

PRELIMINARY DATASHEET

HRM

High-temperature Laser



DESCRIPTION

The Power Technology HRM and HRMX lasers deliver a rugged high-temperature offering to its Extreme Environment Laser Portfolio. With its reduced Size, Weight, and Power consumption compared to alternative technologies, its wider operating temperature reduces field failures, increases lifetime, and lowers costs. The modules offer multiple wavelength choices across the ultraviolet, visible, and infrared spectrum. The platform features two performance levels, one offering functionality in temperatures of up to 85 degrees Celsius (HRM) and another with operation in up to 175 degrees Celsius (HRMX) for more extreme conditions. The laser modules are available in a broad range of output powers from 2 mW to 150 mW. In addition, the modules are IP67-rated for water and dust resistance and features a sealed USB-C connector.

APPLICATIONS

- Military
- Aerospace
- Automotive
- Heavy Industrial

FEATURES & BENEFIT

- Up to 175°C Operating Temperature
- Reduced Size, Weight, and Power Consumption
- USB-C Connector
- IP67 Rating

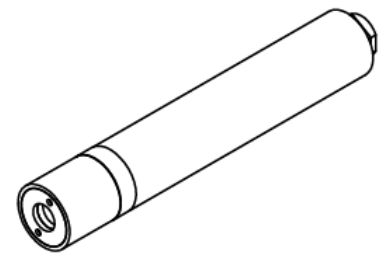
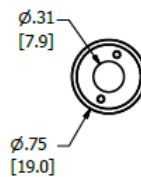
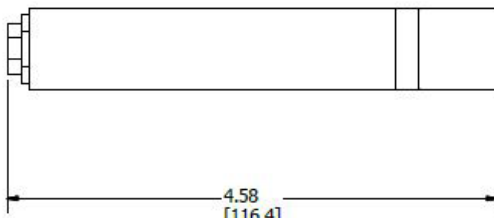
SPECIFICATIONS

HRMX Series	660-5	660-50	1300-5	1300-2	1300-2
Output Power (mW)	5	50	5	2	2
Wavelength at 25°C (nm)	660	660	1300	1300	1300
Op. Temp. (°C)	15-85	15-85	15-110	15-150	15-175
Beam Diameter (mm)	1.60x4.39	1.19x2.66	TBD	TBD	TBD
Beam Divergence (mrad)	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Output Power Mode*	CW	CW	CW	CW	CW
Op. Voltage (VDC)	5.0	5.0	5.0	5.0	5.0
Op. Current (mA)	40	160	110	130	130
Module Diameter (mm)	19	19	19	19	19
Module Length (mm)	116	116	116	116	116

HRM Series	405-120	450-80	520-20	520-80	637-5	639-120	660-5	660-50	780-50	850-150	905-100
Output Power (mW)	120	80	20	80	5	120	5	50	50	150	100
Wavelength at 25°C (nm)	405	450	520	520	637	639	660	660	780	850	905
Op. Temp. (°C)	15-80	15-65	15-60	15-60	15-60	15-60	15-85	15-85	15-75	15-70	15-65
Beam Diameter (mm)	1.14x2.53	1.08x2.76	.92x1.86	.92x1.86	1.46x5.32	1.06x1.83	1.60x4.39	.93x1.99	1.34x2.28	TBD	1.21x3.51
Beam Divergence (mrad)	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Output Power Mode*	CW	CW	CW	CW	CW	CW	CW	CW	CW	CW	CW
Op. Voltage (VDC)	8.0	8.0	8.0	8.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Op. Current (mA)	100	70	55	180	130	130	20	100	80	180	150
Module Diameter (mm)	19	19	19	19	19	19	19	19	19	19	19
Module Length (mm)	116	116	116	116	116	116	116	116	116	116	116

*Future models will include modulation

MECHANICAL DRAWINGS



SAFETY WARNINGS



COMPLIANT & REGISTERED

