

## Product Guide Specification

Specifier Notes: This product guide specification is written according to the Construction Specifications Institute (CSI) 3-Part Format, including *MasterFormat*, *SectionFormat*, and *PageFormat*, as described in *Construction Specifications Practice Guide*.

This section must be carefully reviewed and edited by the Architect to meet the requirements of the project and local building code. Coordinate this section with other specification sections and the Drawings. Delete all "Specifier Notes" after editing this section.

Section numbers and titles are from *MasterFormat 2012 Update*.

### SECTION 08 32 16

#### SLIDING PLASTIC-FRAMED GLASS DOORS

Specifier Notes: This section covers Simonton Windows "ProFinish Brickmould 600 Series" vinyl patio doors. Consult Simonton Windows for assistance in editing this section for the specific application.

#### PART 1 GENERAL

##### 1.1 SECTION INCLUDES

- A. Vinyl patio doors.

##### 1.2 RELATED REQUIREMENTS

Specifier Notes: Edit the following list of related sections as necessary. Limit the list to sections with specific information that the reader might expect to find in this section, but is specified elsewhere.

- A. Section 06 10 00 – Rough Carpentry.
- B. Section 06 20 00 – Finish Carpentry.
- C. Section 06 40 13 – Exterior Architectural Woodwork.

- D. Section 07 92 00 – Joint Sealants.

### 1.3 REFERENCE STANDARDS

Specifier Notes: List standards referenced in this section, complete with designations and titles. Delete standards not included in the edited section.

- A. American Architectural Manufacturers Association (AAMA):
  - 1. AAMA 502 – Voluntary Specification for Field Testing of Newly Installed Fenestration Products.
- B. American Architectural Manufacturers Association/Window & Door Manufacturers Association/Canadian Standards Association (AAMA/WDMA/CSA):
  - 1. AAMA/WDMA/CSA 101/I.S.2/A440 – North American Fenestration Standard/Specification for Windows, Doors, and Skylights.
- C. National Fenestration Rating Council (NFRC):
  - 1. NFRC 100 – Procedure for Determining Fenestration Product U-factors.
  - 2. NFRC 200 – Procedure for Determining Fenestration Product Solar Heat Gain Coefficient and Visible Transmittance at Normal Incidence.

### 1.4 PREINSTALLATION MEETINGS

Specifier Notes: Edit preinstallation meetings as necessary. Delete if not required.

- A. Convene preinstallation meeting 2 weeks before start of installation of vinyl patio doors.
- B. Require attendance of parties directly affecting work of this section, including Contractor, Architect, installer, and manufacturer's representative.
- C. Review materials, preparation, installation, field quality control, adjusting, cleaning, protection, and coordination with other work.

### 1.5 SUBMITTALS

Specifier Notes: Edit submittal requirements as necessary. Delete submittals not required.

- A. Comply with Section 01 33 00 – Submittal Procedures.
- B. Product Data: Submit manufacturer's product data, including preparation and installation instructions.
- C. Shop Drawings: Submit manufacturer's shop drawings, including elevations, sections, and details, indicating dimensions, tolerances, materials, components, fabrication, glazing, fasteners, hardware, finish, options, and design.

- D. Samples: Submit manufacturer's samples of colors and finishes of vinyl patio doors and hardware, minimum 2 inches by 4 inches.
- E. Manufacturer's Certification: Submit manufacturer's certification that materials comply with specified requirements and are suitable for intended application.
- F. Test Reports: Submit manufacturer's test reports from independent testing agency indicating vinyl patio doors meet or exceed specified performance requirements.
- G. Manufacturer's Project References: Submit manufacturer's list of successfully completed vinyl patio door projects, including project name and location, name of architect, and type and quantity of vinyl patio doors furnished.
- H. Installer's Project References: Submit installer's list of successfully completed vinyl patio door projects, including project name and location, name of architect, and type and quantity of vinyl patio doors installed.
- I. Operating and Cleaning Instructions: Submit manufacturer's operating and cleaning instructions.
- J. Warranty Documentation: Submit manufacturer's standard warranty.

## **1.6 QUALITY ASSURANCE**

- A. Manufacturer's Qualifications: Manufacturer regularly engaged, for past 10 years, in manufacture of vinyl patio doors of similar type to that specified.
- B. Installer's Qualifications:
  1. Installer regularly engaged, for past 10 years, in installation of vinyl patio doors of similar type to that specified.
  2. Employ persons trained for installation of vinyl patio doors.

Specifier Notes: Edit mock-ups as necessary. Delete if not required.

- C. Mock-ups: Construct mock-ups of vinyl patio doors for evaluation of preparation techniques and installation workmanship.
  1. Construct mock-ups using same materials for use in the Work.
  2. Construct mock-ups at locations determined by Architect.
  3. Do not proceed until workmanship of mock-ups are approved by Architect.
  4. Approved Mock-ups: Standard for workmanship of vinyl patio doors.

## **1.7 DELIVERY, STORAGE, AND HANDLING**

- A. Delivery and Acceptance Requirements: Deliver materials to site in manufacturer's original, unopened containers and packaging, with labels clearly identifying product name and manufacturer.
- B. Storage and Handling Requirements:
  1. Store and handle materials in accordance with manufacturer's instructions.

2. Keep materials in manufacturer's original, unopened containers and packaging until installation.
3. Store materials in clean, dry area indoors.
4. Do not store materials directly on floor.
5. Protect materials and finish during storage, handling, and installation to prevent damage.

## **1.8 WARRANTY**

- A. Warranty Period:
1. Vinyl: Lifetime.
  2. Glass: 20 years.
  3. Hardware: Lifetime.
  4. Screen: Lifetime.
  5. Simulated Divided Lites: 10 years.

## **PART 2 PRODUCTS**

### **2.1 MANUFACTURER**

- A. Simonton Windows, 3948 Townsfair Way, Suite 200, Columbus, Ohio 43219. 800-746-6686. [www.simonton.com](http://www.simonton.com). [archdetails@simonton.com](mailto:archdetails@simonton.com).

### **2.2 PERFORMANCE REQUIREMENTS**

- A. Test vinyl patio doors in accordance with AAMA/WDMA/CSA 101/I.S.2/A440.
1. Welded Corner Test: Meet or exceed standard.
  2. Deglazing Test: Meet or exceed standard.
  3. Air Infiltration:
    - a. Based on static pressure of 1.57 psf (25 mph).
    - b. Do not exceed 0.3 scfm per square foot.
  4. Operating Force:
    - a. Average of forces required to open and close unit.
    - b. Maximum Allowable Pound Force: 30 lbf for vertical sliders.
  5. Minimum Water Resistance: 7.50 psf, R50 rating.
  6. Minimum Structural Test Pressure: Plus or minus 75.0 psf, R50 rating.
  7. U-Factor, Total Unit, NFRC 100: \_\_\_\_\_.
  8. R-Value, Total Unit: \_\_\_\_\_.
  9. Visible Transmittance, Total Unit, NFRC 200: \_\_\_\_\_.
  10. UV Block, Center of Glass, UV Transmissions from 300 to 380 nm: \_\_\_\_\_.
  11. Patio Door Certification:
    - a. Test vinyl patio doors to AAMA Gold Label Certification Program for thermal performance and air, water, and structural integrity.
    - b. Provide certification label on each patio door.

## 2.3 VINYL PATIO DOORS

Specifier Notes: Specify required standard and optional features for the vinyl patio doors. Not all combinations of features are available. Consult Simonton Windows for availability of specific combinations of features.

- A. Vinyl Patio Doors: “ProFinish Brickmould 600 Series” patio doors.

Specifier Notes: Specify vinyl patio doors in standard or custom sizes. Consult Simonton Windows for availability of custom-size patio doors.

- B. Size: [\_\_\_\_\_] [Indicated on the Drawings].

- C. Frame and Sash Color:

Specifier Notes: Specify frame and sash color.

1. Interior: [White] [Driftwood] [Light Woodgrain] [Dark Woodgrain].
2. Exterior: [White] [Brick] [Bronze] [Chocolate] [Cream] [Driftwood] [Pine] [Tan].

- D. Glass:

Specifier Notes: A variety of glass options are available. Consult Simonton Windows for more information.

1. Gas Fill: Argon.
2. Glass Strength: [Double strength] [Double strength, tempered].
3. Glass Type: [“ProSolar” Low E] [“Solarcool” Bronze] [“ProSolar” Shade Low E] [Tinted] [Bronze Tinted] [Grey Tinted] [Obscure] [“SafePoint” impact resistant].
4. Insulating Glass Unit Thickness: 3/4 inch.
5. Panes of Glass: Dual pane.
6. Spacer System: [“Intercept”] [“Super Spacer”].
7. Glass Packages: [Energy Star, optimized by region] [Custom].

- E. Grid:

1. Color:
  - a. Interior: [White] [Driftwood] [Light Woodgrain] [Dark Woodgrain].
  - b. Custom Exterior (Color-Matched Interior): [Brick] [Bronze] [Chocolate] [Cream] [Driftwood] [Pine] [Tan].
2. Size: [5/8 inch] [1 inch].
3. Style: [Colonial] [Diamond] [Perimeter] [Double Perimeter] [Prairie] [Double Prairie].
4. Type: [Flat] [Sculptured] [1-inch contoured] [Simulated divided lites].

- F. Frame:

1. Construction: Welded.
2. Depth: 5-1/2 inches.
3. Exterior Aesthetics: Brickmould/J-channel, multi-tiered profile.

4. Installation Accessories: Flat casing trim.
5. Screen Track: Integral.
6. Sill Design: Sloped sill.
7. Weatherstripping: Dual-fin seal weatherstripping.

G. Sash:

1. Construction: Welded.
2. Door Styles: [Single-panel configuration] [Three-panel configuration].
3. Glazing Bead:
  - a. Aesthetics: Contoured.
  - b. Color: Color matched.
4. Meeting Rails: Integral interlock.
5. Operation: Sliding.
6. Weatherstripping: Dual-fin seal weatherstripping.

H. Hardware:

1. Locking System:
  - a. Type: [Single point] [Multi-point single lever].
  - b. Material: Metal.
2. Handle:
  - a. Keyed lock.
  - b. Contoured handle.
3. Finish: [White] [Dark Bronze] [Driftwood] [Polished Brass] [Antique Brass] [Brushed Nickel] [Oil-rubbed Bronze].
4. Rollers/Gliders:
  - a. Material: Corrosion resistant.
  - b. Type: Tandem rollers.

I. Screen:

1. Frame: Rollformed.
2. Mesh: Fiberglass.
3. Size: Half.

J. Side Lites:

1. Size: [\_\_\_\_\_] [Indicated on the Drawings].
2. Color: Match vinyl patio doors.
3. Glass: Match vinyl patio doors.
4. Grid: Match vinyl patio doors.

K. Transoms:

1. Size: [\_\_\_\_\_] [Indicated on the Drawings].
2. Color: Match vinyl patio doors.
3. Glass: Match vinyl patio doors.
4. Grid: Match vinyl patio doors.

Specifier Notes: Delete capillary tubes if not required.
--

L. Capillary tubes.

M. Installation Items: Integral brickmould/J-channel with nailing fin.

Specifier Notes: Specify jamb extenders in wood or cellular PVC. Delete jamb extenders if not required.

N. Jamb Extenders:

1. Factory attached to vinyl patio doors.
2. Wood: Finger-jointed, primed, [clear pine] [oak].
3. Cellular PVC: "Quick Trim", [white] [driftwood] ["Clearwood"].
4. Flex Clips: [5-1/4 inches] [6-9/16 inches] [7-1/4 inches].

## **PART 3 EXECUTION**

### **3.1 EXAMINATION**

- A. Examine openings, substrates, anchorage, and supports to receive vinyl patio doors.
- B. Examine abutting wall flashing, vapor retarders, weather barriers, and other components to ensure weathertight vinyl patio door installation.
- C. Verify rough opening dimensions, sill levelness, and operational clearances are acceptable.
- D. Notify Architect of conditions that would adversely affect installation or subsequent use.
- E. Do not begin installation until unacceptable conditions are corrected.

### **3.2 PREPARATION**

- A. Prepare substrates in accordance with manufacturer's instructions.
- B. Clean substrates before vinyl patio door installation.

### **3.3 INSTALLATION**

- A. Install vinyl patio doors in accordance with manufacturer's instructions at locations indicated on the Drawings.
- B. Install vinyl patio doors plumb, level, square, true to line, and without distortion.
- C. Anchor vinyl patio doors securely in place to supports.
- D. Verify vinyl patio doors are installed in proper relation to wall flashing and other abutting materials.
- E. Install vinyl patio doors weathertight.
- F. Verify vinyl patio doors open, close, slide, and lock properly.

Specifier Notes: Delete Field Quality Control if not required.

### **3.4 FIELD QUALITY CONTROL**

- A. Test vinyl patio doors after installation to verify amount of air infiltration and water resistance in accordance with AAMA 502.
  - 1. Demonstrate compliance with the following:
    - a. Allowable Air Leakage Rate: 1.5 times applicable rate for product type and performance class in accordance with AAMA/WDMA/CSA 101/I.S. 2/A440.
    - b. Allowable Water Infiltration: None permitted.
  - 2. Remove and replace with new patio doors and retest, if installed patio doors do not meet these requirements.

### **3.5 ADJUSTING**

- A. Adjust operating components to ensure a tight fit at contact points and weatherstripping for smooth operation and weathertight closure.
- B. Replace damaged glass.
- C. Remove and replace with new material, damaged components that cannot be successfully repaired, as determined by Architect.

### **3.6 CLEANING**

- A. Clean vinyl patio doors promptly after installation in accordance with manufacturer's instructions.
- B. Do not use harsh cleaning materials or methods that could damage vinyl patio doors.

### **3.7 PROTECTION**

- A. Protect installed vinyl patio doors to ensure that, except for normal weathering on exterior surfaces, doors will be without damage or deterioration at time of Substantial Completion.

**END OF SECTION**