Automatic Fiber Preparation Station

Interlocked Central Lid

Left-Hand Clip Carriage

Right-Hand Clip Carriage

Strip Module

Cleave Module
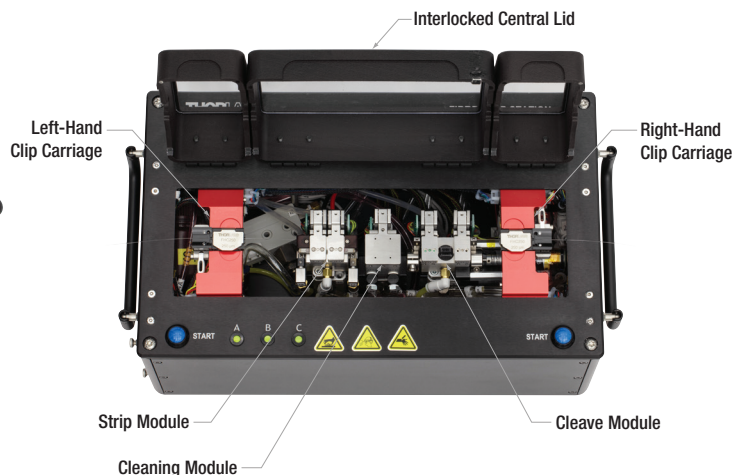
Cleaning Module

Thorlabs' Vytran® Automatic Fiber Preparation Station strips, cleans, and cleaves fibers in a single, compact unit. This product has been designed to accept and quickly process two fibers with claddings from 80 µm to 125 µm in parallel, accelerating their preparation for high-quality, high-reliability splicing. In addition, the two fibers may have different fiber cladding diameters and may be of different types (SM, MM, or PM).

The Automatic Fiber Preparation Station decreases the processing time and increases the reliability of fiber preparation by removing any manual handling. Two fibers may be processed in parallel with a typical processing time of 75 s. The station uses our proven thermo-mechanical stripping process to prepare fibers for high-strength splicing, increasing the splice yield and reliability. These yield improvements and time savings can significantly increase throughput in a production environment, making it ideal for applications serving the high-capacity telecom market, whether terrestrial, subsea, or satellite. In addition, the automated station can be used in many other applications that require high-volume, high-reliability fiber preparation, such as manufacturing photonic integrated circuits (PICs) and PIC interconnections.

Features

- ◆ Strip, Clean, and Cleave Fibers in One Compact, Automated Station
- ◆ Uses Our Proven Thermo-Mechanical Fiber Stripping Process
- ◆ Parallel Processing of Two Fibers with Typical Processing Time of 75 s
- ◆ User-Configurable to Simultaneously Process Two Different Fibers with Cladding Diameters from 80 µm to 125 µm
- ◆ Configured at Time of Build for User-Chosen Splicer
- ◆ Solvent and Waste Contained within the Unit and Easily Changed or Emptied

Specifications

Accepted Fiber Cladding Diameter	80 µm - 125 µm
Fiber Length	27 mm - 43 mm
Cleaning Solvent	Isopropyl Alcohol
Cleave Length	6 mm - 18 mm
Cleave Angle Tolerance	±0.5°
Cleave Method	Diamond Blade - Tension and Scribe
Equipment Control Method	VYT300C Handset or PC Control
Dimensions	335 mm x 205 mm x 120 mm (13.2" x 8.1" x 4.7")
Weight	7.3 kg (16.1 lbs)
Computer Interface	USB Y-Cable
Operating Air Pressure Range	0.55 MPa - 0.69 MPa (80 psi - 100 psi)