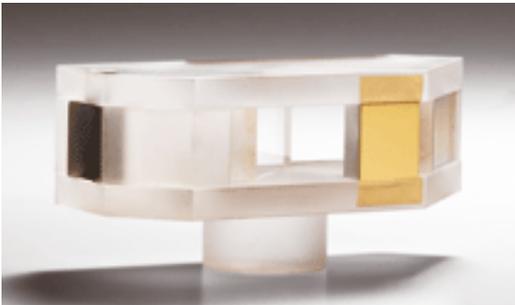


## Monolithic Michelson Interferometer - INT

PLX Michelson Interferometers are permanently aligned so they will never need adjustment. They offer superb optical stability and unsurpassed shock and vibration resistance. Combining the interferometer with a PLX hollow retroreflector provides the basis for an FTIR instrument.

### INT05-N

The INT05-N Monolithic Michelson Interferometer is offered for companies wishing to construct proprietary NIR Fourier Transform Spectroscopy instruments, featuring rugged construction and permanent alignment.

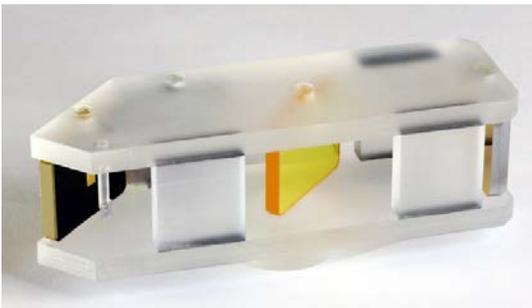


#### Specifications

Clear Aperture	Ø0.50in/12.7mm
Exiting Wavefront	0.10 waves P.V. @ 633nm
Operating Range	2940-7700 $cm^{-1}$
Mass	210 grams
Operating Temperature	15° - 40°C
Operating Thermal Gradient	2°C ABSOLUTE; <2°C / 100mm

### INT10-M

The INT10-M Monolithic Michelson Interferometer is offered to enable the construction of a Mid-IR FTIR spectrometer by designers knowledgeable and experienced in FTIR machine architecture. The INT10-M can be customized to your specifications.



#### Specifications

Clear Aperture	Ø1.00in/25.4mm
Exiting Wavefront	0.25 waves P.V. @ 633nm
Operating Range	650-4000 $cm^{-1}$
Mass	460 grams
Operating Temperature	15° - 40°C
Operating Thermal Gradient	2°C ABSOLUTE; <2°C / 100mm

Due to our continuous product improvement program, specifications are subject to change without notice.

### Custom Configurations

#### Custom configurations for specialized applications

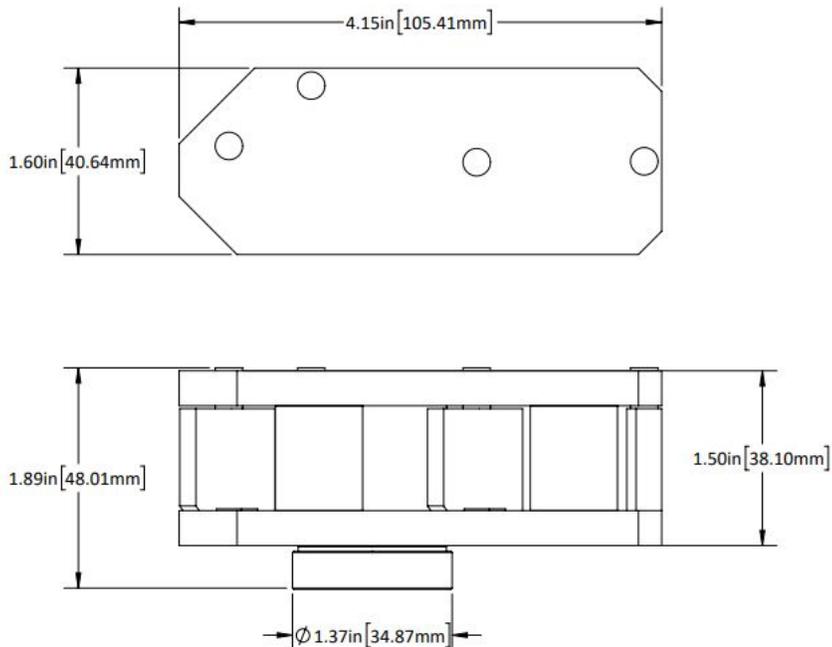
PLX engineers can create a custom interferometer for your application. Potential variations include: smaller and larger apertures, modified mounting to meet your interface, super-critical accuracies, and customized mirror coatings. Contact PLX with your requirements.

#### Important Notice

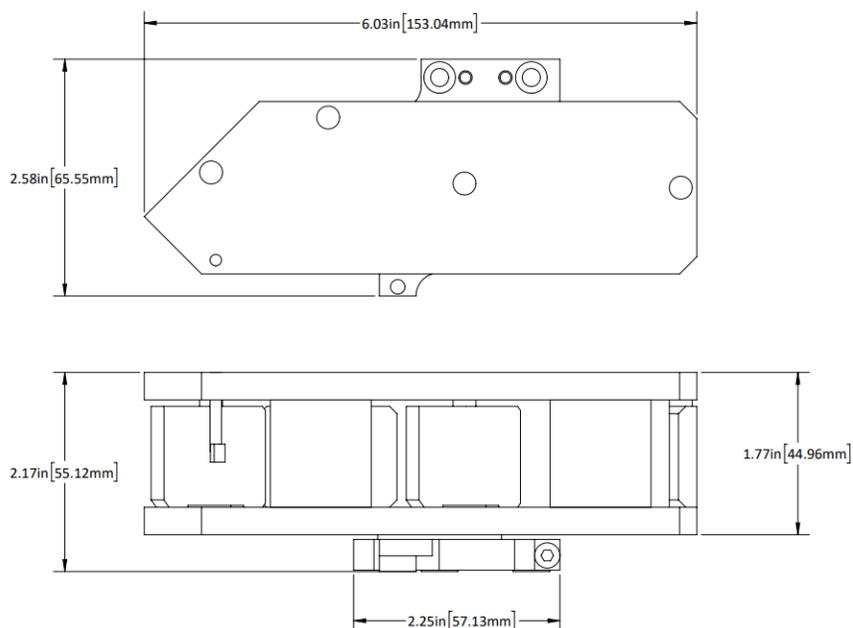
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### Outline Drawings

#### The INT05-N



#### The INT10-M



The INT05-N is extremely rugged and never needs adjustment. A moving retroreflector is added to one arm to complete the interferometer and allow for the variation of the optical path difference around zero OPD. The rugged construction and permanent alignment make the INT05-Series NIR interferometers suitable for your most demanding NIR analyzer applications.

The INT10-M is permanently aligned with the two arm mirrors imaged onto each other by a beamsplitter-compensator in a monolithic assembly. A moving retroreflector is added to one arm to complete the interferometer and allow for the variation of the optical path difference around zero OPD. The INT10-M Monolithic Michelson Interferometer is especially suited for those with experience in FTIR machine architecture who wish to incorporate it in their proprietary designs.

### Coating Curve

