

SECTION 608 - GEOTEXTILES

608.01 GENERAL

This section covers the requirements for the supply and handling of geotextiles for separation, filtration or drainage media at locations shown on the drawings or where specified.

608.02 SUPPLY OF MATERIALS

The Contractor shall supply the geotextiles specified in accordance with the requirements of this section of the specification. After delivery of the geotextiles to site, the Contractor shall ensure that the geotextiles are kept clean and undamaged and stored away from direct sunlight until covered. Any damaged or improperly stored geotextiles shall be replaced by the Contractor.

The Contractor shall provide evidence to the Engineer that the geotextile supplied under the Contract conforms with the appropriate requirements of this section of the Specification, prior to its use.

608.03 PROPERTIES OF GEOTEXTILES

(a) General

The geotextile shall consist of woven or non-woven fabric manufactured from synthetic fibres of a long chain polymer such as polypropylene, polyethylene, polyester or similar. The geotextile shall be stabilised against deterioration due to ultra-violet light. After forming, the geotextiles shall be processed so that the fibres retain their relative positions with respect to each other. The geotextiles shall be free from defects or flaws which significantly affect its physical and/or filtering properties.

(b) Robustness

The geotextile shall have a robustness (Geotextile Strength Rating - G) complying with the requirements of Table 608.031.

Table 608.031

Classification	Robustness (G)
Moderately Robust	900 - 1350
Robust	1350 - 2000
Very Robust	2000 - 3000
Extremely Robust	> 3000

G = Geotextile Strength Rating
= $\sqrt{L \times h50}$

L = Plunger failure load (N) as determined by AS 3706.4
Determination of Burst Strength; CBR Plunger Method

h50 = Plunger Failure Load (N) as determined by AS 3706.5
Determination of Puncture Resistance; Drop Cone Method

Where specified as a separation/filtration material, both woven and non-woven geotextiles shall have an equivalent opening size between 100 and 210 microns. The equivalent opening size determination shall be carried out in accordance with AS 3706.7 (Determination of Pore Size Distribution - Dry Sieving Method).

608.04 MEASUREMENT AND PAYMENT

The unit of measurement for supply of geotextiles shall be square metres.

Payment for the supply and delivery of geotextiles, including all labour, plant and materials required to do the work, shall be at the scheduled rate for all works completed in accordance with the specification.