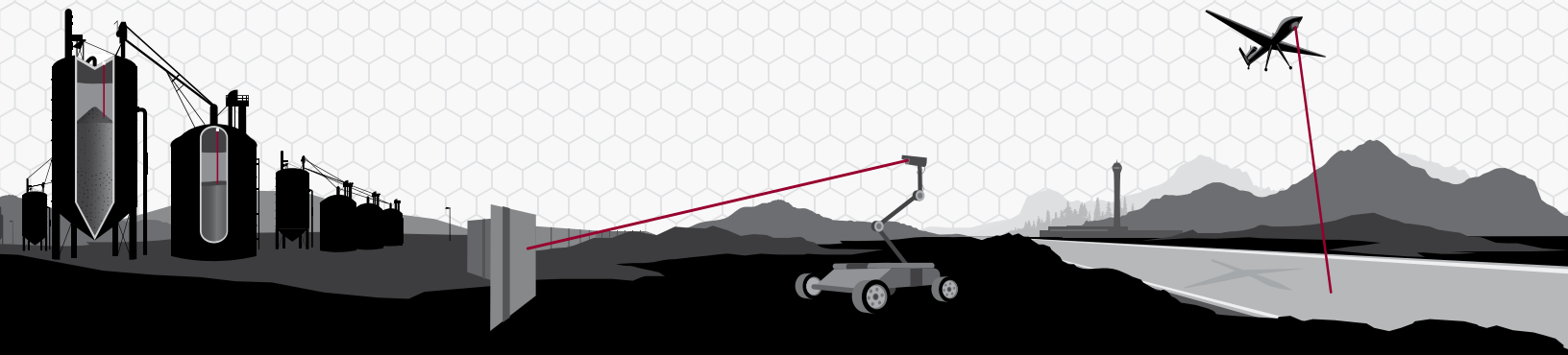
LASER MEASUREMENT SENSORS

+ Advantages of Pulse Laser Technology
+ LTI's Complete Sensor Product Line
+ Uses and Applications
+ Reasons Why to Buy LTI



www.lasertech.com

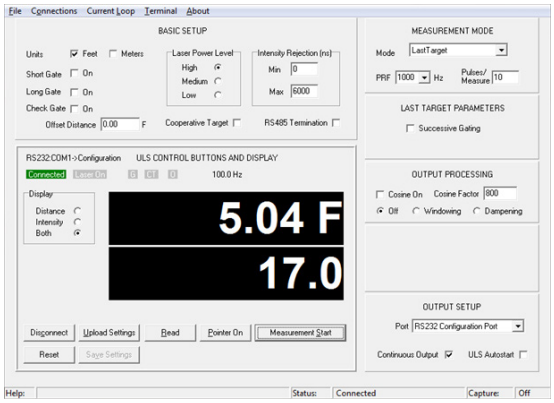
LASER TECHNOLOGY, INC.
Measurably Superior®

Advantages of Pulse Laser Technology

- Produces highly accurate measurements capable of targeting objects from long ranges
- Acquires measurements to stationary or moving objects without touching the material (non-contact)
- Does not require recalibration for specific materials
- Outputs data into the most commonly used formats for successful system integration
- Easy to install and narrow beam width is able to measure in tight spaces and through obstacles
- Offers superior measurement with prices competitive with other technologies

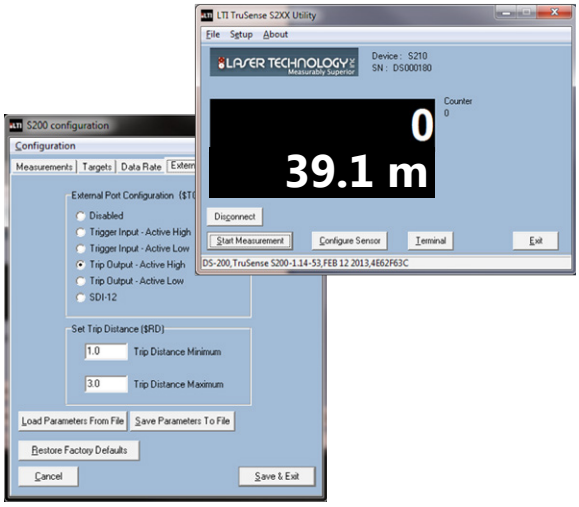
Universal Laser Sensor

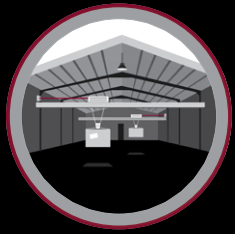
- Outputs in the widest variety of standard formats
- Operates in multiple modes, giving you more options for performance optimization for specific applications
- Delivers a high level of durability with a seamless, extruded aluminum housing



TruSense® S-Series

- Meets Unmanned Autonomous System payload requirements for laser rangefinder component size, weight and power
- Integrates nicely with a fully digital system, making it a simple plug-and-play sensor
- Delivers highly accurate and repeatable results to even the weakest of targets, yet is priced attractively low





PLANT MANAGEMENT AND AUTOMATION
- Collision avoidance
- Level measurements
- Equipment guidance

UNMANNED AUTONOMOUS SYSTEM
- Above-ground height
- Proximity detection
- General detection

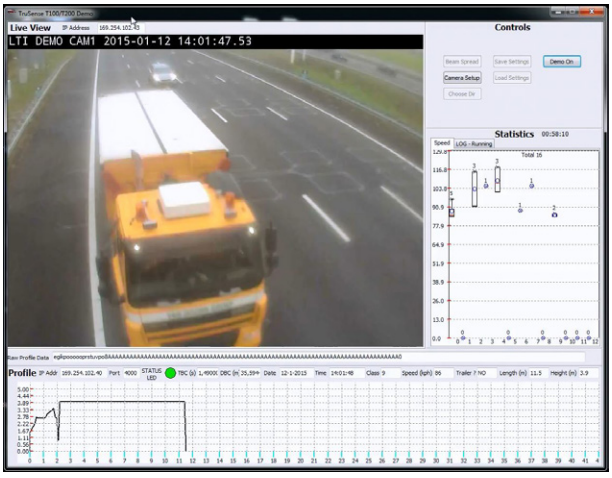
ROBOTICS
- Event trigger
- Guidance assistance
- Proximity detection

LASER TECHNOLOGY INC

TruSense® T-Series

- Sends out 10,000 pulses per second, making it the ideal sensor for stationary rapid scanning applications
- Measures vehicle speed, height and length data for warning or classification purposes, utilizing a master/slave configuration
- Non-intrusive technology that replaces in-road sensors

The dual TruSense-T-series system is designed to collect traffic data.



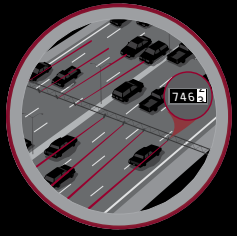
Why LTI is Measurably Superior

LTI is the true leader of pulse-laser technology with 66 U.S. and international patents, plus 20 filed and pending. The technology found in all these sensors is the same type being used for space docking missions, ranges for golfing and hunting, speed enforcement as well as professional measurement and mapping applications all over the world.

NASA and other international space programs have used LTI technology for in-flight proximity measurements.

The University of Colorado is using LTI technology for air-to-ground measurements.

LTI Australia is working closely with a local DOT for traffic sensor testing with LTI technology.



TRAFFIC MANAGEMENT
- Speed detection
- Oversize warning
- Statistics

EQUIPMENT GUIDANCE
- Event trigger
- Collision avoidance
- Clearance warning

SECURITY AND SURVEILLANCE
- Event trigger
- Camera integration
- Proximity detection

LASER TECHNOLOGY INC

Specifications		TruSense S-100	TruSense S-200 Series	Universal Laser Sensor (ULS)	TruSense T-100
Performance	Min. Range	1.5 ft (46 cm)			
	Max. Range to Reflective/ Non-Reflective Target	7,546 / 5,249 ft (2300 / 1600 m)	9,514 / 5,249 ft (2900 / 1600 m) low-accuracy mode 4,921 / 2,953 ft (1500 / 900 m) medium-accuracy mode 2,461 / 2,461 ft (750 / 750 m) high-accuracy mode	5,249 / 1,640 ft (1600 / 500 m)	165 ft (50 m)
	Accuracy	3.3 ft (1 m)	0.1 ft (4 cm) in short-range mode 0.3 ft (8 cm) in medium-range mode 0.5 ft (15 cm) in long-range-mode	+/- 0.70 in (2 cm)	Distance = +/- 3.9 in (10 cm) Dual sensor speed = 2% with 75 cm spacing
	Data Output Rate	<1 Hz to 6 Hz	<1 Hz to 14 Hz; 200 Hz mode (only with RS232)	<1 Hz to 2 kHz: depending on RS232 or RS485	<1 Hz to 25 kHz: depending on RS232 or RS485
	Target Modes	Closest, farthest, closest-farthest, strongest, first	First, strongest, last, first-second-third, Last-second to last, first-strongest-last, First-second-third-strongest-last	Averaging, binning, detection, last	Profile, speed (dual sensors), time between vehicles (TBV), height, length, distance
Optical & Electrical	Wavelength	905 nm (near IR)			
	Divergence	3 mrad (equal to 1 ft beam diameter @ 328 ft or 30 cm @ 100 m)			
	I/O	RS232	S-200 = TRIG, SDI12, RS232 without alignment laser S-210 = TRIG, SDI12, RS232 with alignment laser S-230 = 4-20, 4-20 HART, RS232 with alignment laser	RS232, RS485, 4-20	RS232, RS485, TRIG
	Baud Rate Min/Max	9,600 / 230,400	9,600 / 230,400	1,200 / 230,400	1,200 / 230,400
	Input Power	9 VDC	12 VDC	12-24 VDC nominal (12 VDC recommended)	
	Current Draw	Measuring = 150 mA, Idle = 50 mA, Sleep = 30 mA	Measuring = 150 mA, Standby = 40 mA	Measuring = 150 mA	Measuring = 150 mA
Physical	Dimensions (L x W x H)	4.11 x 3.22 x 1.64 in (104.4 x 81.7 x 41.6 mm)	4.11 x 3.22 x 1.64 in (104.4 x 81.7 x 41.6 mm)	5.3 x 4.75 x 2.5 in (134.6 x 120.7 x 50.8 mm)	6.8 x 2.9 x 4.5 in (172.7 x 73.7 x 114.3 mm)
	Weight	Standard = 4.8 oz (138.6 g), OEM = 2.7 oz (76 g)	Standard = 4.8 oz (138.6 g), OEM = 2.7 oz (76 g)	Standard = 32.8 oz (929.9 g) OEM = 15.5 oz (439.3 g)	Standard = 18.2 oz (517.10 g)
	Housing & Frame Material	Glass-filled polycarbonate	Glass-filled polycarbonate	Aluminum	Glass-filled polycarbonate
Environmental	Eye Safety	Class 1, 7mm (FDA, CFR21) Class 1m (IEC 60825 - 1:2001)			
	Shock / Vibration	MIL-STD-810			
	Moisture	IP54			
	Operating Temperature	- 20° to 140° F (- 28° to 60° C)			

All specifications subject to change without notification.

LASER TECHNOLOGY INC

Tel: 1.303.649.1000 | Toll Free: 1.877.696.2584 | Email: info@lasertech.com | Web: www.lasertech.com