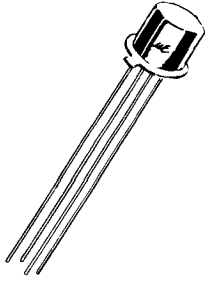


High Frequency Transistors

TO-72



TO-106



TYPE NO. NPN PNP	Maximum Ratings					Electrical Characteristics @ T _A = 25°C					CASE
	P _D @ T _A = 25°C	I _C	BV _{CEO}	LV _{CEO}	BV _{EBO}	h _{FE} @ V _{CE} @ I _C	V _{CE(sat)} @ I _C /I _B	C _{ob}	f _T @ I _C		
						min./max.	max.	max.	min.		
ME 3001	200mW	—	30V	12V	3V	20/200 @ 10V @ 8mA	0.25V @ 10/ 1.0mA	1.6pF	600MHz @ 20mA	TO-106	
ME 3002	200mW	—	30V	12V	3V	20/200 @ 10V @ 8mA	0.25V @ 10/ 1.0mA	1.6pF	900MHz @ 20mA	TO-106	
ME 3011	200mW	—	20V	12V	2V	20/ — @ 10V @ 8mA	0.60V @ 10/ 1.0mA	1.7pF	600MHz @ 20mA	TO-106	
2N 917	300mW	50mA	30V	15V	3V	20/200 @ 10V @ 3mA	0.50V @ 3/ 0.3mA	1.7pF	500MHz @ 4mA	TO-72G	
2N 918	200mW	50mA	30V	15V	3V	20/200 @ 10V @ 3mA	0.40V @ 10/ 1.0mA	1.7pF	600MHz @ 4mA	TO-72G	
2N 3563	200mW	50mA	30V	12V	2V	20/200 @ 10V @ 8mA	0.10V @ 10/ 1.0mA	1.7pF	600MHz @ 8mA	TO-106	
2N 3564	200mW	100mA	30V	15V	4V	20/500 @ 10V @ 15mA	0.30V @ 20/ 2.0mA	3.5pF	600MHz @ 15mA	TO-106	
2N 3825	250mW	100mA	30V	15V	4V	20/ — @ 2V @ 10mA	0.25V @ 2/ 0.2mA	3.5pF	800MHz* @ 2mA	TO-92B	
2N 4292	200mW	50mA	30V	15V	3V	20/ — @ 3V @ 1mA	0.60V @ 10/ 1.0mA	3.5pF	600MHz @ 4mA	TO-92B	
2N 4293	200mW	50mA	30V	15V	3V	20/ — @ 3V @ 1mA	0.60V @ 10/ 1.0mA	3.5pF	600MHz @ 4mA	TO-92B	
2N 5130	200mW	50mA	30V	12V	6V	15/250 @ 10V @ 8mA	0.60V @ 10/ 1.0mA	1.7pF	450MHz @ 8mA	TO-106	
BF 115	200mW	30mA	50V	30V	5V	45/165 @ 10V @ 1mA	—	—	300MHz @ 1mA	TO-72J	
BF 152	200mW	25mA	30V	12V	2V	20/ 50 @ 10V @ 3mA	0.50V @ 10/ 1.0mA	—	600MHz —	TO-106	
BF 153	200mW	25mA	30V	12V	2V	20/ — @ 6V @ 3mA	0.50V @ 10/ 1.0mA	1.2pF	300MHz —	TO-106	
BF 154	200mW	50mA	30V	20V	4V	25/ — @ 10V @ 10mA	0.30V @ 10/ 1.0mA	3.5pF	200MHz —	TO-106	
BF 158	200mW	50mA	30V	12V	2V	20/ — @ 10V @ 4mA	0.50V @ 10/ 1.0mA	1.2pF	600MHz —	TO-106	
BF 159	200mW	50mA	40V	20V	2V	20/ — @ 10V @ 4mA	0.50V @ 10/ 1.0mA	1.2pF	600MHz —	TO-106	
BF 160	200mW	50mA	30V	12V	2V	30/ — @ 24V @ 1mA	0.50V @ 10/ 1.0mA	1.2pF	400MHz —	TO-106	
BF 160C	200mW	50mA	30V	13V	2V	50/ — @ 24V @ 1mA	1.00V @ 30/ 3.0mA	1.2pF	400MHz —	TO-106	
BF 173	260mW	25mA	40V	25V	4V	38/ — @ 10V @ 7mA	—	—	550MHz* @ 5mA	TO-72J	
BF 184	145mW	30mA	30V	20V	5V	75/750 @ 10V @ 1mA	—	—	300MHz @ 1mA	TO-72J	
BF 185	145mW	30mA	30V	20V	5V	34/140 @ 10V @ 1mA	—	1.5pF	220MHz @ 1mA	TO-72J	
BF 234	300mW	30mA	30V	30V	4V	90/330 @ 10V @ 1mA	—	—	150MHz @ 1mA	TO-106	
BF 254	180mW	30mA	30V	20V	5V	67/220 @ 10V @ 1mA	—	—	500MHz @ 1mA	TO-92E†	
BF 255	180mW	30mA	30V	20V	5V	36/125 @ 10V @ 1mA	—	—	450MHz @ 1mA	TO-92E†	
BF 271	250mW	50mA	30V	30V	4V	30/ — @ 10V @ 10mA	—	1.5pF	450MHz —	TO-72G	
BF 273	200mW	50mA	40V	35V	4V	40/ — @ 10V @ 1mA	—	1.5pF	600MHz —	TO-106B	
BF 274	200mW	50mA	40V	35V	4V	70/ — @ 10V @ 1mA	—	1.5pF	600MHz —	TO-106B	
BFX 19	200mW	—	30V	30V	3V	20/ — @ 12V @ 4mA	—	0.6pF	400MHz —	TO-72G	
BFX 20	200mW	—	30V	30V	3V	20/ — @ 12V @ 25mA	—	0.6pF	400MHz —	TO-72G	
BFX 89	200mW	25mA	30V	15V	2.5V	25/150 @ 1V @ 2mA	—	1.7pF	1GHz @ 2mA	TO-72G	
BFY 74	360mW	100mA	60V	45V	5V	40/180 @ 5V @ 10mA	1.00V @ 10/ 1.0mA	4.0pF	250MHz —	TO-18	
BFY 75	360mW	100mA	60V	5V	5V	65/300 @ 5V @ 10mA	1.00V @ 10/ 1.0mA	4.0pF	250MHz —	TO-18	
BFY 78	300mW	50mA	25V	12V	3V	20/ — @ 1V @ 3mA	1.00V @ 10/ 1.0mA	2.8pF	500MHz —	TO-18	
BFY 79	300mW	—	30V	30V	4V	30/ — @ 10V @ 4mA	—	1.6pF	400MHz —	TO-72G	
ME 0461	250mW	—	60V	50V	6V	50/200 @ 1V @ 10mA	0.15V @ 10/ 1.0mA	6.0pF	300MHz @ 10mA	TO-106	
ME 0462	360mW	—	50V	40V	6V	100/300 @ 1V @ 10mA	0.15V @ 10/ 1.0mA	6.0pF	300MHz @ 10mA	TO-106	
ME 0463	250mW	—	30V	20V	5V	50/300 @ 1V @ 10mA	0.25V @ 10/ 1.0mA	8.0pF	250MHz @ 10mA	TO-106	
MA 0461	300mW	—	60V	50V	6V	50/200 @ 1V @ 10mA	0.15V @ 10/ 1.0mA	5.0pF	500MHz @ 10mA	TO-18	
MA 0462	300mW	—	50V	40V	6V	100/300 @ 1V @ 10mA	0.15V @ 10/ 1.0mA	3.0pF	500MHz @ 10mA	TO-18	
MA 0463	360mW	—	30V	20V	5V	50/300 @ 1V @ 10mA	0.25V @ 10/ 1.0mA	3.0pF	500MHz @ 10mA	TO-18	
2N 3639	200mW	80mA	6V	6V	4V	30/120 @ 0.3V @ 10mA	0.25V @ 10/ 0.5mA	4.0pF	500MHz @ 10mA	TO-106	
2N 3640	200mW	80mA	12V	12V	4V	30/120 @ 0.3V @ 10mA	0.25V @ 10/ 0.5mA	4.0pF	500MHz @ 10mA	TO-106	
2N 3798	360mW	50mA	60V	60V	5V	150/450 @ 5V @ 1mA	0.25V @ 1/ 0.1mA	4.0pF	100MHz @ 10mA	TO-18	
2N 3799	360mW	50mA	60V	60V	5V	300/900 @ 5V @ 1mA	0.25V @ 1/ 0.1mA	4.0pF	100MHz —	TO-18	
2N 4121	200mW	100mA	40V	40V	5V	70/200 @ 1V @ 10mA	0.30V @ 50/ 5.0mA	4.5pF	400MHz @ 10mA	TO-106	
2N 4122	200mW	100mA	40V	40V	5V	100/300 @ 1V @ 10mA	0.25V @ 10/ 1.0mA	4.5pF	400MHz —	TO-106	
2N 5138	200mW	100mA	30V	30V	5V	50/800 @ 1V @ 0.1mA	0.30V @ 10/ 0.5mA	5.0pF	300MHz @ 0.5mA	TO-106	
2N 5139	200mW	100mA	20V	20V	5V	40/150 @ 1V @ 10mA	0.50V @ 50/ 5.0mA	5.0pF	300MHz @ 10mA	TO-106	
BFX 48	360mW	100mA	30V	30V	5V	90/ — @ 1V @ 10mA	0.14V @ 10/ 1.0mA	3.5pF	400MHz —	TO-18	