

# Unleash IoT Innovation with Oxit's MCM-KIT: Your Fast Track to Amazon Sidewalk and LoRaWAN Success

# Introducing the New Face of IoT Development

As an IoT innovator, you're constantly seeking ways to balance reliability, robustness, and resilience with cost, speed to market, and technology fit. Oxit's Multi-Connectivity Module Evaluation & Development Kit (MCM-KIT) is here to help you achieve these goals without compromising on quality or performance. This game-changing tool combines the power of Amazon Sidewalk and LoRaWAN, enabling comprehensive network coverage and redundancy, allowing you to go from prototype to field-deployable product in record time.

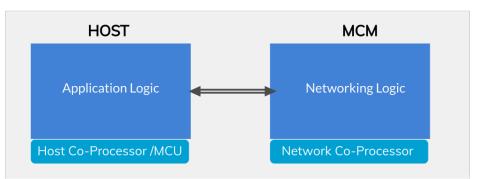
#### The MCM-KIT Advantage

At Oxit, we understand the challenges faced by engineers, product developers, and makers when it comes to IoT projects. The MCM-KIT is designed to address these challenges head-on, providing a seamless development experience that accelerates your time-to-market.

#### **Key Features and Benefits**

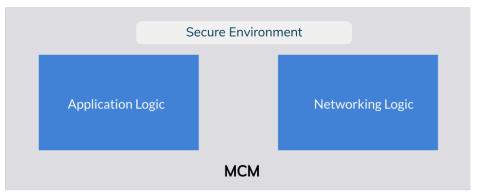
- Multi-Protocol Support: Leverage the power of LoRaWAN and Amazon Sidewalk and effortlessly switch between protocols to optimize network coverage and performance.
- Rapid Prototyping and Seamless Integration: Utilize the MCM-KIT's compatibility with popular development platforms like Arduino, Raspberry Pi, and ST Nucleo, streamline your development process with integrated GNSS and active antenna, and simplify peripheral integration using the Qwiic connection.
- Robust Security and Trust: Implement best-in-class security measures with ARM TrustZone, secure key management, secure boot, and secure debugging, ensuring the integrity and confidentiality of your data and devices.
- AI and ML Acceleration: Harness advanced AI/ML hardware acceleration directly on the module, enabling edge processing for real-time insights and decision-making capabilities.
- Flexible Operating Modes: Choose between Network Co-Processor (NCP) and Host (Standalone) modes, utilizing the MCM-KIT as a standalone device or complementing existing systems.

- Over-the-Air Updates and Low Power Consumption: Keep your devices up-to-date with FUOTA support for LoRaWAN and Amazon Sidewalk, while maximizing battery life with the MCM-KIT's industry-leading low-power consumption.
- Regulatory Compliance and Amazon Sidewalk Certification: Deploy with confidence, relying on the MCM's "Works with Amazon Sidewalk" certification, ensuring compatibility with the Amazon Sidewalk ecosystem.



### NCP Mode

## Host Mode





## **Unleash the Potential of IoT Across Industries**

The MCM-KIT's versatility and powerful features make it an ideal solution for a wide range of IoT applications across various industries, including:

- Smart Home and Healthcare: Enhance home automation, enable remote patient monitoring, and ensure the safety of the elderly.
- Product Improvement and Retail: Collect essential usage data to improve products, streamline asset tracking, and optimize inventory management.
- Smart Cities and Agriculture: Monitor environmental factors, enhance public safety, and optimize crop monitoring and livestock management.

# Why Choose the MCM-KIT?

At Oxit we know firsthand how frustrating it can be to navigate the complexities of new technologies like Amazon Sidewalk. The MCM-KIT is designed to be user-friendly and accessible, providing a convenient path to getting up and running with Amazon Sidewalk quickly and easily.

The MCM-KIT's flexibility, with support for multiple radio technologies and a range of popular development platforms, allows you to tailor your IoT solution to your specific needs without sacrificing performance or reliability. The kit's off-the-shelf enclosure and "Works with Amazon Sidewalk" certification ensures that your device will be ready for the real world from day one.

#### **Comprehensive Software Tools and Resources**

The MCM-KIT isn't just about hardware. We've included a comprehensive suite of software tools and resources to help you get the most out of your IoT projects. The star of the show is our Network Co-Processor (NCP) firmware, which supports seamless communication with LoRaWAN and Amazon Sidewalk networks via APIs. This powerful firmware offloads all the networking complexities of a new design, allowing the Host Processor or MCU to focus on the business and application logic without worrying about the hardcore implementation of the networking stacks, process management, and best practices.

With the NCP firmware, you'll benefit from secure communication, firmware updates over-the-air (FUOTA) for both Amazon Sidewalk and LoRaWAN, and effortless firmware updates via serial interface, eliminating the need for a J-Link debugger. Plus, the firmware integrates with Amazon's Example Sidewalk Mobile App with Bluetooth, providing a solid foundation for your own mobile applications.

To make the most of the NCP firmware, we've provided a rich C-code library and Arduino examples specifically designed for interacting with the firmware. These resources will help you quickly understand how to communicate with the NCP firmware and leverage its capabilities in your own projects. Whether you're an experienced IoT developer or just starting out, the MCM-KIT provides everything you need to bring your ideas to life faster than ever before.

#### Stay Ahead of the Curve

As IoT continues to evolve at a breakneck pace, it's more important than ever to stay ahead of the curve. With the MCM-KIT, you'll be well-positioned to take advantage of the latest advances in Amazon Sidewalk and LoRaWAN technology, without getting bogged down in the details. Whether you're looking to create smart home devices, industrial sensors, or anything in between, this kit is your passport to IoT innovation.

#### **Exclusive Early Adopter Offer**

Join our waitlist today, and you could be one of the first 20 people to receive the MCM-KIT completely free, along with two hours of dedicated support from our expert engineering team. This is your chance to get a head start on the competition and bring your IoT vision to life like never before. Comment on this Article today to enter the waitlist.

## TAKEAWAYS

With the MCM-KIT, you have the tools, flexibility, and support to bring your IoT visions to life. Experience the ease of use, versatility, and unparalleled connectivity that empowers you to create game-changing IoT solutions. Join the revolution and unlock the full potential of your IoT development journey with Oxit's MCM-KIT.

Visit our website at <u>www.oxit.com</u> to learn more about the MCM-KIT and comment on this Article to enter the waitlist today. Together, we can unlock the full potential of IoT and create a smarter, more connected world.

#IoT #AmazonSidewalk #LoRaWAN #Innovation #ProductDevelopment