



# **KRONOS Lidar Sources**

### High Performance Laser Source for Lidar Applications

ITF Technologies' KRONOS laser sources for lidar applications are designed and built based on our vast expertise in optical fiber components manufacturing and assembly. They feature excellent beam quality and are available in low (0.5kW@25kHz), medium (3kW@25kHz) or high (>15kW@25kHz) peak power configurations.

They are designed with autonomus vehicule guidance systems in mind, in harsh environmental conditions. Having both high peak power and excellent beam quality means a better long range mapping capacity.

The KRONOS lidar sources also features built-in electronics and temperature control, in addition to pulse tuning capabilities. This offers flexibility to our customers and the ability to optimize their Lidar system design.



#### **KEY FEATURES**

Compact Design

High Peak Power

High OSNR

Excellent beam quality

Ultra Low Jitter

Eye Safe (1550nm)

High Reliability for Harsh Environments

**Optional Optical Output Monitor** 

#### **APPLICATIONS**

Self-Driving Vehicules

3D Mapping

**Distance Measurement** 

#### **FOR MORE INFO**

Please contact us at: North America: **514.748.4848 888.922.1044** Europe: +33 (0) 1 69 80 57 50 Asia: +86 755 2671 0449 or via e-mail at: info@itftechnologies





## **KRONOS Lidar Sources**

### Laser specifications

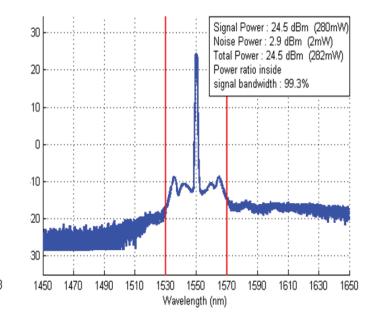
	UNITS	LOW POWER	MEDIUM POWER	HIGH POWER*
Operating Center Wavelength	nm		1550 +/- 15	
Pulse Width (Adjustable)	ns		0.7 to 10	
Pulse Repetition Frequency (User Selectable)	kHz		25 - 5000	
Output Peak Power (at lowest PRF)	kW	0.45	3	15
Energy per Pulse (at lowest PRF)	uJ	1.8	12.8	60
Average Output Power	W	0.05	up to 1.5	1.5
Configuration (number of stages, same casing)		2	3	3
Output Fiber		SMF	SMF	LMA
				*Under development

## Mechanical and environmental specifications

	UNITS	VALUE
Dimensions	mm	90 x 90 x 90
Operating temperature (case)	٥°	-40 to +65
Storage temperature (case)	۵°	-40 to +85
Relative Humidity		<90% (non condensing)
Weight	g	450
Control Interface		Full duplex LVDS
Required power supply	V	12

Note: Power limiting safety interlock built in

### **Typical spectrum**

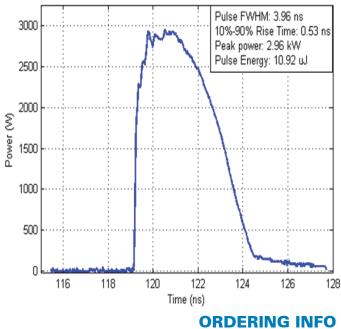


Tel: +1 514 748 4848 Fax: +1 514 744 2080 Toll Free: +1 888 922 1044

www.itftechnologies.com info@itftechnologies.com



# Typical pulse shape



ITF Technologies inc. 400 Montpellier Blvd., Montreal, QC H4N 2G7