ACKme NETWORKS

WiConnect

WiConnect?
Because ACKme makes it easy!

Connect your device with just a few easy-to-use serial commands.

▶ FEATURES

- Self-hosted network stack supports various network protocols including UDP, TCP, HTTP, DHCP client/server, SMTP
- Industry standard SSL/TLS security for end-end Secure TCP & HTTPS transactions
- UART/SPI streaming & command modes for flexible, device friendly data transfer
- Multi-megabit throughput for high-bandwidth applications
- Configuration & setup options including UART, SPI, Wi-Fi softAP/webserver, WPS
- Fully encrypted Over-the-Air (OTA) firmware upgrade capability
- GPIO-controlled network connections
- Peripheral API provides access to digital GPIOs and analogue functions
- Intelligent power management with programmable wakeup options

▶ APPLICATIONS

- Environmental & energy monitoring
- Wireless sensing, remote data logging
- HVAC, power, light & thermostat control
- Appliance control
- Security cameras
- Door/window monitoring
- Fitness equipment
- Home health monitoring
- Medical devices
- Audio
- Toys & robots
- And more...

YOUR DEVICE. CONNECTED.

Connect your device in no time flat using an ACKme Wi-Fi module and WiConnect – the easy-to-use Wi-Fi networking application.

WiConnect avoids costly Wi-Fi software development effort, and provides the added bonus of integrated cloud connectivity for data sensing and device remote control.

HIGHLIGHTS

- Provides a host processor with a high-speed, low power wireless networking connection
- Efficient API, even the smallest microcontrollers can connect
- Integrated Sensors.com commands provide your device with instant cloud connectivity for always connected reporting and control
- Works with all ACKme Wi-Fi modules

iOS   Android   Windows   Mac   Linux

Device MCU/MPU — UART SPI — **Wi**Connect ACKme Wi-Fi Module — Wi Fi™

APPLICATION EXAMPLE
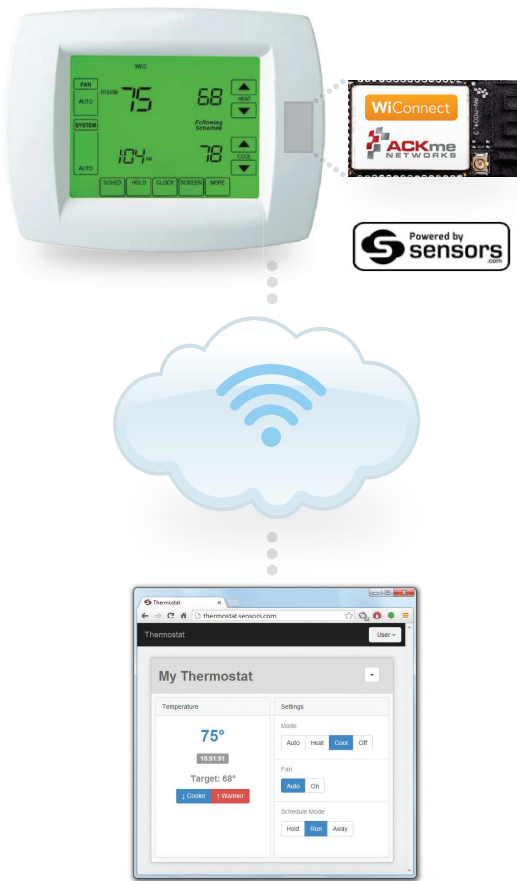
Cloud-Connected Thermostat with
WiConnect and Sensors.com

ABBREVIATED COMMAND SET

| Wi-Fi & Networking Commands	
scan	Scan for Wi-Fi networks in range
setup	Enter setup mode. Enables Wi-Fi setup using an on-board Wi-Fi Access Point and client web browser
http_get	Download an HTTP or secure HTTPS web page
http_post	Post a query (or data) to a remote webserver
tcp	Open a TCP connection with a remote server
udp	Open a UDP connection with a remote server
tls	Open a secure TLS connection to a remote server
ntp	Get the time from a network server
email	Send an email to a pre-configured email address
Cloud Commands Using Sensors.com API	
sdc_identify	Register a device with the Sensors.com cloud service
sdc_sample	Send a sensor sample to the Sensors.com cloud service
sdc_get_params	Get control parameters from the cloud service
Peripheral Commands	
gpio_set	Set the value of a general purpose I/O pin
gpio_get	Get the value of a general purpose I/O pin
ioconn_gpio	Use a GPIO to open a connection to a network host
wlan_status_gpio	Use a GPIO to indicate wireless network status
System Commands	
bus_mode	Set serial bus to streaming or command mode
ota	Initiate a secure Over-the-Air Firmware Upgrade
time	Get the local time from the real time clock

WiConnect EVALUATION BOARD

Evaluating WiConnect using ACKme's Wi-Fi modules is easy. Simply plug the board into a PC using a standard USB cable, open a terminal application and start typing!

The evaluation board includes:

• USB-serial interface for simplified UART communications & power
• Two buttons & two LEDs to demonstrate I/O control
• Expansion headers to break out every pin on the module
• Reset button

Contact us at sales@ack.me or +1 (408) 910 3438
Or for more information, visit us online at http://ack.me
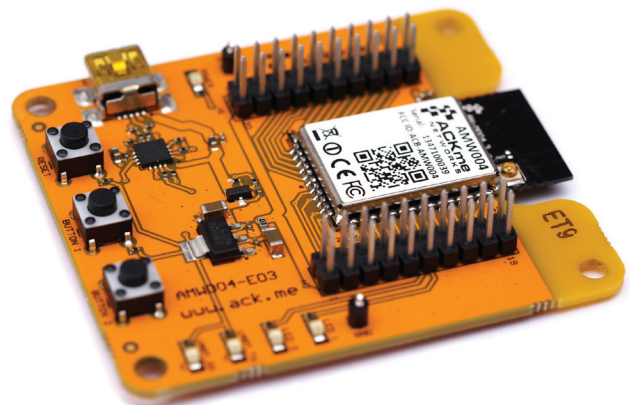
ABOUT ACKme NETWORKS, INC.

ACKme Networks offers a range of industry leading cloud-connected wireless communication modules including Wi-Fi, Bluetooth, Bluetooth Low Energy and GPRS cellular. ACKme is headquartered in Silicon Valley, USA with a design centre in Sydney, Australia and a range of international distributors.