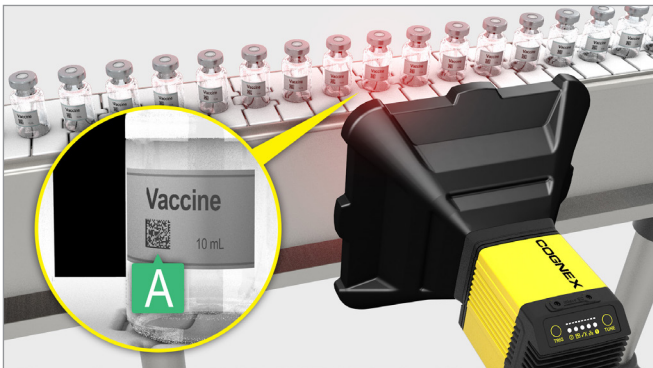


DATAMAN 475V SERIES INLINE BARCODE VERIFIER

Automate code quality assurance without slowing down production

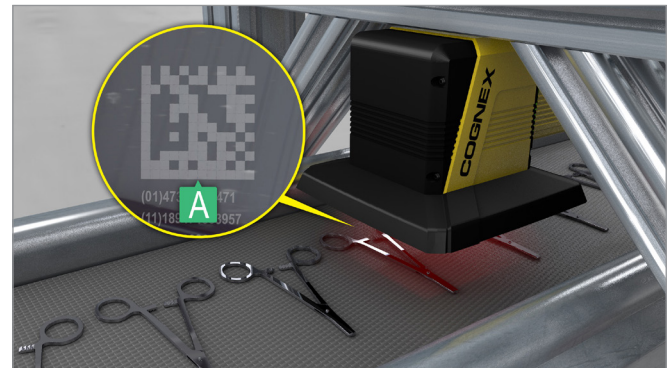
Barcode verification is the process of grading the quality of barcodes according to globally accepted ISO standards. Cognex barcode verification technology ensures the readability and compliance of 1D and 2D barcodes. Today most companies spot check codes one at a time using an offline, operator-based verifier which can be slow and prone to errors.

The DataMan® 475V series inline barcode verifier can grade up to 20 codes per second. High-speed 100% verification and quality reporting can be done directly on your production line, preventing product waste and costly chargebacks. Immediate feedback and intuitive visual diagnostics provide operators with the ability to identify and correct printing and process control issues as they happen. For every code verified, detailed reports can be archived to ensure traceability, statistical process control, and compliance.



Label-based barcode quality compliance

The DataMan 475V-label uses a four-quadrant, 45-degree lighting attachment for grading 1D and 2D label-based barcodes. This model is compliant with the International Organization for Standardization (ISO) 15416 and 15415 standards.



Direct part mark (DPM) code quality compliance

DM 475V-DPM illuminates codes on textured, curved, and highly reflective surfaces using a multi-quadrant lighting attachment with 30S, 30Q, 30T, 45, and 90-degree lighting options. This model is compliant with ISO/IEC TR 29158.



The included calibration card and robust grading algorithms ensure that the DataMan 475V conforms to ISO and application standards while providing accurate and repeatable results.

ISO Quality Standards:

- ISO 15416
- ISO 15415
- ISO/IEC TR 29158 (AIM DPM)

Verify on high speed lines without sacrificing analytics

The DataMan 475V barcode verification software provides intuitive visual diagnostic information to identify one-off or trending code quality issues. It assigns an overall grade to a code based on measurements of ISO-defined quality parameters. These parameters measure several factors that affect a barcode reader's ability to identify and decode a code, maximizing read rates down-process.

Whether using for real-time diagnostics, archiving results for traceability and compliance, or aggregating for statistical process analysis, the DataMan 475V provides the flexibility and wealth of data to meet your code quality assurance needs.

The screenshot shows the DataMan 475V software interface. On the left, a barcode is displayed on a grid. Below it, a 'Generic Acceptance Criteria' section shows 'Pass' and 'Data IN1000'. A 'Go Live' button is visible. On the right, the 'Overall ISO15415 Grade' is shown as 'D (1.0) 1.0/20/660/45'. Below this, a list of 'Grade Parameters' includes 'Unread Error Correction (URC) 33% D', 'Symbol Contrast (SC) 68% B', 'Modulation (MOD) A', 'Reflection Margin (RM) C', 'Axial Nonuniformity (ANU) 0.9% A', 'Grid Nonuniformity (GNU) 1.1% A', 'Fixed Pattern Damage (FPD) 4.0 A', 'Left L' Side (LLS) A', 'Bottom L' Side (BLS) A', 'Left Quiet Zone (LQZ) A', 'Bottom Quiet Zone (BQZ) A', 'Top Quiet Zone (TQZ) A', 'Right Quiet Zone (RQZ) A', 'Top Transition Ratio (TRR) 0% A', 'Right Transition Ratio (RTR) 0% A', 'Top Clock Tracks (TCT) A', 'Right Clock Tracks (RCT) A', and 'Average Grade (AG) 4.0 A'. A 'Pre-loaded application standards' label points to the 'Data' field. An 'Overall Verification: Pass 0 out of the last 100 verifications failed the current application standard. Threshold is 40/100' message is shown. A 'Real time trend analysis' label points to a small line graph at the bottom. An 'Adjustable grade trend threshold alerts' label points to the 'Go Live' button.

Diagnose code quality issues quickly and easily with color-coded, data-rich visual diagnostic tools.

The screenshot shows two views of the DataMan 475V software. The left view displays a 'Data' table with columns for 'Grade' and 'Count'. The right view shows a 'Verification Data' table with columns for 'Parameter', 'Value', and 'Grade'. A barcode is visible in the bottom right corner.

Automatically save data-rich PDF or HTML reports for every verification or only for problem codes.

The screenshot shows two examples of reports generated by the DataMan 475V software. The left report is a PDF report, and the right report is an HTML report. Both reports contain detailed verification data, including a barcode image and a table of results.

Archive the full data from each ISO verification result to an FTP server or the cloud.

The screenshot shows a list of verification results in the DataMan 475V software. The list includes columns for 'Data Matr', 'Generic', 'ISO 15415', 'Pass', 'URC', 'SC', 'MOD', 'RM', 'ANU', 'GNU', 'FPD', 'LLS', 'BLS', 'LQZ', 'BQZ', 'TRR', 'RTR', 'TCT', 'RCT', 'AG', and 'Grade'. The results are color-coded by grade, with 'Pass' in green and 'Fail' in red.

SPECIFICATIONS

| | DataMan 475V-label | DataMan 475V-DPM |
|-------------------------------|--|---|
| Lighting Types | 660 nm, 45°, 4-quadrant | 660 nm, 45°, 4-quadrant 660 nm, 30°, 1-quadrant, 2 quadrant, 4-quadrant 660 nm, 90° |
| Symbologies | 1D: UPC/EAN, Code 128, ITF-14, I25, Code 39, Code 93, Codabar 2D: Data Matrix (ECC 200), QR Code, Micro QR Code, PDF417 | 2D: Data Matrix (ECC 200), QR Code, Micro QR Code, UPC/EAN, Code 128, Code 39 |
| Field of View | 80 x 60 mm | 35 x 29 mm |
| Working Distance | 60 mm | 41 mm |
| Depth of Field (WD Tolerance) | ±3 mm | 5 mil symbols: ±1.5 mm 15 mil symbols: ±2.5 mm |
| Minimum X-Dimension | 6 mil (0.15 mm) | 3.75 mil (0.095 mm) |
| Image Sensor | Sony IMX264LLR 5 MP (2448 x 2048 pixels) 2/3 inch CMOS, global shutter 8.5 mm x 7.1 mm (H x V); 3.45 µm square pixels | |
| Lens Type | 12 mm fixed focal length, f/4 fixed aperture, 2/3 inch sensor format, C-mount lens (users cannot alter lens) | 35 mm fixed focal length, f/4 fixed aperture, 2/3 inch sensor format, C-mount lens (users cannot alter lens) |
| Communications | Ethernet | |
| Power Consumption | 24 VDC ±10%, 1.5 A max (36 W peak) | |
| Weight | 945 g | 1002.7 g |
| Dimensions | 185 x 185 x 175 mm | 286 x 144 x 190 mm |
| Environmental Protection | IP65 | IP65 with cables and appropriate lens cover attached |
| Approvals | CE, TUV, FCC, KC | |
| Industry Standards Compliance | ISO/IEC 15415, ISO/IEC 15416, ISO/IEC TR 29158, ISO/IEC 15426-1, ISO/IEC 15426-2 | |
| Application Standards | GS1, MIL-STD 130 UID, UDI, HIBCC, ISO 15434, Russian Crypto-Code, Custom Application Standards | |
| Maximum Codes per Second | 1D: 20 codes/second* 2D: 10 codes/second* | 2D: ~10 codes/second* |
| Maximum Linear Line Speed | 3.6 ft/second (1.1 m/second) | 4.6 ft/second (1.4 m/second) |
| Coplanarity Tolerance | ±3° of coplanar | ±2° of coplanar |

* Code symbology, size, placement, part substrate, and marking type all affect the verification speed.

COGNEX

Companies around the world rely on Cognex vision and barcode reading solutions to optimize quality, drive down costs and control traceability.

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