SPECTRUM TECHNOLOGIES

CAPRIS CONTRAST MEASUREMENT SYSTEM

SIMPLIFY MANUFACTURING
INCREASE PRODUCTIVITY – REDUCE COST

From Spectrum Technologies - the global leader in laser wire processing systems

EN

The Mark of Excellence

CAPRIS CMS2
CONTRAST MEASUREMENT SYSTEMS

DESIGNED SPECIFICALLY FOR OFF-LINE CONTRAST MEASUREMENT OF LASER AND INK MARKS ON ELECTRCIAL WIRING.

The CAPRIS CMS2 - Contrast Measurement System provides a convenient off-line Quality Assurance tool which can be used simply and quickly to monitor and measure the contrast of end-user applied and manufacturers' markings on wire and cable, for aerospace and other applications.

The system is able to measure contrast accurately, repeatedly and efficiently, independent of time or the operator, and provide a record of the measurements for quality tracking purposes.

The CAPRIS CMS2 system uses a unique Spectrum-patented area measurement technique. Through the use of a video system and area scan camera the system images the mark and makes a determination of contrast from a single measurement over a large sampling area. This is much faster and more accurate than making manual multiple individual point measurements.

The unit is designed for simplicity of use. Samples are loaded into a precision mount which is positioned in the measuring recess. The operator adjusts the position of the sample while observing the image on screen.
A PC with Spectrum's proprietary custom Windows-based software enables the contrast of a sample to be accurately calculated in a single measurement.

At the click of the mouse, the unit measures and calculates the average contrast of the mark and provides a simple PASS/FAIL result for operators.

Data from multiple measurements can be stored to provide an overall average contrast value. The operator has the option to store the contrast result, the sample information and the image on file.

The CAPRIS CMS2 operation and performance has been verified by the US National Institute of Standards and Technology (NIST) under a US Navy funded programme.

It is recognised and qualified to Boeing's key BAC 5152 process specification as well as to Sikorksy's SS7333 specification. It also complies with the requirements of the latest test methods such as EN 3475-Part 705, Contrast Measurement and AS4373 - Test Methods.

When used alongside a Nova wire marking system the Nova internal power checks and adjustments and CAPRISCMS 2 measurements ensure that the overall marking process is operating correctly.

TECHNICAL SUPPORT

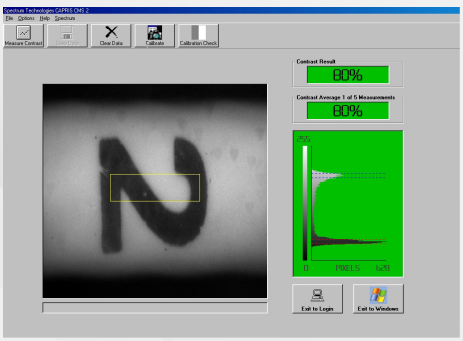
- 12 month return to base warranty as standard on all new systems
- Round-the-clock global support network with rapid response to any issues and 24 hour telephone hotline support
- Dedicated team of fully trained field service engineers in 3 continents as well as sales & service partners covering more than 25 countries worldwide
- Operational training for Production and Technical personnel carried out at installation
- Maintenance contracts available to keep systems operating at optimum performance
- Spare parts stocked in the UK, US & China

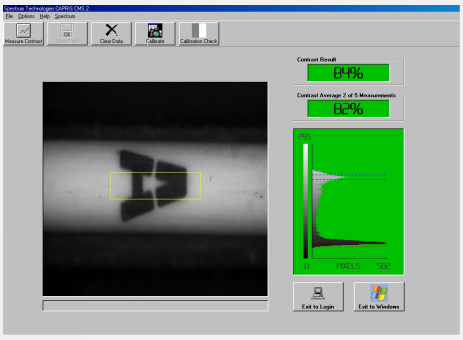
To discuss any of your requirements please contact us at **sales@spectrumtech.com** or on **+44 (0)1656 655 437**.

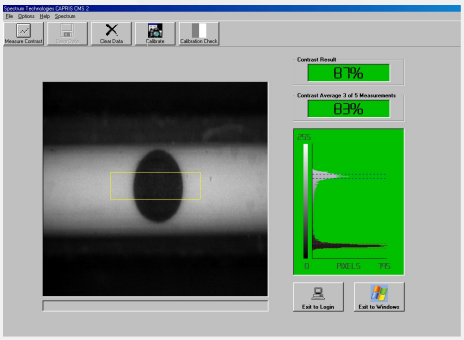
CMS2

Summary specifications

CMS2 Comprising	Contrast measurement module (CMM), PC with area scan camera and preloaded with custom CMS software, 3 precision wire mounts and calibration tile assembly
Contrast Range	Suitable for measurements in the range 35 to 100% (for white and light coloured wires only)
Accuracy	+/-2 %
Warm Up Time	5 Minutes
Measurement	Area measurement system with area scan camera enables contrast values to be measured and calculated from a single image within ~15 seconds - including set up
Results	Displayed on PC monitor with option to store the result and image on file
Wire Size Range	26 AWG (0.9 mm/0.03 inch OD) to 6 AWG (6.3 mm/0.13 inch OD)
Calibration	Black, white and grey tiles provided, traceable to National Standards. "Quick check" facility enables operator to confirm calibration status in 10 seconds.
Observation Area	~ 3.4 mm x 2.5 mm (0.13 x 0.10 inches
Illumination	Single lamp with two fibre optics at 45°
Color Temperature	3100 K
Lamp Replacement	Every 6 months to maintain colour temperature
Photopic Response	A photopic filter is included in the detection system to ensure that the CMS2 simulates the response of the human eye
Dimension (CMM)	18 cm x 23 cm x 39 cm (7 x 9 x 15 inches) (W x D x H)
Weight (CMM)	8.4 kg (18.5 lbs)
Power Requirement	Single phase: 110V, 2A, 60 Hz or 230V, 1A, 50 Hz
CE Conformity	In compliance with EC and FDA directives







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