

LOW FREQUENCY CABLE SPECIFICATIONS

STANDARD OFF-THE-SHELF ASSEMBLIES

SERIES	MH081	MH113	RF178	RF174	IJ5C [†] (IsoRate [®])	RF316, IJ5C, IJ5H, GRF1-C, GRF1H-C	RS316	RF058	RF179, GRF7-C, GRF7H-C	RFB8T	RFC8T	RFB6T	RFC6T	RFA6T	C28S		
TYPE	50 Ω CABLES								75 Ω CABLES						100 Ω CABLES		
	0.81 mm (34 AWG)	1.13 mm (31 AWG)	RG 178 (28 AWG)	RG 174 (24 AWG)	Samtec 26 AWG, high-temp micro coax	RG 316 (24 AWG)	RG 316, double shielded (24 AWG)	RG 58 (20 AWG)	RG 179 (28 AWG)	Belden 1855A (23 AWG)	12G-SDI, Belden 4855R (23 AWG)	Belden 1694A (18 AWG)	12G- SDI, Belden 4694R (18 AWG)	RG 6 (18 AWG)	Samtec 28 AWG, shielded twisted pair		
ELECTRICAL																	
Impedence	Ω	50 ± 3	50 ± 2		50 ± 5	50 ± 2		50 ± 3		75 ± 3						100 ± 5	
Insertion Loss (dB/m)	100 MHz	1.00	0.60	0.50	0.40	0.68	0.30	1.40 @ 2 GHz	0.20	0.30	0.12		0.07	0.06	0.07	-----	
	1 GHz	3.10	1.90	1.70	1.40	2.37	1.25	1.60 @ 3 GHz	0.80	0.80	0.37	0.36	0.21	0.19	0.21	-----	
	6 GHz	8.60	4.90	5.90	4.40	6.53	4.25	2.20 @ 5 GHz	5.40	3.60	0.97	0.91	0.59	0.51	0.59	-----	
Propagation Delay	nS/m	4.70	4.70	4.83	5.06	4.17	4.83	-----	5.05	4.83	4.12	4.06		3.92	4.03	-----	
Current Rating	Amps	1.20	2.10	3.00	5.00	3.00	5.00	-----		3.00	5.00	4.70	-----	16.00	-----		
Capacitance	pF/m	100.00	95.00	96.00	101.00	85.60	96.00	95.80	102.00	64.00	55.70	53.40	53.14	52.20	53.14	38.00	
CONSTRUCTION																	
Center Conductor	Material	Silver Plated Copper		Silver Plated Copper Clad Steel	Bare Copper	Silver Plated Copper	Silver and Copper Plated Steel	Silver Plated Copper Clad Steel	Tinned Copper	Silver Plated Copper	Bare Copper	Silver Plated Copper	Bare Copper	Silver Plated Copper	Bare Copper	Silver Plated Copper	
	AWG	34	31	28	24	26	24		20	28	23		18			28	
Dielectric	Material	FEP		PTFE	KLPE	Foamed FEP	PTFE	FEP	Solid Polyeth- ylene	PTFE	FHDPE	PE (Foam)	FHDPE	PE (Foam)	FHDPE	FEP	
Shield	Material	Silver Plated Copper	Tinned Copper	Silver Plated Copper	Tinned Copper	Silver Plated Copper			Tinned Copper	Silver Plated Copper	1. Al Foil- Polyester Tape-Al Foil 2. Tinned Copper		1. Bonded Al Foil 2. Al Wire		1. Al Foil- Polyester Tape-Al Foil 2. Tinned Copper		Silver Plated Copper
Jacket	Material	PFA	FEP		PVC	FEP			PVC	FEP	PVC						
MECHANICAL																	
Operating Temp		-40 °C to +90 °C		-50 °C to +165 °C	-20 °C to +80 °C	-40 °C to +200 °C	-55 °C to +165 °C		-50 °C to +90 °C	-50 °C to +165 °C	-30 °C to +75 °C		-20 °C to +75 °C	-30 °C to +75 °C	-20 °C to +105 °C		
Bend Radius	Min	5.00 mm	6.80 mm	10.20 mm	25.40 mm	3.18 mm	12.80 mm	12.80 mm	49.50 mm	10.20 mm	38.10 mm	41.00 mm	69.85 mm	70.00 mm	69.85 mm	19.05 mm	
Connector Options		MHF1, MHF3, MHF4	MHF1, SMA	MMCX, MCX, SMA, SMB, BNC, TNC, N Type	MMCX, MMCXV, MCX, SMA, SMB, BNC, TNC, N Type, Ganged	IsoRate [®]	MMCX, MMCXV, MCX, SMA, SMB, BNC, TNC, N Type, Ganged	MMCX, MCX, SMA, BNC, TNC	SMA, TNC, N Type	MCX, MMCX7, SMB, BNC, DIN 1.0/2.3, Ganged	HD-BNC, DIN 1.0/2.3		BNC, HD-BNC, DIN 1.0/2.3			CJT	

[†] ALSO USES RG 316