



PRODUCT NAME : 2N6517 NPN High-Voltage Transistor

PRICE : Rs 20.00

SKU : RM2108



DESCRIPTION

Features

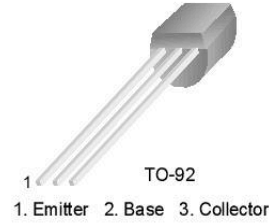
- Collector-Emitter Volt (V_{ce0}): 350V
- Collector-Base Volt (V_{cbo}): 350V
- Collector Current (I_c): 0.5A
- h_{fe} : 30-200 @ 30mA
- Power Dissipation (P_{tot}): 625mW
- Current-Gain-Bandwidth (f_{total}): 40MHz
- Type: NPN



2N6517

High Voltage Transistor

- Collector-Emitter Voltage: $V_{CE0}=350V$
- Collector Dissipation: P_C (max)=625mW
- Complement to 2N6520
- Suffix "-C" means Center Collector (1. Emitter 2. Collector 3. Base)



NPN Epitaxial Silicon Transistor

Absolute Maximum Ratings $T_a=25^\circ C$ unless otherwise noted

| Symbol | Parameter | Value | Units |
|-----------|-----------------------------|-----------|------------|
| V_{CBO} | Collector-Base Voltage | 350 | V |
| V_{CEO} | Collector-Emitter Voltage | 350 | V |
| V_{EBO} | Emitter-Base Voltage | 6 | V |
| I_C | Collector Current | 500 | mA |
| P_C | Collector Power Dissipation | 625 | mW |
| T_J | Junction Temperature | 150 | $^\circ C$ |
| T_{STG} | Storage Temperature | -55 ~ 150 | $^\circ C$ |

• Refer to 2N6515 for graphs

Electrical Characteristics $T_a=25^\circ C$ unless otherwise noted

| Symbol | Parameter | Test Condition | Min. | Typ. | Max. | Units |
|---------------|---------------------------------------|--|----------------------------|------|-------------------------|------------------|
| BV_{CEO} | * Collector-Emitter Breakdown Voltage | $I_C=1mA, I_B=0$ | 350 | | | V |
| BV_{CBO} | Collector-Base Breakdown Voltage | $I_C=100\mu A, I_E=0$ | 350 | | | V |
| BV_{EBO} | Emitter-Base Breakdown Voltage | $I_E=10\mu A, I_C=0$ | 6 | | | V |
| I_{CBO} | Collector Cut-off Current | $V_{CB}=250V, I_E=0$ | | | 50 | nA |
| I_{EBO} | Emitter Cut-off Current | $V_{EB}=5V, I_C=0$ | | | 50 | nA |
| h_{FE} | * DC Current Gain | $I_C=1mA, V_{CE}=10V$ $I_C=10mA, V_{CE}=10V$ $I_C=30mA, V_{CE}=10V$ $I_C=50mA, V_{CE}=10V$ $I_C=100mA, V_{CE}=10V$ | 20 30 30 20 15 | | 200 200 | |
| $V_{CE(sat)}$ | Collector-Emitter Saturation Voltage | $I_C=10mA, I_B=1mA$ $I_C=20mA, I_B=2mA$ $I_C=30mA, I_B=3mA$ $I_C=50mA, I_B=5mA$ | | | 0.3 0.35 0.5 1 | V V V V |
| $V_{BE(sat)}$ | Base-Emitter Saturation Voltage | $I_C=10mA, I_B=1mA$ $I_C=20mA, I_B=2mA$ $I_C=30mA, I_B=3mA$ | | | 0.75 0.85 0.9 | V V V |
| C_{ob} | Output Capacitance | $V_{CB}=20V, I_E=0, f=1MHz$ | | | 6 | pF |
| f_T | * Current Gain Bandwidth Product | $I_C=10mA, V_{CE}=20V, f=20MHz$ | 40 | | 200 | MHz |
| $V_{BE(on)}$ | Base Emitter On Voltage | $I_C=100mA, V_{CE}=10V$ | | | 2 | V |

* Pulse Test: Pulse Width $\leq 300\mu s$, Duty Cycle $\leq 2\%$

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|--------------------------|------------------------|---|
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