Stanilite®
Emergency lighting classification and spacing tables

Australian Standard AS2293.1-2005 specifies that the light level at the floor, under emergency lighting conditions, must be a minimum of 0.2 lux. The illuminance level at the floor will be dependent upon both the light output of the fitting and the height at which the fitting is mounted above the floor.

Emergency light fittings are tested and based on performance, assigned classifications to a number of classes (class A to class E). Fittings with a single light source are generally classified in two axis, C0 and C90. As an example, the Stanilite SF1LED Spitfire® has the classification C0: D40 and C90:D40. Fittings with two light sources such as a 2x36W batten are generally assigned classifications in three axis – C0, C90 and C180 as the light distribution is not symmetrical. As an example the ECBT236M has a classification of C0: D40, C90: C25 and C180: D32.

AS2293.1 includes tables (table 5.1 to table 5.5) which may be used to derive the maximum spacing between emergency light fittings for a range of mounting heights. As an example, to derive the maximum spacing between SF1LED Spitfire fittings which will be mounted at a height of 3m above the floor, Table 5.4 should be used. As the fitting has a D40/D40 classification, the table shows that the spacing between fittings cannot be greater than 18.6m in either the C0 or C90 axis.

Design of emergency lighting installations, generally, use as few fittings as are necessary to satisfy the requirements specified in AS2293.

This is significant because:
• Replacing a fitting in an existing installation with another type, without ensuring that the classification of the new fitting is equivalent to or better than the fitting being replaced, risks making the building non-compliant with the requirements of the Building Code of Australia (BCA).

Also of note:
• Should an ‘exit’ sign which has an emergency classification be replaced by a lesser fitting which does not have an emergency classification, then an emergency light fitting must be installed within 2m of the exit sign; failure to do so also risks making the building non-compliant with the requirements of the BCA.