

# 1SS400AS

## High –Speed Switching Diode

### 1. FEATURES

- We declare that the material of product compliance with RoHS requirements and Halogen Free.
- S- prefix for automotive and other applications requiring unique site and control change requirements; AEC-Q101 qualified and PPAP capable.
- High speed.
- High reliability with high surge current handling capability.

### 2. APPLICATIONS

- High speed switching

### 3. DEVICE MARKING AND ORDERING INFORMATION

Device	Marking	Shipping
1SS400AS	S	10000/Tape&Reel

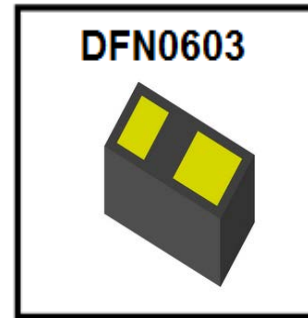
### 4. MAXIMUM RATINGS(Ta = 25°C)

Parameter	Symbol	Limits	Unit
Peak Reverse Voltage	VRM	90	V
DC Reverse Voltage	VR	80	V
Peak Forward Current	IFM	225	mA
Mean Rectifying Current	IO	100	mA
Surge Current(1s)	IFS	500	mA

### 5. THERMAL CHARACTERISTICS

Parameter	Symbol	Limits	Unit
Total Device Dissipation, FR-5 Board (Note 1) @ TA = 25°C Derate above 25°C	PD	200 1.57	mW mW/°C
Thermal Resistance, Junction-to-Ambient(Note 1)	ROJA	635	°C/W
Junction and Storage temperature	TJ, Tstg	-55 ~ +125	°C

1. FR-5 = 1.0×0.75×0.062 in.

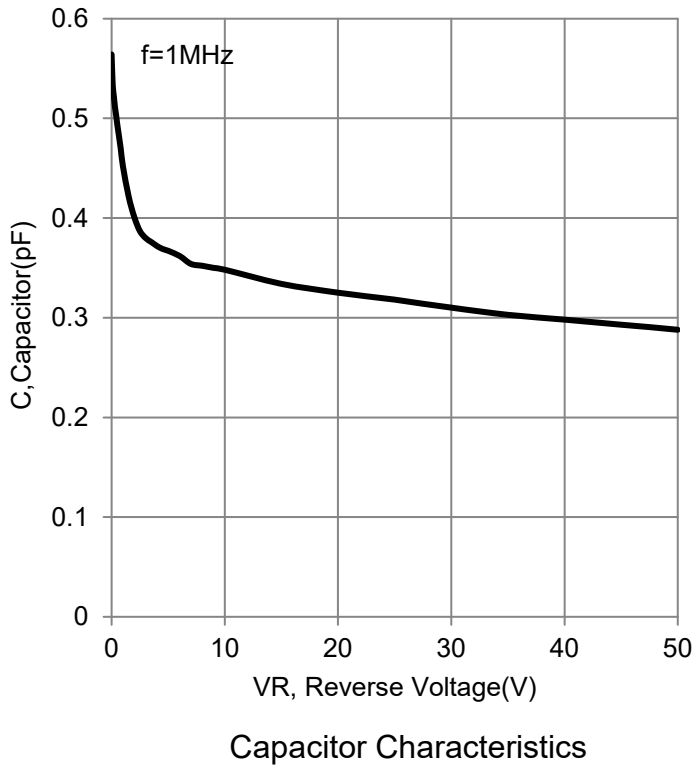
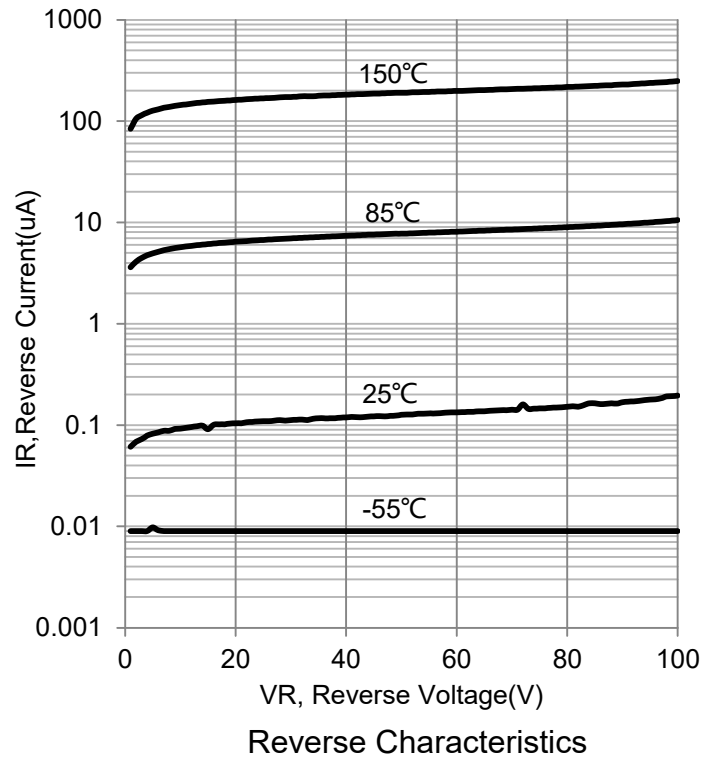
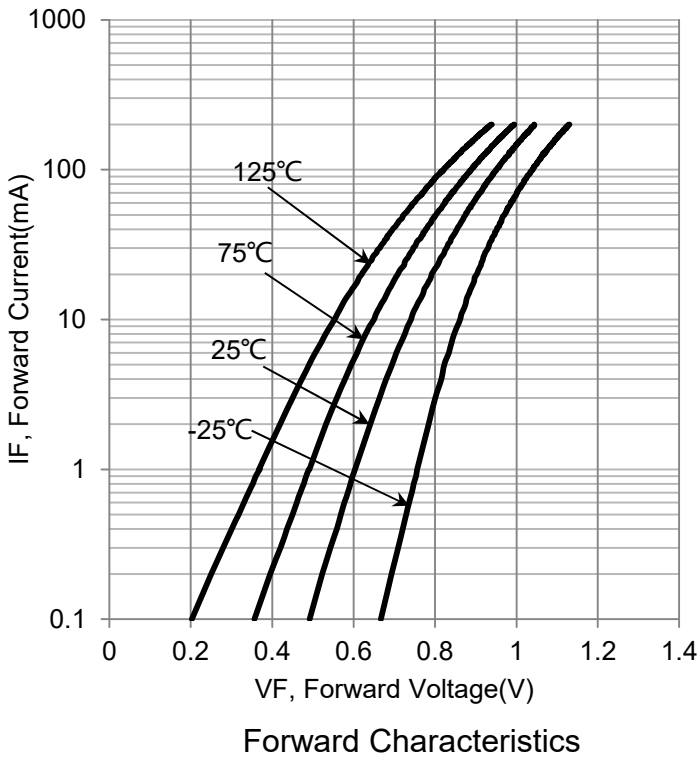


**6. ELECTRICAL CHARACTERISTICS (Ta= 25°C)**

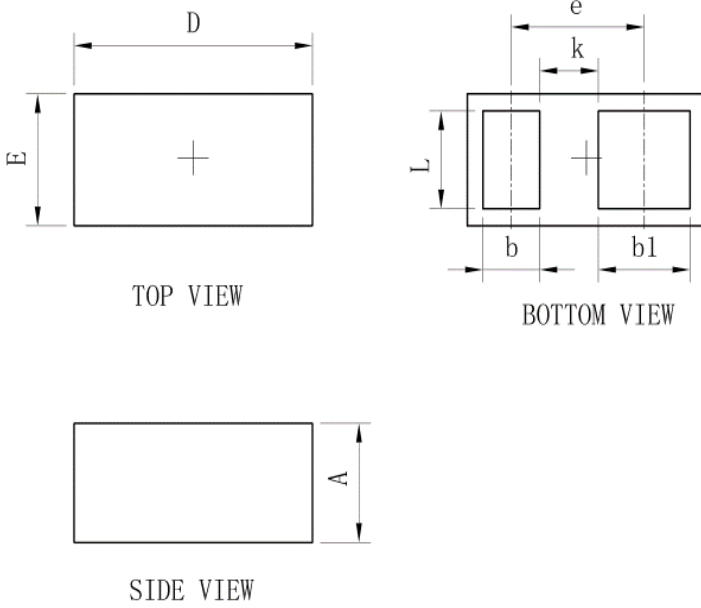
Characteristic	Symbol	Min.	Typ.	Max.	Unit
Forward Voltage (IF = 100 mA <sub>dc</sub> )	VF	-	-	1.2	V
Reverse Voltage Leakage Current (VR = 80V <sub>dc</sub> )	IR	-	-	0.1	μA
Diode Capacitance (VR = 0.5V, f = 1.0 MHz)	CT	-	-	3	pF
Reverse Recovery Time (VR=6V, IF=10mA, RL=100Ω)	trr	-	-	4	ns



## 7. ELECTRICAL CHARACTERISTICS CURVES

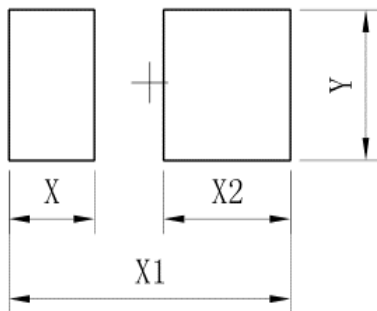


## 8. OUTLINE AND DIMENSIONS



DFN0603			
Dim	Min	Typ	Max
D	0.58	0.61	0.64
E	0.28	0.31	0.34
e	-	0.34	-
L	0.20	0.23	0.26
b	0.115	0.145	0.175
b1	0.205	0.235	0.265
A	0.25	0.28	0.31
k	0.12	0.15	0.18
All Dimensions in mm			

## 9. SOLDERING FOOTPRINT



DFN0603	
Dimensions	(mm)
X	0.185
X1	0.610
Y	0.300
x2	0.275

