

TEXAS DEPARTMENT OF INSURANCE

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PRODUCT EVALUATION SHU-175

Effective January 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 January 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.

Bahama Shutters manufactured by:

Town & Country Industries
400 West McNab Road
Fort Lauderdale, Florida 33309
(954) 970-9999

will be accepted for use in designated catastrophe areas along the Texas Gulf Coast when installed in accordance with this product evaluation along with Town & Country Colonial Shutter drawings prepared by Engineering Express, drawing 10-TCM-0003, sheets 1-5 of 5, dated June 8, 2010, signed and sealed by Frank L. Bennardo, P.E. on August 25, 2010.

PRODUCT DESCRIPTION

Bahama shutters are constructed from 6063 T-6 extruded aluminum alloy, $F_y = 25$ ksi. Each panel consists of an extruded aluminum section in the jambs, header and sill. The header and sill members are notched to allow the jamb members to slide into the horizontal frame members. The header and sill are attached to the jambs using (2) $\frac{1}{4}$ x 1" long stainless steel sheet metal screws (minimum 304) at each corner. At the jamb locations, the jamb snap member snaps into the jamb piece. The male and female mullion members slide together to form an intermediate mullion. The intermediate mullion is mechanically fastened to the header and the sill member using (2) $\frac{1}{4}$ x 3" long stainless steel sheet metal screws (minimum 304). The blades are attached to either end of the shutter framing members (jamb and mullion members) using a No. 10 x 2" long 410 HT stainless steel sheet metal fastener. The blades are also attached at either end to a $\frac{3}{4}$ x $\frac{3}{4}$ x 0.062" thick aluminum angle located at each jamb with a No. 6 x $\frac{3}{8}$ " long stainless steel minimum 304) sheet metal screw. The header is not mechanically fastened to the header hinge. The header slides into the continuous header hinge. The mullions parts 2 and 3 are reinforced with a galvanized steel channel with overall cross-section dimensions of 0.500" x 0.700" x 0.500". The steel reinforcement slides into the intermediate mullion and is fitted into the extrusion. The shutters are secured to the structure through the hinges and wall mount or build out brackets. The shutters may be secured to concrete, concrete hollow block or wood framing.

Product Identification: Each unit must bear a permanent label containing the manufacturer's name, type of shutter, Missile Level D and applicable standards: ASTM E 1886, ASTM E 1996 and ASTM E 330.

LIMITATIONS

Design Wind Pressure:

Max. Shutter Span (inches)	Configuration		
	Single Panel Span (psf)	Multi Panel Span	
		W/O Beam (psf)	W/Beam (psf)
69	+78/-95	+78/-95	+78/-95
81 $\frac{5}{8}$	+78/-95	± 50	+78/-95
96 $\frac{3}{4}$	± 50	± 50	+78/-95

Note: Shutters must be in a closed and locked position to achieve allowable design pressure rating.

Impact Resistance: This shutter assembly satisfies the Texas Department of Insurance's criteria for protection from windborne debris in both the Inland I zone and the Seaward zone. The shutter assemblies passed Missile Level D specified in ASTM E 1996-06. The shutter assemblies may be installed at any height on the structure as long as the design pressure rating for the assemblies is not exceeded.

INSTALLATION INSTRUCTIONS

General Installation Requirements:

All shutters shall be installed in accordance with the approved drawings.

Anchorage:

All hinges, angles, Z-bars and other mounting brackets shall be anchored to the structure in accordance with the approved drawings. For attachment to wood framing, the wood framing members shall be minimum Spruce-Pine-Fir (G=0.42) or greater.

Note: The manufacturer's installation instructions and the approved drawings 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 Revision.