

M2938Z
HYPERCELL

HPL 50-1-1/4 LA - Fire resistant LSOH

GENERAL CHARACTERISTICS

Inner Conductor:	Copper tube Outer Diameter: 13.1 mm
Dielectric:	Foam Polyethylene Diameter: 32.8 mm
Outer Conductor:	Corrugated copper Outer Diameter: 35.7 mm
Jacket:	Low smoke Zero Halogen Compound Diameter: 39.5 mm

Ink marking: ACOME HYPERCELL COAX LSOH HPL 50-1-1/4F FLEXIBLE M2938 LOT X lot N (+ Metric length)

MECHANICAL

Bending radius:

- Operating : 380 mm – Min
- Installation : 200 mm – Min

Tensile Strength: 2500 N – Max

Weight: 993 kg/km

Packaging: 500 m

ENVIRONMENTAL

Temperature range:

- Operating: -40°C / +85°C
- Installation: -20°C / +60°C

- Storage: -70°C / +85°C

Fire resistance: IEC 60332-1 / 60332-3A

Smoke toxicity: IEC 60754-2 / NFC20-454

Smoke density: IEC 61034

Test methods: IEC 60096-0-1, 61196-1, 60966-1

ELECTRICAL

Impedance : 50 ± 1 Ω
Return loss :

- 400 ~ 500 MHz ≤ -26.5 dB
- 800 ~ 1000 MHz ≤ -26.5 dB
- 1700 ~ 2200 MHz ≤ -24 dB
- 2500 ~ 2700 MHz ≤ -23.5 dB

Capacitance: 76 pF/m
Passive Intermodulation : ≤-158 dBc
Velocity: 88%
Dielectric constant: 1.29
Screening effectiveness: > 120 dB
Operating frequency: ≤ 3.4 GHz
Peak power rating: 181 kW
Operating voltage: 4.3 kV RMS
Insulation Resistance: > 10000 MΩ.km
DC resistance:

- Inner conductor: ≤ 1.10 Ω/km
- Outer conductor: ≤ 0.78 Ω/km

Frequency (MHz)	Attenuation (dB/100m) @ 20°C Typical	Power kW @ 40°C-Ambient Temperature Inner conductor: 100°C
30	0.43	23.68
80	0.72	14.13
150	1.00	10.07
450	1.83	5.46
824	2.56	3.84
900	2.69	3.64
960	2.79	3.50
1000	2.85	3.42
1500	3.61	2.75
1700	3.89	2.47
1800	4.03	2.38
1900	4.16	2.30
2000	4.28	2.23
2200	4.54	2.10
2300	4.67	2.04
2400	4.79	1.98
2500	4.92	1.93
3000	5.49	1.72
3300	5.82	1.61
3400	5.92	1.58