SPECIFICATION SHEET

SMD SCHOTTKY RECTIFIERS CASE SOD-123FL DSK2 L SERIES

SPECIFICATION SHEET NO.	S1114 – DSK27L0000S070	
ORIGINAL MFG/PART NO.	LGE Diodes/DSK27-L	
NEXTGEN PART CODE	DSK27L0000S070	Indicate This Code For RFQ /Order
DATE	Nov. 14, 2025	
REVISION	A3	Updated With Most Recent Data
DESCRIPTION AND MAIN PARAMETRICS	SMD Schottky Rectifiers 2 Pads, Case SOD-123FL, DSK2 L Series, Forward Rectified Current (I_{AV}) 2.0A Max. Repetitive Peak Reverse Voltage (V_{RRM}) 70V Max. RMS Voltage (V_{RMS}) 49V Max. Operating Junction Temperature Range (T_J)-55°C ~+175°C Package in Tape/Reel, 3000pcs/Reel RoHS/RoHS III compliant, RoHS Annex III lead Exemption (Exempt per RoHS EU 2015/863) and Halogen Free (HF)	
CUSTOMER		
CUSTOMER PART NUMBER		
CROSS REF. PART NUMBER		
MEMO		

VENDOR APPROVE	
Issued/Checked/Approved	Mandy Xu / Ruby Zhang / Jack Zhang
Effective Date: Nov. 14, 2025	

CUSTOMER APPROVE
Date:

MAIN FEATURE

Image shown is a representation only. Exact specifications should be obtained from the product dimension.

- Low Profile Package
- Ideal For Automated Placement
- Ultrafast Reverse Recovery Time
- Low Power Loss, High Efficiency
- Low Forward Voltage Drop.
- High Surge Capability
- High Temperature Soldering: 260℃/10 Seconds At Terminals
- Meet MSL 1 Requirement
- Component in accordance to WEEE 2002/96/EC
- Cross Competitors Parts and More.
- RoHS/RoHS III compliant, RoHS Annex III lead Exemption (Exempt per RoHS EU 2015/863) and Halogen Free (HF)

APPLICATION

- For SMD Application

ELECTRICAL CHARACTERISTICS

- See Page 5 ~ Page 6.
- All Products Parameters are Subject To NextGen Components' Final Confirmation.

HOW TO ORDER

- Please Follow Up Part Code Guide And Indicate NextGen Part Code DSK27L0000S070 For RFQ and Order.

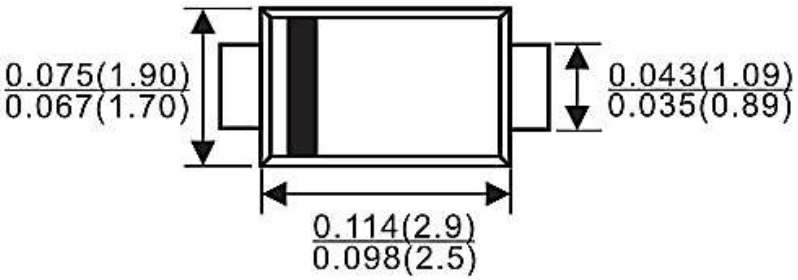
PART CODE GUIDE

RFQ
Request For Quotation

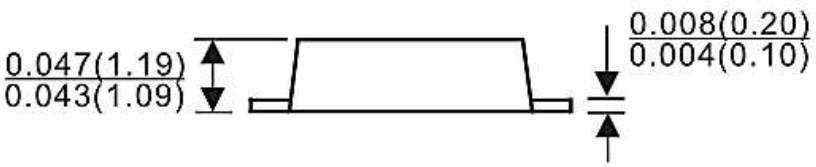
CODE	NAME	KEY SPECIFICATION OPTION
DSK2	Product Series Code	SMD Schottky Rectifier, Case SOD-123FL, Forward Rectified Current 2.0A DSK2 L Series
7	Max. Repetitive Peak Reverse Voltage Code	2: 20V Max. ; 3: 30V Max. ; 4: 40V Max.; 5: 50V Max.; 6: 60V Max.; 7: 70V Max.; 8: 80V Max.; 9: 90V Max. 10: 100V Max.; 15: 150V Max.; 20: 200V Max
L0000S	Internal Control Code	Letter A~Z, a-z or Digits (0-9)
070	Max. DC Blocking Voltage Code	020: 20V Max. ; 030: 30V Max. ; 040: 40V Max.; 050: 50V Max.; 060: 60V Max.; 070: 70V Max.; 080: 80V Max.; 090: 90V Max. 100: 100V Max.; 150: 150V Max.; 200: 200V Max
XX	Special/Custom Parameters	Blank: N/A; XX: Letter A~Z, a~z or digits (0~9) for Special/Custom Parameters

DIMENSION - - Unit: Inch (mm), Case SOD-123FL Outline

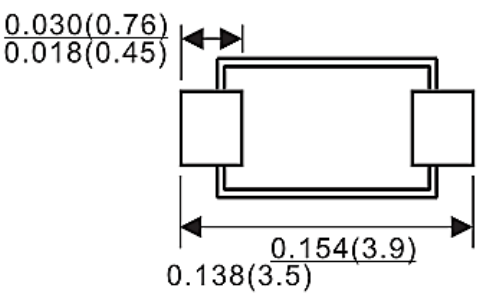
Top View



Side View



Bottom View



MECHANICAL CHARACTERISTICS

CASE	TERMINALS	POLARITY	MOUNTING POSITION	WEIGHT
JEDEC SOD-123FL Molded Plastic Body Over Passivated Chip	Solder Plated, Solderable Per J-STD-002B And JESD22-B102D	Laser Band Denotes Cathode End	Any	0.017 Gram

MAX. RATINGS & ELECTRICAL CHARACTERISTICS

- Ratings at 25 °C ambient temperature unless otherwise specified.

PARAMETER	CONDITION	SYMBOL	VALUE			UNITS
			MIN.	TYP.	MAX.	
Maximum Average Forward Rectified Current		I_{AV}			2.0	A
Peak Forward Surge Current	8.3ms Single Half Sine-wave Superimposed On Rated Load (JEDEC Method)	I_{FSM}			40	A
Operating Junction Temperature Range	@ V_{RRM} 20V/30V/40V/50V/60V	T_J	-55		+150	°C
	@ V_{RRM} 70V/80V/90V/100V/150V /200V		-55		+175	
Storage Temperature Range	@ V_{RRM} 20V/30V/40V/50V/60V	T_{STG}	-55		+150	°C
	@ V_{RRM} 70V/80V/90V/100V/150V /200V		-55		+175	

ELECTRICAL CHARACTERISTICS - Ta=25℃ unless otherwise specified

PART CODE	Max. Repetitive Peak Reverse Voltage	Max. RMS Vol.	Max. DC Blocking Voltage	Max. Inst. Forward Voltage @ 2.0A	Max. DC Reverse Current At Rated DC Blocking Voltage		Typical Junction Cap. (Note 1)	Marking List
					@ 25 ℃	@ 100 ℃		
	V_{RRM}	V_{RMS}	V_{DC}	V_F	I_R		C_J	
	V	V	V	V	mA		pF	
DSK22L0000S020	20	14	20	0.55	0.5	10.0	220	K22
DSK23L0000S030	30	21	30	0.55	0.5	10.0	220	K23
DSK24L0000S040	40	28	40	0.55	0.5	10.0	220	K24
DSK25L0000S050	50	35	50	0.70	0.5	10.0	80	K25
DSK26L0000S060	60	42	60	0.70	0.5	10.0	80	K26
DSK27L0000S070	70	49	70	0.85	0.5	5.0	80	K27
DSK28L0000S080	80	56	80	0.85	0.5	5.0	80	K28
DSK29L0000S090	90	63	90	0.85	0.5	5.0	80	K29
DSK210L000S100	100	70	100	0.85	0.5	5.0	80	K210
DSK215L000S150	150	83	150	0.85	0.5	5.0	80	K215
DSK220L000S200	200	90	200	0.85	0.5	5.0	80	K220

Note: 1. Measured at 1MHz And Applied Reverse Voltage Of 4.0V D.C

CHARACTERISTICS CURVES- For Reference Only, Ta=25℃ Unless Otherwise Specified.

Fig.1 Forward Current Derating Curve

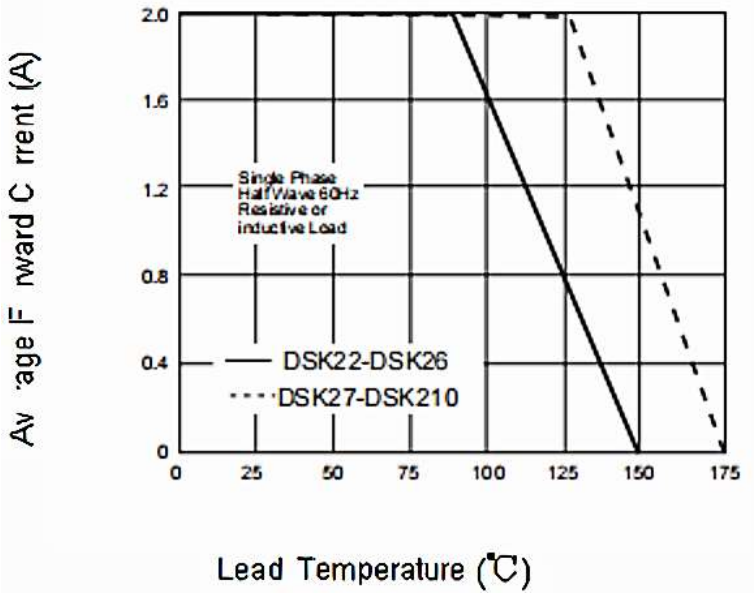
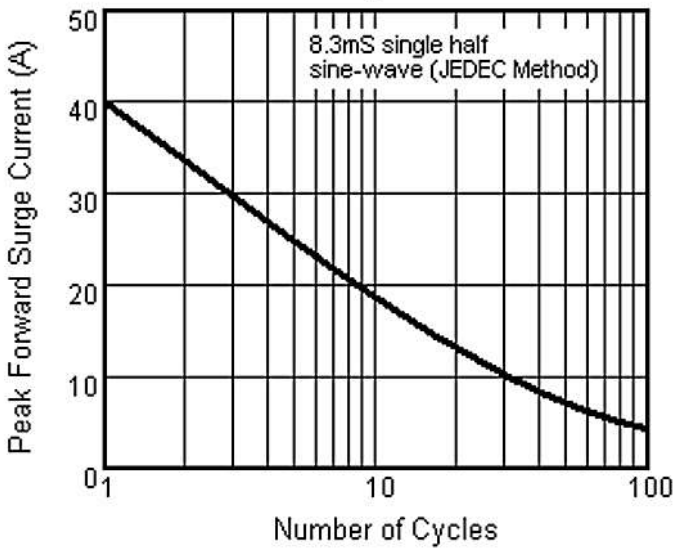


Fig.2 Maximum Non-Repetitive Peak Forward Surge Current



CHARACTERISTICS CURVES- For Reference Only, Ta=25℃ Unless Otherwise Specified.

Fig.3 Typical Instantaneous Forward Characteristics

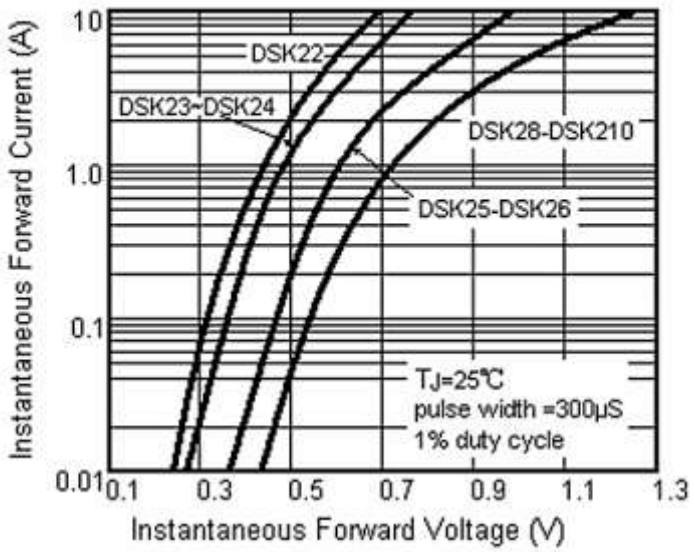
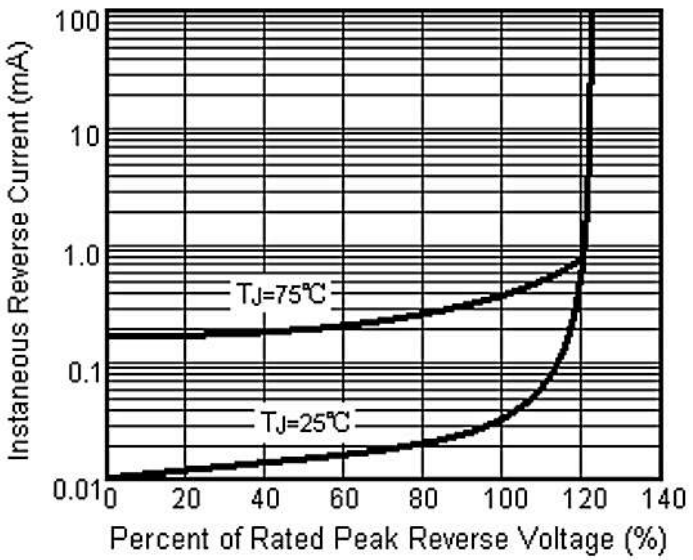
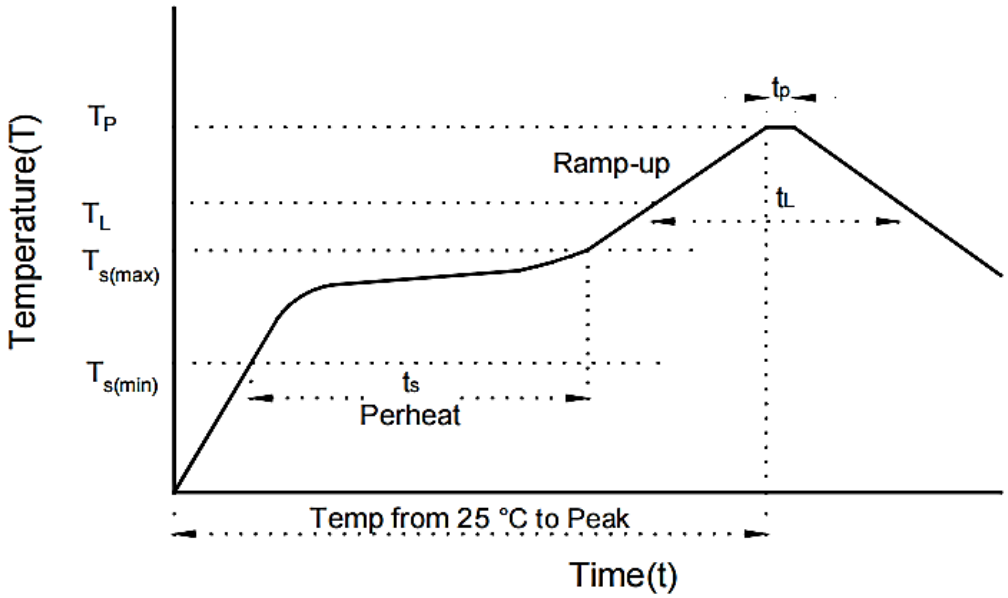


Fig.4 Typical Reverse Characteristics

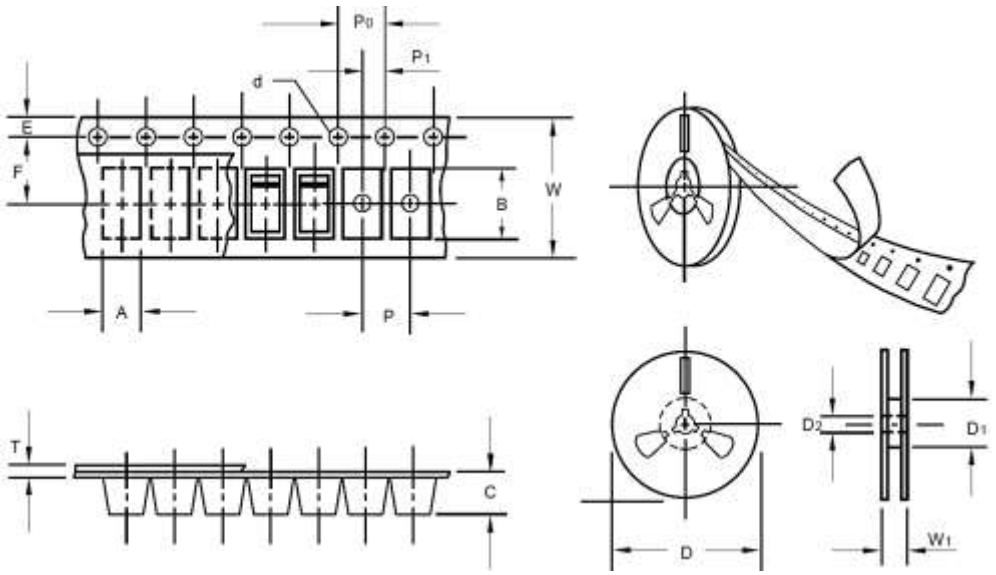


SUGGESTED REFLOW PROFILE - For Reference Only



PROFILE FEATURE		PB-FREE ASSEMBLY
Average Ramp-up Rate (T_L Max to T_p)		3°C/second Max
Preheat	Temperature Min (T_s Min.)	150°C
	Temperature Max (T_s Max.)	200°C
	Time (t_s Min. to t_s Max.)	60 ~ 180 seconds
Time maintained above	Temperature (T_L)	217°C
	Time (t_L)	60 ~ 150 seconds
Peak/Classification Temperature (T_p)		260 °C
Time within 5°C of actual Peak Temperature (t_p)		10 seconds Max.
Ramp-down Rate		6 °C /Second Max.
Time 25 °C to Peak Temperature		8 Minutes Max.
Suggest reflow times		3 Times Max.

TAPE/REEL - Unit: mm, All Devices are packed in accordance with EIA standard RS-481-A and specifications



ITEM	SYMBOL	TOLERANCE	SOD-123FL
Carrier width	A	0.1	2.1
Carrier Length	B	0.1	4.0
Carrier Depth	C	0.1	1.60
Sprocket hole	d	0.05	1.55
7”Reel outside diameter	D	2	178
7”Reel inner diameter	D1	Min.	50.0
Feed hole diameter	D2	0.5	13
Sprocket hole position	E	0.1	1.75
Punch hole position	F	0.1	3.5
Punch hole pitch	P	0.1	4
Sprocket hole pitch	P0	0.1	4
Embossment center	P1	0.1	2
Overall tape thickness	T	0.1	0.25
Tape width	W	0.3	8.15
Reel width	W1	1	10.5
Qty. Per Reel (pcs)	3000		

IMPORTANT NOTES AND DISCLAIMER

1. ROHS COMPLIANCE: The levels of RoHS restricted materials in this product are below the maximum concentration values (also referred to as the threshold limits) permitted for such substances, or are used in an exempted application, in accordance with EU RoHS Directive (EU) 2015/863 EC (RoHS3). RoHS Test Report for this product can be obtained can be obtained at Download Center.
2. REACH COMPLIANCE: REACH substances of high concern (SVHCs) information is available for this product. Since the European Chemical Agency (ECHA) has published notice of their intent to frequently revise the SVHC listing for the foreseeable future, REACH Test Report for this product can be obtained can be obtained at Download Center.
3. All Product parametric performance is indicated in the Electrical Characteristics for the listed herein test conditions, unless otherwise noted. Product performance may not be indicated by the Electrical Characteristics if operated under different conditions.
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