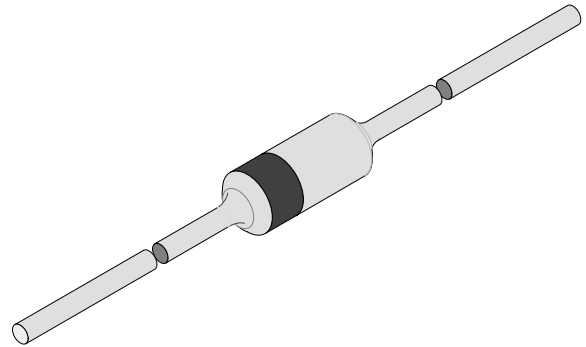


Silicon Z-Diodes

Features

- Very sharp reverse characteristic
- Very high stability
- Low reverse current level
- V_Z -tolerance $\pm 5\%$



94 9367

Applications

Voltage stabilization

Absolute Maximum Ratings

$T_j = 25^\circ\text{C}$

Parameter	Test Conditions	Type	Symbol	Value	Unit
Power dissipation	$T_L \leq 75^\circ\text{C}$		P_V	500	mW
Z-current			I_Z	P_V/V_Z	mA
Junction temperature			T_j	200	$^\circ\text{C}$
Storage temperature range			T_{stg}	-65...+200	$^\circ\text{C}$

Maximum Thermal Resistance

$T_j = 25^\circ\text{C}$

Parameter	Test Conditions	Symbol	Value	Unit
Junction ambient	$l=9.5\text{mm}$ (3/8"), $T_L=\text{constant}$	R_{thJA}	300	K/W

Characteristics

$T_j = 25^\circ\text{C}$

Parameter	Test Conditions	Type	Symbol	Min	Typ	Max	Unit
Forward voltage	$I_F=200\text{mA}$		V_F			1.1	V

Type	V _{Znom} ¹⁾ V	I _{ZT} for mA	r _{zjT} Ω	I _R and μA max	I _{R1} * μA max	at V _R V	TK _{VZ} %/K
1N746A	3.3	20	< 28	10	30	1.0	< +0.091
1N747A	3.6	20	< 24	10	30	1.0	< +0.091
1N748A	3.9	20	< 23	10	30	1.0	< +0.092
1N749A	4.3	20	< 22	2	30	1.0	< +0.093
1N750A	4.7	20	< 19	2	30	1.0	< +0.094
1N751A	5.1	20	< 17	1	20	1.0	< +0.095
1N752A	5.6	20	< 11	1	10	1.0	< +0.095
1N753A	6.2	20	< 7	0.1	10	1.0	< +0.096
1N754A	6.8	20	< 5	0.1	20	1.0	< +0.096
1N755A	7.5	20	< 6	0.1	20	1.0	< +0.097
1N756A	8.2	20	< 8	0.1	20	1.0	< +0.097
1N757A	9.1	20	< 10	0.1	20	1.0	< +0.097
1N758A	10	20	< 17	0.1	20	1.0	< +0.098
1N759A	12	20	< 30	0.1	20	1.0	< +0.098

1) Based on dc measurement at thermal equilibrium; * T_j = 150 °C
 lead length = 9.5 mm (3/8");
 thermal resistance of heat sink = 30 K/W.

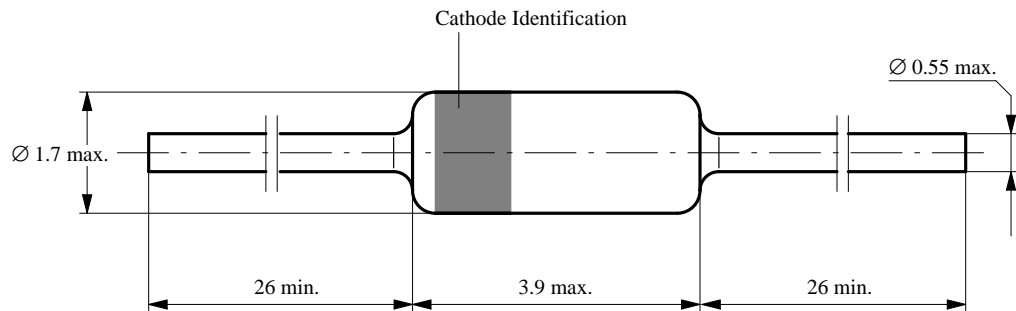
Dimensions in mm



technical drawings
according to DIN
specifications

94 9366

Standard Glass Case
54 A 2 DIN 41880
JEDEC DO 35
Weight max. 0.3 g



Ozone Depleting Substances Policy Statement

It is the policy of **TEMIC TELEFUNKEN microelectronic GmbH** to

1. Meet all present and future national and international statutory requirements.
2. Regularly and continuously improve the performance of our products, processes, distribution and operating systems with respect to their impact on the health and safety of our employees and the public, as well as their impact on the environment.

It is particular concern to control or eliminate releases of those substances into the atmosphere which are known as ozone depleting substances (ODSs).

The Montreal Protocol (1987) and its London Amendments (1990) intend to severely restrict the use of ODSs and forbid their use within the next ten years. Various national and international initiatives are pressing for an earlier ban on these substances.

TEMIC TELEFUNKEN microelectronic GmbH semiconductor division has been able to use its policy of continuous improvements to eliminate the use of ODSs listed in the following documents.

1. Annex A, B and list of transitional substances of the Montreal Protocol and the London Amendments respectively
2. Class I and II ozone depleting substances in the Clean Air Act Amendments of 1990 by the Environmental Protection Agency (EPA) in the USA
3. Council Decision 88/540/EEC and 91/690/EEC Annex A, B and C (transitional substances) respectively.

TEMIC can certify that our semiconductors are not manufactured with ozone depleting substances and do not contain such substances.

We reserve the right to make changes to improve technical design and may do so without further notice.

Parameters can vary in different applications. All operating parameters must be validated for each customer application by the customer. Should the buyer use TEMIC products for any unintended or unauthorized application, the buyer shall indemnify TEMIC against all claims, costs, damages, and expenses, arising out of, directly or indirectly, any claim of personal damage, injury or death associated with such unintended or unauthorized use.

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