## **Appendix D1**

Detailed Multi-Criteria Analyses of Route Options in Section 1

## Appendix D1 – Section 1 Multi-Criteria Assessment Tables

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Assessment Criterion	Assessment Sub- Criterion	Option A Bus Gate at Sundrive & Bus Lanes on LKR	Option B Bus Gate near KCR		
	Capital Cost	Infrastructure Works Cost Factors	Infrastructure Works Cost Factors		
Economy (Cost Assessment and Transport Economic Indicators)		Higher cost requirements due to the land acquisition requirements on LKR, and associated infrastructure requirements.	Lower cost requirements since this option substantially retains existing layout. Some localised works required to prevent rat running through Hazelbrook Road.		
		Land Acquisition Cost Approx. €4 million	Land Acquisition Cost n/a		
	Rank		110		
	Journey Time Reliability (Bus)	No appreciable difference between options	No appreciable difference between options		
	Rank				
	Economy				
	Policy Integration	No appreciable difference between options	No appreciable difference between options		
	Rank				
	Transport Network Integration	No appreciable difference between options	No appreciable difference between options		
Integration	Rank				
	Cycling Integration	No appreciable difference between options	No appreciable difference between options		
	Rank				
	Traffic Network Integration	Limited local traffic access diversion	All local access traffic diverted via Sundrive Cross		
	Rank				
Integration					
Accessibility	Key Trip Attractors (Education / Health / Commercial / Employment)	No appreciable difference between options	No appreciable difference between options		
and Social	Rank				
Inclusion	Deprived Geographic Areas	No appreciable difference between options	No appreciable difference between options		
	Rank				
Accessibi	lity & Social Inclusion				
Safety	Road Safety	Cyclists will be forced to share bus lanes on LKR if they have not chosen to use the complementary route to the west due to insufficient open space available to be acquired to accommodate separate facilities.	Cyclists sharing a single carriageway route with low traffic volumes as a result of the bus gates.		
	Rank				
	Safety				
	Archaeology & Cultural Heritage	No appreciable difference between options	No appreciable difference between options		
	Rank				
	Flora & Fauna / Biodiversity	No appreciable difference between options	No appreciable difference between options		
	Rank				
	Soils & Geology Rank	No appreciable difference between options	No appreciable difference between options		
	Hydrology	No appreciable difference between options	No appreciable difference between options		
Enclose 1	Rank				
Environment	Landscape & Visual	Increased road space required which will impact on residential gardens on KRL. No opportunities to improve the	No encroachment required on any gardens, and the reduced traffic demand allows scope to improve the streetscape.		
	Donk	streetscape as a result.			
	Rank Air & Noise	No changes to air and noise impacts	Reduced noise and air impacts due to traffic dispersal away from KLR		
	Rank				
	Land Use and the Built Environment	No appreciable difference between options	No appreciable difference between options		
	Rank				
E	Environment				
	Preference	2	1		

## Table 6.1 – Evaluation of Options for Bus Facilities in Section 1 - Kimmage Road Lower

Table 6.2 – Evaluation of Options for Cycling Facilities in Section 1 - Kimmage Road Lower

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Assessment Criterion	Assessment Sub- Criterion	Option A Shared Road / Advisory Cycle Lanes	Option B Cycle Tracks	Option C1 Alternative Route to East	Option C2 Alternative Route to West	Option D Shared Road w/ Alternative Routes East & West
Economy (Cost Assessment and Transport Economic Indicators)	Capital Cost	Infrastructure Works Cost Factors Substantially retains existing layout along KRL without any land acquisition requirements or infrastructural intervention	Infrastructure Works Cost Factors Significant works and land acquisition required on KRL to provide complete cycle segregation	<i>Infrastructure</i> <i>Works Cost Factors</i> Existing quiet street route requiring no infrastructural intervention	Infrastructure Works Cost Factors Some localised works required at the Stone Boat to provide a new boardwalk link between Mount Argus and Sundrive, and at Ravensdale Park	Infrastructure Works Cost Factors Some localised works required at the Stone Boat to provide a new boardwalk link between Mount Argus and Sundrive, and at Ravensdale Park
		Land Acquisition Cost n/a	Land Acquisition Cost Approx. €4 million	Land Acquisition Cost n/a	Land Acquisition Cost n/a	Land Acquisition Cost n/a
	Rank					
	Journey Time Reliability (Bus)	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
	Economy					
	Policy Integration	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
	Transport Network Integration	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
Integration	Cycling Integration	Direct route for all cyclists. May require cyclists to cross major junctions to access.	Direct route for all cyclists. May require cyclists to cross major junctions to access.	Indirect route away from the main CBC. Caters predominantly for cyclists to the East and requires cyclists to cross major junctions to access	Indirect route away from the main CBC. Caters predominantly for cyclists to the West and requires cyclists to cross major junctions to access	Accommodates cyclists locally from all directions without the need to cross any major junctions.
	Rank					
	Traffic Network Integration	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
Ir	ntegration					
Accessibility and Social Inclusion	Key Trip Attractors (Education / Health / Commercial / Employment)	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	<i>Rank</i> Deprived Geographic Areas	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
Accessibilit	y & Social Inclusion					
Safety	Road Safety	Cyclists will be required to share the road with low traffic. May require cyclists to cross major junctions to access the CBC	Fully segregated cycle facilities on the most direct route.	Cyclists will be required to share the road with low traffic. Will require cyclists to cross major junctions to access the route	Cyclists will be required to share the road with low traffic. Will require cyclists to cross major junctions to access the route	Shared with low traffic but locally accessible without any requirement to cross major junctions to access the routes
	Rank					
Safety						
	Archaeology & Cultural Heritage	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
Environment	Rank					
Livionnent	Flora & Fauna / Biodiversity	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					

Assessment Criterion	Assessment Sub- Criterion	Option A Shared Road / Advisory Cycle Lanes	Option B Cycle Tracks	Option C1 Alternative Route to East	Option C2 Alternative Route to West	Option D Shared Road w/ Alternative Routes East & West
	Soils & Geology	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
	Hydrology	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
	Landscape & Visual	No encroachment required on any gardens, and the reduced traffic demand allows scope to improve the streetscape.	Increased road space required which will impact on residential gardens on KRL. No opportunities to improve the streetscape as a result.	No encroachment required on any gardens, and the reduced traffic demand allows scope to improve the streetscape.	No encroachment required on any gardens however there will be limited impact at <i>Stone Boat</i>	No encroachment required on any gardens however there will be limited impact at <i>Stone Boat</i>
	Rank					
	Air & Noise	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
	Land Use and the Built Environment	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options	No appreciable difference between options
	Rank					
Environment						
	Preference Rank	2	5	3	4	1

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