

# Polyfet RF Devices



## TB171B

**Vds=12.5Vdc**

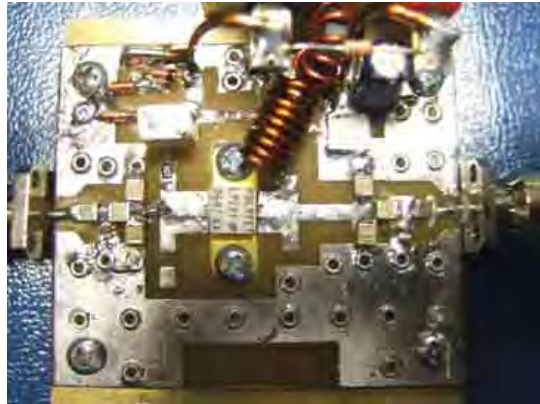
**Idq=0.6A**

**Efficiency=60% at 15W**

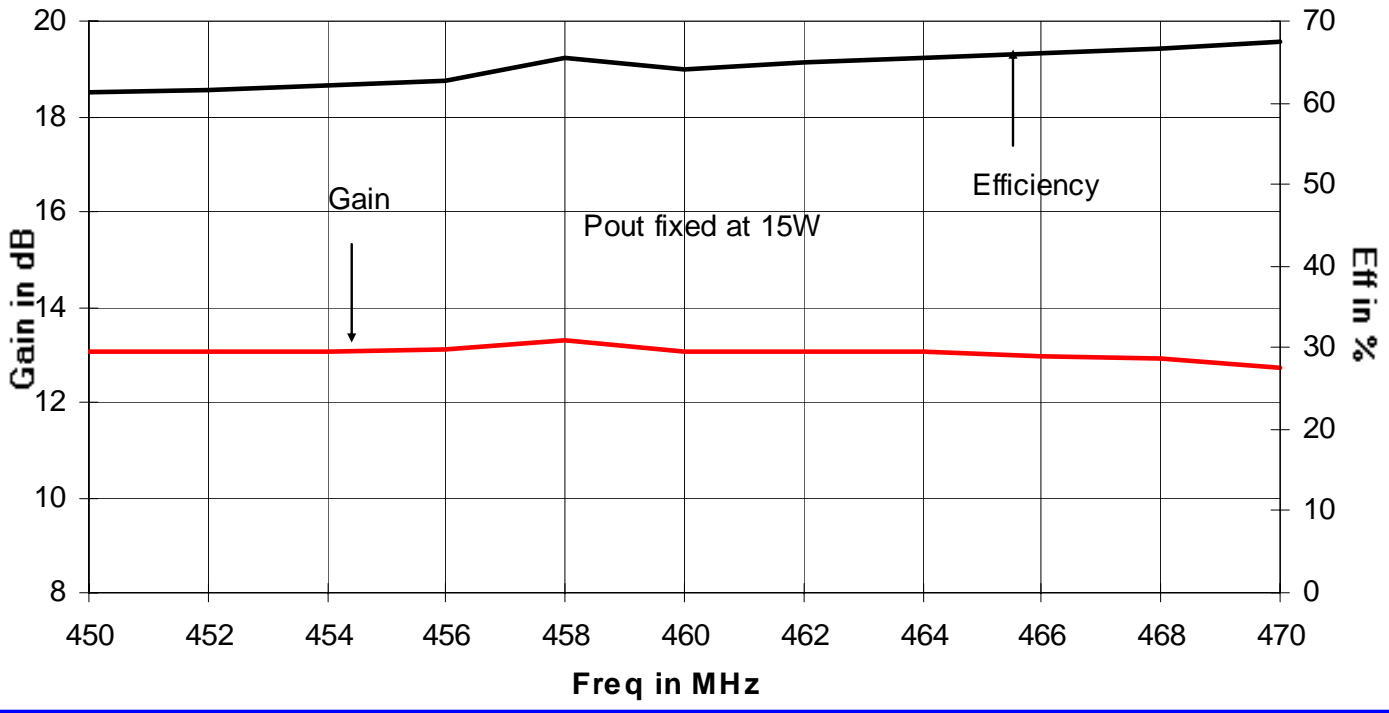
**Pout=15W**

**LP721**

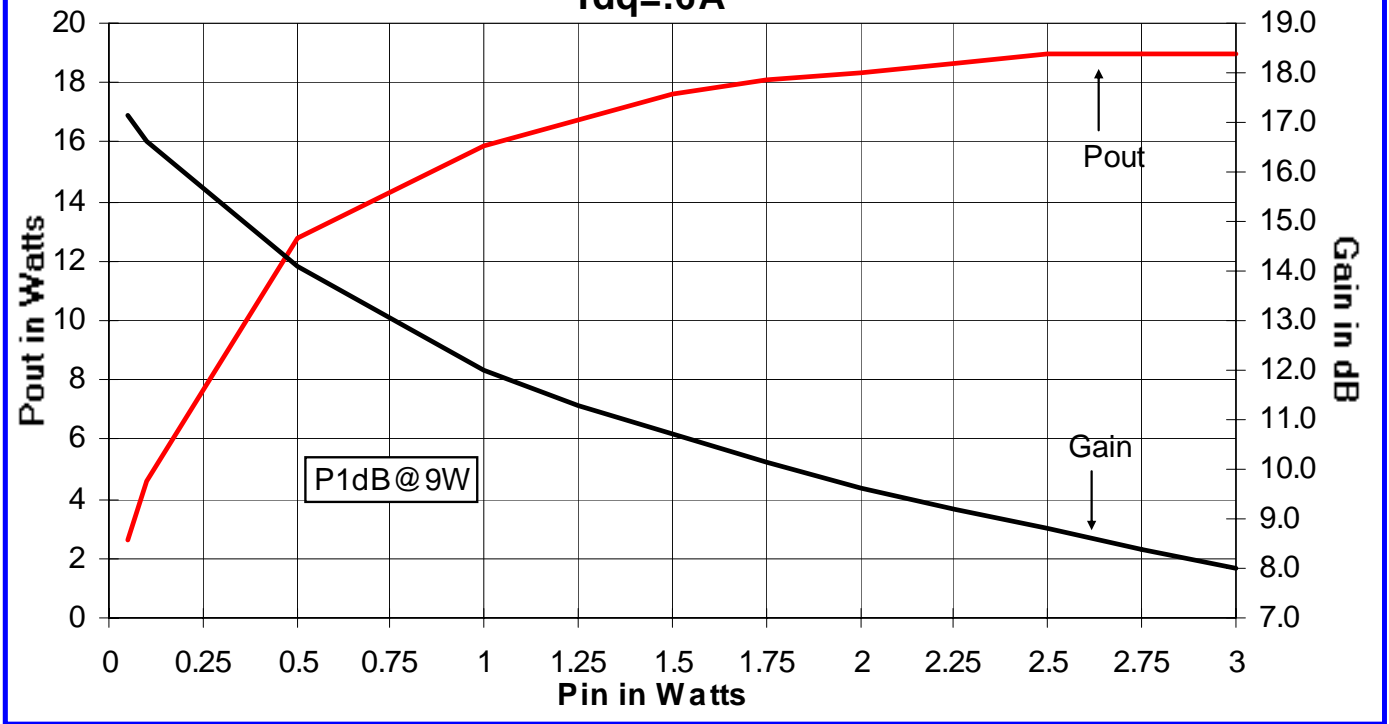
**Frequency=450-470 MHz**



**TB-171B Gain/Efficiency vs Freq; VDS=12.5Vdc Idq=0.6A**

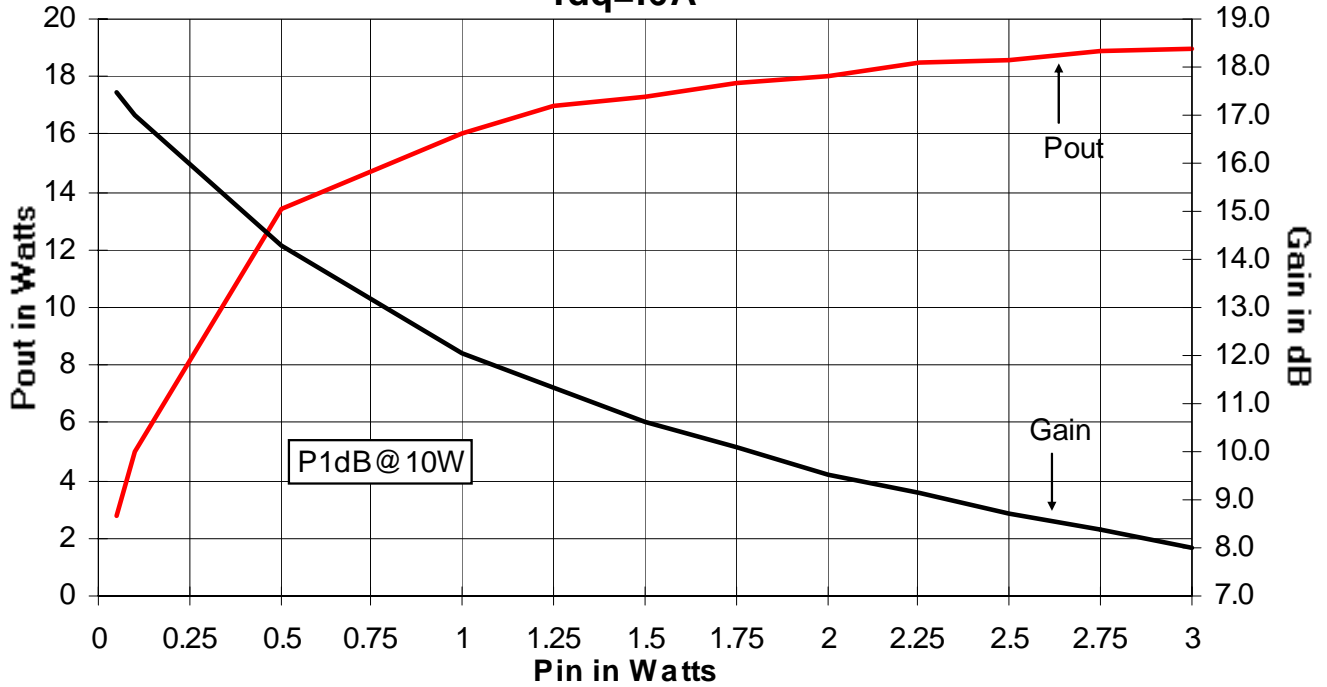


**TB-171B Pout/Gain vs Pin F=450MHz Vds=12.5 Vdc Idq=.6A**



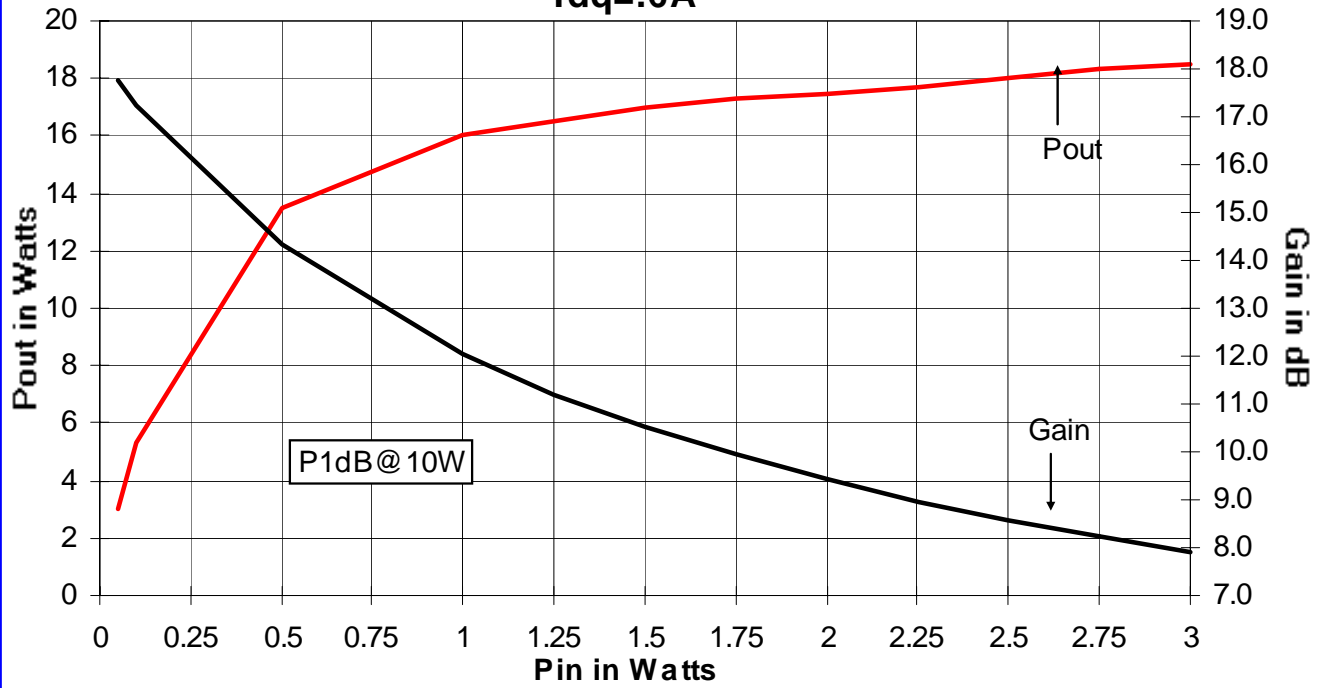
**TB-171B Pout/Gain vs Pin F=460MHz Vds=12.5 Vdc**

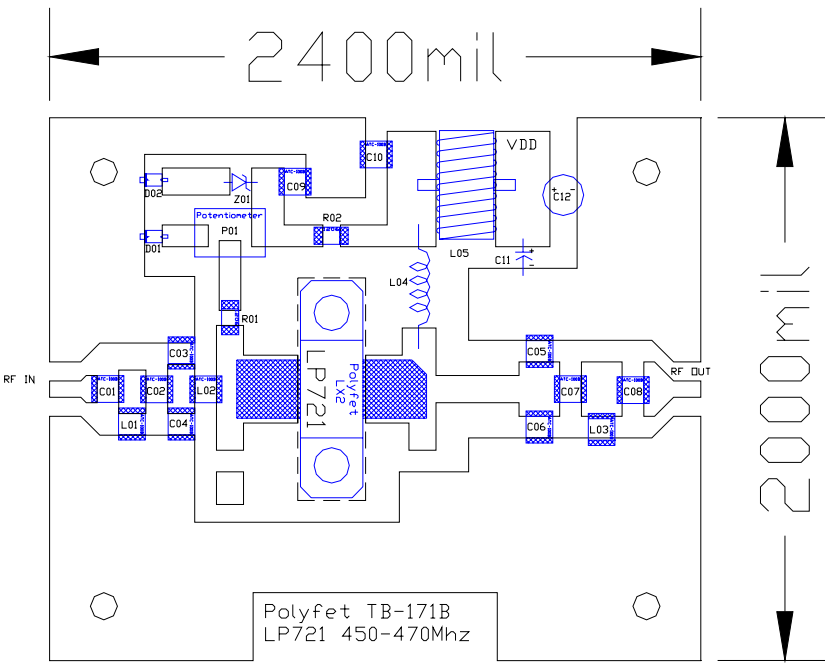
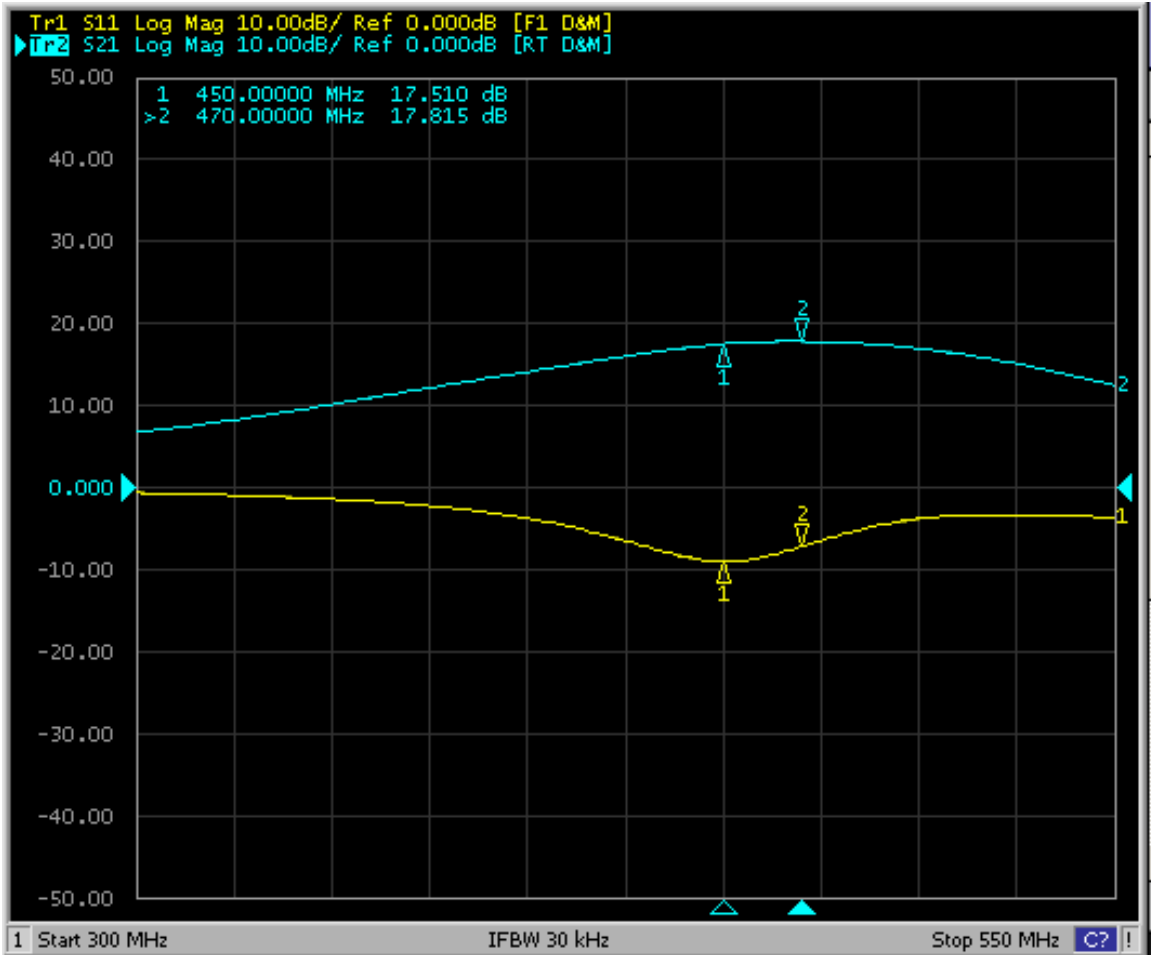
**Idq=.6A**



**TB-171B Pout/Gain vs Pin F=470MHz Vds=12.5 Vdc**

**Idq=.6A**





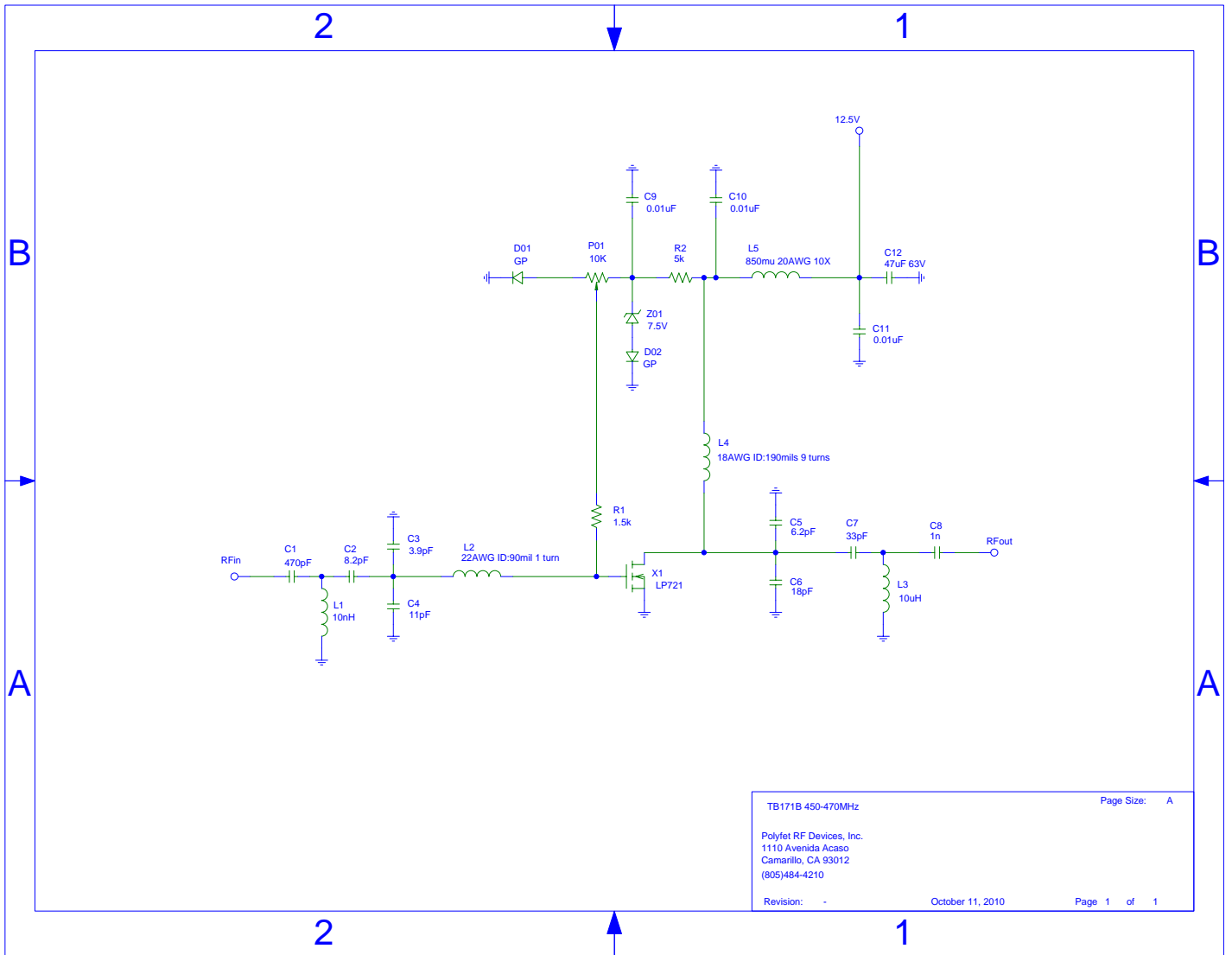
SYMBOL	VALUE	DESCRIPTION
C01, C08	470pf	ATC-100B Chip Cap.
C02	8.2pf	ATC-100B Chip Cap.
C03	3.9pf	ATC-100B Chip Cap.
C05	6.2pf	ATC-100B Chip Cap.
C04	11pf	ATC-100B Chip Cap.
C06	18pf	ATC-100B Chip Cap.
C07	33pf	ATC-100B Chip Cap.
C09, C10	0.01uf	ATC-100B Chip Cap.
C11	0.01uf	large square Cap.
C12	47uf	63V Electrolytic Cap.
L01	10nh	CoilCraft 0805HT-10NTJL
L02	---	#22AWG 250mil I.D.:90mil
L03	22nh	CoilCraft 0805HT-22NTJL
L04	---	#18AWG I.D.:190mil/9 Turns
L05	---	850mu,#20AWG,10 Turns
R01	15k	1206 Chip Res.
R02	5k	1206 Chip Res.
		1206 Chip Res.
P01	10k	6x6mm Potentiometer
Z01	7.5V	50mA Zener Diode
D0,D02	7.5V	50mA Chip Diode
VDD	12.5V	DC Power Supply
Bias	600mA	Bias Current

PCB Material Double Side FR4  
ER=4.5 H=32 T=1.4

DRN BY: ZHOU JUN 07/26/2007  
 CHKD :  
 ELECT : M.Cervantes 06/07/2007  
 MECH : M.Cervantes 06/07/2007  
 PRDC :  
 DUAL :  
 PGMS :

POLYFET RF DEVICES  
 450--470MHz Amplifier

SIZE	FSCM NO	PCB LAYOUT	REV 1
SCALE : 1 : 1	SHEET 1	OF 2	



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