

DD100KB80/160

UL; E76102

《Features》

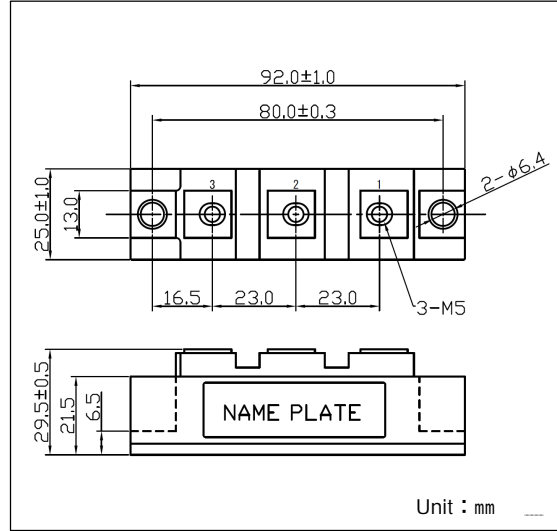
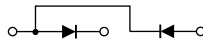
Power Diode Module DD100KB Series are designed for various rectifier circuits.

DD100KB has two diode chips connected in series and the mounting base is electrically isolated from elements for simple heatsink construction. Wide voltage rating up to, 1600V is available for various input voltages.

- Isolated mounting base
- Two elements in a package for simple (single and three phase) bridge connections
- Highly reliable glass passivated chips
- High surge current capability

《Applications》

• Various rectifiers / Battery chargers / DC motor drives



■ Maximum Ratings (T_j=25°C unless otherwise specified)

Item	Symbol	Unit	DD100KB80	DD100KB160
Repetitive Peak Reverse Voltage	V _{RRM}	V	800	1600
Non-Repetitive Peak Reverse Voltage	V _{RSM}	V	960	1700

Item	Symbol	Unit	Ratings	Conditions
Average Forward Current	I _{F(AV)}	A	100	Single phase, half wave, 180° conduction, T _C =105°C
R.M.S. forward current	I _{F(RMS)}	A	155	Single phase, half wave, 180° conduction, T _C =105°C
Surge forward current	I _{FSM}	A	1800/2000	1/2 cycle, 50/60Hz, peak value, non-repetitive
I ² t	I ² t	A ² s	16500	Value for one cycle of surge current
Operating Junction Temperature	T _j	°C	-40 to +150	
Storage Temperature	T _{stg}	°C	-40 to +125	
Isolation Breakdown Voltage (R.M.S.)	V _{ISO}	V	2500	A.C., 1minute
Mounting Torque	Mounting (M6)	N·m (kgf·cm)	4.7(48)	Recommended Value 2.5 to 3.9 (25 to 40)
	Terminal (M5)		2.7(28)	Recommended Value 1.5 to 2.5 (15 to 25)
Mass		g	170	Typical value

■ Electrical Characteristics (T_j=25°C unless otherwise specified)

Item	Symbol	Unit	Ratings			Conditions
			Min.	Typ.	Max.	
Repetitive Peak Reverse Current	I _{RRM}	mA			30	at V _{RRM} , Single phase, half wave, T _j =150°C
Forward Voltage Drop	V _{FM}	V			1.35	Forward current 320A, Inst. measurement
Thermal Resistance	R _{th(j-c)}	°C/W			0.35	Junction to Case

