CW LASER MODULES WITH BEAM CORRECTION





- ACM is a compact, economical alternative to gas lasers
- APM combines active temperature control with beam circularization

Circularized Beam, CW—

ACM Laser Modules:

The ACM is an excellent replacement for large, inefficient gas lasers. The unit yields a round beam that imitates a gas laser's naturally circular beam while offering several advantages: compact size, lighter weight, and dramatically lower power consumption. The ACM achieves its beam circularization via a pair of anamorphic correcting prisms, an astigmatic lens, and an output aperture. The unit operates in automatic power control mode and serves as an ideal OEM component for positioning, alignment, and measurement applications.

APM Laser Modules:

The APM module not only offers a circularized beam, but it includes an active temperature control circuit, TE cooler, and fan to control the diode's operating temperature. These temperature control mechanisms—in addition to promoting stability of wavelength and output power—help to extend the life of the diode.

The APM operates in constant current mode or automatic power control mode. Built-in potentiometers enable users to adjust or change the drive current, laser power, or active temperature control parameters, and a 7-pin connector allows for DVM-compatible monitoring of these parameters.



The APM contains a 7-pin connector that allows for DVMcompatible monitoring of the drive current, output power, and active temperature control parameters.

Round beam laser modules

MODULE SPECIFICATIONS	ACM	APM
Dimensions, Ø x L, in. [mm]	1.00 x 2.25 [25.37 x 57.15]	1.50 x 6.97 [38.05 x 177.04]
Operating Voltage (VDC)	3.3 - 9	12 ± 1
Max. Operating Current (mA)	120	1350
Max. Laser Drive Current (mA)	120	500
Temperature Stability (°C)	-	.5
Temperature Range (°C)	-	10 - 35
Physical Diode Compatibility	9mm, 5.6mm	9mm, 5.6mm
Diode Compatibility	N-type & P-type in APC, all in CC	M-type & N-type in APC, all in CC
Beam Size At Exit, 1/e ² (mm)	2.7	2.7
Recommended Options*	D1, T, X12	D1, D2, D3, T

*See pages 46 through 52 for our available options and accessories.