

# World's first 2560x1440 Quad HD LCD panel for smartphones

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LG Display, a leading innovator of display technologies, announced today that it has developed the world's first Quad HD AH-IPS LCD panel for smartphones. At 2560x1440 with 538ppi, the new 5.5-inch Quad HD panel is the highest resolution and ppi (pixel per inch) mobile panel to date, and provides a glimpse at what's next after current Full HD smartphone panels, critical given the growing trend towards larger displays.

"LG Display, which pioneered the high resolution [mobile market](#) with introduction of the world's first Full HD smartphone panel in 2012,

again opens new possibilities with the successful application of QHD technology," said Dr. Byeong-koo Kim, Vice President and Head of LG Display's IT and Mobile Development Group. "With this breakthrough, LG Display will continue to raise new standards for mobile resolution and lead the mobile display market."

LG Display's Quad HD panel for smartphones realizes clearer images with 4 times more pixels than HD at 1,280X720, thereby reproducing more delicate colors as well as improving contrast and vividness when compared to current mobile displays. This advancement will enable consumers to fully enjoy more life-like and crisp images, and even Blu-ray equivalent video, on their smartphones. The panel also features the highest [ppi](#) among current mobile device displays.

In addition, the new Quad HD panel will enable users to enjoy a full view of PC-version web pages at a single glance without image distortion; a contrast to current Full HD displays which only realize 3/4<sup>th</sup> of a full screen. Also, even when enlarging the screen, users will be able to enjoy undistorted and sharper text.

Only 1.21mm thin with a 1.2mm bezel measured in LCD modules (LCM), LG Display's new Quad HD panel is both the world's slimmest and narrowest panel, with 12% reduced thickness compared to the company's 5.2-inch Full HD panel released last month. Based on Low Temperature Poly-Silicon (LTPS) substrate, the panel also realizes superior brightness of 430nit with improved transmittance and larger aperture opening size.

LTPS-based [smartphone](#) displays are expected to record 765 million units in shipments next year according to research firm DisplaySearch, as displays with larger screens, higher resolution, and less power consumption prove key to competitiveness in the premium model segment.

Provided by LG Display

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