

Single Board Computer

Developer Board 11



The DB 11 is a refined version of the single board computer product developed by Geniatech based on the NXP i.MX 8M Mini platform. The i.MX 8M Mini is NXP's first embedded multicore applications processor built using advanced 14LPC FinFET process technology, providing more speed and improved power efficiency. With commercial and industrial level qualification and backed by NXP's product longevity program, the i.MX 8M Mini family may be used in any general purpose industrial and IoT application.

Multicore Processing

4xCortex-A53 core up to 1.8GHz per core
32KB L1-I Cache/ 32 kB L1-D Cache
512 kB L2 Cache
1x Cortex-M4 core up to 400MHz
16 kB L1-I Cache/ 16 kB L2-D Cache

Balance of consumption and performance

Support for high-performance scenarios
Supports low power scenarios

OS Support

Ycoto(Linux), Default
Android 9.0
Windows 10 IoT Core

Customizable

Customizable hardware interface functions
board functions.
Structure of the custom.
Design for You, Manufactured by Us

Scalability

Support 96 Mezzanine Board design specification, can easily extend any function

Excellent audio and visual function

A variety of audio interfaces are available, including I2S, AC97, TDM and S/PDIF

Wide range of applications

- Smart Home
- Audio field
- Entertainment
- Advertising machine
- Edge Computing
- Gateway

Enterprise service

Provide comprehensive quality assurance, technical support and mass production services



Product Specification

Processor	Quad core ARM Cortex A53(64bit) Cortex M4
CPU Frequency	1.2GHz
Memory	2GB LPDDR4(1-4GB optional)
Storage	8GB eMMC5.1(8-128GB optional)
WLAN	Wi-Fi 5 Dual-band 2.4GHz/5GHz Bluetooth 4.1(integration) Separate Bluetooth support :BT4.0(optional)
Ethernet	RJ45-100/1000 MHz
Security	Encryption IC Support
Display	HDMI V1.4
USB	USB 2.0 Type A *2
Micro-USB	OTG
TF-Card	SDIO 3.0
RTC(Real-Time Clock)	Support
Key	Volume+/volume-/Power
Indicator light	User(Programmable)*4 System status*3
	1x Mezzanine boards 40 pin Low-Speed connector • UART, SPI, I2S, I2C x2, GPIO x12, DC power
Connectivity	1x Mezzanine boards 60 pin High-Speed connector • 4L-MIPI DSI, USB, I2C x2, 2L+4L-MIPI CSI
	1xoptional 16-pin Analog expansion connector • Headset, Speaker, FM antenna
Mechanical properties	
Size (mm)	85*60
Net Weight (g)	35
Power	12V/1.5A
Wide working range	Consumer (0° C to 95° C Tj) Industrial (-40° C to 105° C Tj)
RoHS and Reach compliant	Yes