Data Sheet

Kilomux-2100

KML.7

Fractional T1 Interface Main Link Module

- Compatible with all carrier provided T1 services
- D4 and ESF framing format
- Selectable 1's density control: Transparent, B7ZS, B8ZS
- Optional built-in CSU
- Three timing options

The KML.7 main link module allows direct connection of Kilomux to fractional T1 services, eliminating the need for external conversion equipment. KML.7 places Kilomux framed information over standard T1 frames that can be transmitted via a T1 network to another Kilomux on the remote side.

KML.7 is compatible with all carrier provided T1 services, meeting ANSI and AT&T requirements (AT&T 62411, 62421; ANSI T1.403). Both D4 and ESF framing formats are supported. Zero suppression is selectable for Transparent, B7ZS or B8ZS.

KML.7 operates at the following link speeds: 56, 64, 128, 256, 384, 512, 768, 1024 and 1536 kbps. Three timing options are available: LBT (clock is locked on the network), Internal and DCE (external).

The Kilomux multiplexing frame is placed into one to 24 timeslots on the T1 frame.

Diagnostic capabilities include local and remote loopback on the T1 link and T1 network loopback. The T1 network loopback is code activated and is available only on modules which include a CSU. Statistical information complies with ANSI T1.403 and can be recovered by the network equipment.

KML.7 parameters are monitored and controlled via the Kilomux management systems.

Connects Kilomux to fractional T1 services

RAD
data communications
The Access Company

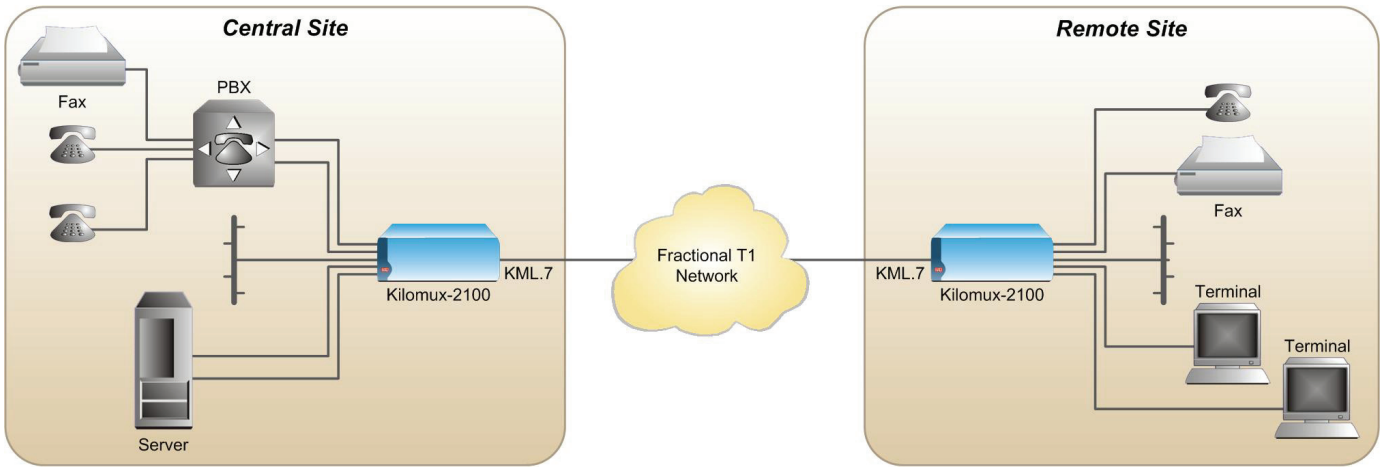

Figure 1. Point-to-Point Application

Specifications

Framing 3
D4, ESF

Link Speed
56 kbps, 64 kbps, 128 kbps, 256 kbps, 384 kbps, 512 kbps, 768 kbps, 1024 kbps and 1536 kbps

Line Code
AMI

Zero Suppression
Transparent, B7ZS, B8ZS

Impedance
100 Ω, balanced

Signal Level
Receive:
- With CSU: 0 to -36 dB
- Without CSU: 0 to -10 dB

Transmit:
- With CSU: 0, -7.5, -15 dB
- Without CSU: ± 3V (± 10%) soft-adjustable (measured at 0 to 655 ft)

Jitter Performance
As per AT&T TR-62411

Connector
RJ-45 (8-pin)

Transmit Timing
Internal: ± 50 ppm
LBT: ± 130 ppm
DCE: ± 50 ppm

Diagnostics
Local loop
Remote loop
Network line loop (with DSU)
Network payload loop (with DSU)

Statistics
Full statistical diagnostics according to ANSI T1.403

Timeslot Allocation
Consecutive (bundled)

Indicators
Local sync loss (Red alarm)
Remote sync loss (Yellow alarm)
Test
Alarm

Management
Programmable via any one of the Kilomux management methods

Data Sheet

KML.7

Fractional T1 Interface Main Link Module

Ordering

STANDARD CONFIGURATION

KM-2000M-KML.7

SPECIAL CONFIGURATION

KM-2000M-KML.7/CSU – with CSU

Table 1. Kilomux-2100 Main Link Interface Modules

Name	Interface	Connector	Data Rates
KML.1/N	V.35	34-pin, female	9.6, 14.4, 19.2, 28.8, 32, 48, 56, 64, 128, 192, 256, 384, 512, 768, 1024, 1536 kbps
KML.2/N	RS-232	DB-25, female	9.6, 19.2, 32, 48, 56, 64, 128 kbps
KML.3/N	RS-530	DB-25, female	9.6, 14.4, 19.2, 28.8, 32, 48, 56, 64, 128, 192, 256, 384, 512, 768 , 1024, 1536 kbps
KML.4/N	X.21	DB-15, female	
KML.5/N	G.703 Codirectional	8-pin, RJ-45	64, 128 kbps
KML.6/N	Compatible with AT&T PUB 62310	8-pin, RJ-45	9.6, 19.2, 56 kbps
KML.7	T1 G.703, G.704, AT&T TR-62411, ANSI T1.403 (D4-SF, ESF)	8-pin, RJ-45	56, 64, 128, 256, 384, 512, 768, 1024, 1536 kbps
KML.8	E1, G.703, G.704, G.732 (including CRC-4 and E bit)	8-pin, RJ-45, balanced Two BNC coaxial, unbalanced	56, 64, 128, 256, 384, 512, 768, 1024, 1536 kbps
KML.10	ITU-T Rec. I.430, Q.921, Q931	8-pin, RJ-45	64, 128 kbps
KML.11	Ethernet (TDMoIP)	8-pin, RJ-45	56, 64, 128, 192, 256, 384, 512, 768, 1024, 1536 kbps
KML.F	850/1310/1550 nm, single/multimode, LED/Laser	ST or FC/PC	128, 192, 256, 384, 512, 768, 1024, 1536 kbps

International Headquarters
24 Raoul Wallenberg Street
Tel Aviv 69719, Israel
Tel. 972-3-6458181
Fax 972-3-6498250, 6474436
E-mail market@rad.com

North America Headquarters
900 Corporate Drive
Mahwah, NJ 07430, USA
Tel. 201-5291100
Toll free 1-800-4447234
Fax 201-5295777
E-mail market@radusa.com

www.rad.com

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