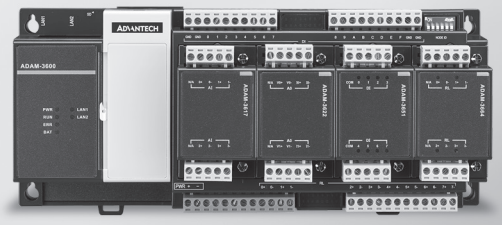
ADAM-3600-C2G

8AI / 8DI / 4DO / 4-Slot Expansion Wireless Intelligent RTU

NEW



Features

- High Performance CPU Cortex A8 600MHz
- Low Power DDR3L 256MB RAM
- Embedded Real-time Linux Kernel
- Domain Focused Onboard IO -8AI / 8DI / 4DO
- 4-Slot I/O Expansion
- High I/O Flexibility with 4-slot I/O Expansion
- Multiple wireless options for Zigbee/ Wi-Fi/ 4G/ Cellular
- IEC61131-3&C Programming Language
- Modbus & DNP3 & IEC-60870-5-104
- Operation Temperature -40 ~ 70°C
- Internal Webpage for Online Monitoring
- Data Logger on SD card
- Support Azure IOT-Hub
- Support MQTT Client for cloud communication

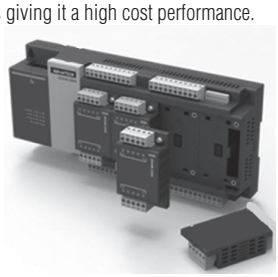
Introduction

ADAM-3600-C2G is an cloud ready intelligent Remote Terminal Unit with multiple wireless function capability, multiple I/O selection, wide temperature range and supports flexible communication protocol for oil, gas and water applications. In these application environments, ADAM-3600 is ideal for remote inhospitable regions with many devices that need to be managed remotely.

Features

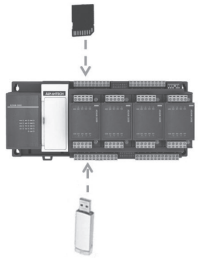
Wide Array of Flexible I/Os

Wide array of on-board I/O and flexible expansion I/O modules supporting different acquisition requirements giving it a high cost performance.



Remote Firmware Update

The ADAM-3600 can use a USB drive and an SD card to automatically update the firmware so there's no need to bring a computer and execute the configuration program in the field.



Wireless Communication & Protocols

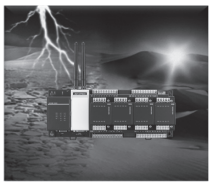
The ADAM-3600 simultaneously supports two mini-PCIe cards (a half-size and a full-size) for Wi-Fi/ 3G/ GPRS/ Zigbee communication which is flexible for wiring in the field. Modbus RTU/TCP and DNP3 protocols integrate ADAM-3600 with more SCADA systems.

Intelligent Connectivity Diagnosis Manager (iCD Manager)

Remotely monitor serial and Ethernet port status and send alarm information during communication failures to help improve intelligent monitoring.

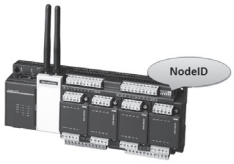
Wide Temperature Range

A -40 ~ 70°C operating temperature allows the ADAM-3600 to work in harsh environments and reduces maintenance costs for customers.



Node ID for Batch Configuration

Each ADAM-3600 has a node ID as its name to support batch configuration (max.64) with the configuration utility. When an alarm is displayed on the utility, customers can directly find the fault source with the node ID.



All product specifications are subject to change without notice.

Specifications

Control System

- **CPU** Cortex-A8 AM3352
- **Memory** RAM 256MB
  Battery Backup RAM 32KB
- **OS** RT-Linux V3.12
- **Storage** MicroSD card / 1GB included for system
  SD card slot / Optional
- **Programming** IEC-61131-3, Linux C
- **Watchdog** Yes
- **Real-time Clock** Yes
- **Power Input** 10 ~ 30 V_{DC}
- **Power Consumption** 24V @ 5W

Communication

- **Protocol** Modbus/TCP, DNP3 L2, TCP/IP, DHCP, IEC104, MQTT, SMTP, NTP
- **Serial Port** 1 x RS232/485- DB9
  ADAM-3600-C2GL1A1E:2 x RS485-Terminal Block (data bit:5,6,7,8)
  ADAM-3600-C2GL1B1E:2 x RS485-Terminal Block (data bit:8)
- **Ethernet Port** 2 x RJ-45 10/100 Mbps
- **USB Port** 1 x USB 2.0
- **VGA Port** 1 x D-SUB15
- **LED** System LEDs/ IO LEDs
- **Isolation** 2000 V_{DC}
- **PLC driver support** Siemens/Mitsubishi/Omron/Allen-Bradley, Delta etc
- **Cyber Security** SSL, SSH, white list

Analog Input

- **Channel** 8 differential
- **Resolution** 16-bit
- **Input Type** ±10V, ±2.5V, 0 ~ 20mA, 4 ~ 20mA
- **Isolation** 2,000 V_{DC}

Digital Input

- **Channel** 8
- **Input Type** Wet Contact
- **Protection Voltage** +40 V_{DC}
- **Isolation** 2,000 V_{DC}

Digital Output

- **Channel** 4
- **Output Type** Open Collector (Sink)
- **Rated Voltage** 8 ~ 30 V_{DC}
- **Isolation** 2,000 V_{DC}

Wireless Communication (Selectable)

- **Interface** Mini-PCIe (1 x Half-Size / 1 x Full-Size)
- **Wireless Type** Zigbee- UART Signal
  Wi-Fi/Cellular/4G- USB Signal

General

- **Certification** CE/FCC (No RED certification)
- **Operating Temp.** -40 ~ 70°C
- **Storage Temp.** -40 ~ 85°C
- **Humidity** 5 ~ 95%(no-condensation)
- **Mounting** DIN 35 rail/ Wall Mount

I/O Expansion Module Selection Table

Unit: Channels

Expansion Module	RTD	AI	T.C.	AO	DI	DO	Relay
ADAM-3613	4						
ADAM-3617		4					
ADAM-3618			4				
ADAM-3624				4			
ADAM-3651					8		
ADAM-3656						8	
ADAM-3668							4

Ordering Information

- **ADAM-3600-C2GL1A1E** 8AI/8DI/4DO/4-Slot Expansion Wireless Intelligent RTU (Phase out)
- **ADAM-3600-C2GL1B1E** 8AI/8DI/4DO/4-Slot Expansion Wireless Intelligent RTU (New)

Optional Accessory

Cellular Solution (SIM card is not included)

- **96PD-EC25EFA** LTE Cat 4 Module with GNSS
- **1750006264** SMA(F) Cable, 15 cm
- **1750005865** Dipole Antenna, 11 cm

WIFI Solution

- **96PD-RYUW131A1** WiFi 4 2.4GHz mPCIe with antenna and cable (SMA cable and antenna included)
- **EWM-W180H01E** 802.11ac/a/b/g/n 2T2R Wi-Fi + BT 5.0 half-size mPCIe module
- **1750008717-01** WiFi 2.4GHz+5GHz dipole antenna (-40 °C ~ + 65 °C) (Recommend usage qty: 2pcs)
- **1750006043** Wi-Fi Coaxial Cable, 150 mm (Recommend usage qty: 2pcs)
- **9656EWMG00E** Half-size miniPCIe to miniPCIe bracket set

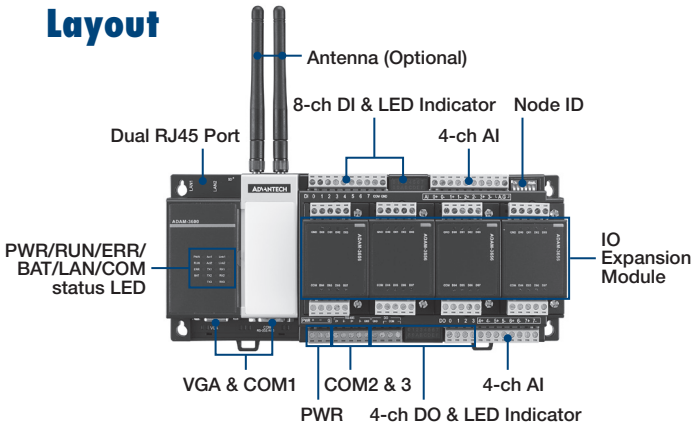
GPS Solution

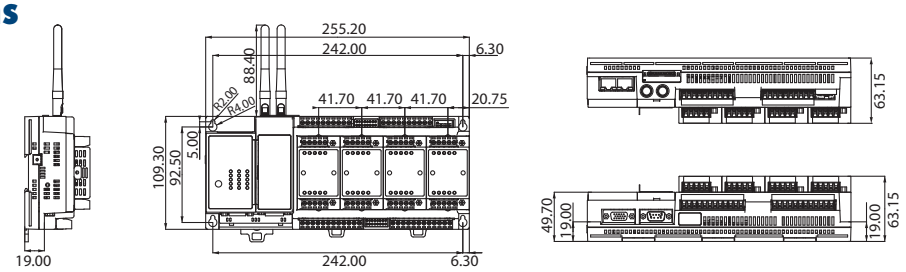
- **EWM-G108H01E** GPS/GNSS Half-MiniPCIe card
- **1750006264** SMA (F) Cable, 15cm
- **1750006432** Antenna 4.5 dBi, 500cm

Storage Solution

- **SQF-ISDS1-4G-82E** SLC 4G, 1CH (-40 ~ 85°C)
- **SQF-ISDS1-32G-82E** SLC 32G, 1CH (-40 ~ 85°C)

Layout



Dimensions

Unit: mm