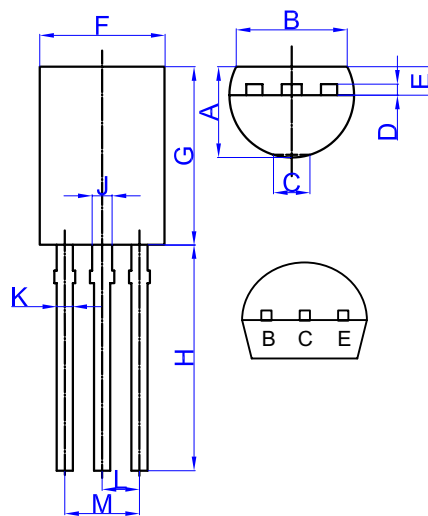




2SD667L

NPN Plastic-Encapsulate Transistor

TO-92L



Features

- Low Frequency Power Amplifier
- Complementary Pair with 2SB647/A
- Epoxy meets UL 94 V-0 flammability rating
- Moisture Sensitivity Level 1
- Lead Free Finish/Rohs Compliant ("P" Suffix designates)
- Compliant. See ordering information)

Maximum Ratings

| Symbol | Rating | Rating | Unit |
|-------------------|----------------------------------------|-------------|------|
| V _{CEO} | Collector-Emitter Voltage | 80 | V |
| V _{CBO} | Collector-Base Voltage | 120 | V |
| V _{EBO} | Emitter-Base Voltage | 5.0 | V |
| I _C | Collector Current | 1 | A |
| P _C | Collector Power Dissipation | 900 | mW |
| R _{thJA} | Thermal Resistance Junction to Ambient | 139 | °C/W |
| T _J | Operating Junction Temperature | -55 to +150 | °C |
| T _{STG} | Storage Temperature | -55 to +150 | °C |

Electrical Characteristics @ 25°C Unless Otherwise Specified

| Symbol | Parameter | Min | Typ | Max | Units |
|--------|-----------|-----|-----|-----|-------|
|--------|-----------|-----|-----|-----|-------|

OFF CHARACTERISTICS

| | | | | | |
|----------------------|-----------------------------------------------------------------------------------|-----|-----|-----|------|
| V _{(BR)CBO} | Collector-Base Breakdown Voltage (I _C =10μAdc, I _E =0) | 120 | --- | --- | Vdc |
| V _{(BR)CEO} | Collector-Emitter Breakdown Voltage (I _C =1mAdc, I _B =0) | 80 | --- | --- | Vdc |
| V _{(BR)EBO} | Emitter-Base Breakdown Voltage (I _E =10μAdc, I _C =0) | 5.0 | --- | --- | Vdc |
| I _{CBO} | Collector Cutoff Current (V _{CB} =100Vdc, I _E =0) | --- | --- | 10 | μAdc |
| I _{EBO} | Emitter Cutoff Current (V _{EB} =4.0Vdc, I _C =0) | --- | --- | 10 | μAdc |

ON CHARACTERISTICS

| | | | | | |
|----------------------|----------------------------------------------------------------------------------------------------------------------------------------|-----|-----|-----|-----|
| h _{FE} | DC Current gain ⁽¹⁾ (I _C =150mAdc, V _{CE} =5Vdc) (I _C =500mAdc, V _{CE} =5Vdc) | 60 | --- | 320 | --- |
| V _{CE(sat)} | Collector-Emitter Saturation Voltage (I _C =500mAdc, I _B =50mAdc) | --- | --- | 1.0 | Vdc |
| V _{BE} | Base- Emitter Voltage (I _C =150mAdc, V _{CE} =5Vdc) | --- | --- | 1.5 | Vdc |
| f _T | Transistor Frequency (I _C =150mAdc, V _{CE} =5Vdc) | --- | 140 | --- | MHz |
| C _{ob} | Collector Output Capacitance (V _{CB} =10Vdc, I _E =0, f=1.0MHz) | --- | 12 | --- | pF |

(1) h_{FE}Classification B: 60-120, C: 100-200,D:160-320

| DIM | INCHES | | MM | | NOTE |
|-----|--------|-------|-------|-------|------|
| | MIN | MAX | MIN | MAX | |
| A | .146 | .161 | 3.700 | 4.10 | |
| B | .157 | --- | 4.000 | --- | |
| C | --- | 0.063 | --- | 1.600 | |
| D | .014 | .018 | 0.350 | 0.450 | |
| E | .050 | .062 | 1.280 | 1.580 | |
| F | .185 | .201 | 4.700 | 5.100 | |
| G | .307 | .323 | 7.800 | 8.200 | |
| H | .543 | .559 | 13.80 | 14.20 | |
| J | .024 | .031 | .600 | .800 | |
| K | .014 | .022 | 0.350 | .550 | |
| L | --- | .050 | --- | 1.270 | |
| M | .096 | .104 | 2.440 | 2.640 | |



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Ordering Information :

| Device | Packing |
|----------------|------------------------------|
| Part Number-AP | Ammo Packing: 2Kpcs/Ammo Box |
| Part Number-BP | Bulk: 50Kpcs/Carton |

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