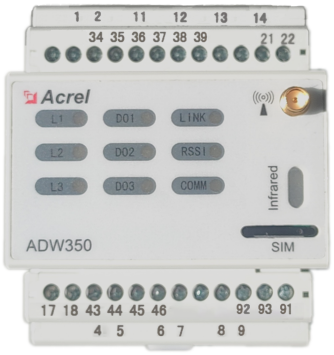
ADW350
Wireless Metering Meter



General

ADW350 Wireless Metering Meter is mainly used to metering three phase active energy on low voltage network. The product boasts of advantages including compact size, high precision, rich features. According to different requirements, there are many communications functions like RS485 communication, NB, 4G, adding the new current sampling mode using external transformer. It can be flexibly installed in the distribution box to achieve sub-item electric energy metering, operation and maintenance supervision or power monitoring requirements for different regions and different loads.

Product model and specification

■ Model Description

ADW350 □ □ - □ / □ □ □

- T：Two-way temperature
- C:RS485
- K:3DO
- NONE;NB:NB-IOT;4G:4G
- A:AC;D:DC
- Empty:Built-in current transformers;
  W:External open type current transformers
- Wireless measuring modle

■ Model Description

Function	Function description
Display mode	LED
Energy metering	Active kWh (positive and negative), quadrant reactive power energy
Electrical measurement	U、I、 P、Q、S、PF、F
Harmonic function	THDv、Harmonic on 2nd-31st
Pulse output	Active pulse output
Three-phase unbalance degree	Voltage unbalance,current unbalance
Temperature measurement	Twoway temperature（Alternate configuration:T）
DI/DO	3DO（Alternate configuration:K）
External current transformer	External open type current transformer （Alternate configuration:W）
Electrical parameter	Undervoltage, undercurrent, overcurrent, underload, etc
Communication	Infrared communication
	RS485（Alternate configuration:C）
	NB-IOT（Alternate configuration:NB）
	4G（Alternate configuration:4G）

Technical Parameter

■ Electrical performance

Voltage input	EnerRated voltage	AC:3×57.7/100V，3×220/380V，3×380/660V，3×100V, 3×380V，3×660V;DC: 48V
	Reference frequency	AC:50Hz
	Consumption	<0.5VA(Each phase)
Current input	Input current	AC:3×20(100)A;DC:50A，100A
	Consumption	<1VA(Each phase)
Auxiliary power	Power Supply	AC:85~265V；DC:48V±20%
	Power consumption	<5W
Measurement performance	Electrical parameter	Class 0.5
	Active energy accuracy	Class 1
	Temperature Range	-40℃~100℃
	Temperature accuracy	±2℃
DO	Contact Rating	5A，AC250V/DC30V
Pulse	Width of pulse	80±20ms
	Pulse constant	AC：400imp/kWh DC：1600imp/kWh
Communication	Wireless	2G；NB；4G
	Infrared communication	The constant baud rate is 1200
	Interface	RS485(A、B)
	Connection mode	Shielded twisted pair conductors
	Protocol	MODBUS-RTU

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■ Work environment

Temperature range	Operating temperature	-20℃~55℃
	Storage temperature	-40℃~70℃
Humidity		≤95% (No condensation)
Altitude		<2000m

Dimension and installing description

■ Dimension (Unit: mm)

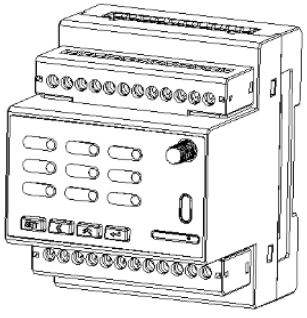


Figure 1 Rendering of ADW350

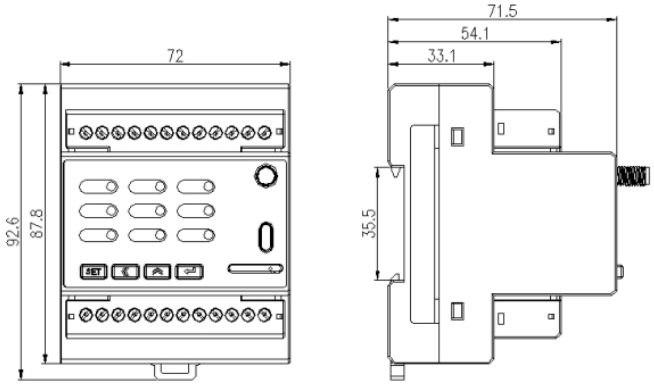


Figure 2 Dimension of ADW350

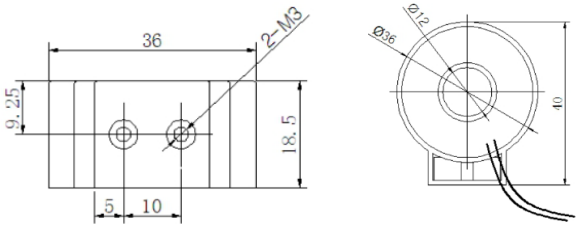


Figure 3 Dimension of transformer (ADW350WA 20(100)A)

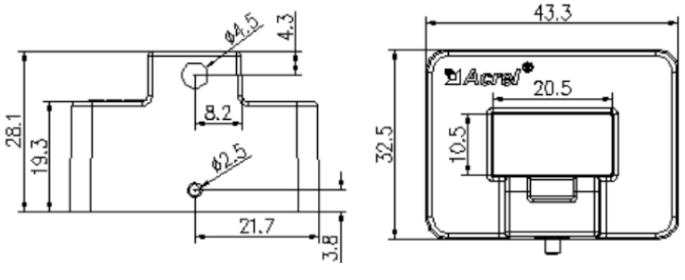


Figure 4 Dimension of Hall current sensor AHKC-BS (ADW350WD)

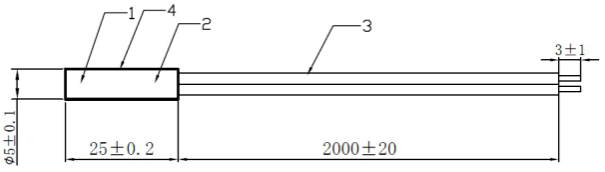
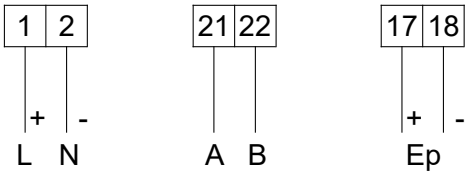


Figure 5 Dimension of K-Type

■ Interfaces of Auxiliary power supply, Communication and Pulse

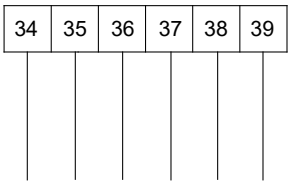


Auxiliary power supply InterfaceCommunication InterfacePulse Interface

■ Interfaces of DI and DO

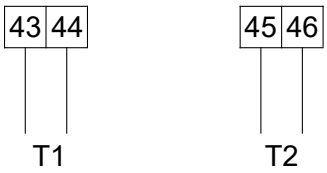
The digital output is realized by relay for remote control and alarm output.

The digital input is realized by digital signal input. The meter has a built-in +12V working power supply so that it does not require external power supply. The meter collects the external break-make information with digital input module and displays it locally. The digital input not only collects and displays the local break-time information but also provides the remote transmission, i.e. remote communication, with RS485.



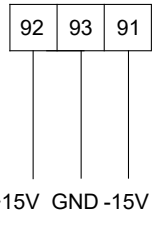
Digital output

■ Interfaces of Temperature



Temperature input

■ Interfaces of Hall current sensor



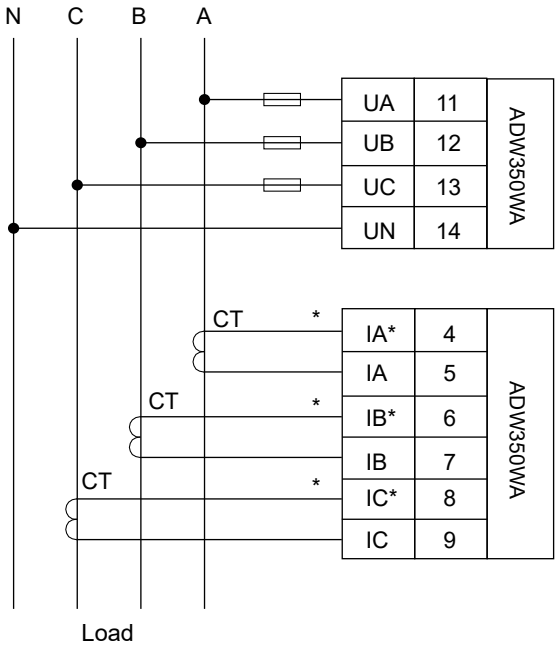
Auxiliary Power

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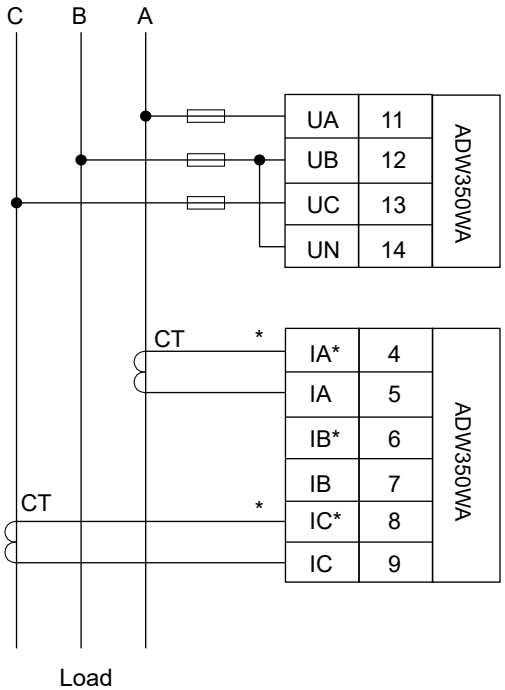
■ Instruction of wiring

There are four modes of connection like 3-phase 4-wire (current connected via CT), 3-phase 3-wire (current connected via CT), 3-phase 4-wire (current connected via PT and CT) and 3-phase -wire (current connected via PT and CT).

◆ ADW350WA



3-phase 4-wire

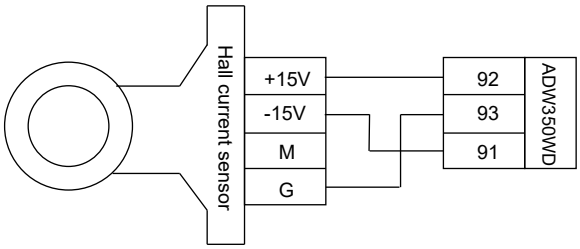


3-phase 3-wire:

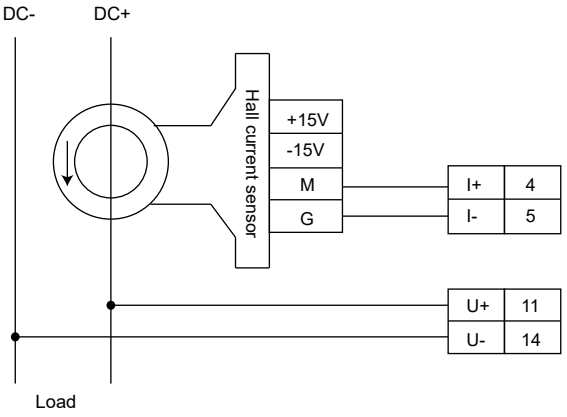
◆ ADW350WD

Three single-phase DC can be connected.

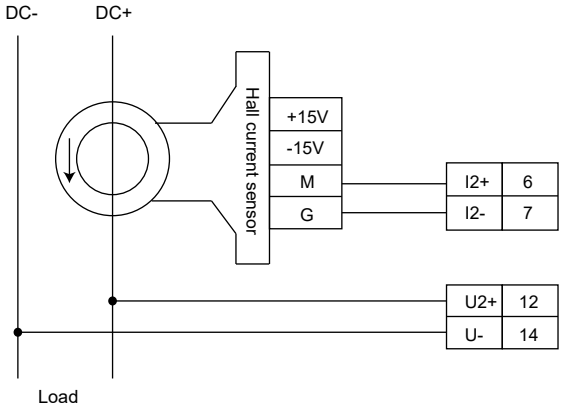
Connection method of Hall current sensor and auxiliary power terminal:



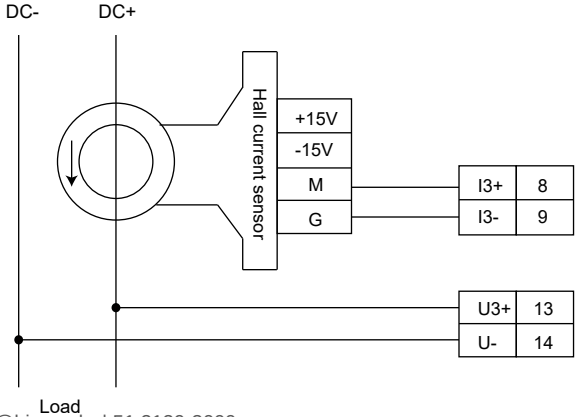
Loop 1st:



Loop 2nd:



Loop 3rd:



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