

6.00 Staircases & Ramps

All the requirements of this Section are Mandatory.

6.01 Generally

Internal and external stairs and ramps shall comply in all respects with the requirements of the BCA and AS 1428 Part 1: New Buildings.

Ramps shall be provided externally as required to provide access to buildings for people with disabilities. The use of ramps internally as a means of interconnecting floors is not an acceptable alternative to providing a lift.

GU will not accept designs which combine maximum height risers with minimum width treads. Treads widths and riser heights shall generally comply with the requirements of AS 1428.2, with goings a minimum of 280mm wide.

6.02 Internal Stairs

There shall be a general circulation stair to access to all levels of the building to minimise the use of lifts. This circulation stair may be a fire isolated stair provided all access doors are controlled with magnetic hold open devices connected to the fire alarm system. The following points are to be considered in the design and placement of circulation stairs:

- Placement of stairs to maximise their visibility and use;
- Finishes to stair treads, risers and landings shall be ceramic tiles and walls shall be rendered and painted with matching tile skirting;
- Comply with the requirements of AS 1428.2;
- Design of stairs to be social spaces where conversations can occur;
- Design of stairs to act, where appropriate as natural ventilation shafts;
- Stairs shall be provided with natural light if possible.

Fire isolated stairs shall be provided to satisfy the requirements of the BCA and AS 1428.2. These stairs may be fully enclosed within the building envelope, or may be open framed stairs external to the building façade.

6.03 External Stairs and Ramps

Ramps for disabled access to buildings shall comply with the requirements of AS 1428.1.

The structural design of stair flights and ramps shall be to suit the actual ground conditions encountered.

6.04 Handrails

Internal general access stairs, including fire isolated stairs for general access, shall have stainless steel handrails to both sides.

Where the general access stairs are in an open well with exposed strings to flights, then a balustrade incorporating glass, perforated metal or other approved solid panels is desirable.

Handrails and balustrades to fire isolated stairs which are not general access stairs, may be galvanised steel.

6.05 Finishes

General use access stairs shall have a tiled finish to treads, risers and landings.

Tiles to stairs shall be non-slip to suit the application with tread, riser and nosing tile of a contrasting colour and matching grout. Tiled stair landings and walls adjoining stairs shall have a matching skirting tile ½ tile height or minimum 100mm high.

Refer to [Section 13.00 Floor Finishes](#), for details of the physical requirements of the tiles.

Fire isolated stairs, which are not general access stairs, shall have an integral non-slip finish to treads and landings, with a 'Yellow' painted nosing on both tread and landing edges.

Where carpet finishes are approved for internal non fire isolated stairs, tread nosings shall be aluminium with adhesive fixed contrasting coloured inserts.

All stair nosings shall be non-skid of dimensions to comply with AS 1428.2.

Consideration should be given to the use of 'self illuminating' nosings such as 'Ecoglo', where step edge contrast is required, or would be enhanced, in low light conditions.

6.06 Tactile Ground Surface Indicators (TGSIs)

Provide warning type TGSIs in accordance with the National Construction Code, Australian Standards AS1428.0 & 1428.4.1.

Directional type TGSIs shall be used where dictated by the needs of the specific project. CLF will advise when these indicators are appropriate based on advice from the University's Access Consultant.

TGSIs shall be selected to suit the particular application taking into account the substrate, appearance, consistency with surrounds, pedestrian/vehicular traffic, standards and code requirements.

The type of TGSIs to be used shall be selected from the following list of approved materials, and the selection made must be confirmed with the Superintendent before specifying or installing.

<u>TGSI Material</u>	<u>Manufacturer and/or Supplier</u>
Cork / rubber composite pads	Safety floor Australia Pty Ltd; Comcork (<i>see note below</i>)
Rubber pads	CTA Australia; PolyPad
Ceramic tiles	Australian Building Ceramics; Granito; CTA Australia; Cobble Tac
Granite/Basalt tiles	J.H. Wagner & Sons
Concrete paving units	Stone Directions; Urban Stone
Individual Stainless Steel Studs	Latham Australia; TI Series; CTA Australia; Sure Steel (<i>see note below</i>)

Note: The use of individual stainless steel stud indicators is not permitted except with the written approval of the Superintendent following the receipt of evidence as to the reasons why no other type of TGSIs is appropriate or practical. Surface fixed pad type TGSIs will also not be permitted except where other nominated types are not appropriate or practical.

TGSI tiles and pads shall be installed flush with the surrounding surfaces.

The following combination of surface finishes and TGSIs are acceptable;

Internally - New Buildings

Floor finish	TGSI material
Carpet tiles	Cork/rubber composite pads or Rubber pads
Resilient	Cork/rubber composite pads or Rubber pads

Ceramic tiles	Ceramic tiles
Stone paving	Granite/basalt tiles
In situ concrete (no applied finish)	Ceramic tiles

Internally – Existing buildings

Floor finish	TGSI material
Carpet tiles	Cork/rubber composite pads or Rubber pads
Resilient	Cork/rubber composite pads or Rubber pads
Ceramic/Quarry tiles	Ceramic tiles

Externally – New stairs & ramps

Material/finish	TGSI material
In situ concrete (broomed or exposed aggregate finish)	Concrete paving units; Granite/basalt tiles
Stone paving	Granite/basalt tiles
Ceramic tiles	Ceramic tiles

Externally – Existing stairs & ramps

Material/finish	TGSI material
In situ concrete (broomed or exposed aggregate finish)	Concrete paving units; Granite/basalt tiles
Concrete paving units	Concrete paving units; Granite/basalt tiles
Ceramic/quarry tiles	Ceramic tiles