



Pin	Description
1	input
5	+V _B
9	output
2.3.7.8	common

FEATURES >>

- Excellent linearity
- Extremely low noise
- Excellent return loss properties
- High gain
- High reliability

DESCRIPTION

Hybrid amplifier module operating over a frequency range of 40 to 1003 MHz at a voltage supply of +24V(DC) ,employing GaAs MMIC.

QUICK REFERENCE DATA

SYMBOL	PARAMETER	CONDITIONS	MIN.	TYP.	MAX.	UNITS
G _p	power gain	f=50 MHz	33.0	33.5	34	dB
G _p	power gain	f=1003MHz	35	36	37	dB
I _{tot}	total current consumption(DC)	V _B =24V	270	-	340	mA

LIMITING VALUES

In accordance with the Absolute Maximum Rating System

SYMBOL	PARAMETER	MIN.	MAX.	UNITS
V _i	RF input voltage	-	55	dBmV
T _{stg}	storage temperature	-40	+100	°C
T _{mb}	operating mounting base temperature	-20	+90	°C

CHARACTERISTICS

(Bandwidth 40 to 1003MHz; $T_{mb}=25^{\circ}\text{C}$, $V_B=24\text{V}$, $Z_S=Z_L=75\Omega$)

PART NUMBER			Egi10003424P1			
SYMBOL	PARAMETER	UNIT	MIN.	TYP.	MAX.	CONDITIONS
G_P	power gain	dB	33	33.5	34	f =50MHz
SL	slope cable equivalent	dB	1.0	2	3	f =50 to 1003 MHz
FL	flatness of frequency response	dB	-	-	± 0.5	f =40 to 1003 MHz
S_{11} & S_{22}	Input & output return loss	dB	-	-	-16	f =40 to 860 MHz
S_{11} & S_{22}	Input & output return loss	dB	-	-	-14	f =860 to 1003 MHz
CTB	composite triple beat	dB	-	-	-69	110 channel $V_0=42\text{dBmV}$ at 745.25MHz 6dB tilted across the band
CSO	composite second order distortion	dB	-	-	-68	
X_{mod}	cross modulation	dB	-	-	-61	
F	noise figure	dB	-	-	6.2	f=860 MHz
I_{tot}	total current consumption(DC)	mA	270	-	340	$V_B=+24\text{V}$

The module normally operates at $V_B=24\text{V}(\pm 0.5)$.

MODULE DIMENSIONS

