W. W. Schaefer Engineering & Consulting, P.A. (CA #6809)

7480 150th Court North Palm Beach Gardens, FL 33418 Phone (561)744-3424

ENGINEER'S EVALUATION REPORT #WWS-203

Prepared for:

Signature Door, Inc. 401 Priority Street Altoona, PA 16602 Phone: 800-741-2265

Prepared by:

Warren W. Schaefer, P.E. Florida Professional Engineer #44135

Manufacturer: Signature Door, Inc.

Product Category: Windows

Evaluation Method: 1-D (Engineer's evaluation)

Product model & name: Direct Glazed Impact Wood Impact Window

Documents that must accompany this report:

1. W. W. Schaefer Engineering & Consulting drawing No. 1780

Window size restrictions and assembly requirements:

See drawing NO. 1780

Maximum allowable design pressure:

+65/-75 PSF

Installation requirements:

See drawing No. 1780

Code compliance:

Code section(s) considered with this evaluation:

FBC Chapter 17

Wood Coatings:

All wood members shall be of an approved durable species or be treated in an approved method with an approved preservative per applicable codes and standards.

Glass:

All glass meets the current ASTM E1300 standard.

Test Standards applicable to the testing of these windows:

TAS-201, 202 & 203 (some units were tested to PA-201, 202 & 203 which are found to be equivalent to TAS-201, 202 & 203)

Test Laboratory: Hurricane Test Laboratory, Inc. (Currently Architectural Testing, Inc).

<u>Test report numbers:</u> 0243-1012-03, 0243-0516-04, 0243-0608-03, 0243-0319-04, 0243-0322.-01, 0243-0802-01,0243-0605-01 & 0243-0929-01. Note that all HVHZ test reports have been signed & sealed by a Florida PE.

General report notes & system limitations:

- 1. All size & installation conditions shown in this report and the referenced drawing No. 1780 are based off the referenced test reports and/or engineering analysis in accordance with the Florida Building Code.
- 2. Windows shall be constructed in accordance with the descriptions in this report, and the manufacturer's state approved quality assurance entity specifications.
- 3. This product is approved for use in & outside of the High Velocity Hurricane Zones (HVHZ).
- 4. Job required design wind pressure shall be calculated in accordance with the Florida Building Code Chapter 16 and ASCE 7 Minimum Design Loads for Buildings and Other Structures (0.85 directionality factor may apply per the current ASCE 7 standard).
- 5. These windows are both small & large missile impact rated for use in wind zone 4 & missile level "D" locations and need not be shuttered.
- 6. When applicable, all safety glass requirements must be met per FBC.

Quality Assurance Entity: National Accreditation and Management Institute

AUG 1 4 2017

Warren W. Schaefer, P.E.

Florida P.E. #44135