Splitting 24-Ribbon Fiber

NOTE: These installation instructions have been written for qualified, experienced personnel. Please read them thoroughly before starting assembly work. Superior Essex disclaims any liability or responsibility for the result of improper or unsafe installation practices.

This procedure is for separating Superior Essex 24-fiber optical ribbon into two 12-fiber ribbon units. It is suitable for cable end and mid-span access. The cable may be a “dry” tube cable design or a gel-filled tube design. This procedure does not include methods to splice or test the fiber. Cable preparation and splicing must be performed by trained personnel who are familiar with handling optical fiber cable, cable components, and splicing accessories. Mishandling of fiber cable can cause damage to the fiber, resulting in cable length cuts or system degradation.

Getting Started

Proper safety requirements should always be followed and local practices maintained. It is recommended that the installer wear protective eye gear and gloves during the cable jacket removal process to avoid the possibility of bodily injury.

Midpoint and End Splitting Procedure

1. After the optical fiber ribbons have been exposed and cleaned, identify the midpoint between the blue and aqua fibers requiring separation.
2. For end splitting, fold ribbon directly in half 1” – 3” from the cable end.

   For mid-span splitting, fold the ribbon directly in half at the point where mid-span access is required.

   *Note: It is important that the ribbon is folded directly in half between the blue and aqua fibers to ensure the 12-fiber ribbons are maintained.*

   Fold the ribbon in the opposite direction back onto itself, making sure that the ribbon has been folded in both directions. The ribbon should split. Repeat folding as necessary until the ribbon fully separates. Do not attempt to separate the ribbon at this time.

3. Grasp the folded ribbon between your forefinger and thumb. With other hand, continue to fold the ribbon lengthwise to the desired length.

4. Hold the folded ribbon with one hand and position the forefinger of the other hand between the two 12-fiber unit splits. With a unit on either side of the forefinger, use your thumb to hold the outside unit in place and run the forefinger the length of the creased ribbon. The ribbon should separate cleanly.
5. The separated, 12-fiber units are now ready for splicing. The ribbon fibers can also be separated into individual fibers (refer to our Technical Guidelines for TG60 “Peelability” of Superior Essex Optical Fiber Ribbon).

End Splitting Procedure
1. For end splitting only, cut the ribbon on an angle of approximately 45 degrees.

2. After the optical fiber ribbons have been exposed and cleaned, identify the midpoint between the blue and aqua fiber requiring separation.
3. Grasp the ribbon on both sides with forefinger and thumb. Locate the midpoint with fingertip/fingernail.

4. Once the midpoint is located, gently pull one side away from the other (outward not side to side), splitting the ribbon approximately ½ inch.

5. Carefully inspect the ribbon to determine if the split is in the center (between the blue and aqua fibers). If so continue to split the ribbon to the desired length. If not, repeat steps 1 through 4.

6. The separated, 12-fiber units are now ready for splicing. The ribbon fibers can also be separated into individual fibers (refer to our Technical Guidelines for TG60 “Peelability” of Superior Essex Optical Fiber Ribbon).