Introduction to Oxford Sensors Ltd



Laser Vision Systems Designed & Built for Welding!

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Oxford Sensors Ltd

Oxford Sensors Ltd (OSL) is a UK manufacturer of vision and control systems for welding and related applications with both standard and custom products.

Standard products include intelligent laser seam tracking for robots, welding machines and tube & pipe applications.



Rugged High Performance Laser Sensors



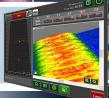


OSL laser sensors are designed for welding applications.

With a rugged housing, fixed and replaceable protective windows, cooling and blow off, OSL sensors provide many years of reliable operation.

Proven Easy-to-Use Reliable Software

OSL Systems are designed for welding applications. The system software is written, controlled and tested in-house for continuous fault-free operation. The operator interface is a full colour touchscreen providing an intuitive interface. No external computers are required for programming or setup.







APPLICATIONS

Oxford Sensors and its staff have many years' experience in the practical application of laser vision systems for welding automation.

OSTRACK

- Seam Finding
 - · Seam Tracking
- Automatic Multipass Welding Control
- Path Memorisation & Memory Replay
 - Adaptive Fill
 - Weld Inspection















OSL have designed and built many custom systems, including welding lathe controls, robot pipe end measurement systems and complete pipe mill systems.

OSL Staff are experienced in applying laser vision systems to all seam welding processes, including MIG, TIG, FCAW, SAW, Plasma, Laser, Laser Hybrid, FSW.





PRODUCTS

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Sensors

OSL sensors are rugged high performance units designed for welding





OSL-10A – high precision laser sensor for tight butt joint applications OSL-25A, OSL-50A – laser sensors for the majority

of applications
OSL-100A – laser sensor for large joints

OSS-300 – unique scanning spot laser sensor for large reflective joints. The only sensor on the market which is comfortable with freshly machined narrow gap joints.

Systems

OSL Systems are designed with the highest quality components for years of reliable operation



OSTrack-R – OSL's standard robot system is available with an ethernet interface to all major welding robots

OSTrack-M – complete system for welding automation, including laser sensor, control cabinet & servo slides OStrack-DA – replacement system for Meta Smart

Laser Probe

OSTrack-MDK – flexible system for full integration with customer equipment

Benefits of laser seam tracking include:

- Enables automation of welding applications
 Reduced manpower requirements
- Higher and Consistent Quality
- · Improved Productivity
 - Generation of Production Data
- · Important part of Digital Manufacturing

OSL's standard laser line sensors include a second laser in the form of a green cross that provides an invaluable reference for setting up and monitoring performance at a glance.



Company staff have a track record of providing world leading solutions.

Based on the vast experience of its key staff, OSL is highly skilled in providing custom systems, with particular expertise in multipass and adaptive welding, The systems are designed for long term reliability and OSL provides full lifetime support.

All OSL systems use the highest quality hardware components and software developed and controlled in house.







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Phone +44 (0) 1869 250791 Email info@oxfordsensors.com www.oxfordsensors.com

Oxford Sensors Ltd

Unit 11, Arena 14
Bicester Park,
Charbridge Lane
Bicester,
Oxfordshire
OX26 4SS
United Kingdom