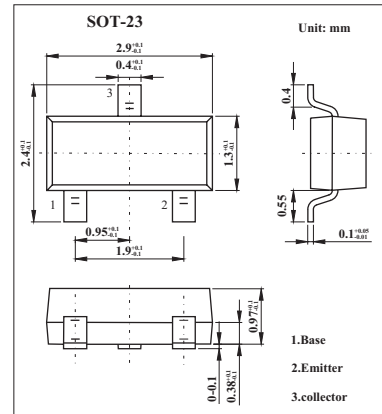


FMMT723

■ Features

- 625mW power dissipation
- Ic CONT 2.5A
- Ic Up To 10A peak pulse current
- Excellent hfe Characteristics Up To 10A (pulsed)
- Extremely Low Saturation Voltage E.g. 10mV Typ.
- Exhibits extremely low equivalent on-resistance; $R_{CE(sat)}$



■ Absolute Maximum Ratings $T_a = 25^\circ\text{C}$

Parameter	Symbol	Rating	Unit
Collector-base voltage	V_{CBO}	-100	V
Collector-emitter voltage	V_{CEO}	-100	V
Emitter-base voltage	V_{EBO}	-5	V
Collector current	I_C	-1	A
Peak collector current	I_{CM}	-2.5	A
Base current	I_B	-500	mA
Power dissipation	P_{tot}	625	mW
Operating and storage temperature range	T_j, T_{stg}	-55 to +150	$^\circ\text{C}$

FMMT723

■ Electrical Characteristics Ta = 25°C

Parameter	Symbol	Testconditons	Min	Typ	Max	Unit
Collector-base breakdown voltage	V _{(BR)CBO}	I _C =-100μA	-100	-200		V
Collector-emitter breakdown voltage *	V _{(BR)CEO}	I _C =-10mA	-100	-160		V
Emitter-base breakdown voltage	V _{(BR)EBO}	I _E =-100μA	-5	-8.8		V
Collector cutoff current	I _{CBO}	V _{CB} =-80V			-100	nA
Emitter cut-off current	I _{EBO}	V _{EB} =-4V			-100	nA
Collector Emitter Cut-Off Current	I _{CES}	V _{CES} =-80V			-100	nA
Collector-emitter saturation voltage *	V _{CE(sat)}	I _C =-0.1A, I _B =-10mA I _C =-0.5A, I _B =-50mA I _C =-1A, I _B =-150mA		-50 -125 -210	-80 -200 -330	mV
Base-emitter saturation voltage *	V _{BE(sat)}	I _C =-1A, I _B =-150mA		-0.89	-1.0	V
Base-emitter voltage *	V _{BE(ON)}	I _C =-1A, V _{CE} =-10V		-0.71	-1.0	V
Static Forward Current Transfer Ratio *	h _{FE}	I _C =-10mA, V _{CE} =-10V	300	475		
		I _C =-0.1A, V _{CE} =-10V	300	450		
		I _C =-0.5A, V _{CE} =-10V	250	375		
		I _C =-1A, V _{CE} =-10V		250		
		I _C =-1.5A, V _{CE} =-10V		30		
Current-gain-bandwidth product	f _T	I _C =-50mA, V _{CE} =-10V, f=100MHz		150	200	MHz
Output capacitance	C _{obo}	V _{CB} =-10V, f=1MHz		13	20	pF
Switching times	ton	I _C =-0.5A, V _{CC} =-50V		50		ns
	toff	I _{B1} =I _{B2} =-50mA		760		ns

* Pulse test: tp = 300 μs; d ≤ 0.02.

■ Marking

Marking	723
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