DESIGN

Ceramic Patterned Glass

SSG® DuraScreen



SSG® DuraScreen is a single glass pane with a weather-resistant and non-ageing coloured ceramic enamel coating that is fused into the glass surface during the firing process, achieving an opaque and scratch-resistant finish. SSG® DuraScreen can be combined with clear or tinted glass substrates, as well as with high-performance coatings to reduce glare and improve solar control performance. The partial coatings allow sufficient daylight into spaces whilst restricting visual contact to exterior and adjoining spaces.

SSG® DuraScreen allows the creation of a subtle or bold look for the building - using patterns and colours. Standard or custom colours can be incorporated into a specific design element with the use of one of SSG®'s standard silk-screen patterns. Special gradation patterns can be used to control glare and heat whilst special graphic images can be made available to add an artistic touch to the building. It offers architects and designers the freedom to choose from a wide range of colours - providing the flexibility to create a unique design.

With its ultraviolet light and temperature resistant properties, SSG® DuraScreen is suitable for use in structural glazing, facades and wall cladding as the ceramic-based paint is permanently fused into the

glass substrate. It can also be ceramic frit flood coated glass for spandrel areas or a ceramic frit silk-screened glass for vision panels.

Note: Colour differences may be apparent between initial samples and actual supplies. This is due to unavoidable tolerances in substrate glass, difference in glass thickness and pigment differences in production. These differences are not and cannot be claimed as defects.

PERFORMANCE INFORMATION

SSG® DuraScreen is available in the following options: tempered (SSG® DuraScreen-T), tempered heat-soaked (SSG® DuraScreen-Q) or heat-strengthened (SSG® DuraScreen-HS).

SSG® DuraScreen-T is a single sheet safety glass, which by full tempering can be potentially at risk of spontaneous breakage due to the formation of nickel sulphide during glass production. However, through a heat-soaking process as in the fabrication of SSG® DuraScreen-Q, the risk of spontaneous breakage in tempered glass can be almost eradicated. On the other hand, SSG® DuraScreen-HS also has a low-risk of spontaneous breakage, breaking into larger pieces which tend to remain in the frame if breakage does happen. However, SSG® DuraScreen-HS is not a safety glass product.

PRODUCT FEATURES

MECHANICAL STRENGTH

SSG® DuraScreen is mechanically stronger than that of annealed glass of the same type and thickness.

SAFETY

SSG® DuraScreen has the characteristics of fully tempered glass in accordance with BS6206 & ANSI Z97.1. It has also achieved the AS/NZS 2208 certification for its excellent quality. The heat strengthened option, SSG® DuraScreen-HS is also available upon request.

SHADING FACTOR

SSG® DuraScreen saves on energy cost as it reduces solar heat transmittance with its screen of patterns and colours.

TEMPERATURE RESILIENCE

SSG® DuraScreen can withstand temperature up to 295°C and is approximately three times as resistant to rapid temperature changes (thermal shocks) as annealed glass. It can withstand changes of 150°C without breaking. This is extremely important for architectural glass used in facades, especially in the spandrel area.

USES AND APPLICATIONS

- Bathroom cladding Façade and wall cladding • Feature walls • Glass floors • Moveable partitions
- Naturally floodlit interiors
- Revolving / sliding doors
- Shower glass doors / screens
- Skylights Spandrel glass
- Staircase enclosures Structural glazing Table tops Vision panels

APPLICABILITY

Monolithic SSG® DuraScreen can be used in laminated or insulated glass to provide further mechanical strength and safety. SSG® Low Iron Glass is recommended as the base glass to bring out the true colour of the designs.

SPECIFICATIONS: Production Sizes

Glass Thickness (mm)	Minimum Size (W/mm x H/mm)	Maximum Size (W/mm x H/mm)
4 to 5	300 x 300	2,300 x 5,000
6 to 19		2,300 x 5,000