



## FEATURES

- Compact control unit
- Easy touchscreen control
- Up to 3 measurements displayed on the gauge
- Integrated data processor
- Ergonomic trigger to start measurement
- Up to 30 meter umbilical

## BENEFITS

- Flexibility in deployment
- Selection of predefined measurements
- Rapid multilayer measurement
- No external computer required
- Easy to use without fatigue
- Reach difficult locations

## T-Ray<sup>®</sup> 5000 SPG5201/SPG5202

### Single Point Gauge

The T-Ray 5000 SPG single point thickness measurement gauge allows direct measurement of multiple layer objects with the press of a button. The modular nature of the measurement tool allows either straight-on or right-angle measurement



tips. The measurement is fundamentally non-contact, but for hand-held use, a measurement tip is used to aid the user in positioning the object at the focus of the THz beam. An easy to use touchscreen display allows selection of measurement configuration and mode of operation

The SPG5201 is compatible with any of the intelligent T-Ray 5000 Terahertz Control Units (TCU). The TCU52xx uses VGA and USB ports to allow an external monitor and keyboard to be attached if desired. The Controller comprises the short pulse laser, time delay rail, and data collection electronics and high speed processor required for a high performance terahertz system. With a waveform acquisition time of 100ms, rapid layer thickness measurements can be made reliably.

By using pulse Time-of-Flight (ToF) to make its measurements, the SPG5201 has greater insensitivity to environmental and material variations that can lead to calibration inaccuracies, as well as operator inconsistencies.

## APPLICATIONS

- Spot check of thickness or layer structure of coatings or multilayer extrusions
- Gauge can determine thickness, basis weight, delamination
- Examine bond lines between molded structures and their substrate



### ORDERING INFORMATION

**Included**

- SPG with umbilical
- Accessory kit
- SPG software

**Typical Configuration**

- Terahertz Controller
- SPG with Umbilical (5, 10, 15, 30 m)
- SPG software

PARAMETER	SPECIFICATION	UNITS	COMMENTS
Model Number 510n	n =		1 = Type 1 transmitter, 2 = Type 2 transmitter
Gauge direction	0.90	Deg	
Standoff	25, 75	mm	Contact cone for stability
Umbilical lengths	5, 10, 15, 30	m	
Thickness accuracy	0.03	mil	0.8 microns
Size	2.5 x 3.0 x 10.5	in	
Weight	4.5	lb	With 5 m umbilical (shown)