

# MERCURY-5

## Precision Laser Wire Stripping Systems



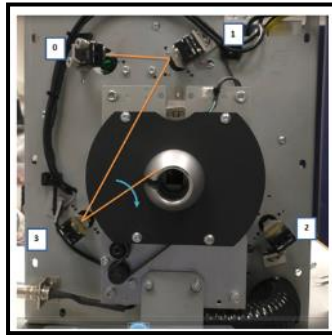
**High performance | Low cost | Compact | Flexible**

# MERCURY-5

Laser Wire Solutions' Mercury-5 benchtop laser wire strippers identify a gap in the market for a laser method of stripping large gauge wires. They offer a breakthrough in terms of both price and stripping performance.



*A ring slit on a 10mm coroplast cable*



*Mercury-5 3 beam optical arrangement*

## Technology

The Mercury-5 is designed to cross-cut and slit jackets and insulation of single conductor cables with an outer diameter of between 1mm and 20mm and with a slitting length of up to 200mm. It grips, strips and releases the cable with a unique auto-focusing system that enables speed and repeatability.

It has a 3-beam optical arrangement, so the ring cut is made up of 3 distinct linear cuts perpendicular to the cable. The cable is centred using an iris mechanism and the slit is performed by pulling the cable into the machine by means of a gripper.

The distinct advantage of the Mercury-5 is its auto-focus feature which allows for an immediate change-over of different wire diameters.



*Coroplast cable cleanly stripped using the Mercury-5 laser stripper*



*Large round black cable with multiple slits*

## Features & Benefits

**Size:** compact benchtop unit that can be easily retro-fitted into existing production lines.

**Versatile:** strips single conductor cables with outer diameters ranging between 1mm and 20mm.

**Reliable:** proven laser source and optics.

**Clean and precise:** nick-free stripping with no damage to the underlying conductor.

**Flexible and fast:** fast loading of single wires / cables with rapid, automatic change-over between wires sizes, typically in under 1 second.

**Ease of use:** operator selects via a touchscreen the desired stripping parameters (strip lengths, laser power and speed, etc) from the programmed library.

**Lowest cost of ownership:** no laser or machine wear parts.

## Specifications

Element	Mercury-5
<b>Operating environment</b>	Light duty, industrial environment. Cleanliness as a typical office. Bench mounted.
<b>Operating temperature</b>	60 to 90 degrees Fahrenheit (15.5° to 32°Celsius), 20-80% humidity (non-condensing).
<b>Electrical power</b>	230V - 50 Hz, 4 Amps (Europe) 115V - 60 Hz, 8 Amps (USA)  Single phase supply, earthed and stable (spike and surge protected).
<b>Compressed air</b>	None.
<b>Processed material</b>	Jacket and large gauge single conductor insulations.  Strip width: minimum outer diameter 1mm and maximum outer diameter 20mm.  Strip length: up to 200mm.
<b>Laser type</b>	Interlocked laser enclosure - Class 1 incorporating continuous wave 30W Class 4 Carbon Dioxide laser.
<b>Optical system</b>	Focus lenses, 3 beam mirror system with beam expander / collimator.
<b>User control</b>	4.3" PC-based colour touchscreen. Storage for >99 recipes. PC based back-up / restore of recipes. Jobs held in non-volatile on-board memory. On-board diagnostics - "laser healthy", "extraction on", etc indicators.
<b>Safety</b>	Class 1 laser system incorporating a Class 4 laser product as per 21 CFR Chapter 1, Subchapter 1, EN60825-1:2007. Category 3 Safety Related Control architecture designed to meet performance level PL4 =d. Dual fail-safe interlocked enclosure with monitoring. Category 0 emergency stop.
<b>Acoustic noise</b>	Machine: 69 db(A) Machine and Fume Extractor: 75 db(A)
<b>Power consumption</b>	1 kW (typical)
<b>Machine dimensions</b>	350mm x 450mm x 650mm 14" x 18" x 25" (W x H x L)
<b>Uncrated weight</b>	Bench Unit: 42 kg (95 lbs)

# OUR MARKETPLACE



We serve the global market, both directly and through the local Schleuniger sales network. All of our products comply with the latest US and European safety standards. For a full list of international contacts, visit us at [www.laserwiresolutions.com](http://www.laserwiresolutions.com).

Laser Wire Solutions is a leading provider of laser stripping solutions for the highest quality medical, automotive, consumer electronics, defense and aerospace interconnects. We can support you with proof of principle samples, contract manufacturing services or machine supply, including customization. Check out our [website](http://www.laserwiresolutions.com) for more information.

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*A key factor in the design of the Mercury-5 has been the quick automatic change-over between wires of variable sizes, from 1mm up to 20mm outer diameter.*



**LASERWIRE**  
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