

### Features

- High breakdown voltage ( $V_{CEO} \geq 50V$ ).
- High current ( $I_C = 500mA$ ).
- Low saturation voltage.

( ): 2SA984

### Absolute Maximum Ratings at $T_a = 25^\circ C$

			unit
Collector-to-Base Voltage	$V_{CBO}$	(-)60	V
Collector-to-Emitter Voltage	$V_{CEO}$	(-)50	V
Emitter-to-Base Voltage	$V_{EBO}$	(-)5	V
Collector Current	$I_C$	(-)500	mA
Collector Current(Pulse)	$I_{CP}$	(-)800	mA
Collector Dissipation	$P_C$	600	mW
Junction Temperature	$T_j$	150	$^\circ C$
Storage Temperature	$T_{stg}$	-55 to +150	$^\circ C$

### Electrical Characteristics at $T_a = 25^\circ C$

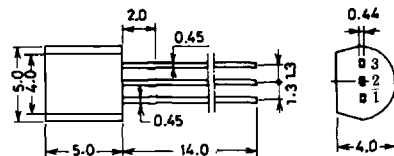
			min	typ	max	unit
Collector Cutoff Current	$I_{CBO}$	$V_{CB} = (-)40V, I_E = 0$			(-)1.0	$\mu A$
Emitter Cutoff Current	$I_{EBO}$	$V_{EB} = (-)4V, I_C = 0$			(-)1.0	$\mu A$
DC Current Gain	$h_{FE}(1)$	$V_{CE} = (-)5V, I_C = (-)50mA$	60*		320*	
	$h_{FE}(2)$	$V_{CE} = (-)5V, I_C = (-)400mA$ , (pulse)	35			
Gain-Bandwidth Product	$f_T$	$V_{CE} = (-)10V, I_C = (-)10mA$		120		MHz
Output Capacitance	$C_{ob}$	$V_{CB} = (-)10V, f = 1MHz$		(9)		pF
				5		pF
C-E Saturation Voltage	$V_{CE(sat)}$	$I_C = (-)400mA$ , $I_B = (-)40mA$	(-0.25)	(-0.6)		V
B-E Saturation Voltage	$V_{BE(sat)}$	$I_C = (-)400mA, I_B = (-)40mA$	(-)0.9	(-)1.2		V
C-B Breakdown Voltage	$V_{(BR)CBO}$	$I_C = (-)10\mu A, I_E = 0$	(-)60			V
C-E Breakdown Voltage	$V_{(BR)CEO}$	$I_C = (-)1mA, R_{BE} = \infty$	(-)50			V
E-B Breakdown Voltage	$V_{(BR)EBO}$	$I_E = (-)10\mu A, I_C = 0$	(-)5			V

\* : The 2SA984/2SC2274 are classified by 50mA  $h_{FE}$  as follows:

60 D 120	100 E 200	160 F 320
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### Case Outline 2003B

(unit: mm)



JEDEC: TO-92  
EIAJ: SC-43  
SANYO: NP

1: Emitter  
2: Collector  
3: Base

Specifications and information herein are subject to change without notice.

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