

**SPECIFICATIONS**

**PART 2—PRODUCTS**

(For Part 1 and Part 3, see General Specifications.)

**2.01 Manufacturer**

- A. Shall furnish all electrical control components, shades, and accessories for complete installation and single source responsibility.

**Castec, Inc.**  
**7531 Coldwater Canyon Avenue**  
**North Hollywood, CA 91605**  
**(800) 828-2500**

**2.02 Product**

**A. Castec Manual Rollstar Shades:**

Top quality manual roll shades. The 100 Series shades use a 1" tube and a C8 clutch capable of lifting up to 8 lbs. The 200 Series shades use a 1¾" tube and a C16 clutch capable of lifting up to 16 lbs. Manual Rollstar shades are also available with a C24 clutch (lifts up to 24 lbs.) and a C24 Spring Assist clutch (lifts up to 35 lbs.).

- 1. **Operator types:** Available with two operator types, as listed below.
  - a. **Clutch and Chain Operation:** Shall be a ball chain operated system utilizing a bi-directional wrap spring clutch. The system must be capable of smoothly raising and lowering the shade to any desired height and maintaining that position without slippage. The shade cannot be operable by any means other than the chain. Pulling on the hem bar will not disengage the clutch. Fabric roll: regular or reverse. Clutch never needs adjustment. Friction-dependant disc brakes are not used.
  - b. **Spring-Assisted Clutch and Chain Operation:** Shall be a ball chain operated system with an assistance spring used to easily lift shades that exceed lift capacity of standard clutches. The bi-directional wrap spring clutch is outfitted with an external assistance spring that fits inside the tube for added lifting capacity.
- 2. **Clutches:** Castec offers four clutches, each with different lifting capacities, as listed below.
  - a. **C8 clutch lifts up to 8 lbs.**  
Used for Rollstar 100 Series shades.
  - b. **C16 clutch lifts up to 16 lbs.**  
Used for Rollstar 200 Series shades.
  - c. **C24 clutch lifts up to 24 lbs. – in 1¾" Tube**

**d. C24 Spring Assist clutch lifts up to 35 lbs.**

Use the following formulas to determine approximate maximum shade lift weight:

Light Fabrics: W" x L" divided by 3456

Medium Fabrics: W" x L" divided by 1480

Heavy Fabrics: W" x L" divided by 777

**3. Clutch Roller Tube** shall be one of the following:

- a. **.030" enameled roll-formed steel:** Available in 1", 1¾", 1¾" diameters.
- b. **Extruded aluminum:** Available in 1", 1¼", 1½", 2", 2¾", and 3¼" diameters.

Tube size depends on shade width and height.

**4. Clutch Idler End Cap:** Shall be a two-piece unit, with outside sleeve and center bearing shaft, self-lubricating and made of high strength fiberglass-reinforced polyester.

**5. Clutch Mounting Bracket:** .060" galvanized steel.

**6. Clutch Control Loop** shall be one of the following:

- a. #10 nickel-plated 45-pound steel ball chain
- b. Plastic 122-pound bead chain (woven polyester cord with molded acetal beads)
- c. #10 stainless steel 90-pound ball chain

Chain is provided with connector and upper and lower ball stops.

**7. Hem Bar:** 1½" wide by ¾" thick extruded aluminum bar (pocketed in fabric).

**2.03 Materials**

- A. **Shade Fabric:** Shall be selected from a large choice of vinyl-coated fiberglass and vinyl-coated polyester yarns woven into various configurations and colors. Shading fabrics shall be either .020" diameter 1000-denier polyester core PVC jacketed yarn or .016" diameter 500-denier PVC-coated fiberglass yarn. Woven yarn will be interlocking and heat treated so that all materials are securely bonded. The woven fabrics are made by coating a high strength polyester or fiberglass yarn with a proprietary vinyl compound that employs performance additives. This vinyl compound is specially formulated to resist fading, fire, mildew, soiling, and bacteria.

**1. Vinyl-Coated Polyester Fabrics** are available in the weaves listed below.

- a. **SheerWeave 4000, OF 5%**
- b. **SheerWeave 4100, OF 10%**
- c. **SheerWeave 4400, OF 3%**

**d. SheerWeave 4800, OF 1%**

All vinyl-coated polyester fabrics are available in various colors, and in widths up to 98".

**2. Vinyl-Coated Fiberglass Fabrics** are available in the weaves listed below.

**a. SheerWeave 2000, OF 5%**

**b. SheerWeave 2100, OF 10%**

**c. SheerWeave 2390, OF 5%**

**d. SheerWeave 2360, OF 10%**

**e. SheerWeave 1000, OF 25%**

**f. M Screen, OF 3% and 5%**

**g. E Screen 4100, OF 5%**

**h. E Screen 4110, OF 10%**

**i. T Screen 5103, OF 3%**

**j. T Screen 5100, OF 5%**

**k. T Screen 5110, OF 10%**

**l. Verso Veil, OF 1%**

**m. Basketweave 100, OF 13%**

**n. Hexcel XL2 Satin Weave, OF 3%, 5%, or 10%**

**o. Hexcel XL Screen, OF 5%.**

All vinyl-coated fiberglass fabrics are available in various colors. Maximum widths range from 72" to 98".

**3. Combination Fabric: SheerWeave 3000, OF 14%** Made of vinyl-coated fiberglass in the warp for dimensional stability and vinyl-jacketed polyester in the fill for shading characteristics and color variety. It has a vertical ribbed pattern, and is available in numerous colors and designs. Maximum width 96".

**4. Blackout/Darkroom Fabric:** Shall be totally opaque. Fabric shall be made of first quality materials with no pin holes, breaks, or cracks and shall be washable and colorfast. The following Blackout/Darkroom fabrics are available:

**a. Flocke, OF 0%:** 48% fiberglass with 52% acrylic flocked backing. Available in widths up to 78".

**b. Hexcel 1260, OF 0%:** made from fiberglass coated with acrylic. Available in widths up to 71".

**c. Darkroom 100, OF 0%:** in 12 or 14 oz. 1 ply fiberglass, 3 plies plasticized PVC. Available in widths up to 72".

**2.04 Optional Manual Rollstar Accessories**

**A. Snap-On Fascia Mounting Brackets:** Shall support both the roller tube and the fascia panel. They must be capable of mounting inside, outside, or to the ceiling, with the motor on either the right or left side of the roller. All fascia brackets will be made of .060" steel. Fascia brackets for 3" fascias shall be painted with a high quality finish to match the fascia panel. Fascia brackets for 4" fascias have a clear zinc finish— a molded polymer end cap is provided to cover the bracket.

**B. Fascia Panel:** Shall be installed to completely conceal the roller tube and mounting hardware, providing a clean, finished look. Fascia shall hook onto the top of the bracket and snap in place, remaining firmly attached. Fascia panels 3" or 4" high shall be made of .075" extruded aluminum and shall be painted with a high quality baked enamel finish. Rollstar 100 series shades are available with 3" fascia only. Rollstar 200 series shades are available with 3" or 4" fascia.

**C. Top/Back Cover:** Shall be .085" extruded aluminum with a baked enamel finish and shall fit over fascia brackets and completely cover the top and back of the roll shade.

**D. Side Closure Channels:** Shall be one piece 1" by 2½", .062" extruded aluminum with "T" slots to receive wool pile light seal on both leading edges. A two-piece, 1" by 2" extruded aluminum side closure is also available for wider openings.

**E. Exposed Hem Bar:** Shall be extruded aluminum containing a spline groove at the top to receive and secure fabric, and a central cavity for a weight bar if required. Ends caps will be used to cover the ends.

**F. 4045 Cassette System:** Shall be made of an extruded aluminum available in a variety of stock colors. Sizes to be 4" x 4½" with a groove designed to accept shade brackets that are factory-installed within the cassette. Cassette can be snapped into accepting brackets, which can be mounted to the wall or window frame. Cassette will have removable bottom closure to provide easy access to shade mechanism. Bottom closure will also hide shade roller mechanism. Optional end caps are available to match color of cassette extrusion.

**G. 5050 Headbox:** Shall be one piece 4¾" wide by 5" deep, .120" extruded aluminum U-shaped enclosure with a 2⅞" wide access closure for use when the shade is to be recessed into the ceiling or completely concealed. Available in white enameled finish and custom colors. Custom shade pocket sizes available upon request.



**H. Closure Hanger:** Closure hanger and closure, both of .062" extruded aluminum, shall be used in recessed applications where aluminum shade pocket is not necessary. Available in white enameled finish and custom colors.

**2.05 Color and Finishes:**

**A.** Aluminum extrusions are of 6063-T5 alloy available in dark bronze, clear anodized, or white enameled Polycron III or equivalent Duracron finish. Custom colors are available.