

# TB224

**Frequency=30-512MHz**

**Pout=1.5W**

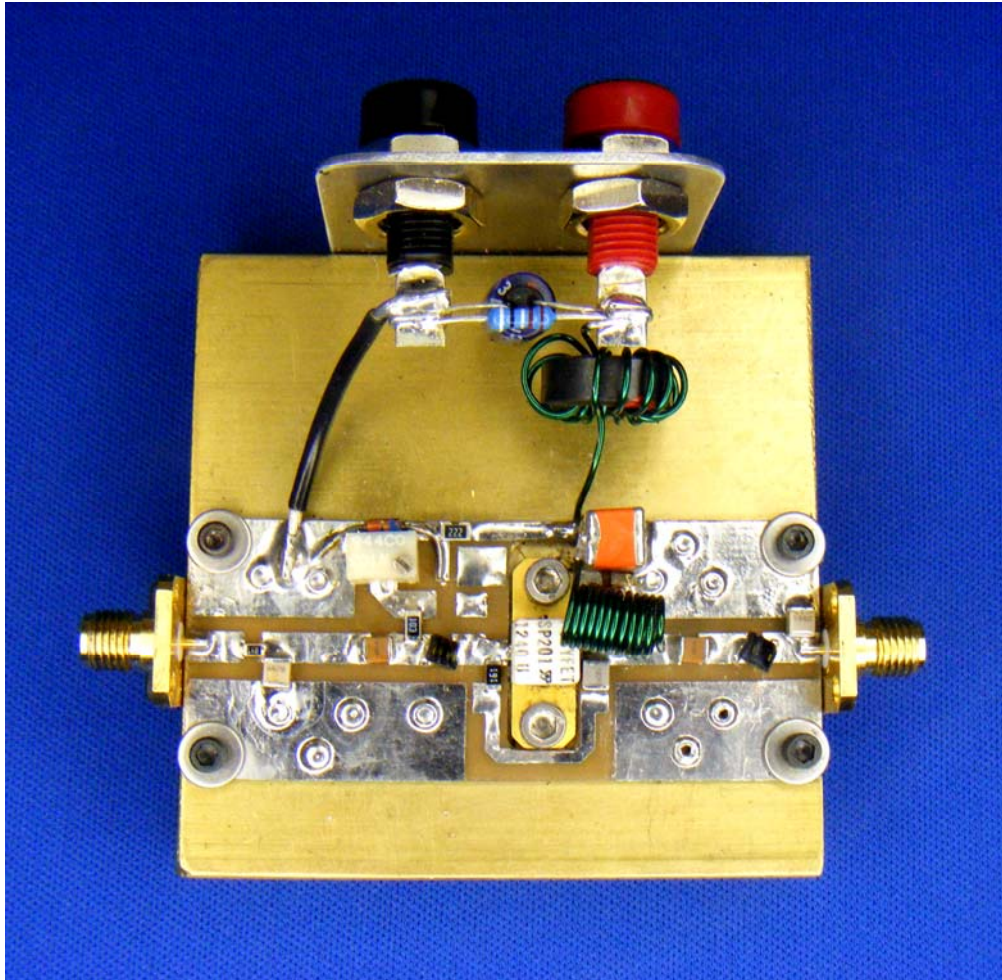
**Gain=10dB**

**Vds=28Vdc**

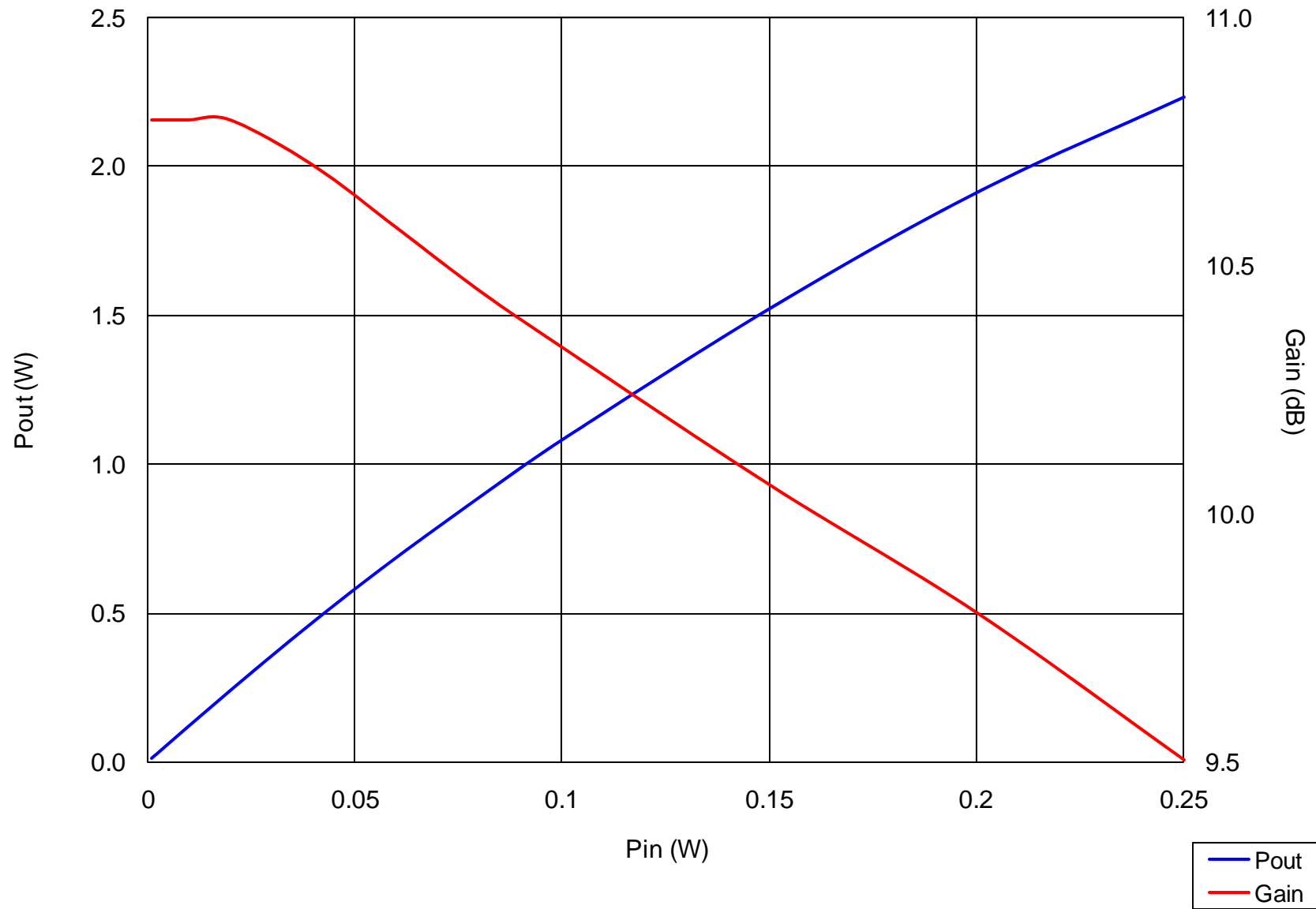
**Idq=0.2A**

**Efficiency=13-18%**

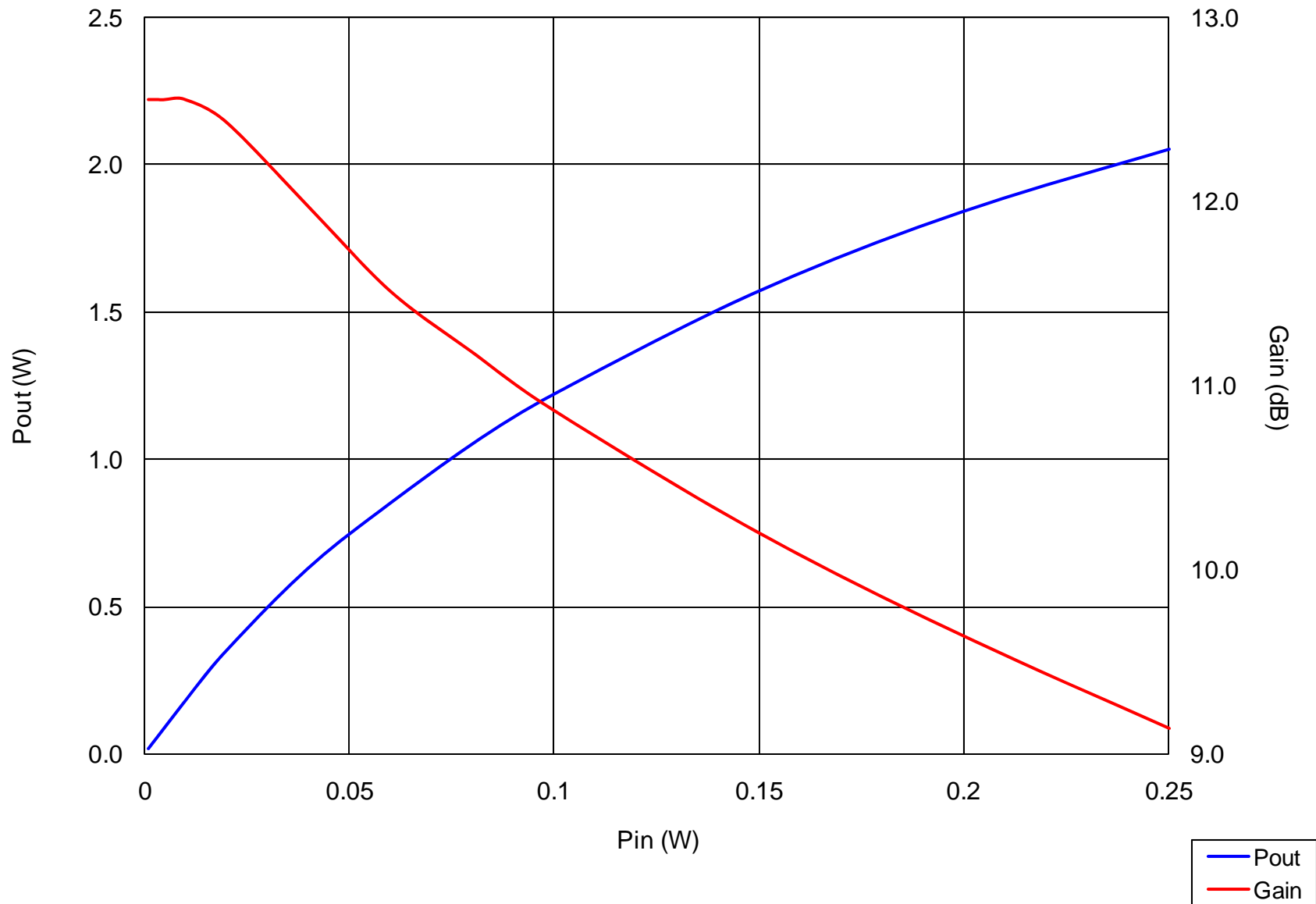
**SP201**



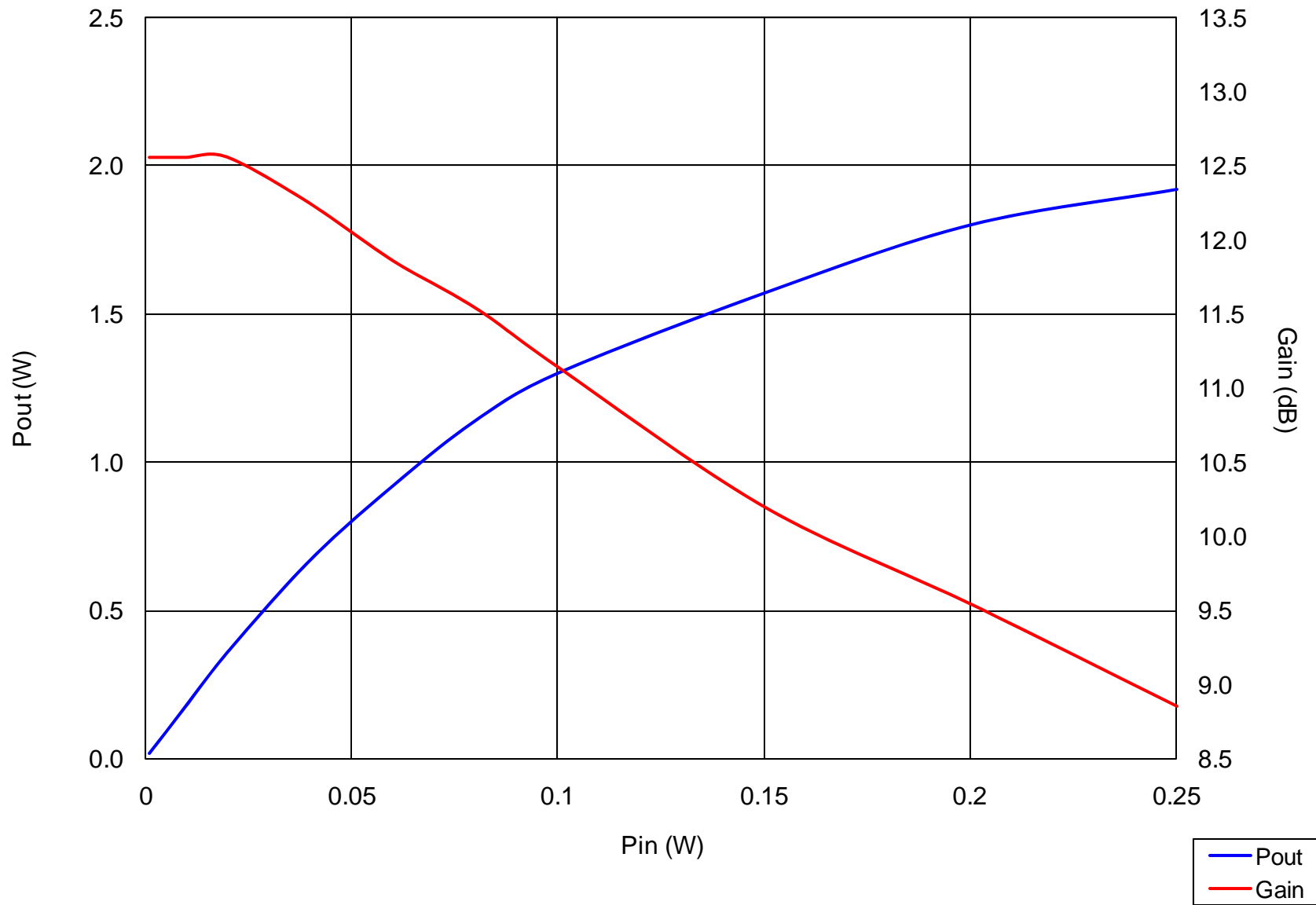
TB224 Pout/Gain vs Pin: Freq=30MHz, Vds=28Vdc, Idq=0.2A



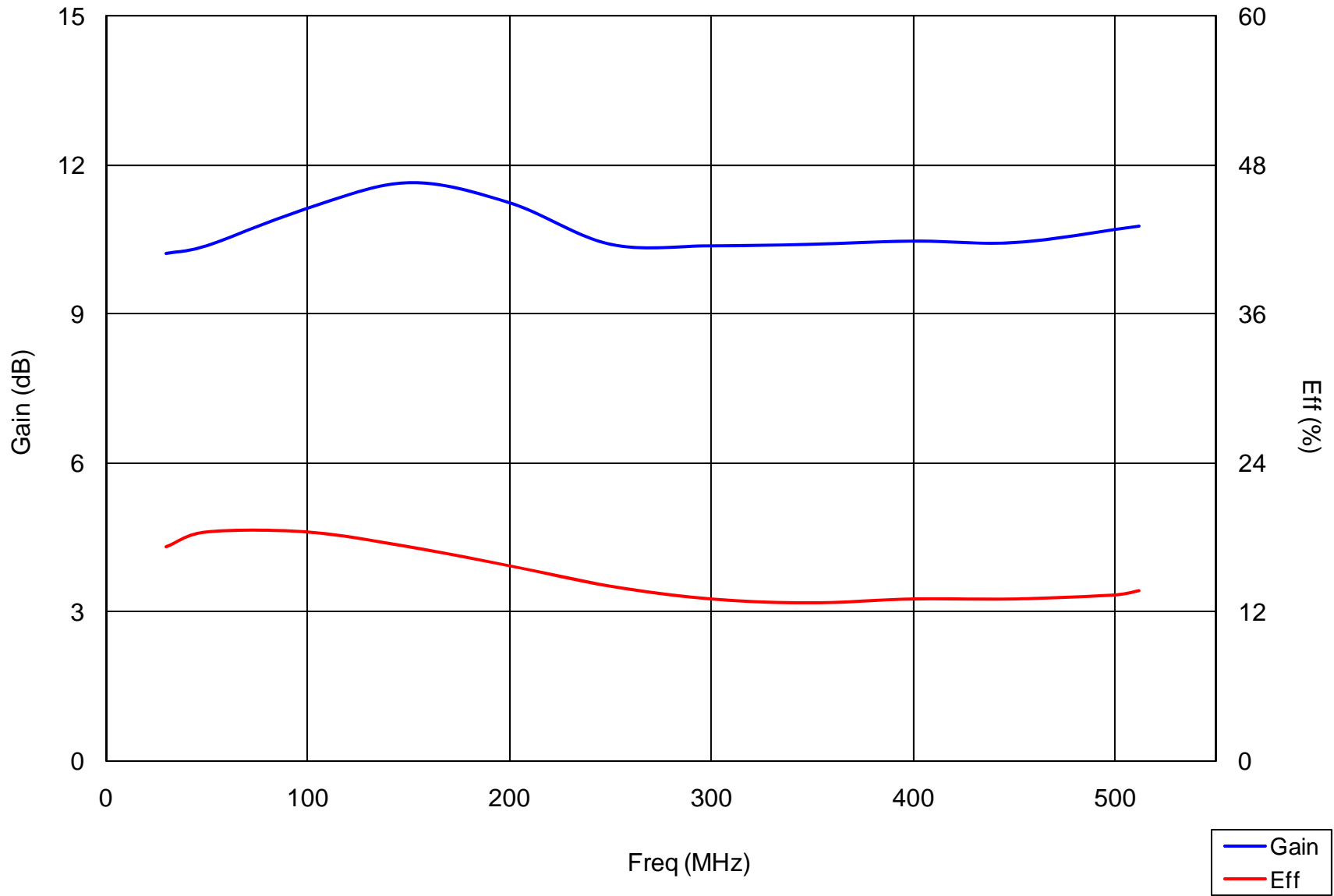
TB224 Pout/Gain vs Pin: Freq=250MHz, Vds=28Vdc, Idq=0.2A

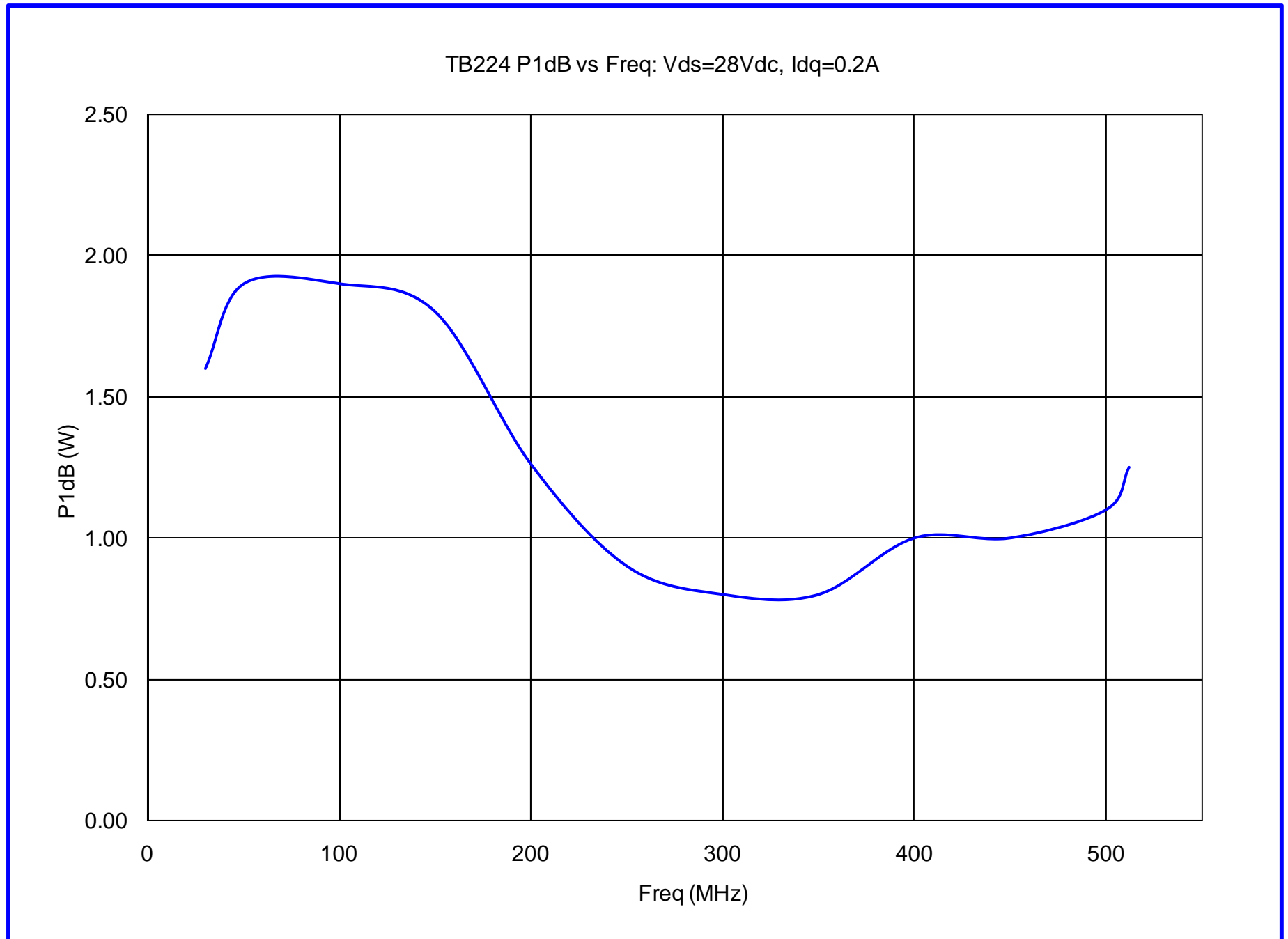


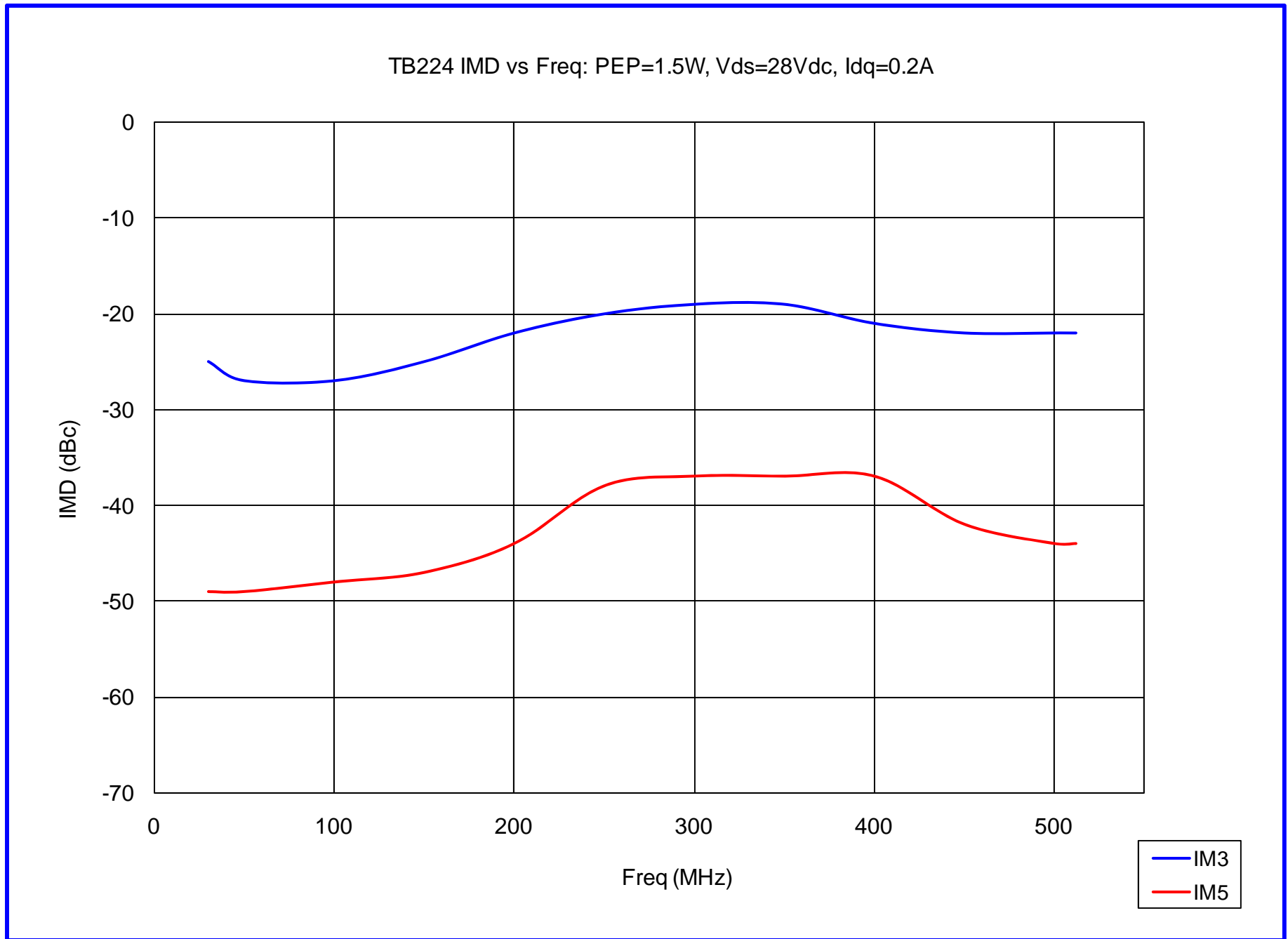
TB224 Pout/Gain vs Pin: Freq=512MHz, Vds=28Vdc, Idq=0.2A

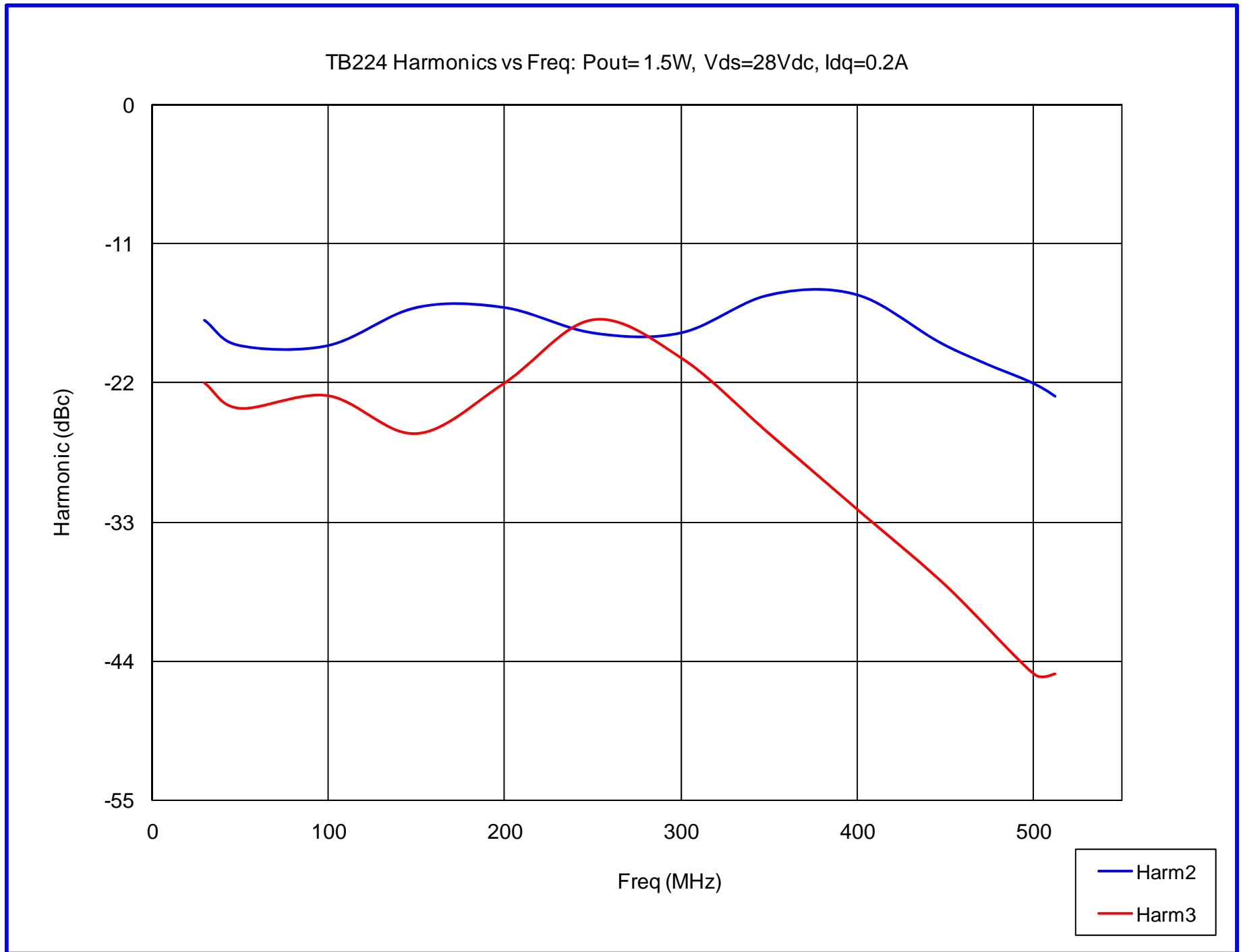


TB224 Gain/Efficiency vs Freq: Pout=1.5W, Vds=28Vdc, Idq=0.2A

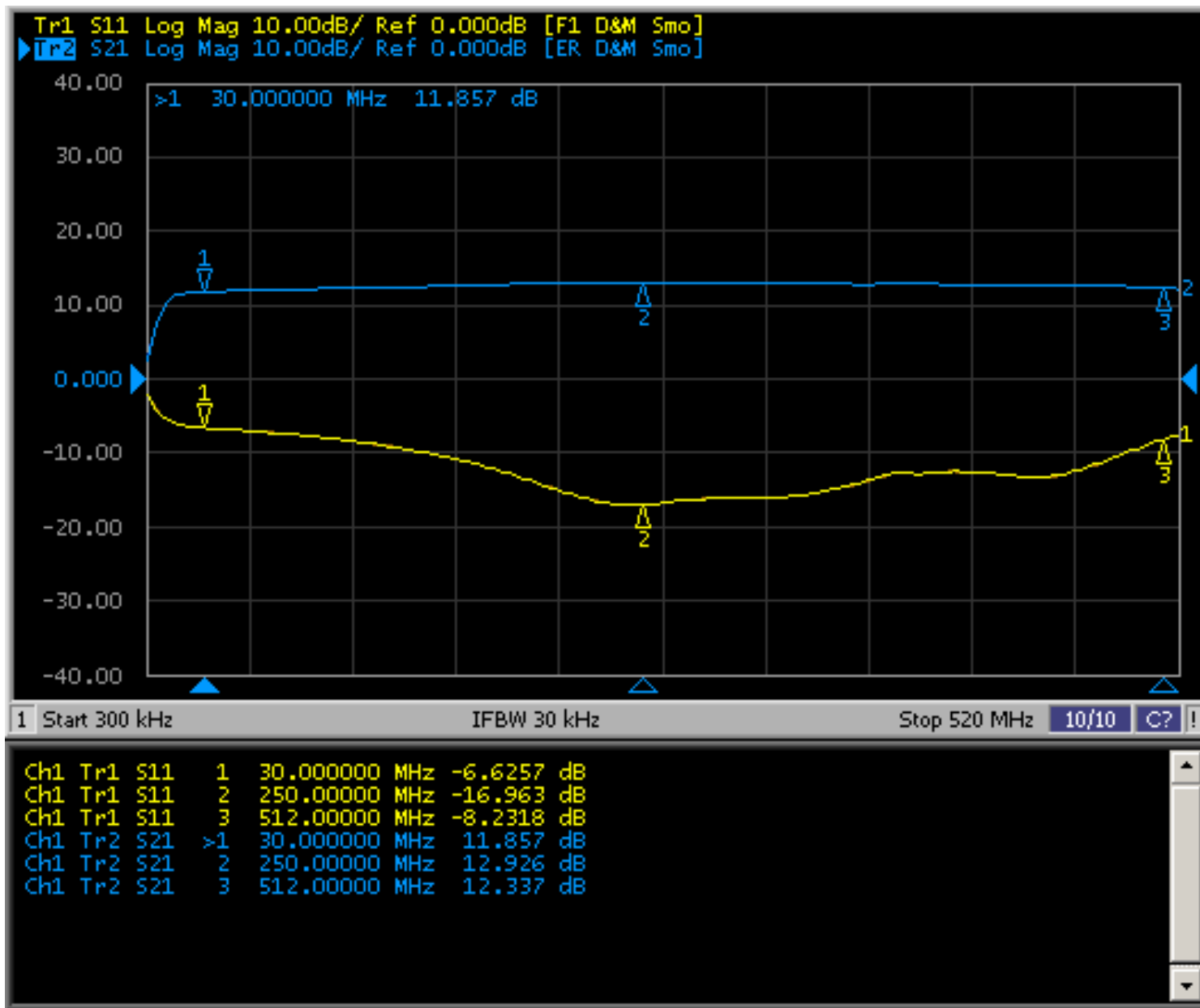




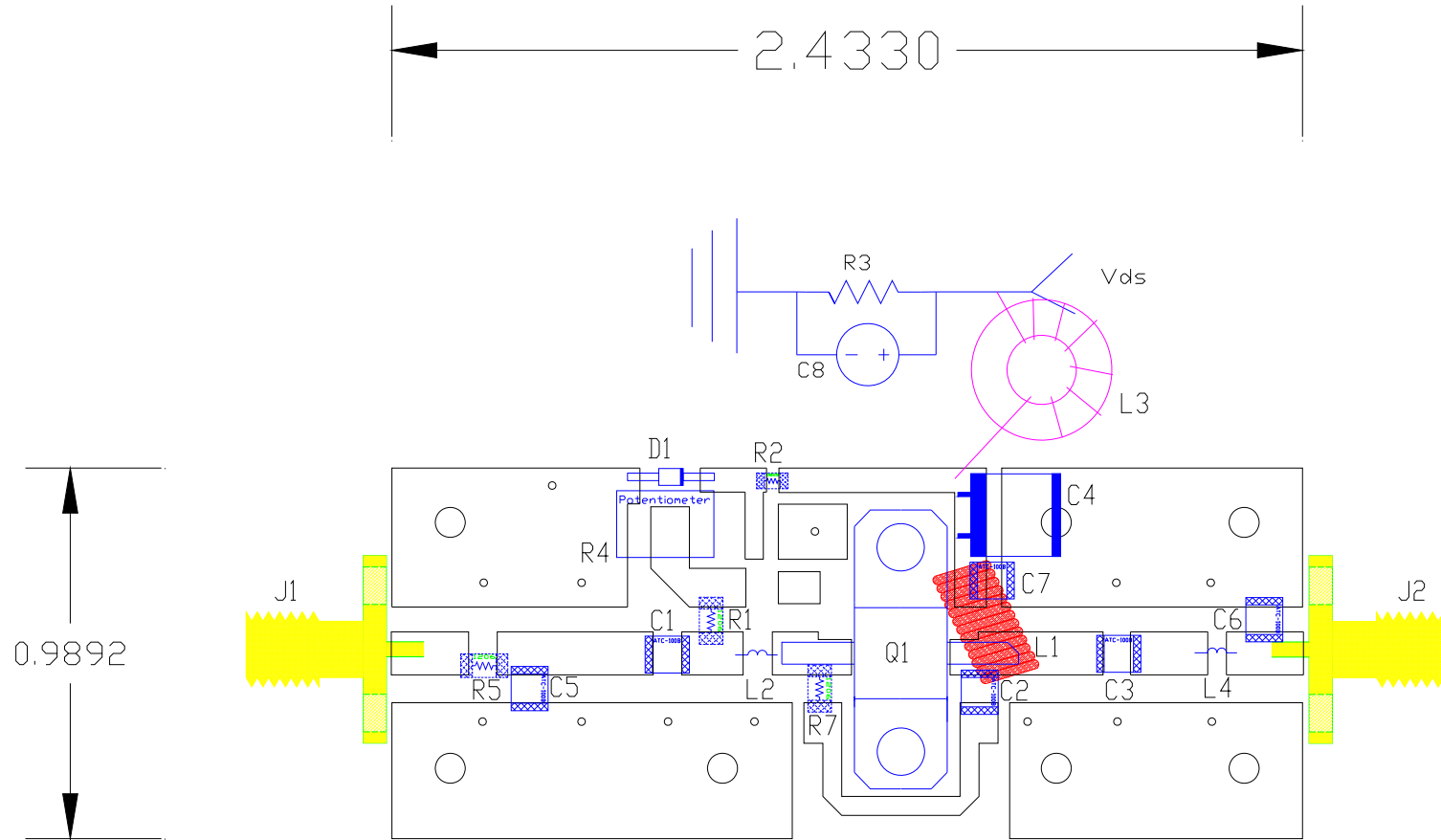


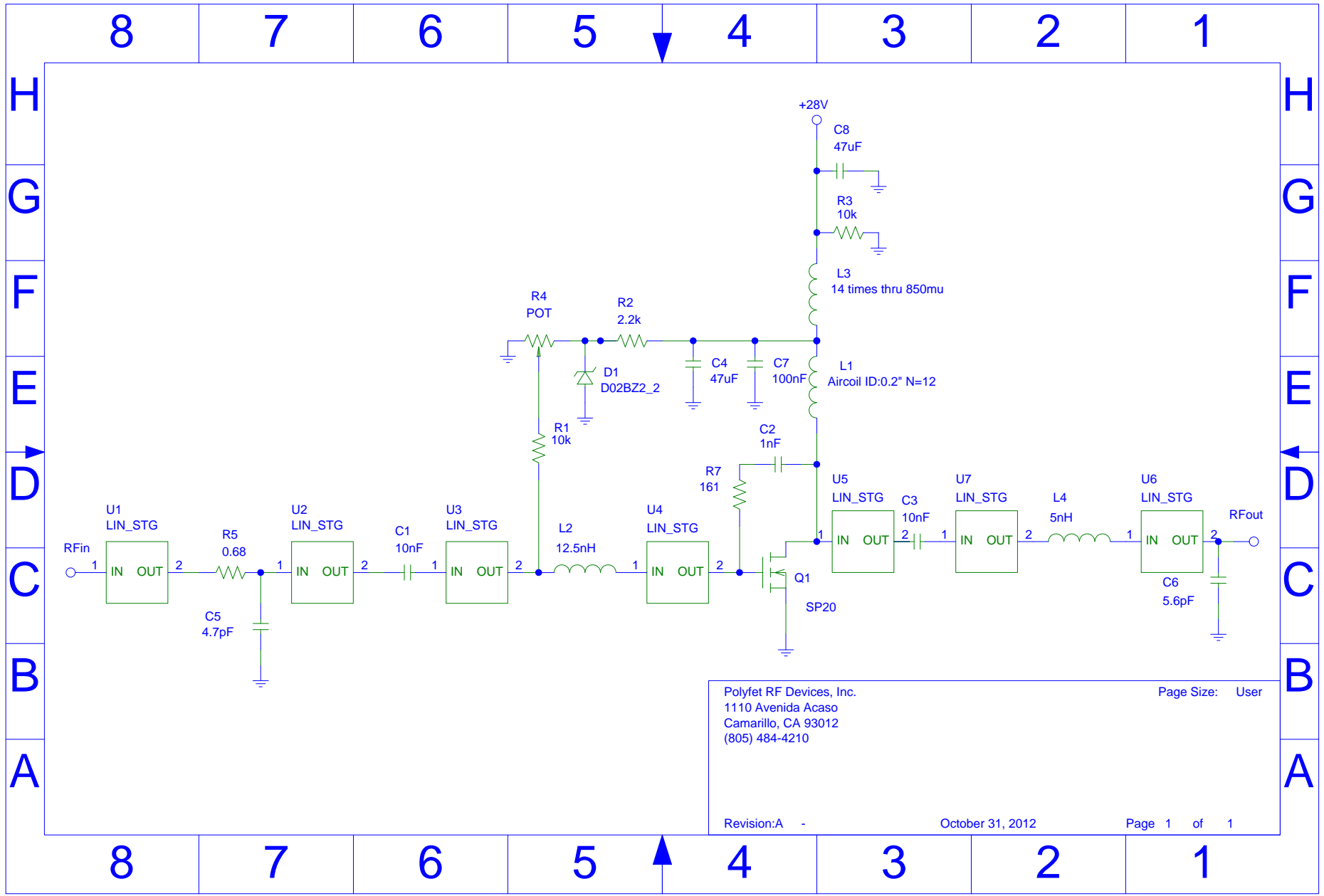






TB224: Vds=28Vdc, Idq=0.2A, Pin=0dBm





Polyfet RF Devices, Inc.  
 1110 Avenida Acaso  
 Camarillo, CA 93012  
 (805) 484-4210

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## (Polyfet TB224)

NOMENCLATURE	DESCRIPTION	MANUFACTURER	VENDER PART #
C1, C3	10,000pF	American Technical Ceramics	200B103MW 50XT
C2	CAP 1,000pF 10%	JOHANSON TECHNOLOGY	101S42E102KV3S
C4	TANTALUM CAP 47uF	VISHAY	597D476X0050Z2T
C5	CAP 4.7pF $\pm$ 0.1pF	JOHANSON TECHNOLOGY	102S42E4R7BV3S
C6	CAP 5.6pF $\pm$ 0.25pF	JOHANSON TECHNOLOGY	102S42E5R6CV3S
C7	100,000pF	American Technical Ceramics	200B104MW 50XT
C8	Aluminum Electrolytic 47uF	Panasonic	EEU-FR1J470B
L1	Aircoil ID:0.2" N=12	-----	-----
L2	12.5nH Inductor	Coilcraft	A04TGL
L3	22AWG 14 times thru 850mu torroid ferrite	AMIDON	FT-50-43
L4	5nH Inductor	Coilcraft	A02TGL
R1	10K OHM 1206	Yageo	RC1206FR-0710KL
R2	22K OHM 1206	Yageo	RC1206FR-072K2L
R3	9.09k OHM 1/4W axial	Yageo	MFR-25FRF-9K09
R4	POT 10KOHM 6MM	Bourns	3269W-1-102
R5	RES .68 OHM 1/8W 5% 0805 SMD	Panasonic Electronic Components	ERJ-6RQJR68V
R7	RES160 OHM 1/4W 1% 1206 SMD	Rohm Semiconductor	MCR18EZH61600
D1	6.2V Zener 500mW	DIGIKEY	ZMM5234BDICT-ND
Q1	VDMOS	Polyfet RF Devices	SP201
J1,J2	SMA Female; 4 Hole Panel Mount	Pasternack	PE4000-SF
PCB	Double Side FR4 0.030" H1/H1 1oz copper	Taconic	FR4-FB650M