ZyPer4K
Uncompressed 4K Encoder

The ZyPer4K platform allows for the distribution and switching of high definition uncompressed video, audio, and control using ZyPer4K encoder and decoder modules and off-the-shelf 10Gb Ethernet switches (both fiber and copper).

Uncompressed 4K
ZyPer4K delivers perfect pixel for pixel reproduction of uncompressed 720p, 1080p HD, Ultra HD, and 4K resolution content directly over a standard 10Gb Ethernet network using standard CAT 6a cables. ZyPer4K eliminates the need to have a separate AV network or proprietary matrix switcher for video and other AV content.

Change sources and content instantly without programming
IP based architecture enables you to instantly switch from one source to another without any loss of frames - even at 4K resolutions.

USB 2.0 and KVM Control
ZyPer4K with USB support enables remote access to keyboards, mice and other devices (KVM) that offer flexibility in securing or accessing equipment such as digital media players that may be stored in remote locations.

Highlights:
- Uncompressed zero latency UltraHD (4K/60) video, audio, and control
- Stereo analogue and digital audio up to 7.1 channels
- 1GbE utility network port on all encoders and decoders
- Source and display control (Infrared and RS232)
- HDMI 2.0 (full 4K 4:4:4 60Hz support)
- HDCP 2.2 compliant
- Supports HDR10, HDR10+ and Dolby Vision
- ZyPerMP (Management Platform) with software GUI allows simple set up and control of ZyPer4K.
- 128 bit AES encryption
- Video wall and multiview support
- Decoder with Integrated Dante Transmitter

ZyPer Management Platform Interface
## ZyPer4K Models & Options

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<td>![Image] HDMI</td>
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<td>![Image]</td>
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<td>![Image]</td>
<td>![Image]</td>
<td>![Image] DISPLAYPORT</td>
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<td>Analog</td>
<td>![Image]</td>
<td>![Image]</td>
<td>![Image] HDMI OUTPUT INTEGRATED DANTE TRANSMITTER</td>
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</table>

### Encoders
- **Input Options**: HDMI, DUAL HDMI WITH LOOPOUT, HD-SDI, DisplayPort, Analog
- **Output Options**: HDMI, HDMI, HDMI FANLESS, DISPLAYPORT, HDMI OUTPUT INTEGRATED DANTE TRANSMITTER

### Decoders
- **Output Options**: HDMI, HDMI, HDMI FANLESS, DISPLAYPORT, HDMI OUTPUT INTEGRATED DANTE TRANSMITTER

### Copper

### Fiber

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**Note**: The above table and diagram illustrate the different models and options available for ZyPer4K encoders and decoders, including HDMI, HD-SDI, DisplayPort, and Analog inputs, with corresponding copper and fiber network interface options.
<table>
<thead>
<tr>
<th>ZyPer4K Encoder</th>
<th>Information</th>
<th>Connector</th>
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<tr>
<td>Video</td>
<td>HDMI 2.0 with HDCP pass-through (Option- al: 3G-SDI, DP, Analogue)</td>
<td>HDMI 2.0 type A, with optional 3G-SDI, Display Port 1.3 or Analogue</td>
</tr>
<tr>
<td>Audio [Digital]</td>
<td>Multi-channel linear PCM up to 8 channels (7:1)</td>
<td>HDMI 2.0 type A, with optional 3G-SDI, Display Port 1.3 or Analogue</td>
</tr>
<tr>
<td>Audio [Analogue]</td>
<td>Unbalanced Stereo [Input or Output]</td>
<td>3.5mm stereo mini jack</td>
</tr>
<tr>
<td>IR</td>
<td>Input/Output ports</td>
<td>3.5mm mini jacks</td>
</tr>
<tr>
<td>RS-232</td>
<td>Full Duplex up to 115.2 kbps</td>
<td>9-pin D-sub</td>
</tr>
<tr>
<td>USB (Optional)</td>
<td>Single USB 2.0</td>
<td>USB Type B</td>
</tr>
<tr>
<td>Ethernet</td>
<td>10 Gb for Video/Audio/Control with 1 Gb Utility</td>
<td>10 Gb RJ45 or SFP+ port 1 Gb RJ45 port</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>ZyPer4K Decoder</th>
<th>Information</th>
<th>Connector</th>
</tr>
</thead>
<tbody>
<tr>
<td>Video</td>
<td>HDMI 2.0 with HDCP pass-through</td>
<td>HDMI 2.0 type A</td>
</tr>
<tr>
<td>Audio [Digital]</td>
<td>Multi-channel linear PCM up to 8 channels (7:1)</td>
<td>HDMI 2.0 type A</td>
</tr>
<tr>
<td>Audio [Analogue]</td>
<td>Unbalanced Stereo [Input or Output]</td>
<td>3.5mm stereo mini jack</td>
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<tr>
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<td>RS-232</td>
<td>Full Duplex up to 115.2 kbps</td>
<td>9-pin D-sub</td>
</tr>
<tr>
<td>USB (Optional)</td>
<td>Dual USB 2.0</td>
<td>2 USB Type A</td>
</tr>
<tr>
<td>Ethernet</td>
<td>10 Gb for Video/Audio/Control with 1 Gb Utility</td>
<td>10 Gb RJ45 or SFP+ port 1 Gb RJ45 port</td>
</tr>
<tr>
<td>Dante Transmitter (Optional)</td>
<td>2 channel Dante Audio over IP</td>
<td>NA</td>
</tr>
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<tr>
<th>Other Specifications</th>
<th>ZyPer4K Encoder</th>
<th>ZyPer4K Decoder</th>
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<tr>
<td>Video Other</td>
<td>Color depth: 24 bit, 30 bit, 36 bit, 48 bit HDMI 2.0 type A</td>
<td></td>
</tr>
<tr>
<td>Signal transmission distance</td>
<td>Cat6a: 328 ft [100 m] or 30km fiber optic line</td>
<td></td>
</tr>
<tr>
<td>Copy Protection/Security</td>
<td>HDCP 2.2, AES-128 Encryption, 802.1X compatible</td>
<td></td>
</tr>
<tr>
<td>RS-232</td>
<td>1 port/Full duplex up to 115.2 kbps</td>
<td></td>
</tr>
<tr>
<td>Power input [locking connector]</td>
<td>12 VDC 2A [Worldwide AC adapter is supplied]</td>
<td></td>
</tr>
<tr>
<td>Power consumption</td>
<td>Approximately 15 watts</td>
<td></td>
</tr>
<tr>
<td>Dimensions (l x w x h) / Weight</td>
<td>6.9 in [176mm] x 5.7 in [145mm] x 1.5 in [37mm], 31.0 oz [880 g] 9 in [229mm] x 5.7 in [145mm] x 1.5 in [37mm], 37.7 oz [1070 g]</td>
<td></td>
</tr>
</tbody>
</table>

ZeeVee, Inc., headquartered in Littleton, Mass., and founded in 2007, is a leading global developer of digital technology and products for distributing audio-video content from any source or multiple sources to any number of displays. Manufactured in the U.S. and used primarily in commercial and corporate applications, ZeeVee products are employed worldwide by major organizations in education, government, hospitality, retail, sports, entertainment, broadcasting, healthcare, housing, energy and other industries. For more information visit www.zeevee.com