

100-Day Working Group Summary Background and Analysis

On 21 November 2014, the Board of the National Capital Commission (NCC) announced that it had concluded that the partially buried “Richmond Underground” option in the Sir John A. Macdonald Parkway, put forward by the City for the environmental assessment study, could not meet the two conditions set by the NCC’s Board of Directors:

- unimpeded continuous access to the corridor lands and Ottawa River shorelines, and
- minimal visual impact on the corridor landscape quality and the user experience of this corridor.

On 27 November 2014, Mayor Watson and then Minister responsible for the NCC, John Baird, met and directed that a mutually acceptable solution for the future Confederation Line west extension alignment between Dominion and Cleary stations be identified within 100 days. A Working Group was struck composed of NCC Board Members, City Councillors and executive staff from both organizations.

The 100-Day Working Group evaluation process included:

- Identification of key principles for any solution, including:
 - For the NCC: unimpeded, continuous access to corridor lands and Ottawa River shoreline, and minimal visual impact on the landscape quality and experience
 - For the City: protection of Byron Linear Park and Rochester Field, and respect for the Stage 2 affordability envelope
- Identification and evaluation of two new alignment options between Cleary and Dominion stations, including:
 - Along the Sir John A. Macdonald Parkway
 - Through the Rochester Field-Richmond/Byron corridor
- Evaluation of both options against a number of criteria, including:
 - Transit operations
 - Cost and Constructability
 - Operations and Maintenance
 - Community Impacts and Benefits
 - Ridership and Station Functionality
 - Environment and Greenspace

On 6 March 2015, the 100-Day Working Group announced an agreement in principle for a solution that is outlined in a Memorandum of Understanding. The 100-Day Solution recommends running a portion of the Confederation Line West extension under rebuilt and realigned lanes of the Sir John A. Macdonald Parkway between Dominion and Cleary stations. The resulting solution and Memorandum of Understanding was posted, for public information, by the NCC and the City of Ottawa. It is attached as a separate document to the Stage 2 Light Rail Transit (LRT) Environmental Assessment and Functional Design report.

The 100-Day Solution meets the NCC's criteria, while protecting the Byron Linear Park and Rochester Field, and meeting the City of Ottawa's affordability envelope (Figure 1). The 100-Day Solution also:

- Maximizes greenspace by re-instating existing parkway lanes of traffic closer together, with the LRT tunnel stacked beneath
- Advances the creation of a waterfront linear park on the Sir John A. Macdonald Parkway corridor.
- Protects the trees and landscaped buffer between the Parkway and adjacent urban area
- Enhances and creates new pathways and two new segregated pathway crossings under Sir John A. Macdonald Parkway
- Reduces annual bus trips on the Sir John A. Macdonald Parkway by over 450,000
- Increases useable shoreline park space by 38 per cent (equivalent to almost 40 football fields)

On 30 March 2015 City of Ottawa followed up the announcement of the 100-Day Solution with a Public Open House, at City Hall. At the Open House, the public had the opportunity to review and provide feedback on the preferred solution.

On 22 April 2015, the NCC Board approved the Memorandum of Understanding approving the jointly developed solution for the portion of the alignment between Dominion and Cleary Stations.

In follow-up to the selection of the route along the Sir John A Macdonald Parkway Corridor, the study team under took a "sensitivity analysis" to compare and evaluate the two alternative corridors between Dominion and Cleary stations (Table 1). This analysis assessed the two corridors against the original evaluation criteria used to assess the alternative routes and corridors for the study. While the Richmond via Byron Corridor route identified by the working group scored the same as the previous evaluation of this

option, the 100-Day Solution route along the parkway corridor scored higher than the previously recommended route (Richmond Underground) and higher than all other alternative routes. A chart summarizing the scoring is below.

In conclusion:

The Rochester Field – Byron Linear Park option (R 14-B) has many strengths including:

- Less impact on sensitive receptors – especially the Unitarian Campus
- Track geometry is slightly better
- Less impact on local storm water management

The 100-Day Solution through the Parkway Corridor (R 12-A) has comparatively more:

- NCC Riverfront Park can be initiated and integrated with the construction of the LRT
- Cleary Station can be more easily integrated with future development, is closer to Unitarian Campus and provides better connection to NCC's Riverfront Park
- Has less impact on the Byron Linear Park as a shorter segment will be disturbed
- Has fewer archaeological impacts as the parkway portion is in river fill rather than in areas of known potential
- Avoids potential contamination along Richmond Road around Cleary
- Enclosed Cleary Station reduces permanent system footprint and visual impact
- Increased economies of scale as it bundles NCC waterfront linear park with construction restoration

While technical challenges exist for both routes, the 100-Day solution has further strengths:

- Has substantially less impact on existing infrastructure including:
 - West Nepean Sanitary Sewer
 - The major water main in the old railway corridor
 - Fewer roads are impacted
 - Shorter segment of the linear park is disturbed

Further benefits that were realized when the 100-Day Solution was evaluated included:

- Aligns with NCC objectives
 - LRT construction and site restoration will be a catalyst for the renewal of the Sir John A. Macdonald Parkway Waterfront Linear Park
 - Resolves outstanding Official Plan designation issues for Rochester Field by clarifying the major open space area

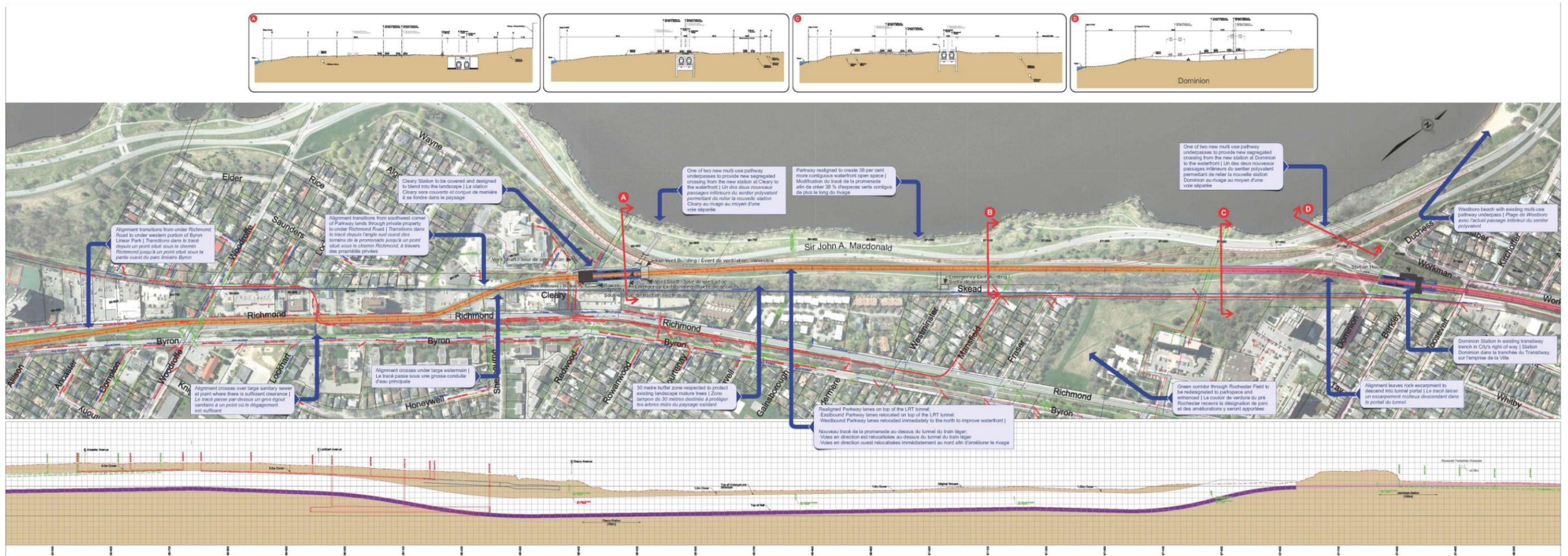


Figure 1: Illustration of the 100-Day Solution

Table 1: Comparison of the R-12-A (100-Day Solution) via the SJAM Parkway and the R-14-B (100-Day alternative) via Rochester Field and Byron Park against the Western LRT Evaluation Criteria

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Western LRT Evaluation Criteria		Score	Score
Promote Smart Growth: The project will stimulate opportunities for land use intensification and transit oriented development (TOD) on adjacent lands and will require transit service to existing uses. Associated criteria include:			
Transit-oriented development (TOD) opportunities	Inspire and encourage Transit Oriented Development (TOD) through enhanced connectivity to encourage and offer maximum potential.	3	3
City building opportunities	Supports City policies regarding intensification and community planning.	3	3
	Compliance with NCC Plans and policies	3	3.5
Integrated station development opportunities	Station locations in corridor provide for integrated station development opportunities.	2	3
Compatibility with Adjacent Communities: The project will be planned and designed to be an integral and compatible component of existing and planned communities that it traverses. Associated criteria include:			

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Integration of LRT with community	Ability of the facility and supporting infrastructure to link and unite adjacent communities rather than separate them, and to provide enhanced access to the River shoreline.	3	3.5
Other transportation networks	Minimizes operational impacts on other transportation networks.	3	4
	Facilitate and enhance interprovincial connectivity and continuity.	Not a Differentiator	Not a Differentiator
Business development	Not a differentiator in initial evaluation	Not a Differentiator	Not a Differentiator
Air quality, noise and vibration	Assessment of air quality based on existing air quality estimates and proximity to sensitive receptors.	2	1.5
Construction impacts	Accessibility/exposure to all land uses during construction.	2	2
Protect Historical, Cultural and Archaeological Resources: The project will be planned to be unobtrusive and respectful vis-a-vis the heritage, archaeological, cultural and visual elements of the study area. It will be compatible with and uphold the area's historical, cultural, archaeological and artistic characteristics.. Associated criteria include:			
Views, vistas and public open space	Effects on scenic entry points and the Ottawa River.	3	3.5
	Effects on public open space.	2.5	3

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Heritage conservation	Not a differentiator in initial evaluation		
Cultural landscapes	Impact on identified cultural landscape including ability to respect and preserve the national significance of the Parkway and its intrinsic value and Capital-defining elements, and opportunities for programming, interpretation and commemoration.	3	3
	Protect and distinguish symbolic character of the capital.	3.5	4
Archaeological resources	Impact on archaeological resources.	2	3
Create Successful Rapid Transit Stations: The projects rapid transit Stations will be located within relatively short walking distances of medium and high density land uses, will be accessible, functional and integrated with other transportation networks. Associated criteria include:			
Location and spacing	Existing and future population and employment density along the corridor and number of major facilities (such as hospitals, universities, colleges, regional facilities, recreation centres and shopping centres).	3	3
Accessibility	Proximity of existing and future development to transit station/facility.	2	2

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Layout, design and amenities	Ability to provide vital passenger circulation, wayfinding and ease of orientation, avoid conflicts between vehicles and between users at transfer stations (including Bayview and Baseline Stations) and encourage accessory retail and service uses at stations to create opportunities for vibrant people-oriented places.	4	4
Multi-modal connections	Ability to provide connections to existing/future pedestrian, cycling and transit facilities to enhance walking and cycling shares.	3.5	3.5
Provide a Safe Facility: The projects infrastructure will provide for safe, efficient and reliable movement of passengers and transit vehicles as well as the routing of services and utilities. Associated criteria include:			
Personal safety	Avoid designs which create isolated areas, unsafe circulation.	3	3
Infrastructure safety	Ability to provide emergency services access to corridor and stations.	Not a Differentiator	Not a Differentiator
	Ability to provide emergency evacuation from stations/corridors.	Not a Differentiator	Not a Differentiator
Operational safety	Not a differentiator in initial evaluation	Not a Differentiator	Not a Differentiator

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Increase Ridership, Mobility and Capacity: The project will provide a fast, convenient, comfortable, reliable, and efficient rapid transit service that will be part of the core rapid transit network, while being fully integrated with other transportation networks. Associated criteria include:			
Travel times and rider comfort	Degree of transit priority achieved and resulting travel times	4	4
	LRT geometry (curves, grades) achieved.	4	3
Design for all-day use	Not a differentiator in initial evaluation	Not a Differentiator	Not a Differentiator
Network connectivity	Ability to connect to other existing and planned rapid and local transit services.	4	4
	Facilitate and enhance interprovincial connectivity and continuity.	Not a Differentiator	Not a Differentiator
Local and regional trips	Not a differentiator in initial evaluation	Not a Differentiator	Not a Differentiator
Maximize Sensitivity to Natural Environment: The focus of this category is to assess the potential effect of the alternative corridors on elements of the natural environment Associated criteria include:			
Surface and groundwater	Disruption of surface watercourses.	4	3
	Effect on infiltration.	3	3
Fisheries, flora and fauna	Disruption to natural habitat.	2	3

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Ecological linkages	Incorporates “Environmental responsibility and context sensitivity”, Impact on “species at risk” and disruptions to ecological linkages.	3	3.5
Environmental contamination	Disturbance of large areas of contamination.	2	3
Apply Sustainable Design Best Practices: The project will exemplify best practices in energy and environmental design, including green infrastructure choices. Associated criteria include:			
Energy efficiency	Allows for reduced energy use in stations and in transit operations.	3	3
Infrastructure re-use	Maximizes re-use of existing transit infrastructure.	4	4
Minimize footprint	Minimizes footprint of corridor, stations and ancillary facilities.	3	3.5
Storm water management	Ability to provide storm water management facilities.	3	3
GHG emissions	Not a differentiator in initial evaluation	Not a Differentiator	Not a Differentiator
Wise Public Investment: The identification of the economic factors associated with an alternative corridor to determine whether it is an acceptable solution to those who will ultimately pay for implementation and to identify public sector capital funding needs. Associated criteria include :			
Capital costs	Estimated Class D construction costs.	2	2.5

		R-14-B (100-Day alternative) via Rochester Field and Byron Park	R-12-A – (100-Day Solution) via the SJAM Parkway
Operating and maintenance costs	Estimated net operating and maintenance costs.	3	3
Land acquisition cost	Estimated land acquisition requirements.	3.5	3.5
Value for money	Estimated cost/benefit analysis	3	4
Score:		101	108.5

“Not a differentiator in initial evaluation” – means that it is a criterion to evaluate a corridor option but does not discern between corridor options and therefore is not used for scoring

“Not a differentiator” – means that it does not discern between the options under review and therefore does not contribute to the scoring