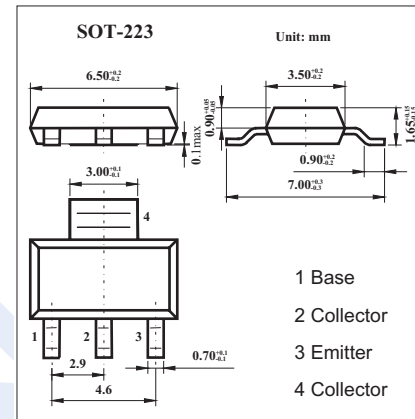


## 2.0W Surface Mount Complementary NPN Silicon Power Transistor KZT3055(CZT3055)

### ■ Features

- High current (max. 6A).
- Low voltage (max. 60V).



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

Parameter	Symbol	Rating	Unit
Collector-base voltage	$V_{CB0}$	100	V
Collector - emitter votage	$V_{CER}$	70	V
Collector-emitter voltage	$V_{CEO}$	60	V
Emitter-base voltage	$V_{EBO}$	7	V
Collector current	$I_C$	6	A
Base current	$I_B$	3	A
power dissipation	$P_D$	2	W
Thermal resistance Junction-to-Ambient	$R_{\theta JA}$	62.5	$^\circ\text{C}/\text{W}$
Junction temperature	$T_j$	150	$^\circ\text{C}$
Storage temperature	$T_{stg}$	-65 to +150	$^\circ\text{C}$

### ■ Electrical Characteristics $T_a = 25^\circ\text{C}$

Parameter	Symbol	Testconditons	Min	Typ	Max	Unit
Collector to emitter breakdown voltage	$V_{CEO}$	$I_C=30\text{mA}$	60			V
Collector to emitter breakdown voltage	$V_{CER}$	$I_C=30\text{mA}, R_{BE}=100\ \Omega$	70			V
Collctor cutoff current	$I_{CE0}$	$V_{CE}=30\text{V}$			700	$\mu\text{A}$
	$I_{CEV}$	$V_{CE}=100\text{V}, V_{EB}=1.5\text{V}$			1.0	mA
Emitter cutoff current	$I_{EBO}$	$V_{EB} = 7.0\text{V}$			5.0	mA
DC current gain	$h_{FE}$	$I_C = 4.0\text{A}; V_{CE} = 4.0\text{V}$	20		70	
		$I_C = 6.0\text{A}; V_{CE} = 4.0\text{V}$	5.0			
Collector to emitter saturation voltage	$V_{CE(sat)}$	$I_C = 4.0\text{A}; I_B = 400\text{mA}$			1.1	V
Base to emitter ON voltage	$V_{BE(on)}$	$V_{CE}=4.0\text{V}, I_C=4.0\text{A}$			1.5	V
Transition frequency	$f_T$	$I_C = 500\text{mA}; V_{CE} = 10\text{V}; f = 1.0\text{MHz}$	2.5			MHz