



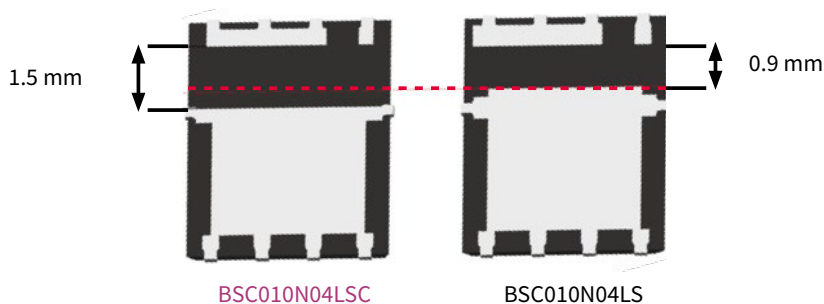
Product brief

BSC010N04LSC

OptiMOS™ 5 40 V in SuperSO8 with 1.5 mm creepage distance to meet new standard requirements

The BSC010N04LSC is the perfect choice for battery powered tools. The OptiMOS™ 5 40 V technology also provides the best performance for synchronous rectification in switched mode power supplies (SMPS), commonly found in servers and desktops, and a broad range of industrial applications including telecom, solar micro inverters and fast switching DC-DC converters.

The TDSO package with increased creepage distance (left hand side) compared with a standard TDSO package (right hand side):



Key features

- > Increased creepage distance of 1.5 mm
- > Very low on-resistance $R_{DS(on)}$
- > Very low figure-of-merit ($R_{DS(on)} \times Q_g$)
- > 100 percent avalanche tested
- > Pb-free lead plating; RoHS compliant
- > RoHS compliant and Halogen-free according to IEC61249-2-21

Key benefits

- > Highest system efficiency
- > Increased power density
- > System cost reduction
- > Very low voltage overshoot

Target applications

- > Home and professional
- > Cordless vacuum cleaner
- > Other battery powered tools

Key parameters

Sales name	V_{DS} [V]	$R_{DS(on)}$ max. @ $V_{GS} = 4.5$ V [mΩ]	$R_{DS(on)}$ max. @ $V_{GS} = 10$ V [mΩ]	Q_g typ @ $V_{GS} =$ 0 to 10 V [nC]	$R_{th(ja)}$ [°C/W]	Package
BSC010N04LSC	40	1.35	1.05	95	50	TDSO-8

