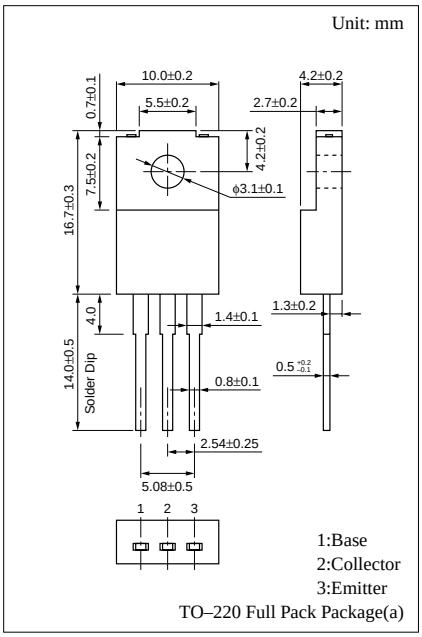
# 2SD1264, 2SD1264A

## Silicon NPN triple diffusion planar type

For low-freauency power amplification
For TV vertical deflection output
Complementary to 2SB940 and 2SB940A




### Features

- High collector to emitter $V_{CEO}$
- Large collector power dissipation $P_C$
- Full-pack package which can be installed to the heat sink with one screw

### Absolute Maximum Ratings ($T_C$=25˚C)

| Parameter | | Symbol | Ratings | Unit |
|---|---|---|---|---|
| Collector to base voltage | | $V_{CBO}$ | 200 | V |
| Collector to emitter voltage | 2SD1264 | $V_{CEO}$ | 150 | V |
| | 2SD1264A | | 180 | |
| Emitter to base voltage | | $V_{EBO}$ | 6 | V |
| Peak collector current | | $I_{CP}$ | 3 | A |
| Collector current | | $I_C$ | 2 | A |
| Collector power dissipation | $T_C$=25°C | $P_C$ | 30 | W |
| | Ta=25°C | | 2 | |
| Junction temperature | | $T_j$ | 150 | ˚C |
| Storage temperature | | $T_{stg}$ | –55 to +150 | ˚C |

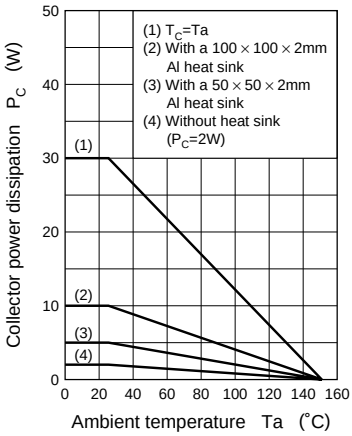
### Electrical Characteristics ($T_C$=25˚C)

| Parameter | | Symbol | Conditions | min | typ | max | Unit |
|---|---|---|---|---|---|---|---|
| Collector cutoff current | | $I_{CBO}$ | $V_{CB}$ = 200V, $I_E$ = 0 | | | 50 | μA |
| Emitter cutoff current | | $I_{EBO}$ | $V_{EB}$ = 4V, $I_C$ = 0 | | | 50 | μA |
| Collector to base voltage | | $V_{CBO}$ | $I_C$ = 50μA, $I_E$ = 0 | 200 | | | V |
| Collector to emitter voltage | 2SD1264 | $V_{CEO}$ | $I_C$ = 5mA, $I_B$ = 0 | 150 | | | V |
| | 2SD1264A | | | 180 | | | |
| Emitter to base voltage | | $V_{EBO}$ | $I_E$ = 500μA, $I_C$ = 0 | 6 | | | V |
| Forward current transfer ratio | | $h_{FE1}$* | $V_{CE}$ = 10V, $I_C$ = 150mA | 60 | | 240 | |
| | | $h_{FE2}$ | $V_{CE}$ = 10V, $I_C$ = 400mA | 50 | | | |
| Base to emitter voltage | | $V_{BE}$ | $V_{CE}$ = 10V, $I_C$ = 400mA | | | 1 | V |
| Collector to emitter saturation voltage | | $V_{CE(sat)}$ | $I_C$ = 500mA, $I_B$ = 50mA | | | 1 | V |
| Transition frequency | | $f_T$ | $V_{CE}$ = 5V, $I_C$ = 0.5A, f = 1MHz | | 20 | | MHz |

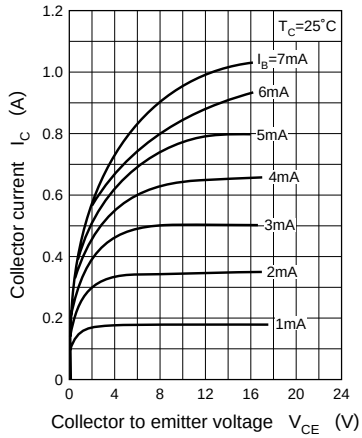
*$h_{FE1}$ Rank classification

| Rank | Q | P |
|---|---|---|
| $h_{FE1}$ | 60 to 140 | 100 to 240 |

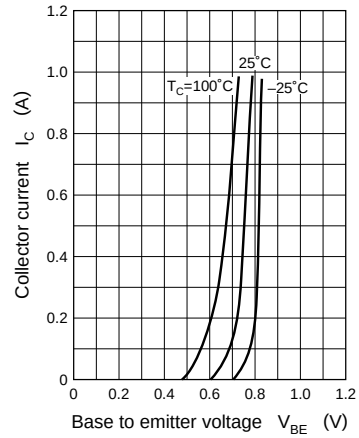
$P_C$ — Ta



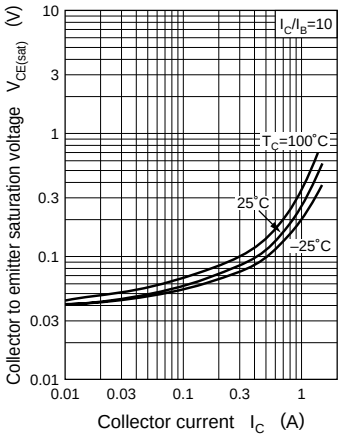

$I_C$ — $V_{CE}$



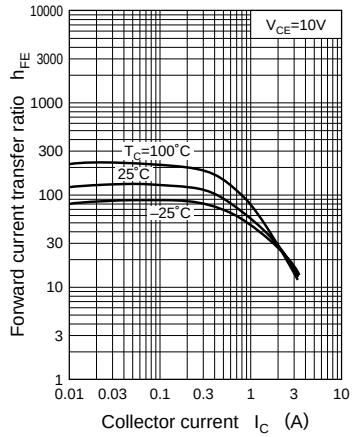

$I_C$ — $V_{BE}$



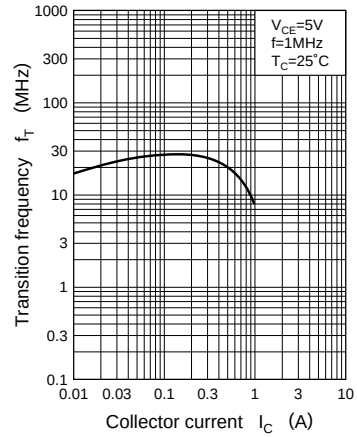

$V_{CE(sat)}$ — $I_C$



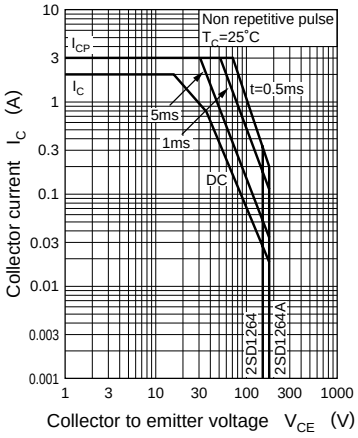

$h_{FE}$ — $I_C$




$f_T$ — $I_C$




Area of safe operation (ASO)




$R_{th(t)}$ — t