Elektronische Bauelemente

# SCS0520V-C

**0.5A, 20V**

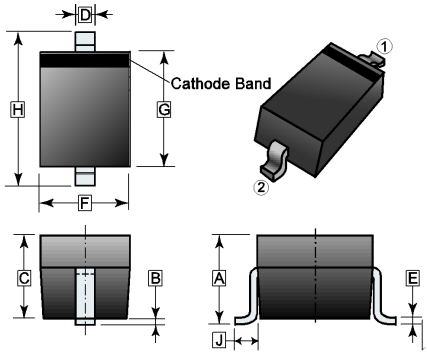
**Schottky Barrier Rectifiers**

RoHS Compliant Product
A suffix of “-C” specifies halogen & lead-free

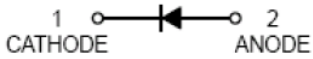
## FEATURES

- High Current Capability
- Extremely Low Thermal Resistance
- For Surface Mount Application
- Higher Temp Soldering: 250℃ for 10 Seconds at Term inals
- Low Forward Voltage

**SOD-323**




| REF. | Millimeter | | REF. | Millimeter | |
|---|---|---|---|---|---|
| | Min. | Max. | | Min. | Max. |
| A | 1.05 REF. | | F | 1.15 | 1.45 |
| B | 0.20 REF. | | G | 1.6 | 1.9 |
| C | 0.80 | 1.00 | H | 2.30 | 2.75 |
| D | 0.25 | 0.40 | J | 0.475 REF | |
| E | 0.080 | 0.20 | | | |




## MECHANICAL DATA

- Case: Molded Plastic
- Epoxy: UL 94V-0 Rate Flame Retardant
- Lead: Solderable Per MIL-STD-202, Method 208 Guaranteed
- Polarity: Color Band Denotes Cathode End
- Mounting Position: Any

## MARKING

| SD |
|---|

## PACKAGE INFORMATION

| Package | MPQ | Leader Size |
|---|---|---|
| SOD-323 | 3K | 7 inch |

## ORDER INFORMATION

| Part Number | Type |
|---|---|
| SCS0520V-C | Lead (Pb)-free and Halogen-free |

## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS ($T_A$=25℃ unless otherwise specified.)

| Parameter | | Symbol | Ratings | Unit |
|---|---|---|---|---|
| Maximum Recurrent Peak Reverse Voltage | | $V_{RRM}$ | 20 | V |
| Working Peak Reverse Voltage | | $V_{RWM}$ | 20 | V |
| Maximum DC Blocking Voltage | | $V_R$ | 20 | V |
| Average Forward Current @$T_J$=25℃ | | $I_{F(AV)}$ | 0.5 | A |
| Peak Forward Current @8.3ms Half Sine | | $I_{FSM}$ | 10 | A |
| Maximum Instantaneous Forward Voltage @$I_{FM}$=0.5A | $T_A$=25℃ | $V_F$ | 0.45 | V |
| | $T_A$=125℃ | | 0.35 | |
| Maximum DC Reverse Current @Rated DC Blocking Voltage | $T_J$=25℃ | $I_R$ | 0.1 | mA |
| | $T_J$=125℃ | | 5 | |
| Typical Junction Capacitance [1] | | $C_J$ | 170 | pF |
| Typical Thermal Resistance from Junction-Ambient [2] | | $R_{\theta JA}$ | 488 | ℃/W |
| Operating and Storage Temperature Range | | $T_J$, $T_{STG}$ | -55~150 | ℃ |

Notes:
1. Measured at 1MHZ and applied reverse of 0V DC.
2. FR-4 PCB, 2oz. 0.65mm×1.35mm copper pad.

## RATINGS AND CHARACTERISTIC CURVES