

iMatrix C604

4K60 HDMI 6x4 Seamless Matrix Switcher with USB C, Dante and DSP Design Spec V1.0

Note: this design spec is for system integrators

1. HARDWARE

- The matrix shall have 6x AV input ports and 4x HDMI 2.0 output ports.
- The matrix shall have 1x USB C AV input port.
- The matrix shall have 4x USB A devices ports.
- The matrix shall have 1x TCP/IP port and 1x Dante port.
- The matrix shall have GPIO, RS232, Mic IN, Line IN and Line OUT ports.
- The matrix shall have front screen to show device information.
- The matrix shall have touch panel buttons.

2. FEATURES

- The matrix shall support max. 4K60Hz (4096x2160) 4:4:4 8bit inputs and outputs.
- The matrix shall support seamless switching in less than 1 second.
- The matrix shall support USB C AV input, with at least 60W PD.
- The matrix shall support fully featured USB C IN, the USB C shall support USB 3.0/ USB 2.0.
- The USB C shall support 1G network.
- The matrix shall support HDCP 2.3 and backward compatible.
- The matrix shall support 480P to 4K60Hz scaler.
- The matrix shall support switching USB hosts between 1x USB-C port, 2x local USB3.0 USB-B ports.
- The matrix shall 2x MIC and 1x LINE audio inputs.



- The matrix shall 4x4 Dante audio channels.
- The matrix shall built-in DSP.
- The matrix shall support AEC (Acoustic Echo Cancellation).
- The matrix shall support RS232, TCP IP, Front Buttons, Web GUI control.
- The matrix shall support GPIO and RELAY control.
- The matrix shall support internal temperature monitoring and auto fan speed adjustment.
- The matrix shall support EDID management.
- The matrix shall support HDR formats include HDR10, HDR10+, HLG and Dolby Vision Low Latency.
- The matrix shall support audio spec as max. level up to 1Vrms, gain 0dB-80dB
- The matrix shall support USB audio and Dante audio in 44.1KHz, 48KHz and 96KHz.
- The matrix shall support audio extraction up to 192KHz sampling frequency.
- The matrix shall support audio mixers, ducking, mute/unmute, EQ features.
- The matrix shall support CEC control.
- The matrix shall support audio matrix switching.
- The matrix shall support presets of AV and USB devices switching.
- The matrix shall support online firmware updates.
- The matrix shall support telnet TLS and HTTPS security.

3. WARRANTY

The matrix shall be with at least 3 years warranty

The matrix shall support at least 2 years warranty expansion