



## 1.6/5.6 MALE TO KRONE IDC BALUN FOR E1-E2

### ELECTRICAL:

Exceeds ITU G.703 requirements .

Impedance matching : 75 ohms to 120 ohms .

Data transmitted rates : 2-8Mbps for E1-E2 .

Return Loss : -29db for 2Mbps , -21db for 8Mbps .

Insertion Loss : -0.2db for 2Mbps , -0.3db for 8Mbps .

Both directional conversion .

No AC power or batteries needed .

Operating Temperature : 0-70°C .

### MATERIALS :

NO	DESCRIPTION	MATERIAL	Q'TY	FINISH
1	SHELL	BRASS	1	NICKEL(80u''~100u'')
2	CONNECTOR BODY	BRASS	1	GOLD(2u''~3u'')
3	CENTER CONTACT	BRASS	1	GOLD(2u''~3u'')
4	INSULATOR	TEFLON(400°C)	1	
5	BODY	BRASS	1	NICKEL(80u''~100u'')
6	INSULATOR	TEFLON(400°C)	1	1
7	PLASTIC HOUSING	ABS(UL94V-0)	1	
8	INSULATOR WASHER	PBT(UL94V-0)	1	
9	BALUN CORE	FERRITE	1	1 : 1.26
10	WASHER	BRASS	1	NICKEL(80u''~100u'')
11	BALUN REAR CAP	PBT(UL94V-0)	1	
12	IDC SET	PBT(UL94V-0)	1	

Table 1

### SCHEMATIC DIAGRAM :

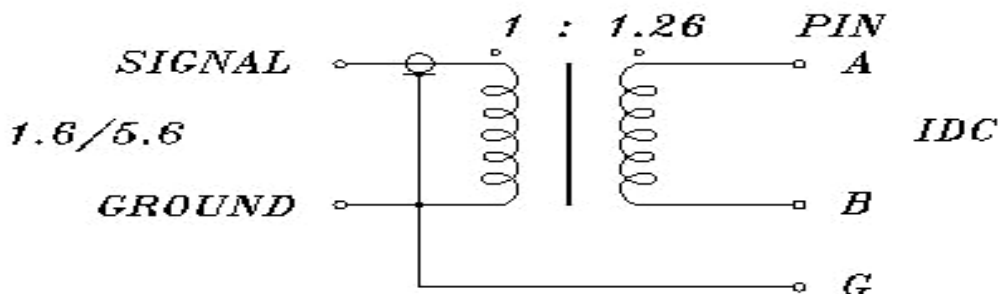
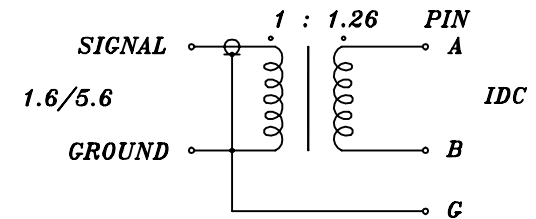
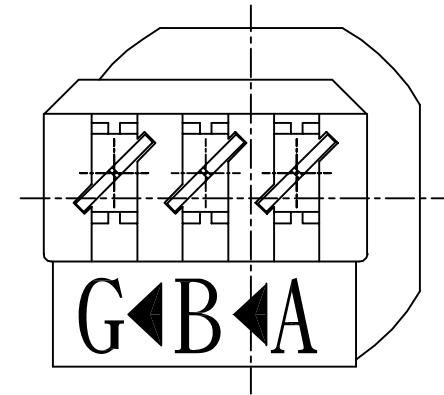
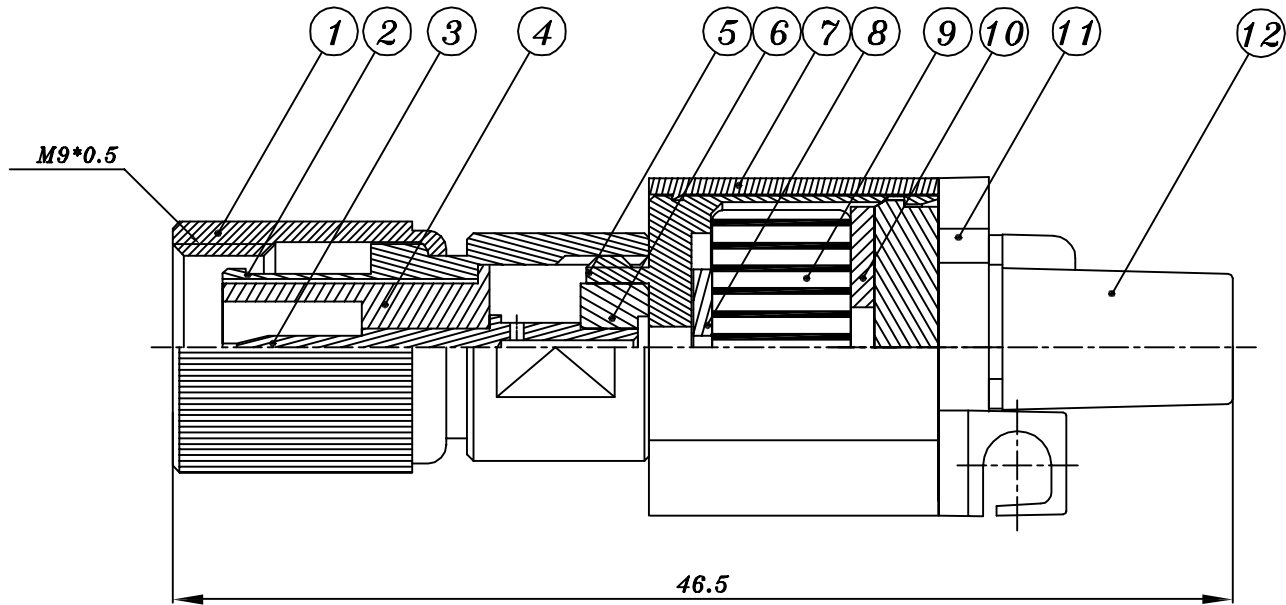


Figure 1



- \*Data Rates to 2.048 Mbps
- \*75 Ohm Coax to 120 Ohm Twisted Pair
- \*Bi-Directional Signal Conversion
- \*No AC Power or Batteries Needed
- \*Female Coax 1.6/5.6 Connectors Available
- \*Ultra-Miniature Enclosure

12	IDC SET	PBT(UL94V-0)	1	
11	BALUN REAR CAP	PBT(UL94V-0)	1	
10	WASHER	BRASS	1	NICKEL(80u"-100u")
9	BALUN CORE	FERRITE	1	1 : 1.26
8	INSULATOR WASHER	PBT(UL94V-0)	1	
7	PLASTIC HOUSING	ABS(UL94V-0)	1	
6	INSULATOR	TEFLON(400)	1	
5	BODY	BRASS	1	NICKEL(100u"-150u")
4	INSULATOR	TEFLON(400)	1	
3	CENTER CONTACT	BRASS	1	GOLD(2u"-3u")
2	CONNECTOR BODY	BRASS	1	GOLD(2u"-3u")
1	SHELL	BRASS	1	NICKEL(80u"-100u")
NO	DESCRIPTION	MATERIAL	Q'TY	FINISH

UNLESS OTHERWISE SPECIFIED  
DIMENSIONS ARE IN INCHES mm  
TOLERANCE ARE:  
FRACTIONS DECIMALS ANGLES  
X ±0.1  
XX ±0.05

MATERIAL

FINISH

DO NOT SCALE DWG.

CONTRACT NO.

APPROVALS

DATE

DRAWN

CHUNG 03/11 '05

CHECKED

ISSUED

LEMAR ENTERPRISES CO.LTD

1.6/5.6 MALE TO  
KRONE IDC BALUN  
FOR E1 (75Ω:120Ω)

SIZE

FSCH NO.

DWG NO.

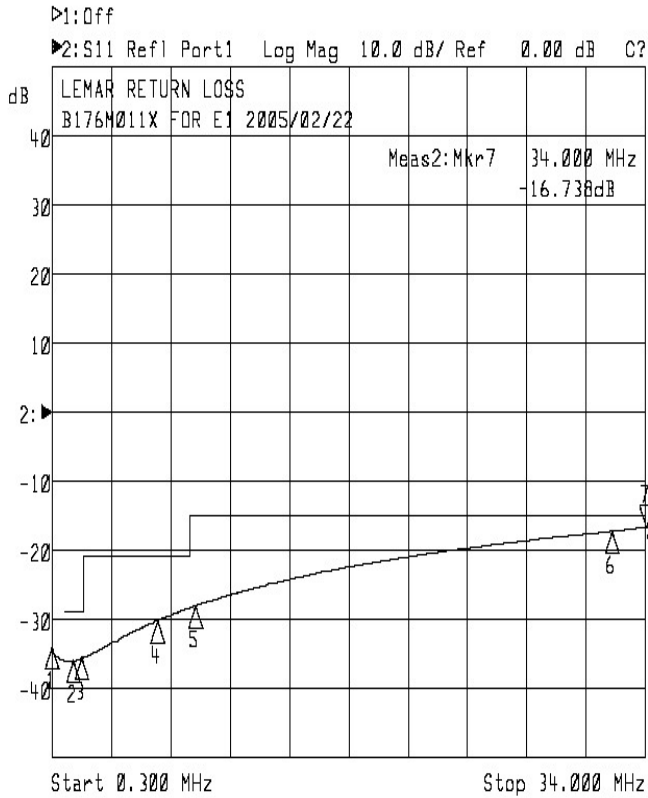
B176M011X

REV.

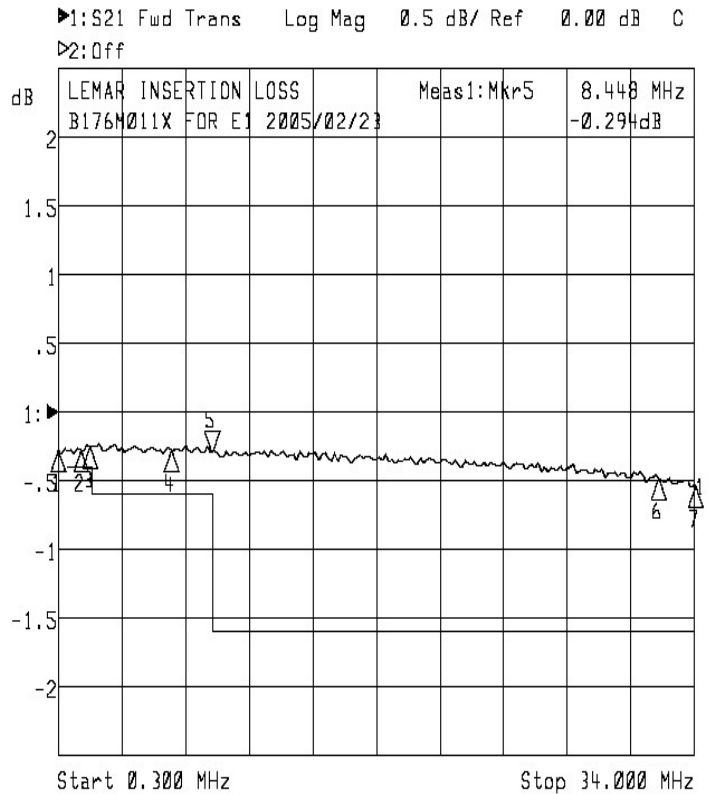
SCALE 3 : 1

SHEET 1 OF 1

# Test reports



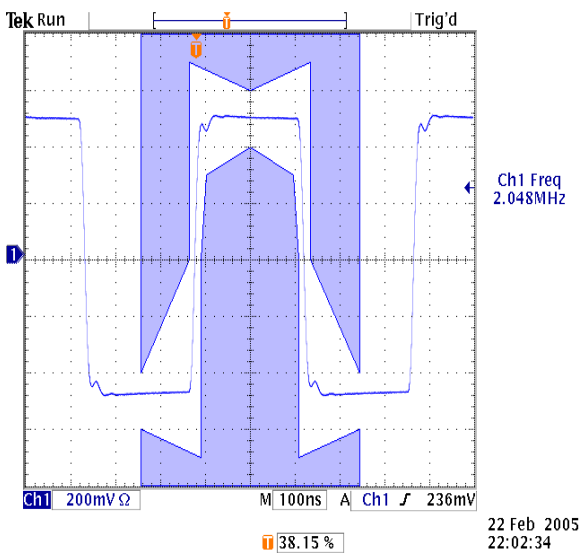
1:Mkr (MHz)	dB	2:Mkr (MHz)	dB
		1:	0.3000 -34.013
		2:	1.5440 -36.092
		3:	2.0480 -35.587
		4:	6.3120 -30.140
		5:	8.4480 -28.034
		6:	32.0640 -17.264
		7:	34.0000 -16.738



1:Mkr (MHz)	dB	2:Mkr (MHz)	dB
		1:	0.3000 -0.272
		2:	1.5440 -0.276
		3:	2.0480 -0.252
		4:	6.3120 -0.275
		5:	8.4480 -0.294
		6:	32.0640 -0.469
		7:	34.0000 -0.533

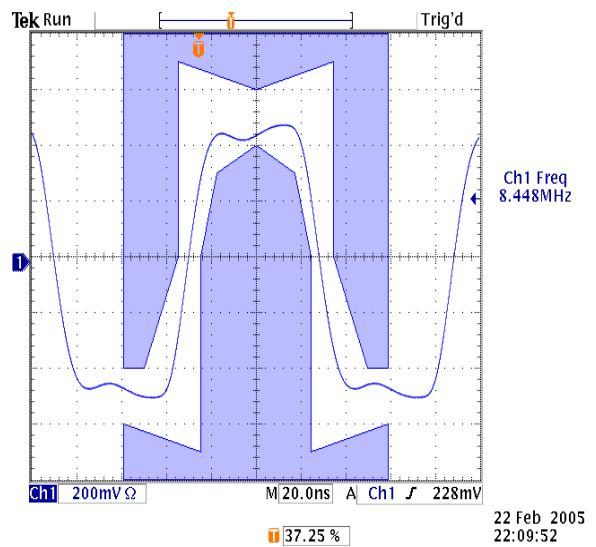
Figure 2

Figure 3



G.703 spec mask(2.048Mbps)

Figure 4



G.703 spec mask(8.448Mbps)

Figure 5