

April 27, 2022

Adam Sheffer
Partner
Originate Build
E-Mail: adam@originate.build

**RE: 152-164 Bathurst Street and 621-627 Richmond St West
Updated Transportation Impact Study / Response to City of Toronto Comments**

Dear Adam:

The following transportation content is an update as part of the Site Plan Approval (SPA) application #1 and Zoning By-law Amendment (ZBA) application resubmission (Application No. 21 181257 STE 10 OZ) being made to the City of Toronto to address Engineering Construction Services department comments.

This letter addresses all comments received, outlines the transportation demand management plan for 152-164 Bathurst Street and 621-627 Richmond Street West (herein referred to as the “site” or “Bathurst / Richmond”), and updates the parking strategy for the current SPA #1 submission.

1.0 INTRODUCTION

BA Group is retained by Originate Developments Inc. to review the transportation aspects of a Site Plan Application (SPA) being made to the City of Toronto in relation to proposed development of 152-164 Bathurst Street and 621-627 Richmond Street West located at the corner of the intersection of Richmond Street West and Bathurst Street in the City Toronto.

A Site Plan Application has been made to the City of Toronto to permit the development of 152-164 Bathurst Street and 621-627 Richmond Street West. The proposed development comprises of a 17-storey with rooftop, mixed-used development including 216 residential units and 528 m² of at-grade retail uses.

A Zoning By-law Amendment Application was made to the City of Toronto staff in June 2021. The latest transportation-related comments provided by City staff on the application are from Engineering and Construction Services, dated November 9, 2021.

The current SPA #1 submission is similar to the previous June 2021 ZBA submission with minor changes including the reduction of 1 unit, a 6 m² retail GFA increase, 1 parking space increase, and a 21 bicycle parking space (19 long-term and 2 short-term) decrease as summarized in **Table 1**.

As a result, the trip generation and assignment based on the current development programme is generally consistent with the June 2021 ZBA submission, which Transportation Services accepted the methodology and conclusions of the submitted ZBA report as it relates to vehicular traffic. Therefore, the same methodology and conclusions are applicable to the current SPA #1 submission and are subsequently, reasonable and approvable by the City.

1.1 DEVELOPMENT STATISTICS

A comparison between the original and current site statistics is summarized in **Table 1**. Reduced scale architectural plans and landscape architectural plans are attached in **Appendix A** and **Appendix B**, respectively.

TABLE 1 SITE STATISTICS COMPARISON

Land Use	June 2021 ZBA #1 Submission	April 2022 SPA #1 Submission	Net Change ZBA #1 to SPA #1
Residential	217 units	216 units	-1 unit
Retail	522 m ² GFA	528 m ² GFA	+6 m ²
Parking Supply	69 spaces (51 resident) 0.23 spaces/unit (18 commercial) 0.08 spaces/unit	70 spaces (52 resident) 0.24 spaces/unit (18 commercial) 0.08 spaces/unit	+1 space
Loading	1 Type 'G'	1 Type 'G'	No change
Bicycle Parking	244 spaces (217 long-term) (27 short-term)	223 spaces (198 long-term) (25 short-term)	-21 spaces (-19 long-term) (-2 short-term)

2.0 RESPONSE TO COMMENTS

Transportation related comments from City of Toronto Engineering and Construction Services department are outlined in *italics* below with responses from BA Group.

2.1 RESPONSE TO ENGINEERING & CONSTRUCTION SERVICES (DATED NOVEMBER 9, 2021)

A. REVISIONS AND ADDITIONAL INFORMATION REQUIRED FOR PLANS STUDIES AND DRAWINGS

Comment to Part A.1.1

In consultation with Cycling and Pedestrian Projects, design and construct a raised bicycle lane along the south side of Richmond Street West, extending from the site driveway to Bathurst Street, at a minimum width of 1.8 metres. This lane is to be constructed in accordance with the City's T-990.100 design specification. Please contact Becky Katz at becky.katz@toronto.ca for more information.

Response to Part A.1.1

Noted. A raised bicycle lane along the south side of Richmond Street West, extending from the site driveway to Bathurst Street, at a minimum width of 1.8 metres has been proposed in accordance with the City's T-990.100 design specification. Please refer to the updated ground floor plan provided in **Appendix A**.

Comment to Part A.1.3

Provide further documentation and review the functionality (including acceptable vehicle manoeuvring diagrams) of the proposed substandard or "small-car" parking spaces.

Response to Part A.1.3

Noted. Please refer to BA Group's SPA #1 transportation report and the small car review provided in **Appendix B**, which illustrates the functionality of the proposed substandard parking spaces.

D. BACKGROUND

Comment to Parking

The provided report notes that up to 10 percent of the provided parking spaces are expected to be substandard, with minimum dimensions of 2.4 metres wide, 5.1 metres long and 1.7 metres high. This is acceptable in principle, but prior to Site Plan Control approval, the applicant will need to identify these spaces and review the functionality of their design and use. This will require further documentation and the submission of acceptable vehicle manoeuvring diagrams (VMDs). In addition, the applicant is advised that prior to the release of the Draft Plan of Condominium for registration, acceptable documentation must be included advising future owners of the proposed substandard or small-car parking space dimensions and that they are not meant for all vehicle types and would be best served as small-car spaces only.

Response to Parking

Noted. Please refer to BA Group's SPA #1 transportation report and the small car review provided in **Appendix B** of the report, which illustrates the functionality of the proposed substandard parking spaces and supportive vehicular manoeuvring diagrams. The updated traffic control signage and pavement marking plan for the underground parking garage in **Appendix D** of the report identifies these spaces as small-car spaces only.



Comment to Loading

In order to improve vehicular and pedestrian safety in the immediate area, a vehicular warning system will be required that informs drivers exiting the underground parking garage that trucks are turning at the top of the primary access ramp and within the internal driveway when the signals are flashing. Furthermore, documentation will be required to indicate how the flashing warning light will be activated when trucks are entering and exiting the loading spaces.

Response to Loading

Noted. Please refer to the updated traffic control signage and pavement marking plans in **Appendix D** of the BA report. A traffic control device specialist will be consulted to determine an appropriate detection system for the site in a future submission.

Comment to Solid Waste Management

Collection will be subject to the following conditions being met:

- 1. Revised drawings must indicate and annotate a staging pad abutting the front of the Type G loading space that will have an unencumbered vertical clearance of 6.1 metres, constructed of 200mm reinforced concrete and have a grade of no more than 2%.*
- 2. Revised drawings must indicate a bulky storage room of minimum 10 square metres. If the bulk storage is within the waste storage room, it must be annotated.*
- 3. Revised drawings must indicate that all access driveways to be used by the collection vehicle will be level (+/-8%), have a minimum vertical clearance of 4.4 metres throughout, a minimum 4.5 metres wide throughout and 6 metres wide at point of ingress and egress.*
- 4. Revised drawings must indicate that any/all overhead doors the collection vehicle will be passing through have a minimum overhead clearance of 4.4 metres.*
- 5. Revised drawings must annotate that a trained on-site staff member will be available to manoeuvre bins for the collection driver and also act as a flagman when the truck is reversing. In the event the on-site staff is unavailable at the time the City collection vehicle arrives at the site, the collection vehicle will leave the site and not return until the next scheduled collection day.*
- 6. As the planned movement of the collection vehicle is adjacent to exits from the parking garage, revised drawings must indicate a warning system to caution motorists leaving the parking garage of heavy vehicles when loading operations are occurring. This warning system should include both lights and signs.*

Response to Solid Waste Management

Please refer to the architectural site plans, and traffic control signage and pavement marking plans, provided in **Appendix A** and **Appendix D**, respectively.



3.0 VEHICULAR PARKING FACILITIES

An updated assessment of the vehicular parking requirement and proposed parking supply is provided in the following sections for 152-164 Bathurst Street and 621-627 Richmond Street West.

3.1 VEHICULAR PARKING REQUIREMENTS

The site is located in a “grey hole” of comprehensive city-wide Zoning By-law 569-2013; as a result, the site is subject to the former City of Toronto Zoning By-law 438-86. Further, a portion of the site is located within the ‘MCR’ zone. For the purpose of calculating minimum parking requirements for the site, Zoning By-law 438-86 minimum parking requirements are applied to the entire development program. On this basis, the minimum parking requirements for the site are outlined in **Table 2**.

TABLE 2 MINIMUM PARKING REQUIREMENTS – ZONING BY-LAW 438-86 (MCR RATES)

Use	Number of Units / GFA	Requirement	Number of Spaces Required
Bachelor	17	0.5 spaces per unit	9
1-bedroom	102		51
2-bedroom	78	0.75 spaces per unit	59
3-bedroom or more	19		14
Resident Sub-total	216	0.62 spaces per unit (blended)	133
Visitors	216	0.06 spaces per unit	13
Retail	528 m ² GFA	None	0
Non-Resident Sub-total			13
TOTAL			146

Notes:

1. Site Statistics based upon stats provided by Kirkor Architects and Planners, dated April 15, 2022.
2. Where a parking requirement results in a number containing a fraction, Zoning By-law 438-86 requires that it be rounded up if the fraction is equal to or greater than 0.5 and rounded down otherwise (except when less than one space).

3.1.1 Proposed Parking Supply

It is proposed to provide vehicular parking in accordance with the minimum parking rates outlined below:

- Residents: 0.24 parking spaces per unit
- Residential Visitors: 0.08 parking spaces per unit (non-exclusive)
- Retail: None, but residential visitor parking supply will be provided on a shared, non-exclusive basis

The proposed resident parking supply rate does not meet the aforementioned Zoning By-law 438-86 MCR parking requirements and therefore, will require a zoning by-law amendment. The proposed residential visitor and retail parking supply meets the appropriate requirements but a technical variance is likely required to permit a commercial parking garage to provide parking for these uses on a shared basis.

The application of the proposed parking supply rates and totals is outlined in **Table 3**.



TABLE 3 PROPOSED PARKING SUPPLY

Use	Number of Units / GFA	Proposed Parking Rate	Number of Spaces Proposed
Bachelor	17	0.24 spaces per unit (blended)	52
1-bedroom	102		
2-bedroom	78		
3-bedroom or more	19		
Resident Sub-total	216	0.24 space per unit	52
Visitors	216	0.08 spaces per unit	18
Retail	528 m ² GFA	None	0
Non-Resident Sub-total			18
TOTAL			70

Notes:

1. Site Statistics based upon stats provided by Kirkor Architects and Planners, dated April 15, 2022.

The application of the proposed parking supply ratios results in a requirement for 70 parking spaces, inclusive of 52 resident parking spaces and 18 visitor parking spaces. As is noted above, it is proposed for the residential visitor parking supply to be provided on a shared non-exclusive basis, meaning that retail visitors will be able to utilize this residential visitor parking supply.

The current application is proposing 1 additional resident parking space (52 spaces) compared to the previous June 2021 ZBA application (51 spaces), which results in a slight increase in the proposed resident parking rate from 0.23 spaces per unit to 0.24 spaces per unit.

The proposed residential visitor parking supply of 18 spaces shared with retail use, equivalent to 0.08 spaces per unit, remains the same between the current SPA #1 application and original ZBA application.

Given that Transportation Services previously accepted the proposed parking supply of 69 spaces, a revised parking supply of 70 spaces (52 resident and 18 shared visitor / retail), it is assumed that the new residential parking rate of 0.24 spaces per unit and commercial parking rate (shared between residential visitor and retail) of 0.08 spaces per unit is reasonably acceptable by the City of Toronto.

3.1.2 Accessible Parking Requirement

Application of the Zoning By-law 579-2017 would require the provision of providing accessible parking spaces for 13 to 100 required parking spaces at a minimum of 1 parking spaces for every 25 parking spaces. The accessible spaces must be adjacent to a 1.5 metre wide accessible barrier free aisle and can be shared between two accessible spaces. The accessible spaces are located in close proximity to the elevator cores and meet the dimensional requirements outlined in Zoning By-law 579-2017.

For the Bathurst / Richmond parking garage, 3 accessible parking 3 are being provided for the overall parking supply of 70 spaces, which meets the minimum Zoning By-law 579-2017 requirement.

A signage and pavement marking plan is provided in **Appendix D** indicating the parking and loading signs.

3.1.3 Toronto Green Standards Version 3.0 – Electric Vehicle Supply Equipment (EVSE) & Low-Emitting Vehicle (LEV) Spaces

For the total 70 parking space supply, it is proposed to provide 14 spaces (20%) with EVSE installed and the remaining 56 spaces (80%) will have provisions for future EVSE installation in compliance with the Toronto Green Standard Version 3.0, standard AQ 1.3.

3.2 SMALL CAR PARKING SPACE REVIEW

3.2.1 Zoning By-law Dimensions

The City of Toronto Zoning By-law 438-86 (as amended by the City of Toronto 494-2007) states the relevant and basic parking space dimensional requirements as follows:

- 2.6 metres in width
- 5.6 metres in length
- 2.0 metres in height
- Accessed by a 6.0 metre drive aisle

Zoning By-law 438-86 (as amended by City of Toronto By-law 494-2007) also specifies that the minimum required width of a parking space shall be increased by 0.3 metres for each side of the parking spaces which is obstructed. The side of the parking space is considered to be obstructed when any part of a fixed object such as, but not limited to, a wall, column, bollard, fence, or pipe is situated within 0.3 metres of the side of the parking space and more than 1.0 metres from the front or rear of the parking space.

Parking spaces that do not meet all of the above requirements will be small car / obstructed parking spaces. Therefore, it is proposed at this time for permission to be established as part of the Zoning By-law Amendment application (and ultimately, in the proposed site-specific by-law for the site) for a maximum of 10% of the total proposed parking supply to be permissible and to count as part of the total parking supply if the parking spaces do not meet all of the above requirements. Further, a maximum of 10% of the total proposed parking supply will be subject to the following parking space minimum dimension requirements:

- 2.4 metres in width
- 5.1 metres in length
- 1.7 metres in height
- the side of the parking space may be obstructed

The majority of parking spaces located within the parking garage of the proposed building comply with the Zoning By-law parking space dimensional requirements. However, 3 spaces out of the proposed 70 parking spaces (equivalent to approximately 4 percent of the total parking supply) do meet the minimum parking dimension standards but are considered side obstructed “small car” parking spaces.

3.2.2 Inventory of “Small Car” Parking Spaces

The reduced architectural Site plans provided in **Appendix A** identify the locations of 3 “small car” parking spaces within the underground parking garage while the small car review plans classify the dimensions and type of obstructed parking space as shown in **Appendix B**. For review purposes, the spaces are referenced in **Table 4**.

TABLE 4 SMALL CAR PARKING SPACE INVENTORY

Level	Space Label	Space Length (m)	Space Width (m)	Aisle Width (m)	Obstruction
P1	SC-01	5.80	3.00	6.0	One-sided obstructed, wall
P1	SC-02	5.60	2.60	6.0	One-sided obstructed, wall
P2	SC-03	5.80	3.00	6.0	One-sided obstructed, wall

3.2.3 Basis of Small Car Parking Space Review

The functionality of the proposed “small car” parking spaces has been reviewed based upon:

- the ability of these spaces to accommodate a wide range of the vehicle lengths and widths prevalent in the passenger vehicle fleet used today;
- the ability to manoeuvre into / out of the spaces; and,
- the ability for drivers and / or passengers to open car doors in an acceptable manner.

This assessment has been undertaken considering the range of length and widths of the vehicles being used today in an urban centre such as Downtown Toronto.

3.2.4 Design Vehicle

A design vehicle has been selected for the purposes of reviewing the functionality of the 3 “small car” parking spaces. This design vehicle is based upon recent vehicle sales information collected by BA Group and the size of vehicles observed by BA Group at a series of residential buildings within the urban centre of Toronto. The length and width dimensions of the design vehicle used in the small car review spaces reflects a passenger car that is equivalent to the 85th percentile length and width characteristics of the passenger car fleet in use today.

The dimensions of the design vehicle are as follows:

- a) a vehicle length of in the order of 4.97 metres
- b) a vehicle width of in the order of 1.93 metres

These vehicle dimensions reflect, generally, a Ford Explorer sized vehicle.

3.2.5 Analysis of Width Deficient “Obstructed” Parking Spaces

The functionality of a parking space from a width perspective considers obstruction criteria, such as driver / passenger door clearance requirements to allow people to enter and exit a vehicle, once parked in a reasonable manner.

All 3 obstructed “small car” spaces have at least widths of 2.6 metres and lengths of 5.6 metres, which meet the minimum Zoning By-law parking space dimensions. However, these spaces are one-sided obstructed by a wall.

A review of the door opening clearance requirements is provided below.

Door Opening – Clearance Needs

This aspect considers whether the obstructed “small car” spaces provide sufficient clearance to enable vehicle occupants to open their car doors and enter or leave their vehicle. A door opening clearance of between 0.55 metres and 0.65 metres is typically considered as appropriate for use in low to high turnover facilities, respectively. A typical high turnover facility would be a parking lot of a shopping mall, whereas a low turnover facility would be a commuter parking facility or, a primarily residential parking facility such as that provided in this development.

The above suggests that a parking space width of approximately 2.48 metres would be the minimum stall width that would appropriately and adequately provide for a full door opening on one-side of a vehicle (i.e. the driver’s side) while allowing a nominal allowance for clearance to any structure on the other side of the vehicle. This is based upon consideration of the 85th percentile design vehicle width discussed in **Section 3.2.4** (i.e. 1.93 metres) and a 0.55 metre door clearance distance.

Each of the obstructed “small car” spaces is 2.6 metres in width, which exceeds the 2.48 metre minimum dimension outlined above. Please note that this assumes the door swing is accommodated within the parking space itself. In many instances, further space is provided within adjacent parking spaces, which could reduce the individual space width needs.

Therefore, all of these obstructed spaces are also considered to be functionally viable spaces. Illustrations of door clearance conditions for the obstructed spaces have also been prepared and are provided in **Appendix B**. These confirm that the proposed obstructed, width deficient spaces are sufficiently wide enough to allow occupants to enter and leave their vehicles in a reasonable manner.

Maximum Small Car Parking Supply Provisions

Recognizing that these 3 one-side obstructed, small car spaces (equivalent to 4 percent of the total parking supply) operate in a reasonable manner and that they accommodate the manoeuvring requirements of a significant portion of the vehicle fleet in Toronto, we suggest that a prospective Site-Specific Zoning By-law permit a maximum of 10 percent of the proposed parking space supply to be small car spaces (equivalent to 7 spaces) which is a reasonable allowance for the City of Toronto.

4.0 LOADING FACILITIES

4.1 LOADING REQUIREMENTS

Application of the minimum loading requirements defined by Zoning By-law 438-86 loading requirements to the proposed site requires one (1) Type 'G' loading space.

4.1.1 Zoning By-law 569-2013

It is noted that if comprehensive City of Toronto Zoning By-law 569-2013 were applicable to the site, an extra Type B loading space would be required because the threshold for the "retail store" use is slightly lower in comparison to Zoning By-law 438-86 (499 m² vs. 550 m²). The proposed retail GFA on the site is 528 m², in the middle of the gap.

4.2 LOADING SUPPLY

One (1) Type 'G' loading space is proposed to support the development proposal. The proposed loading supply satisfies the loading requirements of Zoning By-law 438-86. A signage and pavement marking plan is provided in **Appendix D** indicating the parking and loading signs.

4.2.1 Residential Garbage and Recycling Facilities

Refuse / recycling collection for the residential component of the building will occur within the Type 'G' loading space provided on-site. Appropriate bin staging provisions are provided in front of the Type 'G' loading space in accordance with the design requirements outlined in the "City of Toronto Requirements for Garbage, Recycling and Organics Collection Services for New Developments and Redevelopments" dated May 2012.

Provision for a minimum of 16.6 sq. metres has been provided in front of the Type 'G' loading space to accommodate a total of 4 three cubic yard bins within the allocated area (including 1 bin within the Type 'G' space). The staging areas has been provided in accordance with the City policy requirements (i.e. size of bin staging area = 5 sq. metres for every 50 residential units provided in excess of the first 50 residential units).

Waste storage rooms and uncompacted waste (bulky items) rooms are provided. Provision for a minimum of 77 sq. metres of waste storage and 10 sq. metres uncompacted waste storage has been provided. The waste storage area and uncompacted waste storage area has been provided in accordance with the City policy requirements (i.e. size of waste storage room = minimum 25 sq. metres for the first 50 units plus an additional 13 sq. metres for each additional 50 units and size of uncompacted waste = minimum 10 sq. metres).

4.2.2 Operations and Manoeuvring

Turning movement diagrams have been developed demonstrating the ability for service and delivery vehicles to manoeuvre appropriately within the site when entering / leaving the loading space within the loading area.

The design vehicles used to assess the design arrangements of the proposed loading space includes the City of Toronto garbage collection vehicle, TAC-MSU, TAC-SU, and passenger vehicles.

Updated vehicular manoeuvring diagrams are provided in **Appendix C** to illustrate the turning movements for the design vehicles entering / exiting the proposed loading spaces and confirm that all service vehicles are able to enter / leave the site in a forward motion.

The diagrams confirm that the proposed loading arrangements are appropriate and will facilitate the manoeuvring needs of the vehicles that are expected to make deliveries and collect waste / recycling at the property following the redevelopment as planned.

4.2.3 Height Clearances

The loading areas has been designed such that a minimum height clearance of 4.4 metres is maintained throughout the access driveway and manoeuvring areas leading to / from the loading spaces, which meets the minimum Zoning By-law 438-86 and City of Toronto design standards and policies for height clearance requirements within these areas (i.e. 4.4 metres to access the Type G loading space).

A minimum height clearance of 6.1 metres is provided above the entire Type G loading space and bin staging area to enable compacted bulk lift bin collection services.

5.0 BICYCLE PARKING FACILITIES

5.1 MINIMUM BICYCLE PARKING REQUIREMENT

5.1.1 Zoning By-law 438-86

The site is located in a “grey hole” of comprehensive city-wide Zoning By-law 569-2013. As a result, the site is subject to the former City of Toronto Zoning By-law 438-86. On this basis, the applicable minimum bicycle parking requirement is outlined in **Table 5**; as per Section 4(13)(c), all bicycle parking spaces have been proportionally divided as follows: 80% occupant bicycle parking spaces and 20% visitor bicycle parking spaces.

TABLE 5 ZONING BY-LAW 438-86 BICYCLE PARKING REQUIREMENTS

Use	Units / Floor Area ¹	Rate	Requirement	
			Occupant	Visitor
Residential	216 units	0.75 spaces / unit, to a maximum of 200 bicycle parking spaces	130 spaces	32 spaces
Retail ³	528 m ²	1 space / 1,250 m ² of NFA (if non-residential uses have GFA equal or greater to 2,000 m ²)	0 spaces	0 spaces
TOTAL			130 spaces	32 spaces

Notes:

1. Based upon the architectural plans provided by Kirkor Architects and Planners, dated April 29, 2021.

The application of Zoning By-law 438-86 minimum bicycle parking requirements to the site results in a requirement of 163 bicycle parking spaces, including 130 long-term bicycle parking spaces and 32 short-term bicycle parking spaces.

Comprehensive city-wide Zoning By-law 569-2013 Zone 1 minimum bicycle parking requirements (which are comparable to the Toronto Green Standard, Tier 1 minimum bicycle parking requirements) have also been applied to the development program in **Table 6**.

TABLE 6 ZONING BY-LAW 569-2013 (TGS) BICYCLE PARKING REQUIREMENTS

Use	Units / Floor Area ¹	Rate	Requirement	
			Long-Term	Short-Term
Residential	216 units	Long-term: 0.9 spaces / unit Short-term: 0.1 spaces / unit	195 spaces	22 spaces
Retail ²	528 m ²	Long-term: 0.2 spaces / 100 m ² of IFA Short-term: 3 + 0.3 spaces / 100 m ² of IFA	0 spaces	0 spaces
TOTAL			195 spaces	22 spaces

Notes:

1. Based upon the architectural plans provided by Kirkor Architects and Planners, dated April 15, 2022.
2. Despite the bicycle parking space rates set out in regulations 230.5.10.1(1) and 230.5.10.1(5) and (6), if a bicycle parking space is required for uses on a lot, other than a dwelling unit, and the total interior floor area of all such uses on the lot is 2000 square metres or less, then no bicycle parking space is required.

The application of city-wide Zoning By-law 569-2013 Zone 1 minimum bicycle parking requirements (which are comparable to the Toronto Green Standard, Tier 1 minimum bicycle parking requirements) to the site results in a requirement of 217 bicycle parking spaces, including 195 long-term bicycle parking spaces and 22 short-term bicycle parking spaces.

5.2 BICYCLE PARKING SUPPLY

The architect site statistics indicate a total supply of 223 bicycle parking spaces including 195 residential long-term spaces, 22 residential short term spaces, 3 commercial long-term, and 3 commercial short-term spaces. The overall proposed bicycle parking supply exceeds the requirement of 217 spaces (22 short-term and 195 long-term) defined by the Zoning By-law 569-2013 by 6 spaces (3 long-term spaces and 3 short-term spaces).



6.0 TDM PLAN STRATEGIES

The site context provides for access to existing and planned public transit services and has good pedestrian connectivity, particularly due to its proximity to a variety of land uses. While strong opportunities exist in the area’s infrastructure to accommodate sustainable transportation practices, the ability to fully leverage these opportunities is important for ensuring the success of the TDM strategies. To this end, TDM Plan strategies are presented with targeted “intents” (i.e. what it is trying to achieve and for whom), accompanied by methods of implementation.

A summary of applicable mobility strategies is outlined below in **Table 7**. It is important to note that these TDM strategies will be continuously refined throughout the application process. Proposed initiatives based on these strategies are outlined in the following section of this report.

TABLE 7 POTENTIAL SITE TRAVEL DEMAND MANAGEMENT PLAN STRATEGIES

Measure	Intent
Reduce Car Ownership & Usage / Vehicular Parking Supply and Management	<ul style="list-style-type: none"> • Reduce the need for residents and employees to own a car for occasional/discretionary travel. • Reduce the likelihood of privately-owned car use for general travel, particularly during peak periods. • Encourage ride-sharing and higher vehicle occupancy. • Use parking supply as a tool to reduce automobile travel and support alternate modes.
Enhance Pedestrian Access and Walkability	<ul style="list-style-type: none"> • Enhance the walkability of the site at-grade and create a truly pedestrian-scaled environment. • Improve the quality of the public realm and pedestrian accessibility of the site. • Assist in extending a high-quality, safe, accessible, and convenient network of pedestrian linkages that enhance local pedestrian connections to the site and progresses the area-wide pedestrian network. • Enhance the ability for residents, employees, and visitors to travel between the site and the surrounding neighbourhoods and transit focal points without the use of a vehicle.
Encourage & Facilitate Bicycle Use	<ul style="list-style-type: none"> • The provision of physical and operational infrastructure on-site and within the building. • Cooperation with the City and other stakeholders, to enhance bicycle connectivity within the area to the broader cycling network.
Encourage Transit Use	<ul style="list-style-type: none"> • Increase the awareness, utility, practicality and viability of transit travel options for commuter and recreational travel purposes to / from a range of locations across the City and further afield. • Enable high-quality and accessible pedestrian connections to the area transit system. • Enable the universal use of transit.
Coordination, Communication & Promotion	<ul style="list-style-type: none"> • Inform and raise awareness of non-automobile travel options for the site. • Actively promote non-automobile travel options and services. • Introduce, develop and coordinate TDM programs / initiatives with employment / retail tenants within the context of the broader strategies in place for the development as a whole. • Enable the successful management of events and special circumstances as they may arise.

6.1 PROPOSED TDM INITIATIVES

Specific TDM initiatives proposed by the developer as part of the mobility strategy to support the proposed development and facilitate use of alternatives to car ownership are outlined below in **Table 8**.

TABLE 8 PROPOSED TDM INITIATIVES

Initiative	Description
Car Share Encouragement	
1. Car-share participation	Local car-share options will be advertised to residents and visitors to the site.
2. Subsidized Car-share trial memberships	Consideration will be given to partially subsidizing one annual membership with a car-share provider per unit, on request, for one year.
Cycling Facilities	
1. Bicycle parking	As is outlined in Section 5.0 . 223 bicycle parking spaces will be provided including 195 long-term bicycle parking spaces, located in a secure bike storage rooms, and 22 short-term bicycle parking spaces for visitors.
2. Enhanced cycling maintenance facilities	Bicycle repair stations provided in long-term bike storage rooms.
3. Encourage Bike Share Toronto to provide a station	The client will work with the City of Toronto and Toronto Parking Authority to locate a Bike Share Toronto station on-site or assist in facilitating the addition of Station to the neighbourhood.
Improved Pedestrian Experience	
1. Widened sidewalks	Provision of increased sidewalk width for pedestrian activity at the site frontages for Richmond Street West and Bathurst Street.
Improve Transit Accessibility	
1. Real-time transit information signage	Indoor signage in lobby with real-time transit information.
Enhanced Communication	
1. Multi-modal exterior wayfinding signage	Outdoor multi-modal wayfinding signage
2. Promotional Events	Upon building occupancy, an event will be scheduled focussed upon alternative transportation options available to new residents in order for them to better make use of the TDM measures outlined in this Plan.
3. Ongoing TDM marketing	Condominium corporation will be required to promote TDM measures on an ongoing basis.

The combination of the above proposed measures will serve to make travel by transit, walking and cycling easy, and will provide alternatives to parking a car on site for the portion of trips that require the use of a private automobile.

* * * * *

We trust the foregoing is satisfactory for the initial Site Plan Approval application for 152-164 Bathurst Street and 621-627 Richmond Street West. Please feel free to contact us should you wish to discuss the above further.

Sincerely,
BA Consulting Group Ltd.



Stephen Bahadoor, P.Eng
Senior Associate



Stephanie D. Pham, EIT
Lead Transportation Designer

cc.
Ethan Sun, Lead Transportation Analyst
Theresa Chung-Hun, Transportation Designer



**Appendix A:
Reduced Scale Updated Architectural Plans**



BATHURST STREET & RICHMOND STREET, TORONTO, ON.

Proposed Mixed-Use Development

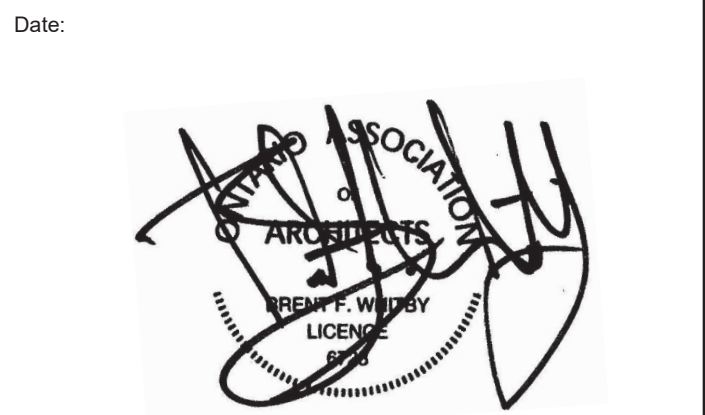


DRAWING LIST			
Sheet Number	Sheet Name	ZBA Submission - April 29, 2021	ZBA & SPA Submission
12 SITE PLAN APPROVAL			
A0	dA0.0 Cover Sheet	Yes	Yes
A1			
dA1.1	Survey	Yes	Yes
dA1.2	Context Map & Statistics	Yes	Yes
dA1.3	Site Plan	Yes	Yes
A2			
dA2.1	Floor Plan - Level P2 & P1	Yes	Yes
dA2.2	Floor Plan - Level 1 & 2	Yes	Yes
dA2.3	Floor Plan - Level 3 & 4	Yes	Yes
dA2.4	Floor Plan - Levels 5-6 & 7-9	Yes	Yes
dA2.5	Floor Plan - Levels 9 & 10-17	Yes	Yes
dA2.6	Floor Plan - Mechanical Penthouse & Roof Plan	Yes	Yes
A3			
dA3.1	North & East Elevations	Yes	Yes
dA3.2	South & West Elevations	Yes	Yes
dA3.3	1/50 Elevations West	Yes	Yes
dA3.4	1/50 Elevations North	Yes	Yes
A4			
dA4.1	Building Sections	Yes	Yes
A5			
dA5.1	Sun Shadow Study - March / September	Yes	Yes
dA5.2	Sun Shadow Study - June	Yes	Yes
dA5.3	Sun Shadow Study - December	Yes	Yes
A6			
dA6.1	Perspective Views	Yes	Yes
dA6.2	Perspective Views 2	Yes	Yes

Authorities Having Jurisdiction

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way debases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.
This Drawing is Not To Be Used For Construction Until Signed By The Architect.



KIRKOR
ARCHITECTS AND PLANNERS

20 De Boers Drive Suite 400
Toronto, ON M3J 0H1

Revisions:		
No.:	Revision:	Date:

2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021
No.:	Issued For:	Date:

Client:
Originate Developments
152-164 Bathurst Street &
623-627 Richmond Street, Toronto
Proposed Mixed-Use Development

Drawing Title:
Cover Sheet

Scale:
Drawn by:
AE
Checked by:
RP
Project No.:
20-018
Date:
April 15, 2022
Drawing No.:

dA0.0

DEVELOPER

ORIGINATE DEVELOPMENTS
T: 647-222-3116
E: info@originateinc.ca

ARCHITECT

KIRKOR ARCHITECTS & PLANNERS
20 DE BOERS DR. #400
TORONTO, ON. M3J 0H1
T: 416-665-6060
E: ghui@kirkorarchitects.com
CONTACT: GIGI HUI

PLANNING CONSULTANT

BOUSFIELD INC.
3 CHURCH STREET, SUITE 200
TORONTO, ON. M5E 1M2
T: 416-947-9744
E: kcooper@bousfields.ca
CONTACT: KATE COOPER

CIVIL ENGINEER

HUSSON ENGINEERING
+ MANAGEMENT
200 CACHET WOODS COURT,
SUITE 204, MARKHAM, ON. L6C 0Z8
T: 905-709-5825
E: greg.rapp@hudson.ca
CONTACT: GREG RAPP

LANDSCAPE ARCHITECT

MARTEN-NIKZAD LANDSCAPE
ARCHITECTS INC.
1387 BAYNEU AVE., UNIT 105
TORONTO, ON. M4G 3A5
T: 416-245-2299
E: studio@mnlarch.ca
CONTACT: AMIR NIKZAD

TRAFFIC CONSULTANT

BA CONSULTING GROUP LTD.
300-45 ST. CLAIR AVENUE WEST
TORONTO, ON. M4V 1K9
T: 416-961-7110
E: bahadoor@bagroup.com
CONTACT: STEPHEN BAHADOOR

HYDROGEOLOGY / GEOTECH

PGL ENVIRONMENTAL
102-250 WATER STREET
WHITBY, ON. L1N 0G5
T: 905-668-4908
E: pschuster@pggroup.com
CONTACT: PAULA SCHUSTER

ENVIRONMENTAL

PGL ENVIRONMENTAL
102-250 WATER STREET
WHITBY, ON. L1N 0G5
T: 905-668-4908
E: pschuster@pggroup.com
CONTACT: PAULA SCHUSTER

ACOUSTIC ENGINEER

RWDI
600 SOUTHGATE DRIVE
GUELPH, ON. N1G 4P6
T: 519-832-1311
E: dan.bacon@rwdi.com
CONTACT: DAN BACON

WIND CONSULTANT

RWDI
600 SOUTHGATE DRIVE
GUELPH, ON. N1G 4P6
T: 519-832-1311
E: dan.bacon@rwdi.com
CONTACT: DAN BACON

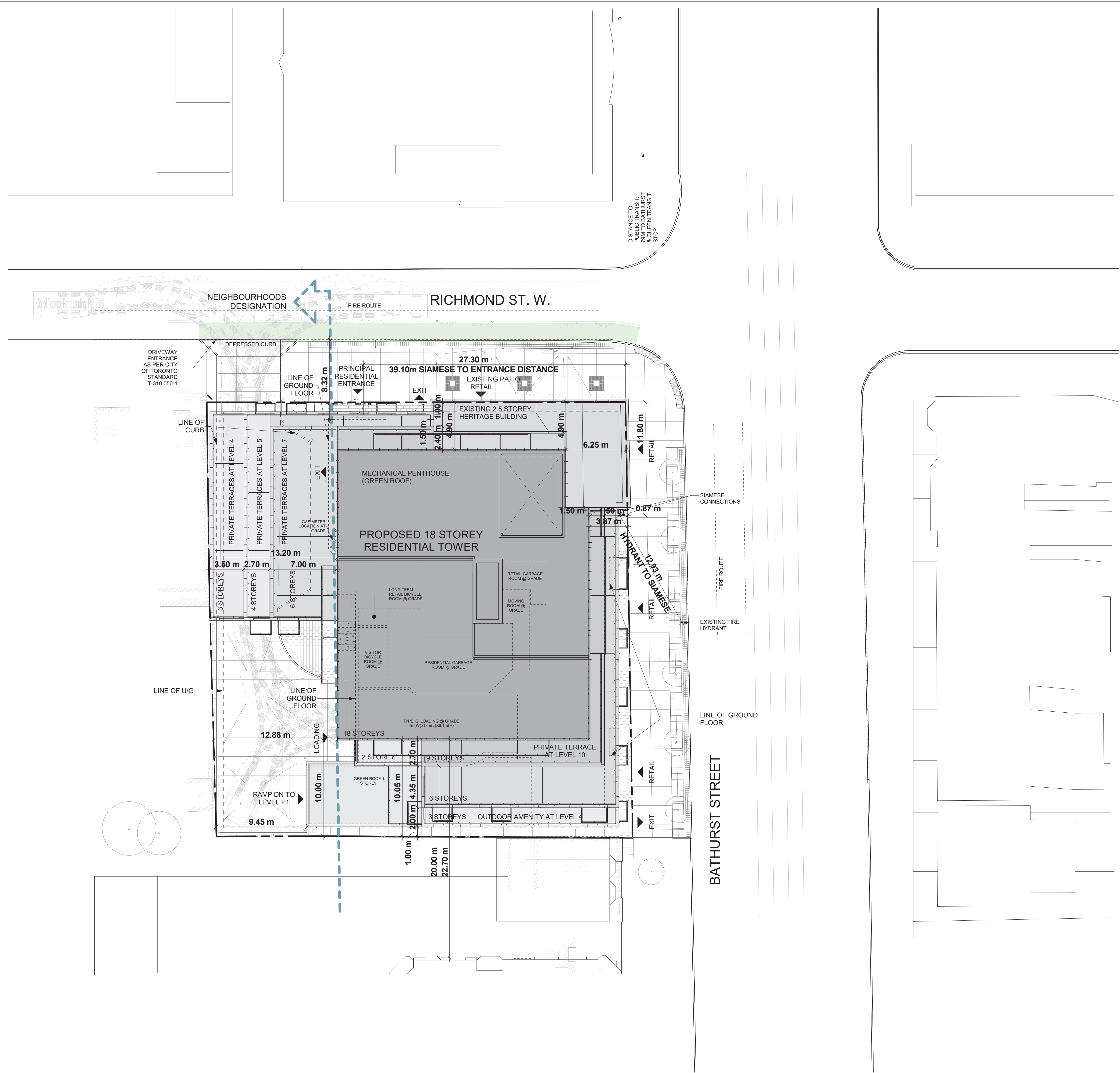
HERITAGE

GBCA
362 DAVENPORT ROAD, SUITE 100
TORONTO, ON. M5R 1K6
T: 416-929-6556
E: nicolas@gbca.ca
CONTACT: NICOLAS BARRETTE

SURVEYOR

KRCMAR SURVEYORS LTD.
1137 CENTRE STREET, SUITE 101
THORNHILL, ON. L4J 3M6
T: 905-738-0053
E: tom@krcomar.ca
CONTACT: TOM KRCMAR

Plot Date: 4/15/2022 11:05:32 AM File Path: C:\Users\2021\Documents\12_Bathurst & Richmond_P\2021_000001.dwg



Authorities Having Jurisdiction

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way debases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.

This Drawing is Not To Be Used For Construction Until Signed By The Architect.

Date:

Ontario Association of Architects
 ARCHITECTS
 FRANKLIN WHITEBY
 LICENCE
 6723
 2022-04-25

KIRKOR
 ARCHITECTS AND PLANNERS

20 De Boers Drive Suite 400
 Toronto, ON M3J 0H1

Revisions:		Date:
No.:	Revision:	

2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021

Client:

Originate Developments

152-164 Bathurst Street &
 623-627 Richmond Street, Toronto
 Proposed Residential Development

Drawing Title:
Site Plan

Scale:
 1 : 200

Drawn by:
 A.E.

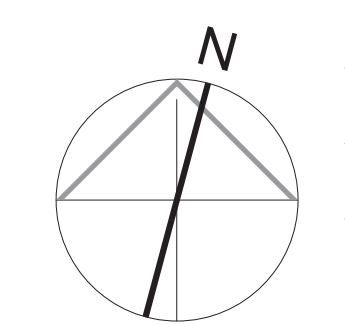
Checked by:
 R.P.

Project No.:

20-018

Date:
 April 15, 2022

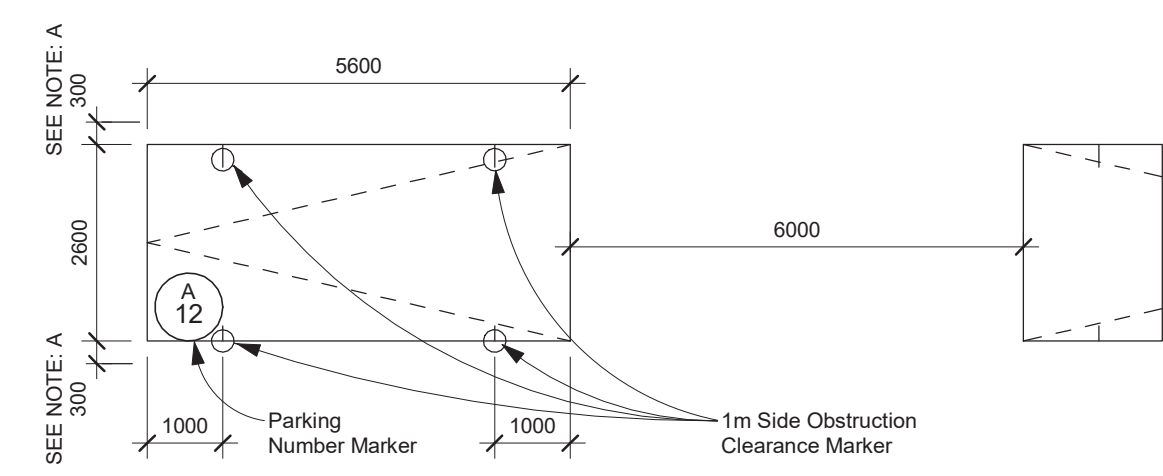
Drawing No.:



Site Plan 1
 1 : 200 dA1.3

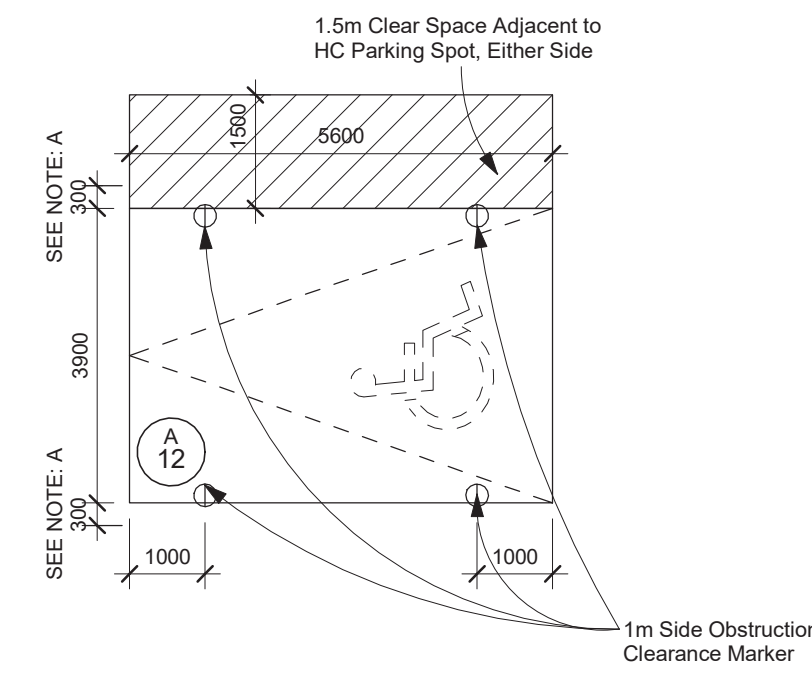
dA1.3

TYPICAL PARKING SPACE:
Drive Aisle @ 6m min.

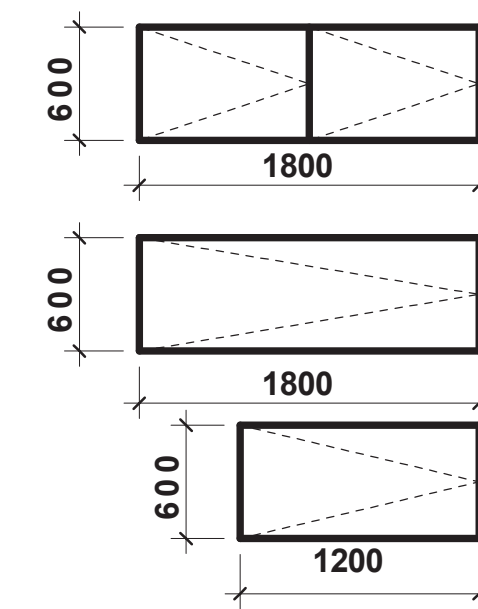


NOTE: A- PROVIDE AN ADDITIONAL 300mm FOR PARKING SPACE WIDTH WHEN OBSTRUCTIONS OCCUR BETWEEN THE FRONT AND REAR 1000mm

ACCESSIBLE PARKING SPACE:



BICYCLE PARKING SPACE LEGEND



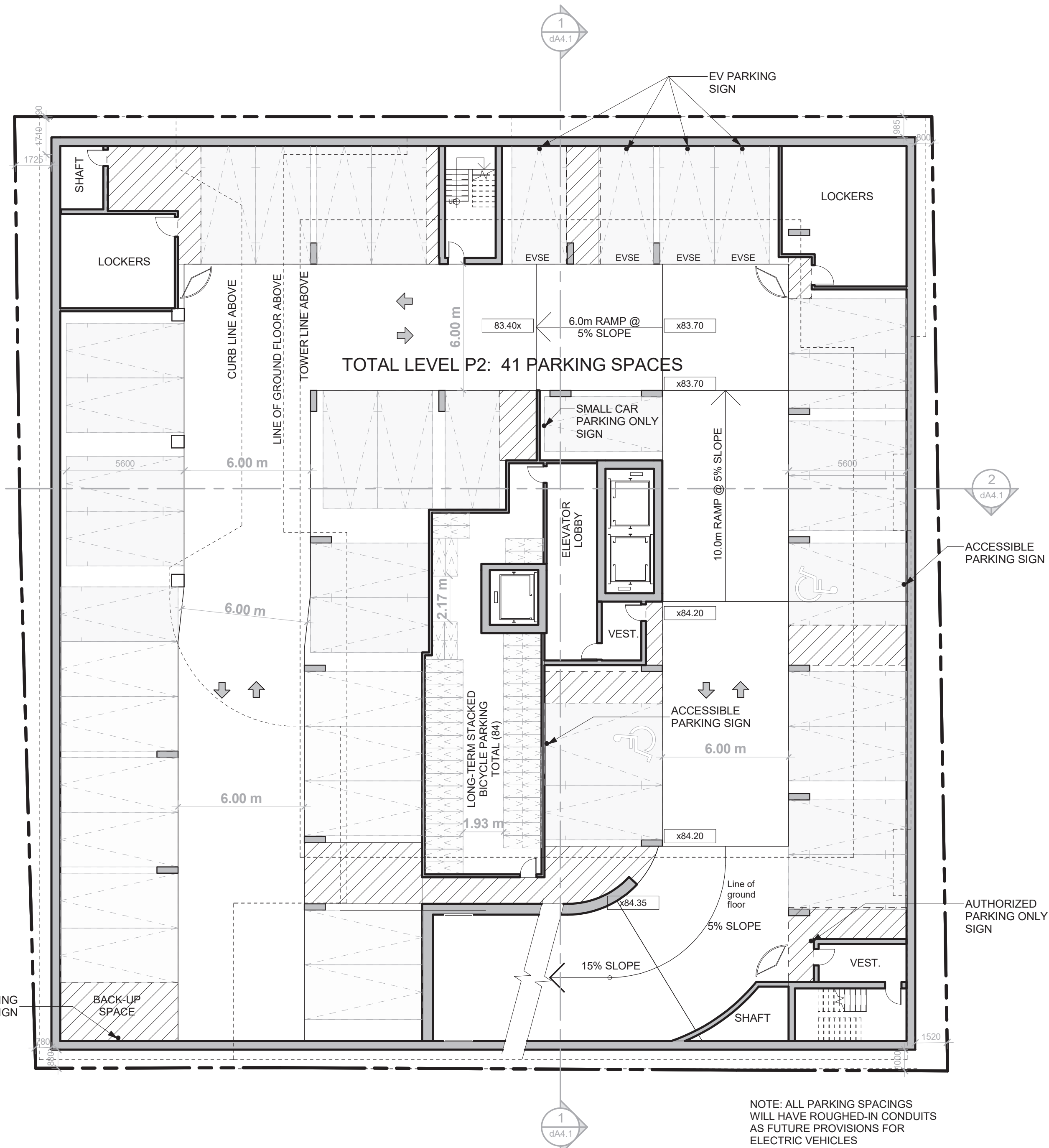
STACKED BICYCLE PARKING SPACE
(MINIMUM VERTICAL CLEARANCE OF 2.4m (1.2m/BICYCLE))

HORIZONTAL BICYCLE PARKING SPACE
(MINIMUM VERTICAL CLEARANCE OF 1.9m)

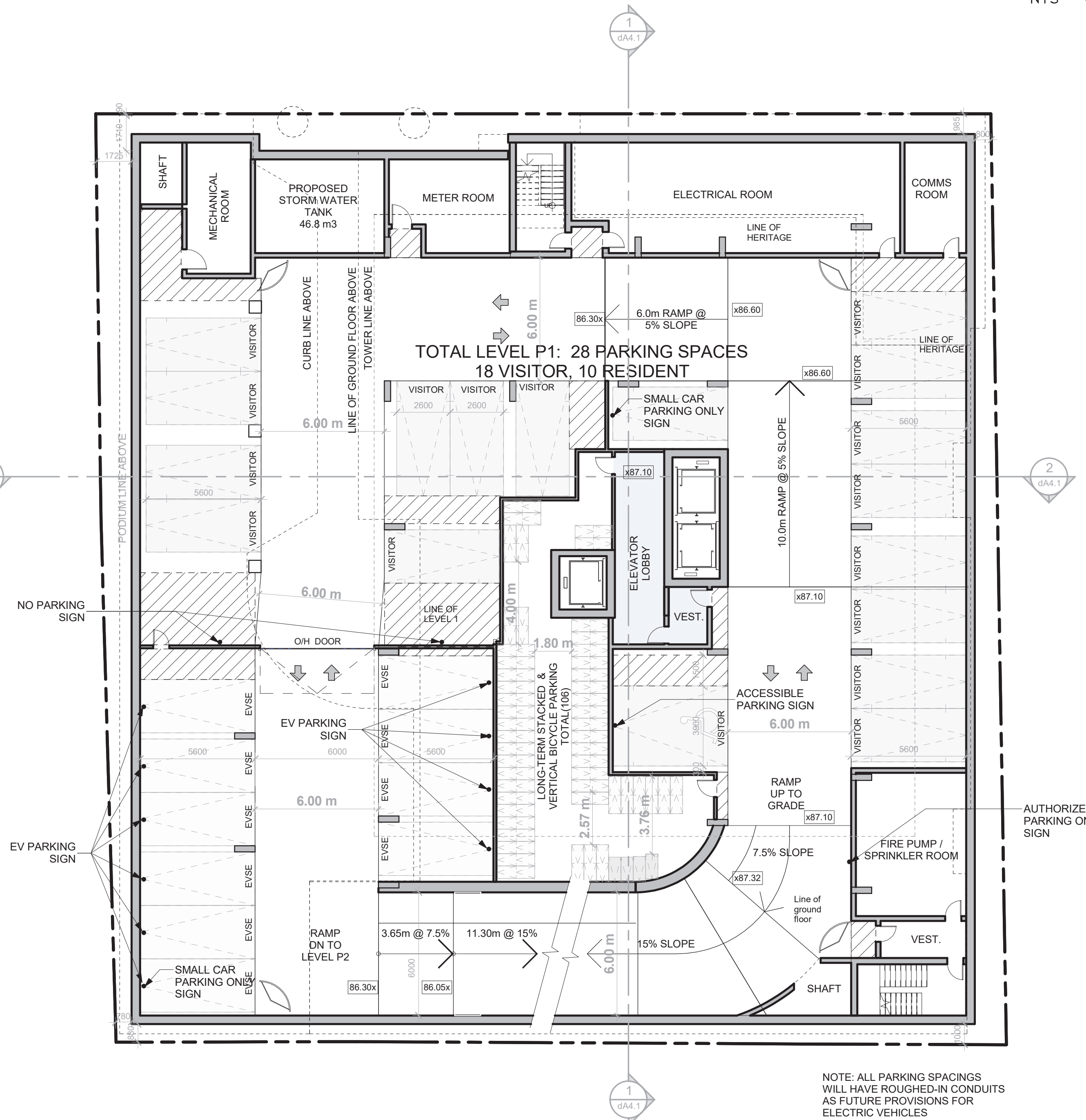
VERTICAL BICYCLE PARKING SPACE
(MINIMUM VERTICAL CLEARANCE OF 1.9m)

Vehicle and Bicycle Parking Space Legend

NTS **3**
dA2.1



NOTE: ALL PARKING SPACINGS WILL HAVE ROUGHED-IN CONDUITS AS FUTURE PROVISIONS FOR ELECTRIC VEHICLES



NOTE: ALL PARKING SPACINGS WILL HAVE ROUGHED-IN CONDUITS AS FUTURE PROVISIONS FOR ELECTRIC VEHICLES

Floor Plan - Level P2 **1**
1 : 150 dA2.1

Floor Plan - Level P1 **2**
1 : 150 dA2.1

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way debases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.
This Drawing is Not To Be Used For Construction Until Signed By The Architect.
Date:



KIRKOR
ARCHITECTS AND PLANNERS

20 De Boers Drive Suite 400
Toronto, ON M3J 0H1

No.	Revision	Date
2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021

No.	Issued For:	Date:
2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021

Client:
Originate Developments

152-164 Bathurst Street &
623-627 Richmond Street, Toronto
Proposed Residential Development

Drawing Title:
Floor Plan - Level P2 & P1

Scale:
As indicated

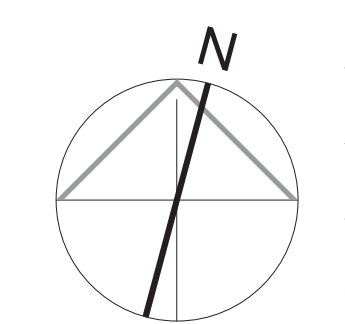
Drawn by:
S.V

Checked by:
R.P

Project No.:
20-018

Date:
April 15, 2022

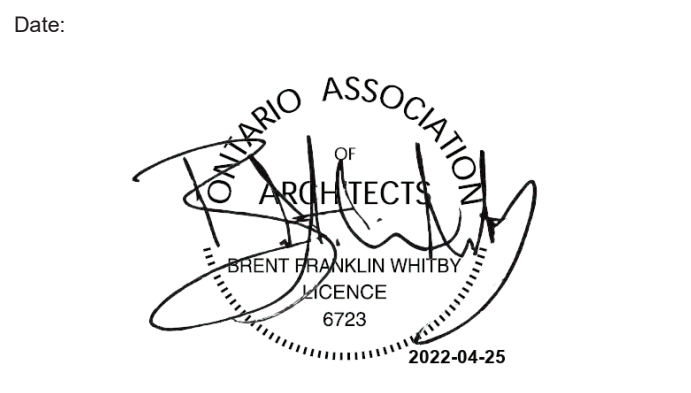
Drawing No.:



dA2.1

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way debases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.
This Drawing is Not To Be Used For Construction Until Signed By The Architect.



KIRKOR
ARCHITECTS AND PLANNERS

20 De Boers Drive Suite 400
Toronto, ON M3J 0H1

Revisions:
No.: Revision: Date:

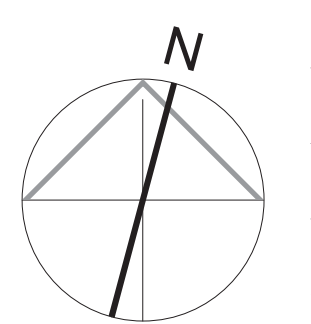
2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021
No.:	Issued For:	Date:

Client:
Originate Developments

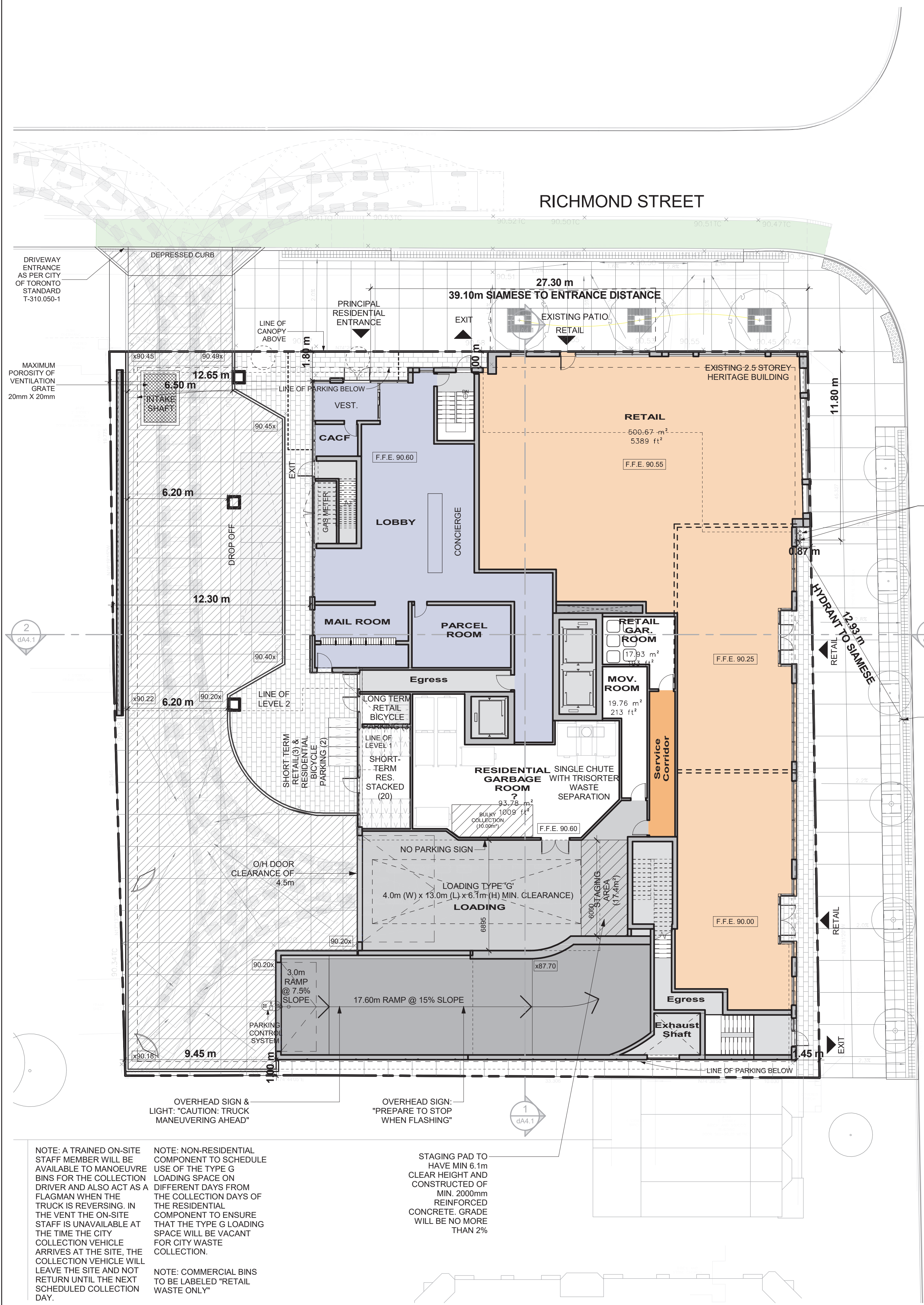
152-164 Bathurst Street &
623-627 Richmond Street, Toronto
Proposed Residential Development

Drawing Title:
Floor Plan - Level 1 & 2

Scale:
1 : 150
Drawn by:
S.V.
Checked by:
R.P.
Project No.:
20-018
Date:
April 15, 2022
Drawing No.:



dA2.2



Floor Plan - Level 1
1 : 150
1 dA2.2

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING. IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE, THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY"

STAGING PAD TO HAVE MIN 6.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 2000mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%



Floor Plan - Levels 2
1 : 150
2 dA2.2

DRIVEWAY ENTRANCE AS PER CITY OF TORONTO STANDARD T-310.050-1

MAXIMUM POROSITY OF VENTILATION GRATE 20mm X 20mm

2 dA4.1

2 dA4.1

2 dA4.1

2 dA4.1

1 dA4.1

1 dA4.1

April 15, 2022

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way releases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.
This Drawing is Not To Be Used For Construction Until Signed By the Architect.
Date:



KIRKOR ARCHITECTS AND PLANNERS
20 De Boers Dr. # 400 Toronto ON M3J 0H1
TEL 416 665 6060 kirkorarchitects.com

Revisions:
No.: Revision: Date:

Issued For: Date:

Drawing Title:

Floor Plan - Level 3 & 4

Client:

Originate Developments

Project:

Bathurst & Richmond

152-164 Bathurst Street & 623-627 Richmond Street, Toronto

Scale: 1 : 150

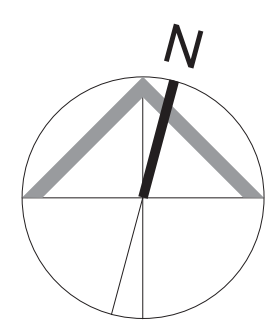
Drawn by: S.V.

Checked by: R.P.

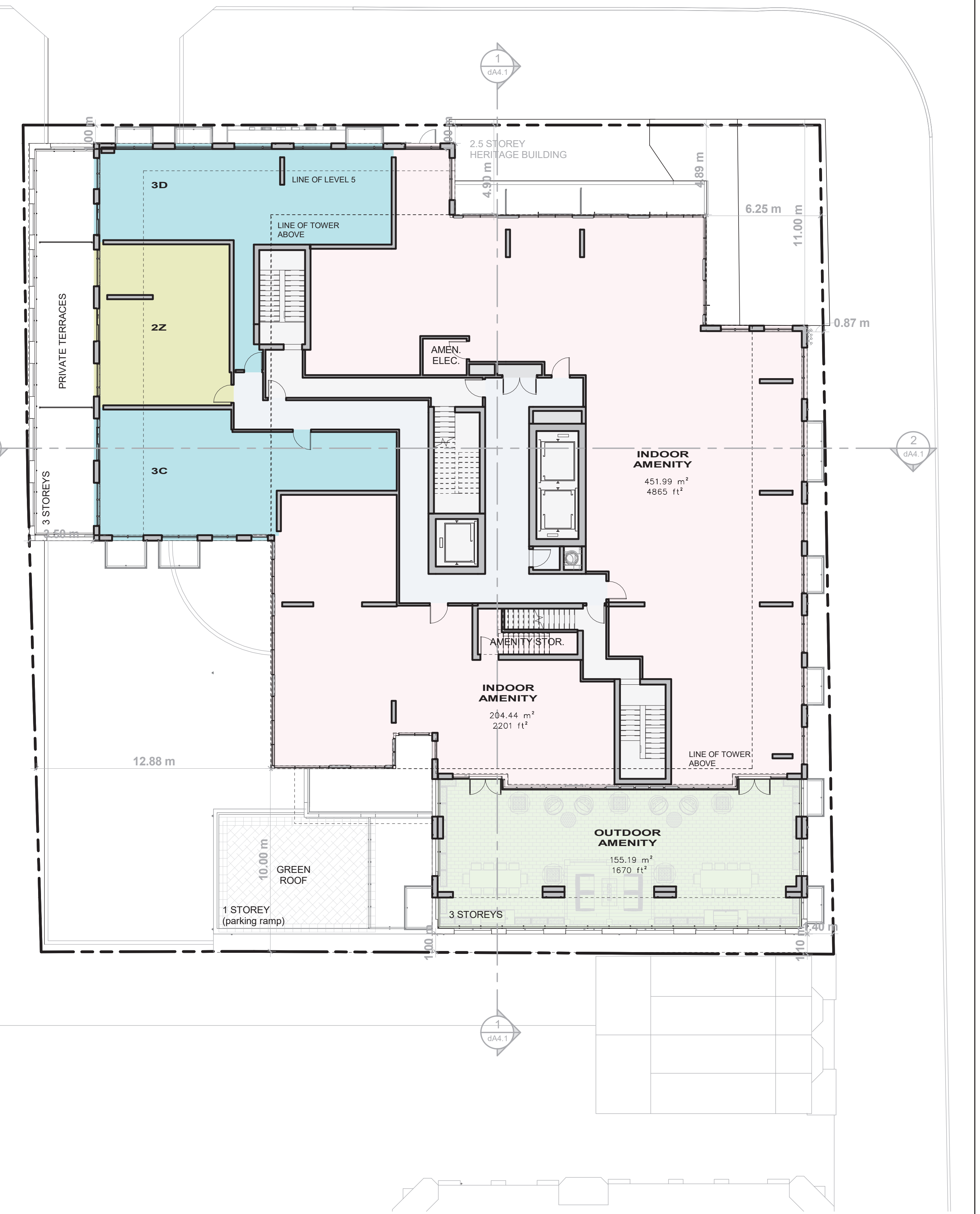
Project No.: 20-018

Date: April 15, 2022

Drawing No.: dA2.3



Floor Plan - Level 3
1 : 150
1 dA2.3

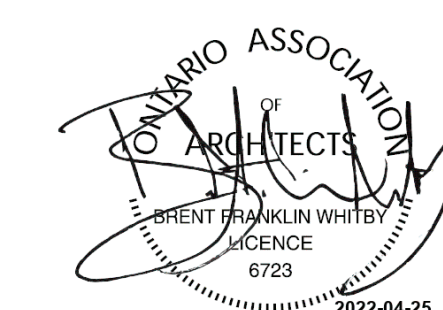


Floor Plan - Levels 4-6
1 : 150
2 dA2.3

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way debases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.
This Drawing is Not To Be Used For Construction Until Signed By The Architect.

Date:



KIRKOR
ARCHITECTS AND PLANNERS

20 De Boers Drive Suite 400
Toronto, ON M3J 0H1

No.	Revision:	Date:

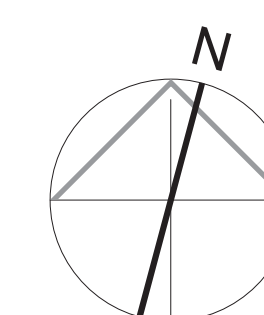
No.	Issued For:	Date:
2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021

Client:
Originate Developments

152-164 Bathurst Street &
623-627 Richmond Street, Toronto
Proposed Residential Development

Drawing Title:
Floor Plan - Levels 5-6 & 7-9

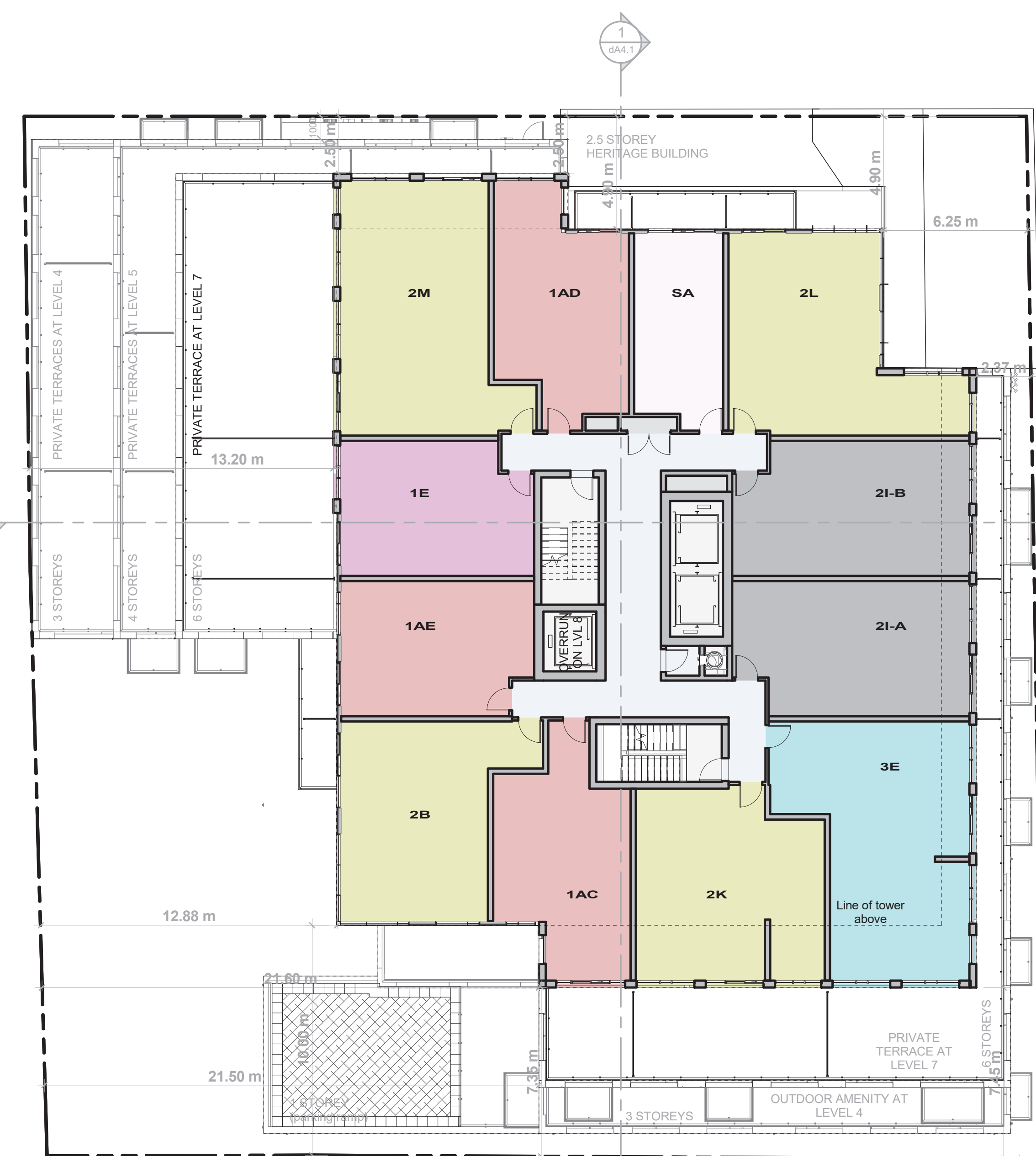
Scale:
1 : 150
Drawn by:
S.V.
Checked by:
R.P.
Project No.:
20-018
Date:
April 15, 2022
Drawing No.:



dA2.4



Floor plan level 5-6 1
1 : 150 dA2.4

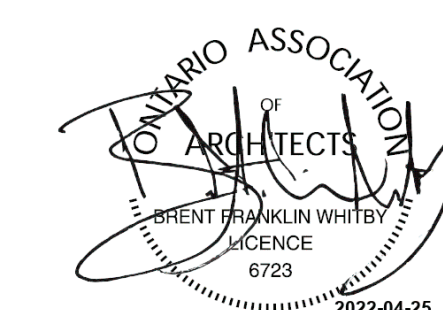


Floor Plan - Levels 7-8 2
1 : 150 dA2.4

All Drawings, Specifications, and Related Documents are the Copyright of the Architect. The Architect retains all rights to control all uses of these documents for the intended issuance/use as identified below. Reproduction of these Documents, without permission from the Architect, is strictly prohibited. The Authorities Having Jurisdiction are permitted to use, distribute, and reproduce these drawings for the intended issuance as noted and dated below, however the extended permission to the Authorities Having Jurisdiction in no way debases or limits the Copyright of the Architect, or control of use of these documents by the Architect.

Do not scale the drawings.
This Drawing is Not To Be Used For Construction Until Signed By The Architect.

Date:



KIRKOR
ARCHITECTS AND PLANNERS

20 De Boers Drive Suite 400
Toronto, ON M3J 0H1

No.:	Revision:	Date:

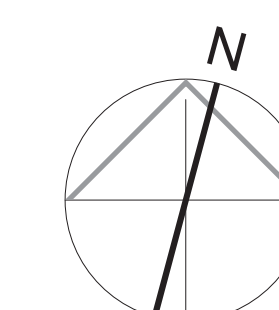
No.:	Issued For:	Date:
2	ZBA Resubmission & 1st SPA	April 15, 2022
1	Zoning By-Law Amendment #1	April 29, 2021

Client:
Originate Developments

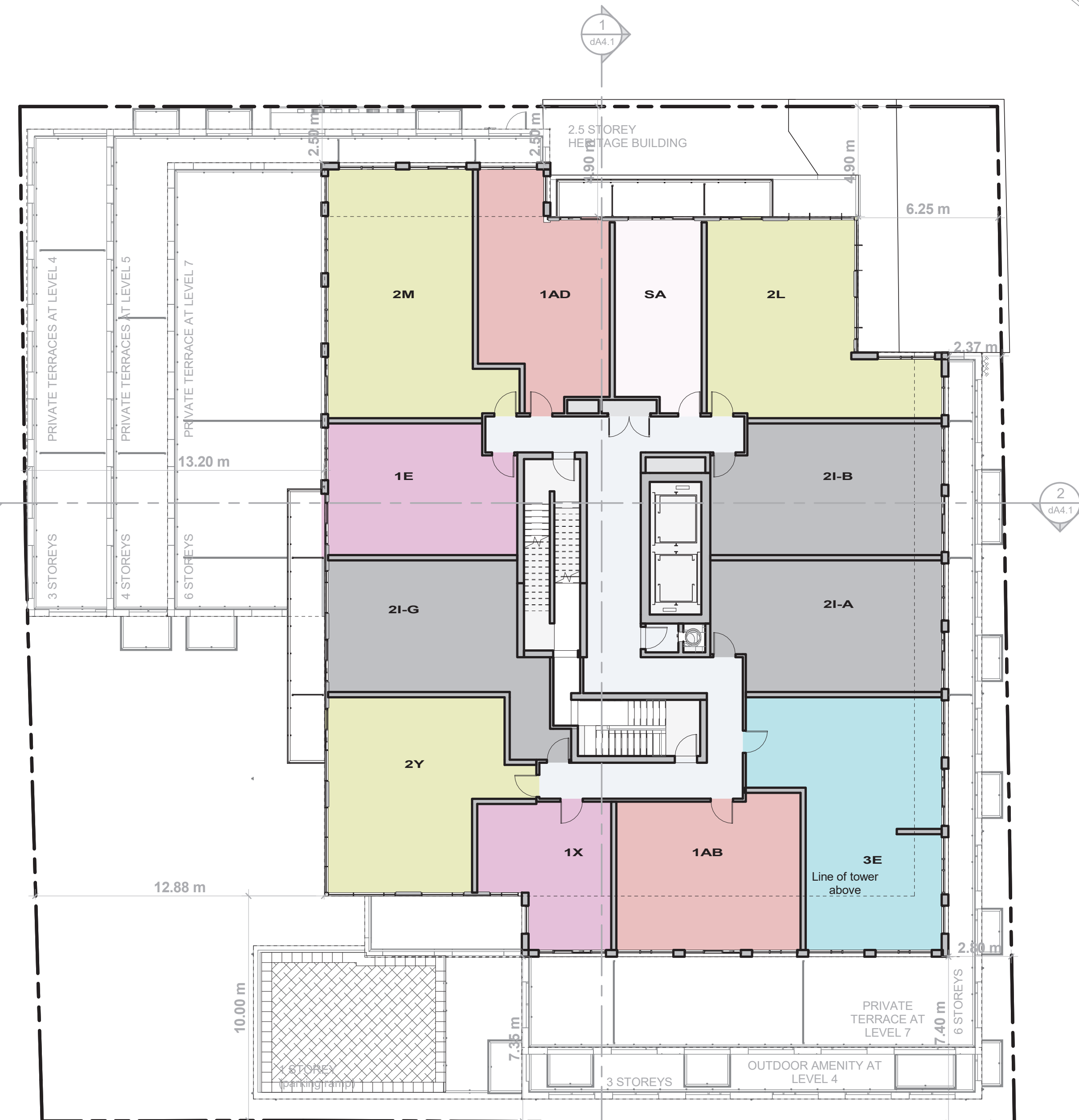
152-164 Bathurst Street &
623-627 Richmond Street, Toronto
Proposed Residential Development

Drawing Title:
Floor Plan - Levels 9 & 10-17

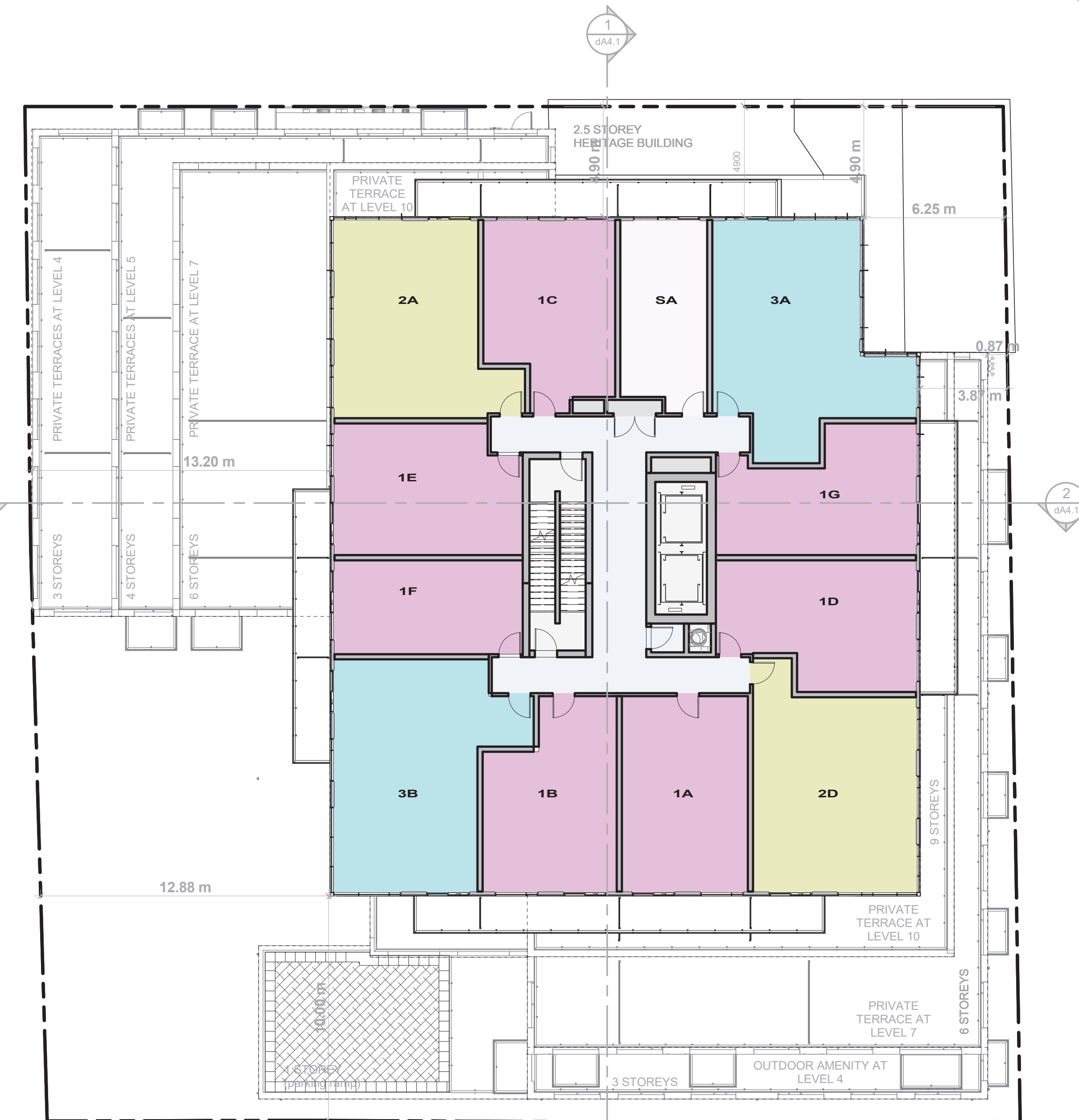
Scale:
1 : 150
Drawn by:
S.V.
Checked by:
R.P.
Project No.:
20-018
Date:
April 15, 2022
Drawing No.:



dA2.5



Floor plan level 9 **1**
1 : 150 dA2.5



Floor Plan - Levels 10-17 **2**
1 : 150 dA2.5

Appendix B: Small Car Review

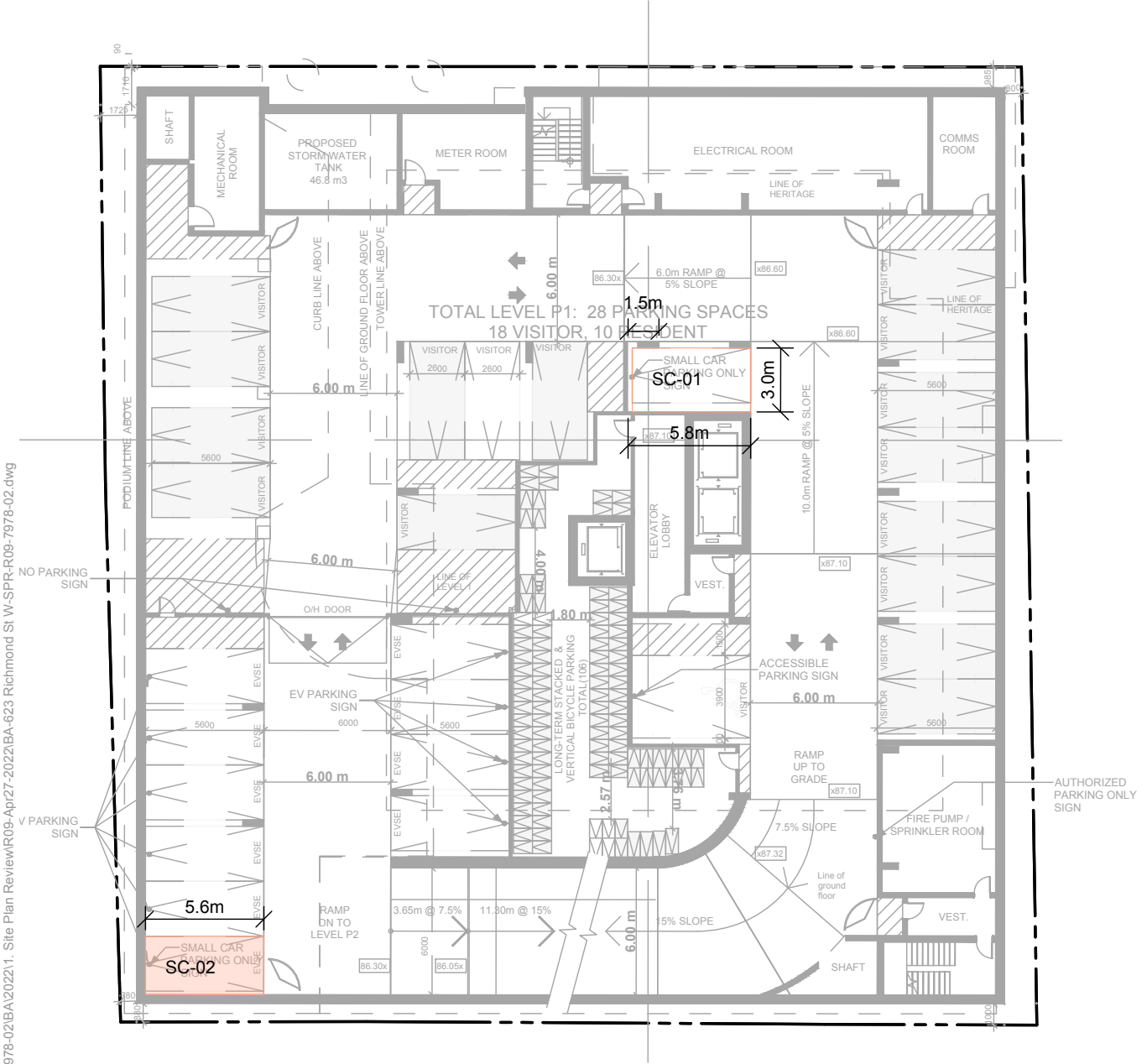


LEGEND:

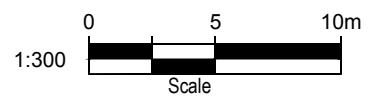
OB # ONE-SIDED OBSTRUCTED SPACE


P1 SMALL CAR COUNT

TOTAL = 2 SPACE



Date Plotted: April 27, 2022. Filename: J:\1978-02\BA\2022\1. Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-09-7978-02.dwg



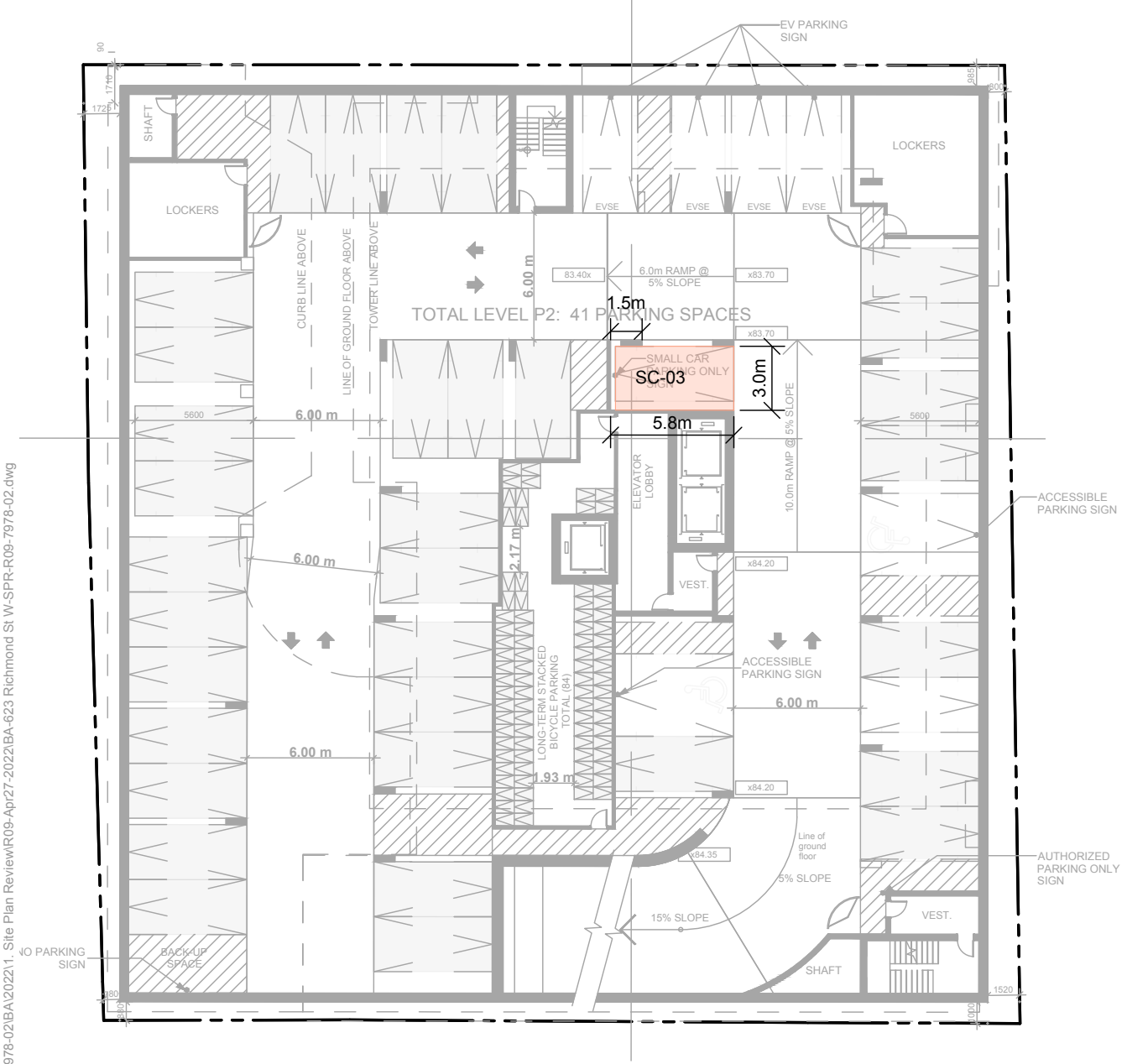
	623 RICHMOND STREET WEST Small Car Review P1 Level	Project: 623 Richmond St W
		Project No. 7978-02
		Date: April 5, 2021
		Revised: April 27, 2022
		Drawing No. SC-01

LEGEND:

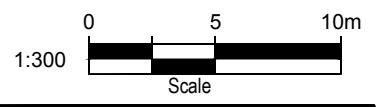
OB # ONE-SIDED OBSTRUCTED SPACE


P2 SMALL CAR COUNT

TOTAL = 1 SPACE



Date Plotted: April 27, 2022. Filename: J:\7978-02\BA\2022\1. Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-09-7978-02.dwg

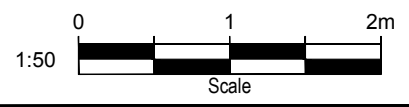
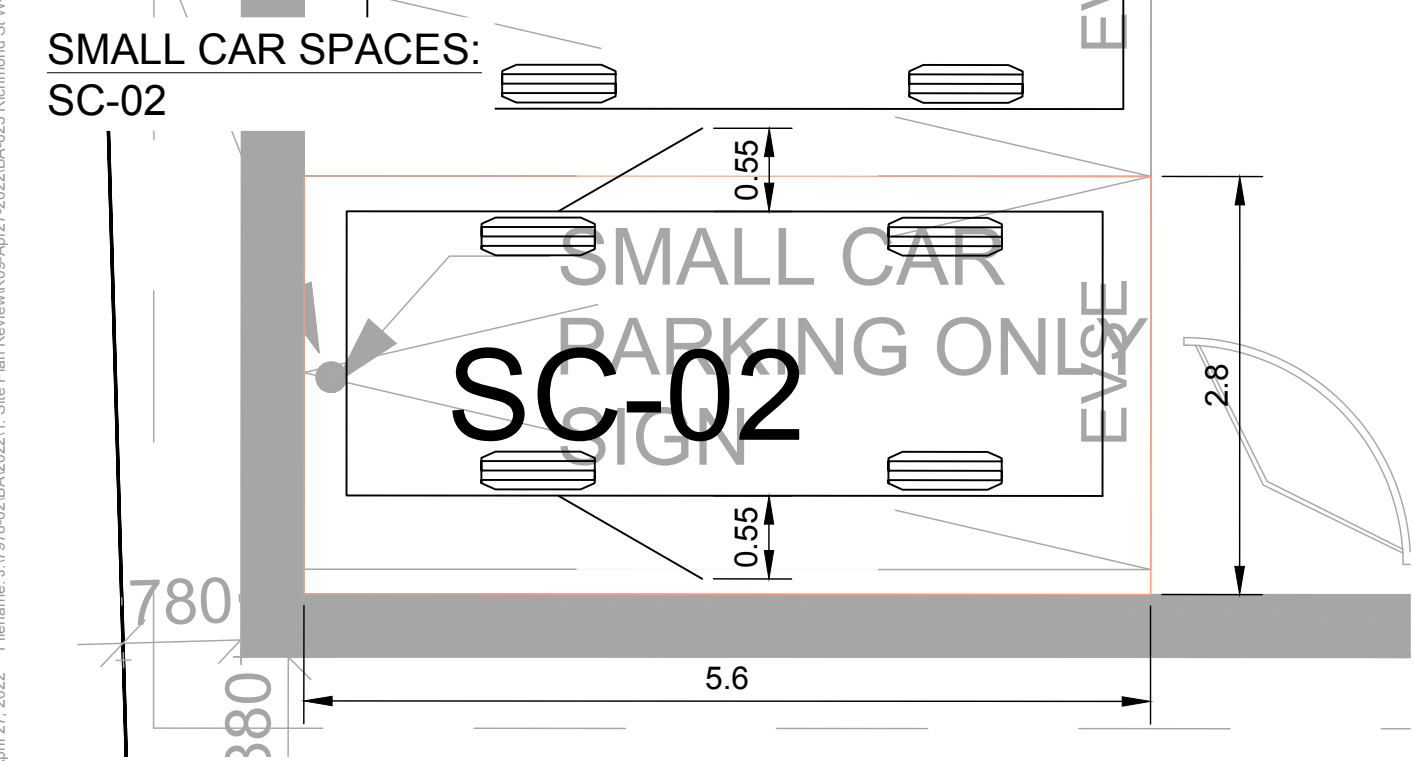
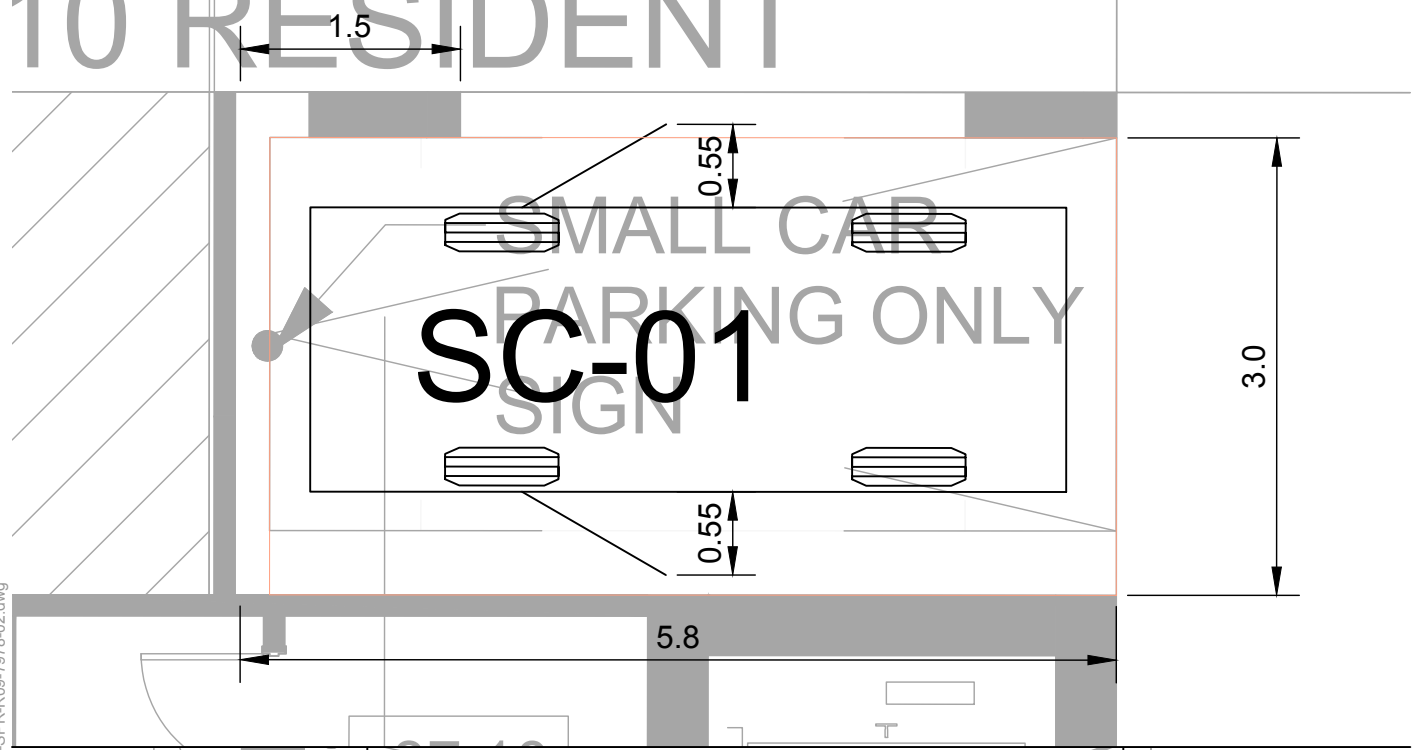


	623 RICHMOND STREET WEST Small Car Review P2 Level	Project: 623 Richmond St W
		Project No. 7978-02
		Date: April 5, 2021
		Revised: April 27, 2022
		Drawing No. SC-02


PARKING SPACES

SMALL CAR SPACES: SC-01, SC-03

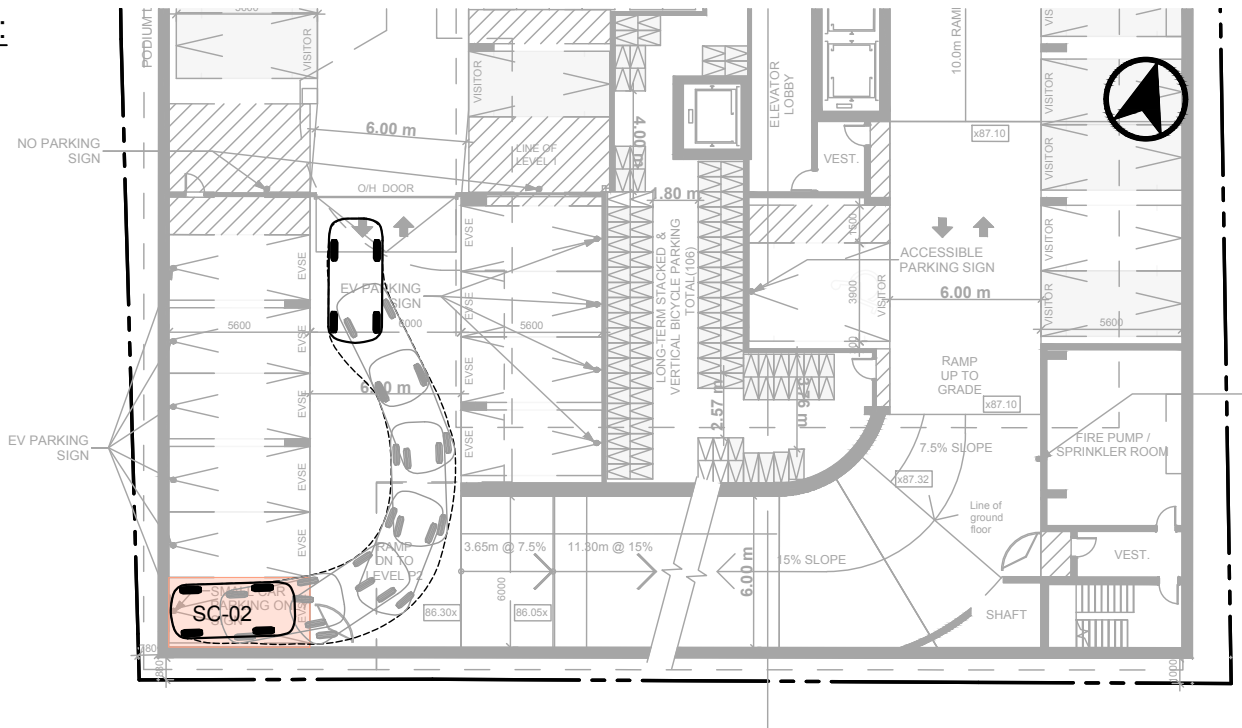
10 RESIDENT



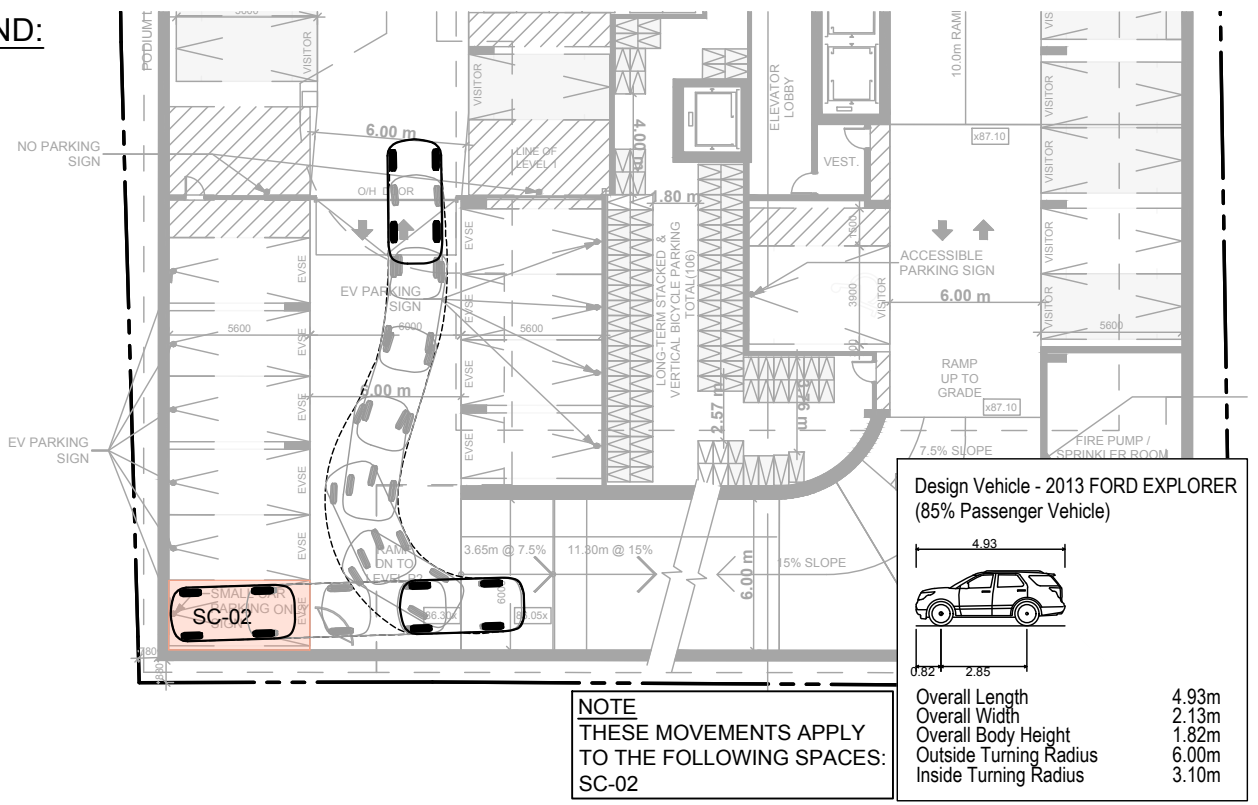
Date Plotted: April 27, 2022 File: J:\7978-02\BA\2022\11_Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-09-7978-02.dwg

	623 RICHMOND STREET WEST Small Car Review Door Clearance Diagram	Project: 623 Richmond St W Project No. 7978-02 Date: April 5, 2021 Revised: April 27, 2022
		Drawing No. SC-03

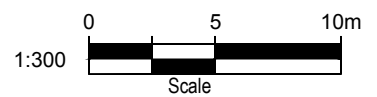
INBOUND:



OUTBOUND:



NOTE
 THESE MOVEMENTS APPLY TO THE FOLLOWING SPACES:
 SC-02



Date Plotted: April 27, 2022 File: J:\1978-02\BA\2022\11_Site Plan Review\R09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg

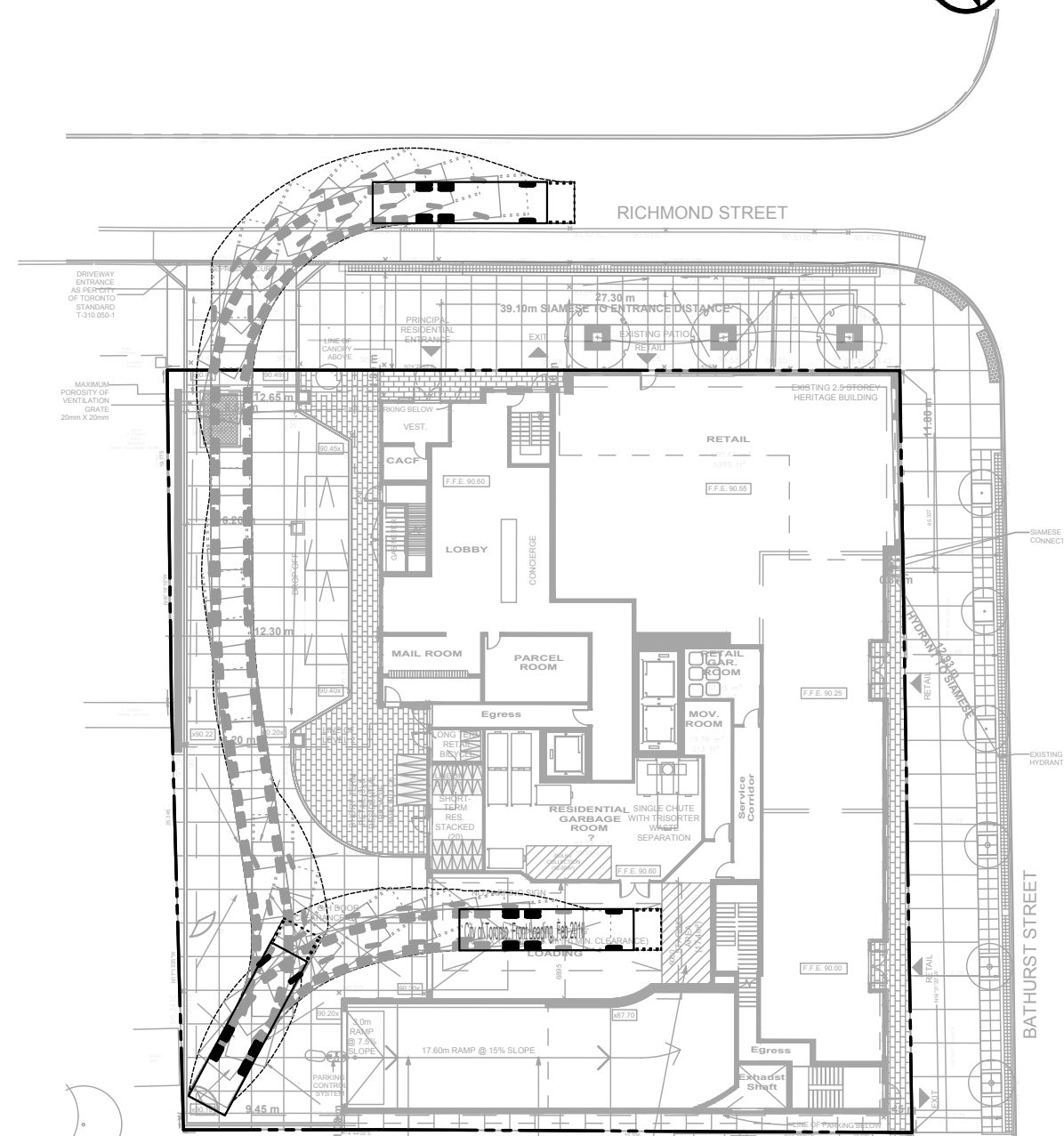
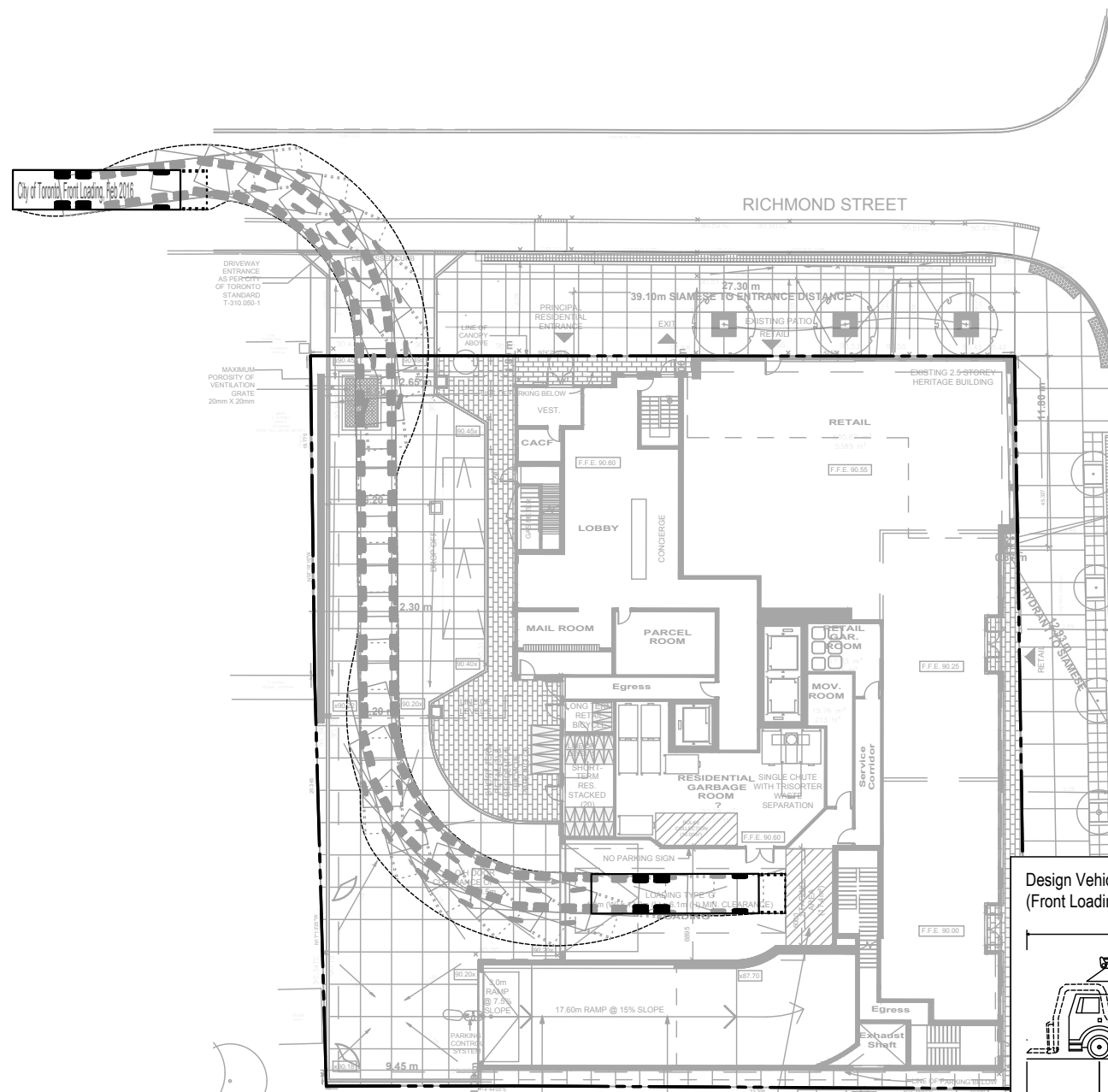
	<p align="center">623 RICHMOND STREET WEST Small Car Review Sample Vehicle Manoeuvring Diagram Space SC-02</p>	Project: 623 Richmond St W Project No. 7978-02 Date: April 5, 2021 Revised: April 27, 2022
		Drawing No. SC-05

Appendix C: Vehicular Manoeuvring Diagrams



INBOUND:

OUTBOUND:



**Design Vehicle - CITY OF TORONTO
(Front Loading Refuse Collection Vehicle)**

Overall Length (Forks Down)	12.00m
Overall Length (Forks Up)	10.00m*
Overall Width	2.45m
Overall Body Height	4.10m
Outside Turning Radius	14.00m
Inside Turning Radius	9.50m

(Dimensions as per City of Toronto Requirements for Garbage, Recycling and Organics Collection Services for New Developments and Redevelopments, May 2012)

* Field measured by BA Group, Aug. 8/11

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE. THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE 'G' LOADING SPACE ON DIFFERENT DAYS FROM THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE 'G' LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY"

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2% SLOPE.

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE. THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE 'G' LOADING SPACE ON DIFFERENT DAYS FROM THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE 'G' LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY"

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2% SLOPE.

Date Plotted: April 27, 2022 File name: J:\1978-02\BA\202211_Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg



**623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
GROUND FLOOR - TYPE 'G' SPACE
CITY OF TORONTO FRONT LOADING GARBAGE TRUCK**

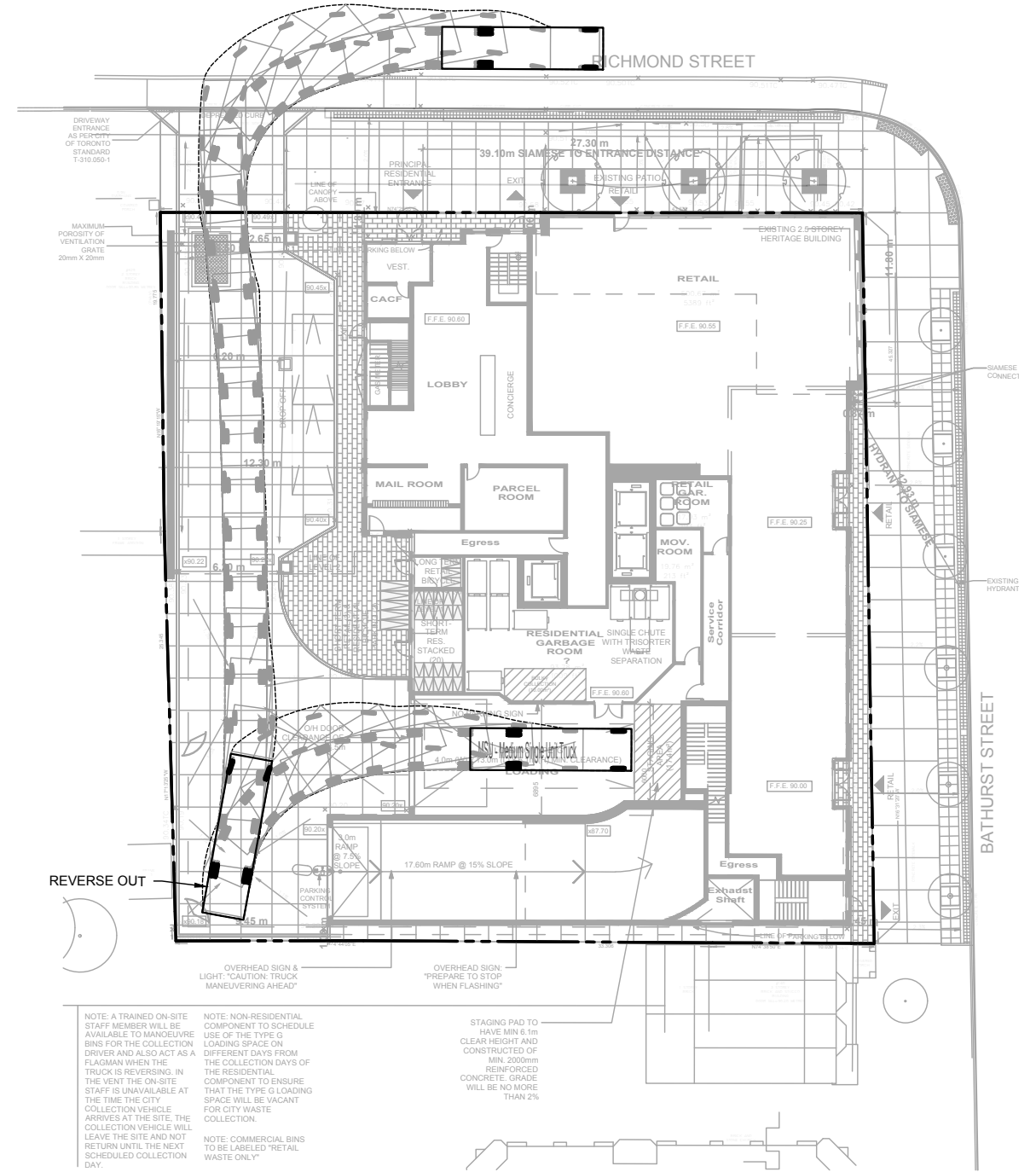
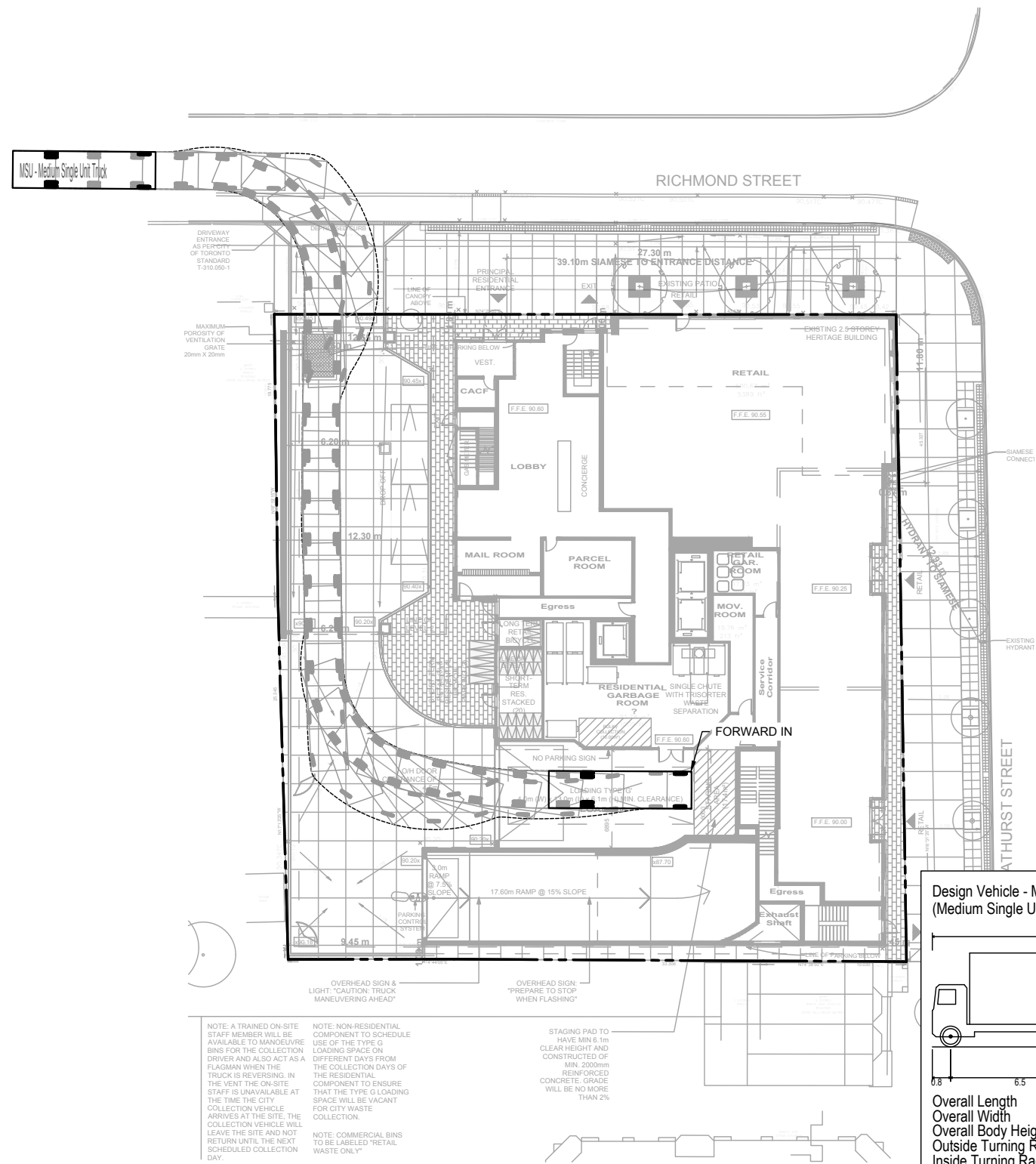
Project: 623 Richmond St W
Project No. 7978-02
Date: April 5, 2021
Revised: April 27, 2022



Drawing No. **VMD-01**

INBOUND:

OUTBOUND:



Date Plotted: April 27, 2022 File name: J:\1978-02\BA\202211 - Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg

**623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
GROUND FLOOR - TYPE 'G' SPACE
TAC MEDIUM SINGLE UNIT (MSU) TRUCK**

Project: 623 Richmond St W
Project No. 7978-02
Date: April 5, 2021
Revised: April 27, 2022

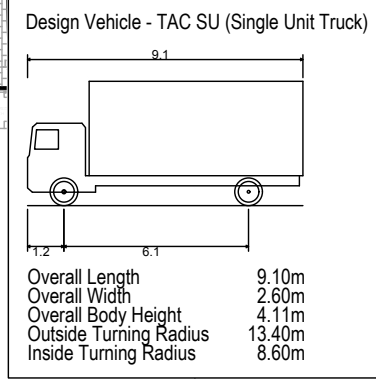
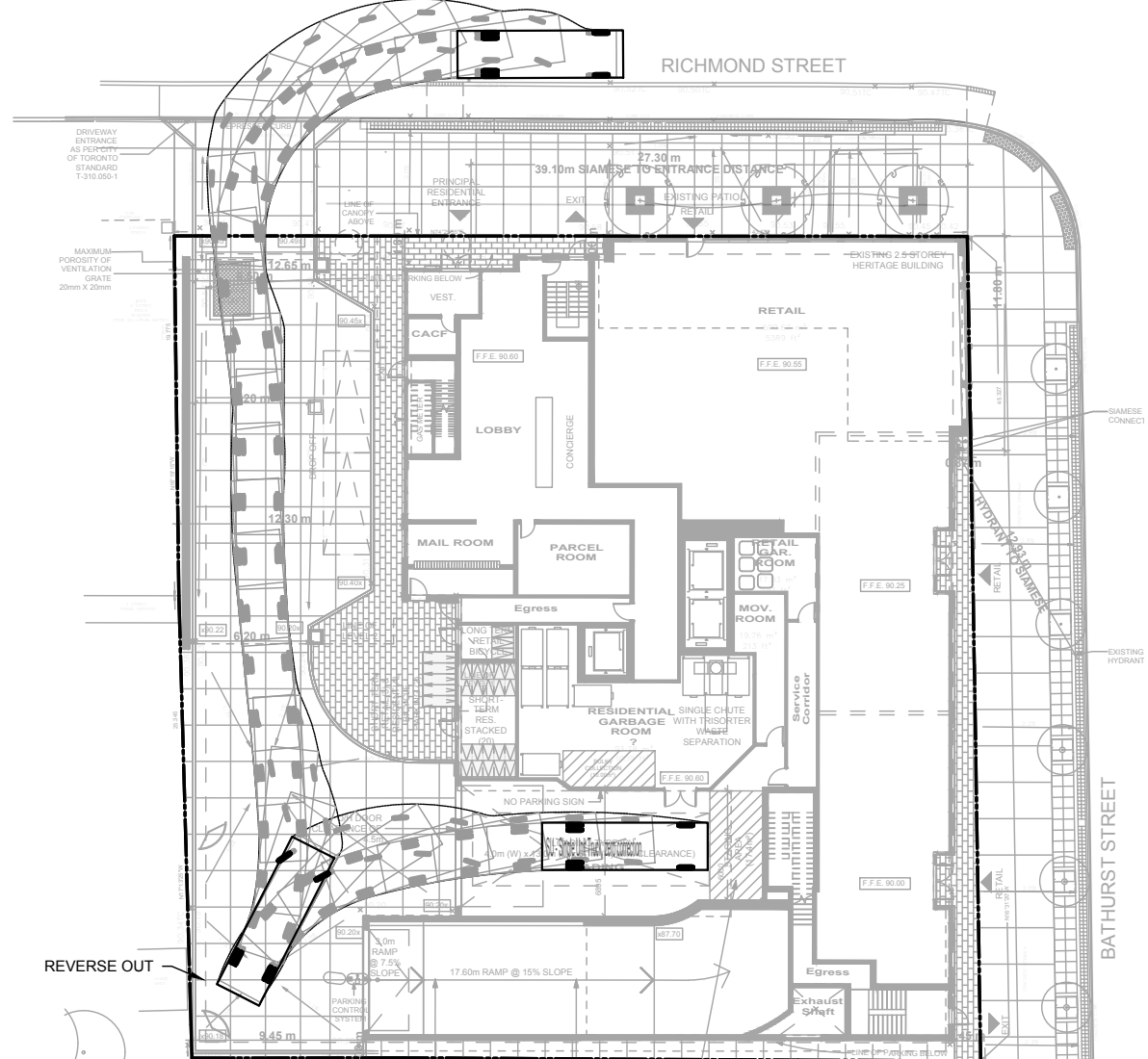
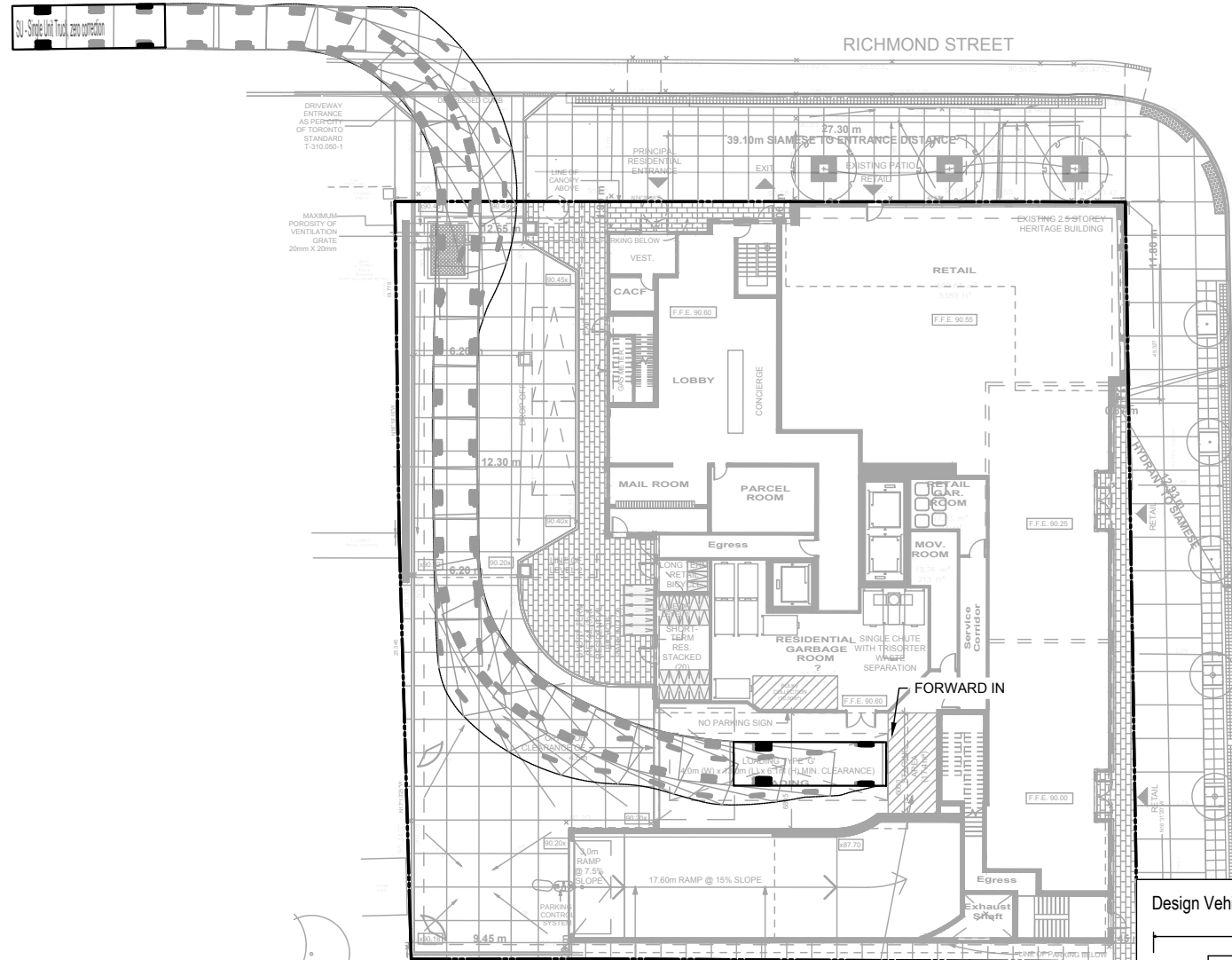


Drawing No. **VMD-02**



INBOUND:

OUTBOUND:



NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE. THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE G LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY"

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE. THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE G LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY"

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%



**623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
GROUND FLOOR - TYPE 'G' SPACE
TAC SINGLE UNIT (SU) TRUCK**

Project: 623 Richmond St W
Project No. 7978-02
Date: April 5, 2021
Revised: April 27, 2022

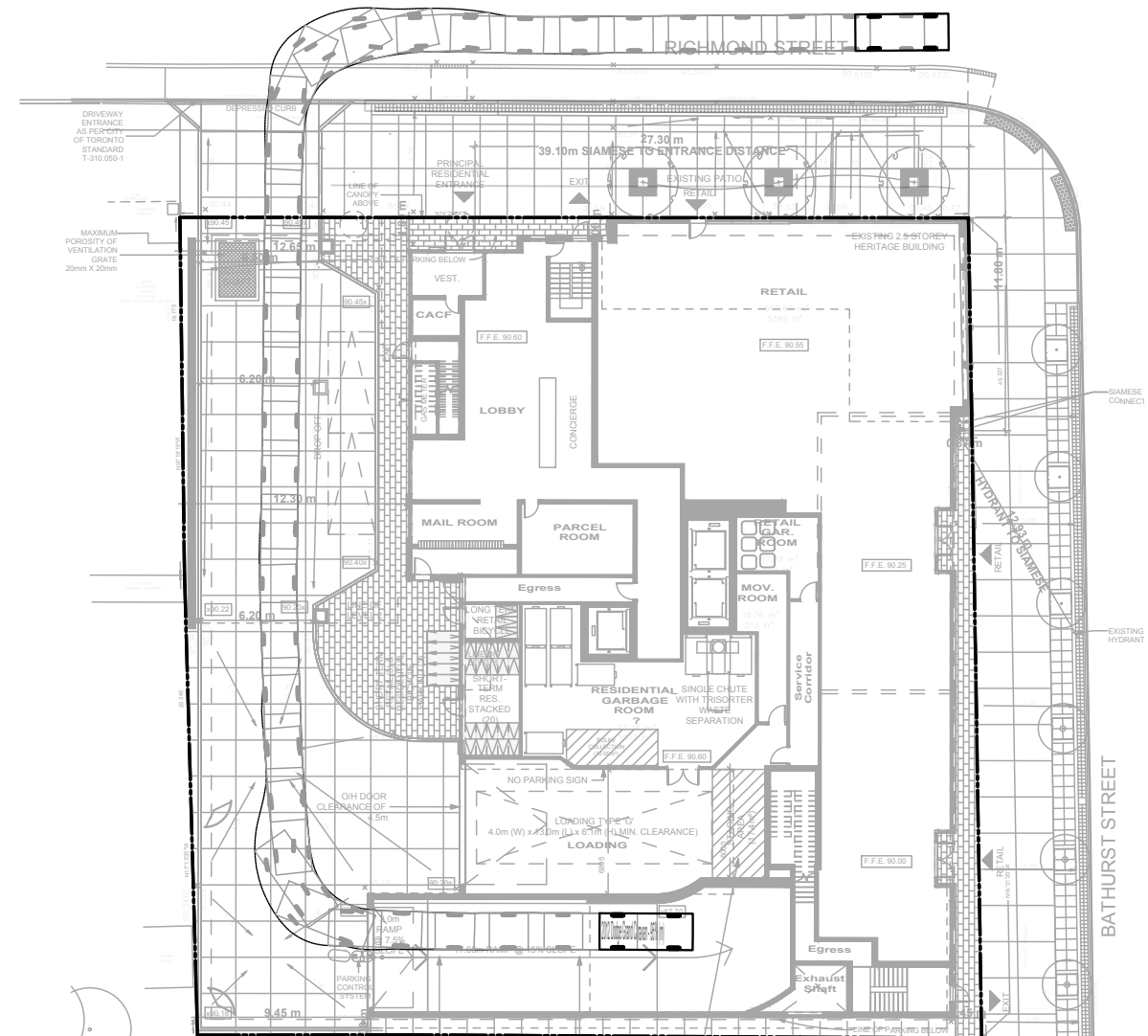
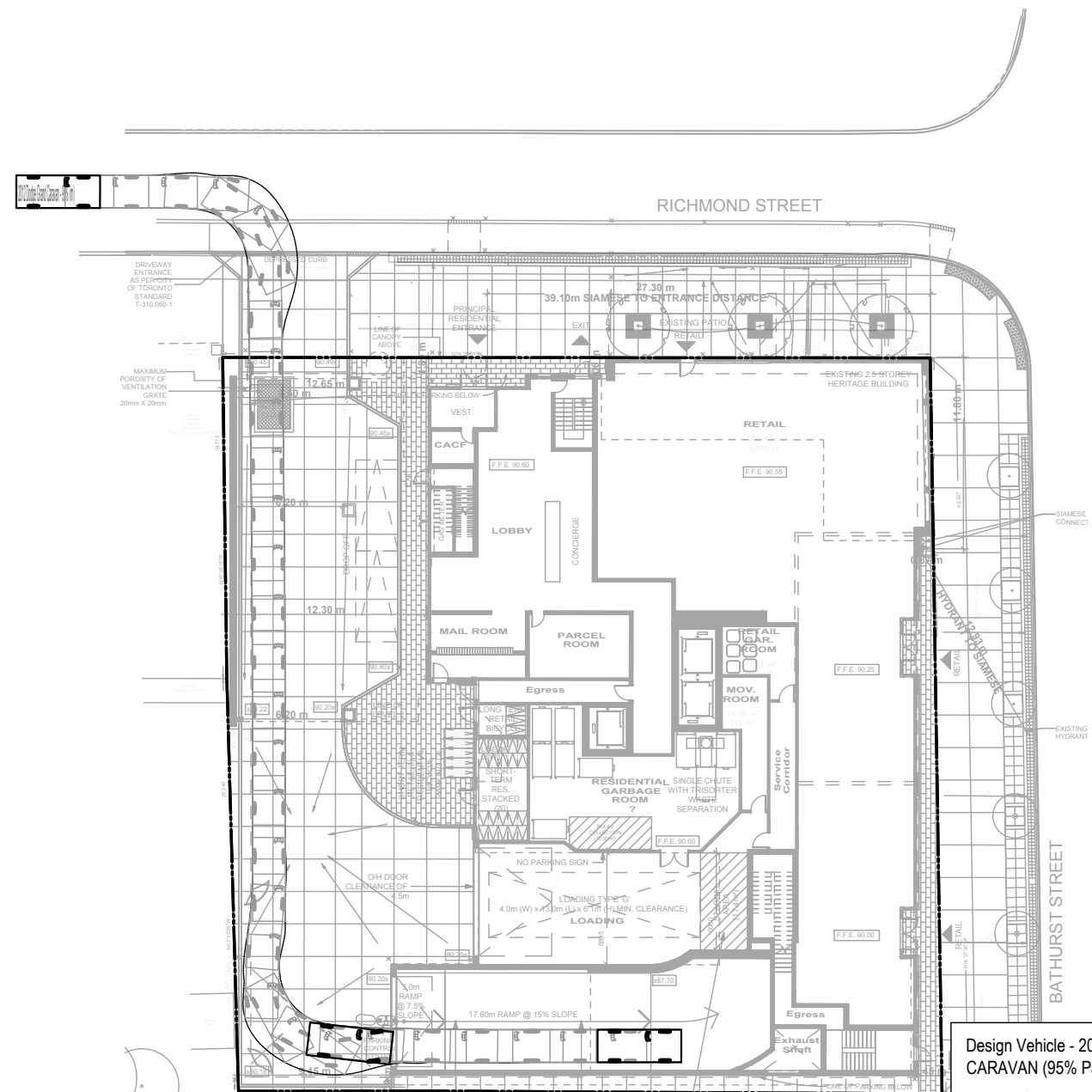
Scale: 1:400

Drawing No. **VMD-03**

Date Plotted: April 27, 2022 File Name: J:\1978-02\BA\202211 - Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg

INBOUND:

OUTBOUND:



Design Vehicle - 2012 DODGE GRAND CARAVAN (95% Passenger Vehicle)

Overall Length	5.15m
Overall Width	2.01m
Overall Body Height	1.74m
Outside Turning Radius	*6.50m
Inside Turning Radius	*3.40m

*Field Measurements By BA Group

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE. THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE G LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY."

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%.

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING IN THE VENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE. THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE G LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY."

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%.

623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
GROUND FLOOR - RAMP
DODGE GRAND CARAVAN



Project: 623 Richmond St W
 Project No. 7978-02
 Date: April 5, 2021
 Revised: April 27, 2022

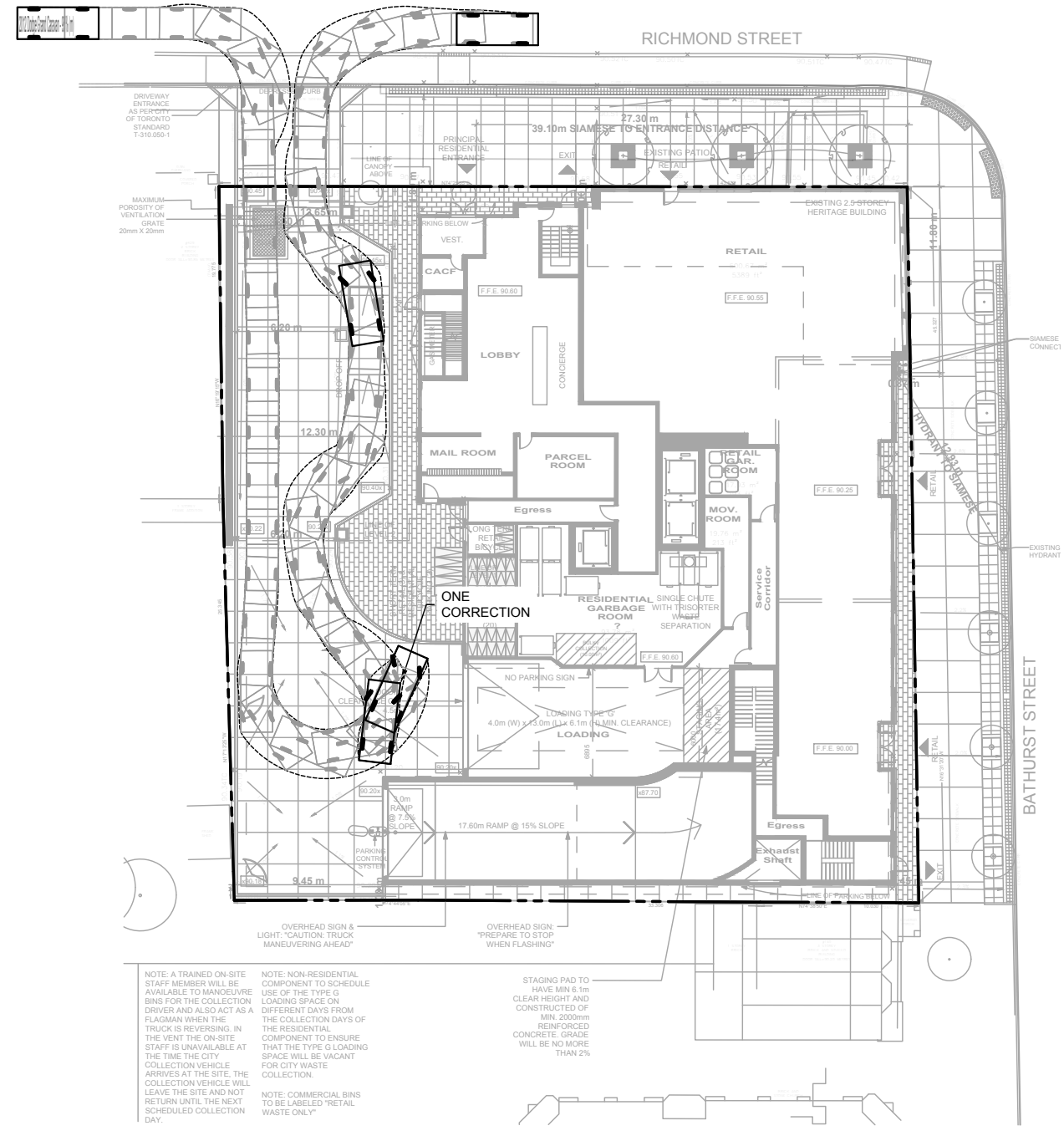
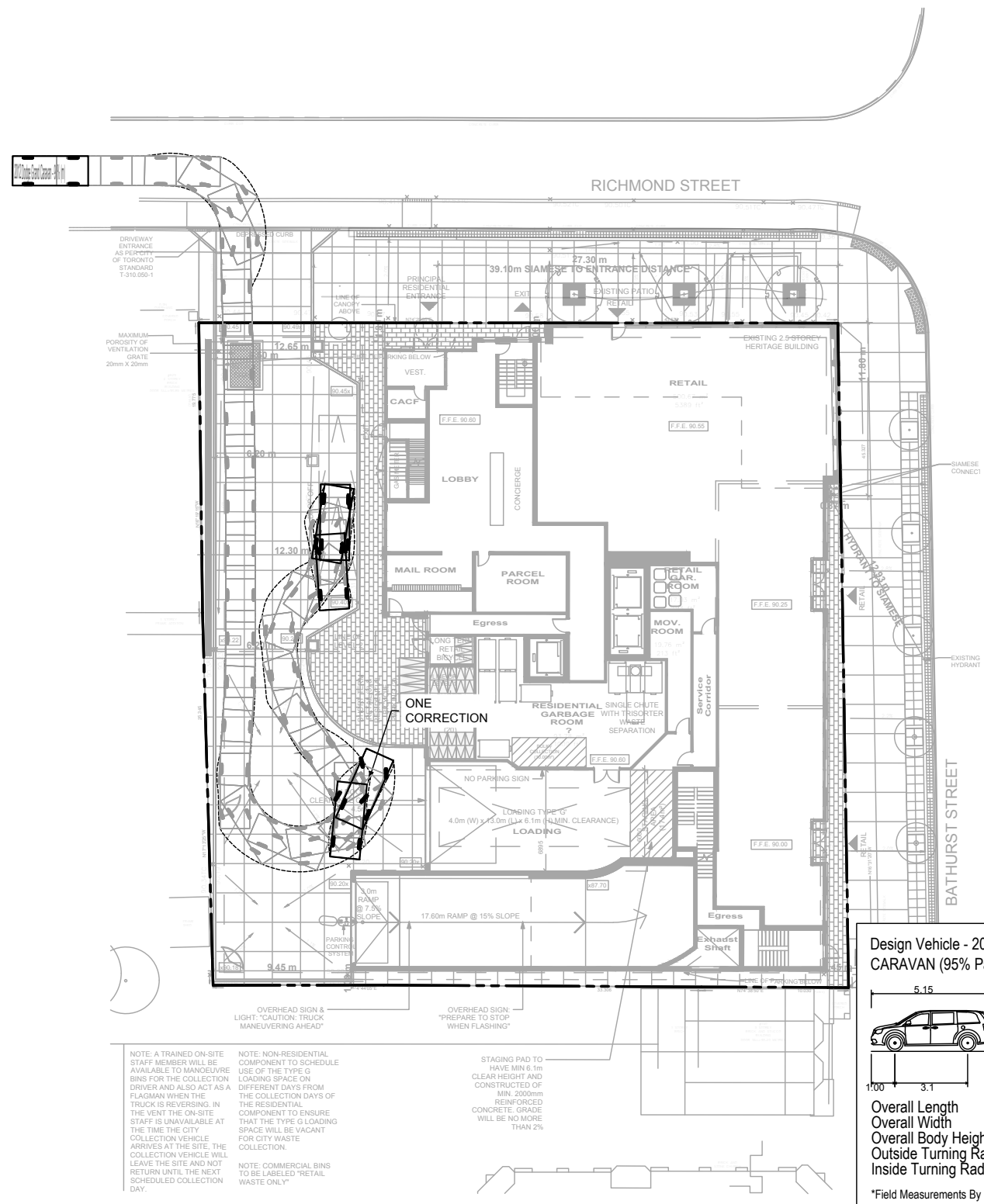
Scale 1:400

Drawing No. **VMD-04**

Date Plotted: April 27, 2022 File Name: J:\1978-02\BA\202211_Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg

PUDO SPACE #1:

PUDO SPACE #2:



Design Vehicle - 2012 DODGE GRAND CARAVAN (95% Passenger Vehicle)

Overall Length	5.15m
Overall Width	2.01m
Overall Body Height	1.74m
Outside Turning Radius	6.50m
Inside Turning Radius	3.40m

*Field Measurements By BA Group

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING. IN THE EVENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE, THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE G LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY."

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%.

NOTE: A TRAINED ON-SITE STAFF MEMBER WILL BE AVAILABLE TO MANOEUVRE BINS FOR THE COLLECTION DRIVER AND ALSO ACT AS A FLAGMAN WHEN THE TRUCK IS REVERSING. IN THE EVENT THE ON-SITE STAFF IS UNAVAILABLE AT THE TIME THE CITY COLLECTION VEHICLE ARRIVES AT THE SITE, THE COLLECTION VEHICLE WILL LEAVE THE SITE AND NOT RETURN UNTIL THE NEXT SCHEDULED COLLECTION DAY.

NOTE: NON-RESIDENTIAL COMPONENT TO SCHEDULE USE OF THE TYPE G LOADING SPACE ON DIFFERENT DAYS FROM THE COLLECTION DAYS OF THE RESIDENTIAL COMPONENT TO ENSURE THAT THE TYPE G LOADING SPACE WILL BE VACANT FOR CITY WASTE COLLECTION.

NOTE: COMMERCIAL BINS TO BE LABELED "RETAIL WASTE ONLY."

STAGING PAD TO HAVE MIN 8.1m CLEAR HEIGHT AND CONSTRUCTED OF MIN. 200mm REINFORCED CONCRETE. GRADE WILL BE NO MORE THAN 2%.



**623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
GROUND FLOOR - PUDO SPACES
DODGE GRAND CARAVAN**

Project: 623 Richmond St W
Project No. 7978-02
Date: April 5, 2021
Revised: April 27, 2022

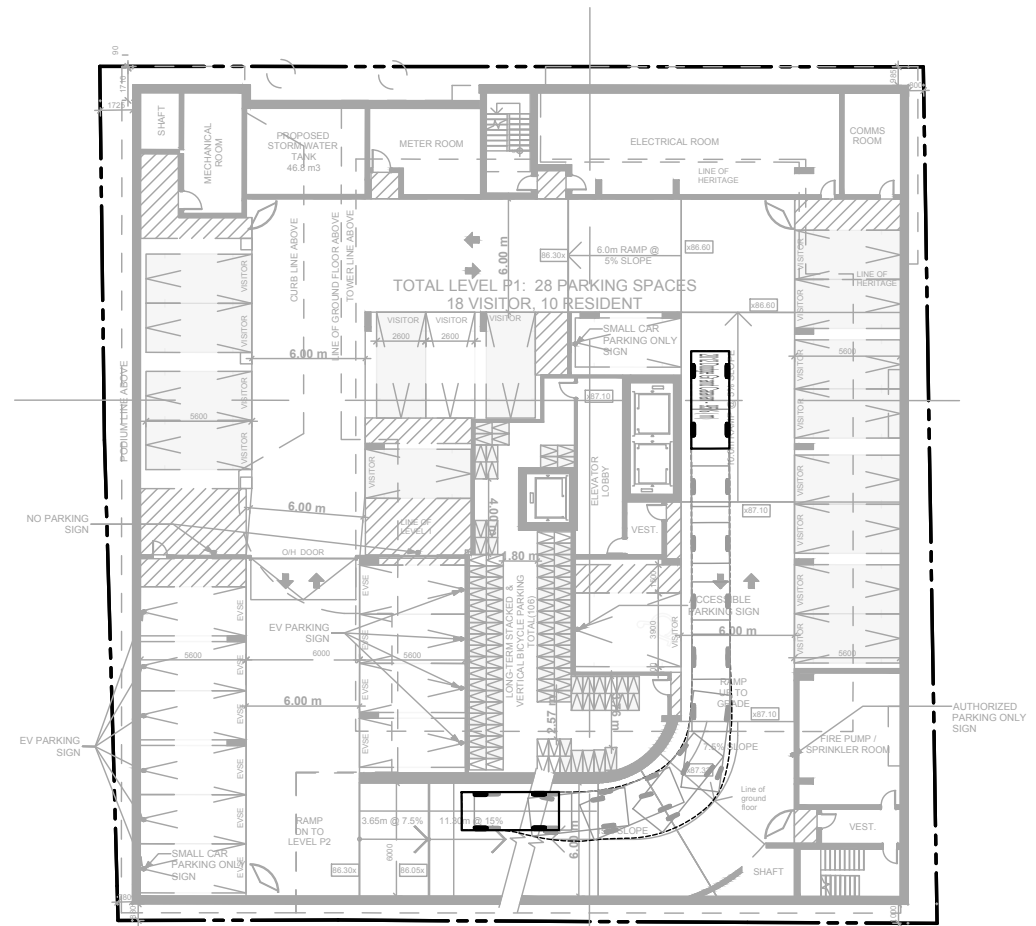
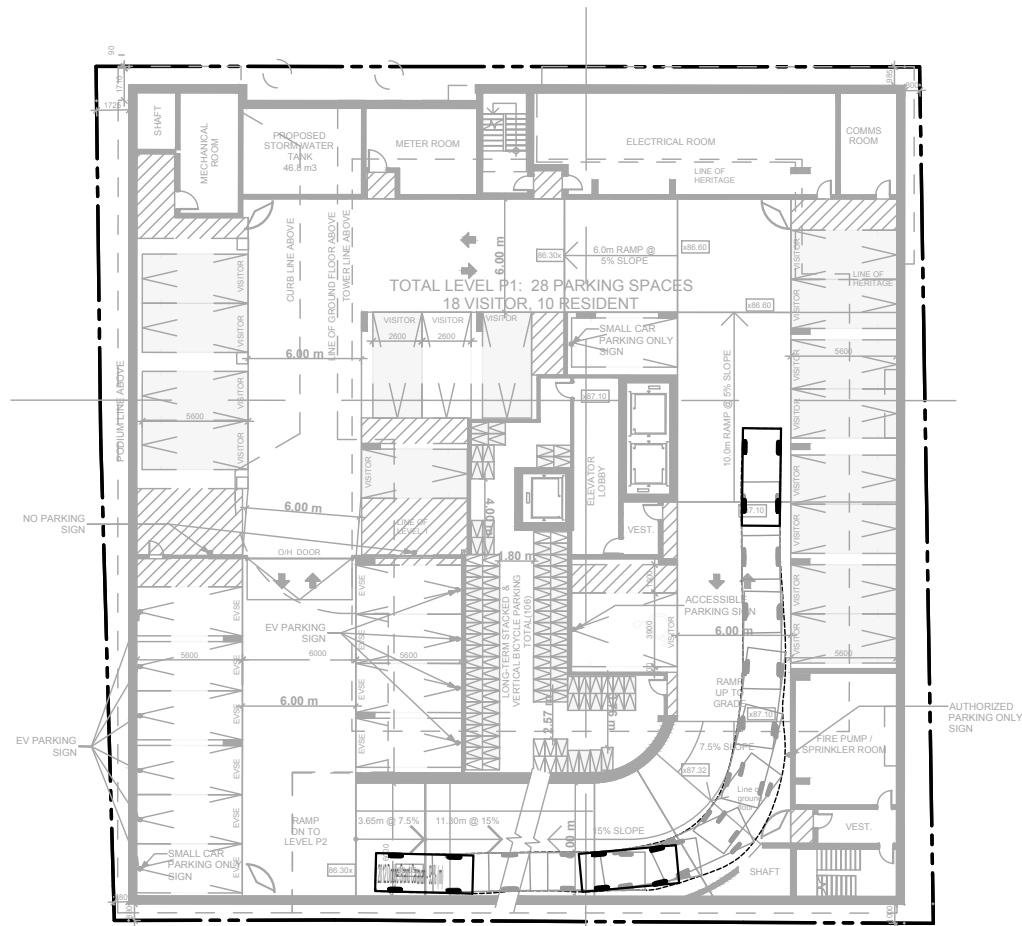
Scale 1:400

Drawing No. **VMD-05**

Date Plotted: April 27, 2022 File Name: J:\1978-02\BA\202211_Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg

INBOUND:

OUTBOUND:



Design Vehicle - 2012 DODGE GRAND CARAVAN (95% Passenger Vehicle)

Overall Length	5.15m
Overall Width	2.01m
Overall Body Height	1.74m
Outside Turning Radius	*6.50m
Inside Turning Radius	*3.40m

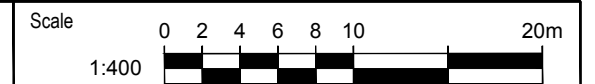
*Field Measurements By BA Group

Date Plotted: April 27, 2022 File Name: J:\1978-02\BA\20221 - Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg



623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
PARKING LEVEL 1 - GROUND FLOOR TO P1 LEVEL RAMP
2012 DODGE GRAND CARAVAN (95% PASSENGER VEHICLE)

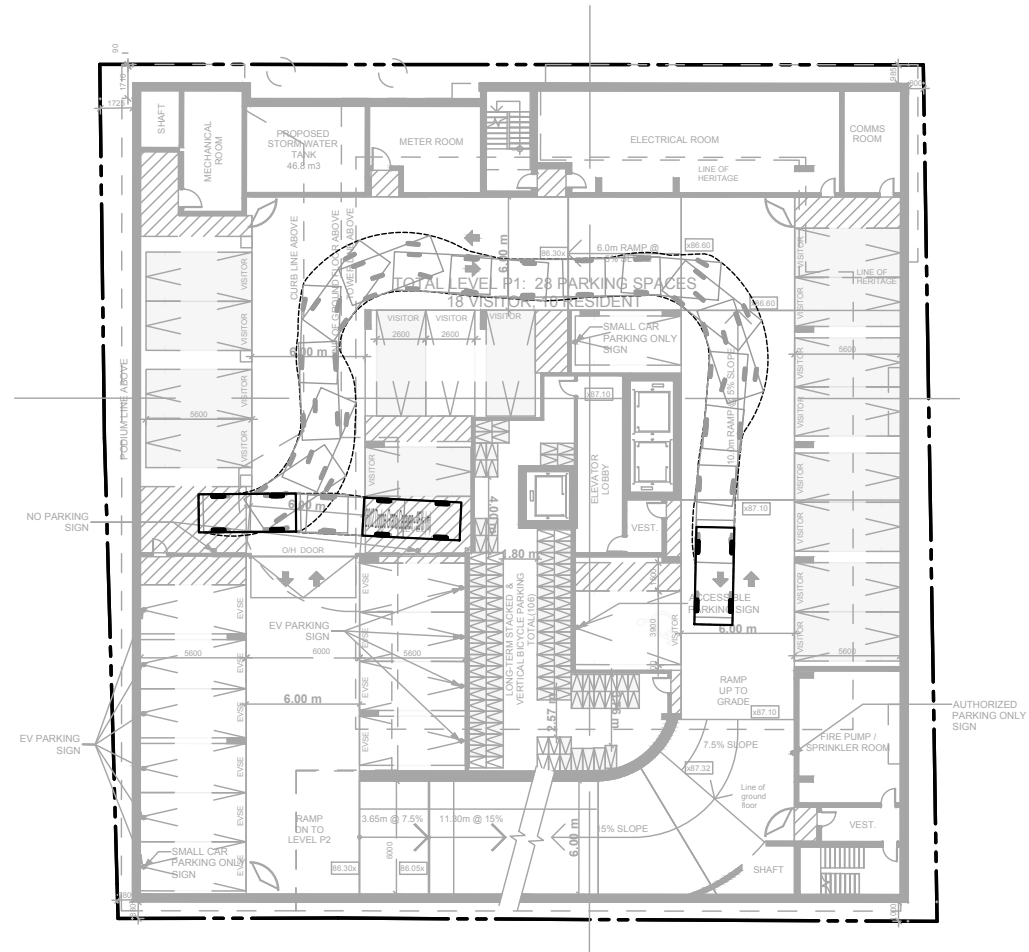
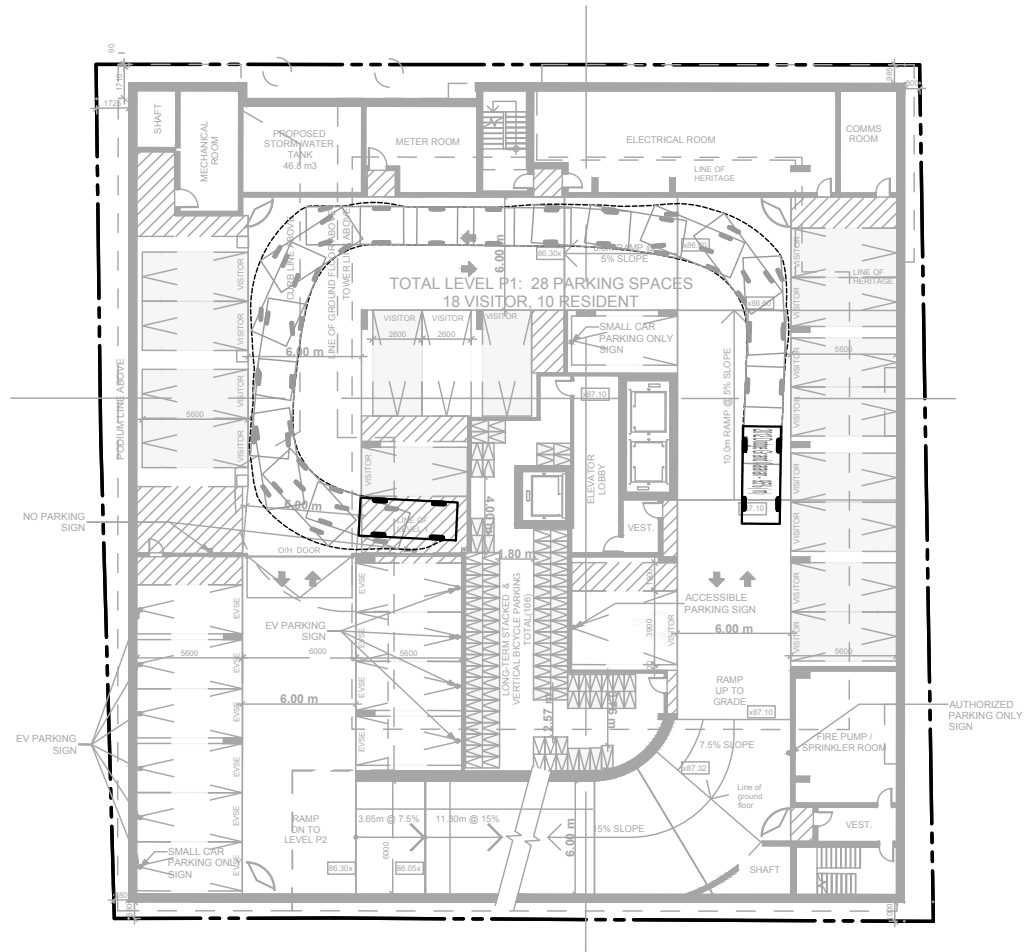
Project: 623 Richmond St W
 Project No. 7978-02
 Date: April 5, 2021
 Revised: April 27, 2022



Drawing No. **VMD-06**

INBOUND:

OUTBOUND:



Design Vehicle - 2012 DODGE GRAND CARAVAN (95% Passenger Vehicle)

Overall Length	5.15m
Overall Width	2.01m
Overall Body Height	1.74m
Outside Turning Radius	*6.50m
Inside Turning Radius	*3.40m

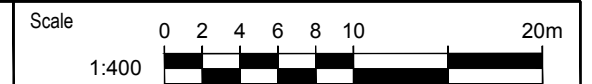
*Field Measurements By BA Group

Date Plotted: April 27, 2022 File Name: J:\1978-02\BA\20221 - Site Plan Review\09-Apr27-2022\BA-623 Richmond St W-SPR-R09-7978-02.dwg



623 RICHMOND STREET WEST
VEHICLE MANOEUVRING DIAGRAM
PARKING LEVEL 1 - VISITOR TURNAROUND AREA
2012 DODGE GRAND CARAVAN (95% PASSENGER VEHICLE)

Project: 623 Richmond St W
 Project No. 7978-02
 Date: April 5, 2021
 Revised: April 27, 2022

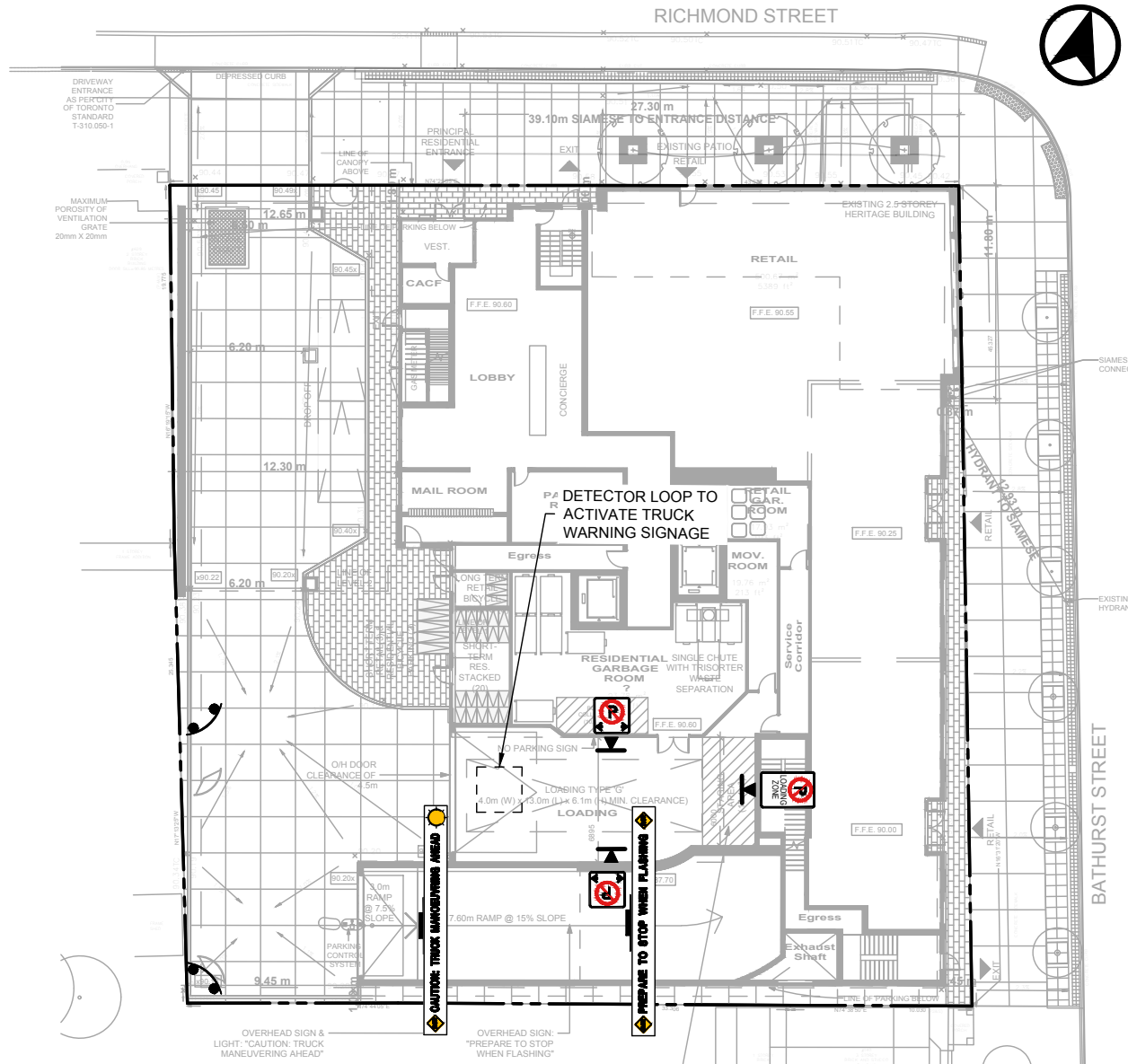


Drawing No. **VMD-07**

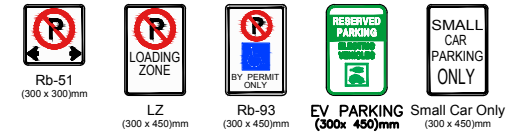
Appendix D: Signage and Pavement Marking Plans



Date Plotted: April 21, 2022 File Name: J:\19\78-UZ\BA\ZUZ\1 - Site Plan Review\K09-AP\Z\ - ZUZ\BA-023 Richmond St W-SR-K-K09-79\78-UZ.dwg



SIGN LEGEND



SIGN MOUNT LEGEND

ALL SIGNS ARE SHOWN IN APPROXIMATE LOCATIONS AND TO BE DETERMINED ON SITE. SIGNS MUST BE VISIBLE TO DRIVER AND NOT OBSTRUCTED BY LANDSCAPE.



PAVEMENT MARKING LEGEND

NOTE-ALL MARKINGS MUST CONFORM TO THE ONTARIO TRAFFIC MANUAL (OTM) BOOK 11



623 RICHMOND STREET WEST

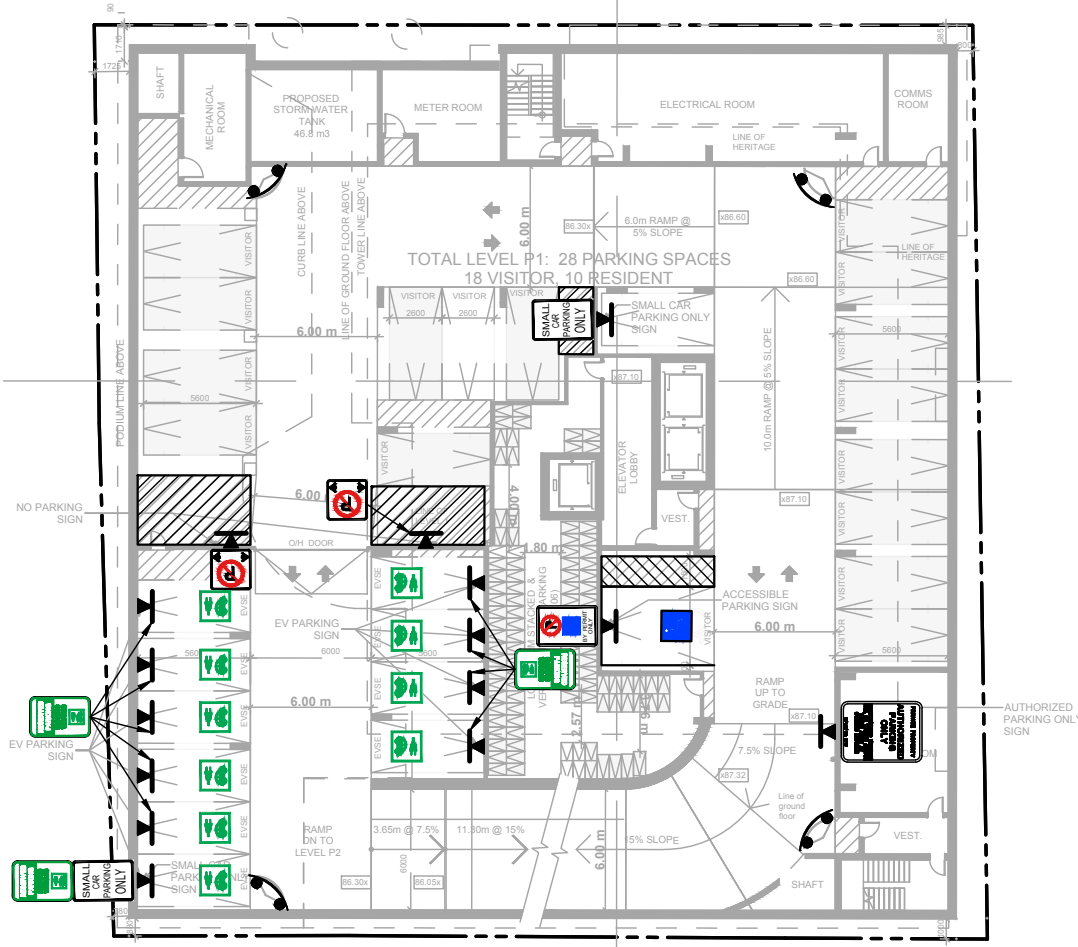
Pavement Marking and Signage Plan

Ground Floor

Project: 623 Richmond St W
 Project No. 7978-02
 Date: April 5, 2021
 Revised: April 27, 2022

Drawing No. **SN-01**

File Name: J:\19\78-UZ\BA\ZUZ\T1 - Site Plan Review\K09-APZ\F-ZUZ\BA-023 Richmond St W-SF-K-K09-79\78-UZ.dwg
 Date Plotted: April 21, 2022



SIGN LEGEND

- Rb-51 (300 x 300)mm
- LZ (300 x 450)mm
- Rb-93 (300 x 450)mm
- RESERVED PARKING (300 x 450)mm
- SMALL CAR PARKING ONLY (300 x 450)mm



AUTHORIZED P (450 x 600)mm



WARNING SIGN (300 x 300)mm



WARNING SIGN (300 x 300)mm

SIGN MOUNT LEGEND

ALL SIGNS ARE SHOWN IN APPROXIMATE LOCATIONS AND TO BE DETERMINED ON SITE. SIGNS MUST BE VISIBLE TO DRIVER AND NOT OBSTRUCTED BY LANDSCAPE.

- FLEXIBLE POST SIGN
- POST
- FLEXIBLE POST SIGN
- CONVEX MIRROR
- SUSPENDED SIGN

PAVEMENT MARKING LEGEND

NOTE-ALL MARKINGS MUST CONFORM TO THE ONTARIO TRAFFIC MANUAL (OTM) BOOK 11

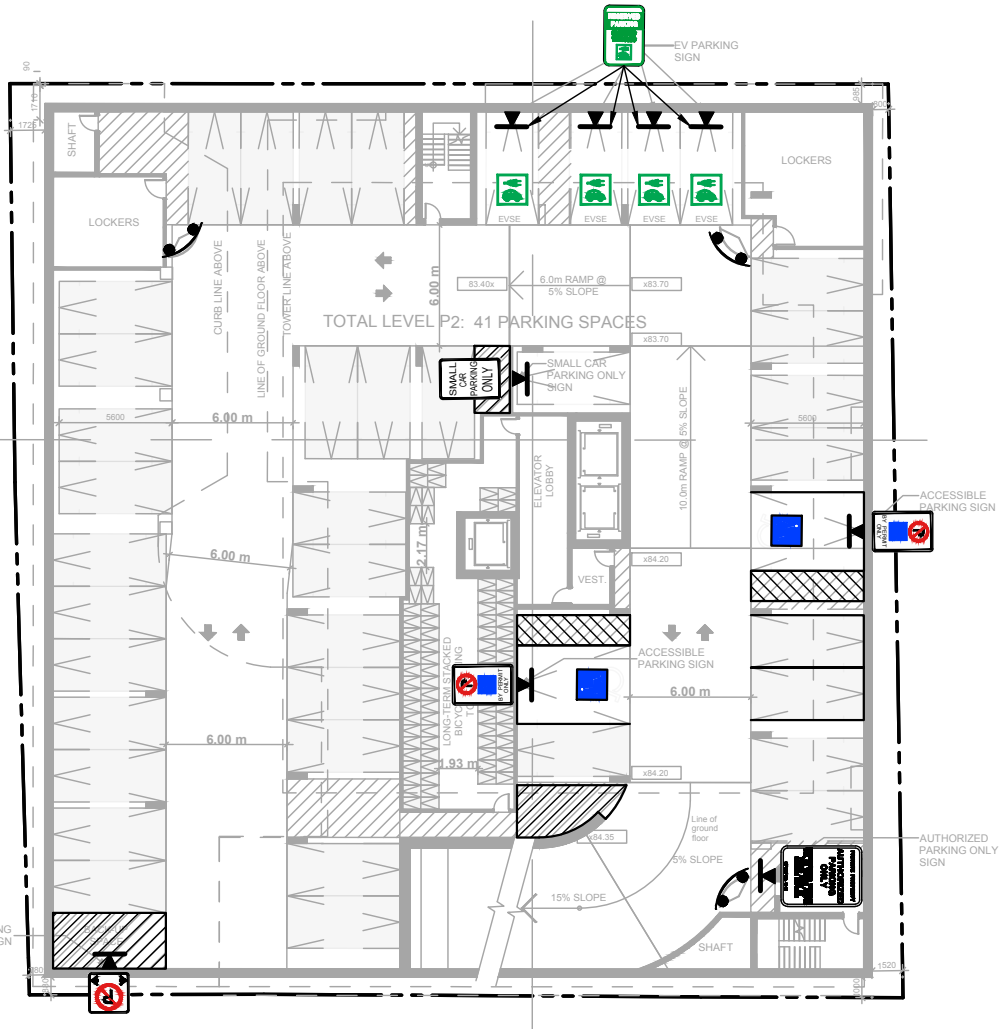
- YELLOW HATCHING (10cm WIDE YELLOW STRIPS)
- ELECTRIC VEHICLE PARKING - 1.5m x 1.5m
- INTERNATIONAL SYMBOL OF ACCESS - 1.5m x 1.5m
- BLUE BACKGROUND - 10cm BORDER - TRAFFIC WHITE - SYMBOL - TRAFFIC WHITE



623 RICHMOND STREET WEST
Pavement Marking and Signage Plan
P1 Level

Project:	623 Richmond St W
Project No.:	7978-02
Date:	April 5, 2021
Revised:	April 27, 2022
Drawing No.:	SN-02

File name: J:\1978-UZ\BA\ZUZ\1 - Site Plan Review\K09-APT2 / -ZUZ\BA-023 Richmond St W-SR-K-K09-7978-UZ.dwg
 Date Plotted: April 21, 2022



SIGN LEGEND

Rb-51 (300 x 300)mm	LZ (300 x 450)mm	Rb-93 (300 x 450)mm	EV PARKING (300 x 450)mm	Small Car PARKING ONLY (300 x 450)mm
AUTHORIZED P (450 x 600)mm				
PREPARE TO STOP WHEN FLASHING WARNING SIGN (100 x 300)mm				
CAUTION: TRUCK MANOEUVRING AHEAD WARNING SIGN (100 x 300)mm				

SIGN MOUNT LEGEND

ALL SIGNS ARE SHOWN IN APPROXIMATE LOCATIONS AND TO BE DETERMINED ON SITE. SIGNS MUST BE VISIBLE TO DRIVER AND NOT OBSTRUCTED BY LANDSCAPE.

	FLEXABLE POST SIGN		POST
	FLEXABLE POST SIGN		CONVEX MIRROR
	SUSPENDED SIGN		

PAVEMENT MARKING LEGEND

NOTE-ALL MARKINGS MUST CONFORM TO THE ONTARIO TRAFFIC MANUAL (OTM) BOOK 11

	YELLOW HATCHING (10cm WIDE YELLOW STRIPS)
	ELECTRIC VEHICLE PARKING - 1.5m x 1.5m
	INTERNATIONAL SYMBOL OF ACCESS - 1.5m x 1.5m - 10cm BORDER - TRAFFIC WHITE - SYMBOL - TRAFFIC WHITE - BLUE BACKGROUND



623 RICHMOND STREET WEST
Pavement Marking and Signage Plan
P2 Level

Project:	623 Richmond St W
Project No.:	7978-02
Date:	April 5, 2021
Revised:	April 27, 2022
Drawing No.:	SN-03