

Processor

Freescale iMX8M PLUS Cortex A53 + M7+ Neural Processing Unit (NPU)

Software

Linux, Yocto

APPLICATION AREAS



AURORA i.MX8M PLUS Smarc 2.0 Module

The AURORA i.MX8M PLUS CPU is a general purpose system on module compliant with SMARC 2.0. Designed to work in Industrial, Automotive, consumer environment and artificial intelligence.

Main Features are:

- ★ Scalable ARM Performance with up to 4x 1.5GHz Cortex-A53 and 1x Cortex-M7 up to 750MHz,
- ★ Neural Processing Unit (NPU): Delivers up to 2.3 TOPS
- ★ MIPI CSI-2 2 x camera interface.
- ★ TPM 2.0 security module.
- ★ Extended longevity up to 15 years.



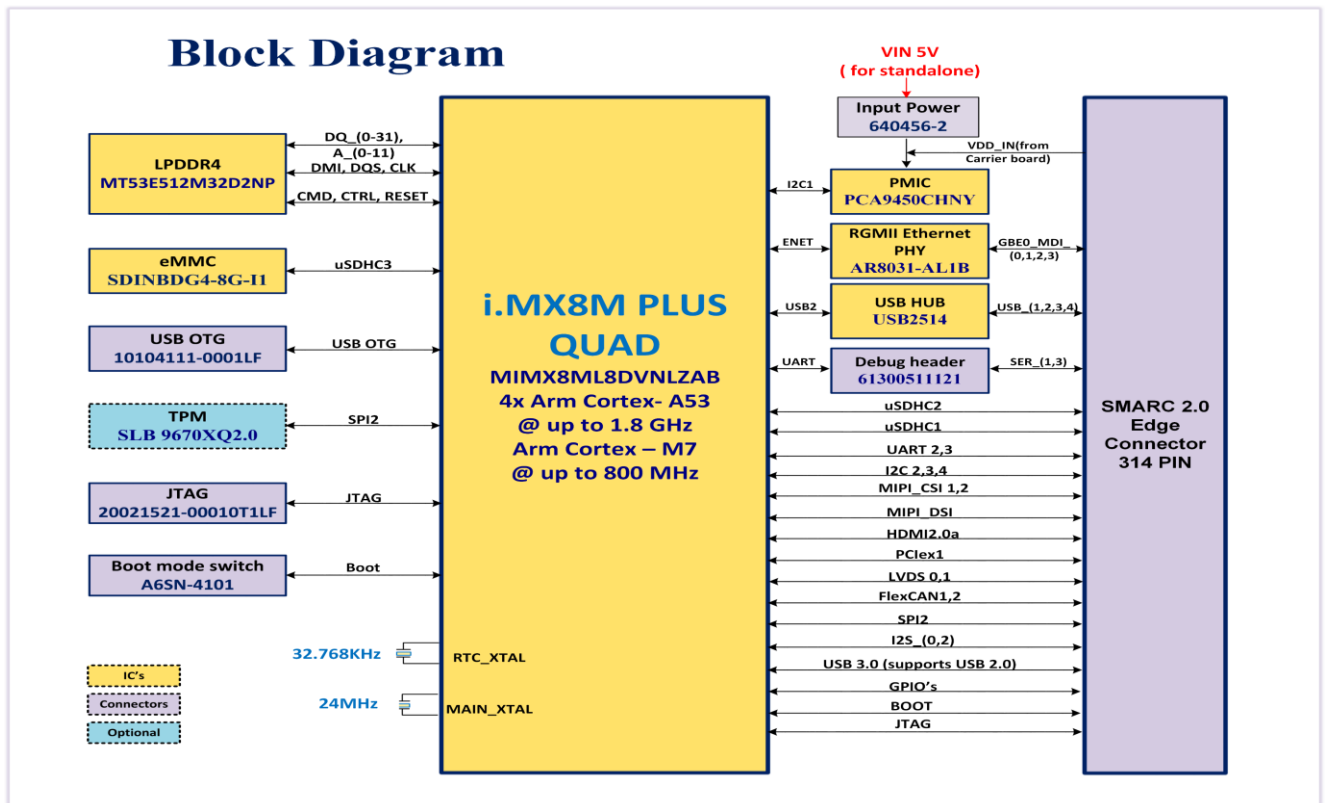
AURORA i.MX8M PLUS SOM

FEATURES OF THE AURORA i.MX8M PLUS SOM

Arm® Core	AURORA i.MX8M PLUS SOM
Arm® Core	4 X Cortex-A53, 1 X Cortex-M7
NPU	Neural Processing Unit (NPU): Delivers up to 2.3 TOPS
DRAM	LPDDR4 - 3600 up to 2GB
eMMC	4GB, ver. 5.0 (HS400) expandable up to 64GB
TPM	Trusted Platform Module compliant 2.0
GPU	3D GPU (2x shader, OpenGL® ES2.0/3.0/3.1, OpenCL™ 1.2, Vulkan®)
CSI	2x MIPI CSIx4

Arm® Core	AURORA i.MX8M PLUS SOM
VIDEO	2x LVDS up to 1920X2100 60fps 1x HDMI 2.0A 4K 30fps 1x DSI up to 1920X2100 60fps
Ethernet	2 x Gigabit
ISP	Dual Image Signal Processor (ISPs): Resolution up to 12MP and input rate up to 375MPixels/s
USB	4 x USB 2.0 2 x USB 3.0
Operating System	Linux 5.4.3, Yocto Zeus
Dimensions	85x50mm
Temperature	-40° to +105° C

AURORA BLOCK DIAGRAM



ORDERING

ORDERING CODE	DESCRIPTION	Comments
ARA_000_0_0	Full feature board	Standard product