

MI-124

TWIN TMA AWS

Designed to be deployed in collocated AWS systems, the Kaelus MI-124 enhances cell uplink coverage in AWS through improved system noise figure, thereby saving operational and capital expenditure.

FEATURES

- Improved base station sensitivity through gain in the AWS uplink
- Excellent noise figure performance
- Full AISG operation and RET antenna support, AISG2.0 compatible
- Small and light for minimum visual impact



TECHNICAL SPECIFICATIONS

BAND NAME	AWS
DOWNLINK	
Passband	2110 - 2200MHz
Insertion loss	0.3dB typical
Return loss	20dB typical, 18dB minimum
Maximum input power	200W (average)
Intermodulation products	-165dBc typ in RX band at ANT
UPLINK	
Passband	1710 - 1780MHz
Gain	12dB
Return loss	16dB
Bypass return loss	12dB
Bypass loss	2dB typical
Noise figure	1.3dB typical
Output IP3	25dBm typical
Maximum input power with no damage	12dB typical
ELECTRICAL	
Impedance	50Ohms
POWER SUPPLY AND ALARM (CURRENT WINDOW ALARM MODE, DEFAULT)	
Current window alarm mode (CWA) is the default operating mode and can be configured to specific customer requirements. Please contact Kaelus for more information.	
DC supply voltage	+9 to +15V DC
DC supply current, normal mode	80-130mA
DC supply current, alarm mode	170-180mA
AISG MODE OF OPERATION (AUTO SELECTED ON VALID AISG 2.0 FRAMES)	
AISG signals can be applied to the BTS ports. The TMA unit switches to AISG mode when valid frames are detected on either port.	
DC supply voltage	+9.0V to +30V DC
AISG version	2.0
Power consumption, AISG mode	< 2W
AISG connector, current rating	IEC60130-9, 8-pin female, 1.6A

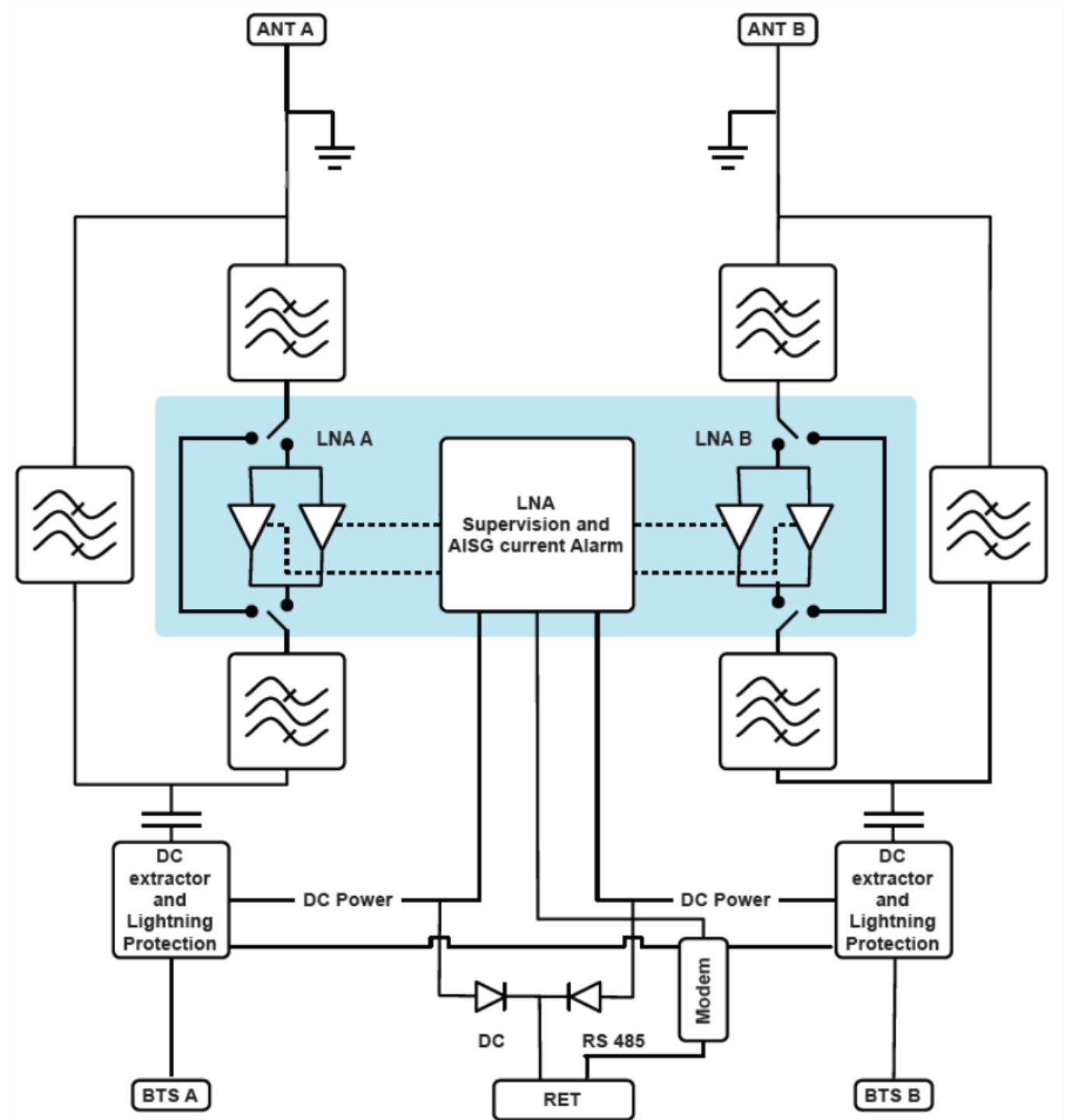
ENVIRONMENTAL	
For further details of environmental compliance, please contact Kaelus.	
Temperature range	-40°C to +65°C -40°F to +149°F
Ingress protection	IP67
MTBF	>1,200,000 hours
Compliance	EMC: EN 301 489-8 Safety: IEC/EN 62368-1 Operation: ETSI EN 300 019-1-4 class 4.1E Storage: ETS 300 019-1-1 class 1.2

MECHANICAL	
Dimensions H x D x W	175 x 47 x 153 mm 6.9 x 1.85 x 6.0 in (excluding brackets and connectors)
Weight	2.5kg 5.511lbs
Finish	Powder coated, NCS 1502-R
Connectors	4.3-10 (F) long neck or 7/16(F) AISG (F)
Wind Load	165N @70m/s
Mounting	Pole/wall bracket using two metal clamps, suits 40-140mm diameter poles

ORDERING INFORMATION

PART NUMBER	CONFIGURATION	OPTIONAL FEATURES	CONNECTORS	AISG MODE
MI-12401	TWIN, 2 in / 2 out	BASE MODEL	7/16 (F)	Refer to AISG MODE OF OPERATION section
MI-12431	TWIN, 2 in / 2 out	BASE MODEL	4.3-10 (F)	Refer to AISG MODE OF OPERATION section,

ELECTRICAL BLOCK DIAGRAM



MECHANICAL BLOCK DIAGRAM

