

Dual Band Tower Mounted Amplifier, 700//900 MHz, 12 dB, 2 BTS & 2 ANT ports, AISG with 1 RET connector (2 device with 2 sub-units), with 4.3-10 connectors

- Industry leading PIM performance
- New 4.3-10 connectors for improved PIM performance and size reduction
- 2 input ports and 2 output ports
- Designed to boost UP-Link Coverage and KPIs
- Automatic LNA by-pass function
- Connectors "in line"
- TMA is operating in AISG mode
- Single AISG with 1 RET connector
- 2 devices with 2 sub-units
- Built in lightning protection

Product Classification

Product Type 1-BTS:1-ANT (Uniplex) | Tower mounted amplifier

General Specifications

Color Gray
Modularity 2-Twin

Mounting Pipe HardwareBand clamps (2)RF Connector Interface4.3-10 Female

Dimensions

 Height
 274 mm | 10.787 in

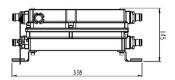
 Width
 266 mm | 10.472 in

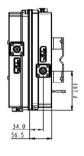
 Depth
 113 mm | 4.449 in

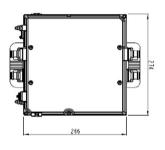
Mounting Pipe Diameter Range 42.6–122 mm

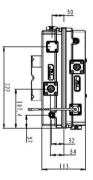


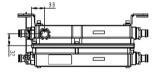
Outline Drawing

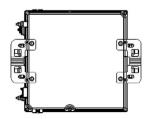












Electrical Specifications

License Band, Band Pass APT 700

License Band, LNA APT 700 | CEL 900 | EDD 800

Electrical Specifications, dc Power/Alarm

dc Switching/Redundancy Yes
Lightning Surge Current 10 kA

Lightning Surge Current Waveform 8/20 waveform

Alarm Current, CWA Mode 190 mA ±10 mA

Electrical Specifications, AISG

COMMSCOPE®

| AISG Connector | 8-pin DIN Female |
|-------------------------|------------------|
| AISG Connector Standard | IEC 60130-9 |
| Protocol | AISG 2.0 |
| Voltage, AISG Mode | 10-30 Vdc |

Electrical Specifications

| Sub-module | 1 2 | 1 2 |
|--|------------------------------------|--------------|
| Branch | 1 | 2 |
| Port Designation | ANT 700 | ANT 900 |
| License Band | APT 700, Band Pass APT 700, LNA | CEL 900, LNA |
| Return Loss, typical, dB | 20 | 20 |
| Return Loss - Bypass Mode, typical, dB | 18 | 18 |

Electrical Specifications Rx (Uplink)

| Frequency Range, MHz | 703-733 | 880-915 |
|---|---------|---------|
| Bandwidth, MHz | 30 | 35 |
| Gain, nominal, dB | 12 | 12 |
| Noise Figure, typical, dB | 1.25 | 1.35 |
| Group Delay Variation, maximum, ns | 90 | 100 |
| Group Delay Variation Bandwidth, MHz | 5 | 5 |
| Total Group Delay, maximum, ns | 200 | 225 |
| Total Group Delay, typical, ns | 150 | 200 |
| Return Loss, minimum, dB | 18 | 18 |
| Insertion Loss - Bypass Mode, typical, dB | 1.5 | 1.2 |

Electrical Specifications Tx (Downlink)

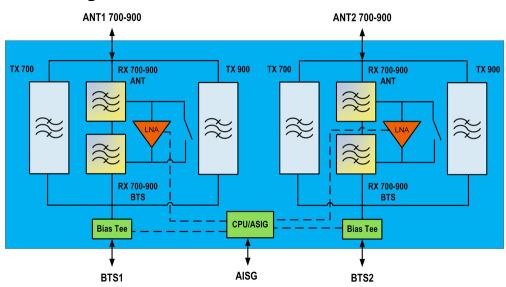
| Frequency Range, MHz | 758-788 | 925-960 |
|--------------------------------------|---------|---------|
| Bandwidth, MHz | 30 | 35 |
| Insertion Loss, maximum, dB | 0.6 | 0.75 |
| Insertion Loss, typical, dB | 0.4 | 0.6 |
| Group Delay Variation, maximum, ns | 35 | 35 |
| Group Delay Variation Bandwidth, MHz | 5 | 5 |
| Total Group Delay, maximum, ns | 80 | 85 |
| Total Group Delay, typical, ns | 70 | 60 |
| Return Loss, minimum, dB | 18 | 18 |

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| Return Loss, typical, dB | 20 | 20 |
|------------------------------|----------------------|----------------------|
| Input Power, RMS, maximum, W | 200 | 200 |
| Input Power, PEP, maximum, W | 2500 | 2500 |
| 3rd Order PIM, typical, dBc | -162 | -162 |
| 3rd Order PIM Test Method | Two +43 dBm carriers | Two +43 dBm carriers |



Block Diagram



Environmental Specifications

Operating Temperature $-40 \,^{\circ}\text{C} \text{ to } +65 \,^{\circ}\text{C} \, (-40 \,^{\circ}\text{F to } +149 \,^{\circ}\text{F})$

Relative Humidity Up to 100%

Corrosion Test Method IEC 60068-2-11, 30 days
Ingress Protection Test Method IEC 60529:2001, IP67

Packaging and Weights

Included Mounting hardware

Volume 8.3 L

Weight, net 9 kg | 19.842 lb

Regulatory Compliance/Certifications

Agency Classification

ISO 9001:2015 Designed, manufactured and/or distributed under this quality management system

* Footnotes

License Band, Band Pass License Bands that are to be passed through with no amplification

License Band, LNALicense Bands that have RxUplink amplification

COMMSC PE°