

Features and Benefits:

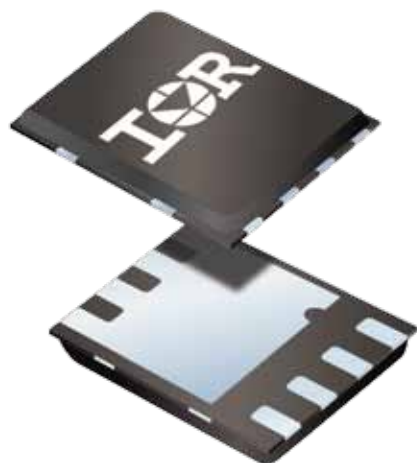
- Low thermal resistance to PCB (down to $<0.5^{\circ}\text{C/W}$)
- High Current Package – up to 100A continuous
- 100% RG tested
- Low profile ($<0.9\text{ mm}$)
- Industry-standard pinout
- Compatible with existing surface mount techniques
- RoHS compliant containing no lead, no bromide and No halogen
- MSL1, industrial qualification

Applications/ Markets:

- Primary and secondary side switches in isolated DC-DC converters for Network and Telecom
- Secondary side switches in AC-DC SMPS
- Motor drive switch

The IR Advantages:

- Increased power density
- Increased reliability
- Multi-vendor compatibility
- Easier manufacturing
- Environmentally friendlier



Complete Mid-Voltage Power MOSFET Family in High Current PQFN 5x6 mm Package

IR has expanded its portfolio of HEXFET® power MOSFETs to offer a complete family of mid-voltage devices available in a 5x6mm PQFN package with high current capability.

The new power MOSFETs, featuring IR's latest silicon technology to deliver benchmark performance are designed for switching applications including DC to DC converters for network and telecom equipment, AC-DC Switch Mode Power Supplies (SMPS), and motor drive switches. Available in a wide range of voltages from 40V to 250V, the devices provide various levels of on-state resistance ($R_{DS(on)}$) and gate charge (Q_g) to offer customers optimized performance and cost for a given application.

With a low 0.9mm profile and industry standard pin out, the devices' high current rating and low $R_{DS(on)}$ enable higher efficiency, power density and reliability compared to alternative solutions requiring multiple parallel parts, making them well suited to switching applications where board space is limited.

PQFN 5x6 mm

Specifications

Part Number	Package	Voltage	Current	$R_{DS(on)}$	Q_g Typ	Gate
IRFH5004TRPBF	PQFN 5x6mm	40 V	100A	2.6 mOhm	73 nC	Standard
IRFH5006TRPBF	PQFN 5x6mm	60 V	100A	4.1 mOhm	67 nC	Standard
IRFH5106TRPBF	PQFN 5x6mm	60 V	100A	5.6 mOhm	50 nC	Standard
IRFH5206TRPBF	PQFN 5x6mm	60 V	98A	6.7 mOhm	40 nC	Standard
IRFH5406TRPBF	PQFN 5x6mm	60 V	40A	14.4 mOhm	23 nC	Standard
IRFH5007TRPBF	PQFN 5x6mm	75 V	100A	5.9 mOhm	65 nC	Standard
IRFH5207TRPBF	PQFN 5x6mm	75 V	71A	9.6 mOhm	39 nC	Standard
IRFH5010TRPBF	PQFN 5x6mm	100 V	100A	9.0 mOhm	65 nC	Standard
IRFH5110TRPBF	PQFN 5x6mm	100 V	63A	12.4 mOhm	48 nC	Standard
IRFH5210TRPBF	PQFN 5x6mm	100 V	55A	14.9 mOhm	39 nC	Standard
IRFH5015TRPBF	PQFN 5x6mm	150 V	56A	31 mOhm	33 nC	Standard
IRFH5020TRPBF	PQFN 5x6mm	200 V	41A	59 mOhm	36 nC	Standard
IRFH5025TRPBF	PQFN 5x6mm	250 V	32A	100 mOhm	37 nC	Standard
IRLH5034TRPBF	PQFN 5x6mm	40 V	100A	2.4 mOhm	43 nC	Logic Level
IRLH5036TRPBF	PQFN 5x6mm	60 V	100A	4.4 mOhm	44 nC	Logic Level
IRLH5030TRPBF	PQFN 5x6mm	100 V	100A	9.0 mOhm	44 nC	Logic Level

All of the devices feature low thermal resistance ($<0.5^{\circ}\text{C/W}$), are MSL1 industrial-qualified and RoHS compliant containing no lead, bromide or halogen.

