



Pin	Description
1	input
5	+V <sub>B</sub>
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 1000 MHz at a voltage supply of +24V(DC) ,employing GaAs MMIC.

## QUICK REFERENCE DATA

SYMBOL	PARAMETER	CONDITIONS	MIN.	TYP.	MAX.	UNITS
G <sub>p</sub>	power gain	f=50 MHz	28	28.5	29	dB
I <sub>tot</sub>	total current consumption(DC)	V <sub>B</sub> =24V	450	-	510	mA

## LIMITING VALUES

In accordance with the Absolute Maximum Rating System

SYMBOL	PARAMETER	MIN.	MAX.	UNITS
V <sub>i</sub>	RF input voltage	-	55	dBmV
T <sub>stg</sub>	storage temperature	-40	+100	°C
T <sub>mb</sub>	operating mounting base temperature	-20	+90	°C

## CHARACTERISTICS

(Bandwidth 40 to 1000MHz;  $T_{mb}=25^{\circ}\text{C}$ ,  $V_B=24\text{V}$ ,  $Z_S=Z_L=75\Omega$ )

PART NUMBER			Egi10002824DG			
SYMBOL	PARAMETER	UNIT	MIN.	TYP.	MAX.	CONDITIONS
$G_P$	power gain	dB	28	28.5	29	$f = 50\text{MHz}$
SL	slope cable equivalent	dB	0	1	2	$f = 50$ to 1000 MHz
FL	flatness of frequency response	dB	-	-	$\pm 0.5$	$f = 40$ to 1000 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	$f = 861$ to 1000 MHz
CTB	composite triple beat	dB	-	-	-65	110 channel
CSO	composite second order distortion	dB	-	-	-64	$V_O=55\text{dBmV}$ at 745.25MHz
$X_{mod}$	cross modulation	dB	-	-	-60	10dB tilted across the band
F	noise figure	dB	-	-	5	$f=860$ MHz
$I_{tot}$	total current consumption(DC)	mA	-	450	510	$V_B=+24\text{V}$

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

## MODULE DIMENSIONS

