

Bollards

SBTA 18-001, February 2018
Review data, August 2022



Preamble

Bollards are used for a variety of reasons. There are four main categories of bollards:

1. Bollards crash tested to AS/NZS 3845.2:2017,
2. Bollards crash tested, but not to AS/NZS 3845.2:2017,
3. Bollards not crash tested,
4. Bollards for security purposes.

The purpose of this Technical Advice is to provide commentary and work towards a harmonised approach by Road Agencies.

Audience

- Road Agencies

Commentary

Bollards crash tested to AS/NZS 3845.2:2017 are classified as 'road safety devices'. They may be considered in situations where roadside barriers are inappropriate due to space limitations, pedestrian accessibility and/or aesthetics.

There are several bollards which have been previously tested, but do not meet the requirements of AS/NZS 3845.2:2017. Their use should be based on their test outcomes (test impact speed, test vehicle mass and occupant injury parameters).

Bollards which have not been crash tested are classified as 'roadside furniture'. They may only be used in situations where there is no requirement for the occupants to be protected or hazards behind the bollards to be shielded.

Bollards for security purposes are not covered by AS/NZS 3845.2:2017 and are not covered by this technical advice; refer Commentary H of the Standard.

Recommendation

It is necessary to clearly define the purpose of a bollard installation. If occupants are to be protected or hazards behind the bollard are to be shielded then an AS/NZS 3845.2:2017 compliant road safety device is required.

It is recognised that at present there are no compliant bollards available. The use of bollards physically crash tested, but not to AS/NZS 3845.2:2017, may be suitable. A site specific risk assessment should be undertaken to ensure that the bollard has the ability to shield pedestrians and vulnerable road users and is safe for vehicle occupants at the proposed site. Typically these bollards would be only considered on roads with a 50 km/h operating speed.

It is recognised that there are situations where 'roadside furniture' bollards may be appropriate. Bollards of this nature should only be installed where there is a low risk of impacts by errant vehicles.