



# PRODUCT SOLUTIONS



TruPulse® Laser Rangefinders  
MapStar® TruAngle® II

Measure Distance, Inclination,  
Azimuth, Horizontal, and Vertical Angles  
Height & Width, Slope, and Missing Line

PROFESSIONAL MEASUREMENT



# ▶ 2D LASERS DISTANCE AND TILT

LTI's dedication to high quality and unmatched innovation has allowed our products to be used for a wide range of professional field measurement applications: from measuring distances, height or slope values, to calculating a remote offset position with GNSS.



## TRUPULSE® LASER RANGEFINDERS ▶

Withstands the test of time and has been revamped to offer new enhancements and improvements. These highly sophisticated and easy-to-operate laser rangefinders use our core, reflectorless technology with TruTargeting performance built-in to every unit. They offer the user a choice of four targeting modes and displays all data values right inside the sighting scope.



TRUPULSE® L2

- Faster acquisition and greater accuracy
- Physical, visual, and audible feedback on target acquired
- Auto calculates horizontal & vertical distance, height, and 2D missing line values



TRUPULSE® 200i

- Increased range & inclination accuracy
- Ultra-bright adjustable display for any lighting conditions
- Faster acquisition and greater accuracy, better target discrimination, & rugged



TRUPULSE® 200X

- Achieves the highest distance and inclination accuracy
- Offers adjustable LED display brightness
- Withstands conditions with rugged, waterproof housing

### Laser Rangefinder Targeting Modes

- **Closest:** distinguishes near and far objects and identifies the closest target
- **Farthest:** distinguishes near and far objects and identifies the farthest target
- **Continuous:** provides constant updates while shooting multiple targets
- **Filter:** measures through dense foliage by recognizing only a highly reflective target

### APPLICATIONS



#### ELECTRIC UTILITIES

- Span, Sag, and Tension
- GIS Mapping
- Vegetation Management
- Pole Inventory



#### TELECOMMUNICATION

- Site Inspection
- Antenna Height
- Obstruction Mapping
- Material Estimate



#### FORESTRY

- Tree Heights
- Slope Grades
- Stem Mapping Surveys
- Ecosystem Management

## 3D LASERS + HORIZONTAL, ANGLES, AZIMUTH

### TruPulse® 360i

- › Auto calculates horizontal & vertical distance, height and 3D missing line values
- › Calibrates with a simple field routine that can be completed in less than a minute
- › Produces accurate and repeatable azimuth results regardless of the tilt or pitch you use to aim the laser



TRUPULSE® 360i



### TruPulse® 200X + MapStar® TruAngle® II

- › System measures distance, inclination, and horizontal angle values with the capability to capture X,Y, and Z coordinates for 3D mapping
- › Provides needed functionality and accuracy at an affordable price
- › Integrate in a split GPS Pole
- › Survey tripod mounting options

### TruAngle® II

- › Provides the needed horizontal accuracy unaffected by magnetic interfaces
- › Pivot the laser rangefinder a full tilt  $\pm 90^\circ$  while maintaining the rotary encoder level
- › Maintains horizontal angle accuracy by using the Level Aid Alert with LED indicators

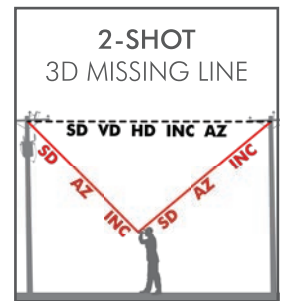
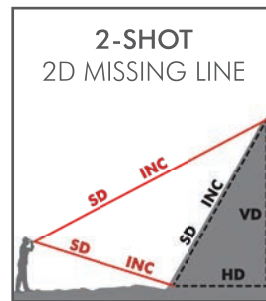
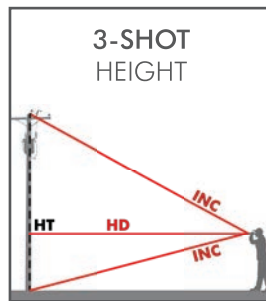
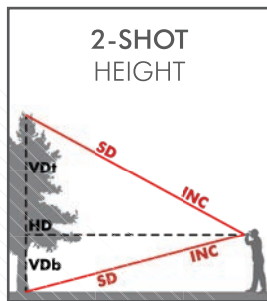
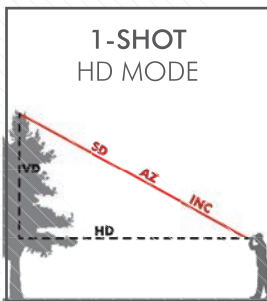


## MEASUREMENT SOLUTIONS

HD = HORIZONTAL DISTANCE    INC = INCLINATION    SD = SLOPE DISTANCE  
ML = MISSING LINE    AZ = AZIMUTH    HT = HEIGHT    VD = VERTICAL DISTANCE

Calculated by TruPulse -----

Measured by TruPulse -----



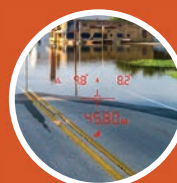
#### CONSTRUCTION

- › Stockpile Volumes
- › Site Inspection
- › Crane Positioning
- › Face Profiling



#### PUBLIC WORKS

- › Land Use Planning
- › Facility Mapping
- › Asset Inventory
- › Emergency Response



#### GIS MAPPING

- › Remote Offset Locations
- › Site Inspection
- › Wetland Mapping/Delineation
- › Natural Resources



## PRODUCT SPECIFICATIONS

2D LASERS	TruPulse® L2	TruPulse® 200i	TruPulse® 200X
Distance Accuracy	± 0.5 m at < 200 m ( ±1.6 ft at < 656 ft) ± 1 m at 200 m - 1500 m (± 3 ft at 656 ft - 4921 ft)	0.1 m < 1,000 m (4 in < 3,280 ft) and to a High-Quality target 0.2 m > 1,000 m (8 in > 3,280 ft) or to a Low-Quality target	±1.6 in (±4 cm) typical targets <400m; ±6 inches (±15cm) typical targets < 1000m ±1.6 in (±4 cm) to ±1 ft (±30 cm) to distant and weak targets
Ranging Performance	5 m - 2195 m (16 ft - 7,200 ft)	50 cm - 2,500 m (20 in - 8,202 ft)	0 m to 2,500 m (0 to 8,202 ft)
Inclination Accuracy	± 0.5° Relative @ 0° to ± 30° ± 1.0° @ ± 30° to ± 90°	0.1° @ 0° to ±30° 0.2° @ ±30° to ±90°	± 0.1° Typical
Wireless Communication / App Compatibility	No	Windows® + iOS + Android®	Windows® + iOS + Android®
Scope Magnification / In-Scope Display Type	5X/PDLC Display	5X/LED HUD	7X/LED

3D LASERS	TruPulse® 360i	TruPulse® 200X & MapStar® TruAngle® II
Measures Azimuth with TruVector Compass Technology	Yes	No
Distance Accuracy	0.1 m < 1,000 m (4 in < 3,280 ft) and to a High-Quality target 0.2 m > 1,000 m (8 in > 3,280 ft) or to a Low-Quality target	±1.6 in (±4 cm) typical targets <400m; ±6 inches (±15cm) typical targets < 1000m ±1.6 in (±4 cm) to ±1 ft (±30 cm) to distant and weak targets
Ranging Performance	50 cm - 2,500 m (20 in - 8,202 ft)	0 m to 2,500 m (0 to 8,202 ft)
Inclination Accuracy	0.1° @ 0° to ±30° 0.2° @ ±30° to ±90°	TruPulse 200X : ± 0.1° Typical TruAngle II: Maintains ± 0.3° accuracy up to 10° tilt
Angle Accuracy	N/A	Horizontal +/- 0.1°
Azimuth Accuracy	< 1.0° RMS	N/A
Wireless Comm / App compatibility	Windows® + iOS + Android®	TruAngle II is Android™ + iOS
Scope Magnification / In-Scope Display Type	5X/LED HUD	7X/LCD