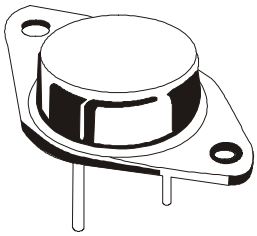
NPN POWER TRANSISTOR

2N3055HV



TO-3
Metal Can Package

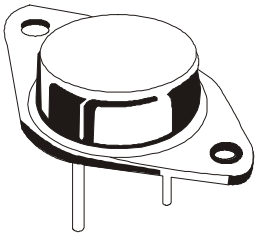
Switching Regulator and Power Amplifier Applications

ABSOLUTE MAXIMUM RATINGS

DESCRIPTION	SYMBOL	VALUE	UNITS
Collector Base Voltage (Open Emitter)	V_{CBO}	100	V
Collector Emitter Voltage (Open Base)	V_{CEO}	100	V
Emitter Base Voltage	V_{EBO}	7.0	V
Collector Current	I_C	15	A
Base Current	I_B	7.0	A
Total Power Dissipation up toT_c=25ºC	P_{tot}	100	W
Junction Temperature	T_j	200	ºC
Storage Temperature	T_{stg}	- 65 to +200	ºC
THERMAL RESISTANCE			
Junction to Case	$R_{th(j-c)}$	1.75	ºC/W

ELECTRICAL CHARACTERISTICS (T_C=25ºC unless specified otherwise)

DESCRIPTION	SYMBOL	TEST CONDITION	MIN	MAX	UNITS
Breakdown Voltages					
	$V_{CEO(sus)}$*	I_C=200mA, I_B=0	100		V
	V_{CBO}	I_C=1mA, I_E= 0	100		V
	V_{EBO}	I_E=1mA, I_C =0	7		V
Collector Cut off Current	I_{CEX} I_{CEX}	V_{CE}=100V, V_{BE}=(off)=1.5V T_c=150ºC V_{CE}=100V, V_{BE}=(off)=1.5V		1.0 5.0	mA
Collector Cut off Current	I_{CEO}	V_{CE}=30V, I_B=0		0.7	mA
Emitter Cut off Current	I_{EBO}	V_{BE}=7V, I_C=0		5.0	mA
Collector Emitter Saturation Voltage	$V_{CE(Sat)}$ *	I_C=4A, I_B=400mA I_C=10A, I_B=3.3A		1.1 3.0	V
Base Emitter on Voltage	$V_{BE(on)}$ *	I_C=4A, V_{CE}=4V		2	V
DC Current Gain	h_{FE}* h_{FE}*	I_C=4A, V_{CE}=4V I_C=10A, V_{CE}=4V	20 5	100	



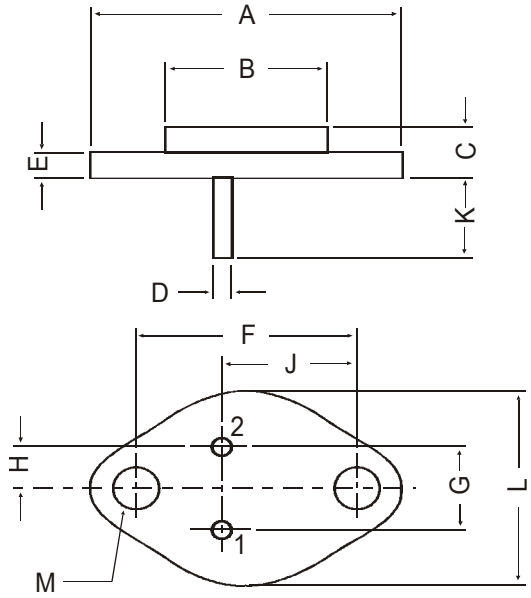
TO-3
Metal Can Package

ELECTRICAL CHARACTERISTICS (T_C=25ºC unless specified otherwise)

DESCRIPTION	SYMBOL	TEST CONDITION	MIN	MAX	UNITS
Second Breakdown Collector Current with Base Forward Biased	I_S/b	V_{CE}=35V,t=1.0 sec, Nonrepetitive	2.87		A
Dynamic Characteristics					
Transition Frequency	f_T	I_C=0.5A, V_{CE}=10V, f=1MHz	2.5		MHz

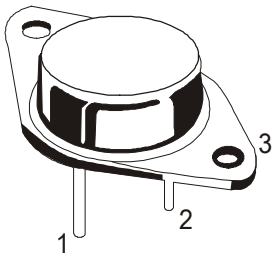
***Pulse Test: <300μs, Duty Cycle =2%**

TO-3 Metal Can Package



All dimensions in mm.

DIM	MIN.	MAX.
A	—	39.37
B	—	22.22
C	6.35	8.50
D	0.96	1.09
E	—	1.77
F	29.90	30.40
G	10.69	11.18
H	5.20	5.72
J	16.64	17.15
K	11.15	12.25
L	—	26.67
M	3.84	4.19



PIN CONFIGURATION
1. BASE
2. EMITTER
3. COLLECTOR

Packing Detail

PACKAGE	STANDARD PACK		INNER CARTON BOX		OUTER CARTON BOX		
	Details	Net Weight/Qty	Size	Qty	Size	Qty	Gr Wt
TO-3	100 pcs/pkt	1.3 kg/100 pcs	12.5" x 8" x 1.8"	0.1K	17" x 11.5" x 21"	2K	27.5 kgs

TO-3
Metal Can Package

Disclaimer

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CDIL is a registered Trademark of
Continental Device India Limited
C-120 Naraina Industrial Area, New Delhi 110 028, India.
Telephone + 91-11-579 6150 Fax + 91-11-579 9569, 579 5290
e-mail sales@cdil.com www.cdil.com