Qi wireless charging standard offers more design freedom

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The TYLT VU Wireless Charger

Wireless charging is getting a new technology treatment which offers more design freedom. The Wireless Power Consortium's advance in its Qi wireless charging standard means that phones and chargers will no longer need to come into direct contact, .said Ars Technica on Thursday. The Qi 1.2 chargers are expected to show up later this year and into 2015, On Thursday, the WPC announced "advances to the resonant extension of the Qi specification," giving users the option to embed wireless chargers deeper in structures, such as furniture and desktops, or use direct-contact surface applications. Menno Treffers, chairman of the

WPC, said this also meant backward compatibility with products already in the market.

WPC's spec is to add support for resonant charging. With version 1.2, explained Engadget, "the addition of resonance charging to Qi's wireless-resonance-charging/ features "makes it so the receiver (the device that needs to be charged) and the transmitter (the charging pad or surface that's pushing the power to the device) won't need to physically touch each other anymore;" and can be up to 45mm (1.77 inches) apart. According to the WPC, "Q1.1 receivers based on inductive v1.1 specification and charging at a Z-height of 7 mm, are now capable being charged at a Z-height of 30 mm." The consortium also said that "New magnetic resonance v1.2 receivers can now be charged at Z-height of 45mm, expecting further Z-Height in final production designs."

The Qi standard's step to further progress means considerable opportunities for those industry players who can take that design freedom and run with it. Andrew Cunningham in Ars Technica noted the possibilities for companies that want to build Qi support into their products. The WPC says that Qi chargers can now be embedded within tables and desks rather than placed on the surface, and low power transmitter designs will make it easier to build Qi chargers into cars.

In December 2008, a group of electronics companies created the Wireless Power Consortium to establish Qi, an open standard, as an interoperable global standard for wireless power. Among its members have been, to name a few, Foxconn, LG, Microsoft, Motorola, Nokia, Panasonic, Qualcomm, Samsung, Sony, Texas Instruments, Toshiba, and groups, such as wireless operators, furniture and automotive parts manufacturers. Qi (sounds like "chee") is designed as a standard for compatible wireless charging.

"By approaching mass integration of wireless power through this

method, many questions, including supply chain considerations, price point, device and infrastructure integration, efficiency, safety and range of power needs can all be addressed collectively," said the group.

More information: — www.wirelesspowerconsortium.co … arge-at-distance.pdf
— www.wirelesspowerconsortium.co … bout/our-vision.html

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