The DiviCatch RF ISDB-T/Tb is a pocket analyzer cumulating ISDB-T/Tb live reception with transport stream real-time analysis, recording and stream playing.

The product provides two levels of real-time analysis:
- RF: measures key RF signal parameters (Level, MER, SNR, BER) and indicates the modulation parameters (TMCC, Layers A/B/C), the constellation as well as the Channel Impulse Response (CIR).
- Transport Stream: the 3 priority levels of ETSI TR 101 209 are implemented. Bitrate can be analyzed globally, by service, by PID. Alarm thresholds are customizable. Baseband streams can be captured using the ASI input or the PC's IP input. File-based offline analysis is also available.

The alarm events and RF measurements (trends) can be stored into report files.

In addition, the DiviCatch RF ISDB-T/Tb can be used as a gateway which retransmits over ASI or IP the baseband stream coming from the RF input. The TS file player functionality allows to have an ASI output on the same device, which represents a real added value.

TestTree proposes a real-time analysis application, DiviSuite, running on MS Windows, connected to the DiviCatch RF ISDB-T/Tb via USB connectivity, with customizable monitoring screens. The application integrates a video decoder enabling real-time decoding of all unencrypted services (H.265/HEVC, H.264/MPEG-4 AVC, MPEG-1/2, AAC, MP3...). It also features live stream capture capabilities for baseband multiplex recording into a TS file.

The DiviCatch RF ISDB-T/Tb, a 4-in-1 product featuring both RF and baseband analysis, and both TS recording and player capabilities, offers a cost-effective test solution for field, lab or head-end applications.

### Characteristics
- 1x RF input for ISDB-T/Tb
- 1x ASI input/output
- IP source analysis (from PC)
- RF measurements: signal level, SNR, MER, BER per Layer A/B/C
- Graphical constellation, Channel Impulse Response display
- PIDs and PSI/SI parsing, PCR graphs
- BTS analysis: IIP packet parsing, TMCC alarms
- ETSI TS 101 290 validation (priority 1, 2, 3)
- Audio/Video player (H.265/HEVC, H.264/MPEG-4 AVC, MPEG-1/2, AAC, MP3...)
- TS record and playback
- TS over IP forward (PC's Ethernet interface selection)
- Compatible MS Windows XP/Vista/7/8/10
- USB self-powered, 160 g

### Applications
- R&D Streams or Signal Analysis
- ISDB-T/Tb Broadcast Troubleshoot
- Installation & Maintenance Test Tool
- Head-End/TX site/off-air analysis
- Portable Demonstration Setup

### Key Benefits
- 4-in-1 product: RF + Baseband + Recorder + Player
- Compact (pocket size, 160 g) and USB self-powered
- Receive live ISDB-T/Tb signals
- Analyze/Validate TS Layer in real-time
- All modulation schemes supported (QPSK, from QPSK to 64QAM)
- Add your own table and specifications Analysis (PSI/SI ...)

www.test-tree.com
**TECHNICAL CHARACTERISTICS**

**RF**
- Connector In: 1x F-type female - 75 Ω
- Sensitivity: -80 to -5 dBm / 28 to 104 dBµV
- Frequency range: 40 to 1000 MHz
- Channel bandwidth: 6, 7 & 8 MHz
- Modulation: DQPSK, from QPSK to 64QAM
- DVB-ASI Connector In/Out: 1x BNC female - 75 Ω
- Max bitrate: 140 Mbps
- USB Data connector: 1x USB2 B-Type
- Power supply: USB self-powered
- Environment:
  - Operating temperature: -20 to 55 °C / -4 to 131 °F

**Physical**
- Dimensions: 135 x 62 x 27 mm / 5.3 x 2.4 x 1 in
- Weight: 160 g

**RF MEASUREMENTS**

- All measurements are made in real-time
- Graphical display: Constellation, Channel Impulse Response
- Signal level: -90 to -5 dBm / 18 to 104 dBµV (0.1 dBm resolution)
- SNR: 0 to 40 dB (0.1 dB resolution)
- MER: 0 to 32 dB
- BER: Post-Viterbi, Post-RS PER per Layer A/B/C

**BASEBAND TRANSPORT MONITORING**

- TS features analyzed in real-time from either source:
  - RF or DVB-ASI through USB from the DiviCatch
  - IP from the PC’s Ethernet interface
- Or analyzed offline from TS file source

- ETSI TR 101 290: priorities 1, 2, 3
- Service information:
  - PSI/SI table display for MPEG, DVB, BTS; including private tables
  - Service components type and structure
  - PID summary
- Bitrate monitoring:
  - Overall, by Service (Program), by PID
- PCR Accuracy graphs

**BASEBAND TRANSPORT PROCESSING**

- Audio/video decoding (unencrypted programs): stream display
  - H.265/HEVC, H.264/MPEG-4 AVC, MPEG-1/2, AAC, MP3...
- Recording of the entire multiplex (MPTS/SPTS) into a TS file
- Real-time forward of the entire multiplex to ASI or IP (unicast or multicast over UDP streaming)
- TS files playback:
  - Loop/segment play modes
  - Stream playlist handling, bitrate auto-detection with PCRs
  - Null packet removal

**ORDERING CODES**

**DiviCatch RF ISDB-T/Tb**
- ISDB-T/Tb Pocket Analyzer
  - Shipped bundled with DiviSuite Base software for MS Windows XP/Vista/7/8/10

**Software options**
- RF Scope
- TS Analyzer
- RF Analysis
- TS Analysis (includes BTS)

**48H MAX SHIPMENT**

- All Options Bundle (RF + TS)