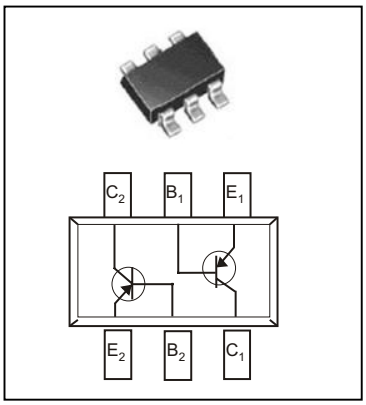
MMDT2907A(PNP)

FEATURES

Complementary PNP Type available MMDT2222A

MARKING: K2F



SOT-363

MAXIMUM RATINGS (TA=25℃ unless otherwise noted)

Parameter	Symbol	Value	Unit
Collector-Base Voltage	V_{CBO}	-60	V
Collector-Emitter Voltage	V_{CEO}	-60	V
Emitter-Base Voltage	V_{EBO}	-5	V
Collector Current -Continuous	I_C	-600	mA
Collector Power Dissipation	I_C	200	mW
Junction Temperature	T_J	150	℃
Storage Temperature	Tstg	-55 to +150	℃

ELECTRICAL CHARACTERISTICS (Tamb=25℃ unless otherwise specified)

Parameter	Symbol	Test conditions	Min	Max	Unit
Collector-base breakdown voltage	V_{CBO}	I_C= -10μA, I_E=0	-60		V
Collector-emitter breakdown voltage	V_{CEO}	I_C= -10mA, I_B=0	-60		V
Emitter-base breakdown voltage	V_{EBO}	I_E=-10μA, I_C=0	-5		V
Collector cut-off current	I_{CBO}	V_{CB}=-50V, I_E=0		-10	nA
Collector cut-off current	I_{CEX}	V_{CE}=-30V,$V_{EB(Off)}$=-0.5V		-50	nA
Emitter cut-off current	I_{EBO}	V_{EB}=-5V, I_C=0		-10	nA
DC current gain	$h_{FE(1)}$	V_{CE}=-10V, I_C= -0.1mA	75		
	$h_{FE(2)}$	V_{CE}=-10V, I_C= -1mA	100		
	$h_{FE(3)}$	V_{CE}=-10V, I_C=-10mA	100		
	$h_{FE(4)}$	V_{CE}=-10V, I_C= -150mA	100	300	
	$h_{FE(5)}$	V_{CE}=-10V, I_C=-500mA	50		
Collector-emitter saturation voltage	$V_{CE(sat)1}$	I_C=-150mA, I_B=-15mA		-0.4	V
	$V_{CE(sat)2}$	I_C=-500mA, I_B=- 50mA		-1.6	V
Base-emitter saturation voltage	$V_{BE(sat)1}$	I_C=-150mA, I_B=-15mA		-1.3	V
	$V_{BE(sat)2}$	I_C=-500mA, I_B= -50mA		-2.6	V
Transition frequency	f_T	V_{CE}=-20V, I_C= -50mA,f=100MHz	200		MHz
Output Capacitance	C_{ob}	V_{CB}=-10V, I_E= 0,f=1MHz		8	pF
Input Capacitance	C_{ib}	V_{EB}=-2V, I_C= 0,f=1MHz		30	pF
Delay time	t_d	V_{CC}=-30V,I_C=-150mA, I_{B1}=-15mA		10	nS
Rise time	t_r			40	nS
Storage time	t_S	V_{CC}=-6V, I_C=-150mA, I_{B1}= I_{B2}= -15mA		225	nS
Fall time	t_f			60	nS

MMDT2907A Typical Characteristics