

Appendix

A61(S) Bus Priority Corridor Design Amendment – Outbound Bus Stops Crown Point Road to Sayner Road

Background

The A61(S) bus priority designs have been developed by WSP in close collaboration with LCC Highways and Transportation Transport Policy team. In turn the Transport Policy team has liaised with City Development colleagues to ensure as far as possible that the measures align with existing and emerging priorities in the South Bank area. One of these areas currently under consideration is the development of the City Centre Park extending from the river down to Hunslet Road near Black Bull Street, including the council's interests in protecting and enhancing its ability to deliver development.

The current LPTIP design shown on Drawing LPTIP-WSP-A61S-XX-DR-CH-GA-_01 Rev P1.2 includes a realignment of the outbound carriageway between Crown Point Road and Black Bull Street, reducing the width of the central reserve. This has been done in order to maximise the potential area of the park, relocate space to an area where has a higher amenity value, and to safeguard the opportunity for the council to bring forward a development on council owned land should such an opportunity be considered prudent. The current design retains the existing bus stop lay-by in approximately the same location as is currently found on street.

A review of the design by colleagues from Planning, Highways and Transportation and Regeneration has concluded that the best opportunity for a development plot arises if the bus stop is relocated. The review also identified a potential opportunity to improve the adjacent bus stop between Black Bull Street and Sayner Road. This note sets out the alternative options available and recommends a design change.

Bus Stop between Crown Point Road and Black Bull Street

There are two feasible options for relocating this bus stop described below and shown on the attached sketch plans. A third option – placing it between Meadow Lane and Crown Point Road – has been eliminated on the grounds of poor bus stop spacing, traffic conflicts/bus delays and risk of pedestrians being tempted to cross away in a relatively unsafe location.

Option 1 – Move the stop towards Crown Point Road

This places the stop on the outbound exit from the Crown Point Road junction, kerb side with a cycle by-pass to the rear of the shelter and in the proposed bus lane. It requires a further realignment of the outbound carriageway southwards which is achieved by removing the nose of the nearside splitter strip on the right turn lane into Crown Point Road. This provides just enough room to widen the north footway to accommodate a cycle by-pass behind the shelter. There is no impact on any of the signal junction layouts other than a slight adjustment to the island kerb lines at Crown Point Road.

Option 2 – Move the stop towards Black Bull Street

This places the stop on the immediate downstream side of the existing pedestrian crossing and retains it within a half width lay-by. It is suggested that the adjacent crossing is relocated slightly westwards to minimise the distance by which the stop is moved. This places the lay-by and cycle by-pass away from the potential development plot in an area which is currently trafficked highway and would be in front of the City Centre Park. This requires no changes to the kerb lines on the main

road, but it does reduce much of the benefit of realigning the outbound carriageway in terms of area gained for the park.

The two options are compared in this note below together with the existing proposal.

Table 1 – Appraisal of Bus Stop Options (Crown Point Road to Black Bull Street)

Factor	Assessment
Bus stop spacing	The next stop downstream is relatively close. Option 1 achieves a better bus stop spacing. If Option 2 is implemented then this increases the importance of relocating the next downstream stop (see next section).
Bus delays / journey time	Option 2 includes a half width lay-by which will enable buses to by-pass stationary buses relatively easily when traffic is moving. However, it is closer to the Black Bull Street signals and there is more likelihood that traffic will be stationary here than at Option 1. Therefore buses could still be somewhat delayed. Provision of a full depth lay-by for Option 2 does not seem practical. Although Option 1 has no lay-by at all, it is located on the immediate exit from the junction, at a location where traffic is least likely to be queuing alongside the bus lane and at which point non-stopping buses will have a good opportunity to pass stationary buses. It is therefore concluded that Option 1 should be no worse than, or possible better than, Option 2.
Accessibility for passengers from surrounding area	The stop in question is primarily to serve the length of Great Wilson Street east of Meadow Lane and up to Black Bull Street including particularly Crown Point Road and the Crown Point Shopping Park. Option 1 places the stop closer to Crown Point Shopping Park and Crown Point Road and is preferred. Both options are close to pedestrian crossings.
Impact on park	Option 1 is located away from the proposed park and is preferred.
Impact on potential development plot	Both options support the proposed potential development plot. Option 1 must be sited close enough to Crown Point Road to ensure that the potential for an off-highway servicing access is maintained as shown indicatively on the WSP drawing.
Cycling	Both facilities provide adequate cycle features although Option 2 allows a slightly more generous layout behind the bus stop.
Walking	Option 1 widens the footway on the north side near Crown Point Road, although the bus stop and cycle bypass does present a localised narrowing. Both are acceptable.
Traffic and servicing	No material difference is expected between the options.
Construction cost	Provided the kerb realignment for Option 1 on the central reserve is minimised in the vicinity of the Yorkshire Water apparatus, the cost difference between the two options should be minimal.
Public acceptability and impact on landowners	Both options should be acceptable although there is a slight risk of objection from the adjacent property for Option 1.
Summary	Option 1 appears to offer the best overall solution but Option 2 could be made to work.

Bus Stop Between Black Bull Street and Sayner Road

This stop is currently a kerbside stop and is proposed to remain so on the current WSP drawing referred to above. It is a very busy boarding stop especially in the afternoon and evening given its proximity to Printworks Campus, Leeds College of Building, UTC, etc and because it is served by P&R buses (PR2) as well as service buses from Meadow Lane (generally First services towards Hunslet) and Black Bull Street (generally Arriva services to Wakefield Road).

The former Evans Halshaw development site opposite the Printworks campus has received full planning permission for redevelopment including stopping up of Chadwick Street. Providing a bus stop lay-by, within highway land in the mouth of Chadwick Street, has a distinct advantage. This is because traffic is highly likely to be queuing alongside the bus stop on this link as modelling suggests the convergence of Black Bull Street left turners and A61 outbound traffic keeps this link full of traffic. Opportunities for non-stopping buses to pass stationary buses may therefore be limited during the busiest afternoon and evening periods. A lay-by could facilitate these non-stopping services and the presence of the bus lane would avoid the problems experienced by buses of delay when leaving the lay-by.

A second advantage of relocating the bus stop into a lay-by is that this moves the stop eastwards which is better for bus stop spacing, especially if Option 2 above is selected.

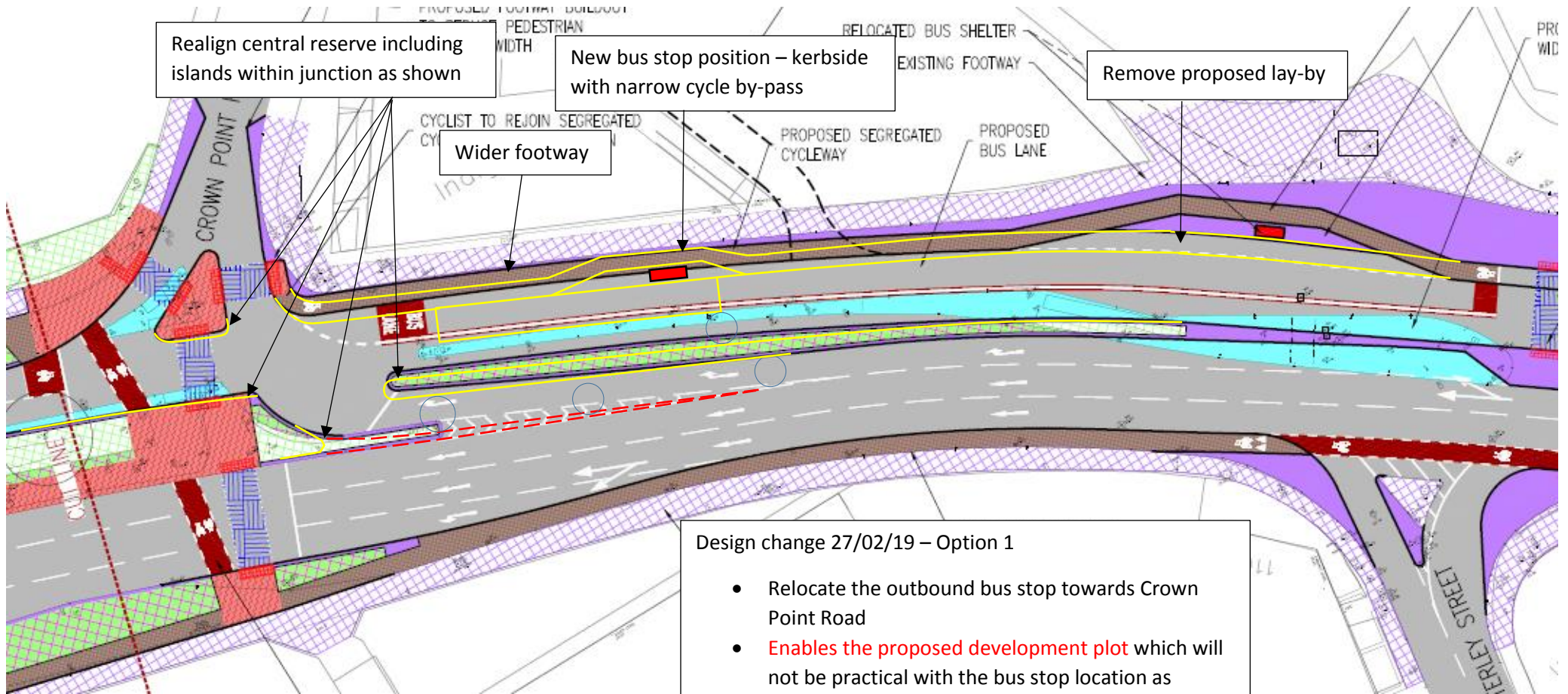
In order to create the width required for the new lay-by, it is necessary to realign the outbound carriageway as shown on the attached plan. This requires a length of central reserve to be omitted between Black Bull Street and Leathley Road/Sayner Road. A four lane cross section without central reserve is or will be provided on other sections of the A61(S) covered by the LPTIP scheme and is considered that it would be appropriate here. There may be a secondary benefit of removing the central reserve in that it may encourage students crossing the road in this area to cross at a controlled crossing point instead of 'hopping' across using the narrow central reserve.

This narrowing of the highway cross-section maximises footway widths wherever possible and increases the possibility of tree planting or placement of street furniture with minimal detriment to pedestrians and cyclists.

Recommendations

It is recommended that

- Option 1 is adopted in the designs to be developed up by the Delivery Partner, relocating the outbound bus stop closer to Crown Point Road.
- The bus stop between Black Bull Street and Sayner Road is relocated into the mouth of Chadwick Street which is subject to a point closure, and is included in the next stage of design development with appropriate localised consultation.



Realign central reserve including islands within junction as shown

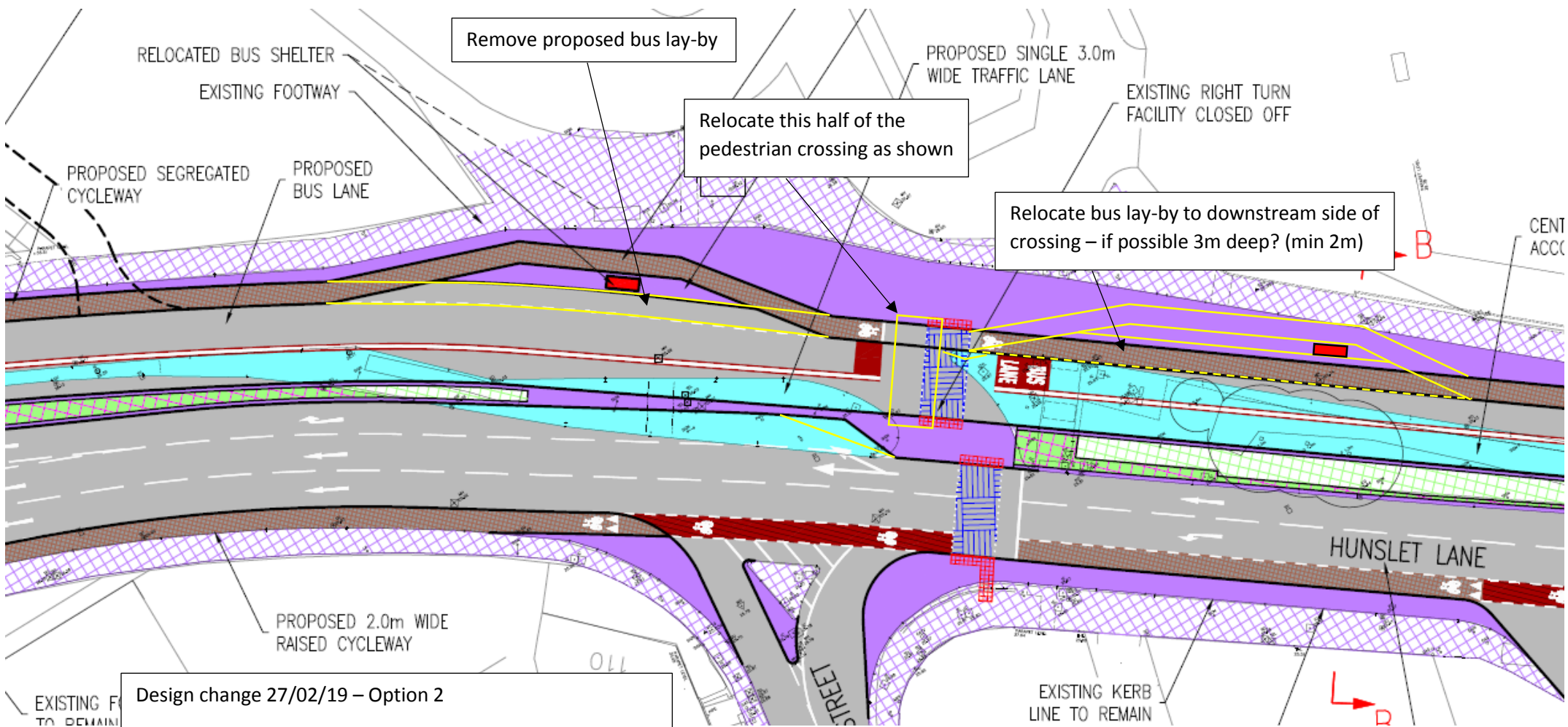
New bus stop position – kerbside with narrow cycle by-pass

Remove proposed lay-by

Wider footway

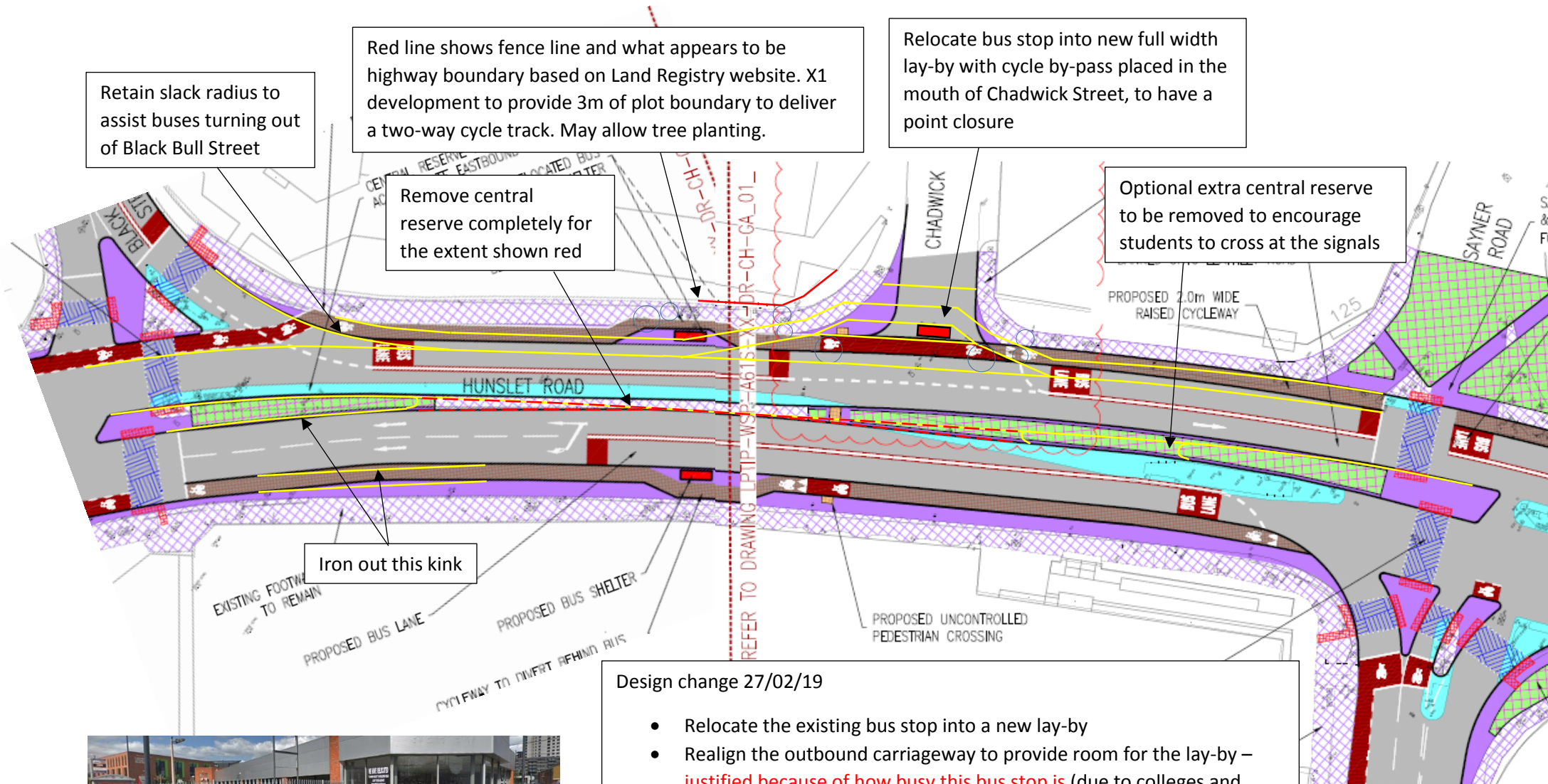
Design change 27/02/19 – Option 1

- Relocate the outbound bus stop towards Crown Point Road
- Enables the proposed development plot which will not be practical with the bus stop location as currently proposed
- Better for serving Crown Point Retail Park and better bus stop spacing than Option 2
- Worse in so far as it is kerbside, but this is mitigated by being so close to the exit from the junction



Design change 27/02/19 – Option 2

- Relocate the outbound bus stop towards Black Bull Street
- Enables the proposed development plot which will not be practical with the bus stop location as currently proposed
- Relocate the adjacent pedestrian crossing



Retain slack radius to assist buses turning out of Black Bull Street

Red line shows fence line and what appears to be highway boundary based on Land Registry website. X1 development to provide 3m of plot boundary to deliver a two-way cycle track. May allow tree planting.

Relocate bus stop into new full width lay-by with cycle by-pass placed in the mouth of Chadwick Street, to have a point closure

Optional extra central reserve to be removed to encourage students to cross at the signals

Remove central reserve completely for the extent shown red

Iron out this kink

Design change 27/02/19

- Relocate the existing bus stop into a new lay-by
- Realign the outbound carriageway to provide room for the lay-by – **justified because of how busy this bus stop is** (due to colleges and surrounding businesses) and potential delays to P&R buses
- Remove the central reserve to provide space for the bus stop; similar to A61 cross-section southeast of the ring road.
- It also is important because of the proposed relocation of the previous stop (see next page)

