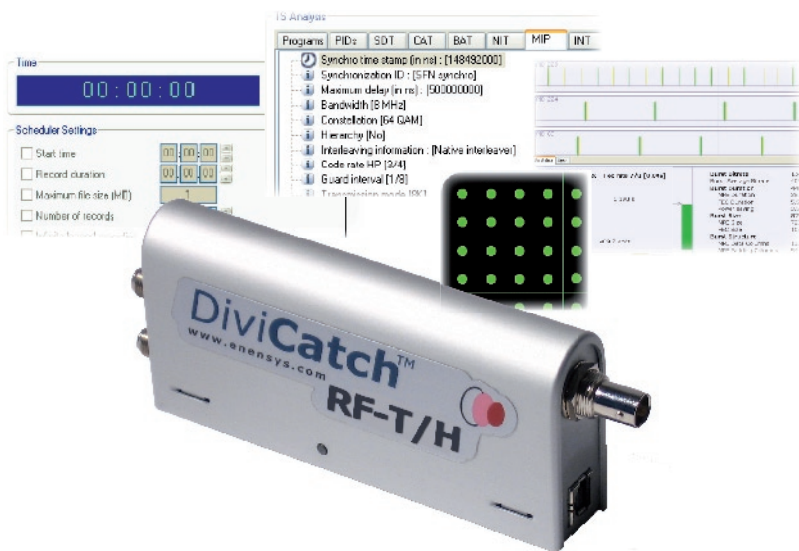# DiviCatch™ RF-T/H
DVB-T & DVB-H Live RF Analyzer

The DiviCatch RF-T/H is a Pocket Analyzer cumulating DVB-T and DVB-H RF live reception with MPEG2 TS real-time analysis and recording.

DiviCatch RF-T/H is a compact DVB-T and DVB-H analyzer. The product combines 3 levels of real-time analysis:

RF measurements: Key RF parameters (MER, SNR, etc.) and constellation are shown in real-time.

MPEG2-TS monitoring: The 3 priority levels of ETR290 are implemented, bitrate can be monitored globally and for each service, and customizable alarms are available.

DVB-H analysis: Table parsing includes DVB-H specific INT, bursts and delta-t information can be monitored in real-time and DVB's preferred ratios for Quality of Restitution (MFER and FER) are indicated for each PID.

In addition, DiviCatch RF-T/H features live stream **capture** capabilities. The application also integrates a video decoder enabling real-time **decoding** of all unencrypted services.

Combined with a third-party ESG client (DVB-IPDC), DiviCatch application validates proper reception and shows **ESG** rendering.

Eventually, the **GPS** option turns the DiviCatch RF-T/H into the must-have companion for coverage and drive tests.

As DTTV and Mobile TV deployments keep multiplying worldwide, DiviCatch RF-T/H, a 2-in-1 product featuring both RF and DVB-ASI inputs, offers a cost-effective test solution for field, lab or head-end applications.

Applications

- Broadcast Test & Measurement
- RF Reception Quality Measurement
- Installation & Maintenance
- Head-End Monitoring
- Coverage & Drive Tests

Benefits

- 2-in-1 product: RF + Baseband
- Compact and USB-self-powered device
- Receive live DVB-T & DVB-H signals
- Validate the quality of reception & transmission
- Evaluate the Quality of Restitution (MFER & FER ratios)
- Analyse DVB-H layer in real-time
- Output coverage maps with GPS capability (opt.)

Characteristics

- 1 RF input for DVB-T and DVB-H
- Full DVB-H (4K FFT mode & 5MHz)
- 1 ASI input
- RF key measurements
- Graphical constellation display
- TR 101 290 validation (aka ETR290)
- PIDs, PSI/SI parsing
- Advanced MPEG2-TS recording
- MPEG2-TS over IP forward

Options

- GPS receiver for synchronizing RF measurements with geographical coordinates

ID 4937

DiviCatch™ RF-T/H
DVB-T & DVB-H Live RF Analyzer

Input Interfaces

RF input

Standards	DVB-T & DVB-H
Connector	1x F-type (female) - 75 Ω
Frequency range	UHF and VHF (45 - 864 MHz)
Sensitivity	-80 to -8 dBm
Channel bandwidth	5, 6, 7 & 8 MHz
FFT Mode	2k, 4k, 8k
Modulation	QPSK, 16QAM, 64QAM
	+ hierarchical *

RF loopthrough

Connector	1x F-type (female) - 75 Ω

DVB-ASI

Connector	1x BNC (female) - 75 Ω

RF Measurements

All measurements are made in **real-time**

Constellation	Diagram display
Signal level	56 to 100, expressed in dBµV
SNR	0 to 24, expressed in dB
Bit Error Rate	Pre-Viterbi, Post-Viterbi, Post-RS
Modulation Error Rate	0 to 38, Typical 34, expressed in dB
Error Vector Magnitude	Expressed in %

Baseband Transport Monitoring

All features are monitored in **real-time**

TR 101 290
Priorities 1, 2 and 3 implemented

Service information
PSI/SI table display for DVB services
PSIP table display for ATSC services

Bitrate monitoring
Overall, by program or PID by PID

PCR Jitter
PCR Jitter Accuracy graphs (real-time, history and density)

Services Processing

MPEG2/MPEG4 services decoding (unencrypted programs)
Recording of the entire multiplex to a TS file
Real-time forward of the entire multiplex to an IP address

DVB-H Layer Analysis and Processing *

Real-time burst view and burst structure information
Delta-t and jitter information
MFER and FER
ESG decoding (SDP automatic extraction, Bootstrap status, etc.)
De-encapsulation from DVB-H (with PID filtering capability)

GPS feature (optional)

External GPS receiver (USB self-powered)
Export of log files and coordinates to CSV format
Customizable logging information

Environment

Operating temperature	0 to 55°C / 0 to 122 °F
Storage temperature	-20°C to 70°C / -4°F to 158°F
Humidity	0 to 95%, non condensing

Physical and Power

Length	134.7 mm / 5.3 in.
Height	61.45 mm / 2.42 in.
Width	27 mm / 1.06 in.
Power supply	USB2.0 self-powered

Ordering codes

DVB-T RF Analyzer	*DiviCatch RF-T*
DVB-T + DVB-H RF Analyzer	*DiviCatch RF-T/H*
GPS feature	*NN6-GPS*

RoHS
2002/95/EC