



8-WAY

Active Splitter

ZT-338

Mini-Circuits

50Ω 950 to 2150 MHz Rack-Mount SMA Female

THE BIG DEAL

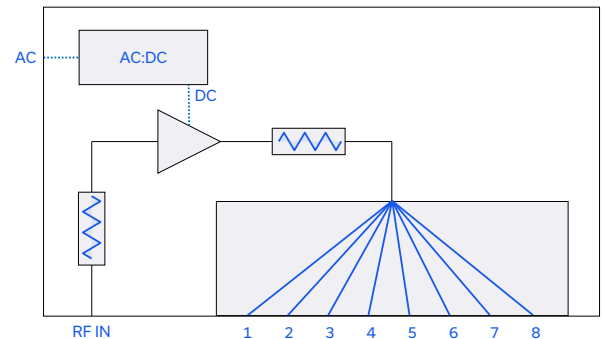
- 8-way power division with no path loss
- Convenient rack-mountable chassis
- AC mains power supply

*Generic photo used for illustration purposes only*

APPLICATIONS

- Benchtop and rack-mounted automated test systems
- GNSS (GPS, Galileo, GLONASS) signal distribution
- Test instrumentation time synchronization
- L-band satcom (satellite communications)

FUNCTIONAL BLOCK DIAGRAM



PRODUCT OVERVIEW

Mini-Circuits' ZT-338 is an 8-way active power splitter covering L-band 950-2150 MHz, ideally suited for satcom and GNSS (GPS, GLONASS & Galileo) signal distribution applications. The splitter is powered from the AC mains input to give unity gain from input to each output. The system is housed in a compact 19-inch rack chassis, 1U height, with all RF ports (SMA female) on the front panel.

ELECTRICAL SPECIFICATIONS AT +25°C

Parameter	Conditions	Min.	Typ.	Max.	Units
Frequency Range		950		2150	MHz
Gain		-2	0.5		dB
Amplitude Unbalance			0.5		dB
Phase Unbalance			10		°
Isolation	Between ports 1-8	18	30		dB
Reverse Isolation	Reverse path loss from 1-8 to RF IN		35		dB
Return Loss			22		dB
Input P1dB ¹	RF IN		+8		dBm

1. Input power level at which the internal amplifier would typically be expected to reach its output power 1 dB compression point. It is recommended to operate below this input level for linear performance.





8-WAY

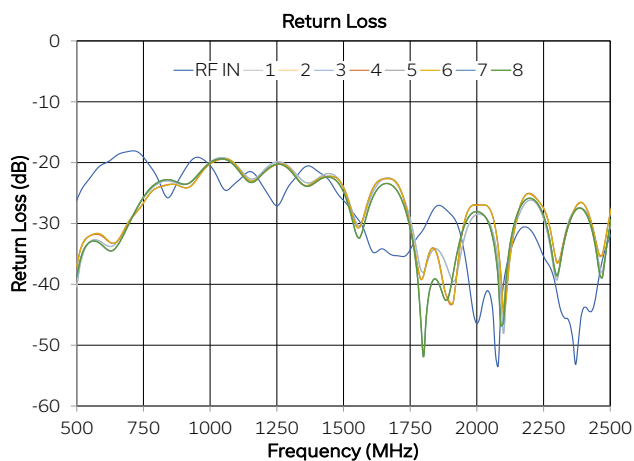
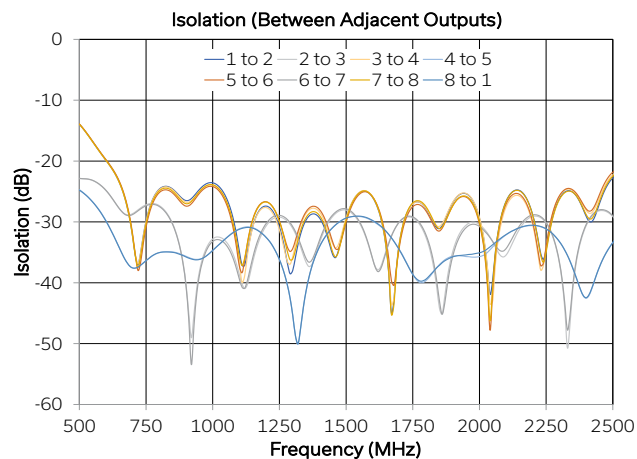
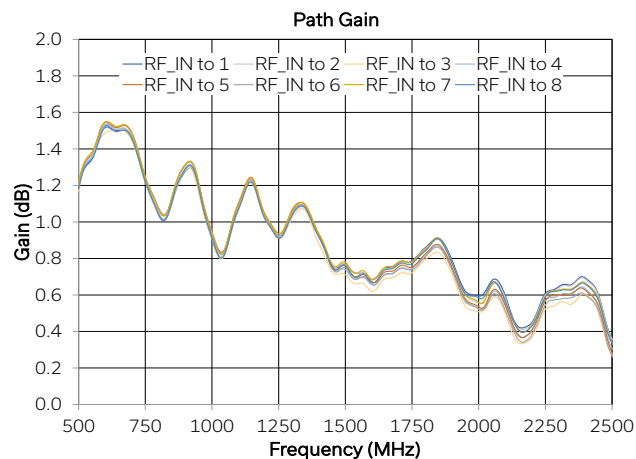
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TYPICAL PERFORMANCE GRAPHS





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ABSOLUTE MAXIMUM RATINGS

Parameter	Conditions	Limits	Units
Temperature	Operating	0 to +50	°C
	Storage	-20 to +60	
Input Power (No Damage)		+15	dBm

Permanent damage may occur if any of these limits are exceeded. Operating in the range between operating power limits and absolute maximum ratings for extended periods of time may result in reduced life and reliability.

POWER SUPPLY

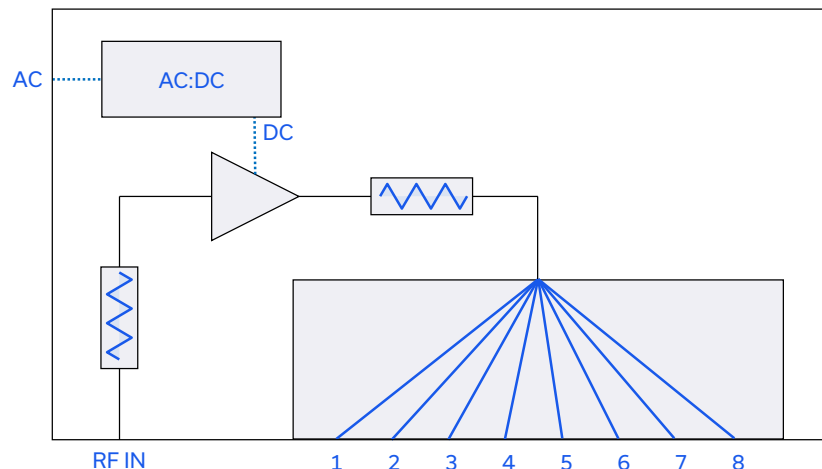
Power Supply	AC mains input: 100-240 V, 50 / 60 Hz
Fuse	2A, 250V rating
Power Consumption	150W maximum

CONNECTIONS

Port	Connector
RF IN & 1-8	SMA female
AC Input	IEC C14 inlet

RF IN = Input port
1-8 = Output port

FUNCTIONAL BLOCK DIAGRAM





8-WAY

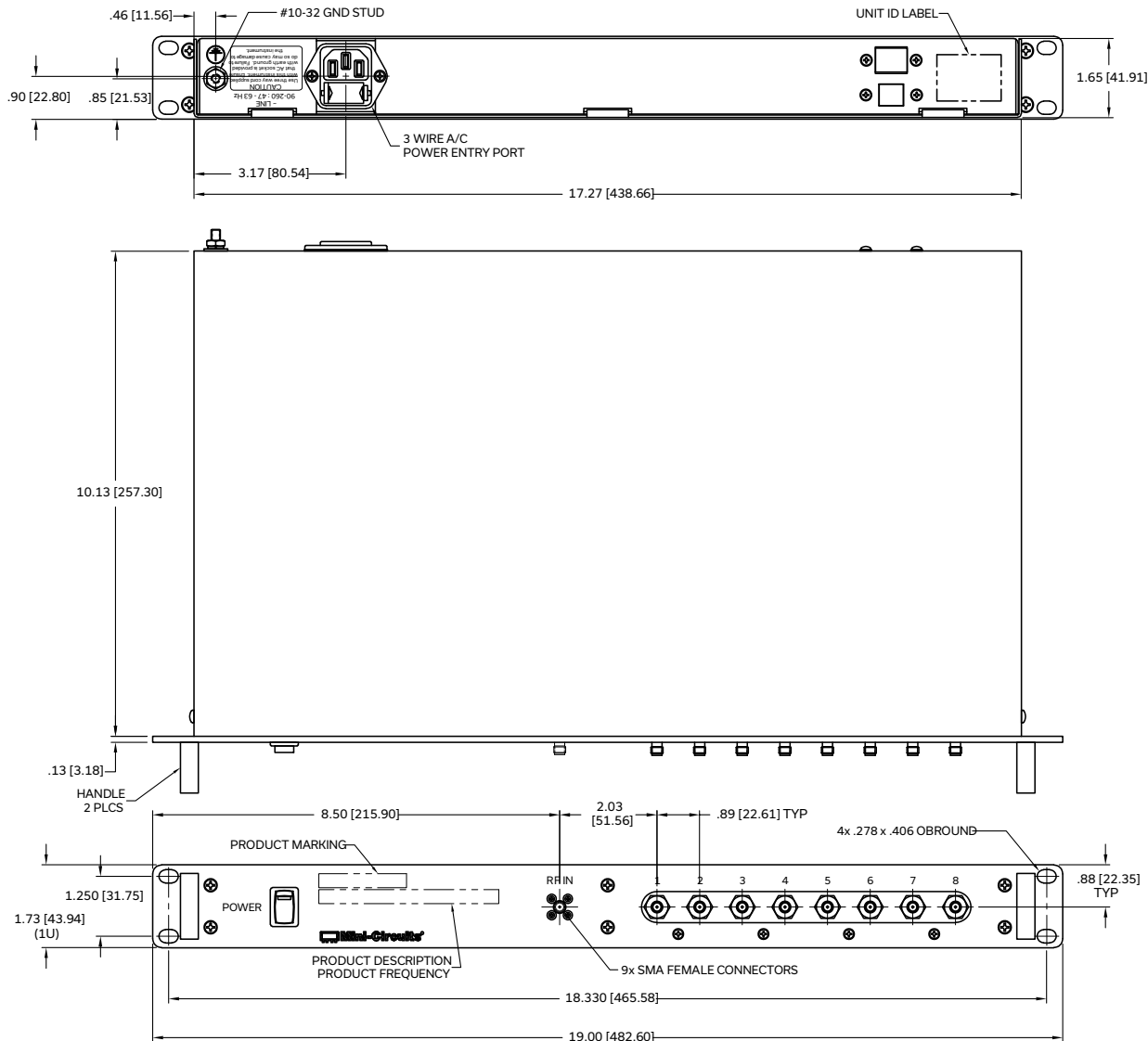
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OUTLINE DRAWING



Weight: 2540 grams.

Dimensions are in inches [mm]. Tolerances: 2 Pl. ± 0.03 inch, 3 Pl. ± 0.015 inch

PRODUCT MARKING

Product Marking: ZT-338

Product Description: Active 8-Way Splitter

Product Frequency: 950-2150 MHz

Unit ID Label: Serial number and other identification marks

Marking may contain other features or characters for internal lot control





16-WAY

Active Splitter

ZT-338


Mini-Circuits






50Ω 900 to 2250 MHz Rack-Mount SMA Female

DETAILED MODEL INFORMATION IS AVAILABLE ON OUR WEBSITE [CLICK HERE](#)

Case Style	NW1864
Environmental Rating	ENV55
Regulatory Compliance	<p>Refer to our website for compliance methodologies and qualifications</p> <p> </p> <p>www.minicircuits.com/quality/environmental_introduction.html</p>

Contact Us: testsolutions@minicircuits.com

Included Accessories	Part Number	Description
	CBL-3W-xx	AC power cord (IEC C13 connector to local plug) Select one option from the list below. Please contact Please contact testsolutions@minicircuits.com if your regions is not listed.
	HT-4-SMA	SMA connector wrench (4" length)

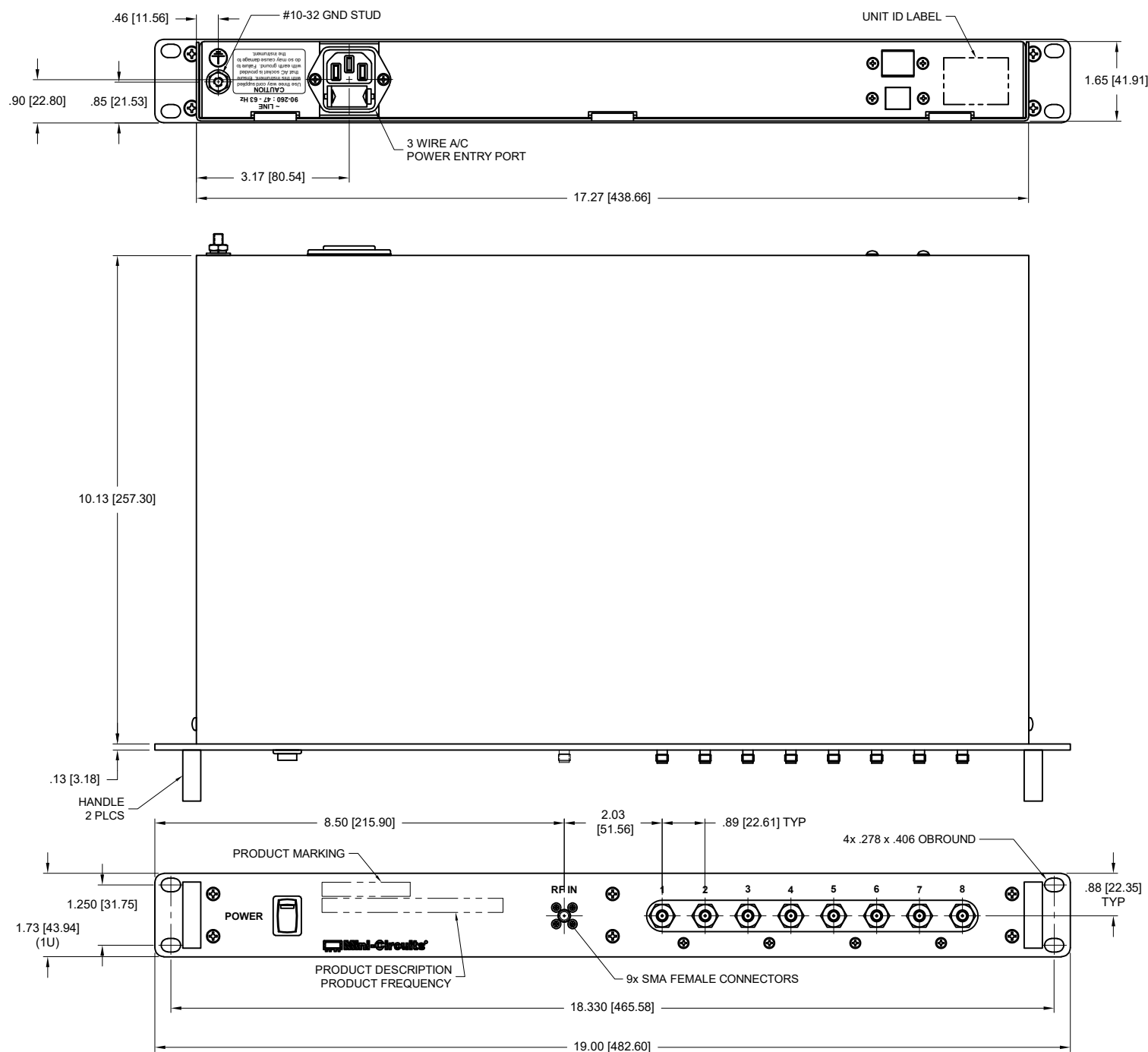
AC Power Cord Options	Part Number	Description
	CBL-3W-US	USA NEMA 5-15 plug (type B) to IEC C13 connector
	CBL-3W-EU	Europe CEE 7/7 plug (type E/F) to IEC C13 connector
	CBL-3W-UK	UK BS-1363 plug (type G) to IEC C13 connector
	CBL-3W-AU	Australia & China AS/NZS 3112 plug (type I) to IEC C13 connector
	CBL-3W-IL	Israel SI-32 plug (type H) to IEC C13 connector

NOTES

- A. Performance and quality attributes and conditions not expressly stated in this specification document are intended to be excluded and do not form a part of this specification document.
- B. Electrical specifications and performance data contained in this specification document are based on Mini-Circuit's applicable established test performance criteria and measurement instructions.
- C. The parts covered by this specification document are subject to Mini-Circuits standard limited warranty and terms and conditions (collectively, "Standard Terms"); Purchasers of this part are entitled to the rights and benefits contained therein. For a full statement of the standard. Terms and the exclusive rights and remedies thereunder, please visit Mini-Circuits' website at www.minicircuits.com/MCLStore/terms.jsp

Outline Dimensions

NW1864



Notes:

1. Case Material: Aluminum (with protective coating to prevent corrosion).
2. Dimensions are in inches [mm]. Tolerances: 2 Pl. ± 0.03 inch, 3 Pl. ± 0.015 inch
3. Weight: 2540 grams.
4. Marking may contain other features or characters for internal lot control

Mini-Circuits®
ISO 9001 ISO 14001 CERTIFIED

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RF/IF MICROWAVE COMPONENTS



Environmental Specifications ENV55

All Mini-Circuits products are manufactured under exacting quality assurance and control standards, and are capable of meeting published specifications after being subjected to any or all of the following physical and environmental test.

Specification	Test/Inspection Condition	Reference/Spec
Operating Temperature	-0° to 50° C Ambient Environment	Individual Model Data Sheet
Storage Temperature	-20° to 60° C Ambient Environment	Individual Model Data Sheet
Operating and Storage Humidity	5% to 85% RH (non-condensing)	Ambient
Bench Handling Test	Bench Top Tip 45° & Drop	MIL-PRF-28800F
Transit Drop Test	Free Fall Drop, 20 cm (7.9 inches)	MIL-PRF-28800F Class 3