

SANYO

No.3241

2SC4449

NPN Triple Diffused Planar Silicon Transistor

TV Camera Deflection,
High-Voltage Driver Applications**Features**

- High breakdown voltage
- Small reverse transfer capacitance and excellent high frequency characteristic
- Excellent DC current gain
- Adoption of FBET process

Absolute Maximum Ratings at Ta = 25°C

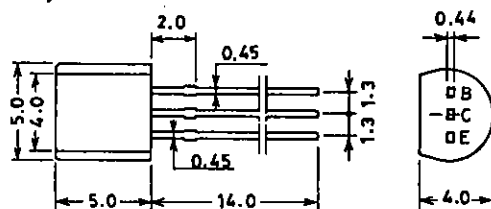
| | | | unit |
|------------------------------|-----------|-------------|------|
| Collector to Base Voltage | V_{CB0} | 300 | V |
| Collector to Emitter Voltage | V_{CE0} | 300 | V |
| Emitter to Base Voltage | V_{EB0} | 5 | V |
| Collector Current | I_C | 50 | mA |
| Collector Current(Pulse) | I_{CP} | 100 | mA |
| Collector Dissipation | P_C | 600 | mW |
| Junction Temperature | T_j | 150 | °C |
| Storage Temperature | T_{stg} | -55 to +150 | °C |

Electrical Characteristics at Ta = 25°C

| | | | min | typ | max | unit |
|------------------------------|------------------------|--------------------------|-----|------|-----|---------|
| Collector Cutoff Current | I_{CB0} | $V_{CB}=200V, I_E=0$ | | | 0.1 | μA |
| Emitter Cutoff Current | I_{EB0} | $V_{EB}=4V, I_C=0$ | | | 0.1 | μA |
| DC Current Gain | $h_{FE(1)}$ | $V_{CE}=6V, I_C=0.1mA$ | 100 | | 320 | |
| | $h_{FE(2)}$ | $V_{CE}=6V, I_C=1mA$ | 100 | | | |
| DC Current Gain Ratio | $h_{FE \text{ ratio}}$ | $h_{FE(1)}/h_{FE(2)}$ | | 0.95 | | |
| Gain-Bandwidth Product | f_T | $V_{CE}=30V, I_C=10mA$ | | 70 | | MHz |
| C-E Saturation Voltage | $V_{CE(sat)}$ | $I_C=10mA, I_B=1mA$ | | | 1.0 | V |
| B-E Saturation Voltage | $V_{BE(sat)}$ | $I_C=10mA, I_B=1mA$ | | | 1.0 | V |
| C-B Breakdown Voltage | $V_{(BR)CBO}$ | $I_C=10\mu A, I_E=0$ | 300 | | | V |
| C-E Breakdown Voltage | $V_{(BR)CEO}$ | $I_C=1mA, R_{BE}=\infty$ | 300 | | | V |
| E-B Breakdown Voltage | $V_{(BR)EBO}$ | $I_E=10\mu A, I_C=0$ | 5 | | | V |
| Output Capacitance | c_{ob} | $V_{CB}=30V, f=1MHz$ | | 1.5 | | pF |
| Reverse Transfer Capacitance | c_{re} | $V_{CB}=30V, f=1MHz$ | | 1.0 | | pF |

※ : The 2SC4449 is classified by 0.1mA h_{FE} as follows :

| | | | | | |
|-----|---|-----|-----|---|-----|
| 100 | E | 200 | 160 | F | 320 |
|-----|---|-----|-----|---|-----|

Package Dimensions 2003A
(unit: mm)

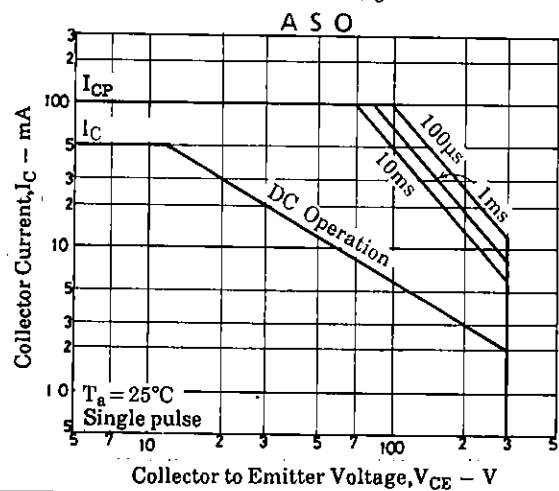
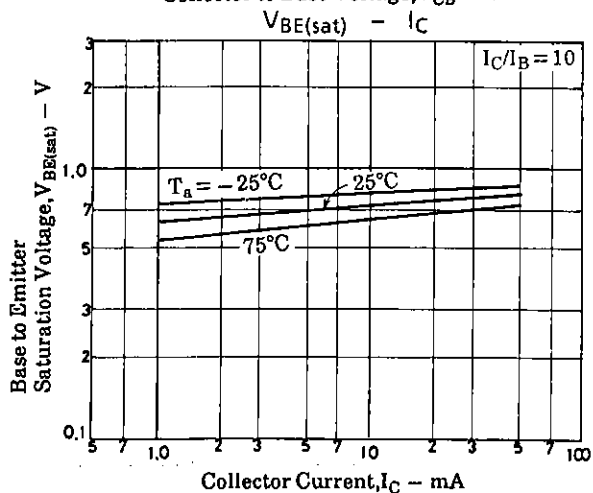
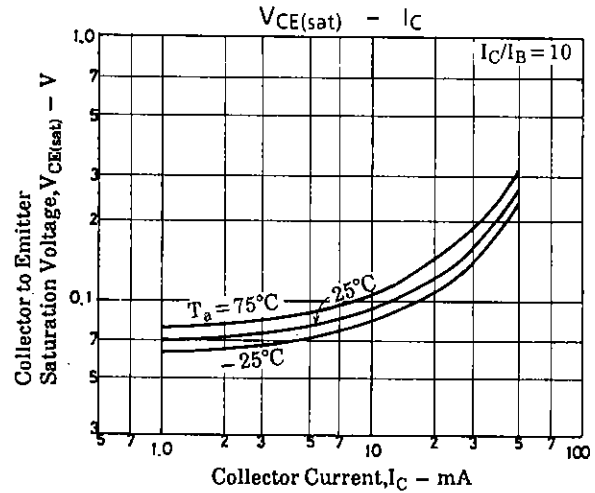
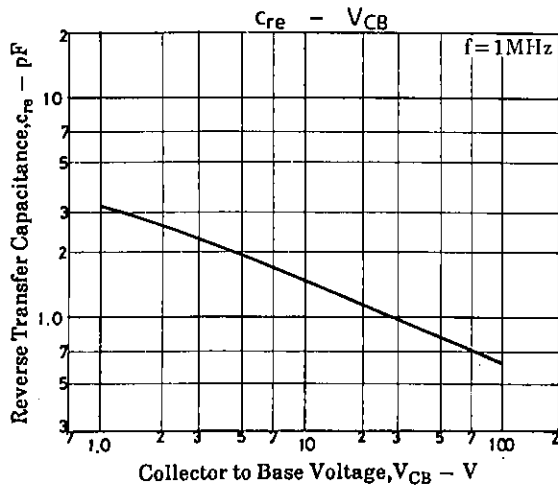
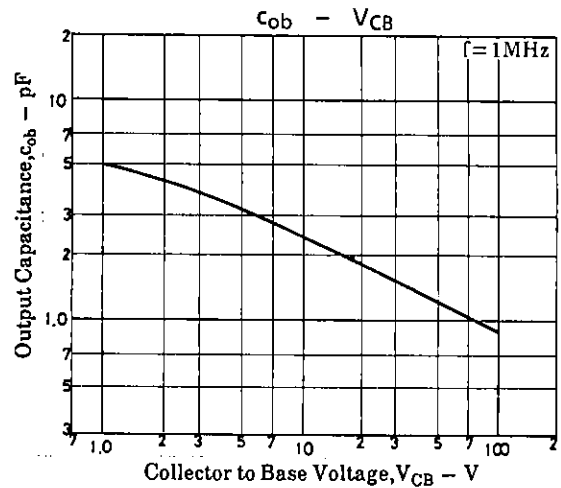
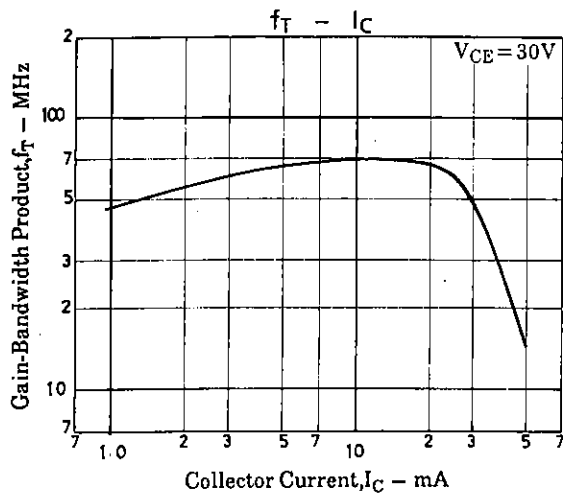
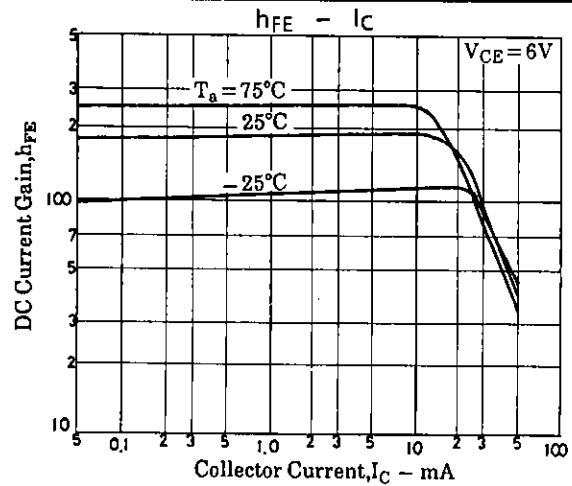
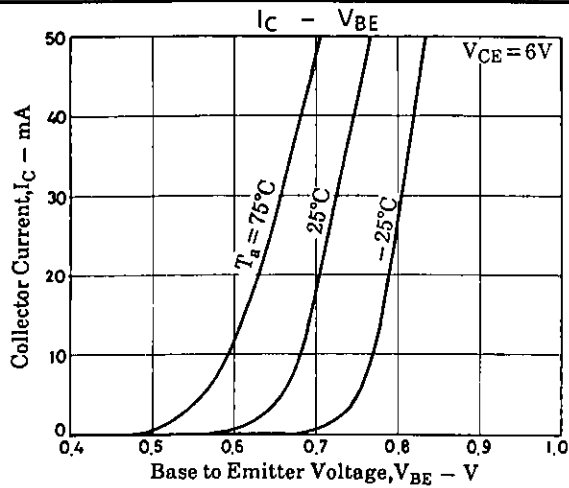
JEDEC: TO-92
EIAJ : SC-43
SANYO: NP

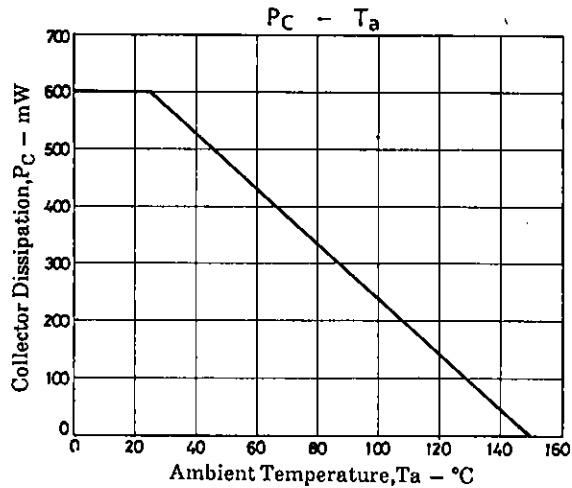
B: Base
C: Collector
E: Emitter

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O269MO, TS No.3241-1/3





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