



# LL4001 THRU LL4007

## 硅整流二极管 General Purpose Rectifier

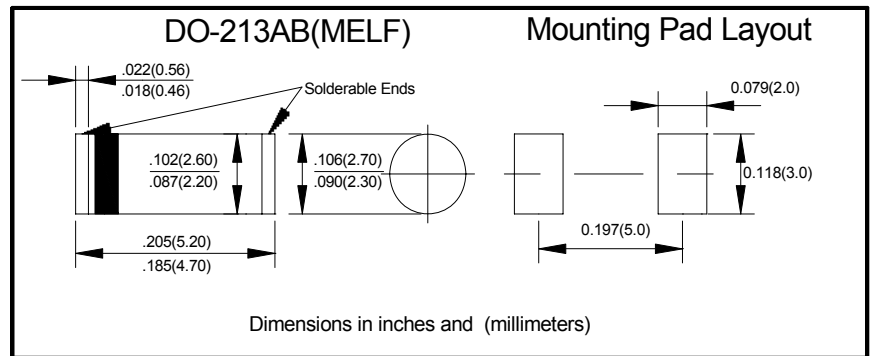
### ■特征 Features

- $I_o$  1.0A
- $V_{RRM}$  50V-1000V
- 耐正向浪涌电流能力高  
High surge current capability
- 封装: 模压塑料  
Cases: Molded plastic

### ■用途 Applications

- 整流用 Rectifier

### ■外形尺寸和印记 Outline Dimensions and Mark



### ■极限值 (绝对最大额定值)

#### Limiting Values (Absolute Maximum Rating)

参数名称 Item	符号 Symbol	单位 Unit	测试条件 Test Conditions	LL40						
				01	02	03	04	05	06	07
反向重复峰值电压 Repetitive Peak Reverse Voltage	$V_{RRM}$	V		50	100	200	400	600	800	1000
正向平均电流 Average Forward Current	$I_{F(AV)}$	A	正弦半波 60Hz, 电阻负载, $T_a=75^\circ\text{C}$ 60HZ Half-sine wave, Resistance load, $T_a=75^\circ\text{C}$	1.0						
正向(不重复)浪涌电流 Surge(Non-repetitive)Forward Current	$I_{FSM}$	A	正弦半波 60Hz, 一个周期, $T_a=25^\circ\text{C}$ 60Hz Half-sine wave, 1 cycle, $T_a=25^\circ\text{C}$	30						
结温 Junction Temperature	$T_J$	$^\circ\text{C}$		-55~+150						
储存温度 Storage Temperature	$T_{STG}$	$^\circ\text{C}$		-55 ~ +150						

### ■电特性 (Ta=25°C 除非另有规定)

#### Electrical Characteristics (Ta=25°C Unless otherwise specified)

参数名称 Item	符号 Symbol	单位 Unit	测试条件 Test Condition	LL40						
				01	02	03	04	05	06	07
正向峰值电压 Peak Forward Voltage	$V_F$	V	$I_F=1.0\text{A}$	1.1						1.2
反向漏电流 Peak Reverse Current	$I_{RRM1}$	$\mu\text{A}$	$V_{RM}=V_{RRM}$	$T_a=25^\circ\text{C}$			10			
	$I_{RRM2}$			$T_a=125^\circ\text{C}$			50			
热阻(典型) Thermal Resistance(Typical)	$R_{\theta J-A}$	$^\circ\text{C}/\text{W}$	结和环境之间 Between junction and ambient				75 <sup>1)</sup>			
	$R_{\theta J-T}$		结和终端之间 Between junction and terminal				30 <sup>2)</sup>			

#### 备注: Notes:

- <sup>1)</sup> 热阻从结到环境, 每个终端0.24" x 0.24" (6.0毫米 x 6.0毫米)铜垫片  
Thermal resistance from junction to ambient, 0.24" x 0.24" (6.0 mm x 6.0 mm) copper pads to each terminal
- <sup>2)</sup> 热阻从结到终端, 每个终端0.24" x 0.24" (6.0毫米 x 6.0毫米)铜垫片  
Thermal resistance from junction to terminal, 0.24" x 0.24" (6.0 mm x 6.0 mm) copper pads to each terminal

■特性曲线(典型) Characteristics(Typical)

图1: 正向电流降额曲线  
FIG.1: FORWARD CURRENT DERATING CURVE

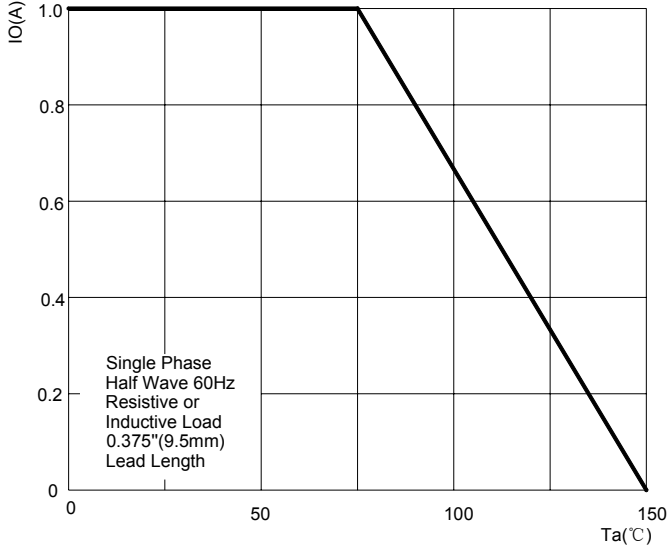


图2: 最大正向浪涌冲击耐受力  
FIG.2: MAXIMUM NON-REPETITIVE FORWARD URGE CURRENT

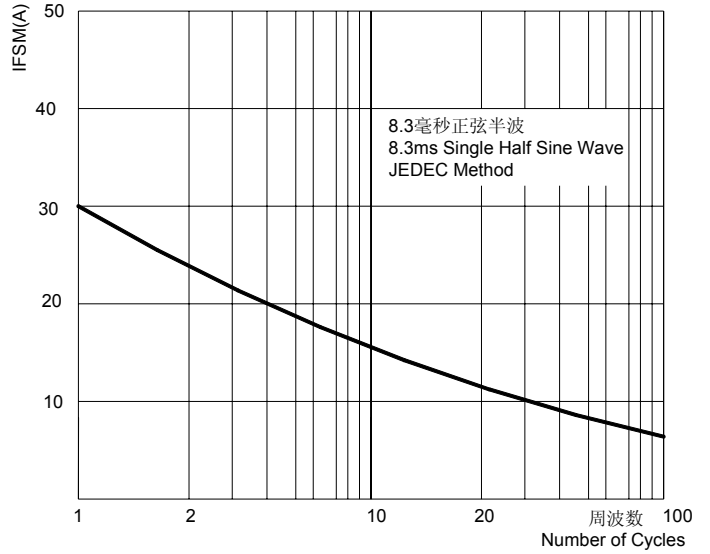


图3: 典型正向特性曲线  
FIG.3: TYPICAL FORWARD CHARACTERISTICS

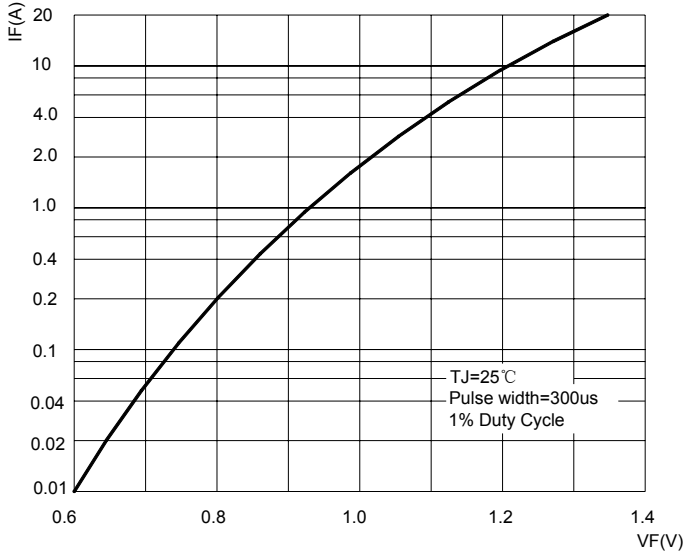


图4: 典型反向特性曲线  
FIG.4: TYPICAL REVERSE CHARACTERISTICS

