

South Bristol Link (SBL) Benefits of a toucan crossing by Cater Road

I have, in e-mails over several weeks, provided evidence about why we consider a toucan crossing a much better solution to the existing footbridge to the east of Cater Road. In order to present our findings in a one place, I have decided to collate all that information, and some new requested evidence, in a single document.

Benefits for pedestrians and cyclists – council policy

- It is council policy to provide at-grade crossing facilities, replacing grade-separated facilities where possible (such as at Stokes Croft and Old Market).
- The road user hierarchy we follow when designing new infrastructure starts with pedestrians, followed by cyclists, which is how we are proposing to redesign this location now that the opportunity has presented itself.
- The bridge is not suitable for use by people with mobility issues or by cyclists – when this desire line was identified when the road was built, pedestrian footbridges were acceptable in a way we no longer consider them to be.
- With the instruction given by the Project Manager to provide a 3m shared-use path from the new crossing by Lidl to Whitland Road, an at-grade crossing here would provide an improved means for cyclists to regain the north side of the new road if they have chosen not to cycle along Whitchurch Lane.

Alternative routes

- While alternative means of crossing the road are available in both directions they are neither close nor convenient:
 - To the west, there will be a new traffic signal junction constructed as part of SBL close to the entrance to Lidl. This is approximately 300m from this proposed new crossing (600m to walk there on one side of the road and back on the other), and does not serve the desire line of the eastern end of Cater Business Park and the footpath from it to Durville Road.
 - To the east, there is the existing underpass. Access to the underpass is also around 300m from the proposed new crossing (700m there and back given the distance to cross beneath Hengrove Way, equivalent to almost double the maximum distance we aim for in bus stop spacing). The underpass also fails to serve the eastern end of Cater Business Park and the footpath to Durville Road, or provide a direct route from the residential area south of the business park to Crox Bottom, where further projects are in preparation through the Cycle Ambition Fund.
 - The concerns over the distance to these alternative crossing points are more of a concern for pedestrians, particularly those with restricted mobility, than for cyclists.

Intelligent traffic signals

Benefits of a toucan crossing by Cater Road

Appendix 9a

- The crossing will not noticeably hold up traffic – the signals will only turn red for vehicles when called by someone pressing the button. This will be far from a constant flow as, although we would wish walking and cycling numbers to rise in coming years, the numbers in this location are unlikely to be high enough to disrupt a good flow of traffic.
- When travelling west, drivers will have just come from several miles of 30mph single carriageway road and have 40mph dual-carriageway ahead to allow faster progress; travelling east, drivers will already be slowing within the 30mph limit and preparing to give way at a roundabout. It is worth noting here that the crossing is not proposed to be beneath the line of the current bridge, but closer to where the bridge ramp currently starts – it will not be immediate upon leaving the roundabout for vehicles heading east.
- The signal equipment itself will be the very newest available, including features such as cameras checking the waiting area that will cancel the press of the button if the pedestrian crosses in a break in the traffic. Cameras also watch the crossing area to allow slower pedestrians more green man time and, conversely, trigger the green light for traffic sooner after faster pedestrians have crossed.
- The new traffic signals will also be linked to the council's B-Net fibre optic network – this allows all the signals in the vicinity to work together, while also allowing for each set of signals to respond to real-time traffic flows.
- Congestion at a set of traffic lights occurs where the traffic arriving during the red period cannot clear the lights in one cycle; this almost never happens at a pedestrian crossing as the red time is so short compared to the green time. In general, a pedestrian crossing will have capacity of 1,200-1,500 vehicles per hour, based on how often it is called; the forecast traffic volumes for Hengrove Way as part of SBL does not even reach the bottom of this range by 2031.
- This crossing would not cause congestion, simply some small delay if called.

Savings to the council's budget

- The bridge is an expensive maintenance liability for the council. Our proposal is spending to save, using the money that would have been spent on 5-6 years' maintenance (approx. £75-80k) to remove the liability forever. While there remains an annual cost for maintaining an at-grade signal crossing, it is significantly lower (less than £1k).
- The removal of the bridge is being funded from the removal of future maintenance by the Highways group; the new crossing, associated with the extension of the SBL 3m shared-use path from Cater Road to Crox Bottom (which is how this opportunity came to light), is a joint venture between SBL and the Cycle Ambition Fund – this project is a great example of cross-team working to provide the maximum benefits.

BCC believe that replacement of the bridge with a toucan crossing is the best option for all transport users at this location, and hope that the evidence provided above will allow anyone who has objected to the footbridge stopping up order to reconsider their position.