MAPM-020512-040C00



Broadband UHF/VHF Power Module 20 - 512 MHz, 40W

M/A-COM Products REV 0

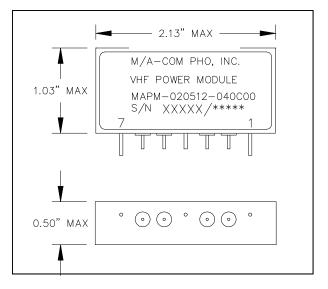
Features

- Broadband operation 20 512MHz
- Output power: 30 W Min
- Power gain: 8.0 dB Min
- Rugged push-pull FET
- External bias control
- Rugged construction for extreme environments
- Suitable for most commercial and industrial applications

Absolute Maximum Ratings

Parameter	Rating	Units
Supply Voltage	30	V
Input Power	8	W
Output Power	120	W
Bias Current	6.5	A
Operating Case Temperature	-40 to +85	°C
Storage Temperature	-50 to +100	°C

Product Image



Electrical Specifications: T_c= 25 + 5 °C

Parameter	Test Conditions	Min	Тур	Max	Units
Frequency Band	V _{SUPP} = 28 V, Pout = 20 watt	20	-	512	MHz
P _{1dB}	V _{SUPP} = 28 V, I _D = 400 mA	30	40	-	W
Power Gain	V_{SUPP} = 28 V, I _D = 400 mA	8.0	-	-	dB
Efficiency	V_{SUPP} = 28 V, I _D = 400 mA, P _{OUT} = 40W	-	37	-	%
Gain Variation With Frequency	V _{SUPP} = 28 V, Pout = 4W	-	-	<u>+</u> 2.5	dB
Input VSWR	V _{SUPP} = 28 V, I _D = 400 mA	-	3.5:1	-	VSWR
Load Mismatch Tolerance	V _{SUPP} = 28 V, F=512Mhz, P _{OUT} = 20W	-	5:1	-	VSWR
Even Harmonics	V _{SUPP} = 28 V, I _D = 400 mA, P _{OUT} = 20W	-	-	-25	dBc
Odd Harmonics	V _{SUPP} = 28 V, I _D = 400 mA, P _{OUT} = 20W	-	-	-15	dBc
Spurious Output	V _{SUPP} = 28 V, I _D = 400 mA, P _{OUT} = 20W	-	-	- 60	dBc
IP3	V_{SUPP} = 28 V,P_{OUT} = 20W , ΔF = 100kHz	-	56	-	dBm

ADVANCED: Data Sheets contain information regarding a product M/A-COM is considering for development. Performance is based on target specifications, simulated results, and/or prototype measurements. Commitment to develop is not guaranteed. PRELIMINARY: Data Sheets contain information regarding a product M/A-COM has under develop-

1

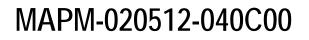
• North America Tel: 800.366.2266 / Fax: 978.366.2266

• Europe Tel: 44.1908.574.200 / Fax: 44.1908.574.300

Asia/Pacific Tel: 81.44.844.8296 / Fax: 81.44.844.8298
Visit www.macom.com for additional data sheets and product information.

PRELIMINARY: Data Sheets contain information regarding a product M/A-COM has under development. Performance is based on engineering tests. Specifications are typical. Mechanical outline has been fixed. Engineering samples and/or test data may be available. Commitment to produce in volume is not guaranteed.

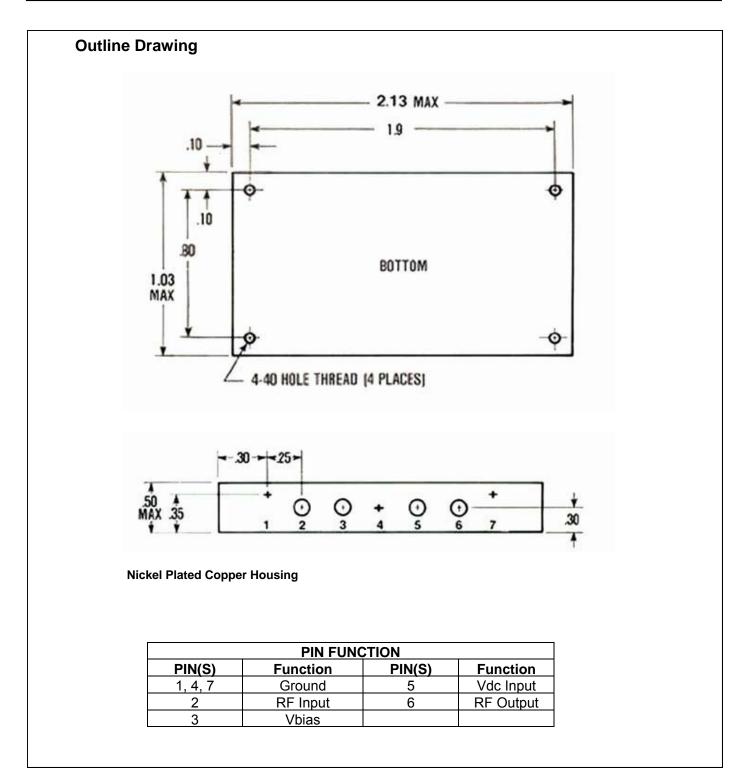
M/A-COM Inc. and its affiliates reserve the right to make changes to the product(s) or information contained herein without notice.





Broadband UHF/VHF Power Module 20 - 512 MHz, 40W

M/A-COM Products REV 0



2

- ADVANCED: Data Sheets contain information regarding a product M/A-COM is considering for development. Performance is based on target specifications, simulated results, and/or prototype measurements. Commitment to develop is not guaranteed. PRELIMINARY: Data Sheets contain information regarding a product M/A-COM has under develop-
- North America Tel: 800.366.2266 / Fax: 978.366.2266
- Europe Tel: 44.1908.574.200 / Fax: 44.1908.574.300

PRELIMINARY: Data Sheets contain information regarding a product M/A-COM has under development. Performance is based on engineering tests. Specifications are typical. Mechanical outline has been fixed. Engineering samples and/or test data may be available. Commitment to produce in volume is not guaranteed.

M/A-COM Inc. and its affiliates reserve the right to make changes to the product(s) or information contained herein without notice.

Asia/Pacific Tel: 81.44.844.8296 / Fax: 81.44.844.8298
Visit www.macom.com for additional data sheets and product information.