

SECTION 10 71 13  
EXTERIOR ALUMINUM SUN SHADE SYSTEMS  
(AlumaSky)

PART 1 – GENERAL

1.1 SUMMARY

A. Section Includes:

1. Fixed exterior aluminum sun shade / brise-soleil systems:  
horizontal louvers, vertical fins, canopies, and combination assemblies.
2. Support frames, brackets, clips, fasteners, and accessories.

B. Related Sections:

1. 05 12 00 Structural Steel Framing or 06 16 00 Sheathing (support by others).
2. 07 27 00 Air Barriers.
3. 07 92 00 Joint Sealants.

1.2 REFERENCES

- A. IBC and local codes.
- B. ASCE 7 loads.
- C. Aluminum Design Manual.
- D. ASTM B221/B209.
- E. AAMA 2605/2604 finishes.
- F. ASTM E330 (uniform static pressure).
- G. AWS D1.2 welding.
- H. ASTM E283/E331 when shades form part of weather barrier.

1.3 PERFORMANCE REQUIREMENTS

- A. Structural: Design to resist wind, seismic, and dead loads; include torsion for cantilevered blades/fins.
- B. Deflection: L/180 for louver blades, L/240 for supporting frames unless more stringent requirements shown.
- C. Corrosion Resistance: Suitable for exterior exposure; marine-grade alloys for coastal environments if specified.

1.4 SUBMITTALS

- A. Product Data including blade profiles, spans, and standard supports.
- B. PE-stamped calculations.
- C. Shop Drawings: layouts, module sizes, bracketry, thermal breaks, and interfaces.
- D. Samples:
  1. 12 in. louver sample.
  2. Finish chips.
- E. Installation and maintenance instructions.

1.5 QUALITY ASSURANCE

- A. Manufacturer: AlumaSky.
- B. Installer qualifications per manufacturer.
- C. Mockup or on-site benchmark module if requested.

1.6 DELIVERY, STORAGE, HANDLING

- A. Protect finishes; avoid twisting long blades.
- B. Store level and covered.

1.7 WARRANTY

- A. AlumaSky limited warranty:
  - 1. System materials and fabrication: 10 years.
  - 2. Finish: 20 years AAMA 2605; 10 years AAMA 2604.

## PART 2 – PRODUCTS

### 2.1 MANUFACTURER

- A. AlumaSky aluminum sun shade systems.

### 2.2 MATERIALS

- A. Aluminum Extrusions: ASTM B221, 6063-T6 typical; 6061-T6 for high-strength.
- B. Aluminum Plate: ASTM B209, 5052 or 6061 as required.
- C. Fasteners: Stainless steel 304/316; concealed where possible.
- D. Thermal Isolators: Nonconductive pads/blocks at attachments to minimize thermal bridging and galvanic action.

### 2.3 COMPONENTS

- A. Louvers/Fins:
  - 1. Aerofoil or rectangular blades, depth and thickness as scheduled.
  - 2. End caps factory sealed.
  - 3. Continuous linear modules with internal splice sleeves.
- B. Support Frames/Brackets:
  - 1. Extruded aluminum outriggers and mullions sized for loads.
  - 2. Provide slotted holes or slip joints for movement.
- C. Connections:
  - 1. Stainless steel bolts with locknuts.
  - 2. Isolate from steel supports and curtain wall with thermal/galvanic breaks.

### 2.4 FINISH

- A. Factory coating:
  - 1. PVDF AAMA 2605 standard, color as selected.
  - 2. Super-durable powder/FEVE AAMA 2604 optional.
- B. Touch-up kit for field repair.

## PART 3 – EXECUTION

### 3.1 EXAMINATION

- A. Verify substrates and backing are installed and capable of supporting loads.

### 3.2 INSTALLATION

- A. Install per approved shop drawings and AlumaSky instructions.
- B. Set modules true to line with consistent blade alignment.
- C. Do not cut or drill finished members in field except as specifically detailed.
- D. Seal penetrations through weather barrier.
- E. Verify movement joints are free to operate.

### 3.3 ADJUSTING, CLEANING, PROTECTION

- A. Adjust blade alignment; torque fasteners.
- B. Clean with mild detergent and water; no solvents.
- C. Protect from construction damage until turnover.

END OF SECTION