

## 4.0kV 5mA HIGH VOLTAGE DIODES

ZB04 is high reliability resin molded type high voltage diode in small size package which is sealed a multilayered mesa type silicon chip by epoxy resin.

### Features

- High speed switching
- High Current
- High surge resistivity for CRT discharge
- High reliability design
- High Voltage

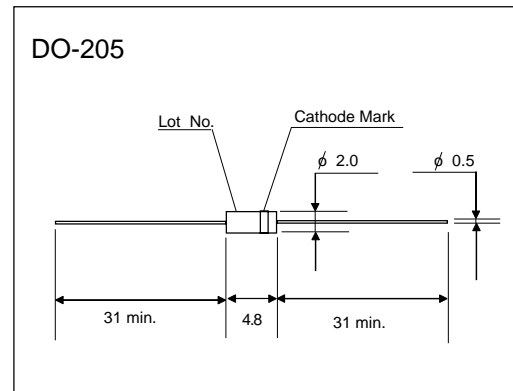
### Applications

- X light Power supply
- Laser
- Voltage doubler circuit
- Microwave emission power

### Maximum Ratings and Characteristics

- Absolute Maximum Ratings

### Outline Drawings : mm



### Cathode Mark

Type	Mark
ZB04	

Items	Symbols	Condition	ZB04	Units
Repetitive Peak Reverse Voltage	$V_{RRM}$		4.0	kV
Average Output Current	$I_o$	$T_a=25^{\circ}\text{C}$ , Resistive Load	5.0	$\text{mA}_{\text{peak}}$
Surge Current	$I_{FSM}$		0.5	$\text{A}_{\text{peak}}$
Junction Temperature	$T_j$		120	$^{\circ}\text{C}$
Allowable Operation Case Temperature	$T_c$		120	$^{\circ}\text{C}$
Storage Temperature	$T_{stg}$		-40 to +120	$^{\circ}\text{C}$

- Electrical Characteristics ( $T_a=25^{\circ}\text{C}$  Unless otherwise specified)

Items	Symbols	Conditions	ZB04	Units
Maximum Forward Voltage Drop	$V_F$	at $25^{\circ}\text{C}$ , $I_F = I_{F(AV)}$	18	V
Maximum Reverse Current	$I_{R1}$	at $25^{\circ}\text{C}$ , $V_R = V_{RRM}$	2.0	$\mu\text{A}$
	$I_{R2}$	at $100^{\circ}\text{C}$ , $V_R = V_{RRM}$	5.0	$\mu\text{A}$
Maximum Reverse Recovery Time	$T_{rr}$	at $25^{\circ}\text{C}$	100	nS
Junction Capacitance	$C_j$	at $25^{\circ}\text{C}$ , $V_R=0\text{V}$ , $f=1\text{MHz}$	1.0	pF