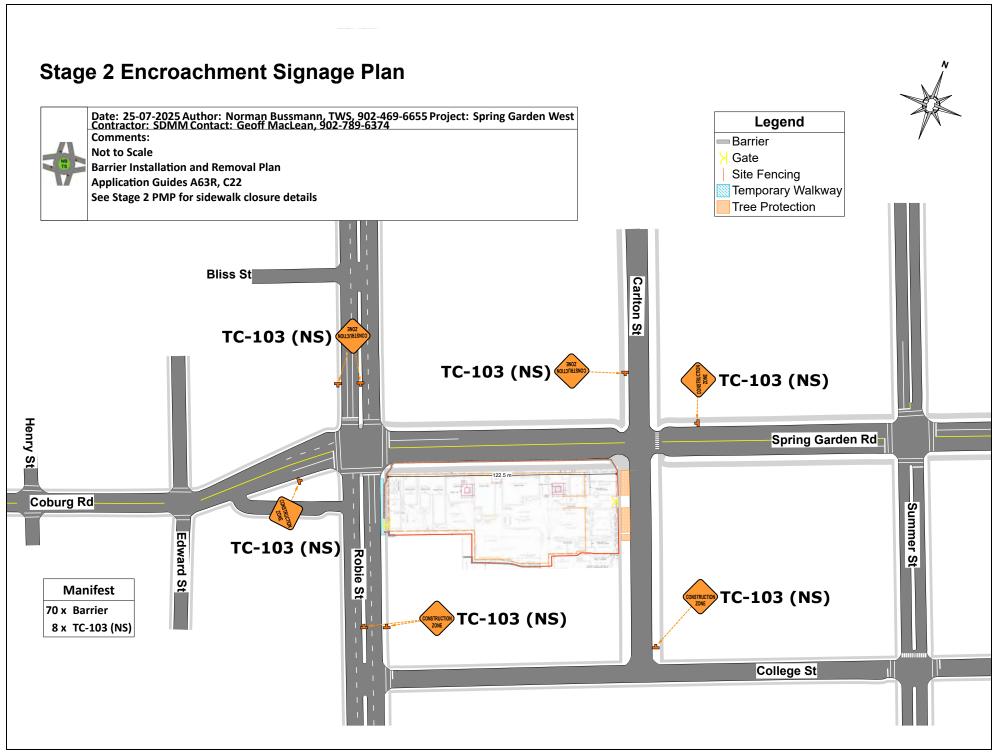
Barrel
Barrier

Control Position

Gate
Sanitary Lateral
Site Fencing
Storm Lateral
Temporary Walkway
Tree Protection
Water Lateral

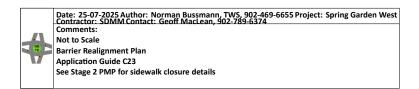


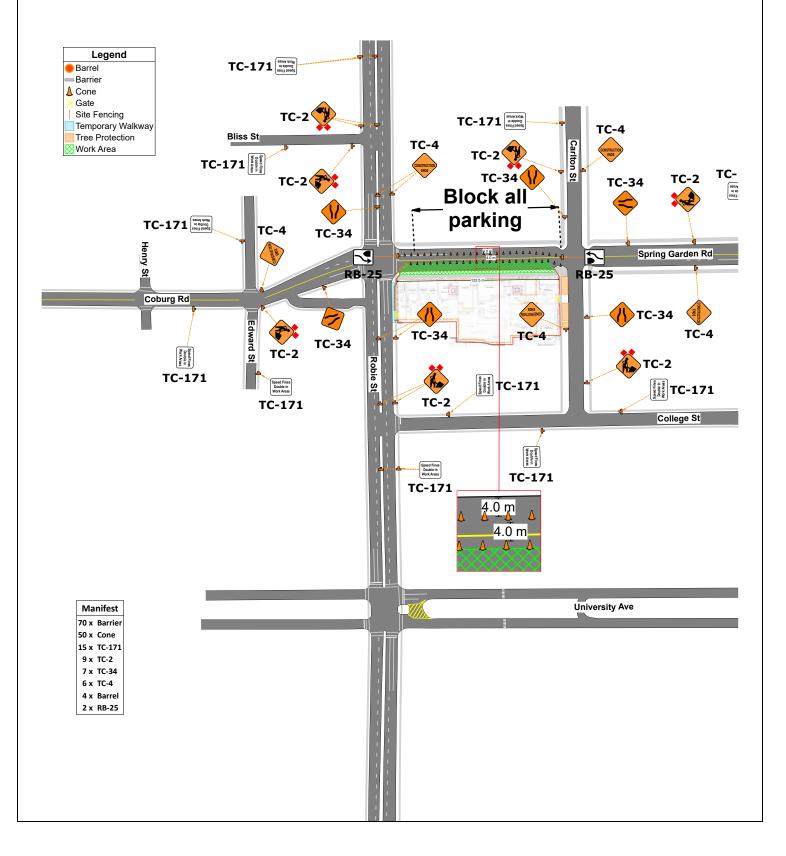
60 x Barrier 16 x Barrel 13 x TC-171 8 x TC-2 6 x TC-4 4 x TC-21 4 x TC-34



## **Barrier Realignment Plan**

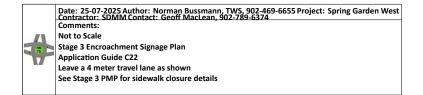




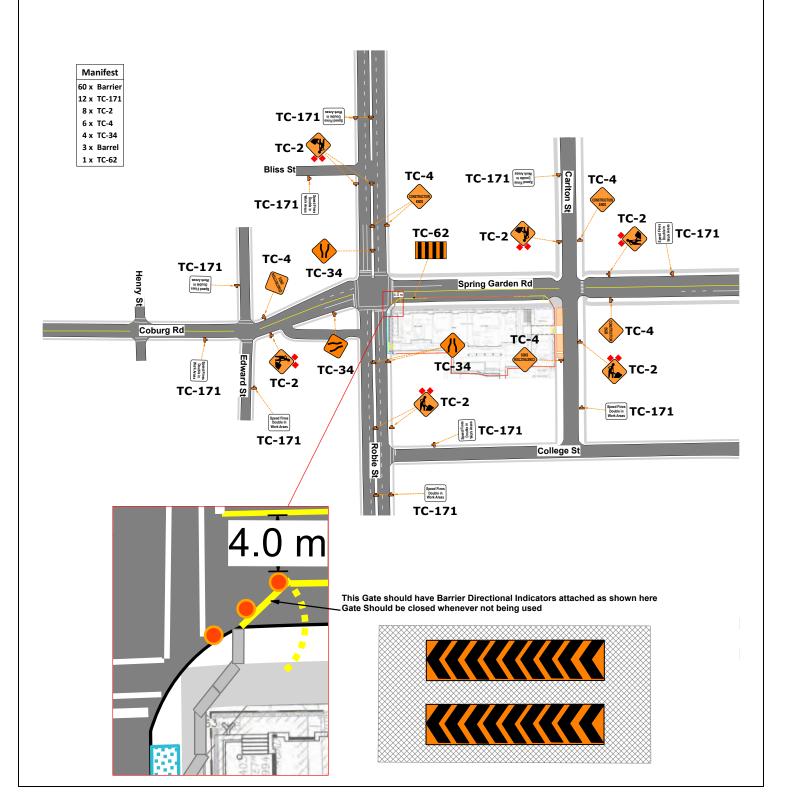


## **Stage 3 Encroachment Signage Plan**



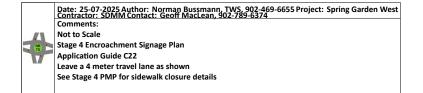




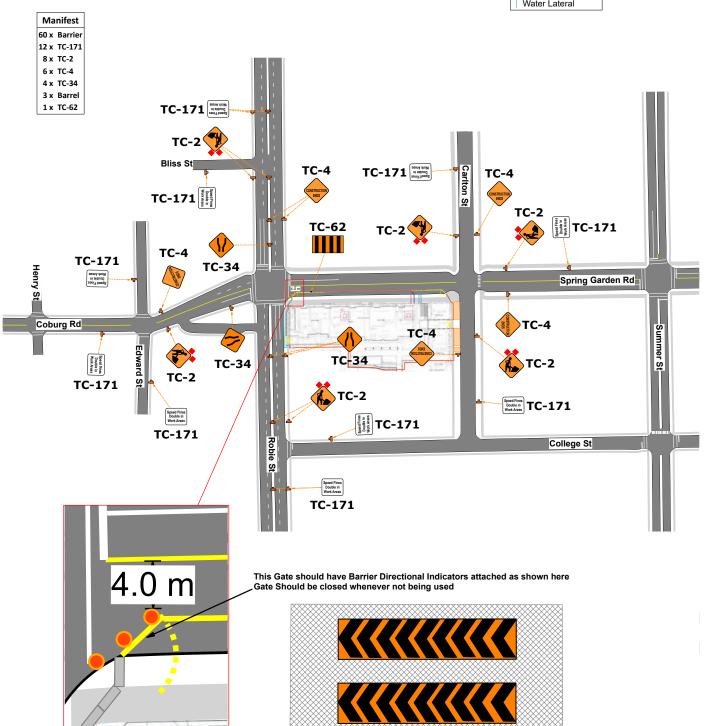


## Stage 4 Encroachment Signage Plan











# Appendix C – Haul Route Plan

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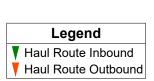
## **Haul Route Plans for Stages 1 to 4**

Comments: Not to Scale

Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374 **Haul Route Plan Inbound via Robie St Outbound via Robie St** 













# Appendix D – Pedestrian Management Plan (PMP)

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## Pedestrian Management Plan 1A

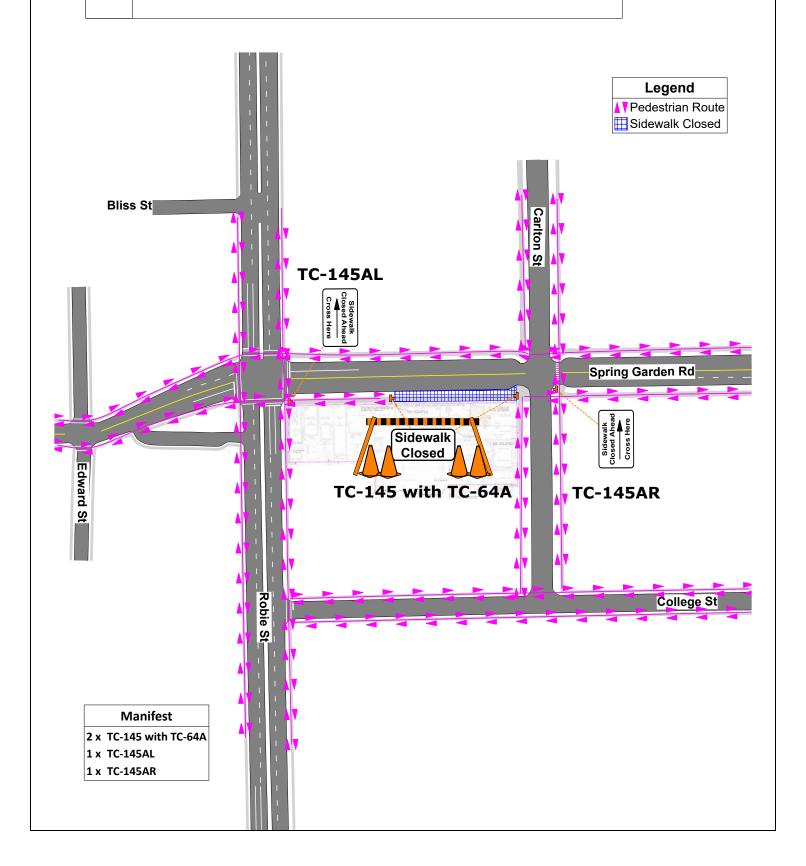




Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374

Comments: Not to Scale

Pedestrian Management Plan 1A Use with Front Wall Demo Plan 1A



## Pedestrian Management Plan 1B

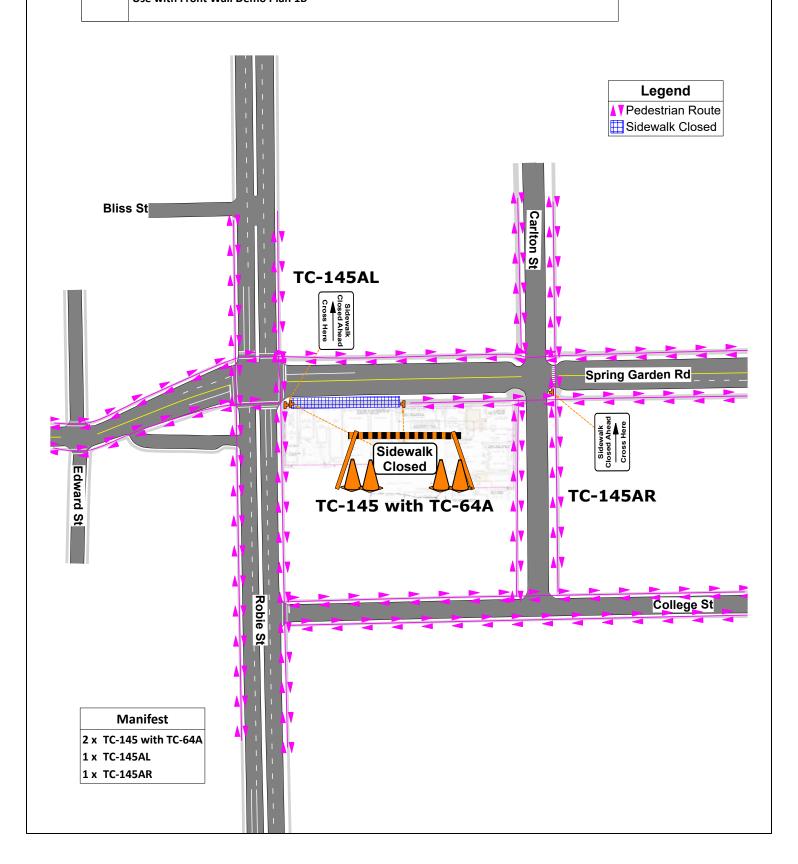




Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374 Comments:

Not to Scale

Pedestrian Management Plan 1B Use with Front Wall Demo Plan 1B



## **Pedestrian Management Plan 1C**



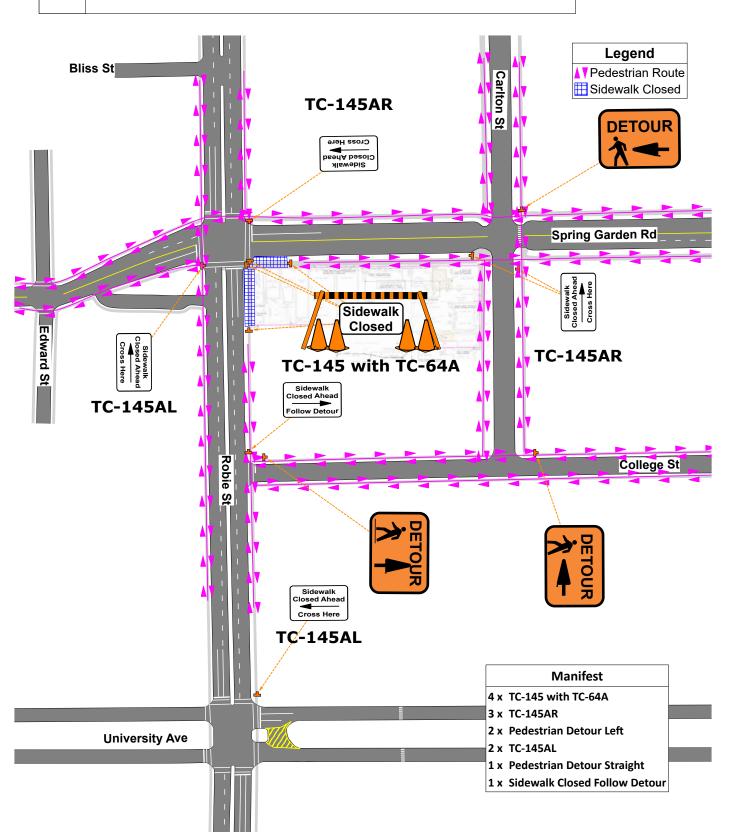
Date: 25-07-2025 Author: Norman Bussmann, TWS, 902-469-6655 Project: Spring Garden West Contractor: SDMM Contact: Geoff MacLean, 902-789-6374

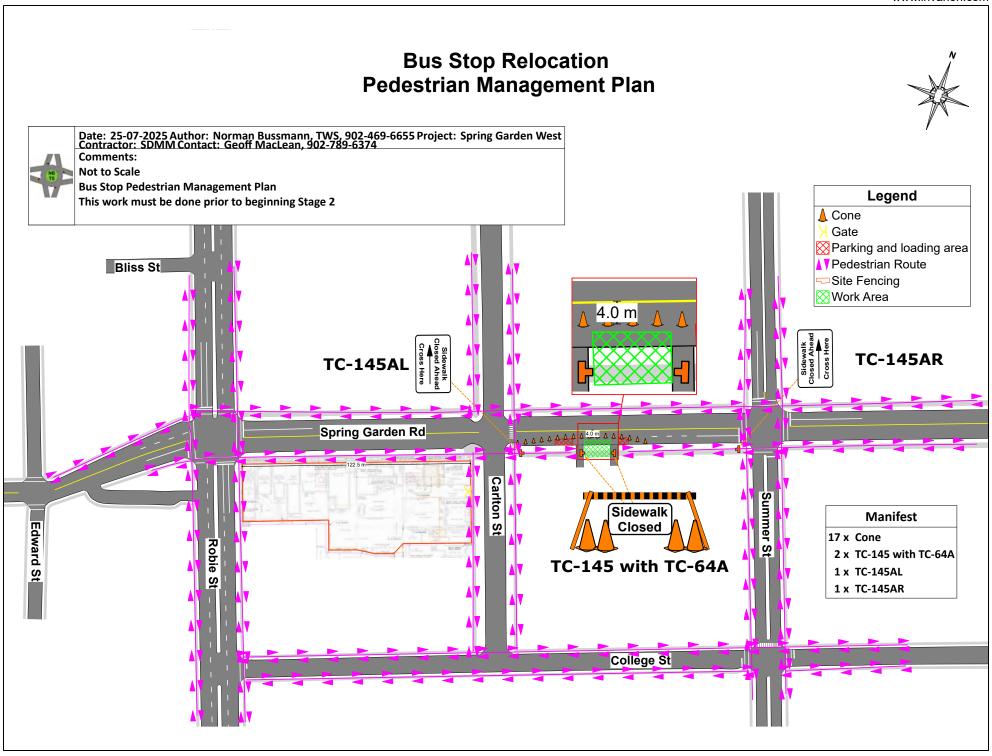
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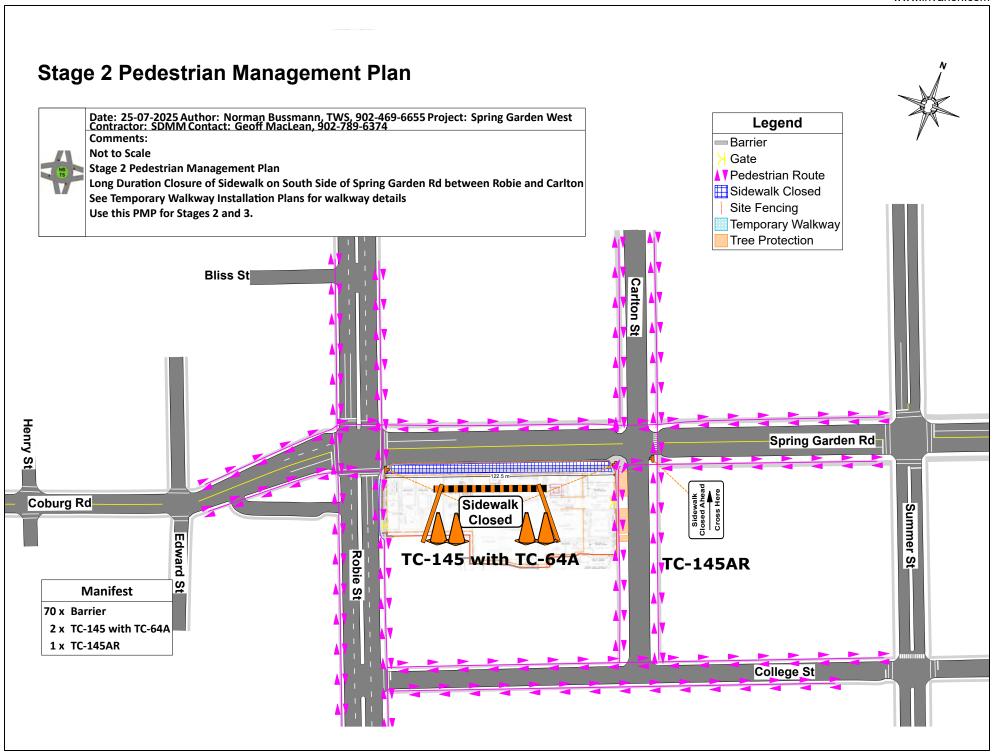
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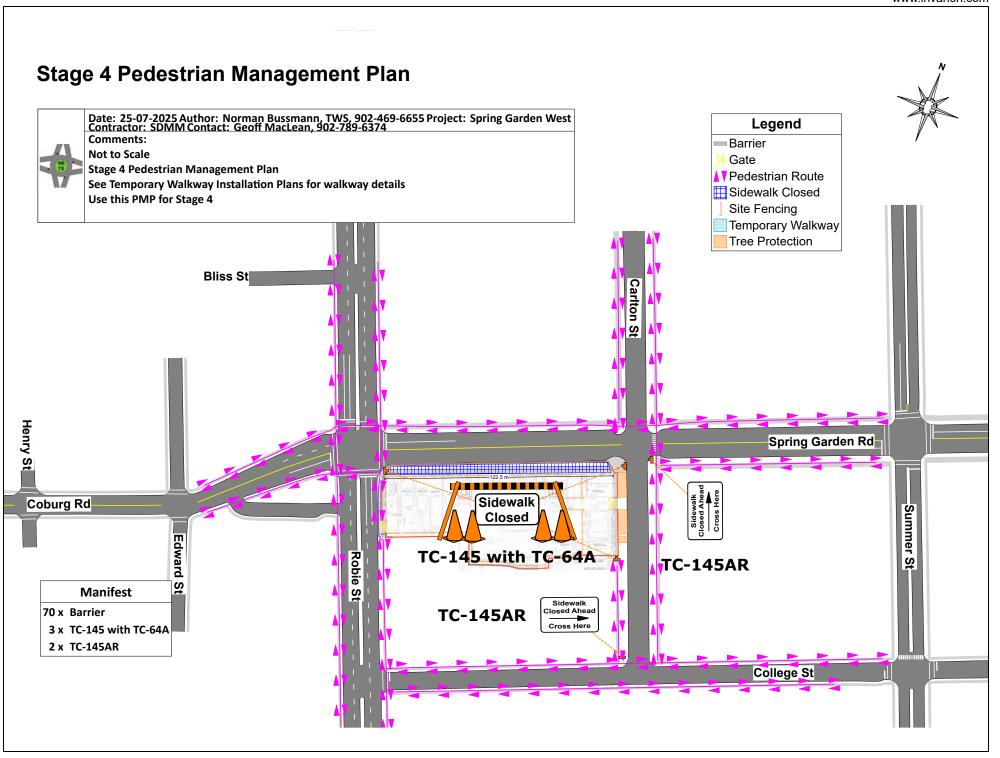
Pedestrian Management Plan 1C Use with Front Wall Demo Plan 1C













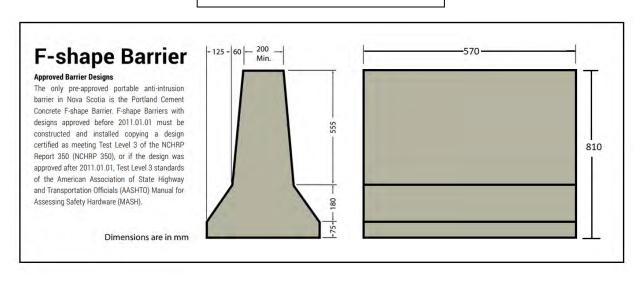
## **Appendix E – Barrier, Waste Blocks, Fence & Gates Information**

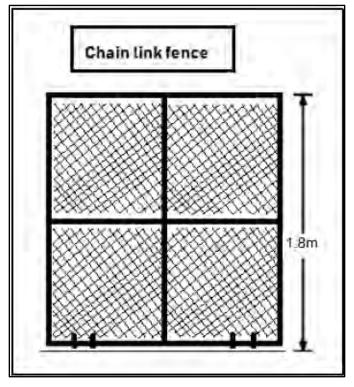
Page | E Job No. 38969

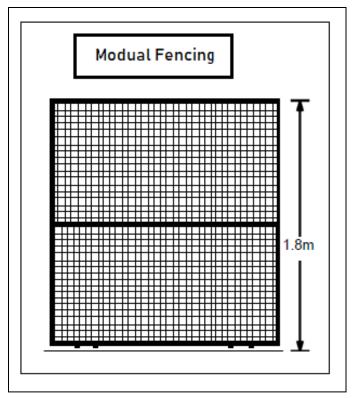
#### Sample Barrier & Fence

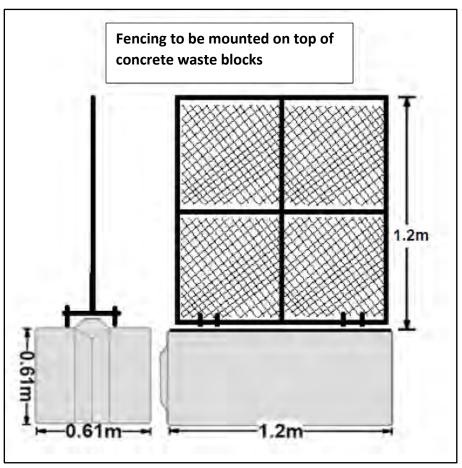
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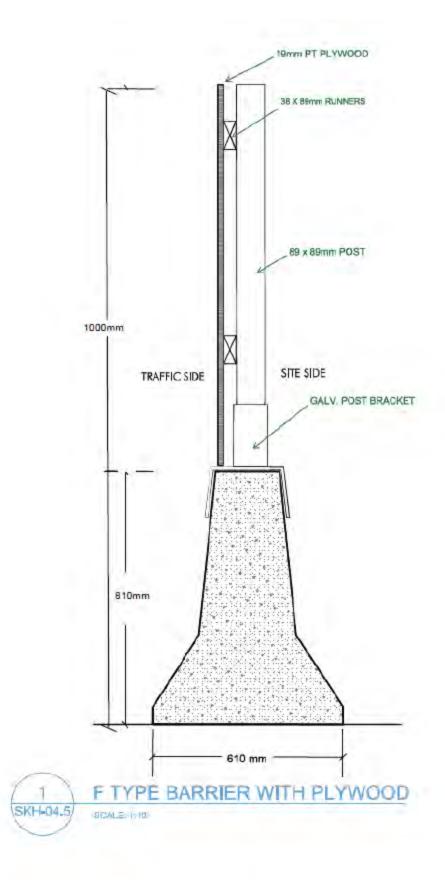
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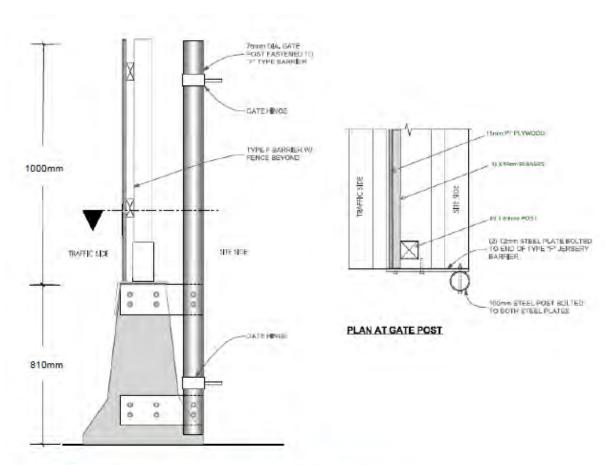




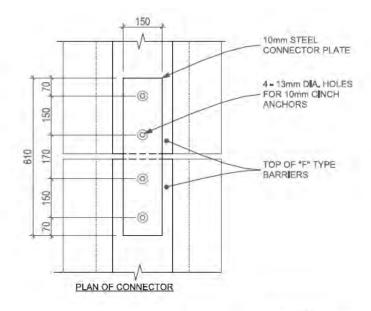


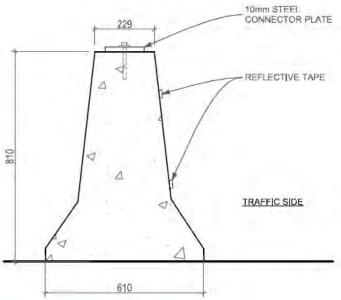




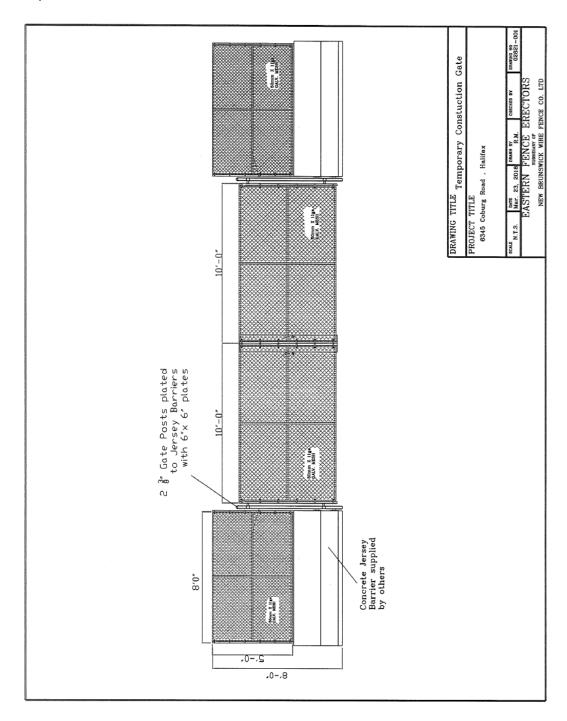


GATE POST CONNECTION TO F TYPE BARRIER





3 TYPICAL F TYPE BARRIER
SKH-04.5 SCALE 1:1



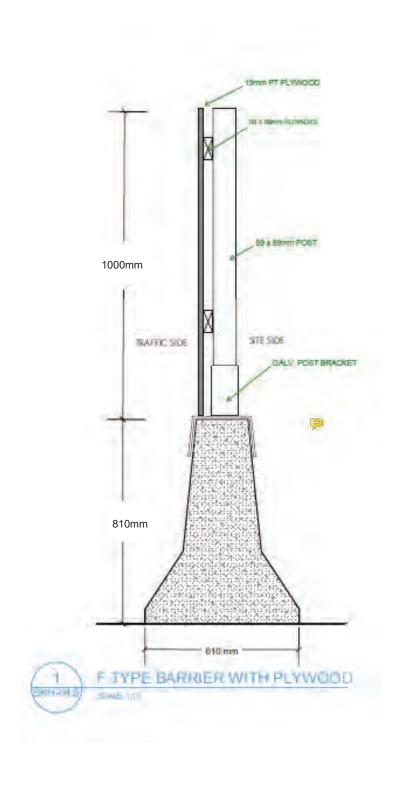


# **Appendix F – Hoarding Information**

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Opaque construction hoarding material shall covering and be adequately secured to the rigid fencing that outlines the encroachment area. This covering shall be continuous such that it prevents passersby or tourist from seeing through the fencing and gates to the active construction site.

The developer plans to utilize wooden fencing mounted atop F-type concrete jersey barriers.





# **Appendix G – Project Information Board**

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# PROPOSED SPRING GARDEN WEST RESIDENTIAL DEVELOPMENT

30 Storey - Mixed Use Building

438 Residential Units

3 Levels of Commercial Space Fronting Spring Garden Road & Robie Street

5 Levels Underground Parking

Mixture of Studio & 1-3 Bedroom Units

### **August 2025 – June 2030**

### **Developer:**

Dexel Developments Limited 1245 Barrington Street, Halifax, NS, B3J 1Y2

### **Project Manager:**

Dexel Developments Limited 1245 Barrington Street, Halifax, NS, B3J 1Y2

#### 24 Hour Contact:

Kris Skiba - (902) 404-8063

#### **Contractor:**

Atlantic Road Construction and Paving 6 Belmont Avenue, P.O. Box 89 Eastern Passage, NS, B3G 1M7

#### **Contact:**

Greg MacDonald – (902) 830-6411

#### **Traffic Control:**

Frontline Traffic Services 6 Belmont Avenue, P.O. Box 89, Eastern Passage, NS, B3G 1M7

#### **Contact:**

Tyler Hayman – (902) 818-5548

#### **Rodent Control Company:**

Rentokil Pest Control

11 Glendale Avenue, Unit #5, Lower Sackville, NS, B4C 3P2

#### Contact:

Main Office - (902) 812-0375



# Appendix H – Project Safety Signage

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CONSTRUCTION SITE

Email: info@dexel.ca 24hr Emergency Contact 902-446-9916 Site Address

6030 Pepperell St.

**DEXEL** 

SITE OFFICE LOCATED AT REAR





# **Appendix I – Project Signage Specifications**

Page | I Job No. 38969

Signage Specifications: Project Signage shall;

- Be constructed of weatherproof material (corrugated plastic)
- Have high visibility contrasting colours (dark letters on white background)
- Incorporate appropriate font types (mix of upper and lower-case lettering)
- Incorporate appropriate font sizes (16mm 51mm) such that the signage is readable from a distance (16-20m)
- Size of signage will be poster size (600mm x 900mm) or larger; to allow community members to see and read the information from a distance
- Signage may incorporate plastic grommets positioned every 300mm around the perimeter of the signage to ensure a secure signage installation
- Signage will be installed/anchored to project fencing using plastic zip-ties
- Signage will be positioned along the project site as per the encroachment plan
- Signage shall not impede traffic of pedestrian sight lines
- Signage shall be placed on site 10days prior to the start of the noted construction activity to
  ensure the passing public has had adequate time to review, adjust their travel patterns, usage
  of streets and or cab be considered 'informed'.

#### Samples







# Appendix J – Sample Traffic Notification Letter

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### **Proposed Mixed Use Building – Spring Garden West**

#### **DRAFT NOTIFICATION LETTER**

#### **Dexel Developments Limited**

1245 Barrington Street Halifax, NS, B3J 1Y2 Phone: (902) 446-9916

**Date** 

#### NOTIFICATION OF TRAFFIC DISRUPTION: STREET NAME, HALIFAX, NOVA SCOTIA

This is to inform you that the to facilitate operations in association with the Multi-Unit Residential building construction work, traffic disruptions will occur on or about **DATE** with an anticipated duration of approximately **TIME**. The street will be **reduced(?)** to one lane of vehicular traffic during this time.

Should you have any questions or concerns please feel free to contact the below:

**CONTACT INFORMATION** 

General Contractor:

### **Atlantic Road Construction and Paving**

6 Belmont Avenue, P.O. Box 89 Eastern Passage, NS, B3G 1M7

Phone: (902) 830-6411

Should any questions arise, please feel free to contact the undersigned.

Yours Truly,

Atlantic Road Construction and Paving

Greg MacDonald

**Project Manager** 



## **Appendix K – Vehicular and Pedestrian Hazard Assessment**

Page | K Job No. 38969

### Project Date: Location: VEHICULAR & PEDESTRIAN HAZARD ASSESSMENT

_	VEHICULAR & PEDESTRIAN HAZARD ASSESSMENT						
No.	Hazard:	Project Phase:	Vehicular Impacts:	Mitigation Methods:	Pedestrian Impacts:	Mitigation Methods:	
1	Building Demolition	Demolition	Debris may fall off building, damaging vehicles.	Spotters to be present to ensure vehicles temporarily do not park adajcent to site during front wall tear down.	Debris may fall off building, injuring pedestrians.	Temporarily close sidewalks adjacent to site, moving pedestrians to opposite side of street.	
2	Excavation	Excavation	Vehicles may enter project site and fall down excavation.	Place concrete barriers along travel ways. Concrete barriers and existing curbs to prevent vehicle entry.	Pedestrians may enter project site and fall down excavation.	Place concrete barriers/rigid fencing around entire project site.	
			Vehicle weight may surcharge excavation, causing excavation wall failure.	Close sidewalks & driveways adjacent to project site, moving vehicles farther away from excavation.			
3	Rock Blasting	Excavation	Blasted rock projectiles may strike vehicles.	Close sidewalks & driveways adjacent to site, moving vehicles farther away from blasted rock.	Blasted rock projectiles may strike pedestrians.	Install solid plywood hoarding along rigid fence adjacent to blasting zone.	
4	Construction Waste	All Phases	Vehicles may be struck by construction waste.	The contractor shall keep the project site and surrounding areas clean and free of construction debris.	Pedestrians may be struck by construction waste.	The contractor shall keep the project site and surrounding areas clean and free of construction debris.	
5	Vehicular & Pedestrian Activities	All Phases	Drivers and pedestrians may become confused or impatient with construction activities. Pedestrians may walk in unmarked crosswalks or in vehicular travel areas. Drivers may fail to obey traffic signage.	Vehicular and pedestrian signage will be posted prominently around the project site to facilitate pedestrian movement. Notification will be sent prior to all traffic interruptions.	Drivers and pedestrians may become confused or impatient with construction activities. Pedestrians may walk in unmarked crosswalks or in vehicular travel areas. Drivers may fail to obey traffic signage.	Vehicular and pedestrian signage will be posted prominently around the project site to facilitate pedestrian movement. Notification will be sent prior to all traffic interruptions.	
6	Heavy Machinery Operation	All Phases	Heavy machinery or vehicles may break down or overturn, damaging other vehicles.	The contractor shall maintain safe distances between vehicles and heavy machinery on-site.Concrete barriers will be installed to separate construction vehicles from public traffic.	Heavy machinery or vehicles may break down or overturn, injuring pedestrians.	The contractor shall maintain safe distances between pedestrians, vehicles, and heavy machinery. Rigid fences will be installed to separate construction vehicles from pedestrians.	
			Heavy machinery or vehicles may overturn due to uneven terrain, damaging other vehicles.	The contractor shall maintain safe distances between vehicles and heavy machinery on-site and ensure travel routes are kept flat.	Heavy machinery or vehicles may overturn due to uneven terrain, injuring pedestrians. Pedestrians may walk on uneven terrain causing them to twist their ankles or fall.	The contractor shall maintain safe distances between pedestrians, vehicles, and heavy machinery and ensure travel routes are kept flat.	
7	Construction Signage	All Phases	Construction signage may strike vehicular traffic.	Construction signage will be securely fixed to existing poles, temporary concrete sign bases, or rigid fences.	Pedestrians may walk into construction signage, including traffic signage, wayfinding signs, etc. may.	Signage will be angled in line with pedestrian routes and/or be placed at heights such that they do not pose a risk to pedestrians.	
					Construction signage may strike pedestrians.	Construction signage will be securely fixed to existing poles, temporary concrete sign bases, or rigid fences.	
8	Dangerous Materials	All Phases	Flammable, explosive, & hot materials may damage vehicles if not properly maintained & stored.	The contractor will use and store dangerous materials properly as per manufacturers' specifications.	Flammable, explosive, & hot materials may injure pedestrians if not properly maintained & stored.	The contractor will use and store dangerous materials properly as per manufacturers' specifications.	
9	Hoisting Operations	Superstructure	Precast concrete panels and other items hoisted may fall from heights and damage vehicles.	Proper hoisting and lifting techniques will be used to ensure that materials do not fall from heights. F-Type concrete barriers will be installed such that loads are never suspended above the public realm.	Precast concrete panels and other items hoisted may fall from heights and injure pedestrians.	Proper hoisting and lifting techniques will be used to ensure that materials do not fall from heights. Pedestrians will be moved to opposite sides of street from the project site or onto temporary sidewalks such that loads are never suspended above the public realm.	
10	Reinstatement of Public Infrastructure & Service Installation	Superstructure	Heavy equipment and hot concrete used during public infrastructure reinstatement and service installation may cause damage to vehicles.	The contractor shall maintain safe distances between vehicles and heavy machinery on-site. Concrete barriers will be installed to separate construction vehicles from public traffic during public infrastructure reinstatement and service installation.	Heavy equipment and hot concrete used during public infrastructure reinstatement may injure pedestrians.	The contractor shall maintain safe distances between pedestrians, vehicles, and heavy machinery.	
11	Fallen debris	Superstructure	Debris may fall from upper stories of the new building causing damage to vehicles.	F-Type concrete barriers will be installed such that a safe distance is maintained between the building envelope and vehicular traffic.	Debris may fall from upper stories of the new building injuring pedestrians.	Construction of upper building levels will be set back from the property line/rigid fencing, this separating pedestrians from potential fallen debris.	



# **Appendix L – Community Consultation Records**

Page | L Job No. 38969

# **COMMUNITY CONSULTATION MAP OVERVIEW**

# **Project – Spring Garden West - Residential Development**



# **Notification Letter**

#### Date:

Dexel Developments Limited – Building Construction Information Meeting

Dear Neighbour,

As you may be aware, we are planning a multi residential and commercial building construction project to replace our current commercial and residential buildings at 5950-5994 Spring Garden Road and 1403 Robie Street in Halifax.

If you are interested in receiving more information about our construction plans, practices, schedule or to go over any questions you may have regarding construction of our new project please contact us to discuss. We would be happy to meet with you to discuss.

Thank you.

Lawen Group

1245 Barrington Street,

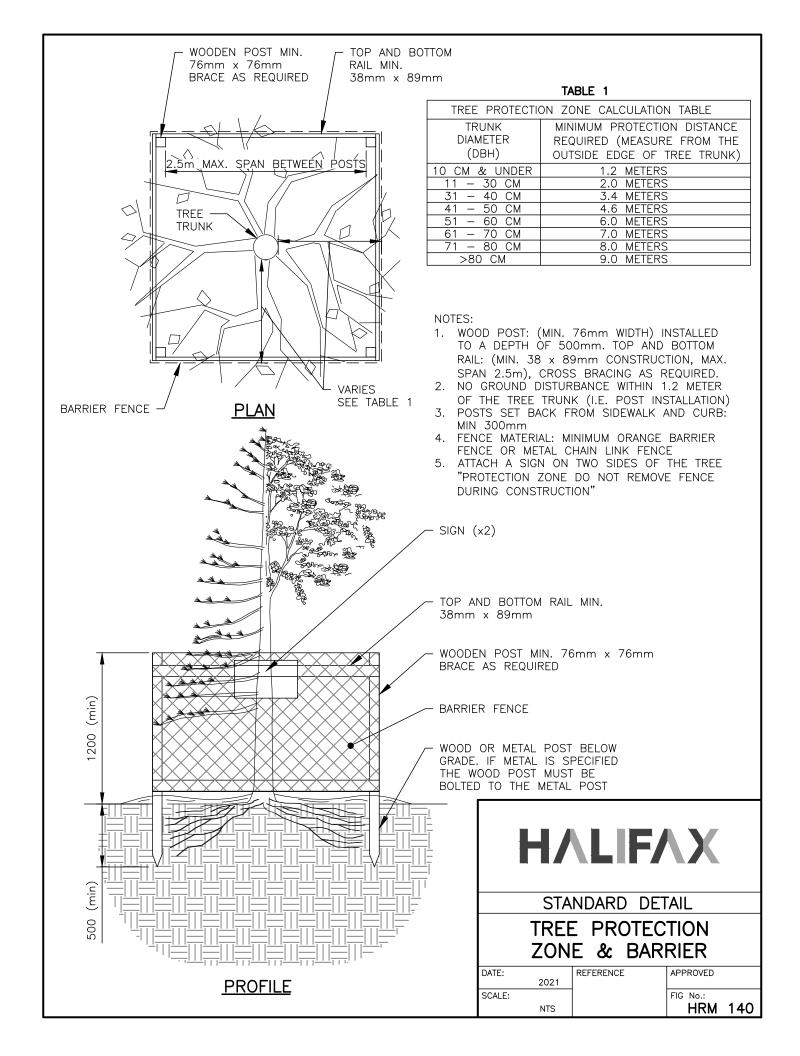
Halifax, NS

B3J 1Y2



# **Appendix M – HRM Tree Detail**

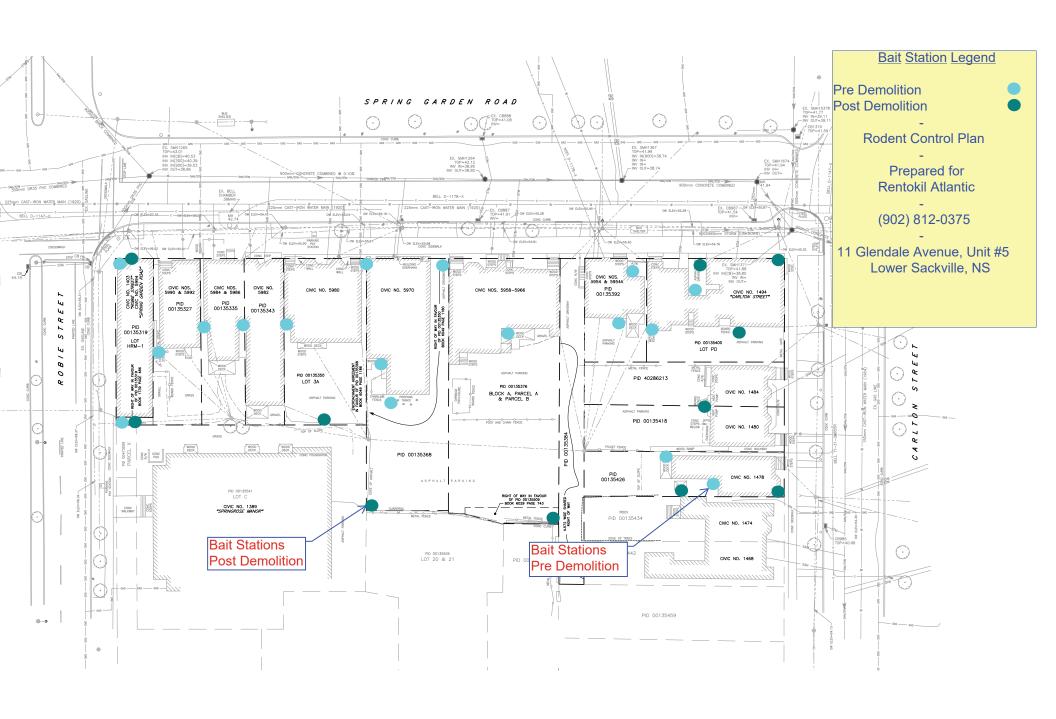
Page | M Job No. 38969





# Appendix N – Rodent Control Plan

Page | N Job No. 38969





# THE MOST ADVANCED LOW-PROFILE BAIT STATION







#### **PRODUCT FEATURES:**

- ▶ Single locking mechanism for quick servicing
- ▶ Removable tray for easy cleaning
- ▶ Locking bait rods won't fall out during cleaning
- Dog & child tamper-resistant
- Can hold:

4 - 1 oz. bait BLOX on 4 vertical rods

T-Rex<sup>™</sup> rat trap or Mini-Rex<sup>™</sup> mouse trap

▶ Compatible with Sidekick® Load-N-Lock™ system





More Than Meets The Eye

Madison, Wisconsin 53704 USA | Ph: (608) 241-0202 | Fax: (608) 241-9631

www.belllabs.com

# ALL-WEATHER BLOX TM





# CONTRAC® ALL-WEATHER BLOX™



# **KILLS RATS, MICE & MEADOW VOLES\***

# **Kills Warfarin Resistant Norway Rats**

KEEP OUT OF REACH OF CHILDREN CAUTION

See back panels for First Aid and additional precautionary statements.

ACTIVE INGREDIENT:

 Bromadiolone (CAS #28772-56-7):
 0.005%

 OTHER INGREDIENTS†:
 99.995%

 †Contains Denatonium Benzoate
 TOTAL
 100.000%

\*Not permitted for use against the following species in California: Cotton rat, Eastern harvest mouse, Golden mouse, Polynesian rat, Meadow vole, White-throated woodrat, Southern plains woodrat, and Mexican woodrat.

#### FIRST AID

#### HAVE LABEL WITH YOU WHEN OBTAINING TREATMENT ADVICE

#### IF SWALLOWED:

- Call a poison control center, doctor, or 1-877-854-2494, or 1-800-858-7378\*\* immediately for treatment advice.
- Have person sip a glass of water if able to swallow.
- Do not induce vomiting unless told to do so by the poison control center or doctor.

#### IF ON SKIN OR CLOTHING:

- Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes.
- Call a poison control center or doctor for treatment advice.

587CB-9

- Hold eye open and rinse slowly and gently with water for 15–20 minutes.
- Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.
- Call a poison control center, doctor, or 1-877-854-2494 immediately for treatment advice.
- Also call this number for information on health concerns and pesticide incidents.

#### NOTE TO PHYSICIAN

If swallowed or absorbed through the skin, this material may reduce the clotting ability of the blood and cause bleeding. If ingested, administer Vitamin K<sub>1</sub> intramuscularly or orally. Repeat as necessary based on monitoring of prothrombin times.

#### TREATMENT FOR PET POISONING

If animal eats bait, call veterinarian at once.

#### NOTE TO VETERINARIAN

Anticoagulant Bromadiolone: For animals ingesting bait and/or showing poisoning signs (bleeding or elevated prothrombin times), give Vitamin K1. If needed, check prothrombin times every 3 days until values return to normal (up to 30 days). In severe cases, blood transfusions may be needed.

#### DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

READ THIS LABEL: Read this entire label and follow all use directions and use precautions. Use only for sites, pests, and application methods described on this label.

IMPORTANT: Do not expose children, pets, or nontarget animals to rodenticides. To help to prevent exposure:

- 1. Store unused product out of reach of children and pets.
- 2. Apply bait in locations out of reach of children, pets, domestic animals and nontarget wildlife, or in tamper-resistant bait stations. These stations must be resistant to destruction by dogs and by children under six years of age, and must be used in a manner that prevents such children from reaching into bait compartments and obtaining bait. If bait can be shaken from bait stations when they are lifted, units must be secured or otherwise immobilized. Stronger bait stations are needed in areas open to hoofed livestock, raccoons, bears, or other potentially destructive animals, or in areas prone to vandalism.
- 3. Dispose of product container and unused, spoiled, or unconsumed bait as specified on this label.

Bait stations are mandatory for outdoor, above-ground use. Tamper-resistant bait stations must be used wherever children, pets, non-target mammals, or birds may have access to the bait placement location.

USE RESTRICTIONS: This product may only be used to control the following rodent pests in and around man-made structures: House mouse (Mus musculus), Norway rat (Rattus norvegicus), Roof rat (Rattus rattus), Cotton mouse (Peromyscus gossypinus), Cotton rat\* (Sigmodon hispidus), Deer mouse (Peromyscus maniculatus), Eastern harvest mouse\* (Reithrodontomys humuli), Golden mouse\* (Ochrotomys nuttalli), Polynesian rat\* (Rattus exulans), Meadow vole\* (Microtus pennsylvanicus), White-footed mouse (Peromyscus leucopus), White-throated woodrat\* (Neotoma albigula), Southern plains woodrat\* (Neotoma micropus), and Mexican woodrat\* (Neotoma mexicana). This product must be used in and within 100 feet of man-made structures constructed in a manner so as to be vulnerable to commensal rodent invasions and/or to harboring or attracting rodent infestations. Examples of such structures include homes and other permanent or temporary residences, food processing facilities, industrial and commercial buildings, trash receptacles, agricultural and public buildings, transport vehicles (ships, trains, aircraft), docks and port or terminal buildings and related structures around and associated with these sites. Fence and perimeter baiting, beyond 100 feet from a structure as defined above, is prohibited. This product must not be applied directly to food or feed crops.

# CONTRAC ALL-WEATHER BLOX™

#### **KILLS RATS, MICE, AND MEADOW VOLES\***

#### **Kills Warfarin Resistant Norway Rats**

Norway rats, roof rats, and house mice may consume a lethal dose in one night's feeding with first dead rodents appearing four or five days after feeding begins.

ACTIVE INGREDIENT:

Bromadiolone (CAS #28772-56-7): . . . . . . . 0.005% 

#### KEEP OUT OF REACH OF CHILDREN CAUTION

See side panels for First Aid and additional precautionary statements.

#### STORAGE AND DISPOSAL

Do not contaminate water, food or feed by storage or disposal.

Pesticide Storage: Store only in original container in a cool, dry place inaccessible to children and pets. Keep containers closed and away from other chemicals.

Pesticide Disposal: Wastes resulting from the use of this product may be placed in trash or delivered to an approved waste disposal facility.

Container Handling: Nonrefillable container. Do not reuse or refill this container. [Plastic:] Offer for recycling or reconditioning; or puncture and dispose of in a sanitary landfill; or by incineration. In most states, burning is

WARRANTY: To the extent consistent with applicable law, seller makes no warranty, expressed or implied concerning the use of this product other than indicated on the label. Buyer assumes all risk of use and/or handling of this material when such use and/or handling is contrary to label instructions.

#### NET WEIGHT: 18 lbs (8.2 kg)

EPA REG. NO. 12455-79 EPA EST. NO. 12455-WI-1

> Manufactured by 3699 Kinsman Blvd. Madison WI 53704 U.S.A. www.belllabs.com

DIRECTIONS FOR USE (Continued from other panel)

Burrow baiting with Contrac All-Weather Blox is prohibited.

Do not place near or inside ventilation duct openings. Do not contaminate water, food, feedstuffs, food or feed handling equipment, or milk or meat handling equipment or surfaces that come into direct contact with food. When used in USDA inspected facilities, this product must be applied in tamper-resistant bait stations. Do not broadcast bait. Do not use this product in sewers

Do not sell this product in individual containers holding less than 16 pounds of bait.

SELECTION OF TREATMENT AREAS: Determine areas where rats, mice, or meadow voles\* will most likely find and consume the bait. Generally, these areas are along walls, by gnawed openings, in corners and concealed places, between floors and walls, or in locations where rats, mice, or meadow voles\*, or their signs have been seen. Protect bait from rain and snow. Remove as much alternative food as possible.

#### APPLICATION DIRECTIONS:

RATS: Place 3 to 16 bait blocks (at intervals of 15 to 30 feet) per placement in infested areas. Maintain an uninterrupted supply of fresh bait for at least 10 days or until signs of rat activity cease

MICE AND MEADOW VOLES\*: Place 1 block per placement. Space placements at 8- to 12-foot intervals in infested areas. Two blocks may be needed at points of very high activity. Maintain

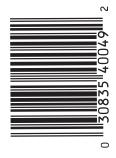
an uninterrupted supply of fresh bait for at least 15 days or until signs of mouse or meadow vole\* activity cease.

FOLLOW-UP: Replace contaminated or spoiled bait immediately. Wearing gloves, collect and dispose of all dead, exposed animals and leftover bait. To prevent reinfestation, limit sources of rodent food, water, and harborage as much as possible. If reinfestation does occur, repeat treatment. Where a continuous source of infestation is present, establish permanent bait stations and replenish as needed.

#### PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION: Harmful if swallowed or absorbed through the skin. Keep away from children, domestic animals and pets. Do not get in eyes, on

All handlers (including applicators) must wear: shoes plus socks, and waterproof gloves. Any person who retrieves carcasses or unused bait following application of this product must wear gloves.



#### **User Safety Requirements**

Follow manufacturer's instruction for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry. Remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash hands thoroughly after applying bait and before eating, drinking, chewing gum, using tobacco or using the toilet and change into clean clothing

#### ENVIRONMENTAL HAZARDS

This product is extremely toxic to fish, birds and other wildlife. Dogs and predatory and scavenging mammals and birds might be poisoned if they feed upon animals that have eaten this bait. Do not apply this product directly to water or to areas where surface water is present or to intertidal areas below the mean high water mark. Runoff also may be hazardous to aquatic organisms in water adjacent to treated areas. Do not contaminate water when disposing of equipment wash water or rinsate.

\*Not permitted for use against the following species in California: Cotton rat, Eastern harvest mouse, Golden mouse, Polynesian rat, Meadow vole, White-throated woodrat, Southern plains woodrat, and Mexican woodrat.

MADE IN USA Product Code: CB4051 090415/09-15



# DETEX®BLOX with LUMITRACK

SAFETY DATA SHEET

**ACCORDING TO REGULATION: OSHA** 

Hazard Communication Standard 29 CFR 1910.1200 January 2016

**DATE OF ISSUE:** 

PREPARED BY:

CAR

#### SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Product Identifier: DETEX® BLOX with LUMITRACK

**EPA Registration Number: NA** 

Relevant identified uses of the substance or mixture and uses advised against

Relevant identified uses: Activity Monitoring - Ready to use Uses advised against: Use only for the purpose described above

#### MANUFACTURER/SUPPLIER:

Bell Laboratories, Inc. 3699 Kinsman Blvd. Madison, WI 53704, USA Email: sds@belllabs.com Phone: 608-241-0202

Medical or Vet Emergency: 877-854-2494 or 952-852-4636 Spill or Transportation Emergency: 800-424-9300 (CHEMTREC)

#### **SECTION 2. HAZARDS IDENTIFICATION**

Classification according to Regulation OSHA 1910.1200(d): Not classified

Signal Word: None

See Section 15 for information on FIFRA applicable safety, health, and environmental classifications.

#### SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Component	CAS No.	% By weight		
Inert and Non-Hazardous Ingredients	Proprietary	100.00%		
(Unlisted components are non-hazardous)				

#### **SECTION 4. FIRST AID MEASURES**

Description of first aid measures

**Ingestion:** Non-Toxic Inhalation: Not applicable. Eve contact: Non-Toxic Skin contact: Non-Toxic

Most important symptoms and effects, both acute and delayed

Non-Toxic

Advice to physician: Non-Toxic Advice to Veterinarian: Non-Toxic

#### **SECTION 5. FIRE-FIGHTING MEASURES**

**Extinguishing media** 

Suitable Extinguishing Media: water, foam or inert gas.

Unsuitable Extinguishing Media: None known.

Special hazards arising from the mixture: High temperature decomposition or burning in air can result in the formation of toxic gases,

which may include carbon monoxide.

Advice for firefighters: Wear protective clothing and self-contained breathing apparatus.

#### SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures: None. Non-Toxic

Environmental precautions: None. Non-Toxic

Methods and materials for containment and cleaning up

For Containment: None. Non-Toxic For Cleaning Up: None. Non-Toxic

Reference to other sections: Refer to Sections 7, 8 & 13 for further details of personal precautions, personal protective equipment and

disposal considerations.

Trade Name: Detex Blox with Lumitrack Date Created: January 2016 Supplier: Bell Laboratories, Inc.

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#### **SECTION 7. HANDLING AND STORAGE**

Precautions for safe handling: Do not use near heat sources, open flame, or hot surfaces. Non-Toxic.

Conditions for safe storage, including any incompatibilities: None. Non-Toxic

#### SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

#### **Established Limits**

Component	OSHA	ACGIH	Other Limits
None	Not Established	Not Established	Not Established

Appropriate Engineering Controls: None. Non-Toxic Occupational exposure limits: None. Non-Toxic

**Personal Protective Equipment:** Respiratory protection: Not required Eve protection: Not required

Skin protection: None. Non-Toxic Hygiene recommendations: None. Non-Toxic

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Tan wax block Appearance/Color: Odor: Sweet grain-like

**Odor Threshold:** Not applicable, odor not associated with a hazardous material.

Not applicable, is not dispersible with water. pH:

**Melting point:** Not applicable Not applicable **Boiling point:** 

Not applicable, does not contain components classified as flammable. Flash point:

**Evaporation rate:** Not applicable, is a solid. Flammability: Not applicable, is a solid.

Upper/lower flammability or explosive limits: Not applicable, does not contain components classified as flammable or explosive.

**Vapor Pressure:** Not applicable

Vapor Density: Not applicable, is a solid 1.13 g/mL @ 20°C **Relative Density:** Solubility (water): Not water soluble **Solubility (solvents):** Not applicable Partition coefficient: n-octanol/water: Not applicable

**Auto-ignition temperature:** Not applicable, does not contain components classified as flammable.

**Decomposition temperature:** Not applicable

Viscosity: Not applicable, is not a liquid.

**SECTION 10. STABILITY AND REACTIVITY** 

Reactivity: Not Applicable

Chemical stability: Not Applicable

Possibility of hazardous reactions: Refer to Hazardous decomposition products **Conditions to avoid:** Avoid extreme temperatures (below 0°C or above 40°C).

Incompatible materials: Not Applicable

Hazardous decomposition products: Not Applicable

#### SECTION 11. TOXICOLOGICAL INFORMATION

Information on toxicological effects

**Acute Toxicity** 

LD50, oral (ingestion): Not Toxic LD50, dermal (skin contact): Not Toxic

LC50, inhalation: Not Toxic Skin corrosion/irritation: Not Toxic Serious eye damage/Irritation: Not Toxic. Respiratory or skin sensitization: Not Toxic

Germ cell mutagenicity: Not Toxic Carcinogenicity: Not Toxic

Trade Name: Detex Blox with Lumitrack Date Created: January 2016 Supplier: Bell Laboratories, Inc.

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Components	NTP	IARC	OSHA
None	NA	NA	NA

Reproductive Toxicity: Not Toxic **Aspiration Hazard:** Not Toxic Target Organ Effects: Not Toxic

#### SECTION 12. ECOLOGICAL INFORMATION

**Ecotoxicity Effects:** Not Toxic

Persistence and degradability: Not Toxic Bioaccumulative potential: Not Toxic

Mobility in Soil: Not Toxic. Other adverse effects: None.

#### SECTION 13. DISPOSAL CONSIDERATIONS

**Disposal:** Wastes resulting from the use of this product may be placed in trash, on-site, or at an approved waste disposal facility. Dispose of all wastes in accordance with all Federal, state and local regulations.

#### SECTION 14. TRANSPORT INFORMATION

**UN number:** Not regulated

**UN proper shipping name:** Not regulated Transport hazard class(es): Not regulated

Packing group: Not regulated **Environmental Hazards** 

**DOT Road/Rail:** Not considered hazardous for transportation via road/rail. **DOT Maritime:** Not considered hazardous for transportation by vessel.

**DOT Air:** Not considered hazardous for transportation by air.

Freight Classification: LTL Class 60

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC code: Not applicable

**Special precautions for user:** None

#### SECTION 15. REGULATORY INFORMATION

Safety, health and environmental regulations/legislation specific for the substance or mixture: Not applicable

Signal Word: None

**Precautionary Statements:** None

**Potential Health Effects:** 

Eye Contact: May cause irritation Skin Contact: Non-irritating to the skin **Ingestion:** Not harmful if swallowed

**TSCA:** All components are listed on the TSCA Inventory or are not subject to TSCA requirements

CERCLA/SARA 313: Not Toxic CERCLA/SARA 302: Not Toxic

#### SECTION 16. OTHER INFORMATION

For additional information, please contact the manufacturer noted in Section 1.

NFPA	Health: 0 (Not Toxic)	Flammability: 1 (slight)	Reactivity: 0 (stable)	Specific Hazard: None
HMIS	Health: 0 (Not Toxic)	Flammability: 1 (slight)	Reactivity: 0 (minimal)	Protective Equipment: None

Disclaimer: The information provided in this Safety Data Sheet has been obtained from sources believed to be reliable. Bell Laboratories, Inc. provides no warranties; either expressed or implied, and assumes no responsibility for the accuracy or completeness of the data contained herein. This information is offered for your consideration and investigation. The user is responsible to ensure that they have all current data, including the approved product label, relevant to their particular use.

Trade Name: Detex Blox with Lumitrack Date Created: January 2016 Supplier: Bell Laboratories, Inc.

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# Appendix O – CMP's TCP & PMP Inspection Records

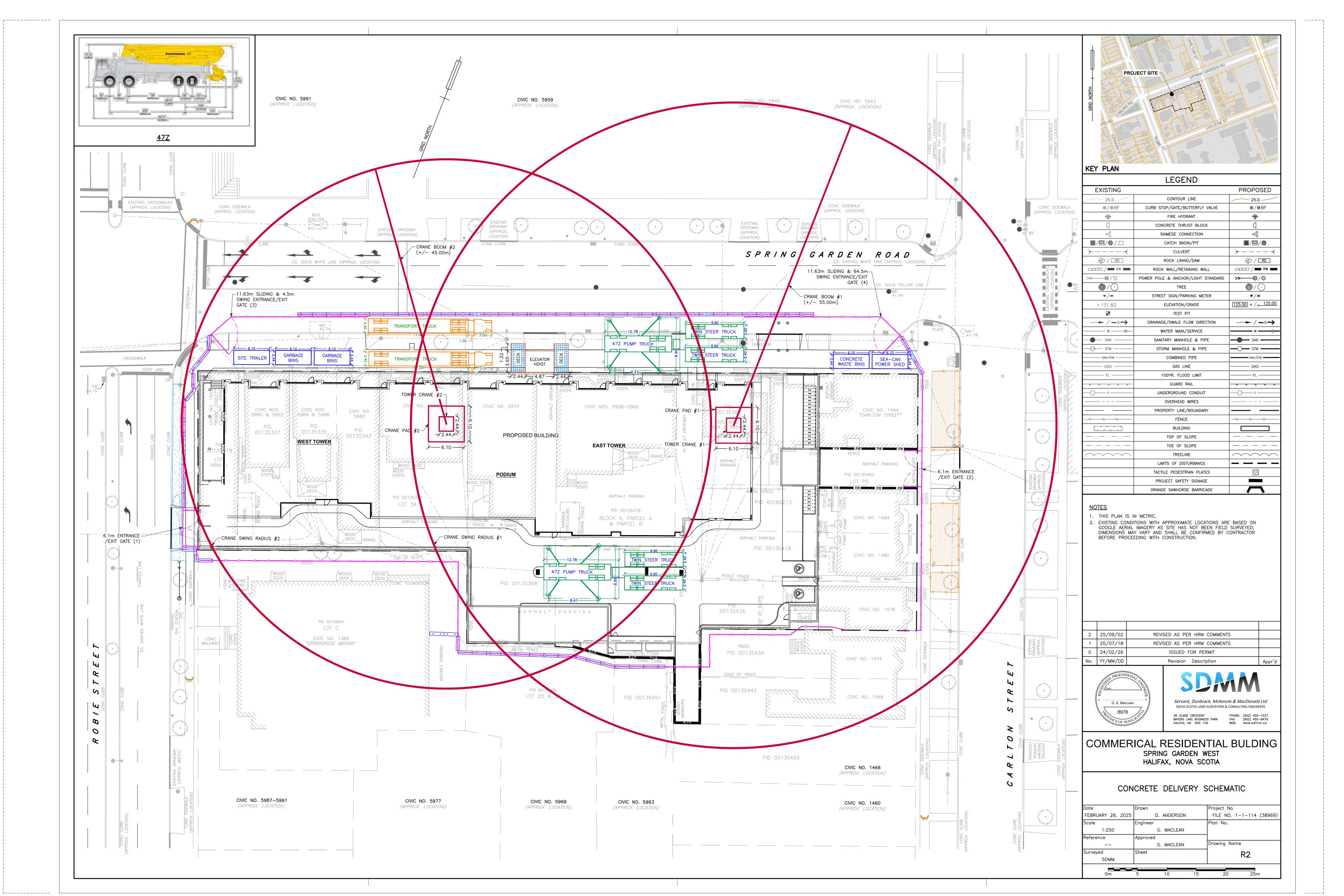
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Project:		Locati	on:			Phase:	Date:	Inspector:
		С	ONSTR	RUCTIO	N MAN	AGEMENT PLAN - INSPECT	ION CHECKLIST	
CMP Element		ıp per l			ition?	Action Required	Action Completed	Comments
	Yes	No	N/A	Good	Bad	·	·	



# **Appendix P – Concrete Delivery Schematic**

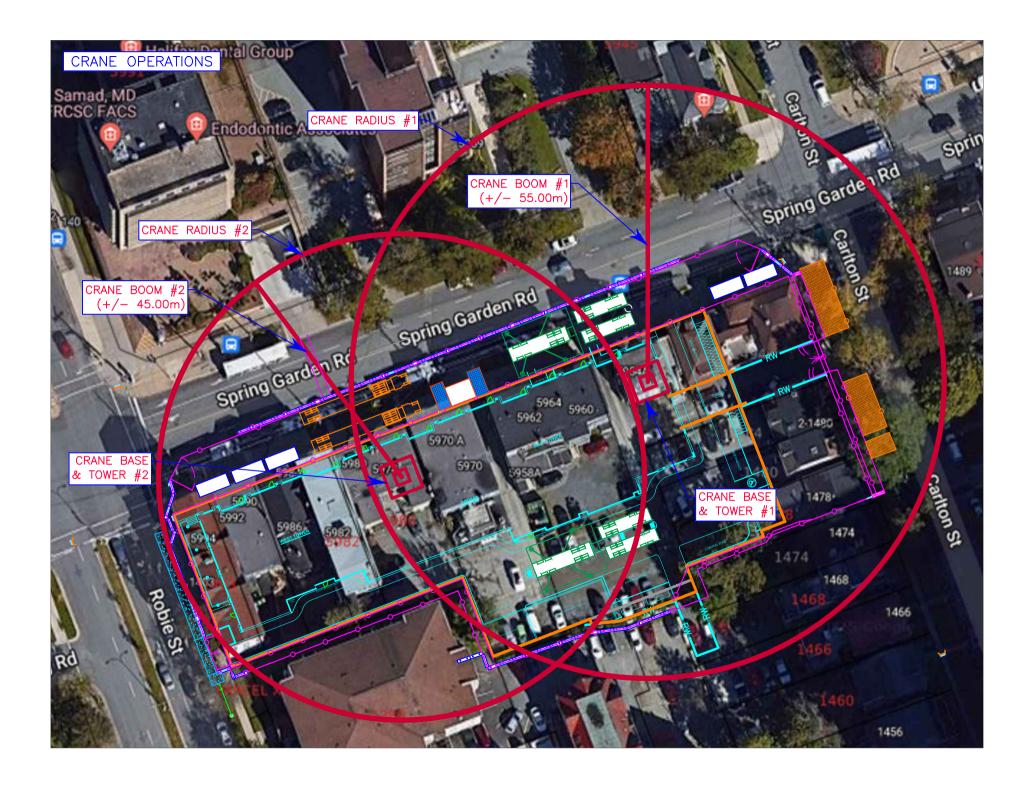
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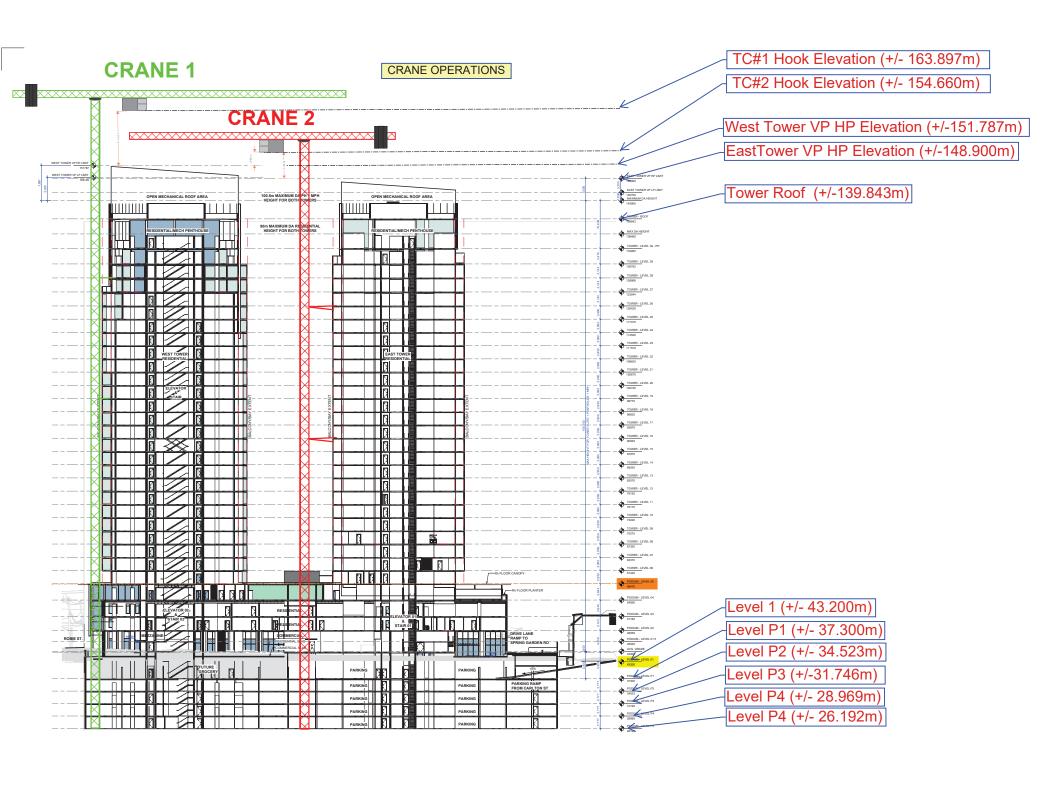




# **Appendix Q – Crane Information**

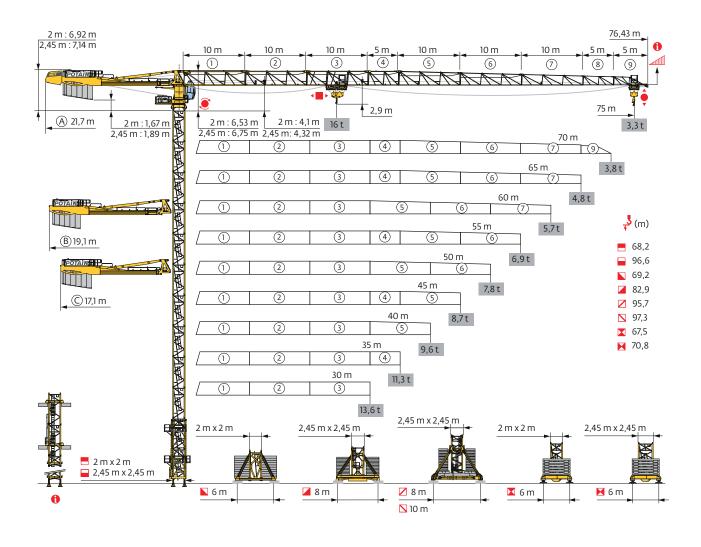
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# MDT 389 L16









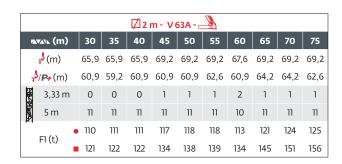




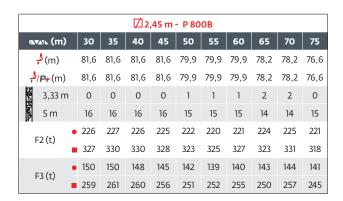
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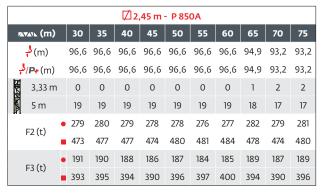
				Ø	]2 m -	P 62E	3				
12	walk (m)	30	35	40	45	50	55	60	65	70	75
	(m) 🦶	66,6	66,6	66,6	68,2	68,2	68,2	66,6	68,2	68,2	68,2
7	<mark>\$</mark> / <b>₽</b> +(m)	61,6	59,9	61,6	61,6	61,6	61,6	61,6	63,2	63,2	61,6
NAME AND SECTION OF THE PERSON	3,33 m	0	0	0	2	2	2	0	2	2	2
	5 m	13	13	13	12	12	12	13	12	12	12
		208	209	207	210	211	210	207	219	220	221
	F2 (t)	220	224	224	234	241	242	232	253	262	269
		142	142	139	140	141	139	136	147	148	148
	F3 (t)	163	165	164	171	178	179	170	188	197	204

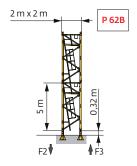
	☑2 m - V60A -													
	мк (m)	30	35	40	45	50	55	60	65	70	75			
1	(m) <mark>4</mark>	65,9	65,9	65,9	69,2	69,2	69,2	67,5	69,2	69,2	69,2			
رگ	<b>/P+</b> (m)	60,9	59,2	60,9	60,9	60,9	62,5	60,9	64,2	64,2	62,5			
HIS PRINCE	3,33 m	0	0	0	1	1	1	2	1	1	1			
	5 m	12	12	12	12	12	12	11	12	12	12			
Ι.	F1 (t)	110	111	110	114	114	114	113	121	124	124			
	F1 (L)	118	120	119	131	136	136	131	143	148	153			

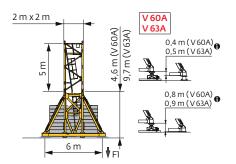


	☑2 m - ZX 6830 - 🦳													
Į.	AVAIL (m)	30	35	50	55	60	65	70	75					
	(m) 🦊	67,5	67,5	67,5	67,5	67,5	67,5	67,5	67,5	67,5	67,5			
١,	(m) <b>۱۹۰/د</b>	60,8	59,2	60,8	60,8	62,5	62,5	62,5	62,5	62,5	62,5			
NAME OF THE PARTY	3,33 m	0	0	0	0	0	0	0	0	0	0			
	5 m	13	13	13	13	13	13	13	13	13	13			
		113	114	114	112	112	112	112	115	118	121			
	F1 (t)	124	126	126	123	127	127	130	134	140	144			

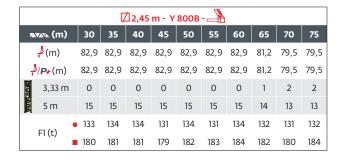




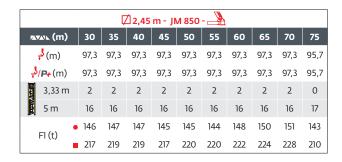


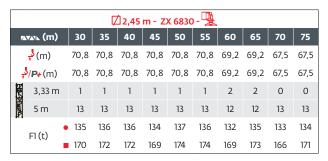


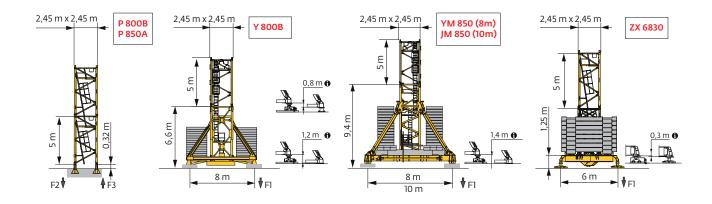




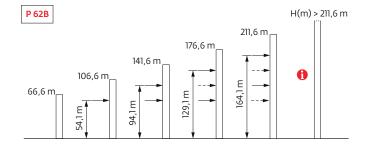


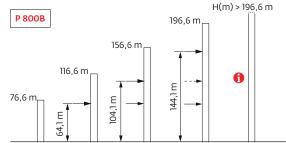




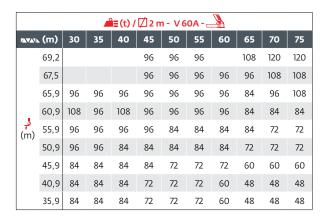


Ancrages / Verankerungen / Anchorages / Anclajes / Ancoraggi Ancoragem / нкера





Lest de base / Grundballast / Base ballast / Lastre de base / Zavorra di base Lastro da base / Базовый Балласт



			<u></u>	<b>≡ (t)</b> /	<b></b>	- ZX (	5830 -	<b>P</b>			
	(m)	30	35	40	45	50	55	60	65	70	75
	67,5	101	101	101	91	91	91	91	91	101	111
	62,5	91	91	81	81	101	91	91	81	81	81
١.	57,5	101	101	91	91	91	81	81	81	71	71
<mark>د</mark> (m)	52,5	91	91	91	81	81	81	81	71	71	71
(,	47,5	91	81	81	81	71	71	71	61	61	61
	42,5	81	81	81	71	71	71	61	51	51	51
	37,5	81	81	81	71	71	71	61	51	41	51

			<b>≜</b> ≣ (	(t) / 🏻	2,45 ı	m - YN	л 850				
	(m)	30	35	40	45	50	55	60	65	70	75
	95,7	216	216	216	216	216	216	216	216		
	94,0	216	216	204	204	204	204	204	216	216	
	92,3	204	204	204	192	204	192	204	204	204	216
	87,3	168	168	168	156	168	168	168	168	180	180
	82,3	144	132	132	132	132	132	132	132	144	144
	77,3	108	108	108	96	108	108	108	108	108	120
الي	72,3	84	84	72	72	72	72	72	72	84	84
(m)	67,3	48	48	48	48	48	48	48	48	60	60
	62,3	48	48	48	48	48	48	48	48	48	48
	57,3	48	48	48	48	48	48	48	48	48	48
	52,3	48	48	48	48	48	48	48	48	48	48
	47,3	48	48	48	48	48	48	48	48	48	48
	42,3	48	48	48	48	48	48	48	48	48	48
	37,3	48	48	48	48	48	48	48	48	48	48

			<b>≟</b> ≣	(t) / 🏻	2,45	m - Z)	( 6830	- 🖳			
	(m)	30	35	40	45	50	55	60	65	70	75
	70,8	151	151	151	141	151	151				
	69,2	141	141	141	131	141	141	141	141		
	67,5	131	131	121	121	121	121	131	131	141	141
	62,5	101	101	101	101	91	91	91	91	101	111
<mark>د</mark> (m)	57,5	91	91	91	81	81	71	71	71	71	71
(,	52,5	81	81	81	71	71	71	61	61	51	51
	47,5	81	81	81	71	71	71	61	51	41	51
	42,5	81	81	81	71	71	71	61	51	41	51
	37,5	81	81	81	71	71	71	61	51	41	51

			4	i <b>≡ (t)</b> /	′ <b>⊠2</b> n	n - V 6	i3A	<b>A</b>			
	(m)	30	35	40	45	50	55	60	65	70	75
	69,2				108	108	108		108	120	120
	67,6				96	96	96	96	108	108	120
	65,9	96	96	96	96	96	96	96	96	96	108
	60,9	108	96	108	96	96	96	96	84	84	84
<b>ا</b>	55,9	96	96	96	96	96	84	84	84	72	72
(m)	50,9	96	96	96	84	84	84	84	72	72	72
	45,9	84	84	84	72	72	72	72	60	60	60
	40,9	84	84	72	72	72	60	60	48	48	60
	35,9	84	84	72	72	72	60	60	48	48	48
	30,9	84	84	72	72	72	60	60	48	48	48

			<b>≟</b> ≡	(t) / 🛚	2,45	m - Y	800B -				
	(m)	30	35	40	45	50	55	60	65	70	75
	82,9	144	144	144	132	144	132	144			
	81,2	132	132	132	120	132	132	132	132		
	79,5	132	120	120	120	120	120	120	120	132	132
	74,5	96	96	96	84	96	96	96	96	96	108
	69,5	72	72	72	60	60	60	72	72	72	84
ڦ	64,5	48	48	36	36	36	36	36	48	48	48
(m)	59,5	24	24	24	24	12	12	12	24	24	24
	54,5	24	24	12	12	12	12	12	12	12	12
	49,5	12	12	12	12	12	12	12	12	12	12
	44,5	12	12	12	12	12	12	12	12	12	12
	39,5	12	12	12	12	12	12	12	12	12	12
	34,5	12	12	12	12	12	12	12	12	12	12

			<b>≟</b> ≣	(t) / 🛚	2,45	m - JN	/ 850 ·				
	(m)	30	35	40	45	50	55	60	65	70	75
	97,3	168	168	168	156	156	156	168	168	168	
	95,7	144	144	132	132	132	132	132	132	144	144
	90,7	120	108	108	108	108	108	108	108	120	120
	85,7	96	84	84	84	84	84	84	84	96	96
	80,7	72	60	60	60	60	60	60	60	72	72
	75,7	48	48	48	48	48	48	48	48	48	48
Į.	70,7	48	48	48	48	48	48	48	48	48	48
(m)	65,7	48	48	48	48	48	48	48	48	48	48
	60,7	48	48	48	48	48	48	48	48	48	48
	55,7	48	48	48	48	48	48	48	48	48	48
	50,7	48	48	48	48	48	48	48	48	48	48
	45,7	48	48	48	48	48	48	48	48	48	48
	40,7	48	48	48	48	48	48	48	48	48	48
	35,7	48	48	48	48	48	48	48	48	48	48

Courbes de charges / Lastkurven / Load curves / Curvas de cargas / Curve di carico / Curvas de carga / Кривые нагрузок

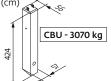
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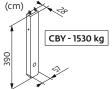
	<b>****</b>	(m)	17	20	25	27	30	32	35	37	40	42	45	47	50	55	57	60	65	67	70	72	75	ı	m
/AVAVA	<b>↓↓↓</b> 16 t	8 t هچا			Ш	ام											لہا								
75	3,3 → 18,6	34,1 - 37,3	16	14,9	11,6	10,6	9,4	8,7	8	8	7,4	7	6,5	6,1	5,6	4,9	4,7	4,4	3,9	3,7	3,5	3,3	3,1	t	
/3	3,3 → 20,5	36 - 39,1	16	16	12,8	11,7	10,3	9,4	8,3	8	7,7	7,3	6,7	6,3	5,8	5,2	4,9	4,6	4,1	4	3,7	3,6	3,3	t	P+
70	$3,3 \rightarrow 19,7$	35,9 - 39,1	16	15,7	12,3	11,3	10	9,3	8,3	8	7,7	7,2	6,6	6,2	5,7	5	4,8	4,5	4	3,9	3,7	t			
/0	$3,3 \rightarrow 21,1$	36,4 - 39,7	16	16	13,2	12	10,5	9,6	8,5	8	7,8	7,4	6,8	6,4	5,9	5,3	5	4,7	4,2	4	3,8	t	P+		
65	$3,3 \rightarrow 21,1$	38,8 - 42	16	16	13,3	12,2	10,8	10	9	8,5	8	8	7,4	7	6,5	5,7	5,4	5,1	4,6	t					
65	$3,3 \rightarrow 22,5$	39,4 - 42,6	16	16	14,1	12,8	11,3	10,4	9,3	8,7	8	8	7,5	7,1	6,6	5,9	5,6	5,3	4,8	t	P+				
60	3,3 → 22,4	40,4 - 43,5	16	16	14,1	12,9	11,4	10,6	9,5	8,9	8,1	8	7,7	7,3	6,8	6,1	5,8	5,5	t						
80	3,3 → 24	42 - 45,2	16	16	15,2	13,9	12,2	11,3	10,1	9,4	8,5	8	8	7,6	7,1	6,3	6	5,7	t	P+					
55	3,3 → 22,7	41,8 - 45,1	16	16	14,4	13,2	11,8	10,9	9,9	9,2	8,4	8	8	7,6	7,1	6,4	t								
33	$3,3 \rightarrow 24,4$	44,4 - 48	16	16	15,5	14,3	12,7	11,8	10,6	9,9	9,1	8,6	8	8	7,6	6,9	t	P+							
50	3,3 → 22,7	41,9 - 45,2	16	16	14,4	13,2	11,8	10,9	9,9	9,3	8,5	8	8	7,7	7,1	t									
50	$3,3 \rightarrow 24,8$	45,4 - 49	16	16	15,9	14,6	13	12	10,9	10,2	9,3	8,8	8,1	8	7,8	t	P+								
45	3,3 → 23,7	43,7 - 45	16	16	15,1	13,9	12,4	11,5	10,4	9,7	8,9	8,4	8	t											
45	$3,3 \rightarrow 25,9$		16	16	16	15,3	13,6	12,7	11,4	10,7	9,8	9,2	8,5	t	P+										
40	3,3 → 23,5		16	16	14,9	13,6	12,1	11,2	10,1	9,4	8,6	t													
40	$3,3 \rightarrow 25,5$		16	16	16	15	13,3	12,3	11,1	10,4	9,5	t	P+												
35	3,3 → 23,7		16	16	15	13,8	12,2	11,3	10,2	t															
35	$3,3 \rightarrow 25,8$		16	16	16	15,2	13,4	12,4	11,2	t	P+									UL J =	· 🔲 - O	22 t	max		
20	3,3 → 23,8		16	16	15,1	13,9	12,3	t												٠٠٠		,00 t	max.		
30	3,3 → 25,8		16	16	16	15,3	13,5	t	P+																

3	3																								
	**************************************	(m)	17	20	25	27	30	32	35	37	40	42	45	47	50	55	57	60	65	67	70	72	75		m
	🕎 16 t	<b>¥ → ¥</b> 8 t			Ī	<b>7</b>											3								
75	2,5 → 18,8	34,6 - 35,6	16	15		10,8		8,8	8	7,6	7	6,6	6	5,6	5,2	4,5	4,2		3,4	3,3	3	•	2,65		
	$2,5 \rightarrow 20,6$	36,5 - 37,2	16	16	12,9	11,8	10,5	9,6	8,4	8	7,3	6,8	6,2	5,9	5,4	4,7	4,5	4,1	3,7	3,5	3,2	3,1	2,85	t	P+
70	2,5 → 19,8	36,4 - 37,2	16	15,8	12,5	11,4	10,1	9,4	8,4	8	7,3	6,8	6,1	5,8	5,3	4,6	4,3	4	3,6	3,4	3,2	t			
'0	$2,5 \rightarrow 21,3$	36,9 - 38	16	16	13,3	12,2	10,6	9,7	8,6	8	7,4	6,9	6,3	6	5,5	4,8	4,6	4,2	3,7	3,6	3,4	t	P+		
65	2,5 → 21,3	39,4 - 40,2	16	16	13,4	12,3	11	10,2	9,2	8,6	8	7,6	7	6,6	6,1	5,3	5	4,7	4,2	t					
05	$2,5 \rightarrow 22,6$	39,9 - 40,8	16	16	14,2	13	11,4	10,5	9,4	8,8	8	7,7	7,1	6,7	6,2	5,5	5,2	4,9	4,4	t	P+				
60	2,5 → 22,6	41 - 42	16	16	14,3	13,1	11,6	10,7	9,7	9	8,2	8	7,3	7	6,5	5,7	5,5	5,2	t						
00	$2,5 \rightarrow 24,2$	42,6 - 43,5	16	16	15,4	14	12,4	11,4	10,2	9,6	8,7	8,1	7,7	7,3	6,7	5,9	5,7	5,3	t	P+					
55	2,5 → 22,9	42,5 - 43,4	16	16	14,5	13,4	11,9	11,1	10	9,4	8,6	8,1	7,7	7,3	6,8	6,1	t								
33	$2,5 \rightarrow 24,5$	45,1 - 46,1	16	16	15,7	14,4	12,8	11,9	10,7	10,1	9,2	8,7	8	7,8	7,3	6,5	t	P+							
50	2,5 → 22,9	42,5 - 43,5	16	16	14,6	13,4	11,9	11,1	10	9,4	8,6	8,1	7,7	7,3	6,8	t									
50	2,5 → 25	46,1 - 46	16	16	16	14,7	13,1	12,2	11	10,3	9,5	8,9	8,2	7,9	7,5	t	P+								
45	2,5 → 23,9	44,4 - 45	16	16	15,3	14	12,5	11,6	10,5	9,9	9	8,5	8	t											
45	$2,5 \rightarrow 26,1$		16	16	16	15,4	13,7	12,8	11,6	10,9	9,9	9,4	8,7	t	P+										
40	2,5 → 23,7		16	16	15	13,8	12,2	11,3	10,2	9,6	8,7	t													
40	2,5 → 25,7		16	16	16	15,1	13,4	12,4	11,2	10,5	9,6	t	P+												
35	2,5 → 23,9		16	16	15,2	13,9	12,3	11,4	10,3	t															
35	2,5 → 26		16	16	16	15,3	13,6	12,6	11,3	t	P+									₩=	<b>T</b> -0,	,27 t r	nax.		
30	2,5 → 24		16	16	15,3	14	12,4	t												-	3				
30	2,5 → 26		16	16	16	15,4	13,6	t	P+																

Poids de flèche & lest de contre-flèche / Auslegergewicht & Gegenauslegerballast / Jib weight & counter-jib ballast / Peso de flecha y lastre de contra-flecha/Peso del braccio & zavorra di contro-braccio/Peso da lança & lastro da contra lança/Bec стрелы и балласт контр-стрелы

		(kg) (+/- 5%)							
	<b>À À</b>	لہا	ليا → ليا	4600 kg	1530 kg	<u></u> (kg)	3070 kg	1530 kg	<u></u> (kg)
75 m	18100	17595	18240	5	2	26060	8	1	26090
70 m	17840	17350	17980	5	2	26060	8	1	26090
65 m	17450	16990	17590	5	2	26060	8	1	26090
60 m	16420	15990	16560	5	1	24530	8	0	24560
55 m	16420	15990	16560	5	1	24530	8	0	24560
50 m	15470	15040	15610	5	2	26060	8	1	26090
45 m	15320	14890	15460	5	2	26060	8	1	26090
40 m	14490	14060	14630	5	0	23000	7	1	23020
35 m	13880	13450	14020	4	2	21460	7	0	21490
30 m	13050	12620	13190	4	1	19930	6	1	19950
	(cm)	CBS - 4600		(cm)	CPU-20		(cı	m)	- 1530 ka





Encombrement et poids / Abmessungen und Gewicht / Dimensions and weight / Dimensiones y peso / Ingombro e peso dimensões e pesos / габаритные размеры и вес

Partie tournante / Drehender Kranteil / Slewing crane part / Parte giratoria
Parte rotante / Parte rotativa / Поворотная часть : М▼Лъ 75 m - Щ → Ф 75 LVF



Partie tournante / Drehender Kranteil / Slewing crane part Parte giratoria / Parte rotante / Parte rotativa Поворотная часть	<u>:</u>		L (m)	I (m)	h (m)	<b>kg</b> (+/- 5%)
Contre-flèche / Gegenausleger Counter-jib / Contra-flecha Controbraccio / Contra-lança Контр-стрела	L I	(A) (B) (C)	12 12 12	1,25 1,25 1,25	2,5 2,5 2,5	14110 13600 11540
Mât-cabine + cabine / Kabinenmast + Kabine Cab mast + cab / Mástil-cabina + cabina Portaralla superiore + cabina / Tramo-cabina + cabina Секция мачты кабины + кабина	h	Ultra View	5,03	2,22	2,49	6720
Pivot + 75 LVF (+ câble) / Krankopf + 75 LVF (+ Seil) Towerhead + 75 LVF (+ rope) / Pivote + 75 LVF (+ cabo) Portaralla + 75 LVF (+ fune) / Pivot + 75 LVF (+ cabo) Секция поворотной части + 75 LVF (+ канатом)	h	[ 2 m	5,26 5,5	2,48 2,53	2,5 2,79	11700 13260
Treuil de levage (+ câble) / Hubwerk (+ Seil) Hoisting winch (+ rope) / Mecanismo de elevación (+ cabo) Argano di sollevamento (+ fune) Guincho de elevação (+ cabo) Подъемная лебёдка (+ канатом)	h L	75 LVF	2,27	2,1	1,37	3775
Treuil de levage (+ câble) / Hubwerk (+ Seil) Hoisting winch (+ rope) / Mecanismo de elevación (+ cabo) Argano di sollevamento (+ fune) Guincho de elevação (+ cabo) Подъемная лебёдка (+ канатом)	L I	100 LVF	4,27	2,3	2,32	5710
Elément de flèche / Auslegerelement Jib section / Elemento de flecha Elemento di braccio / Elemento de lança Секция стрелы	L	① 6 DVF	10,75	1,8	2,74	5500
Elément de flèche / Auslegerelement Jib section / Elemento de flecha Elemento di braccio / Elemento de lança Секция стрелы	A h	2 3 5 6	10,21 10,31 10,22 10,24 10,19	1,2 1,2 1,2 1,2 1,2	2,5 2,42 2,39 2,1 1,83	3145 2420 1560 1235 950
Elément de flèche / Auslegerelement Jib section / Elemento de flecha Elemento di braccio / Elemento de lança Секция стрелы	A h	(4) (8) (9)	5,27 5,09 5,09	1,2 1,2 1,2	2,39 1,53 1,39	960 310 220
Chariot / Laufkatze Trolley / Carrello Carro / Carro-distribuidor Тележка	h	<b>♥ ♥</b> 16 t	2,05	1,51	1,09	482
Moufle / Hubflasche Pulley block / Aparejo Bozzello / Cadernal Полиспаст	h L	Ų ↔ ↓ 16 t	1,41	0,45	2,22	590
Chariot / Laufkatze Trolley / Carrello Carro / Carro-distribuidor Тележка	h L	∭,	1,77	1,53	1,05	250
Chariot / Laufkatze Trolley / Carrello Carro / Carro-distribuidor тележка	h L	الإا → ليا 16 t	1,77	1,53	1,05	303
Moufle / Hubflasche		8 t	1,82	0,28	1,05	845
Moujie / набразспе Pulley block / Aparejo Bozzello / Cadernal Полиспаст		16 t   <b> </b>   8 t	1,16	0,22	1,6	370

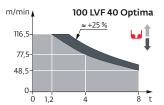
Pylône / Kranturm / Crane tower Mástil / Torre / Torre Башня крана			L (m)	I (m)	h (m)	<b>kg</b> (+/- 5%)
Cage de télescopage / Teleskopwagen Telescopic cage / Jaula de telescopaje Gabbia di telescopaggio / Gaiola de telescopagem для телескопирования крана	h L	<b></b>	11,18 10,23	4,39 4,62	4,13 5,79	8250 13245
K 639B KM 639E K 850/KR 849B KM 850.10B	L I	☑2 m ☑2 m ☑2,45 m ☑2,45 m	10,23 10,29 10,24 10,32	2,07 2,03 2,54 2,48	2,03 2,03 2,5 2,53	5290 4850 9470 10070
K 639A KMT 639A KR 649A KRMT 649A K 849A KR 849A KRMT 849A KRMT 849A K 850/KR 849A KMT 850.10A	h L	☐2 m ☐2 m ☐2 m ☐2 m ☐2.45 m ☐2.45 m ☐2.45 m ☐2.45 m ☐2.45 m	5,23 5,23 5,23 5,23 5,23 5,23 5,23 5,24 5,32	2,07 2,07 2,1 2,1 2,53 2,53 2,55 2,54 2,54	2,03 2,03 2,08 2,08 2,5 2,5 2,5 2,53 2,5 2,51	2805 2570 3250 3050 3400 4290 4090 5575 5450
K 639C KRMT 649C KR 849C KRMT 849C	h L	☑2 m ☑2 m ☑2,45 m ☑2,45 m	3,57 3,57 3,57 3,57	2,07 2,1 2,55 2,55	2,03 2,08 2,53 2,53	1985 2450 3195 3205
Pieds de scellement / Verankerungsfüße Fixing angles / Pie de empotramiento Montante da annegare / Angulos fixadores анкера	h L	P 62B P 800B P 850A	0,65 0,75 0,9	0,65 0,75 0,9	1,27 1,28 1,49	295 465 835
Mât-châssis / Grundmasteinheit Basic mast unit / Tramo-chasis Elemento base / Tramo-chassis Мачта для крепления к шасси	h L	V 60A V 63A Y 800B	5,01 10,02 6,03	2,41 2,41 2,93	2,41 2,41 2,93	4390 7485 8620
Haubans / Mastabstützungen /Struts / Tornapuntas Puntoni / Escoras / Растяжка	L III	V 60A V 63A Y 800B	4,51 4,51 5,51	0,29 0,33 0,5	0,29 0,33 0,45	420 515 1110
Sommier / Unterwagenhälfte Half-bearer / Testero Testata / Estrutura base Tpaвepca	L	V 60A V 63A	6,7 6,7	0,7 0,7	2,31 2,31	1600 1850
1/2 Longeron / 1/2 Längsträger / 1/2 Side member / 1/2 Larguero 1/2 Longherone / 1/2 Longarina / 1/2 боковина	<u>■ - · D</u> ) <b>#</b> h	Y 800B	5,68	1,24	0,73	1520
Longeron / Längsträger /Side member / Larguero Longherone / Longarina /боковина	L II	Y 800B	12	1,24	0,73	3050
Support lest /Ballastträger /Ballast support /Soporte de lastre Supporto zavorra / Suporte de lastro /Опора балласта		Y 800B	3,75	0,37	0,92	1085
Traverse de châssis / Unterwagentraverse / Chassis beam Traviesa chasis/Traversa carro/Travessa chassis/балка шасси	L I	Y 800B	8,7	0,83	0,74	2240
Croix centrale (position transport) / Zentralkreuz (Transport- position) / Central cross (transport position) / Brazo central (posición transporte) / Croce centrale (posizione di trasporto) Braço central chassis (posição transporte) / крестообразное основание (транспортное положение)		YM 850 JM 850	5,2	1,7	1,5	6700
Mât-châssis / Grundmasteinheit Basic mast unit / Tramo-chasis Elemento base / Tramo-chassis Мачта для крепления к шасси		YM 850 JM 850	8,75	2,5	2,5	14600
Bras de châssis / Unterwagenträger / Chassis girder / Brazo de base en cruz / Traverse del carro / Braço de chassis / опорная балка шасси		YM 850 JM 850	3,8 5,2	0,9 0,9	1,55 1,55	2800 3200
Tirant de châssis / Unterwagenstreben / Chassis ties / Tirante de base en cruz / Tiranti del carro / Tirante de chassis / тяга крепления шасси	L h	YM 850 JM 850	7,2	0,25	0,35	250
Haubans / Mastabstützungen /Struts / Tornapuntas Puntoni / Escoras / Растяжка	L	YM 850 JM 850	7,5 8,2	0,75 0,75	1,3 1,3	2100 2300
Bras de croix / Fundamentkreuzträger Cross girder / Brazo en cruz /	in the start of h	ZX 6830	9,1	1,12	1,1	5265
Braccio croce / Braço da cruz Поперечная балка		27,0030	9,1	0,76	1,48	5445

#### Mécanismes / Triebwerke / Mechanisms / Mecanismos / Meccanismi Mecanismos / Механизмы

	00 V - 50 Hz 80 V - 60 Hz			<b>L</b>	Jt			U	Jt		ch - PS hp	kW	a constant
	75 LVF 40	m/min	36,5	47,5	60,5	90	19	25	31,5	45	75	55	637 m
<b>A</b>	Optima	t	8	6	4	1,2	16	12	8	3,2	′3	) 55	03/111
<b>,</b>	100 LVF 40	m/min	48,5	61	77,5	116,5	25,5	32	40,5	58,5	100	75	1136 m
	Optima	t	8	6	4	1,2	16	12	8	3,5	100	/5	1130111
<b>▼■</b> ▶	6 DVF 6 Optima	m/min		0 -> 4	12 (16 t)	0 → 8	4 (8 t)	0 → 10	00 (4 t)		5,5	4	
	RVF 172 Optima+	tr/min U/min rpm				V-50 F 0 V-60					2 x 10	2 x 7,5	
<b>◆</b> ₩						0							

m/min <b></b>	75 LVF 40 Optima
	≈+25 % <b>□</b>
90-	<b>—</b>
60,5-	
60,5- 36,5-	
0 0	1,2 4 8 t

IEC 60204-32	kVA	
400 V (+10% -10%) 50 Hz 480 V (+6% -10%) 60 Hz	75 LVF : 84 → 54 kVA 100 LVF : 104 → 64 kVA	+ (S)



	FR	DE	EN	ES		PT	RU
	Appel de flèche	Auslegerüberhöhung	Jib elevation	Elevación de la flecha	Inclinazione braccio	Desvio da lança	подъем стрелы
	Équipements standards	Standardausrüstungen	Standard equipment	Equipamiento de serie	Equipaggiamento standard	Equipamento de série	Стандартное оборудование
0	Équipements optionnels	Sonderausrüstungen	Options	Equipamiento opcional	Equipaggiamento in opzione	Equipamento opcional	Дополнительное оборудование (опция)
P+	Fonction Potain Plus : Courbes de charges Plus	Funktion Potain Plus: Plus- Lastkurven	Potain Plus function: Plus load curves	Función Potain Plus: Diagrama de cargas Plus	Funzione Potain PLus: Curve di carico Plus	Função Potain Plus: Diagrama de cargas Plus	Функция контроля мощности Potain Plus: Диаграммы грузоподъемности Plus
الب/₽+	Hauteurs sous crochet associées aux courbes de charges Plus	Hakenhöhen mit Plus- Lastkurven	Hook heights with Plus load curves	Altura bajo gancho, usando el diagrama de cargas Plus	Altezze sotto gancio con curve di carico Plus	Altura livre, utilizando o diagrama de cargas Plus	Высота под крюком для диаграмм грузоподъемности Plus
•	Réactions en service	Reaktionskräfte in Betrieb	Reactions in service	Reacciones en servicio	Reazioni in servizio	Reacções em serviço	Реакция при работе
	Réactions hors service	Reaktionskräfte außer Betrieb	Reactions out of service	Reacciones fuera de servicio	Reazioni fuori servizio	Reacções fora de serviço	Реакция в покое
å≡	Poids total du lest	Ballast-Gesamtgewicht	Total ballast weight	Peso total del lastre	Peso totale della zavorra	Peso total do lastro	Общий вес балласта
-	Cadre d'ancrage serré	Fester Verankerungs- rahmen	Tightened anchorage frame	Marco de anclaje de apriete	Quadro di ancoraggio stretto	Quadro de amarração apertado	Прикрепленная анкерная рама
	Cadre d'ancrage desserré	Loser Verankerungs- rahmen	Loosened anchorage frame	Marco de anclaje de desapriete	Quadro di ancoraggio allentato	Quadro de amarração solto	Отсоединенная анкерная рама
AVAIL	Poids de flèche	Auslegergewicht	Jib weight	Peso de flecha	Peso del braccio	Peso da lança	вес стрелы
<del></del> 9	Camion 13,4 m	Lkw 13,4 m	Lorry 13,4 m	Camión 13,4 m	Camion 13,4 m	Camião 13,4 m	Rрузовой автомобиль 13,4 м
1000000	Conteneur High Cube 40', et/ou Flat Rack 20'	Container High Cube 40', und/oder Flat Rack 20'	Container High Cube 40', and/or Flat Rack 20'	Contenedor High Cube 40', y/o Flat Rack 20'	Container High Cube 40', e/o Flat Rack 20'	Contentor High Cube 40', e/ou Flat Rack 20'	40-футовый контейнер повышенной вместимости High Cube, и/или 20-футовая открытая платформа Flat Rack
	Levage	Heben	Hoisting	Elevación	Sollevamento	Elevação	Подъем
<b>→</b> ■	Distribution	Katzfahren	Trolleying	Distribución	Ditribuzione	Distribuição	Перемещение по стреле
●	Orientation	Schwenken	Slewing	Orientación	Rotazione	Rotação	Поворот
<b>4●</b> >	Translation	Kranfahren	Travelling	Traslación	Traslazione	Translação	Перемещение крана
kVA	Puissance requise	Erforderliche Leistung	Required power	Potencia Necesaria	Potenza richiesta	Potência Necessária	Потребляемая мощность
<u>ত্তি</u>	Fonction Power Control : vitesses treuils adaptées à la puissance disponible	Funktion Power Control: Geschwindigkeiten der Triebwerke werden an die verfügbare Leistung angepasst	Power Control Function: winch speeds adapted to the available power	Función Power Control: marchas de los cabrestantes adaptadas a la potencia disponible	Funzione Power Control: velocità degli argani adattate alla potenza disponibile	Função Power Control: velocidades de guincho adaptadas à potência disponível	Функция контроля мощности Power Control: perулировка скорости лебедок в зависимости от доступной мощности
0	Nous consulter	Auf Anfrage	Consult us	Consultarnos	Consultateci	Consultar-nos	Проконсультируйтесь у нас
Δ	Document commercial non contractuel. Pour toute information technique se référer à la notice correspondante.	Unverbindliches Vertriebsdokument. Für technische Informationen, siehe die entsprechenden Anweisungen.	This commercial document is not legally binding. For any technical information, please refer to the corresponding instructions.	Documento commercial no contractual. Para cualquier información tecnica, ver la noticia correspondiente.	Documento commerciale non vincolante, per tutte le informazioni tecniche fare rifferimento al catalogo istrusioni.	Documento comercial não contratual. Para qualquer informação técnica complementar consultar as respectivas instruções.	Этот коммерческий документ не является юридически обязательным. Для получения технической информации, см. соответствующие инструкции.



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# **Appendix R – Structural Demolition Plan**

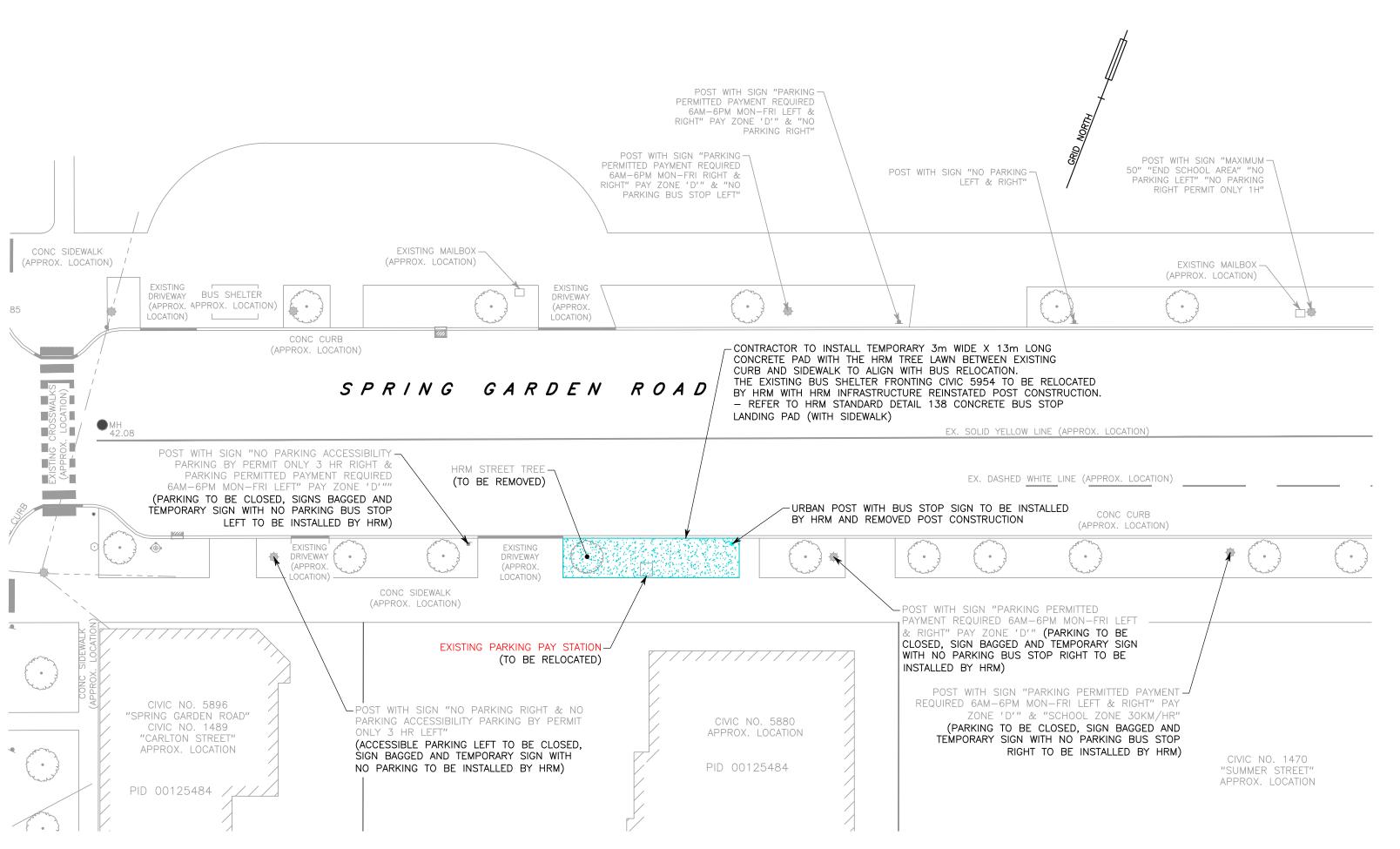
Contractor to supply

Page | R Job No. 38969



# Appendix S – Temporary Bus Stop Plan

Page | S Job No. 38969



\_\_\_\_\_

BUS STOP FRONTING CIVIC 5880 SPRING GARDEN ROAD



KEY I	PLAN
-------	------

LEGEND							
EXISTING PROPOSED							
25.0	CONTOUR LINE	25.0					
⊗/⊗BF	CURB STOP/GATE/BUTTERFLY VALVE	⊗/⊗BF					
•	FIRE HYDRANT	•					
	CONCRETE THRUST BLOCK	1					
≺	SIAMESE CONNECTION	≺					
	CATCH BASIN/PIT	<b>   </b> /   <b> </b> /   <b> </b>					
) <del>-</del> (	CULVERT	) <del>-</del> (					
& / RD	ROCK LINING/DAM	& / RD					
CDOCO / ■ RW ■	ROCK WALL/RETAINING WALL	∞∞0 / ■ RW ■					
> <del>&gt;                                   </del>	POWER POLE & ANCHOR/LIGHT STANDARD	<b>&gt;&gt;</b> - ♥/⊙					
<b>@</b> /①	TREE	<b>@</b> /O					
▼/⊕	STREET SIGN/PARKING METER	▼/•					
× 131.82	ELEVATION/GRADE	125.00 × /+ 125.00					
	TEST PIT						
~ / ~s →	DRAINAGE/SWALE FLOW DIRECTION	<b>→</b> / <b>-</b> s <b>→</b>					
—————————————————————————————————————	WATER MAIN/SERVICE	——— w —————					
SAN	SANITARY MANHOLE & PIPE	SAN —					
STM	STORM MANHOLE & PIPE	STM					
SAN/STM	COMBINED PIPE	SAN/STM					
———— GAS ————	GAS LINE	——— GAS ———					
——— FL ———	100YR. FLOOD LIMIT	FL					
	GUARD RAIL						
c	UNDERGROUND CONDUIT	с					
	OVERHEAD WIRES						
	PROPERTY LINE/BOUNDARY						
<b></b>	FENCE						
	BUILDING						
	TOP OF SLOPE						
	TOE OF SLOPE — · — · — ·						
~~~~	TREELINE	~~~					
	LIMITS OF DISTURBANCE						
	TACTILE PEDESTRIAN PLATES						
	PROJECT SAFETY SIGNAGE						
	ORANGE SAWHORSE BARRICADE						
	•	•					

### <u>NOTES</u>

1. THIS PLAN IS IN METRIC.

EXISTING CONDITIONS ARE BASED ON GOOGLE AERIAL IMAGERY AS SITE HAS NOT BEEN FIELD SURVEYED; DIMENSIONS MAY VARY AND SHALL BE CONFIRMED BY CONTRACTOR BEFORE PROCEEDING WITH CONSTRUCTION.

0	24/07/18	ISSUED FOR PERMIT	
No.	YY/MM/DD	Revision Description	Appr'd





COMMERICAL RESIDENTIAL BULDING
SPRING GARDEN WEST
HALIFAX, NOVA SCOTIA

## TEMPORARY BUS STOP PLAN

Date	Drawn		Project No.
JULY 18, 2025	J. BOS		FILE NO. 1-1-114 (38969
Scale	Engineer		Plan No.
1:250	G. MACLEAN		
Reference	Approved		
	G. MACLEAN		Drawing Name
Surveyed	Sheet		R3
SDMM			
0m	5 10	15	20 25m