

ASUS IoT Middleware

DATASHEET

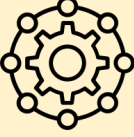





Provide set of tools (Configuration tools, API, protocols) to communicate and to manage ASUS IoT devices easily

What is ASUS IoT Middleware






ASUS has created IoT Middleware to simplify system customization and application development on ASUS IoT platforms.

The Middleware supports x86, ARM solutions, and can be used with Windows, Linux and Android.

VALUE

| | | |
|-------------------|---|---|
| Target Customers |  <p>SI of no code/low code</p> |  <p>SI with coding capability</p> |
| Key Features |  <p>Config tools (Command & GUI)</p> |  <p>API</p> |
| |  <p>Always connected</p> |  <p>Protocols (Modbus, MQTT...)</p> |
| Customer Benefits | <ul style="list-style-type: none"> Quick config, easy customize | <ul style="list-style-type: none"> Access all hardware features Protocols & code template to easily connect sensors |

KEY FEATURES

| | | | | |
|--|--|---|--|---|
|  |  |  |  |  |
| GUI Config tool | Command line Config tool | API | Protocols | Always Connect |
| <ul style="list-style-type: none"> CPU voltage System temperature Watchdog GPIO Power schedule Smart Fan | <ul style="list-style-type: none"> Board Info Watchdog I2C GPIO / DIO Hardware Monitor Smart Fan Power schedule Buzzer | <ul style="list-style-type: none"> Fully access ASUS Hardware EAPI compliant Board Info, Watchdog, I2C, GPIO, DIO Hardware Monitor, Smart Fan, Power schedule, Buzzer USB port reset | <ul style="list-style-type: none"> MQTT Modbus BACNET | <ul style="list-style-type: none"> LTE auto-recover Wi-Fi / LTE auto-failover |

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| Features | Functions ⁽²⁾ | x86 | | Tinker Board series | | ARM IPC |
|--------------------------|-----------------------------------|---------|------------|---------------------|------------------|------------------|
| | | Windows | Linux | Linux | Android | Linux |
| System Monitor & Protect | Hardware monitor API | V | By request | | | |
| | Smart Fan API ⁽³⁾ | V | By request | | | |
| | Power schedule API ⁽³⁾ | V | By request | | | |
| | Watchdog API | V | By request | V ⁽⁴⁾ | | V ⁽⁶⁾ |
| | Board Info API | V | By request | V | | V |
| | Buzzer API | V | By request | | | |
| | USB port reset | V | By request | | | |
| Peripheral | G sensor/ RTC/ COM/ Wakeup | | | | | V ⁽⁷⁾ |
| | GPIO (DIO) API | V | By request | V ⁽⁴⁾ | V ⁽⁴⁾ | V |
| | I2C API | V | By request | V ⁽⁴⁾ | V ⁽⁴⁾ | |
| | SPI API | | | | V ⁽⁴⁾ | |
| | UART API | | | | V ⁽⁴⁾ | |
| | PWM API | | | | V ⁽⁴⁾ | V ⁽⁷⁾ |
| Protocols & Connectivity | LTE auto recover | | | V ⁽⁵⁾ | | V ⁽⁶⁾ |
| | Wi-Fi / LTE failover | | | V ⁽⁵⁾ | | V ⁽⁶⁾ |
| | protocols (MQTT, Modbus, REST) | | | | x | V |

SUPPORTED MODELS

| Category | x86 | Tinker Board series | ARM-based IPC |
|----------|--------------------------|-------------------------------------|------------------|
| Models | Please contact our sales | Tinkerboard 2 / 2S Tinker Edge R | PE100A PV100A |