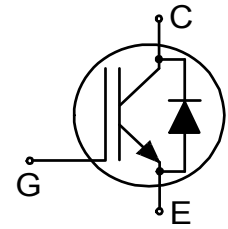


## Hybrid CoolSiC™ IGBT

TRENCHSTOP™ 5 S5 IGBT co-packed with full-rated 6<sup>th</sup> generation CoolSiC™ Schottky barrier diode**Features and Benefits:**

- Ultra-low switching losses due to the combination of TRENCHSTOP™ 5 and CoolSiC™ technology
- Very low on-state losses
- Benchmark efficiency in hard switching topologies
- Plug-and-play replacement of pure silicon devices
- Maximum junction temperature 175°C
- Qualified according to JEDEC for target applications
- Pb-free lead plating; RoHS compliant
- Complete product spectrum and PSpice models: <http://www.infineon.com/igbt/>

**Potential Applications:**

- Industrial Power Supplies
  - Industrial SMPS
  - Industrial UPS
- Energy Generation
  - Solar String Inverter
- Energy Distribution
  - Energy Storage
- Infrastructure – Charge
  - Charger

**Product Validation:**

Qualified for applications listed above based on the test conditions in the relevant tests of JEDEC20/22

**Package pin definition:**

- Pin 1 - gate
- Pin 2 & backside - collector
- Pin 3 - emitter

**Key Performance and Package Parameters**

Type	V <sub>CE</sub>	I <sub>C</sub>	V <sub>CEsat</sub> , T <sub>vj</sub> =25°C	T <sub>vjmax</sub>	Marking	Package
IKW75N65SS5	650V	75A	1.35V	175°C	K75ESS5	PG-TO247-3

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