



UHF, Cellular, UMTS/W-LAN 802.11(b/g) 80 - 2170 / 2400 - 2500 MHz

- Combines W-LAN and Cellular on same Distributed Antenna System.
- Meets European Rail Standards EN50121

EN50155: 2001, EN61373: 1999

EN60068-2-1: 1995 EN60068-2-2: 1994 EN60068-2-30: 2000

- ♦ 50 dB Input Isolation
- ♦ Minimal RF Insertion Loss
- Rugged, Reliable, RoHS Design
- Low Passive IM., PIM



Microlab Model BK-81N series Wireless Local Area Network (W-LAN) Injector is a filter diplexer based on BK-21N. This model has been designed and tested to meet the European Rail Standards. The Diplexer links W-LAN designed to 802.11(b) or (g) with a coaxial DAS, a distributed antenna system.

To minimize the effects of the WLAN Injector to the DAS, the inputs are well isolated and have minimal insertion loss over their respective frequency bands.

The W-LAN Injector has been designed using passive, proprietary techniques to ensure minimal loss and very high reliability. Corner holes are provided for simple mounting to a surface or cable tray. Unit is also available with 7-16 mm DIN connectors as the BK-81D.(8/08)

Passband J1 to J3: 2,400 to 2,500 MHz
Passband J2 to J3: below 80 to 2,170 MHz
J1 to J2 Isolation: >50 dB in band

J1 & J2 VSWR: 1.5:1 max.

1.3:1 typ., 0° to +70°C

 $\begin{array}{lll} \mbox{J1 Passband Loss:} & 0.6 \pm 0.1 \mbox{ dB} \\ \mbox{J2 Passband Loss:} & 0.3 \pm 0.1 \mbox{ dB} \\ \mbox{Power Rating:} & \mbox{J1: 8W max.} \\ \end{array}$

J2: 150W avg., 3 kW pk.

Impedance: 50Ω nominal

<-140 dBc, <-150 dBc typical (test with 2 +43dBm tones)

Environment*: -40° - +85°C, IP67
Finish: Connectors: Silver plated or Triplate
Housing: Passivated Aluminum

Weight, nominal: 2.0 lbs (0.91 kg)

BK-81D with 7-16 mm DIN connectors

BK-81N with N connectors.

Intermod. Distortion:

