

TO-92 Plastic Package Transistors (NPN)

Maximum Ratings							Electrical Characteristics (Ta=25°C, Unless Otherwise Specified)														
Type No.	V _{CBO} (V) Min	V _{CEO} (V) Min	V _{EB0} (V) Min	P _D (W) @ Tc=25°C	I _C (A)	I _{CBO} (μA) Max	V _{CB} (V) @ I _C	I _{CES} (μA) Max	V _{CE} (V) @ I _{CES}	h _{FE} @ I _C & V _{CE} Min Max	V _{CE(SAT)} (V) Max Min	V _{BE(SAT)} (V) Max	I _C (mA) @	C _{ob} (pF) Typ Max	f _t (MHz) Min Typ	I _C (mA) @	t _{off} (ns) Max	N _F (dB) Max	@ Freq (MHz)	C _{iss} (pF) Max	CDIL Case Style
BF195	30	20	5	0.4	0.03	0.1	20			36 125 1 10 6 125 12 7				0.3		1		3.5			TO-92-2
BF196	40	30	4	0.4	0.03	0.1	40			26 4 10 6 12 7											TO-92-2
BF197	40	25	4	0.35	0.1	0.1	40			36 7 10 6 12 7					1100	7					TO-92-2
BF198	40	30	4	0.625		0.1	40			26 4 10 6 12 7											TO-92-2
BF199	40	25	4	0.35	0.1	0.1	20			40 7 10					400	5					TO-92-2
BF224	45	30	4	0.35	0.05	0.1	20			30 7 10	0.15		10		300 600	2		2.5			TO-92-2
BF237	45	30	4	0.35	0.1	0.1	20				0.25		10								TO-92-2
BF238	45	30	4	0.35	0.1	0.1	20				0.25		10								TO-92-2
BF240	40	40	4	0.35	0.03	0.1	20			65 220 1 10											TO-92-2
BF241	40	40	4	0.35	0.03	0.1	20			35 125 1 10											TO-92-2
BF254	30	20	5	0.35	0.1	0.1	10			65 220 1 10					260	1					TO-92-2
BF254-3	30	20	5	0.35	0.1	0.1	10			65 125 1 10					260	1					TO-92-2
BF254-4	30	20	5	0.35	0.1	0.1	10			100 220 1 10					260	1					TO-92-2
BF255	30	20	5	0.4	0.03	0.1	20			36 125 1 10 6 125 12 7	0.65	0.74	1	0.3		1		3.5			TO-92-2
BF391	200	200	6	0.625	0.5	0.1	160			25 1 10 40 10 10	2	2	20		50	10			2		TO-92
BF392	250	250	6	0.625	0.5	0.1	200			25 1 10 40 10 10	2	2	20		50	10			2		TO-92
BF393	300	300	6	0.625	0.5	0.1	200			25 1 10 40 10 10	2	2	20		50	1			2		TO-92
BF420	300	300	5	0.8	0.5	0.01	200			50 25 20	0.5	2	20		60	10			1.6		TO-92-1
BF422	250	250	5	0.8	0.5	0.01	200			50 25 20	0.5	2	20		60	10			1.6		TO-92-1
BF494	30	20	5	0.3	0.03	0.1	20			67 220 1 10				1.5	120	260	1		1		TO-92-2
BF494A	30	20	5	0.3	0.03	0.1	20			200 500 1 10				1.5	120	260	1		1		TO-92-2
BF494B	30	20	5	0.3	0.03	0.1	20			100 220 1 10				1.5	120	260	1		1		TO-92-2
BF495	30	20	5	0.3	0.03	0.1	20			35 125 1 10				1.5	120	260	1		1		TO-92-2
BF495C	30	20	5	0.3	0.03	0.1	20			67 125 1 10				1.5	120	260	1		1		TO-92-2
BF495D	30	20	5	0.3	0.03	0.1	20			35 76 1 10				1.5	120	260	1		1		TO-92-2
BF496	30	20	3	0.3	0.02	0.5	20			15 2 10 5 12 7					550	2					TO-92
BF959	30	20	3	0.625	0.1	0.1	20			35 5 10 40 20 10	1	1	30		700	20			0.7		TO-92-2
BSY95A	20	15	5	0.625	0.2	0.05	16			30 200 1 0.4 50 200 10 0.4	0.35	0.67	0.87 10	6	200	10					TO-92

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TO-92 Plastic Package Transistors (NPN)

Maximum Ratings										Electrical Characteristics (Ta=25°C, Unless Otherwise Specified)													
Type No.	V _{CEO} (V) Min	V _{CE0} (V) Min	V _{EB0} (V) Min	P _D (W) @Tc=25°C	I _C (A)	I _{CBO} (μA) Max	V _{CB} (V) @ I _C	I _{CES} (μA) Max	V _{CE} (V) @ I _{CES}	h _{FE} @ I _C & V _{CE} Min Max	V _{CE(SAT)} (V) Max	V _{BE(SAT)} (V) Max	I _C (mA) @ V _{BE}	C _{ob} (pF) Typ Max	f _T (MHz) Min Typ Max	t _{off} (ns) Max	N _F (dB) Max	@ Freq (MHz)	C _{re} (pF) Max	CDIL Case Style			
CC2369	40	15	5	0.625	0.2	0.4	20			40 120 10 1 20 100 20	0.25	0.7	0.85 10	4	500					TO-92-1			
CC337	50	45	5	0.625	0.8	0.1	20			40 500 1 100 600 100 1	0.7		500 5		200					TO-92-1			
CC337-16	50	45	5	0.625	0.8	0.1	20			40 500 1 100 250 1000 1	0.7		500 5		200					TO-92-1			
CC337-25	50	45	5	0.625	0.8	0.1	20			40 500 1 160 400 100 1	0.7		500 5		200					TO-92-1			
CC337-40	50	45	5	0.625	0.8	0.1	20			40 500 1 250 600 100 1	0.7		500 5		200					TO-92-1			
CC338	25	25	5	0.625	0.8	0.1	20			40 500 1 100 600 100 1	0.7		500 5		200					TO-92-1			
CC338-16	30	25	5	0.625	0.8	0.1	20			40 500 1 100 250 100 1	0.7		500 5		200					TO-92-1			
CC338-25	30	25	5	0.625	0.8	0.1	20			40 500 1 160 400 100 1	0.7		500 5		200					TO-92-1			
CC338-40	30	25	5	0.625	0.5	0.1	20			40 500 1 250 600 100 1	0.7		500 5		200					TO-92-1			
CD50	500	400	5	0.625	0.3			0.5	400	30 150 100 10	1		100							TO-92-1			
CD635	45	45	5	0.8	0.5	0.1	30			25 5 2 40 250 150 2 25 500 2	0.5		500 7		200					TO-92-4			
CD637	60	60	5	0.8	0.5	0.1	30			25 5 2 40 160 150 2 25 500 2	0.5		500 7		200					TO-92-4			
CD639	80	80	5	0.8	0.5	0.1	30			25 5 2 40 160 150 2 25 500 2	0.5		500 7		200					TO-92-4			
CD8050B	30	25	5	1.0	2	0.5	20			85 160 100 1	0.5		1.25 500	20	150					TO-92			
CD8050C	30	25	5	1.0	2	0.5	20			120 200 100 1	0.5		1.25 500	20	150					TO-92			
CD8050D	30	25	5	1.0	2	0.5	20			160 300 100 1	0.5		1.25 500	20	150					TO-92			
CD9011	18	18	3	0.625	0.1	0.05	18			29 273 1 5	0.2		0.85 10	3.5	250			4		TO-92			
CD9011D	18	18	3	0.625	0.1	0.05	18			29 44 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9011E	18	18	3	0.625	0.1	0.05	18			40 59 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9011F	18	18	3	0.625	0.1	0.05	18			54 80 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9011G	18	18	3	0.625	0.1	0.05	18			72 108 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9011H	18	18	3	0.625	0.1	0.05	18			97 146 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9011I	18	18	3	0.625	0.1	0.05	18			132 198 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9011J	18	18	3	0.625	0.1	0.05	18			182 273 1 5	0.2		0.85 10	3.5	250			4	0.001	TO-92			
CD9013	40	30	5	0.625	0.5	0.1	25			64 275 50 1	0.2 0.4		1 150 1.2 500	10	200			6	0.001	TO-92			
CD9013D	40	30	5	0.625	0.5	0.1	25			64 91 50 1	0.2 0.4		1 150 1.2 500	10	200			6	0.001	TO-92			

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