INTERFACE SPECIFICATIONS

4.1 INTRODUCTION

This section contains the interface specifications for the CCITT G.703 8448 kb/s Data Interface. This information is listed in Table 4-1.

Table 4-1
CCITT G.703 8448 kb/s Data Interface Specifications

Item	Specification
General	
Operating Bit Rate:	8448 kb/s typical, ±1.0 kb/s.
Coding:	HDB3 (High Density Bipolar with 3 Zero Substitution). AMI (Alternate Mark Inversion).
Connectors:	BNC. TX Jack: signal on inner conductor, shield is grounded. RX Jack: signal on inner conductor, shield is grounded.
Drivers	
Pulse Shape:	Conforms to CCITT Recommendation G.703.
Typical Peak Mark Voltage:	2.37 V ±10%, into 75 ohms.
Peak Space Voltage:	0 V ±0.24 V, into 75 ohms.
Typical Pulse Width:	59 nanoseconds.
Ratio of Positive-to-Negative Pulse Amplitudes at Midpoint:	0.95 to 1.05.
Ratio of Positive-to-Negative Pulse Widths at Half-Amplitude:	0.95 to 1.05.

Table 4-1
CCITT G.703 8448 kb/s Data Interface Specifications (Continued)

Item	Specification
Receivers	
Input Impedance, Term:	75 ohms with 20 dB return loss, minimum.
Input Impedance, Bridge:	1000 ohms, minimum.
Sensitivity:	0 dB to -6 dB, typical signal.
Operating Bit Rate:	8448 kb/s ±100 ppm.
Crystal Oscillator	
Frequency:	8448 kHz.
Accuracy and Stability:	±30 ppm, 0 to 50° Celsius.