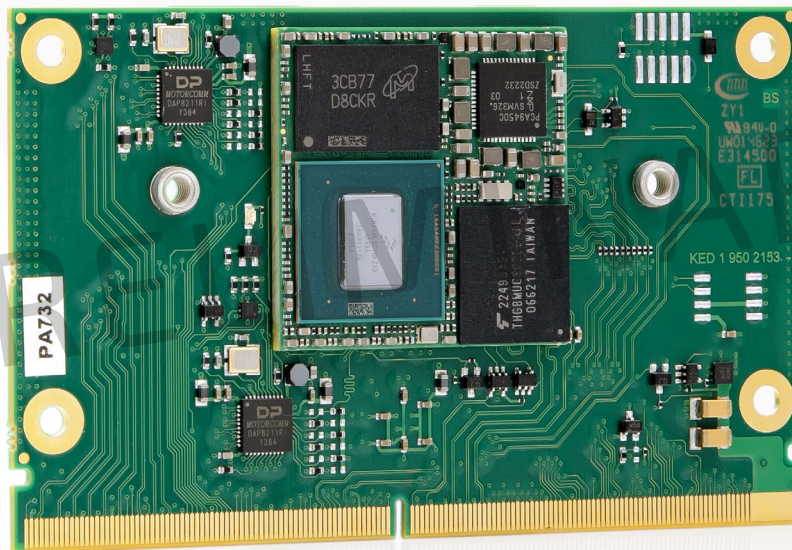


SMARC™-sAMX8M+

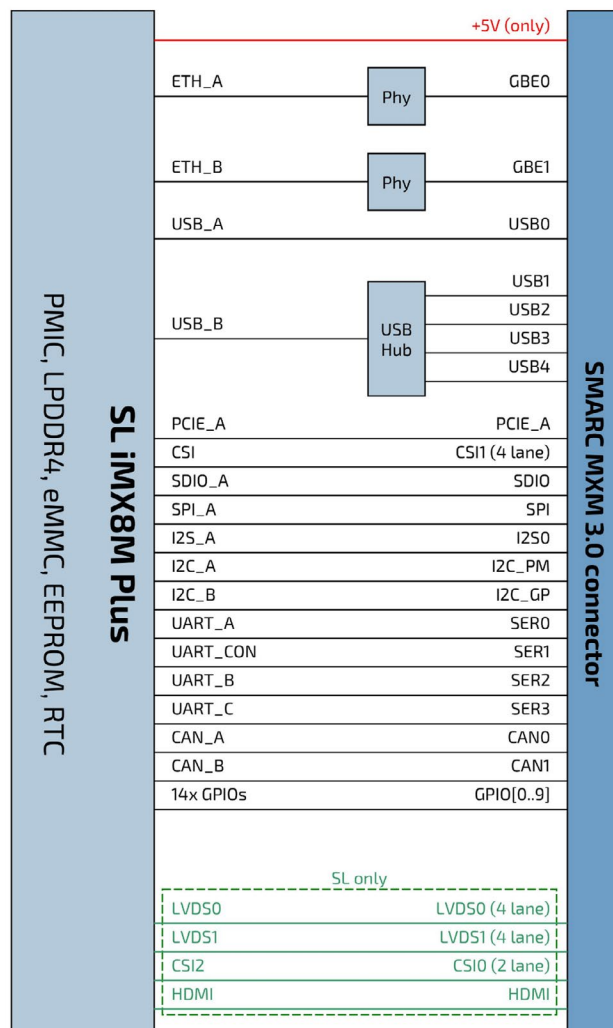


SMARC™ Module with low power i.MX8M Plus series processor

- ▶ NXP i.MX8M Plus, 4x Arm® Cortex®-A53 @1,6 GHz with Neural Processing Unit (NPU) and 1x Arm® Cortex®-M7 @800 MHz
- ▶ 3x Display Support (MIPI-DSI/LVDS/HDMI 2.0a)
- ▶ Dual Camera Support (4-lane CSI with PHY)
- ▶ Dual Gbit Ethernet (1x with Time Sensitive Network TSN)
- ▶ 2x USB 3.0

COMPLIANCE	SMARC™ 2.1
DIMENSIONS (H X W X D)	82 x 50 mm
CPU	NXP i.MX8M Plus
MAIN MEMORY	4 GByte LPDDR4 (optional 1 GByte, 2 GByte)
ETHERNET	2x 1 Gbit/s IEEE 1588 (1x mit TSN)
FLASH ONBOARD	32 GByte (optional 4 GByte up to 64 GByte)
PCI EXPRESS® SUPPORT	1x PCIe
DISPLAY	1x LVDS, 1x HDMI, 1x MIPI DSI, up to 4K @30fps 2x MIPI CSI (4-lane)
USB	2x USB 3.0
I/O	4x UART, 2x I ² C, 2x SPI, 17x GPIO, 3x PWM, 1x PCIe, 1x SAI, 2x SDIO (1x 4-bit, 1x 8-bit) 2x CAN FD
BOOT LOADER	U-Boot
OPERATING SYSTEM	Yocto Linux
POWER SUPPLY	5 V DC ±5 %
TEMPERATURE	-25 °C to +85 °C (operating and non-operating)
HUMIDITY	93 % relative Humidity at 40 °C, non-condensing (according to IEC 60068-2-78)

Block Diagram



ARTICLE	PART NO.	DESCRIPTION
SMARC-sAMX8M+ quad 4G/32G	51020-0432-16-4	Computer on Module SMARC with NXP i.MX8M Plus, quad 1.6 GHz; 4 GB LPDDR4, 32GB eMMC

Carrier

ARTICLE	PART NO.	DESCRIPTION
SMARC Evaluation Carrier 2.1	51301-0000-00-0	SMARC Evaluation Carrier for SMARC modules according to the SMARC 2.1 standard (without SMARC module)

Cooling

ARTICLE	PART NO.	DESCRIPTION
HSP SMARC-sAMX8M+	51020-0000-99-1	Heatspreader for SMARC-sAMX8M+

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