

AGENDA ITEM 23C

NOTE TO CLARIFY PEDESTRIAN CROSSING ASSESSMENT FORMULA AND CRITERIA, FOLLOWING ESCOSC ON 13 SEPTEMBER 2010

Background

The following information should clarify the current definition of 'minimum requirements' as set out in the assessment process outlined in Appendix 1 of the report considered under ECSOSC Agenda Item 17.

- (i) A Pedestrian crossing may be provided where the need, measured as PV^2 is greater than 10^8 (or 2×10^8 if a central refuge is provided), *when averaged over the 4 highest hour periods*;
- (ii) A controlled crossing will not be considered in cases where PV^2 taken at peak hour is below 20% value.
- (iii) The choice of a pelican crossing rather than the zebra type is usually made if:
 - (a) there is difficulty with the geometric layout which would give visibility problems;
 - (b) the crossing is within 100 metres of an existing traffic signal/Pelican installation or in an Urban Traffic Control area;
 - (c) the 85%tile approach speed of vehicles is 35mph or above;
 - (d) a high percentage of blind or partially sighted pedestrians will use the crossing;
 - (e) a high number of pedestrians will be crossing which, with a Zebra crossing, could cause undue delay to vehicular traffic.
- iv If the site is at an existing traffic signal junction the assessment shall follow Department of Transport Advice Note TA15/81.

The PV^2 formula helps to evaluate the potential for conflict between vehicles and pedestrians, whereby P = 2-way total hourly flow of pedestrians crossing the road within 50 m on either side at busy times and V = 2-way total hourly flow of vehicles. To help further explain the PV^2 formula, the following worked examples may be of assistance.

Example 1

Where number of pedestrians (P) = 30 and number of vehicles (V) = 3,000
 $30 \times 3,000^2 = 2.7 \times 10^8$ - controlled crossing justified.

Example 2

Where number of pedestrians (P) = 200 and number of vehicles (V) = 60
 $200 \times 60^2 = 7.2 \times 10^5$ - controlled crossing not justified.

Conclusion

Further research undertaken since 13 September has identified further revisions that have been made to the formula by other councils to better reflect local circumstances when assessing crossings. This includes taking into account accident records, time taken to cross the road and level of difficulty in crossing the road. It has therefore been agreed that it would be beneficial for officers to consider a similar approach by reviewing the methodology in Brighton & Hove, and that the outcome of this work should be reported to ECSOSC.

AJR 15/10/10

