

# ACE-2002/2002E/202



## Supported Modules

- Table 1 presents the supported ACE-2002/2002E/202 ATM modules. For full module details and ordering information, see the individual modules' data sheets.

**Table 1. ATM Modules**

Module Name	Description	Data Rates [Mbps]	Connector Type	Typical Distance*		Wavelength [nm]	Optical Output [dBm]	Optical Input [dBm]
ACE-M/SC13LH/622**	STM-4/OC-12 single-mode, long-haul	622.08	SC	15	9	1310	-3 to +2	-3 to -28
ACE-M/SC13M/622**	STM-4/OC-12 multimode	622.08	SC	500m	1640 ft	1310	-14 to -19	-14 to -26
ACE-M/SC15LH/622**	STM-4/OC-12 single-mode, short-haul	622.08	SC	80	50	1550	-3 to +2	-5 to -28
ACE-M/SC13L/622**	STM-4/OC-12 single-mode, long-haul	622.08	SC	15	9	1310	-14 to -7	-3 to -28
ACE-M/CX/BNC/155	STM-1, electrical	155.52	BNC	150m	492 ft	-	-	-
ACE-M/FC13L/155	STM-1/OC-3 single-mode, short-haul	155.52	FC	30	19	1310	-8 to -11	-2 to -31
ACE-M/FC13L/155D**	STM-1/OC-3 dual port single-mode, short-haul	155.52	FC	30	19	1310	-8 to -11	-2 to -31
ACE-M/FC13L/155R	STM-1/OC-3 dual port APS redundancy single-mode, short-haul	155.52	FC	30	19	1310	-8 to -11	-2 to -31
ACE-M/FC13LH/155	STM-1/OC-3 single-mode, long-haul	155.52	FC	50	31	1310	-1 to -4	-2 to -34
ACE-M/FC13LH/155D**	STM-1/OC-3 dual port single-mode, long-haul	155.52	FC	50	31	1310	-1 to -4	-2 to -34
ACE-M/FC13LH/155R	STM-1/OC-3 dual port APS redundancy single-mode, long-haul	155.52	FC	50	31	1310	-1 to -4	-2 to -34
ACE-M/FC15LH/155	STM-1/OC-3 single-mode, long-haul	155.52	FC	80	50	1550	-1 to -4	-2 to -34
ACE-M/SC13L/155	STM-1/OC-3 single-mode, short-haul	155.52	SC	30	19	1310	-8 to -11	-2 to -31
ACE-M/SC13L/155D**	STM-1/OC-3 dual port single-mode, short-haul	155.52	SC	30	19	1310	-8 to -11	-2 to -31
ACE-M/SC13L/155R	STM-1/OC-3 dual port APS redundancy single-mode, short-haul	155.52	SC	30	19	1310	-8 to -11	-2 to -31
ACE-M/SC13LH/155	STM-1/OC-3 single-mode, long-haul	155.52	SC	50	31	1310	-1 to -4	-2 to -34
ACE-M/SC13LH/155D**	STM-1/OC-3 dual port single-mode, long-haul	155.52	SC	50	31	1310	-1 to -4	-2 to -34
ACE-M/SC13LH/155R	STM-1/OC-3 dual port APS redundancy single-mode, long-haul	155.52	SC	50	31	1310	-1 to -4	-2 to -34



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Table 1. ATM Modules (Cont'd)

Module Name	Description	Data Rates	Connector Type	Typical Distance*		Wavelength [nm]	Optical Output [dBm]	Optical Input [dBm]
		[Mbps]		[km]	[mile]			
ACE-M/SC13M/155	STM-1/OC-3 multimode	155.52	SC	2	1.25	1310	-15 to -18	-14 to -31
ACE-M/SC13M/155D**	STM-1/OC-3 dual port multimode	155.52	SC	2	1.25	1310	-15 to -18	-14 to -31
ACE-M/SC13M/155R	STM-1/OC-3 dual port APS redundancy multimode	155.52	SC	2	1.25	1310	-15 to -18	-14 to -31
ACE-M/SC15LH/155	STM-1/OC-3 single-mode, long-haul	155.52	SC	80	50	1550	-1 to -4	-2 to -34
ACE-M/ST13L/155	STM-1/OC-3 single-mode, short-haul	155.52	ST	30	19	1310	-8 to -11	-2 to -31
ACE-M/ST13L/155D**	STM-1/OC-3 dual port single-mode, short-haul	155.52	ST	30	19	1310	-8 to -11	-2 to -31
ACE-M/ST13L/155R	STM-1/OC-3 dual port dual port APS redundancy single-mode, short-haul	155.52	ST	30	19	1310	-8 to -11	-2 to -31
ACE-M/ST13LH/155D**	STM-1/OC-3 dual port single-mode, long-haul	155.52	ST	50	31	1310	-1 to -4	-2 to -34
ACE-M/ST13LH/155R	STM-1/OC-3 dual port dual port APS redundancy single-mode, long-haul	155.52	ST	50	31	1310	-1 to -4	-2 to -34
ACE-M/E3	E3 UNI electrical	34.368	BNC	150m	492 ft	-	-	-
ACE-M/T3	T3 UNI electrical	44.736	BNC	150m	492 ft	-	-	-
ACE-M/UTP/25	ATM 25 Mbps over UTP	25.6	RJ-45	100m	328 ft	-	-	-
ACE-M/E1	E1 UNI	2.048	RJ-45 BNC	-	-	-	-	-
ACE-M/T1	T1 UNI electrical	1.544	RJ-45	-	-	-	-	-
ACE-M/IMA-UNI/4E1	IMA ATM/UNI 4 balanced E1	2.048	RJ-45	-	-	-	-	-
ACE-M/IMA-UNI/4E1/UNBAL	IMA ATM/UNI 4 unbalanced E1	2.048	RJ-45***	-	-	-	-	-
ACE-M/IMA-UNI/4T1	IMA ATM/UNI 4 balanced T1	1.544	RJ-45	-	-	-	-	-
ACE-M/IMA-UNI/8E1****	IMA 8 balanced E1	2.048	RJ-45	-	-	-	-	-
ACE-M/IMA-UNI/8E1/UNBAL****	IMA 8 unbalanced E1	2.048	BNC***	-	-	-	-	-
ACE-M/IMA/8T1****	IMA 8 balanced T1	1.544	RJ-45	-	-	-	-	-

\* Typical distance is calculated using common peripheral equipment and environment conditions. It may therefore vary according to user specific equipment and environment conditions.

\*\* Supported by ACE-2002 and ACE-2002E only.

\*\*\* Adapter cable provided.

\*\*\*\* Supported by ACE-2002E only.

- Table 2 presents the supported ACE-2002/2002E/202 interworking modules. For full module details and ordering information, see the individual modules' data sheets.

**Table 2. Interworking Modules**

Module Name	Description	Connector Type
ACE-M/4FR/RS530	Four port Frame Relay	DB-25 female
ACE-M/4FR/V35	Four port Frame Relay	V.35 female
ACE-M/4FR/X21	Four port Frame Relay	DB-15 female
ACE-M/4HDLC/RS530	Four port HDLC	DB-25 female
ACE-M/4HDLC/V35	Four port HDLC	V.35 female
ACE-M/4HDLC/X21	Four port HDLC	DB-15 female
ACE-M/CES/E1	Single balanced E1 CES	RJ-45
ACE-M/CES/E1/UNBAL	Single unbalanced E1 CES	BNC**
ACE-M/CES/T1	Single T1 CES	RJ-45
ACE-M/CES/4E1	Four balanced E1 CES	RJ-45
ACE-M/CES/4E1/UNBAL	Four unbalanced E1 CES	BNC**
ACE-M/CES/4T1	Four T1 CES	RJ-45
ACE-M/CES/8E1*	Eight balanced E1 CES	RJ-45
ACE-M/CES/8E1/UNBAL*	Eight unbalanced E1 CES	BNC**
ACE-M/CES/8T1*	Eight T1 CES	RJ-45
ACE-M/LAN-UTP	Ethernet/Fast Ethernet	RJ-45
ACE-M/LAN-UTP/D*	Dual Ethernet/Fast Ethernet	RJ-45
ACE-M/LAN-UTP/E	Enhanced performance Ethernet/Fast Ethernet	RJ-45
ACE-M/LAN-LC13L	Fast Ethernet, single mode, 1310 nm	LC
ACE-M/LAN-LC13L/D*	Dual Fast Ethernet, single mode, 1310 nm	LC
ACE-M/LAN-LC13L/E	Enhanced performance Fast Ethernet, single mode, 1310 nm	LC
ACE-M/LAN-LC13M	Fast Ethernet, multimode, 1310 nm	LC
ACE-M/LAN-LC13M/D*	Dual Fast Ethernet, multimode, 1310 nm	LC
ACE-M/LAN-LC13M/E	Enhanced performance Fast Ethernet, multimode, 1310 nm	LC

\* Supported by ACE-2002E only.

\*\* Adapter cable provided.



# ACE-2002/2002E/202

## *Supported Modules*



**data communications**

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