



FLM 5964-4C

INTERNALLY MATCHED GaAs POWER FET

ABSOLUTE MAXIMUM RATINGS (Ambient Temperature $T_a = 25^\circ\text{C}$)

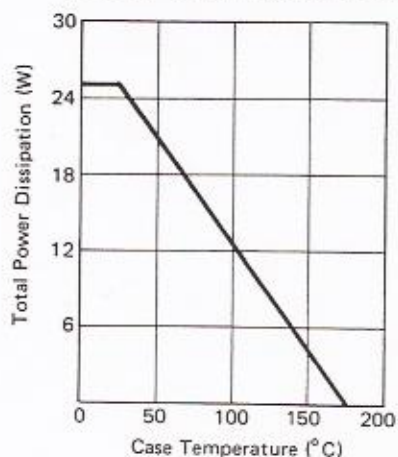
Item	Symbol	Condition	Rating	Unit
Drain-Source Voltage	V_{DS}		15	V
Gate-Source Voltage	V_{GS}		-5	V
Total Power Dissipation	P_T	$T_C = 25^\circ\text{C}$	25	W
Storage Temperature	T_{stg}		-65 ~ +175	$^\circ\text{C}$
Channel Temperature	T_{ch}		+175	$^\circ\text{C}$

ELECTRICAL CHARACTERISTICS (Ambient Temperature $T_a = 25^\circ\text{C}$)

Item	Symbol	Test Conditions	Limit			Unit
			Min.	Typ.	Max.	
Drain Current	I_{DSS}	$V_{DS} = 5\text{V}, V_{GS} = 0\text{V}$	-	1800	2700	mA
Transconductance	g_m	$V_{DS} = 5\text{V}, I_{DS} = 1100\text{mA}$	-	1000	-	mS
Pinch-off Voltage	V_P	$V_{DS} = 5\text{V}, I_{DS} = 90\text{mA}$	-1.0	-2.0	-3.5	V
Gate-Source Breakdown Voltage	V_{GSO}	$I_{GS} = -90\mu\text{A}$	-5	-	-	V
Output Power at 1dB G.C.P.	P_{1dB}	$V_{DS} = 10\text{V}$ $f = 5.9 \sim 6.4\text{GHz}$ $I_{DS} = 0.6 I_{DSS}$ $Z_S = Z_L = 50 \text{ ohm}$	35	36	-	dBm
Power Gain at 1dB G.C.P.	G_{1dB}		8	9	-	dB
Drain Current	I_{dsr}		-	1100	1300	mA
Power-added Efficiency	η_{add}		-	32	-	%
Thermal Resistance	R_{th}	Channel to Case	-	5	6	$^\circ\text{C/W}$

G.C.P.: Gain Compression Point

POWER DERATING CURVE



DRAIN CURRENT vs. DRAIN-SOURCE VOLTAGE

