

"Excellent  $h_{FE}$  linearity

"Collector Current :  $I_C = -0.5A$

" 3 1 3 7 U D Q V L V W R U V

Parameter	Symbol	Rating	Unit
Collector - Base Voltage	$V_{CBO}$	-40	V
Collector - Emitter Voltage	$V_{CEO}$	-25	V
Emitter - Base Voltage	$V_{EBO}$	-5	V
Collector Current to Continuous	$I_C$	-500	mA
Collector Power Dissipation	$P_C$	300	mW
Junction Temperature	$T_j$	150	°C
Storage Temperature	$T_{stg}$	-55 to 150	°C

Parameter	Symbol	Testconditions	Min	Typ	Max	Unit
Collector - base breakdown voltage	$V_{CBO}$	$I_C = -100\mu A, I_E = 0$	-40			V
Collector - emitter breakdown voltage	$V_{CEO}$	$I_C = -1 mA, I_B = 0$	-25			V
Emitter - base breakdown voltage	$V_{EBO}$	$I_E = -100\mu A, I_C = 0$	-5			V
Collector cut - off current	$I_{CBO}$	$V_{CB} = -40V, I_E = 0$			-0.1	$\mu A$
Collector cut - off current	$I_{CEO}$	$V_{CB} = -20V, I_E = 0$			-1	$\mu A$
Emitter cut - off current	$I_{EBO}$	$V_{EB} = -5V, I_C = 0$			-0.1	$\mu A$
DC current gain	$h_{FE}$	$V_{CE} = -1V, I_C = -50mA$	120		400	
Collector - emitter saturation voltage	$V_{CE(sat)}$	$I_C = -500 mA, I_B = -50mA$			-0.6	V
Base - emitter voltage	$V_{BE(sat)}$	$I_C = -500 mA, I_B = -50mA$			-1.2	V
Collector output capacitance	$C_{ob}$	$V_{CB} = -10V, I_E = 0, f = 1MHz$			5	pF
Transition frequency	$f_T$	$V_{CE} = -6V, I_C = -20mA, f = 30MHz$	150			MHz

#### $\mu$ Classification of $h_{FE}(1)$

Type	69012	69012-L	69012-H	69012-J
Range	200-350	120-200	144-202	300-400