

# STRUCTURAL SOLUTIONS, P.A.\*

Structural Engineering ■ Investigations ■ Consulting

## GARAGE DOOR EVALUATION REPORT

|                        |                                                                         |  |                 |                               |                 |              |                 |  |                 |  |
|------------------------|-------------------------------------------------------------------------|--|-----------------|-------------------------------|-----------------|--------------|-----------------|--|-----------------|--|
| Garage Door No.:       | IRC-1218-130-24-M                                                       |  | Test Date:      | 4/17/2018                     |                 | Project No.: | 18-035          |  |                 |  |
| Design Pressures:      | +25.4 psf, -28.7 psf                                                    |  | Report Date:    | 10/21/2020                    |                 | Model #      | 1200            |  |                 |  |
| Test Pressures:        | +38.1 psf, -43.1 psf                                                    |  | Test Location:  | Entrematic, Winston-Salem, NC |                 |              |                 |  |                 |  |
| ASCE 7-16<br>Criteria: | Up to 5 Feet of Door Width in Zone 5; Any Roof Slope; Enclosed Building |  |                 |                               |                 |              |                 |  |                 |  |
|                        | Exp. B, 30' MRH                                                         |  | Exp. C, 15' MRH |                               | Exp. C, 25' MRH |              | Exp. D, 15' MRH |  | Exp. D, 25' MRH |  |
|                        | 168 mph                                                                 |  | 152 mph         |                               | 145 mph         |              | 138 mph         |  | 133 mph         |  |

### Reference Test Report and Drawing:

- Structural Solutions, P.A.\* Garage Door Static Pressure Test Report for IRC-1218-130-24-M dated 10/21/2020
- Entrematic Drawing number IRC-1218-130-24-M dated 7/25/2018

### Description of Test Specimen:

18'-0"x7'-0" Model 1200, 24ga exterior / 27ga interior steel garage door as shown in drawing IRC-1218-130-24-M.

### Test Standards and Report Conclusion:

The above referenced Test Report states the following:

- The tests were conducted in accordance with ASTM E330-14 and DASMA 108-12.
- The test was witnessed and certified by Thomas L. Shelmerdine, PE (FL PE# 48579)
- The test facility at Entrematic is accredited by the American Association for Laboratory Accreditation, Certificate #2595.01.

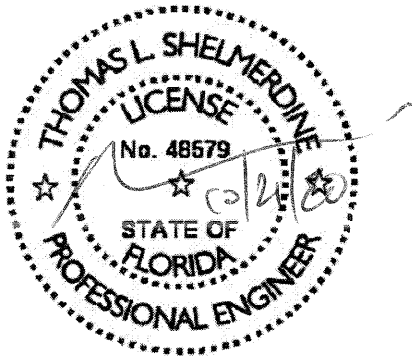
### Summary:

The 18'-0"x7'-0" Model 1200 as described on drawing IRC-1218-130-24-M meets or exceeds the testing criteria as described above. By comparison to the construction of the 18'-0"x7'-0" Model 1200, the following doors also meet or exceed the above testing criteria, when constructed in accordance with drawing IRC-1218-130-24-M:

- 18' x 7' Heritage 3000 doors, which is an alternate name for Model 1200
- 18' x 7' Oak Summit 3000 doors, which has an alternate embossment pattern in the skin
- Short, Long, Flush, and Oak Summit Panels, which are alternate embossment patterns in the skin
- Model 1200, Heritage 3000 and Oak Summit 3000 doors up to 18'-0" wide and up to 14'-0" high
- Up to 8 short panel windows (18-1/8" x 10-5/8") or up to 4 long panel windows (38-1/8" x 10-5/8") of 3/32" annealed glass minimum (meets ASTM E1300-04) may be installed in each section

To the best of my knowledge, the above garage door conforms to the requirements of the Florida Building Code 7th Edition (2020).

Submitted By:



**STRUCTURAL SOLUTIONS, P.A.\*** (\*Florida: dba Structural Solutions of North Carolina, Inc., Firm #29412)

Thomas L. Shelmerdine, PE (NC PE #14654; Florida PE #0048579)

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