



CALIPRI flush & gap measurement

Solutions for the aerospace industry



CALIPRI aerospace solutions

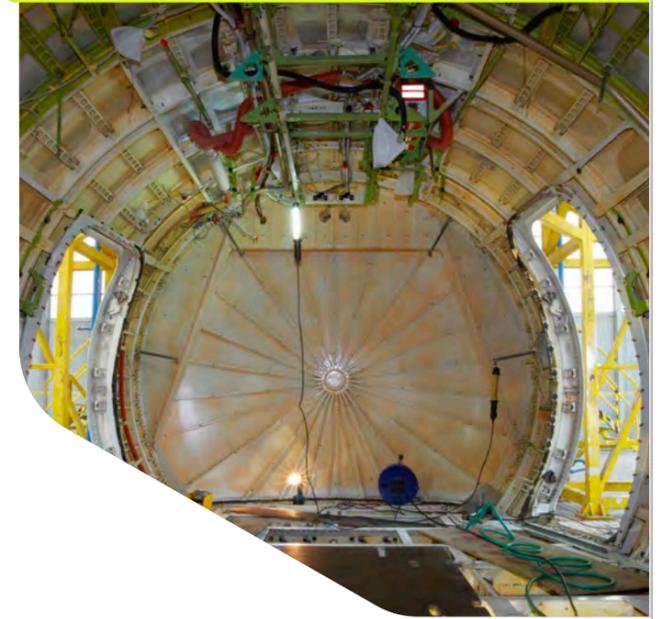
CALIPRI non-contact profile measurement systems provide the aerospace industry with a simple, precise, and repeatable way to measure flush and gap, and any other 2D profile on critical structures.

All CALIPRI devices use sophisticated laser light section technology combined with the patented CALIPRI Principle, ensuring accurate and consistent results throughout every stage of aircraft manufacturing. Whether you need to inspect flush and gap on fuselage panels, wing assemblies, or composite structures—Hexagon offers dedicated aerospace solutions tailored to your production requirements.

Unlock unlimited measurement possibilities

Experience the freedom to measure virtually any geometry with precision and ease. Powered by our modern, intuitive software package, CALIPRI transforms complex 2D profile data into meaningful insights. Whether you're analyzing gaps, contours, edges, radii, or entirely unique shapes, CALIPRI's versatile measurement and analysis toolkit adapts effortlessly to your application. Each collected 2D profile becomes a rich data source for automated evaluations, trend analyses, and custom geometry extraction.

With its clean interface, smart workflows, and fast visualization tools, CALIPRI enables users across all skill levels to evaluate measurement results quickly, confidently, and consistently. From shop-floor technicians to engineering specialists, everyone benefits from the same reliable, user-independent accuracy.



Measure anything. Understand everything.

CALIPRI brings powerful, wide-ranging analysis capabilities and unmatched flexibility together—so you can focus on decisions, not data handling and is a complete measurement system solution. Sensors, measurement computers and software components form a perfectly aligned overall solution from profile capturing to data export.

By measuring at highest precision, with high reproducibility and completely platform-independent, the unique CALIPRI solutions are the answer to the aerospace industry's call for as-narrow-as-possible flushes and gaps.

With the contact-free measurement systems any gap profile and contour is completely and precisely measured, and all relevant measurement data is evaluated accordingly.



CALIPRI C14

- » Measurement field: 50x50mm
- » Flush & gap (0.3 – 25 mm), steps, angles & radii, depth & width of grooves, height and width of protrusions, parallelism or adjacent surfaces.
- » Laser: 450nm, class 2M
- » Accuracy: abs. +/- 30µm - repeat. +/- 15µm

Applications:

- » Flush & gap measurements
- » Interior & outer skin
- » Shim prediction
- » Gaskets

Additional information

- » Wireless (WiFi) & lightweight (590g) handheld device
- » 4h battery life (exchange- & rechargeable)
- » Display: large 10.1 inch tablet display & compact 2.4 inch sensor display
- » Laser light section technology
- » Patented automatic tilt & roll correction
- » Multiple exports (formats: pdf, xml, csv, dxf, ...) via WiFi, or Ethernet
- » IP 54

CALIPRI C42

- » Measurement field: 150x130mm
- » Maximum structure dimensions (approx.)
 - » Flush (step) height 130 mm
 - » Gap width 100 mm
 - » Radius 150 mm
- » Laser: 660nm, class 2M
- » Accuracy: abs. +/- 100µm – repeat. +/- 50µm

Applications:

- » Determining the Radial gap's step during fuselage joining
- » Skin gap evaluation
- » Seat rail alignment

Additional information

- » Wireless (WiFi) & lightweight (590g) handheld device
- » 4h battery life (exchange- & rechargeable)
- » Display: large 10.1 inch tablet display & compact 2.4 inch sensor display
- » Laser light section technology
- » Patented automatic tilt & roll correction
- » Multiple exports (formats: pdf, xml, csv, dxf, ...) via WiFi, or Ethernet
- » IP 54





Reliability and repeatability

CALIPRI solutions have demonstrated higher reliability in measurement results than other regular, conventional digital gauges.



CALIPRI Principle inside

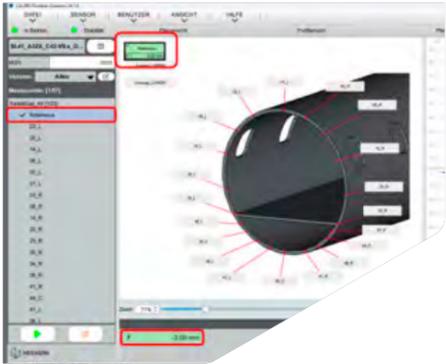
Achieve a complete profile scan without assumptions, powered by patented CALIPRI technology for unmatched accuracy and reliability in every measurement.



Utilization from prototyping to final assembly

CALIPRI C14 fits to multiple process/quality control flows at your facility. Flexibility enables the coverage of a variety of different applications.

CALIPRI Manager + Portable Operator



Export for any downstream workflow. Share results as standard reports and data files (e.g., PDF, CSV, point-cloud/profile data) or configure tailored outputs for direct consumption in CAD/PLM/quality systems. CALIPRI's export and reporting options keep your processes flowing—whether you're documenting compliance, feeding analytics, or closing the loop in digital manufacturing. (Custom report formats available via service when needed.)

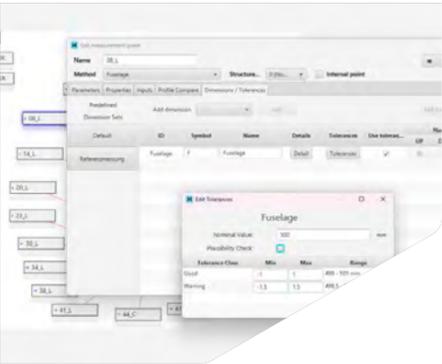
Plan. Measure. Execute.

Design measurement plans in minutes. With CALIPRI Manager's modern, visual workflow, you define objects and points, set method-specific parameters, and add metadata—all in a clean, intuitive structure that's easy to maintain and scale across teams. One plan powers many devices, ensuring consistent results wherever you measure.

Follow the procedure, step-by-step. On the shop floor, CALIPRI Portable Operator guides users through the exactly planned sequence with clear screens, status indicators, and context-aware controls—so technicians capture the right 2D profile at the right spot, every time. Results appear instantly, ready for review and validation. Turn profiles into decisions—fast.

Plan once. Execute everywhere.

Create the plan in CALIPRI Manager, deploy to portable systems with CALIPRI Portable Operator, and keep results consistent across teams and sites—so quality scales with your operation.

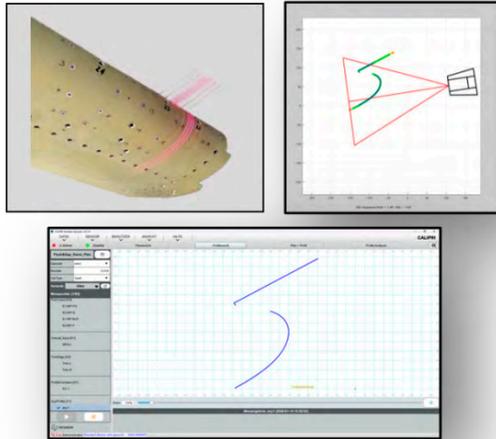


Precision and reliability for aerospace manufacturing with CALIPRI

CALIPRI systems deliver unmatched accuracy and repeatability throughout the aerospace production process—from initial design and development over full-scale assembly to operation and maintenance. Our advanced CALIPRI technology is specifically engineered for any 2D profile as well as flush and gap measurements on critical aerospace components.

- During inspection, the sensors captures the profile of any contour from multiple perspectives.
- Gaps are inspected looking both deeply into the gap and along the entire edge profile to precisely map its geometry. This ensures consistent, reliable results even for complex structures such as fuselage panels, composite assemblies, and aerodynamic surfaces.

By applying the CALIPRI Principle, evaluations are based on real measurement data—eliminating the need for assumptions or approximations. Flexible evaluation strategies allow you to generate measurement plans according to CAD models, ensuring compatibility across all CALIPRI devices. This enables seamless comparison of results at every production stage and supports process control decisions with dependable, traceable data.





Hexagon is the global leader in measurement technologies. We provide the confidence that vital industries rely on to build, navigate, and innovate. From microns to Mars, our solutions ensure productivity, quality, safety, and sustainability in everything from manufacturing and construction to mining and autonomous systems.

Hexagon (Nasdaq Stockholm: HEXA B) has approximately 24,800 employees in 50 countries and net sales of approximately 5.4bn EUR.

Learn more at [hexagon.com](https://www.hexagon.com)