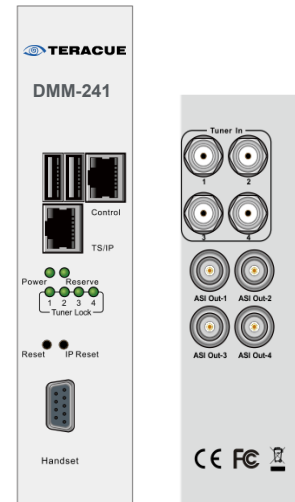


DMM-241 Series

DVB TO IP CONVERTER FOR IPTV HEADENDS

PRODUCT DESCRIPTION

The DMM-241 is a high-density, cost effective modular DVB to IP gateway system and DVB streamer for IPTV headends. The DMM-241 can handle DVB-S/S2, DVB-T/T2 or DVB-C signals. Besides TS/IP output it supports additional ASI outputs. By its compact design and powerful feature set the DMM-241 series is one of the most competitive DVB IP converter and IPTV headend system in the market today.



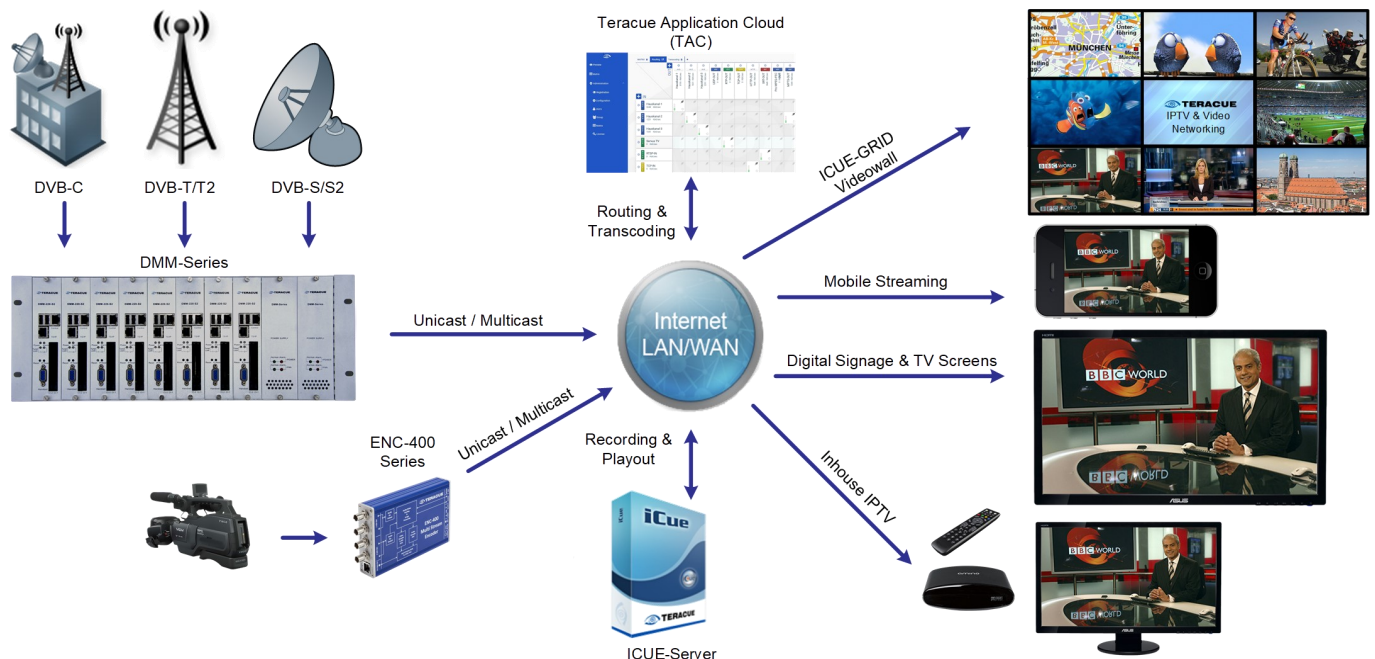
KEY FEATURES

- DVB-S2, DVB-T/T2 or DVB-C support
- ASI outputs
- Remux, PID filtering & dynamic PMT support
- MPTS & SPTS streaming multicast & unicast
- Separate IP port for streaming & management
- EIT support present/next
- Remote configuration by web browser & SNMP
- Local configuration by handheld unit
- Stand alone function of each module
- Hot swappable modules

APPLICATION

- IPTV streaming
- OTT streaming
- DVB monitoring
- DVB remultiplexing
- SPTS & MPTS streaming
- Decryption of Pay-TV

WORKFLOW INTEGRATION



DVB-S/S2 TUNER INPUT

Connector type:	4xF type female 75Ω for input
Input frequency range:	950~2150MHz
Input level:	-25~-65dBm
Symbol rate:	2~45MBaud
Rolling-off factor:	DVB-S QPSK: 0.35 DVB-S2 8PSK: 0.35, 0.25, 0.2
Punctured rates:	DVB-S QPSK: 1/2, 2/3, 3/4, 5/6, 7/8 DVB-S2 QPSK: 1/2, 3/5, 2/3, 3/4, 4/5, 5/6, 8/9, 9/10 DVB-S2 8PSK: 3/5, 2/3, 3/4, 5/6, 8/9, 9/10
LNB Polarization:	0, 13V, 18V selectable
LNB Band switching tone:	0/22KHz selectable
DiSEqC:	DiSEqC 1.0

DVB-C TUNER INPUT

Connector type:	4xF type female 75Ω for input
Input frequency:	48~860MHz
Input level:	45~75dBμV
Symbol rate:	1~7Mbaud (ITU J.83 Annex A)
Constellation:	16QAM, 32QAM, 64QAM, 128QAM, 256QAM
Bandwidth:	6MHz, 7MHz, 8MHz
Input return loss:	7dB (typ.)

DVB-T/T2 TUNER INPUT

Connector type:	4xF type female 75Ω for input
Input frequency:	104~862MHz (VHF/UHF)
Input level:	-20~-70dBm
Constellation:	DVB-T: QPSK, 16QAM, 64QAM DVB-T2: QPSK, 16QAM, 64QAM, 256QAM
Bandwidth:	6MHz, 7MHz, 8MHz
FFT Mode:	DVB-T: 2K/8K / DVB-T2: 1K, 2K, 4K, 8K, 16K, 32K
Guard interval:	DVB-T: 1/4, 1/8, 1/16, 1/32 / DVB-T2: 1/4, 5/32, 1/8, 5/64, 1/16, 1/32, 1/64, 1/128
FEC Code rate:	DVB-T: 1/2, 2/3, 3/4, 5/6, 7/8 / DVB-T2: 1/2, 3/5, 2/3, 3/4, 4/5, 5/6
Input return loss:	7dB (typ.)

ASI OUTPUT

Connector type:	4xBNC female, 75Ω
Standard:	DVB-ASI, EN50083-9
Output bitrate:	≤200Mb/s

TS OVER IP

Connector type:	1xRJ-45, 10M/100/1000Mbit Base-T for TS/IP
Effective bitrate:	MPTS: (Tuner 1 to Tuner 4 Remux) Max. 430Mbit/s via up to 5 Uni-/Multicasts SPTS: Max. 430Mbit/s via up to 128 Uni-/Multicasts Mixed: Max. 80Mbit/s, full duplex, 1x Uni-/ Multicast MPTS/SPTS in- and output
Protocol:	UDP/RTP, Multicast/Unicast, IGMPv2/v3, ARP
Uni/Multicast:	Support maximum 5xMPTS or 128 SPTS (channels) Uni/Multicast output

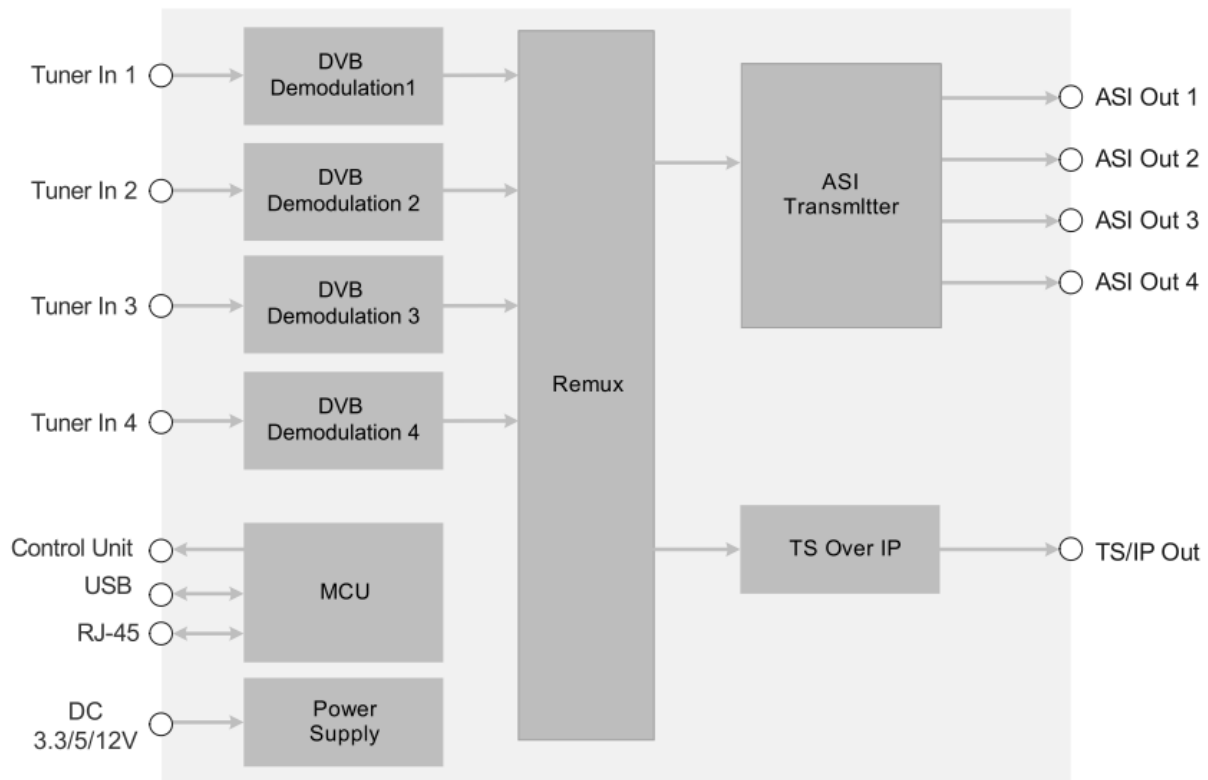
CONTROL & MONITORING

Connector type:	1xRJ45, 10/100M, for equipment IP control
Remote control:	SNMP, integrated HTTP website
Local control:	Handheld programmer unit
Equipment upgrade:	Webinterface, USB Port, FTP upload

GENERAL

Dimension:	PCB-Board
Agency approvals:	CE, RoHS
Operating temperature / humidity:	0~45°C / 10~90% non-condensed
Power supply / consumption:	AC90~250V, 50Hz/60Hz / Maximum 15W
Limited warranty:	1 year standard limited warranty. Warranty extensions for up to 5 years

BLOCK DIAGRAM



All DMM blades are of pure hardware design and contain no moving parts

FRAMES

DMM-110-FR	19" 4RU rack mount chassis for 8 boards with redundant power supply
Power:	AC 90V-250V, 300W, 50-60Hz
Dimensions (H/W/D):	178mm x 483mm x 399mm
Weight:	8 kg
DMM-110-FR-1RU	19" 1RU rack mount chassis for 2 boards with single power supply
Power:	AC 90V-250V, 40W, 50-60Hz
Dimensions (H/W/D):	43mm x 477mm x 415mm
Weight:	3 kg

ORDER INFORMATION

DMM-110-FR	19" 4RU rack mount chassis for 8 boards with redundant power supply.
DMM-110-FR-1RU	19" 1RU rack mount chassis for 2 boards with single power supply.
DMM-100-CU	Control display-panel for local configuration of DMM TV gateway boards.
DMM-241-C/S2/T/T2	Quad channel DVB board for IPTV streaming, re-multiplexing, 4 x DVB-C/S2/T/T2 in and up to 128 TV channels over IP out, 4 x ASI output.

COMPLEMENTARY PRODUCTS

ENC-400-HDMI/HDSDI	H.264 and MJPEG HD/SD encoder board with HDMI/HDSDI input, loop through outputs and USB recording.
MC-TRANS-1RU	Multiformat transcoding of live H.264/MPEG-2 SD/HD streams.
ICUE-100	IPTV Media Server: Live, VoD and scheduled playout streaming server software.
XPLAYER	PC live stream playback software. Licence packages are available.
DMM-151-C/S2/T/T2	DVB blade for streaming, re-multiplexing and H.264/ MPEG-2 SD/HD decoding. Tuner and ASI input and ASI, HDMI, SDI and analog AV outputs. Up to 128 IPTV channels out or TS over IP 1x in and 4x out.
DMM-220-C/S2/T/T2	Dual channel DVB board for IPTV streaming, re-multiplexing and MPEG-2/H.264 decoding. 2 x DVB-C/S2/T/T2 in. and up to 32 TV channels over IP out. ASI, HDMI and analog AV outputs.