



## **Samsung Broadens its Mobile SoC Reach to the Mid-Range Smartphone Market with New 14-Nanometer Exynos Processor**

**SEOUL, Korea – February 17, 2016** – Samsung Electronics Co., Ltd., a world leader in advanced semiconductor technology, today announced the newest member of its Exynos 7 Octa processor line-up, the Exynos 7 Octa 7870. Using the company's most advanced 14-nanometer (nm) FinFET process technology, the Exynos 7 Octa 7870 is designed for next-generation mid-range smartphones and other mobile devices.

"With increased performance and power efficiency, we anticipate widespread adoption of our new Exynos 7 Octa 7870 into mid-tier mobile devices," said Ben K. Hur, Vice President of System LSI marketing, Samsung Electronics. "Consumers will experience enhanced performance as this is the first time a mobile application processor built on advanced 14nm process is available for these types of smart mobile devices."

Samsung has been strengthening its leadership in the mobile SoC market by manufacturing the industry's first 14nm FinFET based application processor, the Exynos 7 Octa 7420, early last year and the Exynos 8 Octa 8890 with top of the line Cat.12/13 LTE modem and custom designed CPU cores last month.

Samsung plans to build up its position further by employing 14nm FinFET process technology for its mid-range processors for the first time in the industry. By using its advanced process technology, which has been reserved for premium Exynos processors, Samsung expects to give mobile manufacturers an ideal mobile SoC option for mid-range smartphones with leading-edge performance and power efficiency, and area scaling benefits. The new Exynos 7 Octa 7870 processor consumes over 30 percent less power than mobile SoCs built with 28nm High-k Metal Gate process technology at the same performance level.

The Exynos 7 Octa 7870 is equipped with eight 1.6GHz Cortex-A53 cores and LTE Cat.6 2CA Modem that supports 300Mbps downlink speed and FDD-TDD joint carrier aggregation for better network flexibility. In terms of multimedia functionalities, the processor supports 1080p 60fps video playback and WUXGA (1920x1200) display resolution. Its image signal processor (ISP) delivers high resolution images – up to 16 megapixels for both rear and front cameras, or 8Mp each in dual camera mode. In addition, it integrates GNSS solution that delivers fast time-to-first-fix (TTFF) feature, which enables a robust mobile experience based on more accurate and rapidly transitioning location based services.

The Exynos 7 Octa 7870 will be in mass production in the first quarter of 2016.

For more information about this press release and related Samsung Newsroom articles including photos and infographic, please visit <https://news.samsung.com/global/samsung-broadens-its-mobile-soc-reach-to-the-mid-range-smartphone-market-with-new-14-nanometer-exynos-processor>

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