

TEXAS DEPARTMENT OF INSURANCE

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PRODUCT EVALUATION WIN-1448

Effective September 1, 2011

*The following product has been evaluated for compliance with the wind loads specified in the **International Residential Code (IRC)** and the **International Building code (IBC)**. This product shall be subject to reevaluation **May 2014**.*

This product evaluation is not an endorsement of this product or a recommendation that this product be used. The Texas Department of Insurance has not authorized the use of any information contained in the product evaluation for advertising, or other commercial or promotional purpose.

This product evaluation is intended for use by those individuals who are following the design wind load criteria in Chapter 3 of the IRC and Section 1609 of the IBC. The design loads determined for the building or structure shall not exceed the design load rating specified for the products shown in the limitations section of this product evaluation. This product evaluation does not relieve a Texas licensed engineer of his responsibilities as outlined in the Texas Insurance Code, the Texas Administrative Code, and the Texas Engineering Practice Act.

Traditional ES70 Vinyl Awning Windows and Awning Windows with a Fixed Window, New Construction or Replacement Windows, Non-impact Resistant, manufactured by

Silver Line Building Products
Route One North
P.O. Box 6029
North Brunswick, NJ 08902-6029
(732) 435-1000, Ext. 4288

and distributed under the following trade names:

Silver Line
American Craftsman (Home Depot)

will be acceptable in designated catastrophe areas along the Texas Gulf Coast when installed in accordance with the manufacturer's installation instructions and this product evaluation.

PRODUCT DESCRIPTION

The Traditional ES70 windows are vinyl awning windows and awning windows with a fixed window. The vinyl awning windows and awning windows with a fixed window may be installed as new construction windows or as replacement windows. The vinyl awning windows and awning windows with a fixed window evaluated in this report are individual, non-impact resistant, windows. This product evaluation report is for vinyl awning windows and awning windows with a fixed window based on the following tested constructions:

General Description:

System	Description	Label Rating
1	Traditional ES70 Vinyl Awning Windows; Triple Vertical Awning; (X.X.X)	CW-PG40 48 x 108
2	Traditional ES70 Vinyl Awning Windows; Twin Vertical Awning; (X.X)	CW-PG40 48 x 72
3	Traditional ES70 Vinyl Awning Windows; Twin Horizontal Awning; (X.X)	CW-PG50 96 x 36
4	Traditional ES70 Vinyl Awning Windows; Single Horizontal Awning; (X)	CW-PG50 48 x 36

General Description (continued):

System	Description	Label Rating
5	Traditional ES70 Vinyl Awning Windows; Triple Horizontal Awning; (X.X.X)	CW-PG50 108 x 36
6	Traditional ES70 Vinyl Awning Windows; Twin Horizontal Awning with Center Fixed Window; (X.O.X)	CW-PG50 108 x 36

Product Dimensions:

System	Overall Size	Operable Vent Size	Fixed Vent Size
1	48" x 108"	Three - 46" x 34 1/2"	N/A
2	48" x 72"	Two - 46" x 34 1/2"	N/A
3	95 1/4" x 36"	Two - 46" x 34"	N/A
4	47 5/8" x 36"	One - 46" x 34"	N/A
5	108" x 36"	Three - 34 5/8" x 34 1/2"	N/A
6	108" x 36"	Two - 25 5/8" x 34"	52 3/8" x 34"

Glazing Description:

System	Glass Construction ¹	Glazing Method ²
1	IG-1	GM-1
2	IG-1	GM-1
3	IG-1	GM-1
4	IG-1	GM-1
5	IG-1	GM-1
6	IG-1	GM-1

Note: ¹ See the "Glass Construction Key" for the glazing construction.

² See the "Glazing Method Description Key" for the glazing method description.

Glass Construction Key:

IG-1: The vent contains a sealed insulating glass unit. The sealed insulating glass unit in the tested assembly is comprised of two single strength (3/32") annealed glass lites separated by a U-shaped spacer system. The glass thickness and type used in the insulating glass unit of the tested assembly and in smaller assemblies shall comply with ASTM E 1300-04.

Glazing Method Description Key:

GM-1: The insulated glass unit is set from the exterior against a bead of silicone sealant. The insulating glass unit is secured to the frame with vinyl glazing beads.

Frame Construction: The frame members are constructed of extruded vinyl (PVC). The frame corners are mitered and welded construction. The intermediate frame jambs are coped, butted, and sealed with a custom cut self-adhesive foam pad and are secured together with screws at each end.

Vent Construction: The vent members are constructed of extruded vinyl (PVC). The vent corners are mitered and welded construction. **System 6:** The center fixed vent is secured to the frame through vinyl guide blocks with screws.

Reinforcement

Systems 1, 2, and 6: Extruded aluminum reinforcement is utilized in the intermediate frame rail, the sill, the side jambs, and the vent top and bottom rails. The reinforcement extends the length of the members.

Systems 3, 4, and 5: Extruded aluminum reinforcement is utilized in the intermediate frame rail, the side jambs, and the vent top and bottom rails. The reinforcement extends the length of the members.

Hardware (per vent):

- Roto crank; One (1) required; Located on the sill.
- Snubber with adjacent keepers; One (1) required; Located on the top rail.
- Single bar hinge; Two (2) required; Located on each side jamb.
- Locking handle with adjacent keeper; Two (2) required; Located on the lock stiles.

Product Identification:

System 1: A certification program label (WDMA) will be affixed to the window. The certification program label includes the manufacturer's name; the product name: **Trad Triple Awning-Vertical**; performance characteristics; the approved inspection agency (WDMA); and the applicable standard: AAMA/WDMA/CSA 101/I.S.2/A440-08.

System 2: A certification program label (WDMA) will be affixed to the window. The certification program label includes the manufacturer's name; the product name: **Trad Twin Awning-Vertical**; performance characteristics; the approved inspection agency (WDMA); and the applicable standard: AAMA/WDMA/CSA 101/I.S.2/A440-08.

System 3: A certification program label (WDMA) will be affixed to the window. The certification program label includes the manufacturer's name; the product name: **Trad Flush Fin ATW Twin Horizontal** or **Traditional ATW-Twin Horizontal**; performance characteristics; the approved inspection agency (WDMA); and the applicable standard: AAMA/WDMA/CSA 101/I.S.2/A440-08.

System 4: A certification program label (WDMA) will be affixed to the window. The certification program label includes the manufacturer's name; the product name: **Trad Flush Fin Awning-Single** or **Traditional Awning-Single**; performance characteristics; the approved inspection agency (WDMA); and the applicable standard: AAMA/WDMA/CSA 101/I.S.2/A440-08.

Systems 5 and 6: A certification program label (WDMA) will be affixed to the window. The certification program label includes the manufacturer's name; the product name: **Trad Flush Fin ATW-Triple** or **Trad Triple Awning-Horizontal**; performance characteristics; the approved inspection agency (WDMA); and the applicable standard: AAMA/WDMA/CSA 101/I.S.2/A440-08.

LIMITATIONS

Design pressures (DP):

System	Maximum Width (in.)	Maximum Height (in.)	Design Pressure (psf)
1	48	108	± 40
2	48	72	± 40
3	95 $\frac{1}{4}$	36	± 50
4	47 $\frac{5}{8}$	36	± 50

Design pressures (DP) - continued:

System	Maximum Width (in.)	Maximum Height (in.)	Design Pressure (psf)
5	108	36	± 50
6	108	36	± 50

Impact Resistance: These window assemblies do not satisfy the Texas Department of Insurance's criteria for protection from windborne debris. These window assemblies will need to be protected with an impact protective system when installed in areas where windborne debris protection is required.

Acceptance of Smaller Assemblies: Window assemblies with dimensions equal to or smaller than those specified above are acceptable within the limitations specified in this report.

INSTALLATION INSTRUCTIONS

General: The window assembly shall be prepared and installed in accordance with the manufacturer's recommended installation instructions. Detailed installation instructions and drawings are available from the manufacturer.

Installation:

Systems 1 and 2:

Fin Installation to Wood: The wall framing shall be minimum Spruce-Pine-Fir lumber. The window is secured to the wall framing members using the window nailing fin with either No. 8 x 1 3/4" screws or 11 gauge x 1 3/4" roofing nails. The fasteners shall be located approximately 3 inches from each corner and approximately 5 inches on center along the perimeter of the window. The fasteners shall be long enough to penetrate a minimum of 1 1/2 inches into the wall framing. The window shall be set in a bed of silicone.

Frame Installation to Wood: The wall framing shall be minimum Spruce-Pine-Fir lumber. The window is secured to the wall framing members using the window frame head and side jambs with minimum No. 8 x 1 3/4" screws. The fasteners shall be located approximately 3 inches from each corner, 3 inches on either side of the intermediate frame members, and approximately 18 inches on center. The fasteners shall be long enough to penetrate a minimum of 1 1/2 inches into the wall framing. The window shall be set in a bed of silicone.

Frame Installation to Concrete or CMU: The wall framing shall be precast concrete, cast in place concrete, or concrete masonry units (CMU) construction. Hollow CMU is acceptable. The window is secured to the wall framing members using the window frame head and side jambs with minimum 3/16" diameter Tapcon anchors. The fasteners shall be located approximately 3 inches from each corner, 3 inches on either side of the intermediate frame members, and approximately 18 inches on center. The fasteners shall be long enough to penetrate a minimum of 1 1/4 inches into the wall framing and shall be located a minimum of 2 5/8 inches from the edge of the opening. The window shall be set in a bed of silicone.

Systems 3, 4, and 5:

Fin Installation to Wood: The wall framing shall be minimum Spruce-Pine-Fir lumber. The window is secured to the wall framing members using the window nailing fin with either No. 8 x 1 3/4" screws or 11 gauge x 1 3/4" roofing nails. The fasteners shall be located approximately 3 inches from each corner and approximately 4 1/2 inches on center along the perimeter of the window. The fasteners shall be long enough to penetrate a minimum of 1 1/2 inches into the wall framing. The window shall be set in a bed of silicone.

Systems 3, 4, and 5 (continued):

Frame Installation to Wood: The wall framing shall be minimum Spruce-Pine-Fir lumber. The window is secured to the wall framing members using the window frame head, sill, and side jambs with minimum No. 8 x 1 $\frac{3}{4}$ " screws. Along the head, the fasteners shall be located approximately 3 inches from each corner, 3 inches on either side of each intermediate frame member, and approximately 18 inches on center. Along the side jambs, the fasteners shall be located approximately 3 inches from each corner and approximately 18 inches on center. Along the sill, minimum $\frac{1}{2}$ " x $\frac{3}{4}$ " wood blind stops are required along the interior and the exterior. The fasteners are spaced approximately 3 inches from each corner and approximately 5 inches on center. The fasteners shall be long enough to penetrate a minimum of 1 $\frac{1}{2}$ inches into the wall framing. The window shall be set in a bed of silicone.

Frame Installation to Concrete or CMU: The wall framing shall be precast concrete, cast in place concrete, or concrete masonry units (CMU) construction. Hollow CMU is acceptable. The window is secured to the wall framing members using the window frame head, sill, and side jambs with minimum $\frac{3}{16}$ " diameter Tapcon anchors. Along the head, the fasteners shall be located approximately 3 inches from each corner, 3 inches on either side of each intermediate frame member, and approximately 18 inches on center. Along the side jambs, the fasteners shall be located approximately 3 inches from each corner and approximately 18 inches on center. Along the sill, minimum $\frac{1}{2}$ " x $\frac{3}{4}$ " wood blind stops are required along the interior and the exterior. The fasteners are spaced approximately 3 inches from each corner and approximately 5 inches on center. The fasteners shall be long enough to penetrate a minimum of 1 $\frac{1}{4}$ inches into the wall framing and shall be located a minimum of 2 $\frac{5}{8}$ inches from the edge of the opening. The window shall be set in a bed of silicone.

System 6:

Fin Installation to Wood: The wall framing shall be minimum Spruce-Pine-Fir lumber. The window is secured to the wall framing members using the window nailing fin with either No. 8 x 1 $\frac{3}{4}$ " screws or 11 gauge x 1 $\frac{3}{4}$ " roofing nails. The fasteners shall be located approximately 3 inches from each corner and approximately 4 $\frac{1}{2}$ inches on center along the perimeter of the window. The fasteners shall be long enough to penetrate a minimum of 1 $\frac{1}{2}$ inches into the wall framing. The window shall be set in a bed of silicone.

Frame Installation to Wood: The wall framing shall be minimum Spruce-Pine-Fir lumber. The window is secured to the wall framing members using the window frame head, sill, and side jambs with minimum No. 8 x 1 $\frac{3}{4}$ " screws. Along each side jamb, the fasteners shall be located approximately 3 inches from each corner and approximately 17 inches on center. Along the head, the fasteners shall be located approximately 3 inches from each corner, 3 inches on either side of each intermediate frame member, and one (1) at the mid span of each window. Along the sill, minimum $\frac{1}{2}$ " x $\frac{3}{4}$ " wood blind stops are required along the interior and exterior side of the sill. The fasteners are spaced approximately 3 inches from each corner and approximately 5 inches on center. The fasteners shall be long enough to penetrate a minimum of 1 $\frac{1}{2}$ inches into the wall framing. The window shall be set in a bed of silicone.

Frame Installation to Concrete or CMU: The wall framing shall be precast concrete, cast in place concrete, or concrete masonry units (CMU) construction. Hollow CMU is acceptable. Along each side jamb, the fasteners shall be located approximately 3 inches from each corner and approximately 17 inches on center. Along the head, the fasteners shall be located approximately 3 inches from each corner, 3 inches on either side of each intermediate frame member, and one (1) at the mid span of each window. Along the sill, minimum $\frac{1}{2}$ " x $\frac{3}{4}$ " wood

blind stops are required along the interior and exterior side of the sill. The fasteners are spaced approximately 3 inches from each corner and approximately 5 inches on center. The fasteners shall be long enough to penetrate a minimum of $1\frac{1}{4}$ inches into the wall framing and shall be located a minimum of $2\frac{5}{8}$ inches from the edge of the opening. The window shall be set in a bed of silicone.

Note: The manufacturer's installation instructions shall be available on the job site during installation. All fasteners shall be corrosion resistant as specified in the International Residential Code (IRC); the International Building Code (IBC); and the Texas Revisions.