



## M2936Z HYPERCELL

HPL 50-3/8 F - Fire resistant LSOH Jacket

### GENERAL CHARACTERISTICS

|                  |                                                   |
|------------------|---------------------------------------------------|
| Inner Conductor: | Copper - clad Aluminium Diameter: 3.3 mm          |
| Dielectric:      | Foam Polyethylene Diameter: 8.5 mm                |
| Outer Conductor: | Corrugated copper Outer Diameter: 9.5 mm          |
| Jacket:          | Low smoke Zero Halogen Compound Diameter: 11.5 mm |

Ink marking: ACOME HYPERCELL COAX LSOH HPL 50-3/8F FLEXIBLE M2936 LOT X lot N° (+ Metric length)

### MECHANICAL

Bending radius:

- Operating : 100 mm – Min
- Installation : 60 mm – Min

Tensile Strength: 700 N – Max

Weight: 148 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 :  $50 \pm 1 \Omega$

Return loss :

- 400 ~ 500 MHz  $\leq -26.5$  dB
- 800 ~ 1000 MHz  $\leq -26.5$  dB
- 1700 ~ 2200 MHz  $\leq -24$  dB
- 2500 ~ 2700 MHz  $\leq -23.5$  dB

Capacitance: 78 pF/m

Passive Intermodulation :  $\leq -158$  dBc

Velocity: 85%

Dielectric constant: 1.38

Screening effectiveness:  $> 120$  dB

Operating frequency:  $\leq 12$  GHz

Peak power rating: 12.8 kW

Operating voltage: 1.13 kV RMS

Insulation Resistance:  $> 10000$  M $\Omega$ .km

DC resistance:

- Inner conductor:  $\leq 3.46 \Omega/\text{km}$
- Outer conductor:  $\leq 3.50 \Omega/\text{km}$

| Frequency<br>(MHz) | Attenuation<br>(dB/100m)<br>@ 20°C<br>Typical | Power kW<br>@ 40°C-Ambient<br>Temperature<br>Inner conductor:<br>100°C |
|--------------------|-----------------------------------------------|------------------------------------------------------------------------|
| 30                 | 1.74                                          | 5.68                                                                   |
| 80                 | 2.85                                          | 3.46                                                                   |
| 150                | 3.93                                          | 2.51                                                                   |
| 450                | 6.91                                          | 1.43                                                                   |
| 824                | 9.47                                          | 1.04                                                                   |
| 900                | 9.92                                          | 0.99                                                                   |
| 960                | 10.26                                         | 0.96                                                                   |
| 1000               | 10.48                                         | 0.94                                                                   |
| 1500               | 12.99                                         | 0.76                                                                   |
| 1700               | 13.89                                         | 0.71                                                                   |
| 1800               | 14.32                                         | 0.69                                                                   |
| 1900               | 14.74                                         | 0.67                                                                   |
| 2000               | 15.15                                         | 0.65                                                                   |
| 2200               | 15.95                                         | 0.62                                                                   |
| 2300               | 16.33                                         | 0.60                                                                   |
| 2400               | 16.71                                         | 0.59                                                                   |
| 2500               | 17.08                                         | 0.58                                                                   |
| 3000               | 18.86                                         | 0.52                                                                   |
| 3300               | 19.86                                         | 0.50                                                                   |
| 3400               | 20.19                                         | 0.49                                                                   |
| 3500               | 20.51                                         | 0.48                                                                   |
| 3600               | 20.83                                         | 0.47                                                                   |
| 3800               | 21.46                                         | 0.45                                                                   |