

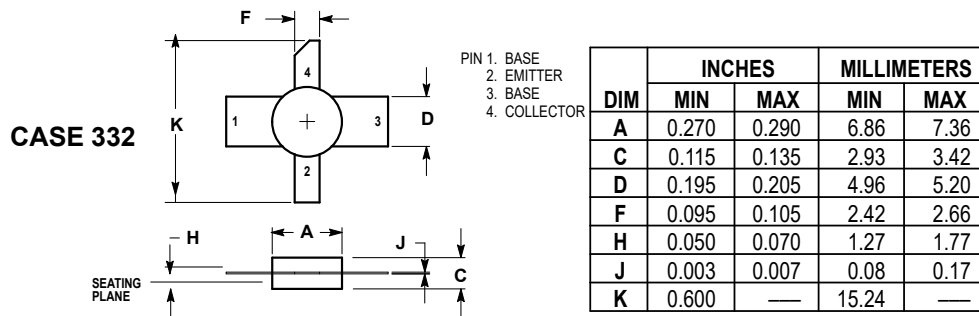
## DESCRIPTION

Designed for Class B and C common base amplifier applications in short pulse TACAN, IFF, and DME transmitters.

## FEATURES

- Specified 35V, 1090MHz Characteristics
- $P_o = 4W$  PEP@35V, 1090MHz
- $G_p = 10$  dB (Min) @35V, 1090MHz
- VSWR = 10:1
- Omnigold™ Metalization System

## DIMENSIONS



## MAXIMUM RATINGS

CHARACTERISTICS	SYMBOL	RATINGS	UNITS
Collector-Emitter Voltage	$V_{CEO}$	20	V
Collector-Base Voltage	$V_{CBO}$	50	V
Collector-Emitter Voltage	$V_{CES}$	50	V
Collector Current	$I_C$	250.0	mA
Emitter-Base Voltage	$V_{EBO}$	3.5	V
Collector Power Dissipation	$P_{DISS}$	7	W
Storage Temperature Range	$T_{STG}$	-65 to 150	°C

## ELECTRICAL CHARACTERISTICS

CHARACTERISTICS	SYMBOL	TEST CONDITIONS	MIN.	TYP.	MAX.	UNITS
Collector-Emitter Breakdown Voltage	$V_{(BR)CEO}$	$I_C=5mA, I_B=0$	20	-	-	V
Collector-Base Breakdown Voltage	$V_{(BR)CBO}$	$I_C=5mA, I_E=0$	50	-	-	V
Collector-Emitter Breakdown Voltage	$V_{(BR)CES}$	$I_C=5mA, V_{BE}=0$	50	-	-	V
Emitter-Base Breakdown Voltage	$V_{(BR)EBO}$	$I_E=1mA, I_C=0$	3.5	-	-	V
Collector Cutoff Current	$I_{CBO}$	$V_{CB} = 35V, I_E = 0$	-	-	0.5	mA
DC Current Gain	$h_{FE}$	$V_{CE}=5V, I_C=75mA$	10	-	200	
Power Gain	$G_p$	$V_{CC}=35V, P_{OUT}=4W,$	10.0	11.0	-	dB
Collector Efficiency	$\eta_C$	$f=1090MHz$	40	45	-	%
Collector Output Capacitance	$C_{ob}$	$V_{CB}=35V, I_E=0$ $f=1MHz$	-	3.3	0.5	pF