

Extol

The next generation of shop floor hardened non-cartesian CMM

True to Aberlink's heritage for innovation, the Extol is the world's first CMM to utilise a delta mechanism.

Designed for robustness and reliability, the Extol CMM will run around the clock making it ideal whether it is positioned next to a machine tool, in a manufacturing cell, or used in a dedicated inspection area.

Five temperature sensors monitoring both the machine and ambient temperature ensure that the Extol is capable of operating in uncontrolled environments and reporting measurements as though they had been taken at 20°C. The software will also produce a warning should the temperature be changing at a rate that is not conducive with reasonable metrology practice.

The Automatic Tool Offset Correction available with the Aberlink 3D software compliments the attributes of the Extol perfectly allowing utilisation as part of a fully automated production process in the midst of a manufacturing environment.

The ergonomics of the Extol have also been a significant design factor. It is not only quick and easy to perform one-off inspections, but also has ample access for either batch inspection or to facilitate automatic loading. With a larger measuring volume and smaller overall footprint than its predecessor, the Xtreme, the Extol can be positioned exactly where the measurement is needed.

Robust, accurate and reliable, the Extol CMM is the perfect solution to automatically verify part quality for critical components.

Key Features

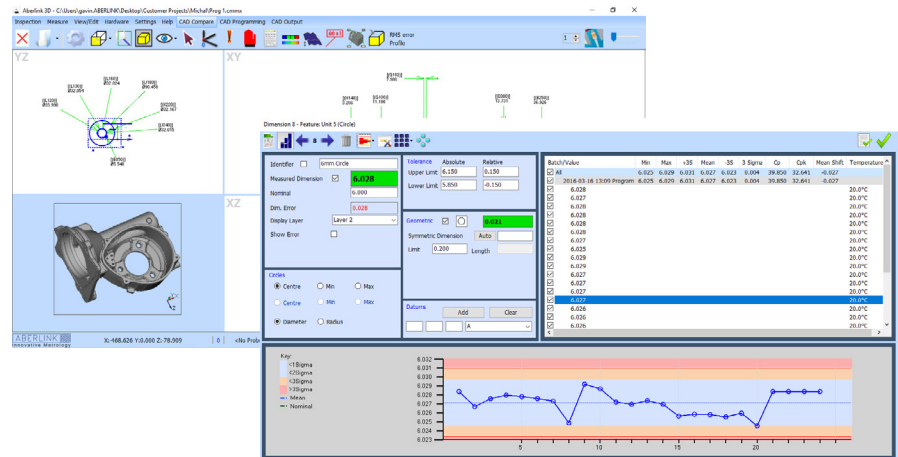
- Fully sealed recirculating bearings proven in the machine tool market significantly improve smoothness and dirt immunity.
- A directly coupled belt-drive system eliminates the need for a gearbox and any associated backlash issues.
- Swiss-made DC motors and a new Deva motion control system provide exactly the reliability that is needed for shop floor CMM inspection.
- The super-smooth belt-drives and linear bearings also enable long styli to be used without suffering false triggering due to vibration.
- Automatic Tool Offset Correction and Automation options allow integration into fully automated manufacturing cells.
- The Extol can support the TP200B probe which uses strain gauge technology, so it does not exhibit lobing characteristics making it ideal for high accuracy applications. In addition, the TP200 probe has a longer life expectancy compared to the TP20, also making it ideal for automated and high-volume applications.

Extol powered by Aberlink 3D - making measurement easy

The Whole philosophy for Aberlink is to make measurement easy. Aberlink 3D software has been written by engineers for engineers and sets the industry standard for simple-to-use software. As a component is measured a representation of it is built up on the screen. The user simply clicks on the measured features to call up dimensions exactly as they would appear on a drawing.

However, Aberlink 3D is not only easy to use but also has the depth of functionality to make it the choice for either occasional users or full-time inspection professionals. The software incorporates GD & T dimensioning, RPS alignment, SPC data analysis and further modules are also available for off-line programming of parts from a CAD model and also for comparing measured results to the CAD.

Popular throughout the world, Aberlink's measurement software provides the user with a powerful, yet easy-to-use interface. This substantially increases component through-put and vastly reduces the learning period for new users.



Specification

Extol 370 Extol 520

Measuring Volume

	XY (a)	Dia. 370mm	Dia. 520mm
Cylindrical	Z (b)	270mm	300mm
Cylindrical	Z (c)	365mm	400mm

Dimensions

	X (d)	715mm	950mm
Overall Width	X (e)	1000mm	1180mm
Width incl. Monitor	Y (f)	730mm	990mm
Overall Depth	Y (g)	1030mm	1320mm
Depth incl. Monitor	Z (h)	2000mm	2200mm
Overall Height	Z (i)	900mm	772mm
Height to Table			

Total Weight 180kg 211kg

Table Granite Plate Granite Plate

Table Load Capacity 200kg 200kg

Volumetric Accuracy (2.6 + 0.4L/100) μm (2.6 + 0.4L/100) μm

Scale Resolution 0.1μm 0.1μm

Operational Temp. Range 45°C 45°C

Max. Acceleration Vector 750mm/sec² 750mm/sec²

Max. Velocity Vector 500mm/sec 500mm/sec

Required Air Pressure Not Required Not Required

