T1/E1 Transport Interface Option Module

T1 or E1 Network Interfaces for the PacketAssure iQ

- Extends Ethernet services over T1/E1 basic radio connections

- Extends Ethernet services over legacy telecomm networks; leverages existing leased line facilities infrastructure

- Easily inserted into PDH/SDH network using PacketAssure's iQ Manager

- Detailed configuration parameters, statistics and counters facilitate network operations

- Standards-based interfaces simplify provisioning; supports country-specific requirements

The Ultra Electronics DNE Technologies T1/E1 Transport Interface Option Module (IOM) adds a flexible network connectivity solution to the PacketAssure iQ Service Delivery Manager. This module allows the transport of native Ethernet frames over the well-established Plesiochronous Digital Hierarchy (PDH) telecommunications infrastructure, so operators can leverage the extensive network of PDH and Synchronous Digital Hierarchy (SDH) equipment to offer new, Ethernet-centric services.

The T1/E1 Transport IOM is a hot-swap capable, field-replaceable component of the PacketAssure iQ that provides four separate ports of native Ethernet transport over unstructured T1 or E1 traffic, software-selectable on a 'per-module' basis.

Operation of this IOM is similar to the PacketAssure Serial IOM running in Transport Mode. This allows PacketAssure subscribers to make extensive use of legacy T1/E1 carriers, world-wide, to provide new Ethernet-centric services today, while paving the way for the gradual migration to all-Ethernet networks in the future.

Designed to the same form factor as all other PacketAssure iQ Interface Option Modules, the T1/E1 Transport IOM installs into any available slot in the iQ chassis for maximum configuration flexibility.

Whether configured for T1 or E1 ports, a rich assortment of configuration parameters ensures that country-specific objectives are met. A comprehensive list of alarms, defects, anomalies, performance monitoring statistics and counters keep operators appraised of network performance. An embedded suite of diagnostic tools identifies and isolates faults down to the affected module for quick service restoration.

The T1/E1 Transport Interface Option Module is the definitive solution for the integrated transport of Ethernet services over legacy PDH/SDH networks.

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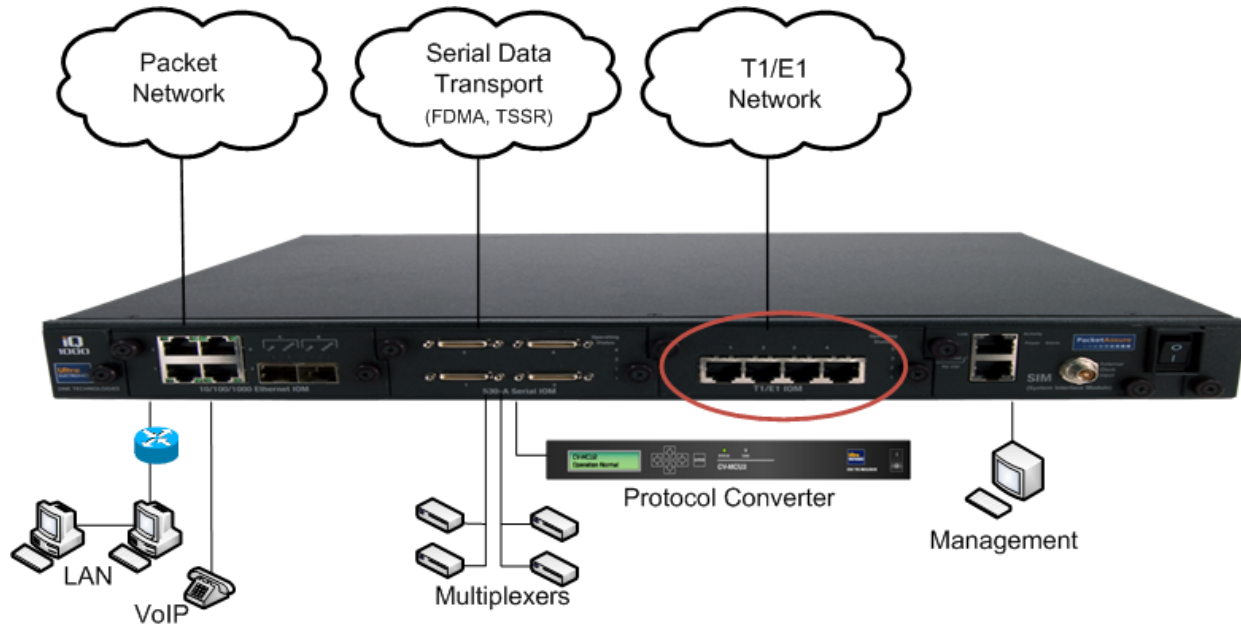
The T1/E1 module aggregates traffic from Ethernet and Serial input ports for transport across a T1/E1 network or radio

Specifications	
Operating Modes	T1 per ANSI T1.102 for DS1 interfaces or E1 per ITU G.703; HDLC encapsulation
Operating Rates (bps)	1.544 Mbps or 2.048 Mbps
Physical Ports	Four shielded RJ-45 female connectors; pin connections as defined per USOC RJ-48C (T1.403-1999 specification)
LEDs	One per port: indicates port enabled, disabled, alarm condition, or diagnostic mode
Protocols / Standards	DSX-1, E1, EoPDH / T1.403-1999, RFC 1662 HDLC, ANSI T1.102, ITU G.703