



Kinetis® K28–150 MHz, 2x USB, Core Voltage Bypass, 2MB Flash, 1MB SRAM MCUs based on Arm® Cortex®–M4

K28_150

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The Kinetis K28 USB Arm® Cortex®-M4 MCUs target applications requiring processing efficiency and extra-large embedded memory with 2 MB Flash and 1 MB SRAM. This microcontroller sub-family is:

- Highly integrated with two I2S interfaces, two USB Controllers (High-Speed with integrated High-Speed PHY and Full-Speed) and mainstream analog peripherals
- Expandable through a 32-bit SDRAM memory controller and QuadSPI interface supporting eXecution-In-Place (XiP)
- Enabling secure content using a True Random Number Generator, Cyclic Redundancy Check, Memory Mapped Cryptographic Acceleration Unit

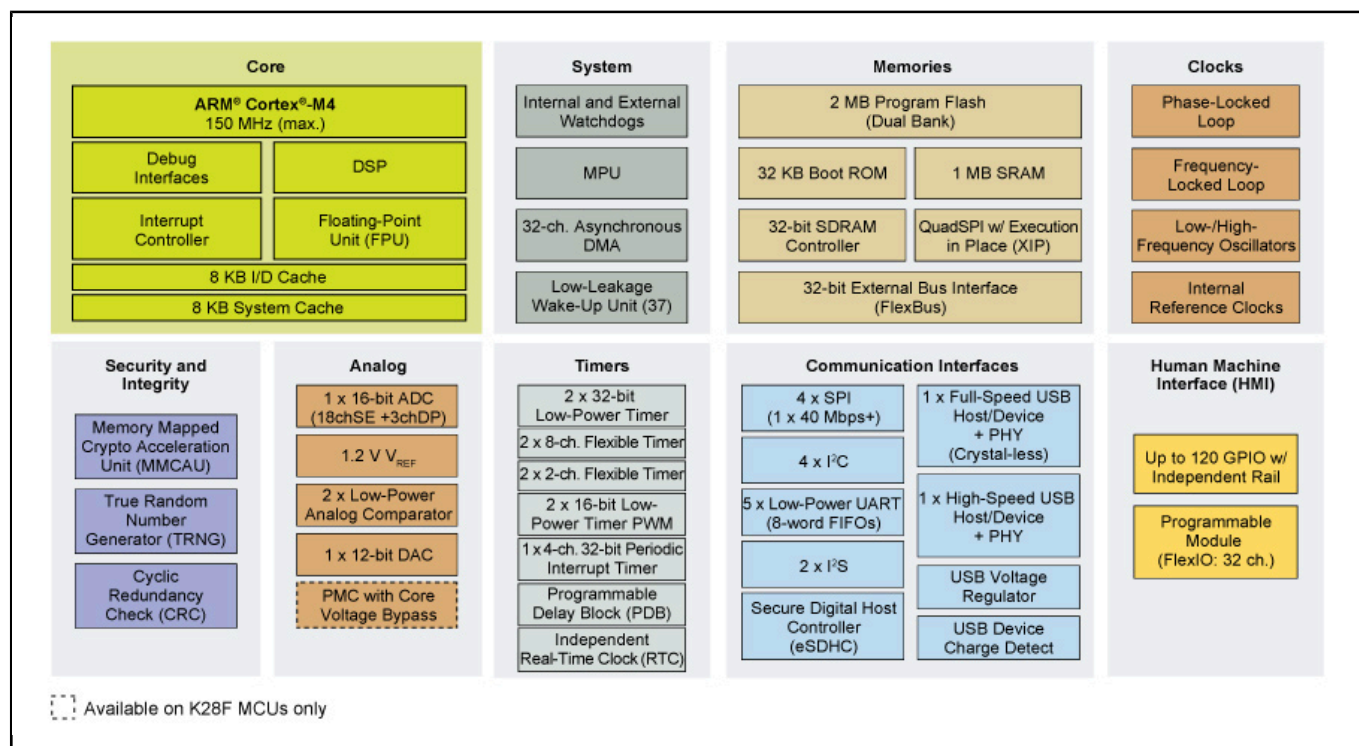
3 Input supply voltage rails: (1.2V, 1.8V and 3V) + separate VBAT domain

K28 implements a Power Management Controller supporting Core Voltage Bypass and can be powered by an external PMIC to maximize the power efficiency of the overall system

Packages: 169 MAPBGA (9x9mm², 0.65mm pitch) and 210 WLCSP (6.9x6.9mm², 0.4 mm pitch)

Evaluation / Development platform: [FRDM-K28F](#)

Kinetis K27/K28 USB MCUs Block Diagram Block Diagram



View additional information for [Kinetis® K28-150 MHz, 2x USB, Core Voltage Bypass, 2MB Flash, 1MB SRAM MCUs based on Arm® Cortex®-M4](#).

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