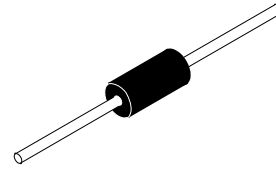


Zener Diodes

1N4728A - 1N4758A



AXIAL LEAD
CASE 017AH

ABSOLUTE MAXIMUM RATINGS (Note 1)

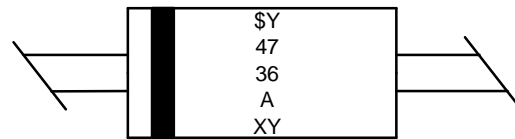
T_a = 25°C unless otherwise noted

Symbol	Parameter	Value	Unit
P _D	Power Dissipation @ TL ≤ 50°C, Lead Length = 3/8"	1.0	W
	Derate above 50°C	6.67	mW/°C
T _J , T _{STG}	Operating and Storage Temperature Range	-65 to +200	°C

Stresses exceeding those listed in the Maximum Ratings table may damage the device. If any of these limits are exceeded, device functionality should not be assumed, damage may occur and reliability may be affected.

1. These ratings are limiting values above which the serviceability of the diode may be impaired.

MARKING DIAGRAM



\$Y = Logo
4736A = Specific Device Code
XY = Date Code

ORDERING INFORMATION

See detailed ordering and shipping information on page 3 of this data sheet.

1N4728A – 1N4758A

ELECTRICAL CHARACTERISTICS $T_a = 25^\circ\text{C}$ unless otherwise noted

Device	V_Z (V) @ I_Z (Note 2)			Test Current I_Z (mA)	Max. Zener Impedance			Leakage Current		Non-Repetitive Peak Reverse Current I_{ZSM} (mA) (Note 3)
	Min.	Typ.	Max.		Z_Z @ I_Z (Ω)	Z_{ZK} @ I_{ZK} (Ω)	I_{ZK} (mA)	I_R (μA)	V_R (V)	
1N4728A	3.135	3.3	3.465	76	10	400	1	100	1	1380
1N4732A	4.465	4.7	4.935	53	8	500	1	10	1	970
1N4733A	4.845	5.1	5.355	49	7	550	1	10	1	890
1N4734A	5.32	5.6	5.88	45	5	600	1	10	2	810
1N4735A	5.89	6.2	6.51	41	2	700	1	10	3	730
1N4736A	6.46	6.8	7.14	37	3.5	700	1	10	4	660
1N4737A	7.125	7.5	7.875	34	4	700	0.5	10	5	605
1N4738A	7.79	8.2	8.61	31	4.5	700	0.5	10	6	550
1N4739A	8.645	9.1	9.555	28	5	700	0.5	10	7	500
1N4740A	9.5	10	10.5	25	7	700	0.25	10	7.6	454
1N4741A	10.45	11	11.55	23	8	700	0.25	5	8.4	414
1N4742A	11.4	12	12.6	21	9	700	0.25	5	9.1	380
1N4743A	12.35	13	13.65	19	10	700	0.25	5	9.9	344
1N4744A	14.25	15	15.75	17	14	700	0.25	5	11.4	304
1N4745A	15.2	16	16.8	15.5	16	700	0.25	5	12.2	285
1N4746A	17.1	18	18.9	14	20	750	0.25	5	13.7	250
1N4747A	19	20	21	12.5	22	750	0.25	5	15.2	225
1N4748A	20.9	22	23.1	11.5	23	750	0.25	5	16.7	205
1N4749A	22.8	24	25.2	10.5	25	750	0.25	5	18.2	190
1N4750A	25.65	27	28.35	9.5	35	750	0.25	5	20.6	170
1N4751A	28.5	30	31.5	8.5	40	1000	0.25	5	22.8	150
1N4752A	31.35	33	34.65	7.5	45	1000	0.25	5	25.1	135
1N4753A	34.2	36	37.8	7	50	1000	0.25	5	27.4	125
1N4754A	37.05	39	40.95	6.5	60	1000	0.25	5	29.7	115
1N4755A	40.85	43	45.15	6	70	1500	0.25	5	32.7	110
1N4756A	44.65	47	49.35	5.5	80	1500	0.25	5	35.8	95
1N4757A	48.45	51	53.55	5	95	1500	0.25	5	38.8	90
1N4758A	53.2	56	58.8	4.5	110	2000	0.25	5	42.6	80

Product parametric performance is indicated in the Electrical Characteristics for the listed test conditions, unless otherwise noted. Product performance may not be indicated by the Electrical Characteristics if operated under different conditions.

NOTES:

- Zener Voltage (V_Z).
The zener voltage is measured with the device junction in the thermal equilibrium at the lead temperature (T_L) at $30^\circ\text{C} \pm 1^\circ\text{C}$ and 3/8" lead length.
- 2 Square wave Reverse Surge at 8.3 ms soak time.

1N4728A – 1N4758A

TOP MARKING AND ORDERING INFORMATION

Device	Top Marking					Package	Shipping†						
	Line 1	Line 2	Line 3	Line 4	Line 5								
1N4728A	LOGO	47	28	A	XY	Axial Lead (Pb – Free / Halide Free)	3000 / Bulk Bag						
1N4728A–T50A							3000 / Fan–Fold						
1N4728ATR							3000 / Tape and Reel						
1N4732A			32				3000 / Bulk Bag						
1N4732A–T50A							3000 / Fan–Fold						
1N4732ATR							3000 / Tape and Reel						
1N4733A			LOGO				47	33	A	XY	Axial Lead (Pb – Free / Halide Free)	3000 / Bulk Bag	
1N4733A–T50A												3000 / Fan–Fold	
1N4733A–T50R												3000 / Tape and Reel	
1N4733ATR								34				3000 / Tape and Reel	
1N4734A												35	3000 / Bulk Bag
1N4734A–T50A													3000 / Fan–Fold
1N4734A–T50R								36					3000 / Tape and Reel
1N4734ATR												37	3000 / Tape and Reel
1N4735A													38
1N4735A–T50A								39					
1N4735A–T50R												40	
1N4735ATR													41
1N4736A								42					
1N4736A–T50A												43	
1N4736A–T50R													44
1N4736ATR								45					
1N4737A												46	
1N4737A–T50A													47
1N4737ATR								48					
1N4738A												49	
1N4738A–T50A													50
1N4738A–T50R								51					
1N4738ATR												52	
1N4739A													53
1N4739A–T50A								54					
1N4739ATR												55	
1N4740A													56
1N4740A–T50A								57					
1N4740ATR												58	
1N4741A													59
1N4741A–T50A								60					
1N4741ATR												61	
1N4742A													62
1N4742A–T50A								63					
1N4742ATR												64	

1N4728A – 1N4758A

TOP MARKING AND ORDERING INFORMATION (continued)

Device	Top Marking					Package	Shipping†						
	Line 1	Line 2	Line 3	Line 4	Line 5								
1N4743A	LOGO	47	43	A	XY	Axial Lead (Pb – Free / Halide Free)	3000 / Bulk Bag						
1N4743A–T50A							3000 / Fan–Fold						
1N4743ATR							3000 / Tape and Reel						
1N4744A			44				45	3000 / Bulk Bag					
1N4744A–T50A								3000 / Fan–Fold					
1N4744A–T50R								3000 / Tape and Reel					
1N4744ATR			45					46	3000 / Tape and Reel				
1N4745A									3000 / Bulk Bag				
1N4745A–T50A									3000 / Fan–Fold				
1N4745ATR			46						47	3000 / Tape and Reel			
1N4746A										3000 / Bulk Bag			
1N4746A–T50A										3000 / Fan–Fold			
1N4746ATR			47							48	3000 / Tape and Reel		
1N4747A											3000 / Bulk Bag		
1N4747A–T50A											3000 / Fan–Fold		
1N4747ATR			48								49	3000 / Tape and Reel	
1N4748A												3000 / Bulk Bag	
1N4748A–T50A												3000 / Fan–Fold	
1N4748ATR			49									50	3000 / Tape and Reel
1N4749A													3000 / Bulk Bag
1N4749A–T50A	3000 / Fan–Fold												
1N4749A–T50R	50	51	3000 / Tape and Reel										
1N4749ATR			3000 / Tape and Reel										
1N4750A			3000 / Bulk Bag										
1N4750A–T50A	51		52	3000 / Fan–Fold									
1N4750ATR				3000 / Tape and Reel									
1N4751A				3000 / Bulk Bag									
1N4751A–T50A	52			53	3000 / Fan–Fold								
1N4751ATR					3000 / Tape and Reel								
1N4752A					3000 / Bulk Bag								
1N4752A–T50A	53				54	3000 / Fan–Fold							
1N4752ATR						3000 / Tape and Reel							
1N4753A						3000 / Bulk Bag							
1N4753A–T50A	54					55	3000 / Fan–Fold						
1N4754A							3000 / Bulk Bag						
1N4754A–T50A							3000 / Fan–Fold						
1N4755A	55						56	3000 / Bulk Bag					
1N4755A–T50A								3000 / Fan–Fold					
1N4756A								3000 / Bulk Bag					
1N4757A	56							57	3000 / Bulk Bag				

1N4728A – 1N4758A

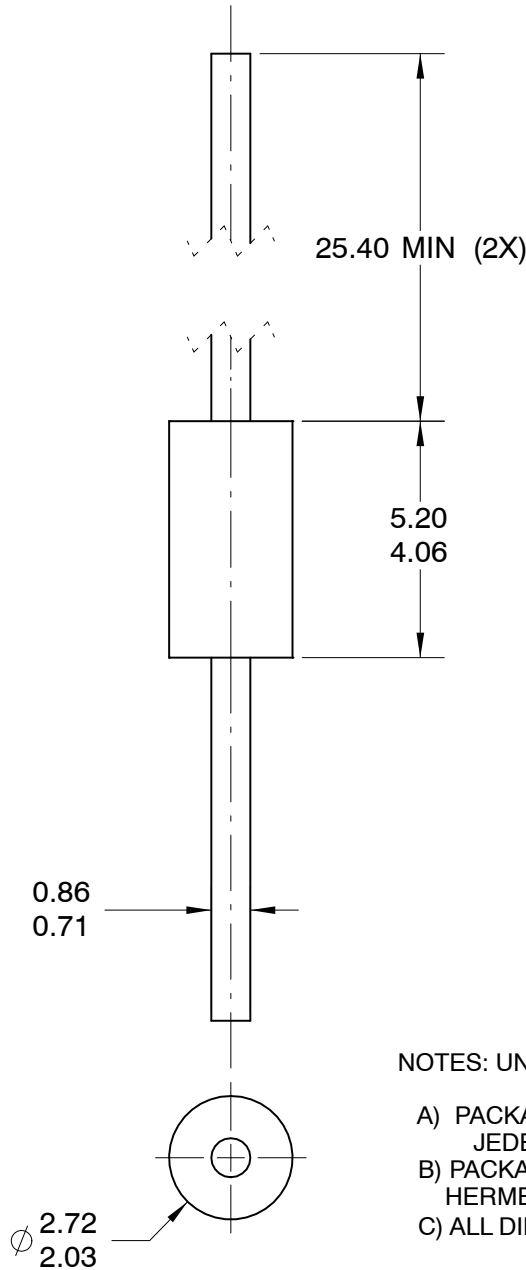
TOP MARKING AND ORDERING INFORMATION (continued)

Device	Top Marking					Package	Shipping†
	Line 1	Line 2	Line 3	Line 4	Line 5		
1N4758A	LOGO	47	58	A	XY	Axial Lead (Pb – Free / Halide Free)	3000 / Bulk Bag
1N4758A–T50A							3000 / Fan–Fold

†For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specifications Brochure, BRD8011/D.

AXIAL LEAD / DO-41
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ISSUE O


DATE 31 AUG 2016



NOTES: UNLESS OTHERWISE SPECIFIED

- A) PACKAGE STANDARD REFERENCE:
JEDEC DO-204 VARIATION AL.
- B) PACKAGE BODY CAN BE PLASTIC OR
HERMETICALLY SEALED GLASS.
- C) ALL DIMENSIONS ARE IN MILLIMETERS.

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