

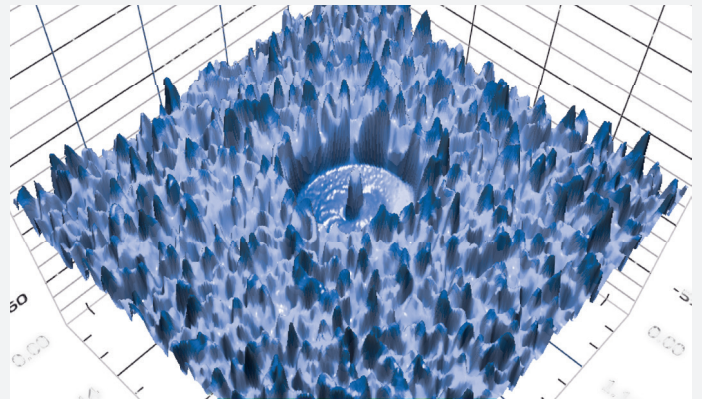
SWISS  MADE

3D MACHINE VISION

From simple height profile measurements to precise dimensional checks of surface elevations with micro-meter accuracy.

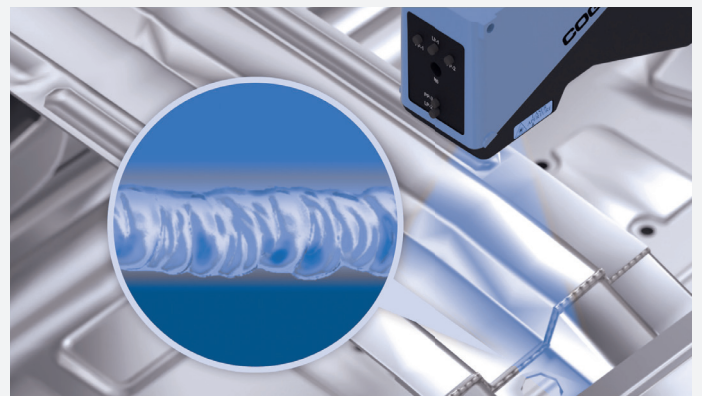
PERFECT 3D MEASUREMENT GUARANTEED

Thanks to various robust methods such as laser triangulation, stereo vision and interferometry.



FASTEST PROCESSING TIMES

3D standard solutions with in-line machine vision systems used on production lines.



FREEDOM / FLEXIBILITY

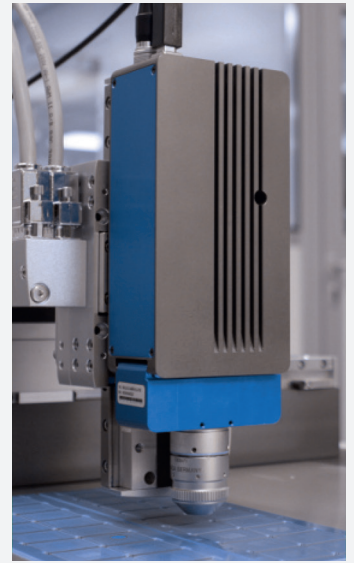
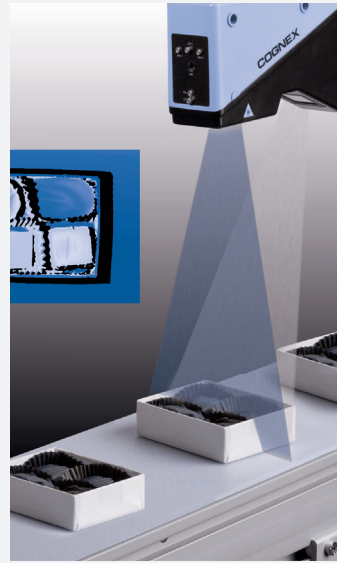
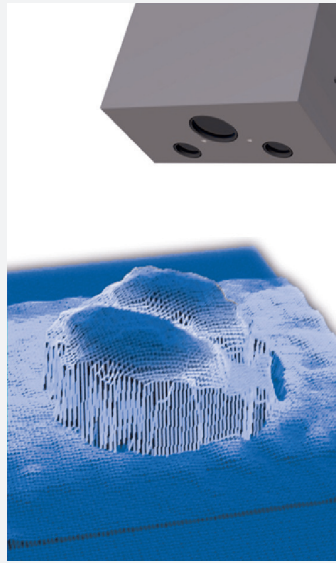
Multiple camera solutions, robust 3D measurement from a combination of different procedures, use of various 3D manufacturer libraries.



from simple height profile measurements
to detailed surface measurement checks of
micrometer sized cross-sectional areas

Measuring objects in 3D has many advantages in many applications. Additional depth information can be important for product identification, quality assurance or robot control. They are practically indispensable when measuring volumes.

In practice, it is important to achieve robust results with different ambient conditions, surface qualities and colors of the products. Various methods help to achieve robust results. Compar offers feasibility studies and has a suitable standard solution for many 3D requirement applications.



Criteria / 3D Machine Vision	Stereovision	Triangulation	Interferometry
Part size	from 10 mm up to 1500 mm	from 1 um up to 400 mm	from 100 nm up to 6 mm
Reference resolution (z)	from 1 mm	from 0.1 um	from 10 nm
Performance (1)	from 0.2 sec / part	from 1 sec / part	from 1 sec / part
Vision system	VISIONexpert® PC based machine vision software		
Machine vision highlights	Teach-in mode for new products, integrated product management, production statistics		
Inspection tasks	Product identification, volume measurement and profile control		
Option	» Multi camera system		
	» Combined inspection of multiple features		
	» Special designs are also possible (on request)		

(1) cycle time strongly dependent on geometry, surface texture image size as well as handling speed.

REALIZED APPLICATIONS / EXAMPLES / MARKETS

watch making



packaging



medtech



automotive



food



non industrial

