POS Terminal

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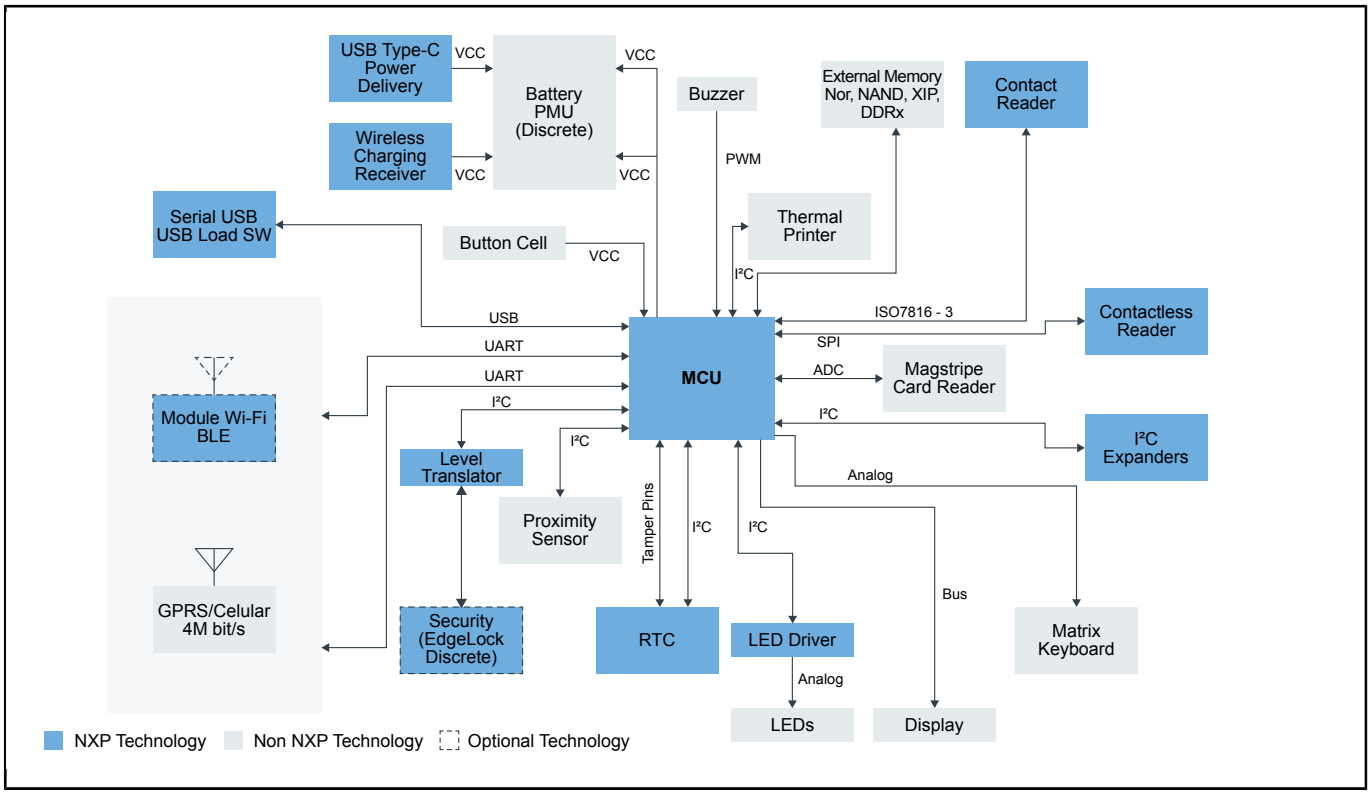
Point of Sale (PoS) terminals are key elements in payment systems for retailers or restaurants in Smart Cities. These battery-powered terminals have small form factors and can integrate functions such as a display, a card reader, a keypad, and a printer. Terminals usually include wireless communication to a back-office server or a main stationary ePOS terminal. They also support magnetic, smart, and contactless payment cards.

NXP solutions power secure, on-the-go mobile payment terminals, providing end users the ease of use of contact and contactless payment. Our security features help the designer to get the necessary PCI PTS PIN entry device (PED) and EMVCo certifications.

POS Block Diagram



Recommended Products for POS	
MCU	• K81_150: Kinetis K81-150 MHz HW Cryptographic Co-Processor, Anti-Tamper and QuadSPI Microcontrollers (MCUs) Based on Arm® Cortex®-M4 Core • i.MX RT1170 Crossover MCU Family - First GHz MCU with Arm® Cortex®-M7 and Cortex-M4 Cores
USB Type C Delivery	• USB Type-C Power Delivery PHY and Protocol IC
RTC	• PCF2129: Accurate RTC with Battery Backup – Selectable I²C-Bus or SPI • PCF2131: Nano-Power Highly Accurate RTC with Integrated Quartz Crystal
Contact Reader	• TDA8035HN: High-Integrated and Low-Power Smart Card Interface • TDA8026ET: Multiple Smart Card Slot Interface
NFC Booster	• PCA9410_9410A: 3.0 MHz, 500 MA, DC-to-DC Boost Converter
Contactless Reader	• PN5180: Full NFC Forum-Compliant Frontend IC
I2C Expander	• PCAL6408A: Low-Voltage Translating, 8-Bit I²C-Bus/SMBus I/O Expander
Wireless Charging receiver	• MWPR1516: 15 Watt Wireless Charging Receiver ICs
Wi-Fi + Bluetooth	• QN908x: Ultra-Low-Power Bluetooth Low Energy System on Chip Solution • IW416: 2.4/5 GHz Dual-Band 1x1 Wi-Fi® 4 (802.11n) + Bluetooth® 5.1 Solution • 88MW32X 802.11n Wi-Fi® Microcontroller SoC • 88W8987: 2.4/5 GHz Dual-Band 1x1 Wi-Fi® 5 (802.11ac) + Bluetooth® 5.2 Solution
Security (EdgeLock Discrete)	• EdgeLock® SE050: Plug & Trust Secure Element Family – Enhanced IoT security with maximum flexibility
Serial USB Load SW	• NX5P3290UK: USB PD and Type-C Current-Limited Power Switch
LED Driver	• PCA9632: 4-Bit Fm+ I²C-Bus Low-Power LED Driver

View our complete solution for POS Terminal.

Note: The information on this document is subject to change without notice.