



DQMX (Digital QAM Multiplexer) accepts up to four inputs in ASI, 8VSB, and QAM formats, and delivers one output in QAM format in the 54-864 MHz range. Two types of input modules are available (ASI and 8VSB/QAM), and any combination of input modules is allowed – for example, DQMX can be equipped with 2 ASI and 2 8VSB/QAM input modules.

Each ASI input module can process up to twelve channels, not to exceed 270 Mbps. Each 8VSB/QAM input module can process up to twelve channels, not to exceed 19.4 Mbps for 8VSB or 38.8 Mbps for QAM 256. The QAM-modulated output can contain up to twelve channels, not to exceed 38.8 Mbps when operating in QAM 256 mode.

ASI & 8VSB & QAM



HD/SD MPEG-2 PROCESSING

QAM

FEATURES

- User-defined major/minor or 4-digit CATV virtual channels
- User-defined channel names
- User-defined TSID
- CVCT table creation
- Supports PID filtering & PSIP re-assignment
- Re-maps duplicate PIDs, Program Numbers, and Minor Channel Numbers
- Maintains MPEG-2 mapping after an outage
- Supports MPEG-2 Transport Stream Tables: PAT, PMT, MGT, RRT, STT, & VCT
- PCR correction and null packet insertion
- User-defined QAM Output Parameters
- Provides QAM 256 Output at 38.8 Mbps

ORDERING INFORMATION

Model	Stock #	Description
DQMX-XY	6259A XY	Digital QAM Multiplexer; Shipped with (X) ASI and (Y) 8VSB/QAM input modules For example: DQMX-31 (Stock No. 6259A 31) is factory-equipped and shipped with (3) ASI and (1) 8VSB/QAM input modules.
DQMX	6259A	Digital QAM Multiplexer; Mainframe only (requires input modules)
DQMX-RF	6256	8VSB/QAM input module
DQMX-ASI	6257	ASI input module



SPECIFICATIONS

INPUT

Connectors ASI module: 8VSB/QAM module:	BNC Female "F" Female
Standards ASI: 8VSB: QAM :	DVB-ASI; EN 50083-9 ATSC Digital Television A/53E ITU-T J.83 - Annex A & B (64 and 256 QAM)
ASI Mode Transport Rate:	270 Mbps (desired transport rate of 10.76 MSymbols/sec)
8VSB Mode Tuning Range: Data Rate: Bandwidth: Power Level:	VHF (NTSC Ch. 2-13), UHF (NTSC Ch. 14-69) 19.392 Mbps 6 MHz -20 to +20 dBmV
QAM Mode Tuning Range: Data Rate: Bandwidth: Power Level:	CATV (NTSC Ch. 2-135) 38.8 Mbps (QAM 256); 26.97 Mbps (QAM 64) – Auto Detect 6 MHz -15 to 20 dBmV (@ QAM 256) -20 to 20 dBmV (@ QAM 64)
Impedance:	75 Ω

GENERAL

Dimensions (W x D x H):	19.0 x 14.3 x 1.75 inches (483 x 363 x 44 mm)
Power:	105 to 240 VAC/50 to 60 Hz
Power Dissipation:	36 W (fully loaded with 4 input modules)
Weight:	5.1 lbs (2.31 kg)
Operating Temperature:	32 to 122 °F (0 to 50 °C)
Storage Temperature:	-13 to 158 °F (-25 to 70 °C)
Operating Humidity:	0 to 95% RH @ 35 °C max, non-condensation
Storage Humidity:	0 to 95% RH @ 35 °C max, non-condensation

RELATED PRODUCTS

Model	Description
HDE-ASI	1xHD/4xSD/NTSC-to-ASI Encoder; 2RU
SD4E-ASI	4xSD/NTSC-to-ASI Encoder; 2RU
SD10E-QAM	10x SD/AV-to-QAM Encoder; 2RU
AV10E-QAM	10x AV-to-QAM Encoder; 2RU
HDE-2H-QAM	2x HDMI/YP _b P _r -to-QAM Encoder; 1RU
HDE-2C-QAM	2x YP _b P _r -to-QAM Encoder; 1RU
AQM	ASI-to-QAM Modulator; Six modulators in 2RU
AQD	8VSB/QAM-to-Baseband Demodulator; Eight demodulators in 3RU
AQT	8VSB/QAM-to-QAM Transcoder; Eight transcoders in 3RU

OUTPUT

Connector:	"F" Female
QAM Modulation Modes:	16, 32, 64, 128, 256, 512, and 1024
DVB Symbol Rate:	Variable; 1 to 7 MSymbols/sec (Mbaud)
Frequency Range:	54 to 864 MHz
QAM Tuning NTSC: PAL:	Per channel's number from 2 to 135 Per channel's center-frequency (12.5 kHz increments)
RF Level:	+60 dBmV (120 dB μ V)
RF Level LCD Screen Error:	\pm 2 dB
RF Level Adjustment Range:	50 to 60 dBmV
Frequency Tolerance:	\pm 0.5 kHz @ 77 °F (25 °C)
Frequency Stability:	\pm 5 kHz over 32 to 122 °F (0 to 50 °C)
Amplitude Flatness:	\pm 0.25 dB (over 6 MHz channel)
Phase Noise:	-98 dBc (@ 10 kHz)
Spurious:	-60 dBc
Broadband Noise:	-75 dBc (@ +60 dBmV output level, 4 MHz bandwidth)
Impedance:	75 Ω
Return Loss:	12 dB
Spectral Inversion:	Auto Recognition
Carrier Suppression:	55 dB
SNR:	Greater than 40 dB
MER:	Greater than 40 dB
I/Q Phase Error:	Less than 1 degree
I/Q Amplitude Imbalance:	Less than 1%

ALARMS/MONITORING/CONTROL

Local Monitoring:	Front-panel 16-character, 2-line LCD screen
Local Control:	Front-panel Navigational Key-pad
Remote Monitoring/Control:	Not available