

SPECIFICATIONS



FRAME GRABBERS IMAGING SOLUTIONS

VCE-HDmPCle01



IMPERX HD-SDI Mini-PCle is a professional level PCI Express video capture card that enables users to view and store in real time mega pixel video images from any standard HD-SDI video source onto desktop PC computers. IMPERX HD-SDI Mini-PCIe is capable of capturing single or multiple frames and standard AVI clips from any SD or HD-SDI compliant video source. Each captured frame can be stamped with a user message along with the date and time of capture. A full software suite that includes drivers, C/C++, SDK, and an application program is provided with each IMPERX HD-SDI Mini-PCIe (VCE-HDmPCIe01) card.

Note: The physical dimensions of this card are larger than a standard mini-PCle card. As such, it is not compliant with the PCI Express® Mini Card Electromechanical Specification.

HD-SDI Mini-PCIe for Desktop PCs

Acquisition from an SD or HD-SDI video source.

Advanced features: Look up tables, histograms, RGB gain/offset with auto-white balance...

Features

Mini-PCle compliant providing 2.5 Gbps of bandwidth

Intelligent scatter/gather DMA for fast, effcient use of PCIe x1 band-

width and system memory

SD and HD-SDI formats for 720p,1080 and 1080p video

SMPTE 292M serial interface and SMPTE 274M/296M framing

SD or HD-SDI real time video and audio acquisition with SDI loop-through

Audio acquisition of two 24 bit channels @ 48KHz

A second MCX coaxial connector provides an SDI loop-through capability Bi-directional RS232/RS485 serial interface for camera control (Optional)

16/20 bit YCrCb 4:2:2 or 24-bit RGB formatting Flow-through pipelined architecture for low latency

On board color space conversion

Dynamic buffer allocation Selectable window sizes

Adjustable RGB brightness and auto white balance Programmable RGB lookup tables and gamma correction

Captures single, multiple frames or AVI clips

Normal or delay capture Date, time and text overlay

RAW, BMP, TIFF or adjustable JPEG file format

Image viewer with DVR controls

Plug-and-Play operation with hot insertion / removal

Many advanced features including look up tables, histograms, RGB gain/offset with auto-white balance, hex pixel dump, gamma correction

Software Application program: Full featured, intuitive, easy to use GUI

Drivers: Win XP/2000/Vista/7/8, DirectX, Halcon, Adobe Premiere, Matlab

C/C++,COM, .NET, ActiveX - all with sample source code

Video Source Two 75 ohm MCX coaxial connectors (in and out)

Analog SMPTE 292M serial interface operating at 1.485Gbps

SMPTE 274M and SMPTE 296M framing

Power 3.3V DC +/-5%, 500 mA steady

1.65W constant power

Communications RS232/RS485 ASYNC UART for camera control

6-pin Hirose style connector (Optional)

Environmental Operating temperature: -40°C to +85°C

Relative humidity: 90% non-condensing

MTBF >372,000 hours @ 50°C (MIL-STD-785B, MIL-HDBK-217F)

Regulatory FCC part 15, Class B, CE, RoHS Mechanical Low profile PCI Express form factor

Weight 1.91 oz., 47g







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Order: VCE-HDmPCle01

For specific details and ordering information, consult the **HD-SDI Express** user's manual

