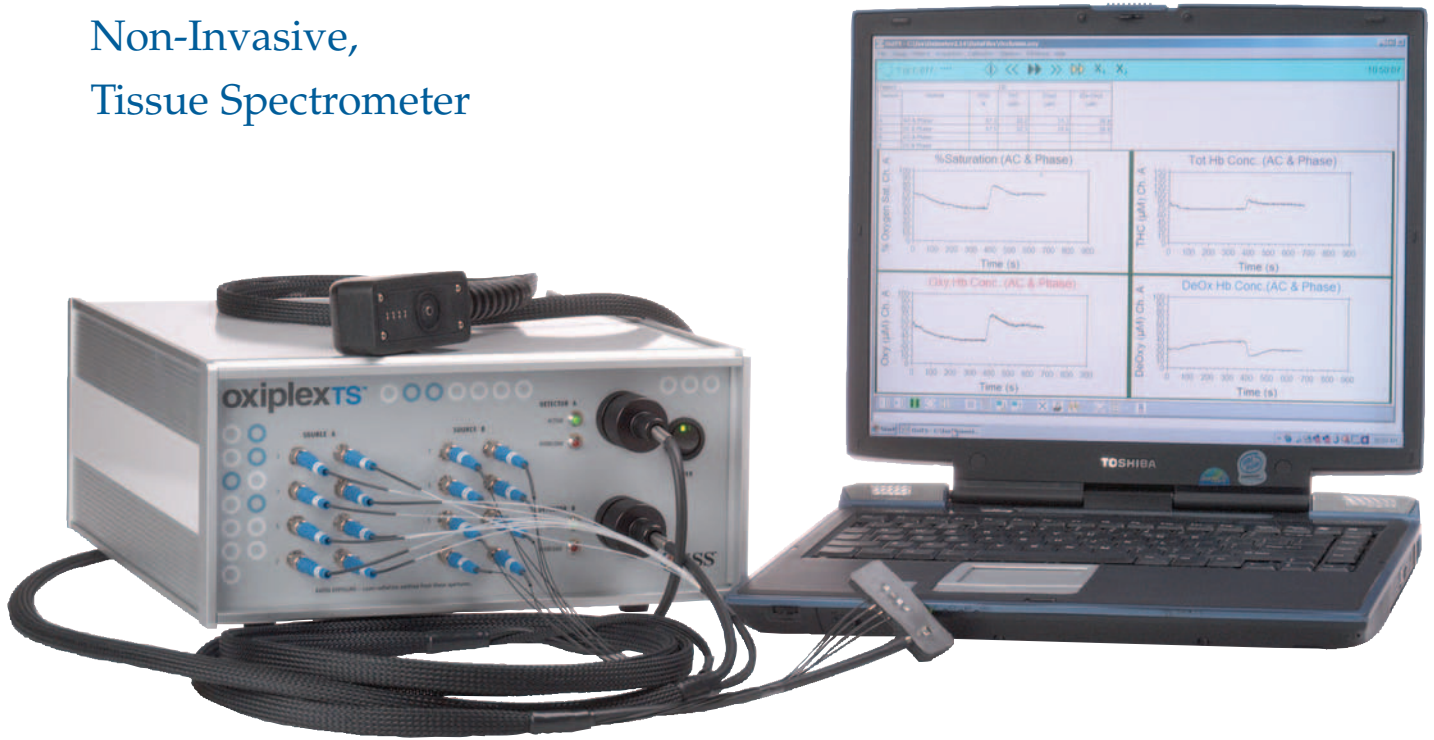




# oxiplexTS™

Near Infrared,  
Non-Invasive,  
Tissue Spectrometer





## OxiplexTS Version 2

The OxiplexTS, a non-invasive real-time monitor of absolute tissue oxygenation and hemoglobin concentration, has been redesigned to improve usability and performance. The new features include:

- Smaller footprint for maximum portability
- Automated control of signal gain
- Connection to a laptop via the USB port
- 4 analog outputs for connecting to monitoring stations
- 4 analog inputs per auxiliary input module (up to 8)
- Cascade connection of multiple instruments for multiple simultaneous measurement channels

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## SPECIFICATIONS

Method of operation	Frequency domain – multiple distance
Modulation frequency	110 MHz
Measurements	Tissue oxygen saturation Oxy- and deoxy-hemoglobin concentration Total hemoglobin concentration Absorption coefficient Reduced scattering coefficient Intensity and phase
Light sources	8 laser diodes emitting at 690 nm* 8 laser diodes emitting at 830 nm* Laser diodes are time multiplexed *ISS model 96208 oximeter is available with custom wavelengths
Light detectors	Photomultiplier tubes Computer-controlled bias voltage (Gain) Automatic safety shutdown
Average optical power	Less than 1 mW
Total number of measurement channels	Two
Sensors	All fiber optics sensors Several sensor types for different applications Fiber length up to 10 m MRI compatible sensors available upon request
Spatial resolution	4 Emitter-Detector distances per sensor
Data acquisition rate	From 20 ms to minutes
Maximum experiment duration	Up to several days (250,000 points)
Connection to external computer	USB port
Software operating system	Windows 2000/XP
Dimensions and weight	28.9 x 14.6 x 36.2 cm; 5.4 kg
Electrical power requirements	110-240 Volt; 50/60 Hz



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**Caution: Investigational device. Limited by Federal (or United States) law to investigational use. The ISS OxiplexTS is presently used for research only.** Information furnished by ISS is believed to be reliable. However, no responsibility is assumed for possible inaccuracies or emissions. ISS reserves the right to change the design, specifications, etc., of the product at any time without notice.

OxiplexTS is covered by US Patents numbers: 5,212,386; 5,492,118; 5,497,769; 5,772,587; 6,078,833; 6,192,261B1. Other US and foreign patents pending.



1602 Newton Drive ■ Champaign, IL 61822  
Tel: 217-359-8681 ■ Fax: 217-359-7879  
Email: [iss@iss.com](mailto:iss@iss.com) ■ [www.iss.com](http://www.iss.com)