TDM 1001

TDM 1001 is an optional module for Router 6000 family that can be used to provide TDM services. TDM 1001 supports up to 16 E1/T1 interfaces via Abis over IP or circuit emulation. It is managed as a virtual line card of fixed form factor indoor variant of Router 6000. Management and maintenance of TDM 1001 is done through the Router 6000 that hosts it.

As TDM interfaces are being decommissioned gradually in networks, TDM 1001 solution with Router 6000 offers a graceful migration path where performance, capacity and space of routers need not be compromised to accommodate TDM interface requirements.

Like Router 6471, TDM 1001 is a compact and temperature hardened device that is easy to maintain as it is a completely filter-less mechanical design. TDM 1001 can be placed in a hosting shelf with a Router 6471 that combined together only occupies the 1RU space of an 19in wide shelf.

Pay as you go TDM support
No need to build in TDM interfaces on routers when world is moving away from TDM.

Abis over IP Support
Abis over IP is a solution that interworks with legacy Ericsson RBS. The solution converts E1s from RBS to IP packets and is sent to the BSC using the same mobile backhaul infrastructure as 3G/4G traffic removing the E1 transport requirement for the location.

Standard Circuit Emulation Support
Circuit emulation is a mature technology being deployed across the world. TDM 1001 implements standard circuit emulation solution that can be used to interop to 3rd party devices.

Designed for low OPEX
TDM 1001 is managed together through its host Router 6000. Together both Router 6000 and TDM 1001 is managed as a single network element.
Technical specification for TDM 1001

Connectivity

Interfaces:  
- 8x RJ45 ports for up to 16x E1/T1 interfaces  
- 1x GE SFP port  
- 1x 100 / 1000 Base-T RJ45 port  
- 1x RJ45 console port  
- 1x 100 / 1000 Base-T Ethernet for Out-of-Band Management  
- 1x reset button for chassis repower-up

Mechanical

System weight: 2.3 kg / 5lbs
Dimension (H x W x D): 1RU 41mm x 217mm x 220mm - can be fitted into the same 1RU host enclosure with Router 6471
Air flow: Natural air with fan-less and filter-less design

Electrical

Power supply DC: -48 V, dual feed
Power consumption: Typical 18 Watts, Max 30 Watts

Environmental

Operating Temperature: -40°C to 65°C
Relative Humidity: 5 - 95% Non-condensing
GR-5100-CORE Class 1: Controlled Protected Environments
GR-5100-CORE Class 2: Protected Equipment in Outside Environments
EN 300 019-1-3 Class 3.3: Not temperature-controlled locations

Key features

Abis over IP: Abis over IPv4 support for Ericsson legacy RBS
Circuit Emulation: Circuit emulation services over UDP/IPv4 over Ethernet networks (RFC 4553), circuit emulation services over Ethernet networks (MEF 8)
Synchronization: Loop timing off E1/T1 interface, SyncE from host Router 6000, Adaptive Clock Recovery, Differential Clock Recovery
Operation and Maintenance: IP ping/traceroute, AIS, LOS, LOFS
Network Management: Managed as attached unit through indoor variant of Router 6000 family of products (e.g. Router 6471)

Standards and specifications

EMC: EMC Directive 2014/30/EU, EN 300386, EN 301489-1, CISPR 32, EN 55032, CISPR 24, EN 55024, EN 50121-1, EN 50121-4, EN 61800-6-1, EN 61800-6-2, EN 61800-6-3, EN 61800-6-4, EN 300132-2, ES 201468, DTAG 1 TR 9, CFR 47 Part 15, ICES-003, VCCI V-3