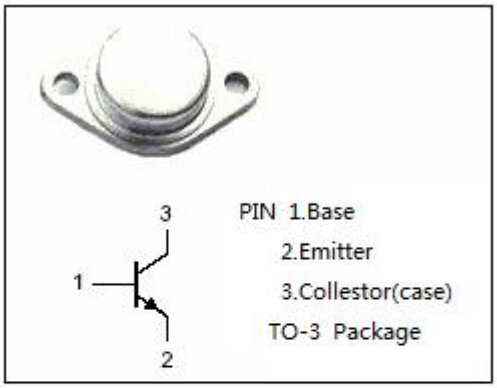
SPTECH Silicon NPN Power Transistor

DESCRIPTION

- High Voltage: V_{CEV}= 400V(Min)
- Fast Switching Speed-
  : t_f= 0.5 μ s(Max)
- Low Saturation Voltage-
  : $V_{CE(sat)}$= 1.0V(Max)@ I_C= 6A

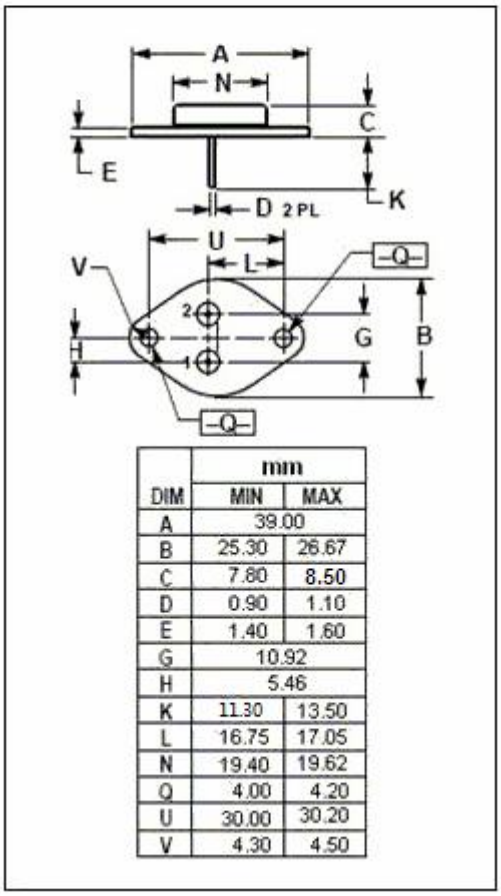
APPLICATIONS

- Designed for use in horizontal deflection output stages of TV's and CRT's



ABSOLUTE MAXIMUM RATINGS(T_a=25℃)

SYMBOL	PARAMETER	VALUE	UNIT
V_{CBO}	Collector-Base Voltage	400	V
V_{CEV}	Collector-Emitter Voltage	400	V
V_{CEO}	Collector-Emitter Voltage	200	V
V_{EBO}	Emitter-Base Voltage	6	V
I_C	Collector Current-Continuous	7	A
I_{CM}	Collector Current-Peak	10	A
I_B	Base Current	4	A
P_C	Collector Power Dissipation @ T_C=25℃	90	W
T_J	Junction Temperature	150	℃
T_{stg}	Storage Temperature Range	-65~150	℃



DIM	mm	
	MIN	MAX
A	39.00	
B	25.30	26.67
C	7.80	8.50
D	0.90	1.10
E	1.40	1.60
G	10.92	
H	5.46	
K	11.30	13.50
L	16.75	17.05
N	19.40	19.62
Q	4.00	4.20
U	30.00	30.20
V	4.30	4.50

SPTECH Silicon NPN Power Transistor

ELECTRICAL CHARACTERISTICS

T_C=25℃ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP.	MAX	UNIT
$V_{CEO(SUS)}$	Collector-Emitter Sustaining Voltage	I_C= 50mA ;I_B= 0	200			V
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage	I_C= 6A; I_B= 1.2A			1.0	V
$V_{BE(sat)}$	Base-Emitter Saturation Voltage	I_C= 6A; I_B= 1.2A			1.5	V
h_{FE}	DC Current Gain	I_C= 7A; V_{CE}= 1.5V;	4.3			
I_{CEV}	Collector Cutoff Current	V_{CE}= 400V; V_{BE}= -1.5V			15	mA
I_{EBO}	Emitter Cutoff Current	V_{EB}= 6V; I_C= 0			400	mA
f_T	Current-Gain—Bandwidth Product	I_C= 0.5A ; V_{CE}= 10V, f_{test}= 1MHz	10			MHz
t_f	Fall Time	I_C= 6A; I_{B1}= -I_{B2}= 1.2A, V_{CC}= 40V			0.5	μs