



Crafting ideas into light

A-STACK

Actively Cooled Stack

A water cooled stack with macro-channels that avoid the common issues with obstructions. A huge variety of bars is available in this package and the central wavelength can be tuned to your needs



A-STACK / 780 - 830 nm

Product specification are subject to change without notice.
For complete details, please contact your local MONOCROM Representative.

UNE EN ISO 9001:2008

MONOCROM S.L.

C/Vilanoveta 6
08800 Vilanova i la Geltrú (Barcelona)
Spain
T. +34 938 149 450
F. +34 938 143 767
E. sales@monocrom.com
www.monocrom.com

P _{peak} (W)	Fill Factor (%)	# emitters	Emitter size (μm)	Emitter pitch (μm)	I _{op} (A)	I _{th} (A)	η (W/A)	e-o eff (%)	SA div* (°)	FA div* (°)	Polarization direction	Optics options
20	30	19	150	500	20	4	1.2	58	7	36	TE	FAC/SAC
40	30	19	150	500	42	8	1.1	53	down to 6	36	TE/TM	FAC/SAC
40	50	47	100	200	45	12	1.2	55	6	36	TE	FAC
50	18	19	90	500	50	8	1.19	55	10	31	TE	FAC/SAC
50	20	19	100	500	46	6	1.25	62	6	36	TE	FAC/SAC
50	30	19	150	500	50	10	1.25	55	down to 6	36	TE/TM	FAC/SAC
60	18	19	90	500	58	8	1.20	57	10	31	TE	FAC/SAC
60	20	19	100	500	57	7	1.2	62	6	36	TE	FAC/SAC
60	27	19	135	500	56	10	1.3	59	7	27	TE	FAC/SAC
60	30	19	150	500	60	10	1.2	59	6	36	TE	FAC/SAC
60	50	47	100	200	65	15	1.2	56	down to 6	36	TE/TM	FAC
70	28	19	140	500	73	12	1.15	53	10	31	TE	FAC/SAC
80	28	19	140	500	79	12	1.19	56	10	29	TE	FAC/SAC
80	50	48	100	200	92	25	1.15	51	6	36	TE	FAC
100	50	25	200	400	120	25	1.05	46	down to 7	31	TE	FAC
200	90	60	150	160	180	22	1.27	62	10	31	TM	FAC
250	80	34	220	289	190	24	1.2	60	8	37	TE	FAC
300	67	62	100	150	266	16	1.2	56	8	36	TE	FAC
300	90	60	150	160	270	30	1.25	56	10	31	TE	FAC
500	67	62	100	150	450	30	1.2	56	8	36	TE	FAC
500	80	34	220	289	450	30	1.19	56	8	37	TE	FAC

Up to 8 bars
 Bar to bar pitch down to 2.5 mm
 Spectral width* ~ 3 nm
 Wavelength thermal shift ~ 0.27 nm/K
 Voltage drop per bar ~ 2 V
 Smile < 0.5 μm

* Measured at FWHM

Macro-channels

Our patented solder-free technology is used in our diode bars stacks. Thanks to its 2 side cooling we avoid water obstructions thanks to the use of macro-channels



A-STACK / 780 - 830 nm

Product specification are subject to change without notice.
 For complete details, please contact your local MONOCROM Representative.

MONOCROM S.L.

C/Vilanoveta 6
 08800 Vilanova i la Geltrú (Barcelona)
 Spain
 T. +34 938 149 450
 F. +34 938 143 767
 E. sales@monocrom.com
 www.monocrom.com



Our diode bars are in direct contact with 2 heat sinks that help them cool easier



Clamped bars expand and contract freely during the thermal cycles of the pulsed regime avoiding mechanical stress.



Our diode bar mounts don't smile even though they live happily



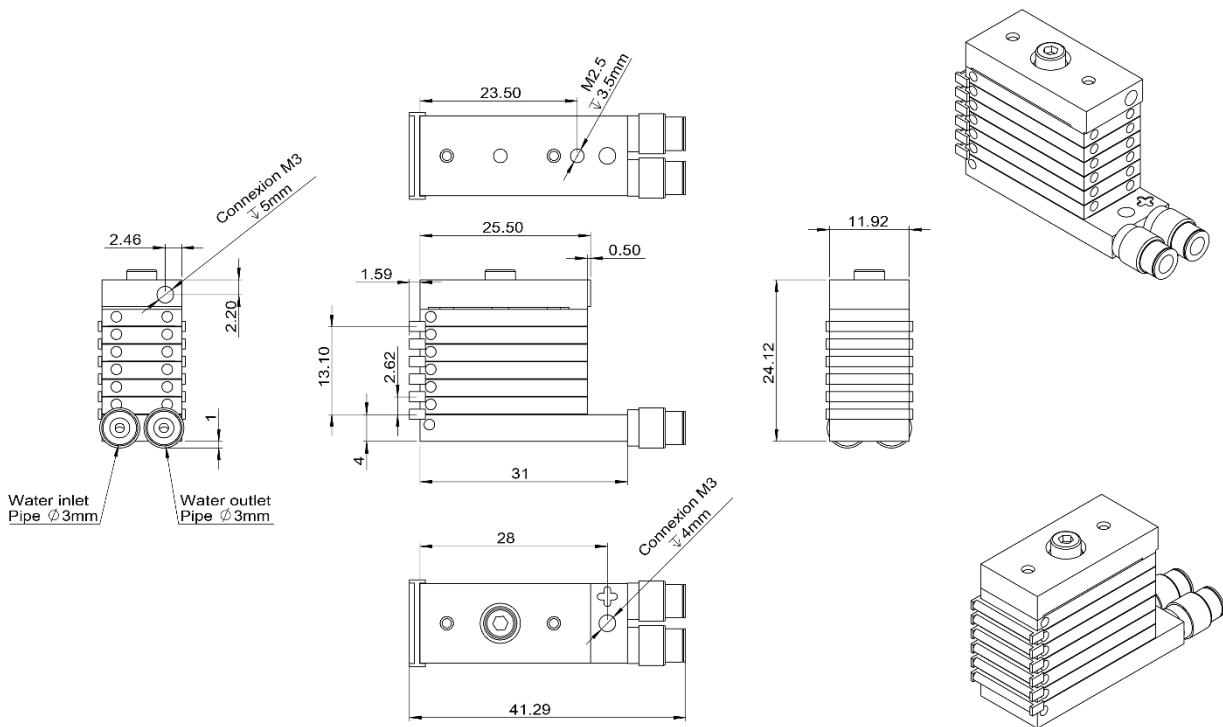
The lack of a "smile" allows a superb beam. Our diode bar mounts achieve higher energy per pulse and excellent beam quality, thus higher brightness




When mechanical stress is not an issue any more, product life-time increases significantly

Outline

6 bar package



Ordering Information:



800 Village Walk #316
 Guilford, CT 06437
 Ph: 203-401-8093

Email orders to: sales@xsoptix.com
 Fax orders to: 800-878-7282

A-STACK / 780 - 830 nm

Product specification are subject to change without notice. For complete details, please contact your local MONOCROM Representative.

UNE EN ISO 9001:2008

MONOCROM S.L.

C/Vilanoveta 6
 08800 Vilanova i la Geltrú (Barcelona)
 Spain
 T. +34 938 149 450
 F. +34 938 143 767
 E. sales@monocrom.com
www.monocrom.com