

## LTE 869-894-45 LTE Power Amplifier 869-894 MHz 45 Watts

Functions				
Num.	Description			
1	ALC Point Control and Read			
2	ALC on/Off Control and Read			
3	PA Mute On/Off Control and Read			
4	Digital Attenuator Control			
5	Operating Temperature Monitor and Alarm			
6	Output Power Monitor			
7	Reverse Power Monitor and Alarm			
8	DC Current Monitor and Alarm			
9	Protected Against High Reflected Power			

## **Environmental Specifications**

Parameter	Specification
Max Base Plate Operating Temp.	$0^{\circ}$ to +85° C Shutdown @ 90° C
Relative Humidity	5% ~ 96 %
Atmospheric Pressure	70 kPa ~ 106 kPa
Cooling	Not provided, User Supplied

CALL OUR SALES DEPARTMENT FOR MORE INFORMATION OR VARIATIONS OF THIS PRODUCT.

Corry Micronics, Inc. One Plastics Rd. - Corry, PA 16407 (724) 940-7556 ext. 138 Fax (724) 940-7707 www.cormic.com Corry Micronics Inc. herein referred to CMI, believes this information to be accurate, but makes no warranties, expressed or implied as to the accuracy of this document. CMI assumes no liability for any injury, loss, damage, direct or consequential arising from the use of our products. User assumes all risk whatsoever in connection with its intended use. CMI also reserves the right to change this document without notice. 12/14/2017

## **Electrical Specifications**

Parameter	Specification	
Frequency	869 – 894 MHz	
Signal Type	LTE, PAR 9.8 dB @ 0.01%	
Nominal Output Power	45 W	
Nominal Gain	51 dB	
ACLR	≤ -45dBc	
EVM (Max)	< 8% @ Specified Output Power	
Gain w/ ALC off +/- 1db	$51 \pm 1.5 \text{ dB} (\text{Room Temperature/ Value of attenuator 8.5 dB})$ $51 \pm 2 \text{ dB} (\text{Low and High Temperature/ Value of attenuator 8.5 dB})$	
Input Return Loss	18 dB	
Output Return Loss	18 dB	
Tx ALC control range vs. Tx input level change, Min	16 dB (Nominal Input +/- 8 dB)	
ALC Set Range	16 dB (46.5 ~ 31.5 dBm)	
ALC Set Step	0.5 dB	
ALC Control Accuracy	± 1 dB	
Attenuator Set Range (ALC Off)	31 dB	
Attenuator Set Step (ALC Off)	0.25 dB	
Max Input Level, No Damage and Degradation	0 dBm (Adjust the attenuator to maintain output power)	
Noise Figure (ALC Off)	$\leq 10 \text{ dB}$	
DC Power	+28V	
Efficiency	≥ 25% @ 45 W	
Output Load Mismatch Tolerance	Isolator Protected	

CALL OUR SALES DEPARTMENT FOR MORE INFORMATION OR VARIATIONS OF THIS PRODUCT.

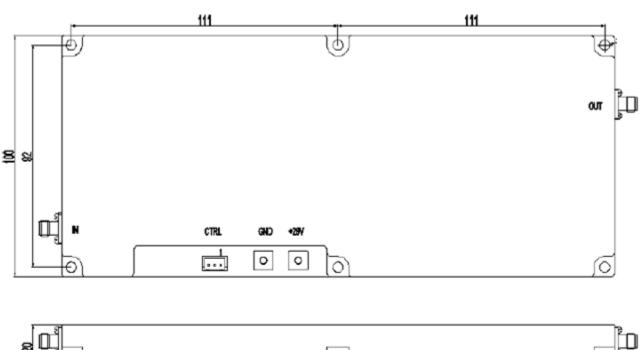
Corry Micronics, Inc. One Plastics Rd. - Corry, PA 16407 (724) 940-7556 ext. 138 Fax (724) 940-7707 www.cormic.com Corry Micronics Inc. herein referred to CMI, believes this information to be accurate, but makes no warranties, expressed or implied as to the accuracy of this document. CMI assumes no liability for any injury, loss, damage, direct or consequential arising from the use of our products. User assumes all risk whatsoever in connection with its intended use. CMI also reserves the right to change this document without notice. 12/14/2017

Power Consumption when Muted	< 5 W	
	Range: 30 dB, 50 dBm ~ 21 dBm	
Forward Power Monitor	Resolution: 0.1 dBm	
	Accuracy: $\pm 2 \text{ dB}$	
	Range: 30 dB, 50 dBm ~ 21 dBm	
Reverse Power Monitor	Resolution: 0.1 dBm	
	Accuracy: $\pm 2 \text{ dB}$	
	Range: 0 - 15 A	
DC Current Monitor	Resolution: 0.1A	
	Accuracy: ± 5 %	
	Range: -40° C ~ +105° C	
Temperature Monitor	Resolution: 1° C	
	Accuracy: $\pm 3^{\circ} C$	
RF Connectors	SMA Female	
Power Connector	M3 Screw Terminal	
	4 Position 2.5 mm Pitch Header	
Control Connector	Mates With JST XHP-4	
Dimensions	See Attached Drawing (Dimensions are in mm)	

Control Pins				
Pin Number	Description			
1	GND			
2	RS484_A			
3	RS485_B			
4	NC			

CALL OUR SALES DEPARTMENT FOR MORE INFORMATION OR VARIATIONS OF THIS PRODUCT.

Corry Micronics, Inc. One Plastics Rd. - Corry, PA 16407 (724) 940-7556 ext. 138 Fax (724) 940-7707 www.cormic.com Corry Micronics Inc. herein referred to CMI, believes this information to be accurate, but makes no warranties, expressed or implied as to the accuracy of this document. CMI assumes no liability for any injury, loss, damage, direct or consequential arising from the use of our products. User assumes all risk whatsoever in connection with its intended use. CMI also reserves the right to change this document without notice. 12/14/2017



**Outline Drawing** 

[D 230 Unit: mm

CALL OUR SALES DEPARTMENT FOR MORE INFORMATION OR VARIATIONS OF THIS PRODUCT.

Corry Micronics, Inc. One Plastics Rd. - Corry, PA 16407 (724) 940-7556 ext. 138 Fax (724) 940-7707 *WWW.cormic.com* Corry Micronics Inc. herein referred to CMI, believes this information to be accurate, but makes no warranties, expressed or implied as to the accuracy of this document. CMI assumes no liability for any injury, loss, damage, direct or consequential arising from the use of our products. User assumes all risk whatsoever in connection with its intended use. CMI also reserves the right to change this document without notice. 12/14/2017