

T-Ramp™ IP+DVB-S-S2+ASI/SDI+HDMI+ASI+IP
Real Time, Hardware Based, 1 RU, Local or
Remotely Manageable Multi Resolution, SD and
HD, 4:2:0, H.264 and MPEG-2 Decoder with IP,
DVB-S/S2, or Looped ASI Input. Set Up via LCD
Front Panel or via Browser. Output is SDI
(SMPTE 259M), HD-SDI (SMPTE 292M), ASI,
Component, HDMI, or Composite. Audio Output
Includes Embedded AAC or MPEG-1 Layer II on
SDI Ports or Balanced Audio with Dual XLR
Connectors. Supports Dual CAM Modules.



Front



Rear



Overview

IRD's are devices used by professionals to receive or demodulate RF feeds and to then decode the resultant MPEG encoded stream.

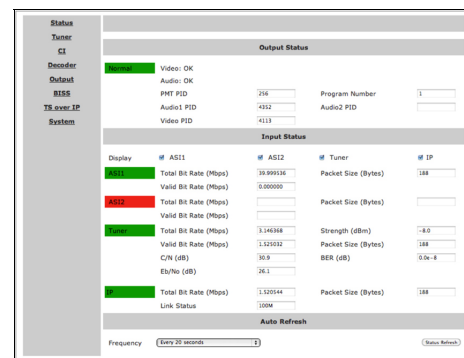
The T-Ramp™ IP+DVB-S-S2+ASI/SDI+HDMI+ASI+IP is an advanced MPEG-2 and H.264 standard definition integrated receiver decoder for both high definition and standard definition video. It receives signals from many different sources, including IP, ASI, DVB-S, and DVB-S2. Its numerous output interfaces include SDI, HD-SDI, HDMI, ASI, YPbPr, CVBS, and XLR audio, to meet many different system requirements. The T-Ramp also has two common interface slots which can decode multiple scrambled channels.

Audio support includes embedded AAC or MPEG-1 Layer II on SDI ports, or analog audio output (L, R) on XLR's.

The T-Ramp also converts transport streams to IP, and it converts IP streams to a wide variety of different transport stream outputs, which makes it ideal for IPTV systems and IP-based head-ends.

The system can be operated with front panel controls or web-based management software. With multiple input and output, the T-Ramp can be used in many different settings – including traditional head-end networks and downlinks.

Sample GUI



Input and Output Status

Features

- Inputs:
 - IP (100/1000 M), DVB-ASI with loopthrough, or DVB-S or DVB-S2 with loopthrough
- Outputs:
 - IP (UDP, RTP), HD-SDI, SDI, HDMI, Two DVB-ASI outputs, Two mirrored DVB-ASI outputs, YPrPb, or Two Composite outputs – one BNC, one RCA
- Audio Outputs: Embedded AAC, MPEG-1 Layer II, YPbPr, Composite, Balanced XLR
- 100/1000 M IP input and output
- Optional DS3 in/out interface is compatible with Barco and Huawei protocols
- Built-in re-multiplexer
- BISS 1 or BISS E decryption
- Dynamic PMT detection and automatic update
- VBI teletext, EBU/DVB subtitle support
- WSS support
- Closed Caption support
- Unicast and Multicast support
- 2 CI slots support 4 service CAM modules each
- Compatible with: Conax, Cryptoworks, Irdeto, NDS, Mediaguard, SECA, Viaccess and more
- Supports PAL, NTSC, and SECAM
- LCD front panel controls plus web-based management

Applications

- Off air satellite receiver
- MPEG-2/4/H.264 HD Decoder
- Transport Stream Decoder
- HD-SDI file playback
- Content repurposing
- Signal monitoring
- IP to ASI and ASI to IP converter



Computer Modules, Inc.

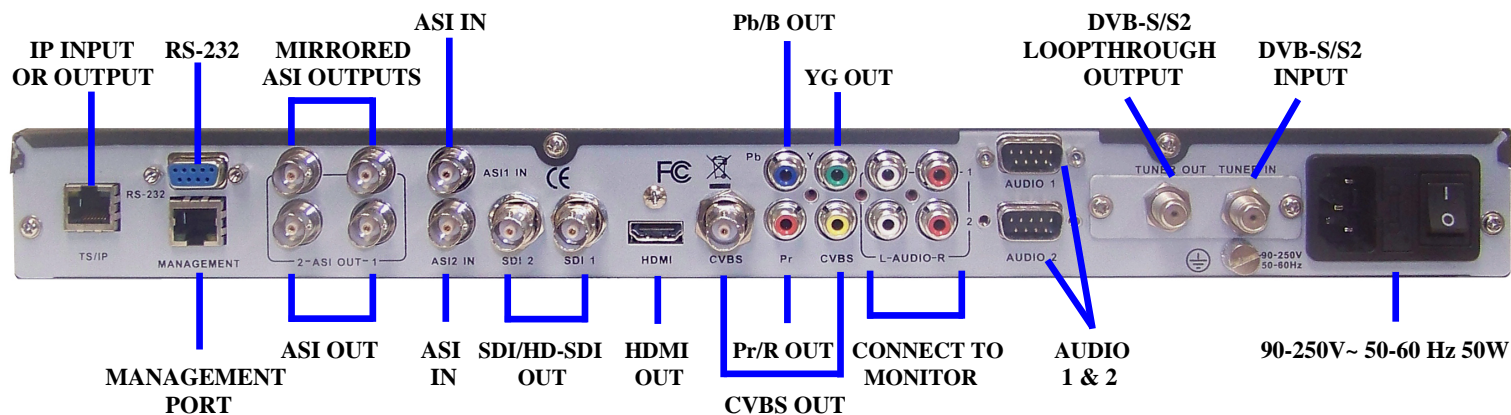
11409 West Bernardo Court

San Diego, CA 92127

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www.dveo.com

Rear View



Specifications

DVB-S2/S RF Input

| | |
|---------------------|---------------------------------------------------------------------------------------------------|
| Frequency range: | 950-2150 MHz |
| Input Level: | -25~-65dBm |
| Input Impedance: | 75Ω |
| Connector: | F-type female |
| Symbol rate: | 2~45 MBauds for QPSK 2~45 MBauds for 8PSK |
| Rolling off factor: | 0.35 for QPSK; 0.35, 0.25, 0.2 for DVB-S2 |
| Punctured rates: | DVB-S QPSK: 1/2, 3/5, 2/3, 3/4, 4/5, 5/6, 8/9, 8/10 DVB-S2 8PSK: 3/5, 2/3, 3/4, 5/6, 8/9, 9/10 |
| LNB Level: | 0, 13V, 18V adjustable |
| 0/22 K: | 0/22 KHz selectable |
| DiSEqC: | DiSEqC 1.0 |

DVB-ASI Input

| | |
|-------------|----------------------------------|
| Inputs: | One input, one loopthrough input |
| Connectors: | 2 BNC female, 75 ohm |

IP Input

| | |
|---------------------|--------------------|
| Protocols: | UDP, RTP |
| Type: | Multicast, Unicast |
| Ethernet Connector: | RJ45, 100/1000 M |

DVB-ASI Output

| | |
|-------------|---------------------------------|
| Outputs: | One output, one mirrored output |
| Connectors: | 2 BNC female, 75 ohm |

SDI/HD-SDI Output

| | |
|-------------|--------------------------------------------|
| Outputs: | Two SD-SDI/HD-SDI outputs – one for backup |
| Connectors: | 2 BNC female, 75 ohm |
| Audio: | Embedded audio |

HDMI Output

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|---------|---------------------------------------|
| Output: | One HDMI output, HDMI 1.3 interface |
| Audio: | HDMI/AES Embedded – PCM or Compressed |

Analog Outputs

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|-------|------------------------------------------|
| YPbPr | One Component output |
| CVBS | Two Composite outputs – one BNC, one RCA |

IP Output

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|---------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Protocols: | UDP, RTP |
| Modes: | <u>DVB Mode</u> : The IP stream will include all the programs and will be sent to the specified multicast or unicast IP Address. <u>IPTV Mode</u> : The input transport stream is de-muxed into individual programs, each in a different IP stream. Up to 6 IPTV addresses may be set. |
| Type: | Multicast, Unicast |
| Ethernet Connector: | RJ45, 100/1000 Mbps |

CI Slots

| | |
|----|-----------------------------------------------------|
| CA | Dual CI slots support four service CAM modules each |
|----|-----------------------------------------------------|

Audio Outputs

| | |
|-----------------|----------------------------------------------------------------------------|
| Audio: | AES/EBU and balanced XRL audio output ports Two 9 pins D-sub connectors |
| Audio Modes: | Stereo, Left, Right, Mono |
| Audio Decoding: | MPEG-1 Layer II |

Control & Monitoring

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|---------|---------------------------------------|
| Local: | Front panel operation, LCD display |
| Remote: | Remote control via RJ45 Ethernet port |

Physical and Power

| | |
|----------------------|--------------------------------------------------------------------------|
| Power Supply: | 90-250V~ 50-60 Hz, 50W |
| Altitude: | Up to 10,000 feet (3,048 meters) |
| Temperature: | Operating Temperature: 0° to +45°C Storage Temperature: -25° to +55°C |
| Humidity: | 10 to 75% |
| Shock and Vibration: | Equal to mobile van or stationary rack |
| Dimensions | HxWxL: 2x8x8 inches (5.08x20.32x20.32 cm) |
| Weight | 2 lbs. (.907 kg) |
| Conformities | FCC, CE, RoHS |

Ordering Info

T-Ramp IP+DVB-S-S2+ASI/SDI+HDMI+ASI+IP

T-Ramp DS3: Optional DS3 input and output