Contact Bluewrist Today!



















3D Weld Inspection

Highly Flexible Automated Inline 3D Inspection

ScanXtream Weld Inspection is a highly flexible automated inline laser-based quality assurance solution that helps identify, report and eliminate a wide variety of welding flaws in the manufacturing process.

Bluewrist's weld inspection solution improves quality by eliminating manual welding inspections that are prone to inspector error and subjectivity. Automated weld inspection helps achieve 100% accuracy and consistency by comparing weld characteristics against a predetermined quality standard.

Multiple Inspection Features

ScanXtream Weld Inspection uses a 3D profiler or 3D snapshot sensor to capture detailed surface characteristics of the weld in question. The weld profiles can be inspected in their entirety or broken down into individual sections for analysis and comparison against fabrication blueprints to guarantee conformity.

Inspection Capabilities

Inspection Features

- · Weld length
- · Weld width · Theoretical throat
- thickness · Lea length

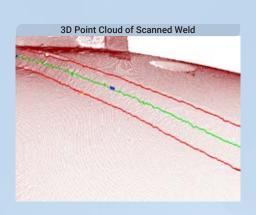
Weld Type Suitability

- Fillet weld Lap weld
- Butt weld • Plug weld

Technical Specification

- Scan rate Up to 200 mm/s
- · Resolution Up to 0.1 mm





Weld Defect Detection, Reporting and, Visualization

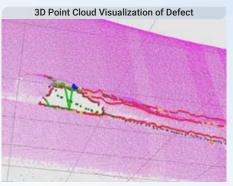
Our high resolution laser scanning makes ScanXtream Weld Inspection the ideal solution to detect and analyze different surface weld defects that may lead to expensive and time consuming rework.

Common Weld Defects

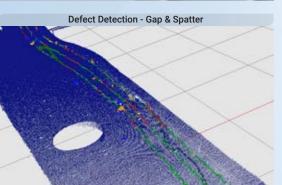
- Spatter
- Porosity
- Cracks
- Underfill and overfill
- · Burn through
- Undercut and overlap

ScanXtream point cloud processing software gives users a visual indication of defects in the weld based on user-configured data and welding standard parameters. Inspection data and images can be saved for future reporting, record keeping, and review purposes as part of a comprehensive quality assurance program.









Flexible Inspection Deployment

ScanXtream Weld Inspection can be configured or modified based on the changing requirements of the manufacturing facility.

Multiple Configuration Options

- Robot Mounted Weld Inspection Flexibility for inspecting complex weld patterns
- Stationary Mounted Weld Inspection High speed weld inspection in the mass production environment
- Linear Slide Repeatable inspection for predetermined weld inspection at a specific location