GSTD772

PNP Epitaxial Planar Transistors

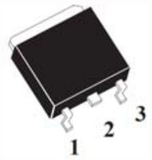
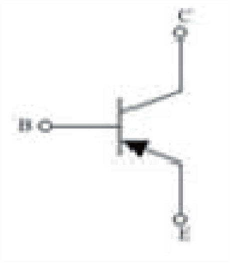
Product Description

This device is designed as a general purpose amplifier and switch.

Features

- Lead(Pb)-Free

Packages & Pin Assignments

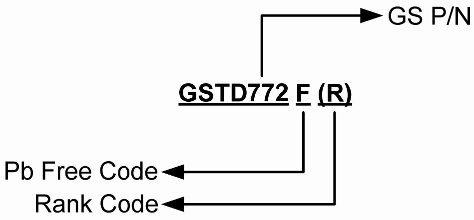
TO-252	
	

Pin	Description
1	Base
2	Collector
3	Emitter

Marking Information

P/N	Package	Rank	Part Marking
GSTD772F	TO-252	(R) / (O) / (Y) / (GR)	B772

Ordering Information



GS P/N

GSTD772 F (R)

Pb Free Code

Rank Code

Part Number	Package	Quantity
GSTD772F(R or O or Y or GR)	TO-252	2500 PCS

Absolute Maximum Ratings

T_A=25°C

Symbol	Conditions		Typical	Unit
V_{CEO}	Collector-Emitter Voltage		-30	V
V_{CBO}	Collector-Base Voltage		-40	V
V_{EBO}	Emitter-Base Voltage		-5.0	V
$I_{C(DC)}$	Collector Current (DC)		-3.0	A
$I_{C(Pulse)}$	Collector Current (Pulse) (1)		-7.0	A
$I_{B(Pulse)}$	Base Current		-0.6	A
P_D	Total Device Dissipation	T_C=25°C	10	W
		T_A=25°C	1.25	
T_J	Junction Temperature Range		150	°C
T_{STG}	Storage Temperature Range		-55 to +150	°C

Notes: 1.PW≦350us, duty cycle≦2%

Electrical Characteristics

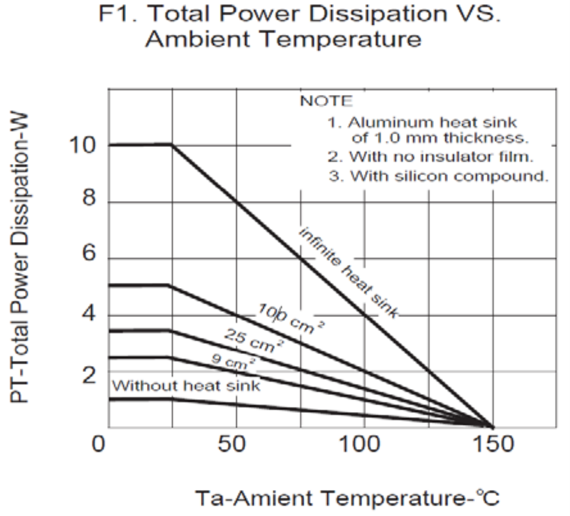
T_A=25°C unless otherwise noted

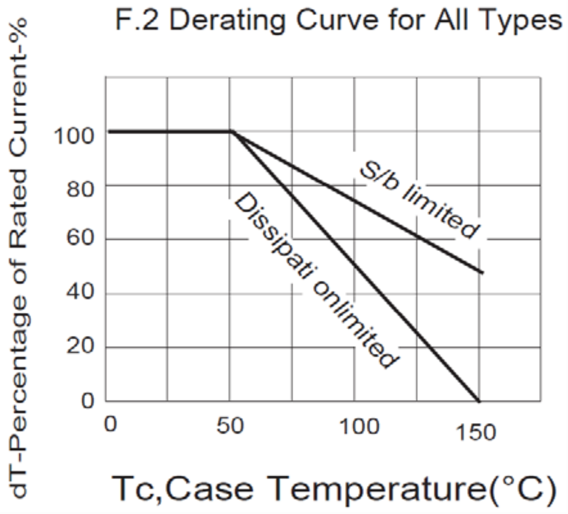
Symbol	Conditions	Min	TYP	Max	Unit
$V_{(BR)CEO}$	Collector-Emitter Breakdown Voltage (I_C=-10mA, I_B=0mA)	-30	-	-	V
$V_{(BR)CBO}$	Collector-Base Breakdown Voltage (I_C=-100uA, I_E=0mA)	-40	-	-	V
$V_{(BR)EBO}$	Emitter-Base Breakdown Voltage (I_E=-100uA, I_C=0mA)	-5.0	-	-	V
I_{CEO}	Collector Cutoff Current (V_{CE}= -30V, I_B=0mA)	-	-	-1.0	uA
I_{CBO}	Collector Cutoff Current (V_{CB}= -40V, I_E=0mA)	-	-	-1.0	uA
I_{EBO}	Emitter Cutoff Current (V_{EB}= -6.0V, I_C=0mA)	-	-	-1.0	uA
$h_{FE\ (1)}$	DC Current Gain (I_C= -1.0A, V_{CE}=-2.0V)	60	-	400	-
$h_{FE\ (2)}$	DC Current Gain (I_C= -100mA, V_{CE}=-2.0V)	32	-	-	-
$V_{CE(sat)}$	Collector-Emitter Saturation Voltage (I_C= -2.0A, I_B=-0.2mA)	-	-	-0.5	V
$V_{BE(sat)}$	Base-Emitter Saturation Voltage (I_C= -2.0A, I_B=-0.2mA)	-	-	-2.0	V
f_T	Current-Gain-Bandwidth Product (I_C= -0.1mA, V_{CE}=-5.0V, f=10MHz)	-	80	-	MHz

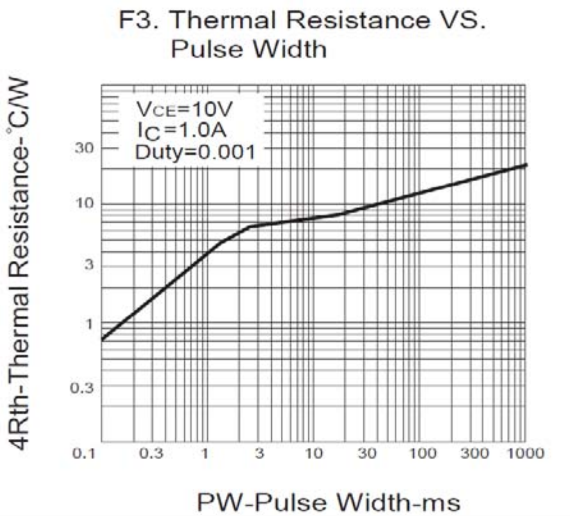
Classification of $h_{FE(1)}$

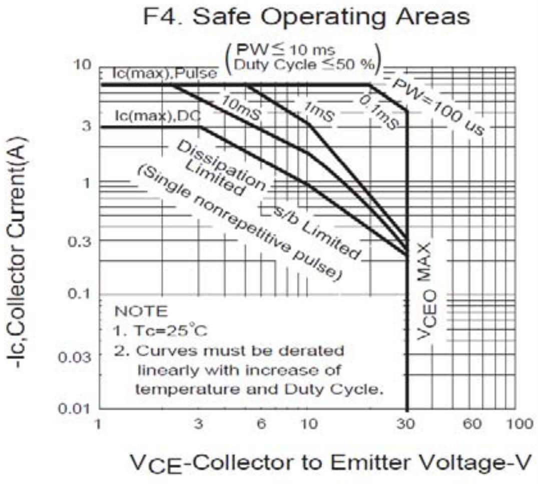
Rank	R	O	Y	GR
Range	60-120	100-200	160-320	200-400

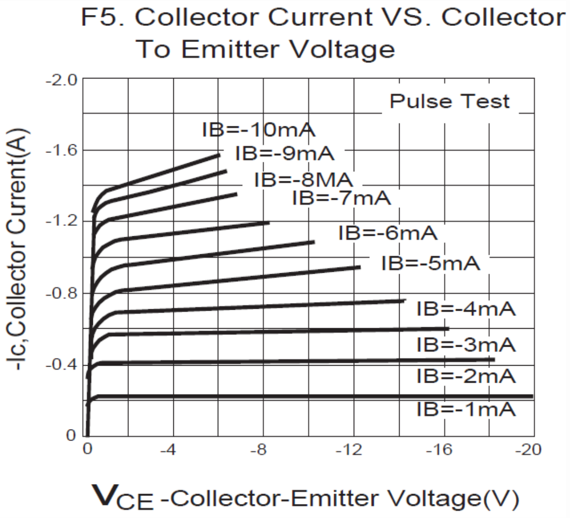
Typical Performance Characteristics


F1. Total Power Dissipation VS. Ambient Temperature


F.2 Derating Curve for All Types

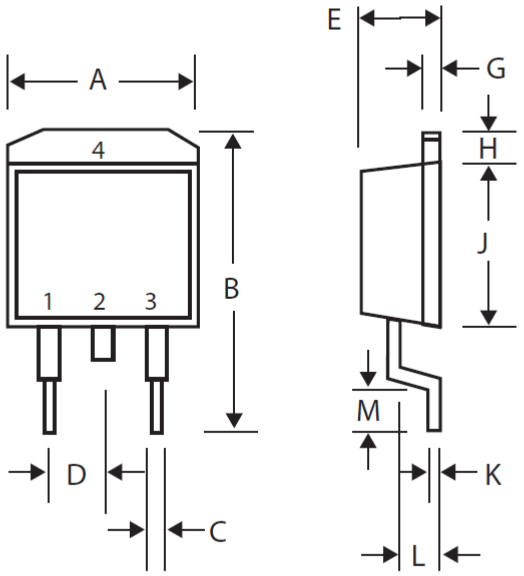

F3. Thermal Resistance VS. Pulse Width


F4. Safe Operating Areas


F5. Collector Current VS. Collector To Emitter Voltage

Package Dimension

TO-252



Dimensions				
Symbol	**Millimeters**		**Inches**	
	Min	**Max**	**Min**	**Max**
A	6.40	6.80	0.251	0.267
B	9.00	10.00	0.354	0.393
C	0.50	0.80	0.019	0.031
D	-	2.30	-	0.090
E	2.20	2.50	0.086	0.098
G	0.45	0.55	0.017	0.021
H	1.00	1.60	0.039	0.062
J	5.40	5.80	0.212	0.228
K	0.30	0.64	0.011	0.025
L	0.70	1.70	0.027	0.066
M	0.90	1.50	0.035	0.059

NOTICE

Information furnished is believed to be accurate and reliable. However Globaltech Semiconductor assumes no responsibility for the consequences of use of such information nor for any infringement of patents or other rights of third parties, which may result from its use. No license is granted by implication or otherwise under any patent or patent rights of Globaltech Semiconductor. Specifications mentioned in this publication are subject to change without notice. This publication supersedes and replaces all information without express written approval of Globaltech Semiconductor.

CONTACT US

GS Headquarter	
🏢	4F.,No.43-1,Lane11,Sec.6,Minquan E.Rd Neihu District Taipei City 114, Taiwan (R.O.C)
☎	886-2-2657-9980
📠	886-2-2657-3630
✉	sales_twn@gs-power.com

Wu-Xi Branch	
🏢	No.21 Changjiang Rd., WND, Wuxi, Jiangsu, China (INFO. &. TECH. Science Park Building A 210 Room)
☎	86-510-85217051
📠	86-510-85211238
✉	sales_cn@gs-power.com

RD Division	
🏢	824 Bolton Drive Milpitas. CA. 95035
☎	1-408-457-0587