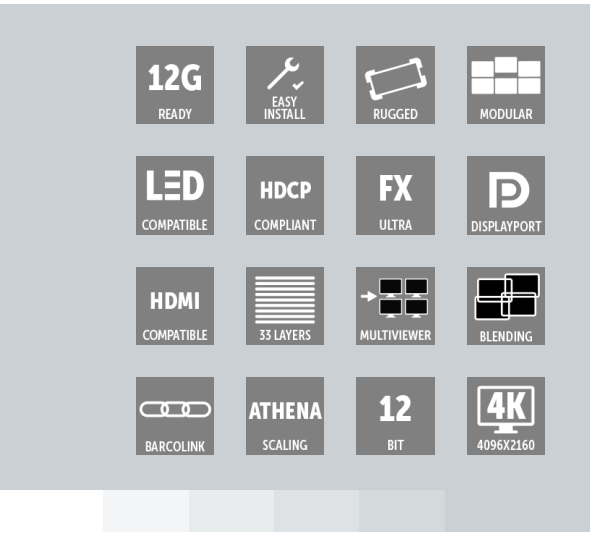
E2 Gen 2

Full show control in a single box





- **Increased 4K input capacity**
- **Easy and reliable show setup and production**
- **Flexible layer management system**
- **Intuitive user interface**

Raising the bar for screen management, the E2 presentation systems provide superior image quality, exceptional input and output density, great expandability and durability. Supporting native 4K input and output, it was the first screen management system to manage 4K projector blends with refresh rates up to 60Hz with full 4:4:4 color sampling and 12bit processing. A truly versatile system, it offers eight mixable PGM outputs and four scaled Aux Outputs for full show control within a single box. Multiple E2s can be linked together to process extremely large pixel canvases supporting the largest displays available.

Go 4K all the way

With up to 40 inputs and 18 outputs, the E2 Gen 2 processor provides full screen control. The E2 Gen 2 offers 16 4K inputs and 8 4K outputs enabling impressive pixel processing power with increased processing speed. Whether native or scaled inputs, single cable 4K60p, two connectors or four, this HDCP-compliant system manages it all. Thanks to its linkable chassis, it can easily expand beyond the capabilities of a single box without the need for additional external processing and matrix routing to distribute the signals.

Simple servicing and control

The E2 Gen 2 comes with a straightforward cross-platform user interface that provides touchscreen ergonomics. As the presets are stored on the chassis it enables easy control via third-party systems. Multiple users can control the system simultaneously, and the API allows third-party developers to create custom control programs and interfaces. The 4K Multiviewer and its comprehensive overview of any input and output in the system allows for full situational awareness while creating the most impressive experiences. Thanks



to its modular design, users can simply add new input or output cards to support future signal interfaces.

Designed for life on the road

The rugged E2 Gen 2 features a steel chassis that's able to withstand the challenging conditions of life on the road. What's more, it offers screen control in a compact form factor of only four rack units, which makes it easy to ship and install. Thanks to its modularity and the improved dual redundant power supplies, the E2 Gen 2 is extremely reliable and easy to service in the field.

Layers, layers, layers

The E2 offers an extremely flexible layer management system. With up to 32 layers available in HD, the E2 Gen 2 can customize the layer configuration to meet the needs of your application. The layers can be configured to support a mixture of HD and 4K resolutions maximizing your system flexibility.

PRODUCT SPECIFICATIONS	E2 GEN 2
Model	NGS-4U-V2
Live effects canvas	Up to 20 Megapixels PVW/PGM 40 Megapixels PGM only 80 Megapixels @30p and PGM only
Video inputs	40 inputs via 8 input cards (Event Master series cards) ■ Up to 16 x 4K inputs - each input card supports up to 2x 4K@60p ■ 16 x SD/HD/3G/6G/12G connectors ■ 12 x HDMI 2.0 (600 MHz max) ■ 12 x DisplayPort 1.2 (600 MHz max)
Video outputs	Up to 18 output connectors among 4 output cards (Event Master series 2 cards) {each output card supports up to 2x 4K@60p} ■ 4 x SDI (SD/HD/3G/6G/12G), ■ 13 x HDMI (up to 600 MHz) ■ 1 x DisplayPort(up to 660 MHz) NO MVR: Up to 8 x 4K60p outputs WITH MVR: Up to 6x 4K60p outputs and either 4x HDMI for FHD Multi-viewers (1920x1200 max) OR 1x HDMI for UHD/4K60p Multi-viewer
Genlock	Analog reference input/loop on BNC connectors; bi-level and blackburst at SD and tri-level at HD S3D Sync: 4x input Din connector, 2x output Din connector
Program output	Up to 18 program outputs configurable as single screens or tiled/blended widescreens (preview and Multi-Viewer not available in all configurations) Configurable for up to 18x 2048X1200@60 or up to 8x 4096x2400@60 Independent edge blending/feathering control for all four sides
Scaled Aux outputs	User definable for up to 18x 2048x1200@60 or up to 8x 4K@60 All outputs can be defined as Aux destinations for a total of 18 Aux outputs Output color correction (preview and Multi-Viewer not available in all configurations)
Mixers	■ Native resolution background mixer per output screen ■ Independent layer transitions or full Preview/Program transition ■ Flexible layer allocation ■ up to 16 mixable or 32 single scalable PIP/key layers assignable to Program output screens
Still stores	Up to 100 HD or 25 UHD, depending on the import file size.
Layer effects	■ Borders (hard, soft, halo) and drop shadows ■ Color effects ■ Strobe, H&V flip ■ Luma, chroma and Cut/Fill keys (not all modes support keying) ■ PIP moves via Keyframes
Multiviewer	■ Flexible user-definable layouts ■ Monitor all Inputs and Outputs, including Preview and Aux ■ Two outputs ■ Dedicated hardware same as E2 Event Master Processors
Expandability	■ Easily expandable for larger display applications via proprietary links ■ Link units to increase available Inputs and Outputs for larger tiled/blended widescreen applications ■ Expansion via simple linking to: 2 S3-4K or 8 Ex chassis, or 1 S3-4K plus 4 Ex chassis, or up to 7 more E2 Gen 1/Gen 2 chassis ■ E2 Gen 2 ships with the ability to link 8 chassis for expansion.

PRODUCT SPECIFICATIONS	E2 GEN 2
HDCP	HDCP compliance determined by installed cards.
Control	■ Event Master screen management software for PC or MAC ■ Event Master controllers ■ WebUI ■ Ethernet RJ-45, 1000/100/10 Mbps autosense
Serviceability	■ Field-Serviceable I/O and processing cards (not hot-swappable) ■ Hot-swappable dual-redundant power supplies
Noise Level	Max 52.9 dB avg. Fans at 100%. Fan speed is software-managed based on operating temperature. Reference ISO 7779
Dimensions	■ Height: 17.8 cm (7.0 in) - 4 RU rackmount ■ Width: 43.2 cm (17 in) without chassis handles, 48.3 cm (19 in) with chassis handles attached ■ Depth: 56.9 cm (22.4 in) from front panel to rear panel, 62.2 cm (24.5 in) overall
Weight	31 kg / 68 lbs
Power	■ Input power: 100-240 VAC 50/60Hz 826W ■ Ships with dual-redundant, hot-swappable power supplies
Warranty	3 years parts and labor
Environmental temperature	0-40° C / 32-104 F
Environmental humidity	0-95% non-condensing

Last updated: 07 May 2020

Technical specifications are subject to change without prior notice. Please check www.barco.com for the latest information.