

Tram Cycle Safety
Improvements – Phase 3

Consultation Report

May 2018

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Introduction

Consultations have been under way since mid-2017 between specialist consultants working on the Council's behalf and cycling and walking groups, Living Streets, Spokes and Sustrans, to assess areas of potential conflict between cyclists and tramlines in the city centre and develop proposals for improvements.

This package of works forms part of a wider programme aiming to improve cyclist tramline safety. This is being delivered in four Phases with Phases 1 and 2 completed. The initial two phases were aimed to raise awareness and provide extra space and safety for people cycling around the tram tracks.

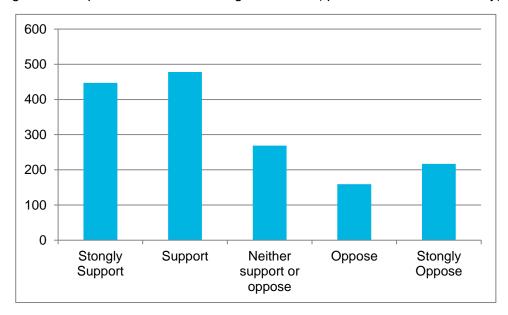
Phase 3 includes six locations which are proposed for physical interventions to improve conditions and safety for cyclists, as well as new early release signal phasing for bikes at 14 junctions. Measures include sections of new segregated cycle lanes, improved crossings and changes to road layout.

This report summarises the consultation exercise undertaken during March-April 2018 on the preliminary design proposals of the Tram Cycle Safety Improvements – Phase 3.



Executive Summary

A total of 230 people responded to the online survey and questionnaire on the design proposals, with over 55% of all responses supporting the design proposals for each area. The graph below shows the overall level of support for the scheme. It is formed by combining all the responses to each of design locations (questions 1-7 in the survey).



In general, all the individual route design proposals were supported with feedback confirming the improvements to safety for cyclists. On this basis, we will be progressing the detailed design of the schemes with the scope of these remaining.

It is the intention to develop these designs and progress the statutory legal processes to create new areas of footway and cycleway. We aim for this legal process to commence in summer 2018 and, subject to their approval, we are aiming for construction to commence late 2018 on all proposed locations.

Grosvenor St / West Maitland Street Recommendation

Two options were offered for consideration at Haymarket around the junction of West Maitland Street / and Grosvenor Street.

- 1) Improved road layout at junction of Grosvenor Street; and
- 2) Improved road layout with a ban on motor vehicles entering Grosvenor Street northbound.

The majority of respondents selected Option 2 as their preferred choice.

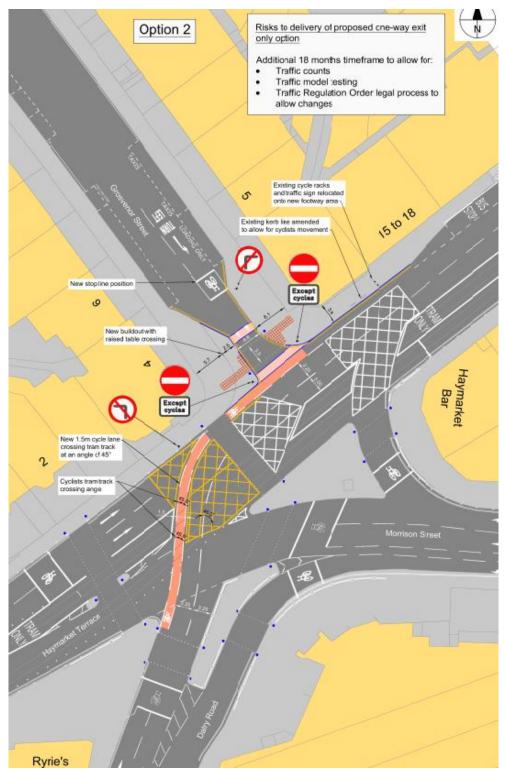
The Council will proceed with developing Option 2 as the preferred design for the West Maitland Street / Grosvenor Street junction. The next step in the design process is to complete the traffic modelling of the proposed changes to fully understand the traffic impacts. Roadworks in this area have delayed this process (surveys need to be undertaken without roadworks in place) and as such we are expecting the traffic modelling to be complete by the end of 2018. When the modelling is complete, we intend to update all local businesses and residents, as well as any survey respondents who have been asked to be kept informed. We will also speak further with businesses in the area and consider any further concerns they may raise.



Subject to successful completion of the traffic modelling, a legal process would then follow to create the traffic restrictions. This process includes a further consultation period for responses to the proposed traffic restriction changes.

The infrastructure required for Option 2, other than markings and signs, can be built without making the no-entry traffic restriction. The junction will continue to operate and improve conditions for people walking and cycling in the area whilst the legal process to make this street no-entry northbound is undertaken. As such we shall implement the physical changes, other than the restrictions, one-way signs and markings, as part of the rest of the project in late 2018.

Following determination of the legal processes, the one-way restrictions would then be implemented at a later date.





Proposals

Scheme Locations

The proposed improvement sites are listed below in section 2.1 and contain a variety of civil engineering works to improve conditions for cyclist along the Tram route at six locations. The designs are shown in Figures 2 to 7 below.

Early Release signals

14 junctions along the tram route in the City Centre have been proposed for early-release cycle signals. These locations are detailed in section 2.2 of this report. An "early release" is a green signal for cyclists that allows them to move off before other traffic. This involves adding a 4th signal light to the traffic signal head, beneath the standard red, amber and green.

The length of the "early release" can vary depending on the conditions. Generally 3 seconds is given for bikes, plus a further 2 seconds for the red, amber phase, before other traffic is released on a standard green signal.

This gives cyclists a head start over other traffic to negotiate a busy junction and to make their intentions clear to other road users behind.



Proposed Scheme Locations

Table 1. Proposed scheme locations

Location	Improvements
Princes Street at South St. Andrew Street	New section of segregated cycleway with improved crossing of tram tracks.
Princes Street at South Charlotte Street	Improvements to traffic island and advanced stop box for cyclists.
Haymarket Station	Re-alignment of traffic island and improved cycle lane and tram track crossing.
Haymarket Junction (Dalry Road to West Maitland Street)	Improved road layout to allow safer crossing of tram tracks and minor road junction.
Haymarket Yards	New traffic island improving approach for cyclists travelling city-bound and improved crossing for pedestrians.
Cultins Road	New raised table road crossings and new tram rail crossing on cycle route desire line



Figure 2: Scheme Location Overview

Proposed Early Release Signal Locations

Table 2. <Proposed early release signal locations>

1 York Place/ North St Andrew Street	Westbound Eastbound Southbound
YORK Place/ North St Andrew Street	
	Southbound
2 North Ct Androw Ctroot/ Ct Androw Causes	
2 North St Andrew Street/ St Andrew Square	St Andrew Square
3 South St Andrew Street/ St Andrew Square	Southbound
4 Princes Street/ Waverley Bridge	Westbound
5 Princes Street/ South St David Street	Eastbound
	Westbound
6 Princes Street/ The Mound	Eastbound
6 Princes Street/ The Mound	Southbound
	Northbound
7 Princes Street/ Frederick Street	Eastbound
8 Princes Street/ South Charlotte Street	Westbound
9 Princes Street/ Lothian Road	Eastbound
10 Shandwick Place/ Princes Street	Queensferry Street
	Westbound
11 Atholl Place/ Manor Place	Eastbound
	Manor Place
12 West Maitland Street/ Palmerston	Place Palmerston Place
	Eastbound
	Morrison Street to West Maitland St
	Morrison Street to Haymarket
13 Haymarket Junction	Terrace
	Morrison Street to Dalry Road
	Dalry Road
	Grosvenor Street
14 Haymarket Yards	Eastbound Haymarket Yards



Design Proposals

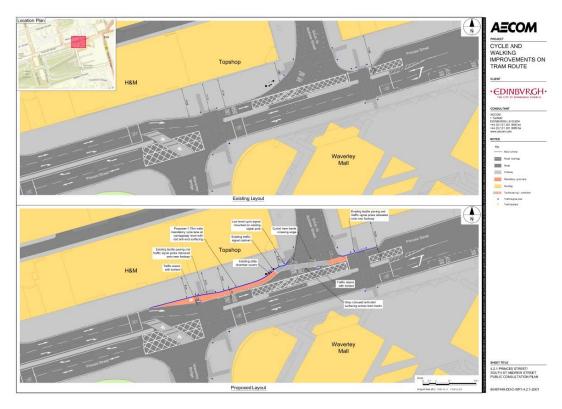


Figure 3: Princes Street / South St Andrew Street (1 of 8)



Figure 4: Princes St / South Charlotte Street (2 of 8)

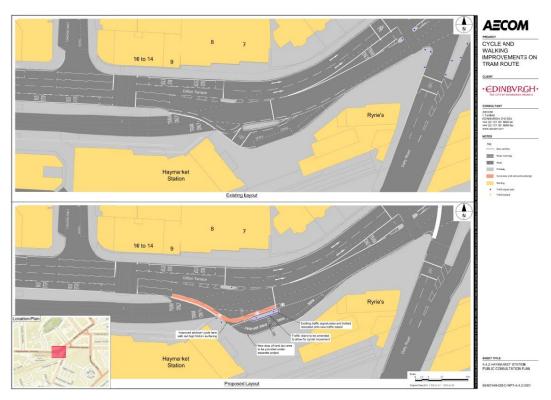


Figure 5: Haymarket Station (3 of 8)

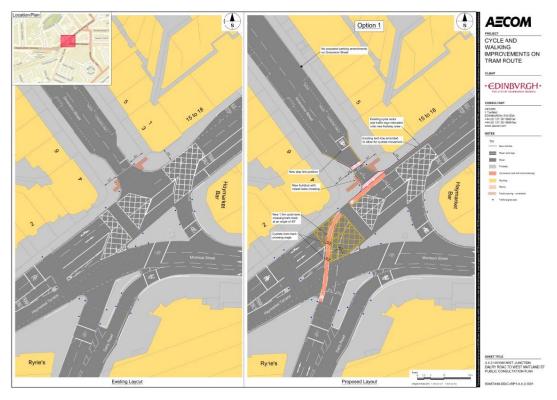


Figure 6: Haymarket Junction Option 1 (4 of 8)

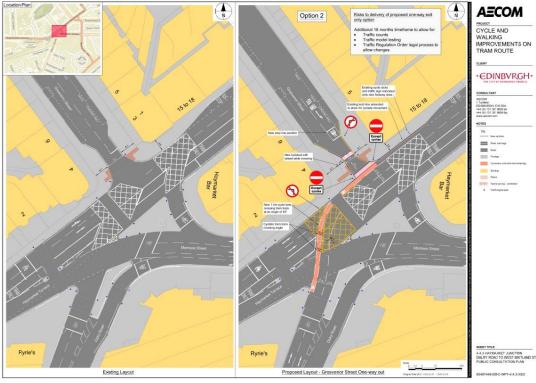


Figure 7: Haymarket Junction Option 2 (5 of 8)

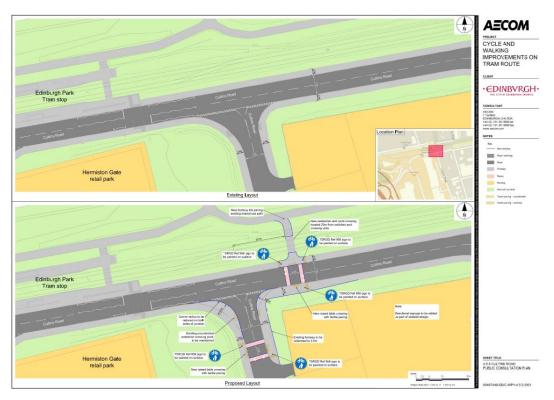


Figure 8: Cultins Road (6 of 8)

Early Release signal location maps

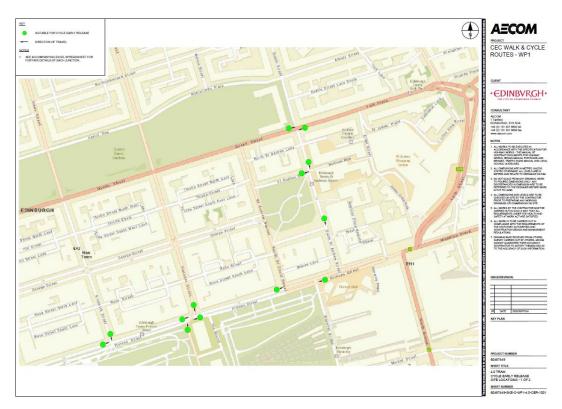


Figure 9: Early Release Signal Locations Sheet 1 (7 of 8)



Figure 10: Early Release Signal Locations Sheet 2 (8 of 8)

Forms of Consultation

The following forms of consultation have been used for this design scheme at the current stage:

Table 3: Forms of Consultation

Meeting/workshop stakeholder organisations	✓	Meetings internal Council departments; Spokes, Sustrans and Living Streets.
Consultation Hub	✓	Information was posted on The City of Edinburgh Council consultation hub from 14 th March to 11 th April 2018.
Leaflets	✓	Leaflets were distributed to properties on Grosvenor Street.
Social Media	√	The City of Edinburgh Council advertised the consultation through their Facebook and Twitter.
Online Survey	√	An online survey was included on the consultation hub. A total of 230 responses were received on the survey.
		A sample of the online survey is provided as Appendix A to this report.
E-mail Consultation	✓	Comments were also invited by email with three responses from organisations.



Online Survey Consultations

A total of 230 individuals provided feedback to the online survey or via email during the consultation.

The figures below show the response from the consultees to the proposed arrangements. The responses range from strongly support to strongly oppose.

Table 4: Level of Support

- 1 Strongly support
- 2 Support
- 3 Neither support or oppose
- 4 Oppose
- 5 Strongly oppose

In addition to the overall response to the scheme proposals shown in the figures above, key issues were identified throughout the consultation. These are shown in the tables for each section below.

Additional Grosvenor Street analysis

For the proposals at Haymarket Junction, respondents with a post code within a 500m buffer zone of Grosvenor Street were identified, shown in Figure 11 and a separate analysis provided.

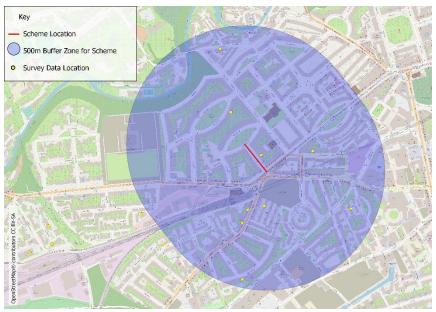


Figure 11: Location of 500m Buffer Grosvenor Street

A full list of public consultation comments and The Council's responses are provided in **Appendix B.**



Princes Street / South St Andrew Street

Princes Street / South St Andrew Street

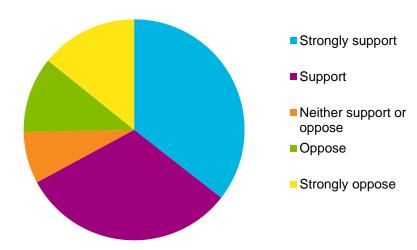


Figure 12: Princes Street / South St Andrew Street

Of the 225 responses, 151 (67.1%) supported the scheme.

Table 5 Princes Street / South St Andrew Street – Key Themes Raised:

Issue	No. of Responses	Response
The scheme is an improvement but physical segregation is needed	22	Given the nature of the location and high levels of pedestrian movement, we felt that physical segregation on the cycle route would lead to greater conflict with pedestrians, due to people being more likely to walk on the cycleway.
The footway width reduction is supported given the increased safety provided for cyclists at this key junction.	17	Support noted.
The existing approach angle across the tram lines is improved but it is still a narrow angle crossing.	16	The design and approach angle is constrained by the pedestrian crossing point directly north.



Princes Street / South Charlotte Street

Princes St / South Charlotte Street

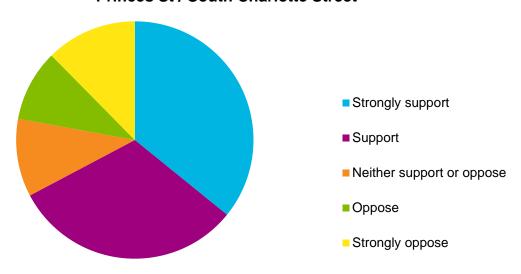


Figure 13: Princes Street / South Charlotte Street

Of the 226 responses, 152 (67.3%) supported the scheme.

Table 6 Princes St / South Charlotte Street – Key Public Themes Raised:

Issue	No. of Responses	Response
Widening the cycle facility in this area creates minimal impact and reduces the potential for conflict with traffic.	70	Support noted.
I don't see many cyclists here and they don't obey the signals	17	Non-compliance with traffic signals is a legal issue to be policed. We would hope to see improved compliance with a safer arrangement for people on bikes at this junction.
A segregated cycle lane along the length of Princes Street would be more suitable	14	This is beyond the scope of this project.



Haymarket Station

Haymarket Station Strongly support Support Neither support or oppose Oppose Strongly oppose

Figure 14: Haymarket Station

Of the 224 responses, 117 (52.2%) supported the scheme.

Table 7 Haymarket Station – Key Public Themes Raised:

Issue	No. of Responses	Response
Improved facility provides a better crossing angle and removes the sharp turn before re-entering the traffic	6	Support noted.
The relocated traffic island creates more space between the cycle route and trams and there are fewer obstacles	4	Support noted.
The section of road is complicated and the cycle route should be segregated	4	This is beyond the scope of the current project.



Haymarket Junction: Grosvenor Street / West Maitland Street – Feedback on Option Preference

Haymarket Junction Preference (All Respondents)

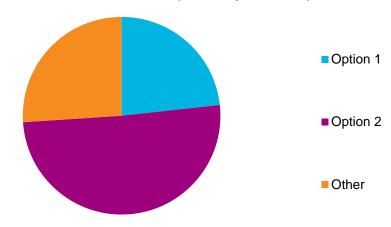


Figure 15: Haymarket Junction Preference

Of the 215 responses:

50 (23.3%) preferred Option 1; 109 (50.7%) preferred Option 2; and 56 (26.0%) selected other.

Haymarket Junction Preference (Respondents within 500m of Location)

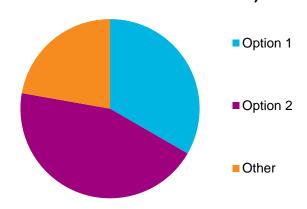


Figure 16: Haymarket Junction Preference (Grosvenor Street Respondents)

Of the 9 responses that came from post codes within 500m of the junction, 3 (33.3%) preferred Option 1, 4 (44.4%) preferred Option 2 and 2 (22.2%) selected Other.



Haymarket Junction: Grosvenor Street / West Maitland Street Option 1 – detailed breakdown

Haymarket Junction Option 1 (All Respondents)

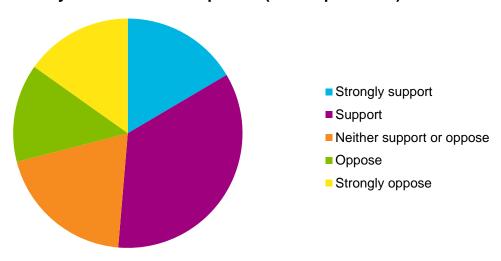


Figure 17: Haymarket Junction Option 1

Of the 224 responses, 115 (51.3%) supported the scheme.

Table 8: Haymarket Junction Option 1 – Key Public Themes Raised

Issue	No. of Responses	Response
Improved markings and reduced crossing widths improve both the pedestrian and cycle situation at this junction. Vehicles are still permitted to turn left from Dalry Road into Grosvenor Street, although reduced there is still some risk of left turn incidents.	20	General support noted.
This option improves the current situation, but option 2 removes the potential of left turn accidents as cars on Dalry Road enter Grosvenor Road.	15	Note preference for Option 2.
A clearly marked route improves safety for cyclists navigating the junction and crossing the tram tracks.	11	Support noted.



Haymarket Junction Option 1 (Respondents within 500m of Location)

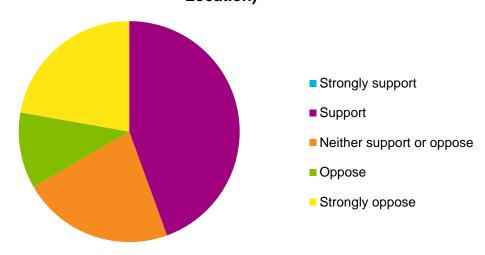


Figure 18: Haymarket Junction Option 1 (Grosvenor Street Respondents)

Of the 9 responses that came from post codes within 500 of the scheme, 4 (44.4%) supported the scheme.

Haymarket Junction: Grosvenor Street / West Maitland Street Option 2 – detailed breakdown



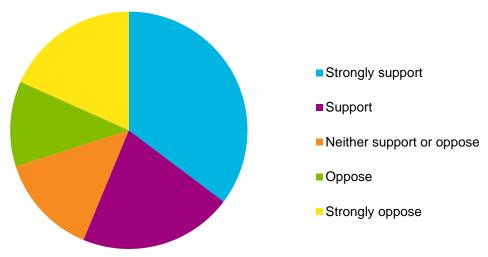


Figure 19: Haymarket Junction Option 2

Of the 224 responses, 126 (56.3%) supported the scheme.



Table 9: Haymarket Junction Option 2 - Key Public Themes Raised

Issue	No. of Responses	Response
Improved facility provides a better crossing angle and removes the sharp turn before re-entering the traffic	44	Support noted.
Option 2 provides the same benefits as option 1, but also removes the potential of left turn accidents as cars on Dalry Road enter and cuts across cyclists.	26	Favour of Option 2 design noted.
There are already too many one way systems in this area, another will only add to congestion	15	Traffic modelling and analysis will be undertaken to fully analyse the impacts of the proposed closure.

Source: Online survey responses and individual email respondents

Haymarket Junction Option 2 (Respondents within 500m of Location)

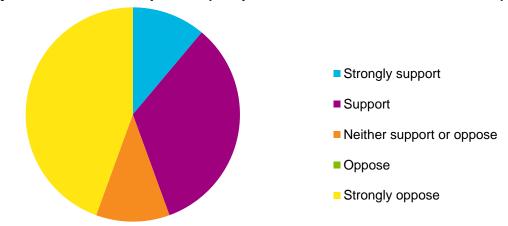


Figure 20: Haymarket Junction Option 2 (Grosvenor Street Respondents)

Of the 9 responses that came from post codes within 500 of the scheme, 4 (44.4%) supported the scheme and 4 were against.



Haymarket Junction, Grosvenor St / West Maitland Street Recommendation:

The Council will proceed with developing Option 2 as the preferred design for the West Maitland Street / Grosvenor Street junction. The next step in the design process is to complete the traffic modelling of the proposed changes to fully understand the traffic impacts. Roadworks in this area have delayed this process (surveys need to be undertaken without roadworks in place) and as such we are expecting the traffic modelling to be complete by the end of 2018. When the modelling is complete, we intend to update all local businesses and residents, as well as any survey respondents who have been asked to be kept informed. We will also speak further with businesses in the area and consider any further concerns they may raise.

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Following determination of the legal processes, the one-way restrictions would then be implemented at a later date.



Haymarket Yards

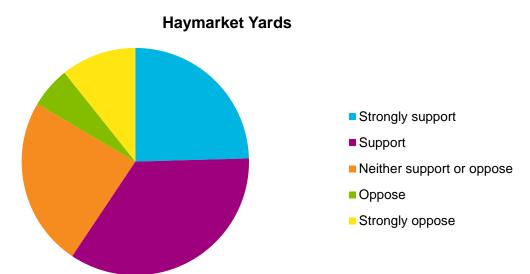


Figure 21: Haymarket Yards

Of the 224 responses, 133 (59.4%) supported the scheme.

Table 10: Haymarket Yards - Key Public Themes Raised

Issue	No. of Responses	Response
Improved facility provides better approach visibility and an easier hill start for cyclists.	52	Support noted.
This change does not improve the situation, the dedicated space for cycling the left of the tram tracks has remained narrow.	20	We acknowledge that the cycle lane heading southbound between tram line and kerb is below desirable width. However, it is as wide as is feasible given the width of the street and avoiding reducing already narrow footways.
It is a minor route not used by much traffic and so the development seems unnecessary	15	This area has identified as a priority through consultation with stakeholder groups.



Cultins Road

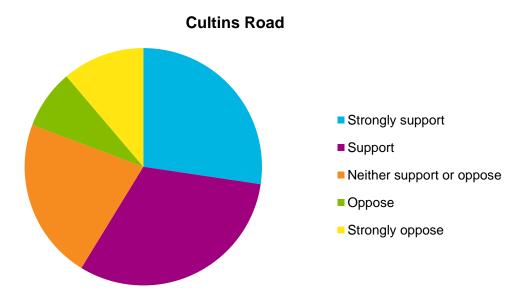


Figure 22: Cultins Road

Of the 223 responses, 131 (58.7%) supported the scheme.

Table 11: Cultins - Key Public Themes Raised

Issue	No. of Responses	Response
Improved facility for cyclists in the area.	48	Support noted.
Unnecessary changes and a waste of money	19	This area has identified as a priority through consultation with stakeholder groups.
Segregated cycle route should be provided to avoid path user conflict	9	Given the adjoining paths in the area are all shared use for people walking and cycling, we feel that a short section of segregation in the new facility is not necessary and would have poor compliance.



Early Release Signals

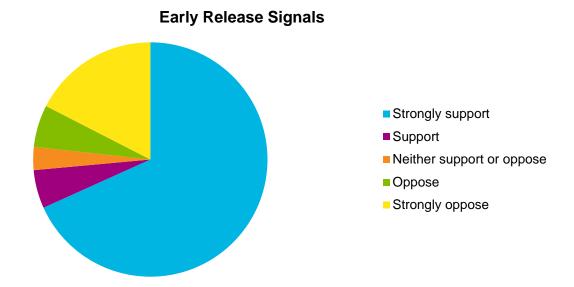


Figure 23: Early Release Signals

Of the 189 responses, 139 (73.5%) supported the scheme.

Table 12: Early Release Signals - Key Public Themes Raised

Issue	No. of Responses	Response
Early release signalling has the potential to greatly improve safety for cyclists by removing the risk of being cut up by vehicles from behind.	34	Support noted.
Early release will give cyclists who are stopped at the lights a chance to get into an appropriate position in relation to tram tracks ahead of motor vehicles	30	Support noted.
All roads in Edinburgh should be upgraded to include early release traffic signal phasing and continuous paths for cyclists	17	Support noted.

