

200 Series Curtainwall

PART 1 - GENERAL

1.01 Description

- A. Furnish all necessary materials, labor and equipment for the complete installation of aluminum curtainwall framing as shown on the drawings and specified herein.
- B. Curtainwall framing shall be 200 Series Curtainwall as manufactured by Tubelite Inc., Reed City, Michigan. Whenever substitute products are to be considered, supporting technical literature, samples, drawings and performance data must be submitted ten (10) days prior to bid in order to make a valid comparison of the products involved.
- C. Test reports certified by an independent laboratory must be made available upon request.

1.02 Performance Requirements

- A. Air infiltration shall not exceed 0.06 CFM/Ft^2 when tested in accordance with ASTM E-283 "Rate of Air Leakage Through Exterior Windows" at a test pressure of 6.24 PSF.
- B. There shall be no uncontrolled water entry when tested in accordance with ASTM E-331 "Water Penetration of Exterior Windows, Curtainwalls and Doors by Uniform Static Air Pressure Difference" at a test pressure of 15 PSF.
- C. There shall be no uncontrolled water entry when tested in accordance with AAMA 501.1-83 "Standard Test Method for Metal Curtainwalls Using Dynamic Pressure" at a dynamic pressure equivalent of 15 PSF.
- D. There shall be no buckling, stress on glass, edge seal failure, excess stress on curtainwall structure, anchors and fasteners or reduction in performance when tested in accordance with AAMA 501.5-19 at a temperature range of 0° to 180° F.
- E. There shall be no "Life/Safety" type failures (glass breakage, anchor failures, or structural damage) when tested in accordance with AAMA 501.4, seismic test (lateral cycling.)
- F. Structural performance shall be based on a maximum allowable deflection of $L/175$ of the span or $3/4$ " maximum. The system shall perform to this criteria when subjected to a wind load of (architect specify) _____ PSF.
- G. Thermal transmittance due to conduction (U_c) shall not be greater than $0.67 \text{ BTU/Hr/Ft}^2/\text{F}^{\circ}$ when tested in accordance with AAMA 1503.1-98, and the Condensation Resistance Factor of the framing (CRF) shall not be less than 66 when tested in accordance with AAMA 1503.1-98.
- H. The system shall have a Sound Transmission Class (STC) rating of 32 and an Outdoor-Indoor Transmission Class (OITC) rating of 26 when tested in accordance with ASTM E90-97, ASTM E413-87 (reapproved 1994) and ASTM E1332-90.

PART 2 - PRODUCTS

2.01 Materials

- A. Extrusions shall be of aluminum alloy 6063-T5 or 6063-T6 (as required), manufactured within commercial tolerances and free from defects impairing strength and/or durability.

B. Screws, bolts and all other accessories to be compatible with the aluminum under normal service conditions.

C. Thermal barrier shall be by means of a flexible 90 durometer EPDM isolator located at the exterior side of the glass plane preventing continuous contact between exterior and interior metal.

2.02 Finish

A. All exposed framing surfaces shall be free of scratches and other serious blemishes.

1. Finish to be (architect select):

2. Etched and clear anodized

3. (AAM12C22A31)

a) Class 2 Clear (OA)

1. (AAM12C22A41)

a) Class 1 Clear (2A)

1. Electrolytically deposited color

2. (AAM12C22A44)

a) Champagne (4K)

b) Light Amber (2K)

c) Amber (1K)

d) Statuary Bronze (3K)

e) Black (OD)

1. Fluoropolymer painted color _____.

PART 3 - EXECUTION

3.01 Installation

Shall be in accordance with the manufacturer's installation instructions and the approved shop drawings.

Note:

In keeping with Tubelite's policy of continuing product improvements, all specifications are subject to change without written notice by the manufacturer.

400 Series Curtainwall

PART 1 - GENERAL

1.01 Description

A. Furnish all necessary materials, labor and equipment for the complete installation of aluminum curtainwall framing as shown on the drawings and specified herein.

B. Curtainwall framing shall be 400 Series Curtainwall as manufactured by Tubelite Inc., Reed City, Michigan. Whenever substitute products are to be considered, supporting technical literature, samples, drawings and performance data must be submitted ten (10) days prior to bid in order to make a valid comparison of the products involved.

C. Test reports certified by an independent laboratory must be made available upon request.

1.02 Performance Requirements

A. Air infiltration shall not exceed 0.06 CFM/Ft² when tested in accordance with ASTM E-283 "Rate of Air Leakage Through Exterior Windows" at a test pressure of 6.24 PSF.

B. There shall be no uncontrolled water entry when tested in accordance with ASTM E-331 "Water Penetration of Exterior Windows, Curtainwalls and Doors by Uniform Static Air Pressure Difference" at a test pressure of 15 PSF.

C. There shall be no uncontrolled water entry when tested in accordance with AAMA 501.1-83 "Standard Test Method for Metal Curtainwalls Using Dynamic Pressure" at a dynamic pressure equivalent of 15 PSF.

D. There shall be no buckling, stress on glass, edge seal failure, excess stress on curtainwall structure, anchors and fasteners or reduction in performance when tested in accordance with AAMA 501.5-98 at a temperature range of 0° to 180° F.

E. There shall be no "Life/Safety" type failures (glass breakage, anchor failures, or structural damage) when tested in accordance with AAMA 501.4, seismic test (lateral cycling.)

F. Structural performance shall be based on a maximum allowable deflection of L/175 of the span or 3/4" maximum. The system shall perform to this criteria when subjected to a wind load of (architect specify) _____ PSF.

G. Thermal transmittance due to conduction (U_c) shall not be greater than 0.66 BTU/Hr/Ft²/F° when tested in accordance with AAMA 1503.1-98, and the Condensation Resistance Factor of the framing (CRF) shall not be less than 68 when tested in accordance with AAMA 1503.1-98.

H. The system shall have a Sound Transmission Class (STC) rating of 32 and an Outdoor-Indoor Transmission Class (OITC) rating of 26 when tested in accordance with ASTM E90-97, ASTM E413-87 (reapproved 1994) and ASTM E1332-90.

PART 2 - PRODUCTS

2.01 Materials

A. Extrusions shall be of aluminum alloy 6063-T5 or 6063-T6 (as required), manufactured within commercial tolerance and free from defects impairing strength and/or durability.

B. Screws, bolts and all other accessories to be compatible with the aluminum under normal service conditions.

C. Thermal barrier shall be by means of a flexible 55-60 durometer EPDM isolator located at the exterior side of the glass plane preventing continuous contact between exterior and interior metal.

2.02 Finish

A. All exposed framing surfaces shall be free of scratches and other serious blemishes.

1. Finish to be (architect select):

2. Etched and clear anodized

3. (AAM12C22A31)

a) Class 2 Clear (OA)

1. (AAM12C22A41)

a) Class 1 Clear (2A)

1. Electrolytically deposited color

2. (AAM12C22A44)

a) Champagne (4K)

b) Light Amber (2K)

c) Amber (1K)

d) Statuary Bronze (3K)

e) Black (OD)

1. Fluoropolymer painted color _____.

PART 3 - EXECUTION

3.01 Installation

Shall be in accordance with the manufacturer's installation instructions and the approved shop drawings.

Note:

In keeping with Tubelite's policy of continuing product improvements, all specifications are subject to change without written notice by the manufacturer.