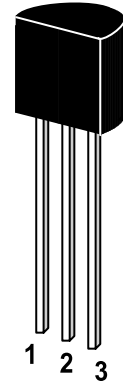


# ST 2SC1383 / 2SC1384

## NPN Silicon Epitaxial Planar Transistor

For low-frequency power amplification and driver Amplification. Complementary to 2SA683 to and 2SA684.

On special request, these transistors can be manufactured in different pin configurations.

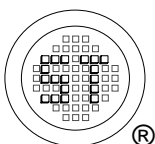


1. Emitter 2. Collector 3. Base

TO-92 Plastic Package  
Weight approx. 0.19g

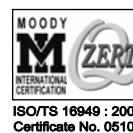
### Absolute Maximum Ratings ( $T_a = 25^\circ\text{C}$ )

	Symbol	Value	Unit	
Collector Base Voltage	2SC1383	$V_{CBO}$	30	V
	2SC1384	$V_{CBO}$	60	V
Collector Emitter Voltage	2SC1383	$V_{CEO}$	25	V
	2SC1384	$V_{CEO}$	50	V
Emitter Base Voltage		$V_{EBO}$	5	V
Peak Collector Current		$I_{CP}$	1.5	A
Collector Current		$I_C$	1	A
Power Dissipation		$P_{tot}$	1	W
Junction Temperature		$T_j$	150	$^\circ\text{C}$
Storage Temperature Range		$T_s$	-55 to +150	$^\circ\text{C}$



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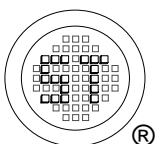


Dated : 07/12/2002

# ST 2SC1383 / 2SC1384

## Characteristics at $T_{amb}=25\text{ }^{\circ}\text{C}$

	Symbol	Min.	Typ.	Max.	Unit	
DC Current Gain at $I_C=500\text{mA}$ , $V_{CE}=10\text{V}$	Q	$h_{FE}$	85	-	170	-
	R	$h_{FE}$	120	-	240	-
	S	$h_{FE}$	170	-	340	-
		$h_{FE}$	50	100	-	-
at $I_C=1\text{A}$ , $V_{CE}=5\text{V}$						
Collector Cutoff Current at $V_{CB}=20\text{V}$	$I_{CBO}$	-	-	0.1	$\mu\text{A}$	
Collector Base Voltage at $I_C=10\mu\text{A}$	2SC1383	$V_{CBO}$	30	-	-	V
	2SC1384	$V_{CBO}$	60	-	-	V
Collector Emitter Voltage at $I_C=2\text{mA}$	2SC1383	$V_{CEO}$	25	-	-	V
	2SC1384	$V_{CEO}$	50	-	-	V
Emitter Base Voltage at $I_E=10\mu\text{A}$	$V_{EBO}$	5	-	-	V	
Collector Saturation Voltage at $I_C=500\text{mA}$ , $I_B=50\text{mA}$	$V_{CE(sat)}$	-	0.2	0.4	V	
Base Saturation Voltage at $I_C=500\text{mA}$ , $I_B=50\text{mA}$	$V_{BE(sat)}$	-	0.85	1.2	V	
Gain Bandwidth Product at $V_{CB}=10\text{V}$ , $I_E=-50\text{mA}$ , $f=200\text{MHz}$	$f_T$	-	200	-	MHz	
Output Capacitance at $V_{CB}=10\text{V}$ , $f=1\text{MHz}$	$C_{OB}$	-	11	20	pF	



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Certificate No. 05103



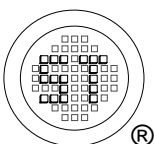
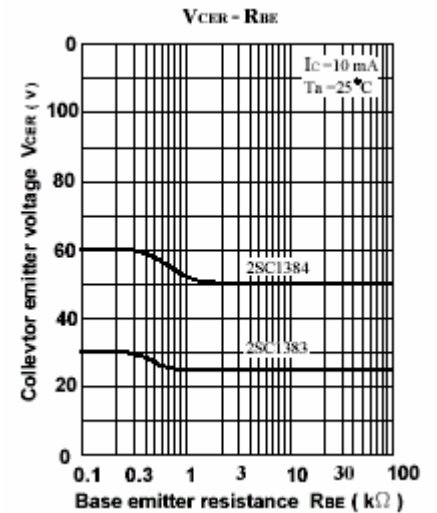
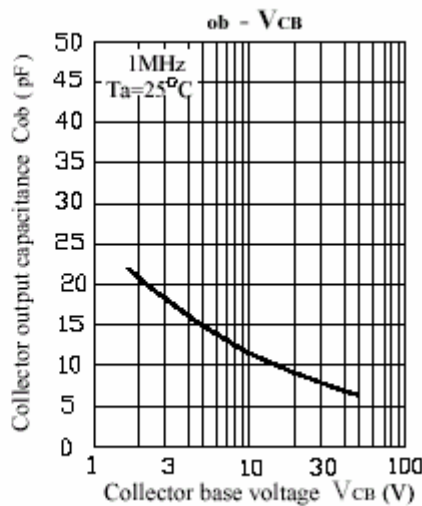
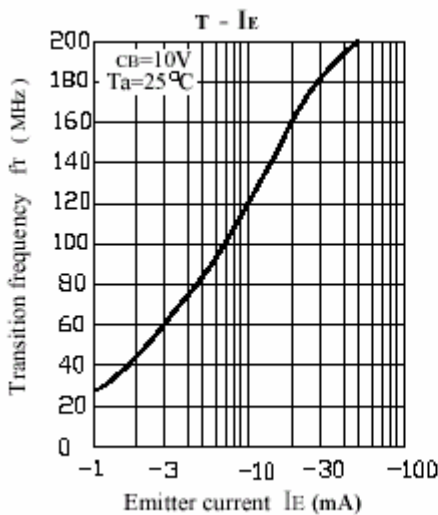
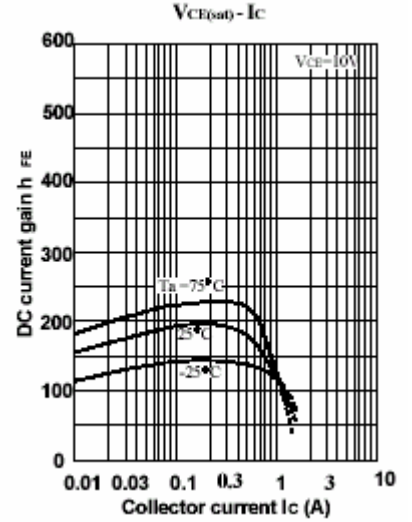
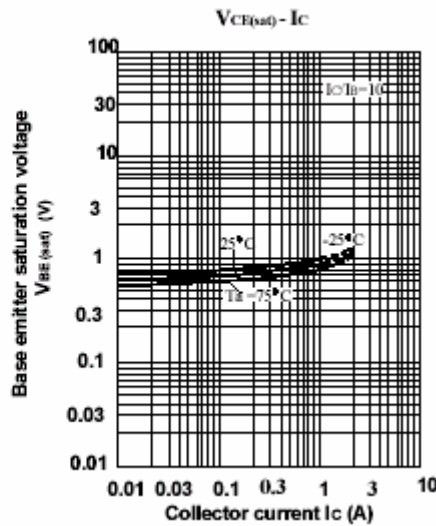
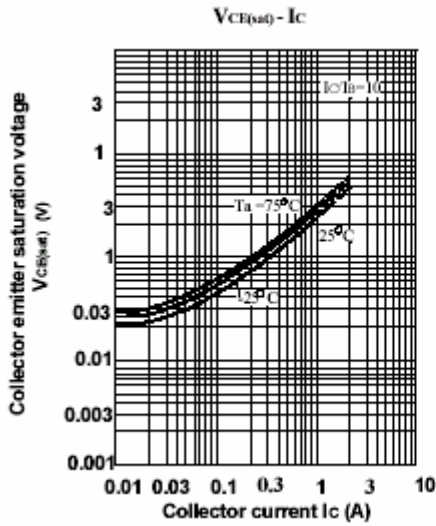
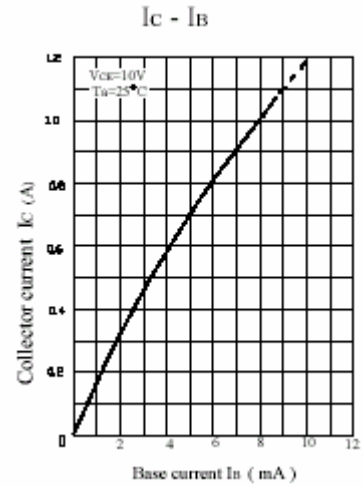
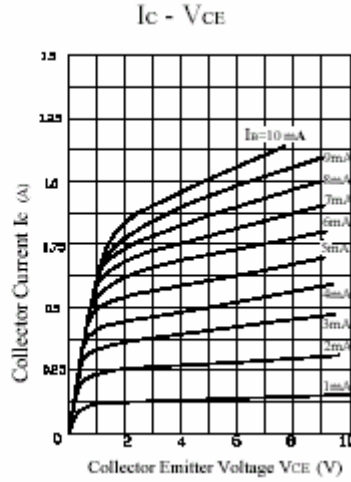
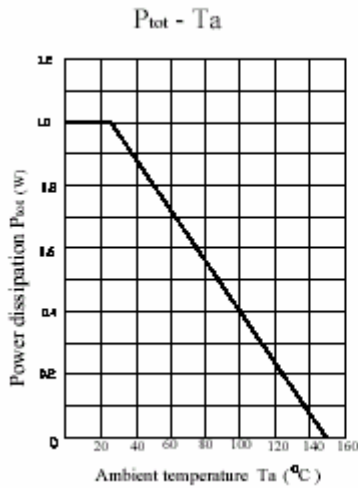
ISO 14001:2004  
Certificate No. 7116



ISO 9001:2000  
Certificate No. 0506098

Dated : 07/12/2002

# ST 2SC1383 / 2SC1384



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ISO/TS 16949 : 2002  
 Certificate No. 05103

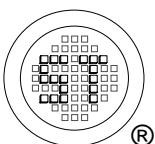
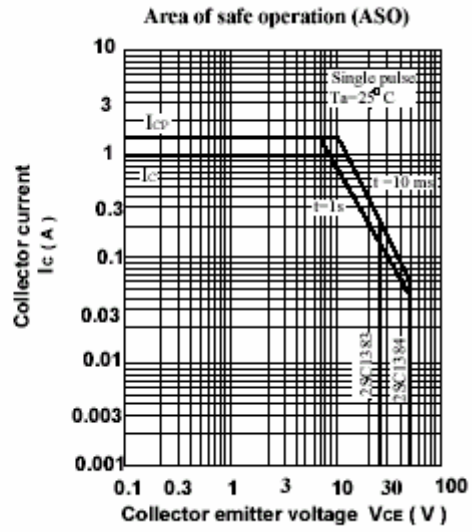
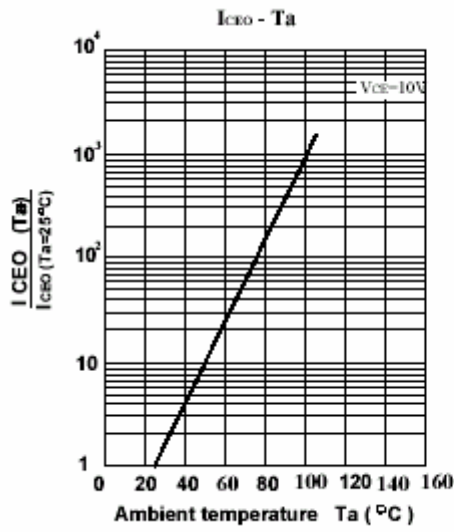


ISO 14001:2004  
 Certificate No. 7116



ISO 9001:2000  
 Certificate No. 0506098

# ST 2SC1383 / 2SC1384



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