

# Single Board Computer

## SBC-IOT-LINK-iMX93

Datasheet v1.0



**SBC-IOT-LINK-iMX93 is an Internet of Things (IOT) Single Board Computer based on the NXP i.MX93 processor designed for industrial control and monitoring.**

What truly sets product apart is built-in support for Zigbee, Thread, and Bluetooth Mesh protocols - delivering robust, decentralised networking without additional hardware.

Designed for reliability and with 24/7 operation in mind, SBC-IOT-LINK-iMX93 features extensive wireless and wired connectivity including 4G/LTE modem, WiFi 802.11ax, Bluetooth 5.4, GbE, USB2, 2 x RS485 / CAN-FD.

### Key Features:

- NXP i.MX93 CPU, quad-core Cortex-A55
- Up-to 2GB RAM and 64GB eMMC
- LAN, WiFi, Worldwide LTE modem
- 2 x RS485 / CAN-FD, 3 x DI / DO
- Bluetooth mesh, Thread and Zigbee

**Also available as a IOT Gateway**



## SBC-IOT-LINK-iMX93

Note:

- "Option" column specifies the configuration code required to have the particular feature.
- "+" means that the feature is always available

### CPU Core, Memory and Storage

Feature	Specification	Option
<b>CPU</b>	NXP i.MX9352, dual-core ARM Cortex-A55, 1.7GHz	+
<b>Real-Time Coprocessor</b>	ARM Cortex-M33, 250MHz	+
<b>RAM</b>	1GB – 2GB, LPDDR4	D
<b>Storage</b>	16GB – 64GB eMMC flash, soldered on-board	N

### Network

Feature	Specification	Option
<b>Cellular Modem</b>	4G/LTE CAT-1 bis cellular module, SIMCOM SIM7672 Worldwide LTE, UMTS/HSPA	JS7672G
	4G/LTE CAT-4 cellular module, Telit LE910 Worldwide LTE, UMTS/HSPA	JT910G
	SIM card socket	+
<b>WiFi and Bluetooth</b>	802.11ax WiFi 6 and Bluetooth 5.4 Implemented with NXP IW611 module 1x RP-SMA antenna connector	WB
<b>Wireless Mesh</b>	Bluetooth Mesh, Thread, Zigbee Nordic Semiconductor nRF52840 / Silicon Labs MGM240	WMx
<b>LAN</b>	1x Gbit Ethernet, RJ45 connector	E

# SBC-IOT-LINK-iMX93

## I/O

Feature	Specification	Option
<b>RS485 CAN-FD</b>	Up to 2x RS485 (2-wire) CAN-FD ports Terminal block connector	Fxx
<b>Digital I/O</b>	3x digital outputs / inputs 24V compliant with EN 61131-2 terminal-block connector	DIO
<b>USB</b>	1x USB2.0 ports, type-C connector	+
<b>Debug</b>	1 x serial console via UART-to-USB bridge, micro-USB connector	+
	NXP SDP programming port, micro-USB connector	+

## System

Feature	Specification	Option
<b>RTC</b>	Real time clock with on-board coin-cell battery	+
<b>Watchdog</b>	Hardware watchdog	+
<b>Security</b>	Secure boot, implemented with i.MX93 AHAB module	+
	TPM 2.0, implemented with Infineon SLB9673	+
<b>Indicators</b>	1 x programmable dual-colour LED 1 x power LED	+
<b>POE</b>	Support for PoE (powered device)	POE

## SBC-IOT-LINK-iMX93

### Electrical, Mechanical and Environmental Specifications

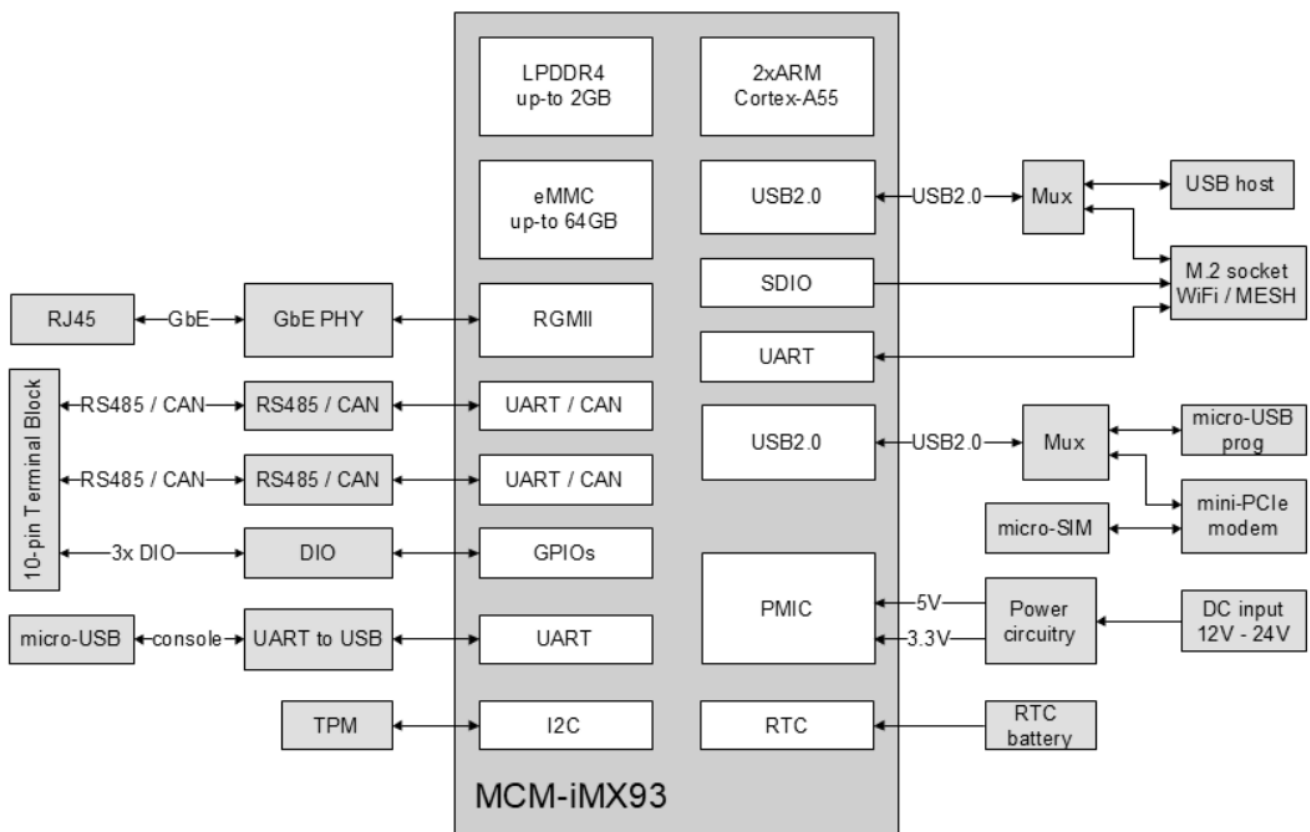
Feature	Specification
Supply Voltage	12V-24VD   C (-20%/+20%) Reverse voltage protection
Power Consumption	1W - 5W, depending on system load and configuration
Dimensions	80 x 52 x 22 mm
Weight	75 gram
Heat-plate	Aluminium heat-plate, 50mm x 50mm *only with 'H' configuration option
MTTF	> 200,000 hours
Operating temperature	Commercial: 0° to 60° C Industrial: -40° to 80° C.
Storage temperature	-40° to 85° C
Relative humidity	10% to 90% (operating) 05% to 95% (storage)

### Software

Feature	Specification
BSP	Full Board Support Package and ready-to-run images
OS Support	Debian Linux, Yocto Project and U-Boot Support for Docker, MS Azure IoT and Node-RED Support for OTA updates with Mender

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## Block Diagram

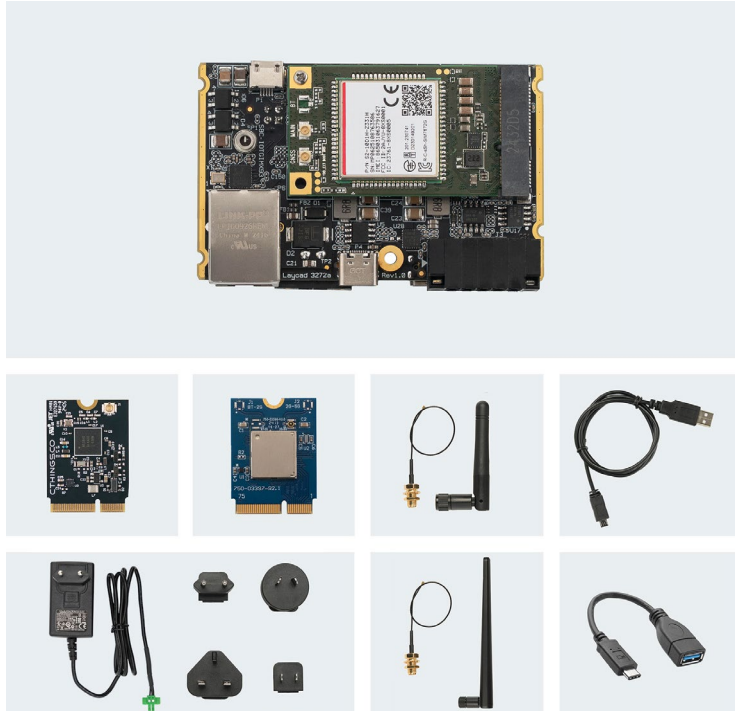


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## SBC-IOT-LINK-iMX93 Evaluation Kit

### Hardware

- SBC-IOTLINK-D2-N32-JS7672G-FARS4-FBCAN-DIO-POE-H-XL-TIC
- WiFi / Bluetooth M.2 module
- Nordic NRF52840 Mesh M.2 module
- Cellular antenna
- 2.4GHz antenna
- 12V PSU with terminal block
- USB cables



### Technical Support

- Technical support for 12 months.
- 45-day trial period. Evaluation Kit will be accepted for refund if the user finds the product not suitable for their needs.

Rev no.	Rev date.	Contents	Page
v1.0	06.08.2025	New creation	