

## 2N6364

Silicon NPN power UHF transistor 2N6364 is designed for use in the 100-400Mhz frequency range for wideband power amplifier applications (aircraft and ship electronics, etc.) in severe load mismatch conditions.

Output Power: 75 Watt  
 Frequency Range: 100-400 Mhz  
 Voltage: 28 V  
 Package Type: SOT-161 (6 Lead)  
 Class C  
 Common Emitter Configuration  
 Emitter Ballasting  
 Aluminum Metalization

### Electrical Characteristics ( $T_{CASE}=40^{\circ}C$ )

SYMBOL	TEST CONDITIONS	MIN	TYP	MAX	UNIT
$P_{out}$	$f_o = 400 \text{ Mhz} / V_{cc} = 28V / P_{IN} = 18.75W$	75			W
$G_p$	$f_o = 400 \text{ Mhz} / V_{cc} = 28V / P_{out} = 75W$	6			dB
$\lambda_c$	$f_o = 400 \text{ Mhz} / V_{cc} = 28V / P_{out} = 75W$	50	58		%

### ABSOLUTE MAXIMUM RATINGS ( $T_{CASE} = 25^{\circ}C$ )

SYMBOL	PARAMETERS	VALUE	UNIT
$V_{CEO}$	Collector-Emitter Voltage	50	V
$V_{EBO}$	Emitter-Base Voltage	4	V
$I_c$	Continuous Collector Current	10	A
$P_C$	Collector Power Dissipation	120*	W
$T_j$	Junction Temperature	160	$^{\circ}C$
$R_{th(j-c)}$	Junction-Case Thermal Resistance	1.0	$^{\circ}C/W$

\*For Dynamic Operation,  $T_{CASE} = 40^{\circ}C$