



## SCHOTT PYRAN PLATINUM FIRE-RATED CERAMICS Inspection and Quality Specifications

Schott Pyran Platinum Fire-Rated Ceramics are made by the float process to produce a product with impressive features:

- clear glass appearance
- higher light transmission and optical quality
- fire protection ratings without excessive thickness and weight.

The float process has improved the surface quality of this product, without the expensive surface grinding and polishing process required for some "premium" fire-rated products.

But, like any glass product, surface flaws can be detected if the glass is inspected in a manner inconsistent with its primary function – control of fire and smoke in fire-rated applications in commercial buildings.

And while the Platinum F has a plastic surface-applied film that provides impact safety at an economical price, the plastic film can reflect distorted images if examined closely.

These procedures are used to inspect Schott Pyran products.

An acceptable defect allowed under these procedures does not affect the fire rating or (if applicable) impact safety rating of the material.

### Inspection Process

The material is viewed at 10 feet in diffused light similar to daylight (not direct sunlight), perpendicular to the glass surface (90° straight on).

Defects not visible at 10 feet are allowed. For defects visible at 10 feet, the defect is evaluated as follows:

A differentiation is made between POINT and LINE defects.

POINT defects are glass blisters, inclusions, knots, and surface blemishes.

LINE defects are scratches, spots, or deposits that are found on inner or out glass surfaces.

For inspection purposes the glass is divided into three zones:

- the CENTRAL ZONE is a rectangle whose width and height are 80% of the width and height dimension of the lite.
- the OUTER ZONE extends from the outside edge of the CENTRAL zone to the GLAZED zone.
- the GLAZED ZONE extends from the edge of the lite to 11/16" from the edge of the lite.

Acceptable Defects

Acceptable defects do not influence the performance of the products. They do not represent cause for rejection or replacement. Acceptable defects are:

- Small closed blisters or bubbles
- Inclusions like crystals or stones and small defects at the surface
- Acceptable defects may not appear in clusters, the minimum distance between any two acceptable defects must be 50 mm (2 in.)
- Defects less than 0.5 mm (0.02 in.) are not considered unless they occur in clusters
- Ceramization scratches
- Dimpling and distortion of reflected, images in plastic film.

Line Defects and Scratches

Size of Defect	Accept/Reject
$\leq 2''$ $> 3''$	Allowed with 2" Separation in CENTER ZONE Allowed with 2" Separation in OUTER ZONE

Point Defects (Bubbles, Inclusions, Surface Defects) of Pyran Platinum

Size of Defect	Accept/Reject
$\leq 1/16''$ $\leq 1/8''$	Allowed with 2" Separation in CENER ZONE Allowed with 2" Separation in OUTER ZONE

Any defects shall be disregarded in the GLAZED ZONE extending 11/16" from the edge of the lite.