



## **Insulated Glass Unit line Capabilities**

### **Options & Possibilities**

- We can offer Double and triple glazed Insulated IGU combinations on our automatic lines
- Our current Maximum thickness of 58 mm (2.28".) for insulated units filled automatically, with a Maximum Size: 7,500 mm x 3,210 mm (24 ft. 6". x 10 ft. 6.38".)
- We stock a wide variety of warm edge composite and stainless steel and aluminum spacer bars, thickness range 6mm (1/4") to 25.5mm (1")
- There are a variety of high performance low E coatings including triple silver coated glass. We source from European glass suppliers (Guardian, Pilkington, Saint Gobain, AGC and Glass Trosch)
- As standard we arriss all glass edges on all of our Insulated Glass Units
- Our Insulated Glass units have a # 3 Low-E glass as standard unless otherwise specified
- We can achieve U values as low as 0.4 W/m<sup>2</sup>K (0.07 Btu/hr-ft<sup>2</sup>.f)
- Available with curved, printed, annealed, tempered and laminated glass
- Options available to install venetian, pleated or roller blinds within the sealed units

### **Toggle Systems**

We can install a variety of toggle systems that are fully tested for compatibility using Dow Corning silicones, and we actively seek approval and test evidence for other requested systems that are new to the market.

- Toggle system inserts approved by Dow Corning and Sika
- Choice of stainless steel fittings and bespoke brackets, glass fins, tension truss, etc
- Available in single, laminated, IGUs and curved options

### **Wall Glass Frameless Façades**

Our proprietary Wall Glass bolted façade system provides a fully flush surface with the superior quality, durability and performance of Carey Glass.

- Flush, curved, sloped and faceted façades with a wide range of fixing options

- Choice of steel fittings and columns, bespoke brackets, concrete columns, glass fins, tension trusses, cable nets, composites
- Concealed structures and hardware
- Available with curved, printed, annealed, tempered and laminated glass

### Structural Glazing

We are experienced experts in the structural bonding of glass and frames using Dow Corning 993, offering customers completed unitized frames bonded in-house to our high quality standards.

- We are certified with Dow Corning in accordance with ETAG-002, with annual auditing by Dow Corning to ensure continued compliance and approval.

### Tolerances for Insulated Glass Units

#### Thickness Tolerance on the Insulating Glass Units (IGU) when float glasses are used EN 1279/1-5.3.3 and ASTM E2190

**Table 3**

	First Pane (note 1)	Second Pane (note 1)	IGU Thickness Tolerance EU	IGU Thickness Tolerance ASTM
A	Annealed Glass	Annealed Glass	+ 1.0mm	+ 0.04"
B	Annealed Glass	Toughened or Strengthened glass (note 2)	+ 1.5mm	+ 0.06"
C	Annealed Glass Thickness ≤ 6 mm and total In Other Cases	Folio Laminated Glass (note 3) Thickness ≤ 12 mm	+ 1.0 mm + 1.5 mm	+ 0.04" + 0.06"
D	Annealed Glass	Patterned Glass	+ 1.5 mm	+ 0.06"
E	Toughened or Strengthened glass	Toughened or Strengthened glass	+ 1.5 mm	+ 0.06"
F	Toughened or Strengthened glass	Glass / Plastic composites (note 4)	+ 1.5 mm	+ 0.06"
G	Toughened or Strengthened glass	Patterned Glass	+ 1.5 mm	+ 0.06"
H	Glass / Plastic composites	Glass / Plastic composites	+ 1.5 mm	+ 0.06"
I	Glass / Plastic composites	Patterned Glass	+ 15 mm	+ 0.06"

Note 1	Pane Thicknesses are expressed as nominal values.
Note 2	Thermally Toughened safety glass, heat strengthen glass or Chemically strengthened Glass
Note 3	Laminated glass or Laminated Safety glass, consisting of two annealed float glass sheets (maximum thickness 12 mm each) and plastic sheet interlayer. For different assemblies of laminate glass or laminated safety glass , see EN 12543-5, and apply subsequently the calculation rule given in 5.3.3 (ANSI Z97.1-2015)
Note 4	Glass / Plastics composites are a form of laminated glass incorporating at least one pane of plastic glazing sheet material; EN 12543, (ANSI Z97.1-2015)