



ASUS Tinker Board S

With the Tinker-Board S, ASUS introduces the successor of the legendary Tinker Board.

The new and improved Tinker Board S is a single board computer (SBC) that offers greater durability, better stability and an overall improved user experience for DIY enthusiasts and makers everywhere.

With its powerful and modern quad-core ARM-based processor — the Rockchip RK3288 — Tinker Board S offers significantly improved performance versus other popular SBC boards. To provide the flexibility needed for different builds and projects, Tinker Board S features 2GB of LPDDR3 dual-channel memory and is equipped with an onboard 16GB eMMC and SD 3.0 interface that offer significantly faster read and write speeds for the OS, applications and file storage.

Featuring a powerful but energy-efficient design, Tinker Board S supports next-generation graphics and GPU computing API's. Powered by an ARM-based Mali™-T760 MP4 GPU,

Tinker Board S' GPU and fixed-function processors allow for a wide range of uses, including high-quality media playback, gaming, computer vision, gesture recognition, image stabilization and processing, as well as computational photography and more.

Tinker Board S has HDMI CEC hardware circuit implemented, with the supported software, it allowing multimedia enthusiasts to control TV outputs using a single remote control for a better entertainment experience. Other fixed functions include H.264 and H.265 playback support, as well as HD and UHD video playback.

Tinker Board S also features Gbit LAN for Internet and network connectivity. A dedicated bus resource designed for the LAN port ensures consistent Ethernet performance. The integrated Wi-Fi and Bluetooth controller on the Tinker Board S is shielded with a metal cover to ensure minimal interference and improved radio performance. An integrated IPEX antenna header allows for easy antenna replacement or upgrades.

More Durable

- Onboard 16GB eMMC storage to enhance performance and stability, plus a microSD slot for greater flexibility
- Low-voltage input detection to avoid power issue and ensure system stability if using a non-qualified* power supply

Better User Experience

- HDMI-CEC-ready for complete video entertainment, allowing users to command both Tinker Board S and a TV with a single remote control
- Audio jack plug-in detection and auto-switch to 3.5mm audio jack from other interfaces

Always Moving Forward with Makers

- Onboard power-on pin for makers giving more freedom when bringing their ideas to life
- Enhanced I2S pin with Slave mode and an improved software API for better compatibility

Technical info

- **Chipset:** ARM Cortex-A17 32-bit Quad
- **CPU Clock:** 180MHz
- **RAM:** 2048mb
- **Memory:** 16 (max. 64) GB
- **LAN:** 10/100/1000

- **HDMI:** Yes
- **SATA:** No
- **USB:** 4
- **Interfaces:** LVDS, S/PDIF
- **Audio:** Yes
- **Microphone Port:** No
- **I/O:** 40
- **SPI:** Yes
- **I2C:** Yes
- **UART:** Yes
- **Bluetooth:** 4.0
- **SD-Slot:** No
- **microSD-Slot:** Yes
- **CSI:** Yes
- **DSI:** Yes
- **Operating Voltage:** 5 V
- **Low-voltage connection:** Micro USB Type B
- **Low-voltage input:** 5 V DC

Note: All Raspberry Pi B +, 2 & 3 cases can also be used with the Asus Tinker S!

