

MA27 Series

Silicon epitaxial planer type variable resistor

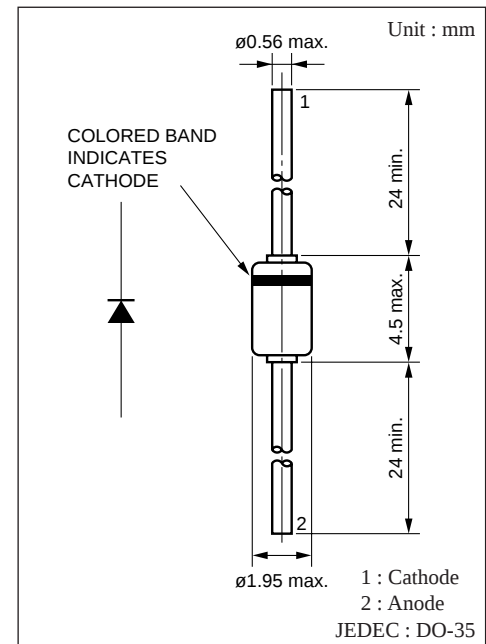
For temperature and reduced voltage compensation

■ Features

- High reliability achieved through combination of a planer type chip and glass sealing structure
- Easy mounting because of DO-35 (DHD) envelope used
- Extremely small reverse current I_R
- Large power dissipation
- Wide forward voltage V_F range

■ Absolute Maximum Ratings ($T_a = 25^\circ\text{C}$)

Parameter	Symbol	Rating	Unit
Reverse voltage (DC)	V_R	6	V
Forward current (DC)	MA27-A/B	150	mA
	MA27W-A/B	100	
	MA27T-A/B	70	
	MA27Q-A/B	50	
Power dissipation	P_D	150	mW
Junction temperature	T_j	150	$^\circ\text{C}$
Storage temperature	T_{stg}	- 55 to +150	$^\circ\text{C}$



■ Electrical Characteristics ($T_a = 25^\circ\text{C}$)

Parameter		Symbol	Condition	min	typ	max	Unit
Reverse current (DC)	MA27-A/B	I _R	V _R = 6V			10	μA
	MA27W-A/B		V _R = 6V			1	
	MA27T-A/B						
	MA27Q-A/B						
Forward voltage (DC)	MA27-A	V _{F1}	I _F =1.5mA	0.56		0.61	V
	MA27-B			0.59		0.64	
	MA27W-A/B		I _F =10μA	0.77			
	MA27T-A/B			1.15			
	MA27Q-A/B			1.60			
Forward voltage (DC)	MA27-A/B	V _{F2}	I _F = 50mA			1.1	V
	MA27W-A		I _F = 3mA	1.18		1.28	
	MA27W-B			1.26		1.36	
	MA27T-A			1.76		1.92	
	MA27T-B			1.88		2.04	
	MA27Q-A			2.20		2.40	
	MA27Q-B			2.34		2.54	
Temperature coef- ficient of forward voltage	MA27-A/B	-ΔV _F / ΔT	I _F =1.5mA		2.0		mV/°C
	MA27W-A/B		I _F = 3mA		4.6		
	MA27T-A/B				6.5		
	MA27Q-A/B				8.8		

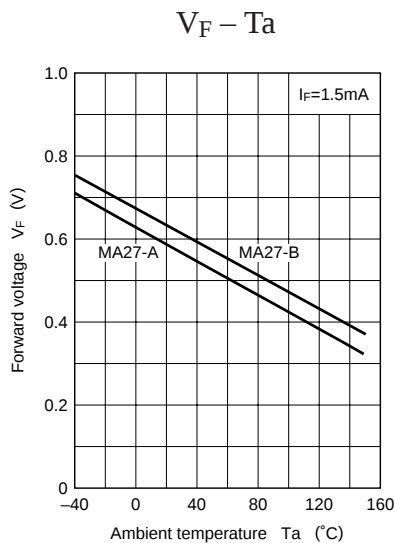
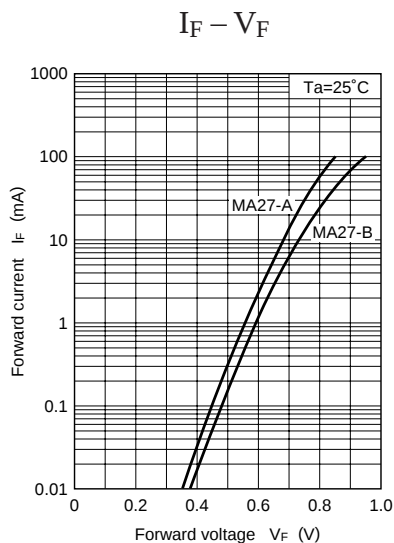
❖ Rated input/output frequency : 100MHz

■ Cathode Indication

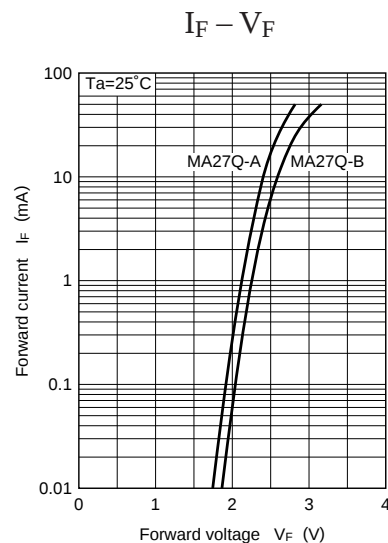
Type No.	MA27-A	MA27-B	MA27W-A	MA27W-B	MA27T-A*	MA27T-B*	MA27Q-A*	MA27Q-B*
Color	Yellow	Blue	Light Blue	Brown	Yellow	Blue	Green	Brown

* Body Color : Black

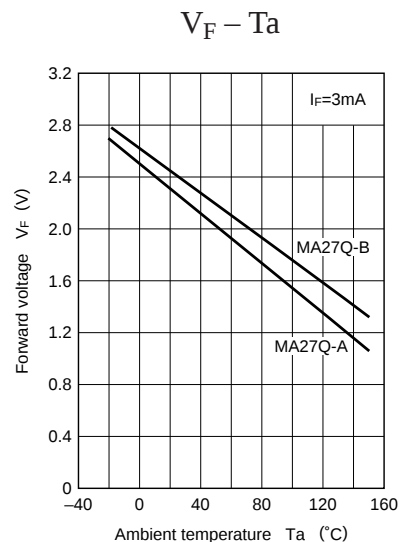
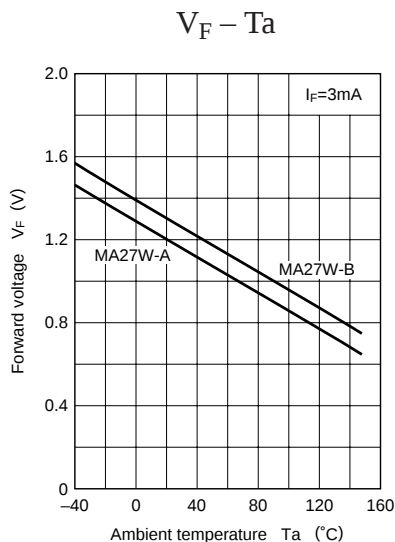
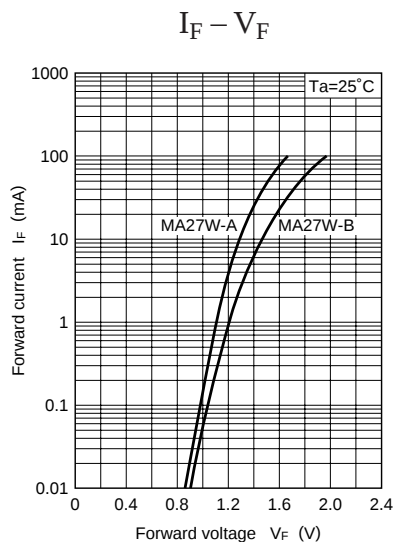
Common characteristics chart of MA27



Characteristics chart of MA27Q



Characteristics chart of MA27W



Characteristics chart of MA27T

