

Consultant's Corner

Understanding Edge Clearance

Learn the Basics Now to Avoid Problems Later

by Mark Baker

What is edge clearance and why is it important?

Edge clearance is the dimension between the glass edge and the nearest component of the framing system. It is required to accommodate building and thermal movement and prevent glass-to-metal contact.

In one particular project on which we just worked, the shop drawings for the project showed inadequate edge clearance. We advised the glazing subcontractor during our shop drawing review and he revised the drawings to show a rubber grommet on the fastener to protect the glass. We said it couldn't be done that way and the general contractor took a wait-and-see attitude. When the first lite of glass broke, we could hear the whispers of nickel sulfide inclusions. Then we removed the pressure plate and found glass-to-metal contact between the pressure plate fasteners and the glass.

For the record, any type of glass-to-metal contact is bad—glass-to-frame, glass-to-metal setting block chairs or glass-to-

fasteners. It will cause the glass to break wherever it occurs. The required edge clearance is dependent upon the thickness of the glass. Typically, 1/4-inch glass requires 1/4-inch edge clearance and 9/16-inch laminated requires 3/8-inch edge clearance, and so on.

The Glass Association of North America (GANA) Glazing Manual features a table of recommended face and edge clearance requirements which has become an industry standard.

Installing glass with less than the manufacturers' minimum edge distance requirement could void your warranty. Should a design or field condition result in edge distance less than that recommended by GANA or the glass manufacturer, we recommend that the glass manufacturer be consulted and the detail or condition be approved.

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