SDN-RF

End-to-End Analog RF & Digital IF Solutions for Satellite Infrastructures

Evertz and Quintech offer a comprehensive end-to-end solution for satellite ground systems—starting with Simulsat multibeam antennas and extending through indoor/outdoor RF over fiber, RF distribution, and a range of RF matrices tailored to small, medium, and large facilities. Our portfolio also includes advanced satellite demodulation, RF signal reception, monitoring, and spectrum analysis.

For digital IF applications, Evertz/Quintech delivers a complete solution featuring IFC digitizers, digital combiners/dividers, high-bandwidth IP fabric switches, and most importantly, a unified orchestration and monitoring platform. This complete solution called Software Defined Networked RF SDN-RF which features enables seamless management of both analog RF and digital IP workflows—all within a single pane of glass.

As global leaders in ground satellite technology, Evertz and Quintech are proud to play a pivotal role in the Digital IF Interoperability (DIFI) Consortium. Committed to driving industry standards and promoting interoperability across satellite and ground systems, we actively participate in DIFI PlugFests—ensuring compatibility and collaboration with industry peers as the sector transitions into the next generation of satellite signal processing.

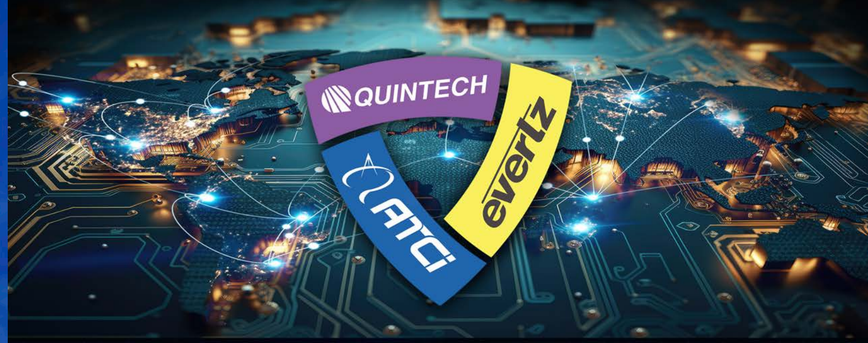
This platform also improves **spectrum efficiency**, essential for navigating increasingly strict regulatory environments and limited frequency availability. By transporting digitized IF over IP networks - including across wide area networks (WANs) - the platform removes the physical distance limitations of traditional dark fiber.

This capability unlocks new RF workflows, enabling the **strategic placement of satellite dish farms** Ideal for **broadcasters, telecom providers, satellite operators, government agencies, and research institutions**, the 7880RFIP platform ensures readiness for future innovations and evolving industry standards.

Ordering and Product Information:

ATCi	Simulsat Multibeam Antenna
Quintech SENTRY:	
S-ODU-ADC2DAC2-N50-M	Dual bi-directional channel Analog to Digital / Digital to Analog IF converter module with 2x QSFP ports. Solely for use inside SENTRY Quintech products.
S-ODU-ADC8-N50-4	Quad uni-directional channel analog to digital IF converter module with 2x QSFP ports. Expandable up to eight uni-directional channels using software keys (sold separately). Solely for use inside SENTRY Quintech products.
S-ODU-DAC8-N50-4	Quad uni-directional channel digital to analog IF converter module with 2x QSFP ports. Expandable up to eight uni-directional channels using software keys (sold separately). Solely for use inside SENTRY Quintech products.
S-ODU-RFIP-FK-1GHZ	Software license to enable up to 1GHz instantaneous bandwidth
S-DOU-PS-AC	Redundant AC supply
7880RFIP-ADC4	Single channel Analog RF to Digital IP converter with 4x RF Ports and 2x QSFP Ports (SFPs sold separately). Expandable up to quad channels using software keys (software keys sold separately).
7880RFIP-DAC4	Single channel Analog RF to Digital IP converter with 4x RF Ports and 2x QSFP Ports (SFPs sold separately). Expandable up to quad channels using software keys (software keys sold separately).
7880RFIP-ADC4AC4	Single channel bi-directional Analog RF to Digital IP converter with 8x RF Ports and 2x QSFP Ports. Expandable up to Quad bi-directional channels using software keys (SFPs software keys sold separately)
NATX-16-100G	IP Switching Fabric with Integrated Network Address Translation. Up to 16x100G or 64x25G.
NATX-32-100G-1	IP Switching Fabric with Integrated Network Address Translation. Up to 32x100G or 128x25G.
NATX-64-100G-2	IP Switching Fabric with Integrated Network Address Translation. Up to 64x100G or 256x25G.
MAGNUM-OS	Base software package for accessing, supporting and managing MAGNUM OS deployment.
MAGNUM-HW	1RU Enterprise Class Server for MAGNUM OS Control / Orchestration software modules.
MAGNUM-HW-NMS	1RU Enterprise Class Server for MAGNUM OS NMS software modules.
670WSP-HW	Next Generation High Density Media Processing FPGA Accelerated Hardware.
WSP-CK4x8-CD	License to Combine up to 8 narrow band inputs into 4 wideband (up to 600MHZ) outputs ans simultaneously divide 4 wide-band (up to 600MHz) inputs into up to 8 narrow band outputs.
WSP-CK1x13-CD	License to Combine 13 narrow band inputs into 1 wide-band (up to 600MHz) output and simultaneously divide 1 wideband (up to 600MHz) input into 13 narrow band outputs.
WSP-CK-1x26-C	License to Combine 26 narrow band inputs into 1 wide-band (up to 600MHz) output.
WSP-CK-1x26-D	License to Divide 1 wideband (up to 600MHz) input into 26 narrow band outputs.
670WSP-FK-1GHZ	Software license to enable up to 1GHz instantaneous Bandwidth (IBW) on 670WSP-HW family.
	Software licenses sold separately.

QUINTECH®
www.quintechelectronics.com



END-TO-END SATCOM SOLUTIONS

Satellite Operators | Teleport Operators | Large Broadcasters/ Content Orginators | Telco Providers | Government & Defense

Applications

- Ground system digitization
- Flexible disaster recovery/ site diversity solutions
- IF satellite communications (SATCOM) terminals centralization & virtualizations
- Transport and aquire RF signal anywhere in the network regardless of distance
- Telecommunications

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SDN-RF

MAGNUM-OS

SIMULSAT
The Industry's Only Full-Arc Multi-Satellite Antenna

Simulsat is the world's only true full-arc multiple satellite antenna, capable of simultaneously receiving transmissions from over 35 satellites without the need for adjustment or any loss in performance between satellites. Fully 2° compliant, **Simulsat** supports signal reception across C, Ku, S, Ka, and Inclined Orbit bands within a wide 70–75° view arc—making it the most versatile and efficient solution for multi-satellite reception.

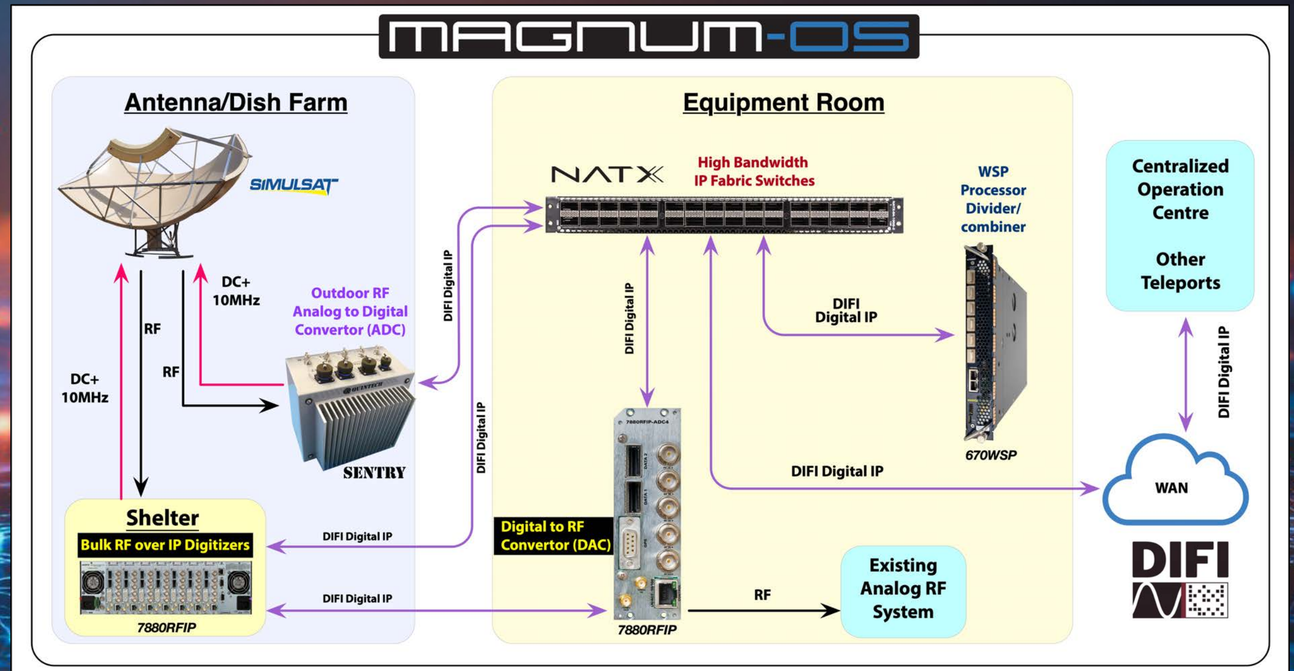
SENTRY Outdoor RF Analog-to-Digital Converter

The **Sentry Outdoor** is a rugged, weatherproof RF-to-IP conversion solution, rated IP65 for reliable performance in harsh outdoor environments. Designed for downlink, uplink, or bidirectional applications, it supports seamless conversion between analog RF and digital IP signals.

Available in three configurations to meet diverse deployment needs:
- **8-Channel Unidirectional RF-to-IP Converter**
  Converts analog RF signals to digital IP for downlink applications
- **8-Channel Unidirectional IP-to-RF Converter**
  Converts digital IP signals to analog RF for uplink applications
- **4-Channel Bidirectional Converter**
  Supports both RF-to-IP and IP-to-RF conversion in a single unit for flexible, full-duplex operation

Modular-based RF Analog-to-Digital Converter

The **7880RFIP** platform is a modular, hot-swappable solution designed for high-density RF-to-IP conversion. Supporting up to **28 unidirectional or bidirectional RF-to-IP conversions** in a 3RU frame—or up to **8 conversions** in a compact 1RU chassis—this platform delivers flexibility and scalability for modern RF infrastructures.



MAGNUM-OS System Orchestration, Control, Monitoring & Analytics

At the core of the Evertz/Quintech ecosystem is a **full-stack software suite** that unifies orchestration, control, monitoring, and analytics—offering a single-pane-of-glass experience for managing complex DIFI-based infrastructure.

MAGNUM-OS delivers comprehensive orchestration, abstracting system complexity from the operator while ensuring fault mitigation and real-time status reporting. Paired with VUE, users benefit from a customizable and intuitive interface that can manage small systems to global operations.

Key Capabilities:
- Design, configure, and manage IP systems—from small routers to enterprise-class networks with **tens of thousands of sources and destinations**
- End-to-end **facility and signal monitoring**
- **Advanced analytics** for system-wide insights—collecting, indexing, and analyzing operational data from every device in the network

This powerful software stack allows organizations to **streamline operations, enhance efficiency, and reduce costs**, all while maintaining high availability and visibility across their entire RF/ IP infrastructure.

NATX - High-Bandwidth IP Switch Fabric

The **NATX** is a high-bandwidth/performance, IP Switch Fabric, built on Evertz's award-winning Software Defined Video Network (SDVN) architecture. Designed for mission-critical environments, **NATX** leverages a robust 10/25/100/200GbE infrastructure to route DIFI signals with unmatched scalability, reliability, and security.

Key Features:
- **Deterministic Routing**: Ensures simple, predictable, and high-performance switching of high-bandwidth DIFI signals within the SDN fabric
- **Flexible Configurations:** Available in 16, 32, and 64-port 100GbE models, supporting up to 260 ports for extensive scalability across applications

NATX is the backbone of **SDN-RF** networks—empowering seamless, secure, and future ready signal transport.

Digital RF Processing

The **670WSP Wideband Signal Processor** series offers a **high-density, modular solution** for advanced digital IF signal processing. It enables channelizing (splitting) wideband RF signals into narrowband transponders and de-channelizing (combining) narrowband signals into wideband outputs.

This system supports flexible signal manipulation, enabling highly efficient and customizable digital IF workflows using IP networks.

Overall Digital RF Features:

- Modular, high density solution in 1RU or 3RU frames
- 950-2250MHz Range
- 1- 600MHz Real-time Bandwidth/Channel (Selectable) with software License for 1GHz Support wideband input
- Support both Narrowband (e.g. one or few transponders) and Wideband Applications (e.g. Full polarity)
- Agnostic to signal types or modulation format
- 4-16 bit Sample Size (User control)
- 10/25/100 GBE Throughput (QSFP Trunk Ports)
- Manual and automatic gain control
- Compliant with IEEE–ISTO 4900–2021 (DIFI)/Vita 49.2 standards
- Scalable architecture accommodates multiple WSPs in a 3RU or 6RU chassis