GSTM882

NPN Epitaxial Planar Transistors

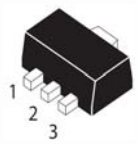
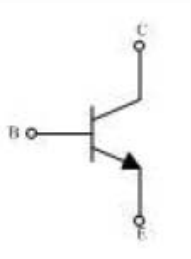
Product Description

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

Features

- Lead(Pb)-Free

Packages & Pin Assignments

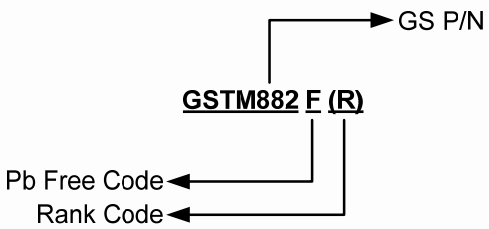
SOT-89	
	

Pin	Description
1	Base
2	Collector
3	Emitter

Marking Information

P/N	Package	Rank	Part Marking
GSTM882F	SOT-89	(R) / (O) / (Y) / (GR)	D882

Ordering Information



Part Number	Package	Quantity
GSTM882F(R or O or Y or GR)	SOT-89	1000 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	6.0	V
$I_{C(DC)}$	Collector Current (DC)	3.0	A
P_D	Total Device Dissipation T_A=25°C	0.5	W
$R_{\theta JA}$	Thermal Resistance Junction to Ambient	250	°C/W
T_J	Junction Temperature Range	150	°C
T_{STG}	Storage Temperature Range	-55 to +150	°C

Electrical Characteristics

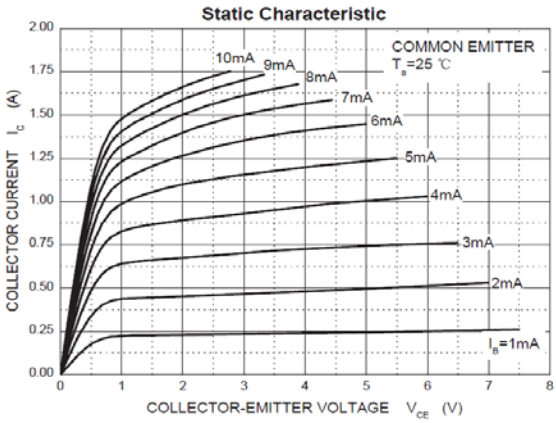
(T_A=25°C unless otherwise noted)

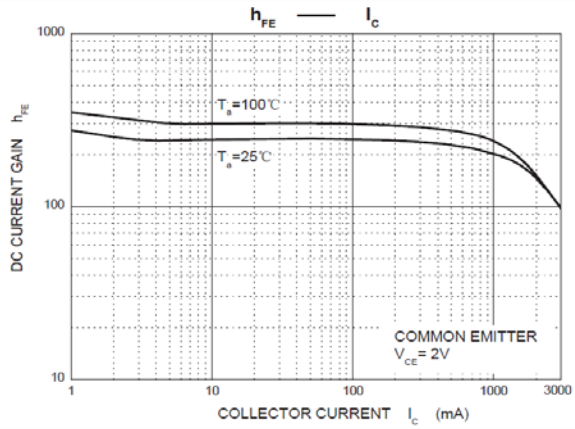
Symbol	Conditions	Min	TYP	Max	Unit
$V_{(BR)CEO}$	Collector-Emitter Breakdown Voltage (I_C=10mA, I_B=0mA)	30	-	-	V
$V_{(BR)CBO}$	Collector-Base Breakdown Voltage (I_C=100uA, I_E=0mA)	40	-	-	V
$V_{(BR)EBO}$	Emitter-Base Breakdown Voltage (I_E=100uA, I_C=0mA)	6.0	-	-	V
I_{CEO}	Collector Cutoff Current (V_{CE}=30V, I_B=0mA)	-	-	10	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=0.2A)	-	-	0.5	V
$V_{BE(sat)}$	Base-Emitter Saturation Voltage (I_C=2.0A, I_B=0.2A)	-	-	1.5	V
f_T	Current-Gain-Bandwidth Product (I_C=0.1A, V_{CE}=5.0V, f=10MHz)	-	50	-	MHz

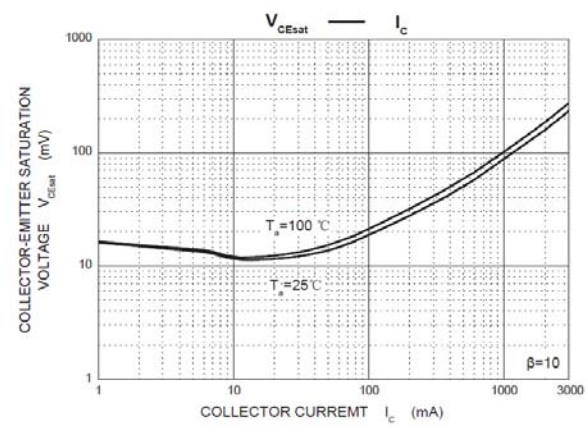
Classification of $h_{FE(1)}$

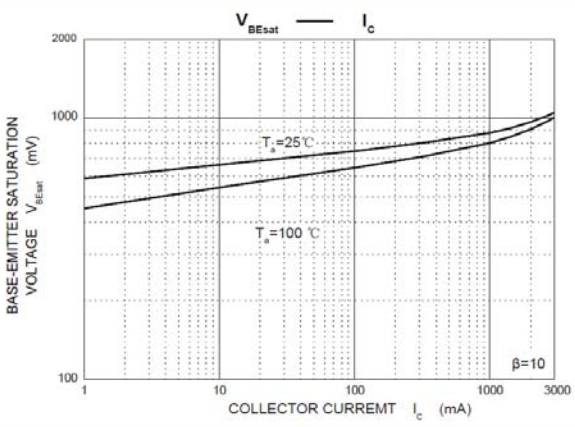
Rank	R	O	Y	GR
Range	60-120	100-200	160-320	200-400

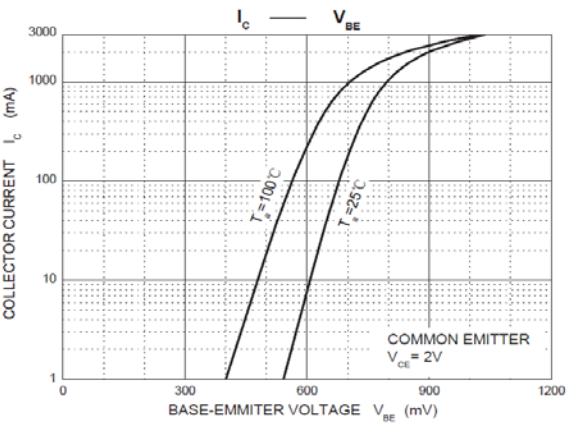
Typical Performance Characteristics

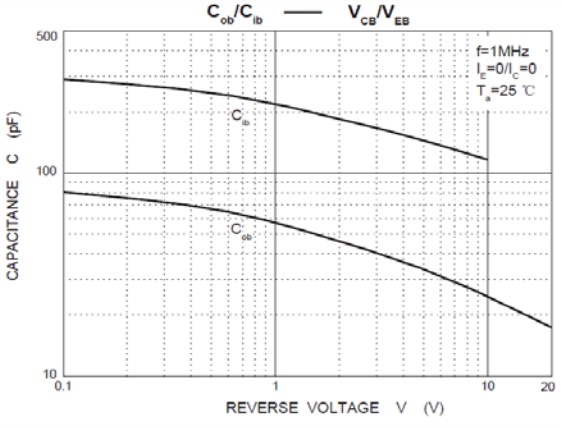


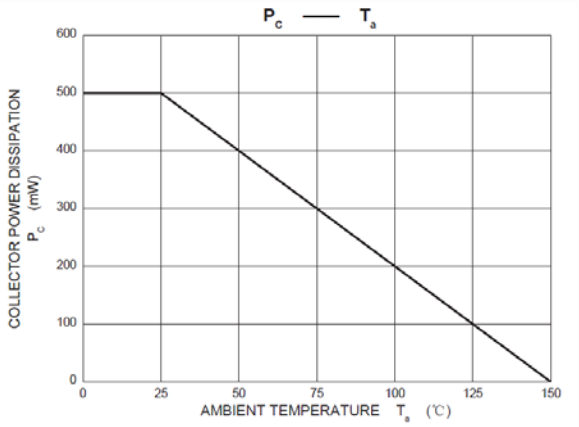






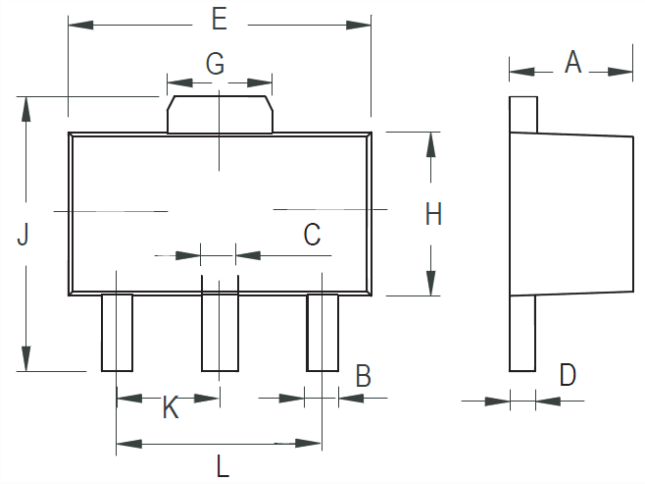






Package Dimension

SOT-89



Dimensions				
Symbol	Millimeters		Inches	
	Min	Max	Min	Max
A	1.400	1.600	0.0551	0.0629
B	0.320	0.520	0.0126	0.0204
C	0.360	0.560	0.0141	0.0220
D	0.350	0.440	0.0137	0.0173
E	4.400	4.600	0.1732	0.1811
G	1.400	1.800	0.0551	0.0708
H	2.300	2.600	0.0905	0.1023
J	3.940	4.250	0.1551	0.1673
K	1.500TYP		0.0590TYP	
L	2.900	3.100	0.1141	0.1220

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