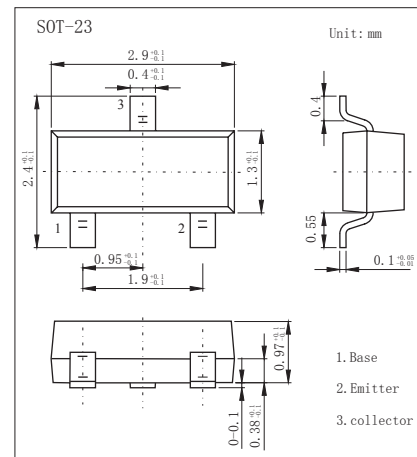


NPN Transistors

KST9014

■ Features

- Excellent hFE linearity
- Collector Current :Ic=0.1A



■ Absolute Maximum Ratings Ta = 25°C

| Parameter | Symbol | Rating | Unit |
|-------------------------------|------------------|------------|------|
| Collector-Base Voltage | V _{CB0} | 50 | V |
| Collector-Emitter Voltage | V _{CEO} | 45 | V |
| Emitter-Base Voltage | V _{EB0} | 5 | V |
| Collector Current -Continuous | I _C | 0.1 | A |
| Collector Power Dissipation | P _C | 0.2 | W |
| Junction Temperature | T _J | 150 | °C |
| Storage Temperature | T _{stg} | -55 to 150 | °C |

■ Electrical Characteristics Ta = 25°C

| Parameter | Symbol | Testconditions | Min | Typ | Max | Unit |
|--------------------------------------|----------------------|--|-----|-----|------|------|
| Collector-base breakdown voltage | V _{CB0} | I _C =100uA, I _E =0 | 50 | | | V |
| Collector-emitter breakdown voltage | V _{CEO} | I _C =1mA, I _B =0 | 45 | | | V |
| Emitter-base Breakdown voltage | V _{EB0} | I _E =100 μ A, I _C =0 | 5 | | | V |
| Collector cutoff current | I _{CB0} | V _{CB} =50V, I _E =0 | | | 0.1 | μ A |
| Emitter cutoff current | I _{EB0} | V _{EB} =5V, I _C =0 | | | 0.1 | μ A |
| DC current gain | h _{FE} | V _{CE} =5V, I _C =1mA | 200 | | 1000 | |
| Collector-emitter saturation voltage | V _{CE(sat)} | I _C =100mA, I _B =10mA | | | 0.3 | V |
| Base-emitter saturation voltage | V _{BE(sat)} | I _C =100mA, I _B =10mA | | | 1 | V |
| Transition frequency | f _T | V _{CE} =5V, I _C =10mA, f=30MHZ | 150 | | | MHZ |

■ hFE Classification

| Type | KST9014-L | KST9014-H |
|---------|-----------|-----------|
| Range | 200-450 | 450-1000 |
| Marking | J6 | |

KST9014

Typical Characteristics

