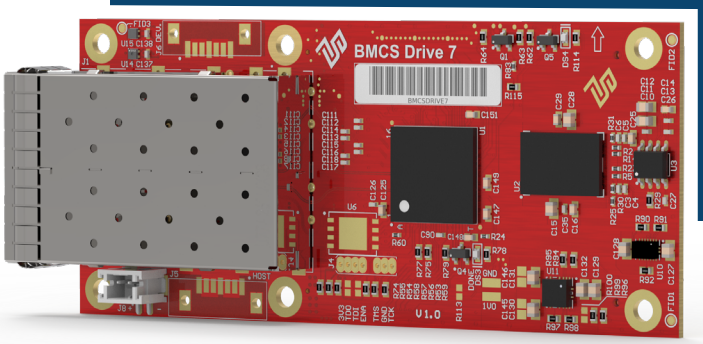
LED MODULE RECEIVING CARD

BMCS DRIVE 7

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BMCS Drive 7 is a professional LED receiving card that processes image data and controls LED modules in high performance display systems. It combines advanced image processing, reliable communication, and integrated system monitoring to ensure stable operation and excellent image quality.

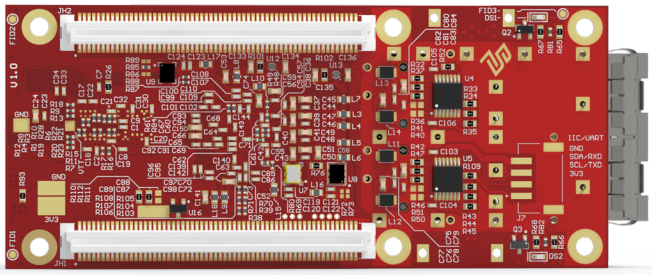
High Speed Data Management

Dual 10G Ethernet SFP+ ports support optical modules, DAC, and AOC connections and providing fast and reliable communication with ERPS ring redundancy for maximum network availability. High speed 128 Mbyte DDR3(L) memory (1G x 16 @ 400MHz) processes image data and calibration information in real time, while 256 Mbit (3 Mbyte x 8) QSPI Flash securely stores firmware, calibration data, and system settings.

Secure System Monitoring

Temperature, voltage, optional humidity, operating hours, data quality, and pluggable component information are continuously monitored to simplify system management and maintenance. Secure boot for FPGA encrypted bitstream, an embedded RISC CPU with administrator and user modes, a hardware firewall, and secure FPGA and CPU network updates provide comprehensive system protection and support compliance with the EU Cyber Resilience Act (CRA).

Rear view



- **Display Capacity:** Supports up to 512k pixels (i.e.1024 × 512)
- **Color Depth:** Supports 8, 10, 12 bit per color modes
- **Greyscale Processing:** Supports from 12- to 18-bit greyscale data processing
- **LED Diagnostics:** Supports LED open/ short detection on supported LED driver chipset
- **Network Protocols:** Ethernet stack supports ICMP, ARP, BOOTP, LLDP, DNS and other IP-based services
- **Traffic Monitoring:** Supports L2 and L3 Ethernet traffic with traceability for penetration testing and monitoring
- **Power Consumption:** Power consumption less than 3.0 W, or less than 2.5W when using DAC interconnect
- **Passive Cooling:** Passive cooling requires no additional heatsink or fan
- **Made in Germany:** Hardware and software designed and manufactured in Germany

Intelligent Image Processing

BMCS Drive 7 supports full color and low greyscale calibration, Gamma and PQ curves, LED refresh rates up to 20kHz, and frame rates from 23.97Hz to 120Hz with automatic calculation of LED timing parameters. These features ensure accurate image reproduction and stable display performance.

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