

SOD123Flat

Rectifiers



SOD123Flat power Schottky diodes for improved cost and space-savings

Housed in an SOD123Flat package – only 26 mg and 1 mm thick – ST's qualified 40, 60 and 100 V power Schottky rectifiers are suited for miniature LED lighting, battery-powered equipment, power converters, motor drives and equipment installed in harsh industrial environments thanks to a T₁ range from –40 to 175 °C.

Current-rated 1 A, with a V_{RRM} of 40, 60, these new power Schottky devices with low forward voltage drop for the 'L' series will improve the efficiency of the application. Also, the 'H' series will push the limit of thermal runaway risk rated with a current of 2 A and V_{DDM} of 100 V.

KEY FEATURES

- 1 A, 2 A, 40 V,60 V and 100 V power Schottky diodes
- SOD123Flat smart package, only 1-mm thick
- Low I_R and low V_E capability
- T, range from -40 to +175 °C
- ECOPACK®2 resin, RoHS-compliant packages

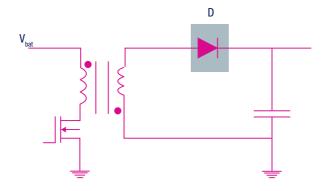
TARGETED APPLICATIONS

- · LED and general lighting systems
- Small DC/DC converters (flyback, buck, and buck-boost typologies)
- · Point-of-load (POL) converters
- Ultra-thin adaptors
- Smart chargers



BLOCK DIAGRAM

Flyback converter example



PACKAGE RANGE







STPS1L40ZF / STPS1L60ZF / STPS2H100ZF SOD123Flat non-exposed pad package

SOD123FLAT POWER SCHOTTKY SELECTION GUIDE

	1 A	2 A
	S0D123Flat	
40 V	STPS1L40ZF	
60 V	STPS1L60ZF	
100 V		STPS2H100ZF



