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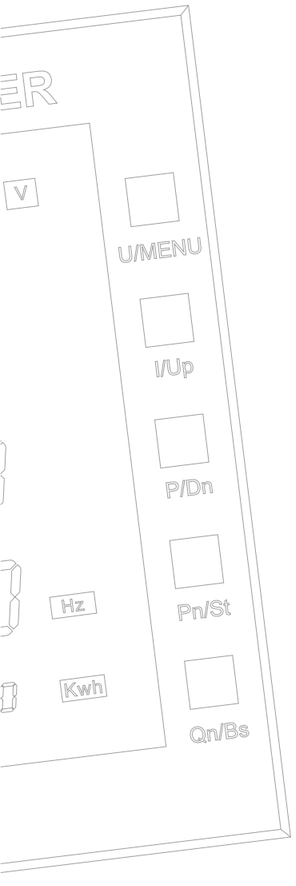
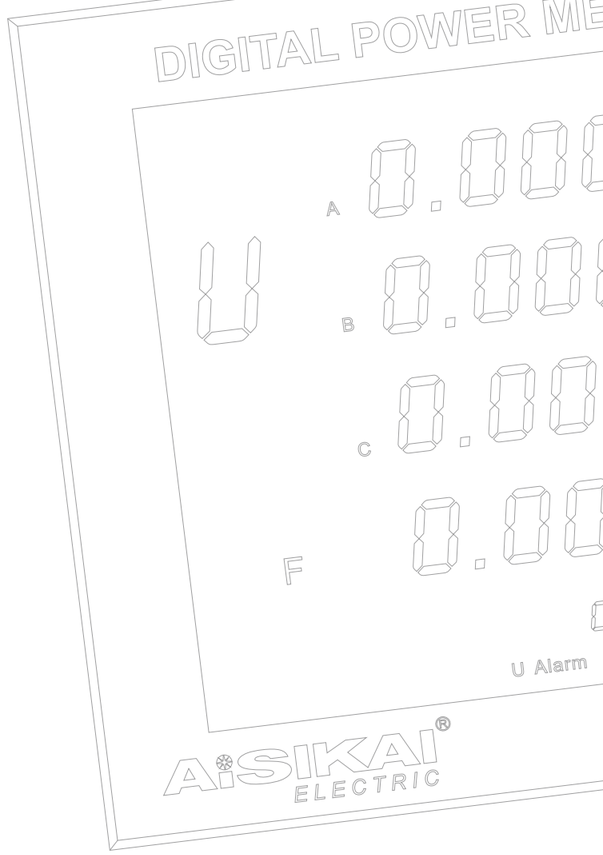
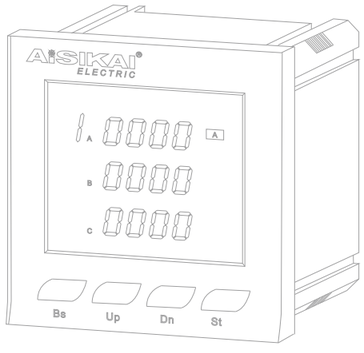




INTRLLIGENT POWER METER

SELECTION GUIDE



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JIANGSU AISIKAI ELECTRIC CO.,LTD

PRODUCTS CONTENTS

COMPANYPROFILE

Since established in 2007, JIANGSU AISIKAI ELECTRIC CO.,LTD has been committed to the R&D, manufacture and marketing of the high-quality low voltage electric switch. Our product line covers level Ⅰ、Ⅱ、Ⅲ power distribution field . We are awarded as the " National High Tech Enterprise " and " Contract-respecting and Promise-keeping Enterprise " and own UKAS ISO9001 Quality Management System Certification , the European Certification CE and SGS Global Qualified Supplier Certification . So far , We have several invention patents , utility model patent,appearance patent All products have Chinese Compulsory Certification CCC . From 2014 , we have been recognized as " Yangzhou City Engineering Technology Center"and" Chinese Adopting International Standard Unit".

“QUALITY 、SERVICES 、REPUTATION 、INNOVATION ” is AISIKAI company everlasting enterprise development concepts , we actively pursue progress , always standing inthe customer's point of view and improvement, we believe, AISIKAI IN your support and love, will flourish, vibration of wings and

INTELLIGENT POWER METER

AiSIKAI®

IPM

Intelligent Electric Meter

Small volume Powerful performance

ASKY series digital programmable electric meter is a new generation product developed by our company. Ordinary type use LED digital tube, and liquid crystal type use large-size backlit LCD screen. This product receives user's praise for its industrial appearance modeling design, scientific man-machine interface and simple wiring way.

The product software system is self-developed by our company. The whole series has been awarded the "Computer software copyright" grade certificate issued by the National Copyright Administration. The product is very suitable for areas with high requirements for safety systems, such as heat power plants, hydroelectric power plants, power transmission and transformation hub centers and other places.

Applicable standards

GB50052-2009 ***Code for Design of Power Supply Systems***
GB50054-2001 ***Code for Design of Low Voltage Distribution***
GB2887-2000 ***General Specification for Computer Sites***
GB/T 13729-2002 ***Remote Terminal Equipment***
GB/T50063-2008 ***Code for the Design of Electric Power Devices and Electric Measuring Instruments***
GB50171-2006 ***Code for Construction and Acceptance of Working Disks, Cabinets and Secondary Circuits for Installation of Electrical Devices***
GB/T 17215.322 ***Special Requirements for AC Measurement Equipment Part 22: Static Active Energy Meter***
GB/T 17215.323 ***Special Requirements for AC Measurement Equipment Part 22: Static Reactive Energy Meter***
GB/T 13850-1998 ***Electrical Measurement Transmitter for Converting AC Volume into Analog or Digital Signal***
DL/T814-2002 ***Functional Specification for Distribution Automation Systems***
DL/T721-2000 ***Distribution Automation System Teletransmission Terminal***

Wide application range

The meter can measure all kinds of power parameters in electricity line in real time. According to different product functions, can not only measure and display single parameter, but also measure multiple parameters at the same time. It is widely used in the power monitoring needs and power parameter display in power system, industrial and mining enterprises, public facilities, intelligent building.

Complete specifications, easy to choose

ASKY Series Intelligent Meter consists of 7 categories: ammeter, voltmeter, frequency table, active power meter, reactive power meter, power factor meter, multi-function meter, with 5 kinds of shape specifications available. All instruments are designed in accordance with the industry standard size, with high compatibility, easy to maintenance, and very suitable for the replacement of the old pointer meter.

Autonomous software, safe and controllable

The software of the full range of product are developed by our company, and have obtained the state issued "Computer Software Technology Copyright Registration Certification".

Cassette type mounting, easy to use

Cassette type mounting instead of traditional screw mounting is simple, convenient and firm.

Modular design, flexible function

Intelligent and modular design. Transformer magnification arbitrary settings. Functional modules can be freely combined to improve usage flexibility.
The networked design scheme can be easily connected with various power network remote monitoring systems.

Single-phase Ammeter
ASKY96A

Three-phase Ammeter
ASKY96A3

Single-phase Voltmeter
ASKY96V

Three-phase Voltmeter
ASKY96V3

Single-phase Active Power Meter
ASKY96P

Single-phase Reactive Power Meter
ASKY96Q

Single-phase Power Factor Meter
ASKY96H

Three-phase Network Electric Meter
ASKY96W3

Three-phase Network Electric Meter
ASKY96W3Y

Multi-function Harmonic Meter
ASKY961

ASKY Series Digital Programmable Electric Meter Quick Selection Table

ASK	Y	96	—	A	3	/	Y	S

Enterprise code
Jiangsu aisikai electric co.,ltd

Product Type Code
Electric meter

Indicate instrument shape
96: 96 × 96 square
80: 80 × 80 square
72: 72 × 72 square
49: 48 × 96 groove shape
48: 48 × 48 micro square

Function code
A: Ammeter
V:Voltmeter
P: Active Power Meter
Q: Reactive Power Meter
F: Frequency meter
H: Power Factor Meter
W: Multifunctional Network Electric Meter
I: Multifunctional Harmonic Detection Meter (Model 96 only)

Phase number code
Unmarked: single-phase input
3: Three-phase input

Display interface code
Unmarked: LED Digital Tube Digital Display
Y: LCD display

Additional function code
S-RS485 Communication
B-Analog Output (4-20mA)
K-Relay alarm output

Qualification documents





ASKY Series Digital Programmable Electric Meter

Product overview

- ASKY series digital programmable power meter is an intelligent instrument with a number of functions as programmable measurement, display, digital communication and power pulse transmission output. It can perform electrical measurement, energy metering, data display, acquisition and transmission. It is widely used in substation automation, distribution automation, intelligent building, enterprise internal power measurement, management, assessment. It can realize LED/LCD field display and remote RS-485 digital interface communication, using MODBUS-RTU protocol.
- Mainly applicable to the measurement or indication lines of AC voltage, AC current, frequency, single/three-phase active power, single/three-phase reactive power, single/three-phase power factor and other electrical parameters power stations, electrical switchgear cabinet and a variety of electrical equipment. With advantages like high measurement accuracy, clear, convenient, no viewing angle error readings, capability to be installed at any angle, anti-seismic/anti-external magnetic field interference and so on, it is the ideal alternative to the old pointer instrument.

Performance features

- The various power parameters in the power line can be measured in real time. Single parameter can be measured and displayed, and multiple parameters can be measured at the same time as needed;
  Variety, complete specifications, there are a variety of dimensions, a number of serialized products, all instruments are in accordance with the industry standard size design,
  High compatibility, more convenient maintenance;
  Cassette type mounting instead of traditional screw mounting is simple, convenient and firm. SMT production process, software production calibration.
  Intelligent and modular design. Transformer magnification arbitrary settings. Functional modules can be freely combined to improve usage flexibility.
  The networked design scheme can be easily connected with various power network remote monitoring systems.

Classification

- Classified by product functions:
  8 types: ammeter, voltmeter, frequency meter, active power meter, power factor meter, multi-function network electric meter, multi-function harmonic meter
- Classified by phase numbers:
  2 types: single-phase and three-phase
- Classified by dimensions:
  5 types: 96*96、80*80、72*72、48*96、48*48
- Classified by display interface:
  2 types: LED digital tube, LCD liquid crystal
- Classified by additional functions:
  Communication (RS485), transmit function(analog), upper and lower limit alarm (relay output)

Product Classification Table

	Product model	□Shape code (view the outline dimensions form for the detailed meaning of code)					□Display mode		□Optional function (can select multiple)		
		48	49	72	80	96	Digital tube	Liquid crystal Y	Communication S	Analog output B	Upper and lower limit relay alarm K
Ammeter	ASKY□A□	✓	✓	✓	✓	✓		●	✓	✓	✓
	ASKY□A3□			✓	✓	✓		●	✓	✓	✓
	ASKY□A	✓	✓	✓	✓	✓	●		✓	✓	✓
	ASKY□A3			✓	✓	✓	●		✓	✓	✓
Voltmeter	ASKY□V□	✓	✓	✓	✓	✓		●	✓	✓	✓
	ASKY□V3□			✓	✓	✓		●	✓	✓	✓
	ASKY□V	✓	✓	✓	✓	✓	●		✓	✓	✓
	ASKY□V3			✓	✓	✓	●		✓	✓	✓
Frequency meter	ASKY□F□	✓	✓	✓	✓	✓		●	✓	✓	✓
	ASKY□F			✓	✓	✓	●		✓	✓	✓
Active power meter	ASKY□P□□	✓	✓	✓	✓	✓		●	✓	✓	✓
	ASKY□P□			✓	✓	✓	●		✓	✓	✓
Reactive power meter	ASKY□Q□□			✓	✓	✓		●	✓	✓	✓
	ASKY□Q□			✓	✓	✓	●		✓	✓	✓
Power factor meter	ASKY□H□□			✓	✓	✓		●	✓	✓	✓
	ASKY□H□			✓	✓	✓	●		✓	✓	✓
Multi-function meter	ASKY□W3□					✓		●	✓		✓

Description: ● Standard configuration ✓ Optional configuration The optional dedicated functions for ASKY96W3Y, ASKY961: switching input (4), switching output (2)

ASKY Series A type Digital Programmable Ammeter

Product overview

- ASKYA digital programmable ammeter is suitable for power grid and automation control system. It mainly measures current parameters in power grid. According to its additional functions, we have four types of digital display instruments: A, AS, AK and AB.
- A type intelligent digital display ammeter is a digital display instrument, which through direct AC sampling, current is measured using true effective value algorithm and directly displayed by digital tube (LED) or liquid crystal (LCD).
- AS type intelligent digital display ammeter is a digital display instrument based on A type by adding one RS-485 communication interface output (using Modbus protocol) to facilitate networking.
- AK type intelligent digital display ammeter is based on A type by adding two relay alarm output function (realizing upper and lower limit alarm)
- AB intelligent digital display ammeter adds 4-20mA analog output function on the basis of A type.

Technical index

- Accuracy Level: 0.5 Level
- Display digits: four digits
- Overload: continuous: 1.2 times; instantaneous: current 10 times/5 seconds, voltage 2 times/1 seconds
- Frequency: 45-55Hz
- Auxiliary power supply: AC/DC85-265V
- Isolation withstand voltage: power supply and input, transmit output, communication interface is AC2KV; input, transmit output, communication interface is AC1KV
- Communication output: RS-485 interface, MODBUS-RTU protocol, address: default 1 (1-255 optional), baud rate: default 9600 (4800, 2400, 1200, 600bps optional)

Model specifications

Single-phase ammeter	Shape code	Opening dimensions	Model
	48	45 × 45	ASKY48A
	49	45 × 91	ASKY49A
	72	67 × 67	ASKY72A
	80	77 × 77	ASKY80A
	96	91 × 91	ASKY96A
Three-phase ammeter	**Shape code**	**Opening dimensions**	**Model**
	72	67 × 67	ASKY72A3
	80	77 × 77	ASKY80A3
	96	91 × 91	ASKY96A3
Three-phase liquid crystal ammeter	**Shape code**	**Opening dimensions**	**Model**
	72	67 × 67	ASKY72A3Y
	80	77 × 77	ASKY80A3Y
	96	91 × 91	ASKY96A3Y

ASKY Series V Type Digital Programmable Voltmeter

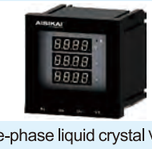
Product overview

- ASKYV digital programmable voltmeter is suitable for power grid and automation control system. It mainly measures voltage parameters in power grid. According to its additional functions, we have four types of digital display instruments: V, VS, VK and VB.
- V type intelligent digital display voltmeter is a digital display instrument, which through direct AC sampling, voltage is measured using true effective value algorithm and directly displayed by digital tube (LED) or liquid crystal (LCD).
- VS type intelligent digital display voltmeter is a digital display instrument based on V type by adding one RS-485 communication interface output (using Modbus protocol) to facilitate networking.
- VK type intelligent digital display voltmeter is based on V type by adding two relay alarm output function (realizing upper and lower limit alarm).
- VB intelligent digital display voltmeter adds 4-20mA analog output function on the basis of V type.

Technical index

- Accuracy Level: 0.5 Level
- Display digits: four digits
- Overload: continuous: 1.2 times; instantaneous: current 10 times/5 seconds, voltage 2 times/1 seconds
- Frequency: 45-55Hz
- Auxiliary power supply: AC/DC85-265V
- Power consumption: <3VA
- Isolation withstand voltage: power supply and input, transmit output, communication interface is AC2KV; input, transmit output, communication interface is AC1KV
- Communication output: RS-485 interface, MODBUS-RTU protocol, address: default 1 (1-255 optional), baud rate: default 9600 (4800, 2400, 1200, 600bps optional)

Model specifications

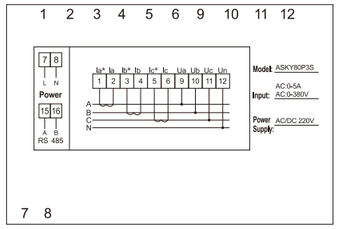
Single-phase Voltmeter	Shape code	Opening dimensions	Model
	48	45 × 45	ASKY48V
	49	45 × 91	ASKY49V
	72	67 × 67	ASKY72V
	80	77 × 77	ASKY80V
	96	91 × 91	ASKY96V
Three-phase Voltmeter	**Shape code**	**Opening dimensions**	**Model**
	72	67 × 67	ASKY72V3
	80	77 × 77	ASKY80V3
	96	91 × 91	ASKY96V3
Three-phase liquid crystal Voltmeter	**Shape code**	**Opening dimensions**	**Model**
	72	67 × 67	ASKY72V3Y
	80	77 × 77	ASKY80V3Y
	96	91 × 91	ASKY96V3Y

ASKY Series P Type Digital Programmable Active Power Meter

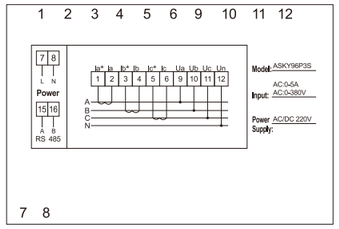
Product overview

- ASKYP digital programmable active power meter is suitable for power grid and automation control system. It mainly measures voltage parameters in power grid. According to its additional functions, we have three types of digital display instruments: P, PS and PB.
- The P type active power digital display meter is a digital display instrument, which through direct AC sampling, active power value is calculated by software and directly display by digital tubes (LED).
- PS type digital display active power meter is a digital display instrument based on P type by adding one RS-485 communication interface output (using Modbus protocol) to facilitate networking.
- PB type digital display active power meter adds 4-20mA analog output function on the basis of P type.

Typical Products Introduction



Terminal schematic diagram



Terminal schematic diagram

Model specification

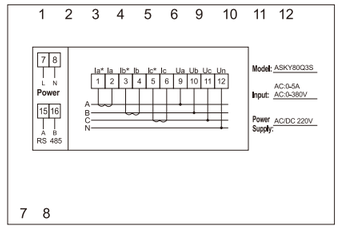
Product model	Phase number	Shape code (code details are shown in outline dimensions table)			Communication	Analog output 4~20 mA
		72	80	96		
ASKY□P	Single-phase	✓	✓	✓		
ASKY□P3	Three-phase	✓	✓	✓		
ASKY□PS	Single-phase	✓	✓	✓	✓	
ASKY□P3S	Three-phase	✓	✓	✓	✓	
ASKY□PB	Single-phase	✓	✓	✓		✓
ASKY□P3B	Three-phase	✓	✓	✓		✓

ASKY Series Q Type Digital Programmable Reactive Power Meter

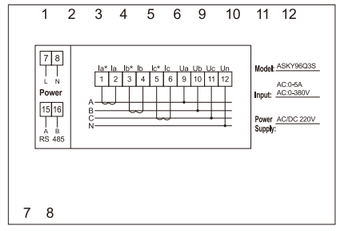
Product overview

- ASKYQ digital programmable reactive power meter is suitable for power grid and automatic control system. It mainly measures reactive power in power grid. According to its function, we have three types of digital display instruments: Q, QS and QB.
- Q Type Reactive Power Digital Display Meter is a digital display instrument, which through direct AC sampling, active power value is calculated by software and directly display by digital tubes (LED).
- S Type Reactive Power Digital Display Meter is a digital display instrument based on Q series by adding one RS-485 communication interface output (using Modbus protocol) to facilitate networking.
- B type digital reactive power meter adds 4-20mA analog output function on the basis of Q type.

Typical Products Introduction



Terminal schematic diagram



Terminal schematic diagram

Model specification

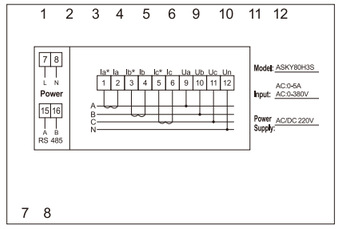
Product model	Phase number	Shape code (code details are shown in outline dimensions table)			Communication	Analog output 4~20 mA
		72	80	96		
ASKY□Q	Single-phase	✓	✓	✓		
ASKY□Q3	Three-phase	✓	✓	✓		
ASKY□QS	Single-phase	✓	✓	✓	✓	
ASKY□Q3S	Three-phase	✓	✓	✓	✓	
ASKY□QB	Single-phase	✓	✓	✓		✓
ASKY□Q3B	Three-phase	✓	✓	✓		✓

ASKY Series H Type Digital Programmable Power Factor Meter

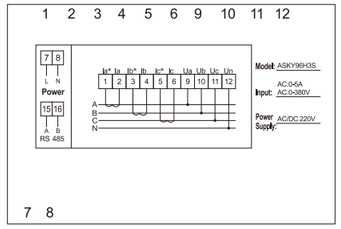
Product overview

- ASKYH digital programmable power factor meter is suitable for power grid and automation control system. It mainly measures power factor in power grid. According to its additional functions, we have three types of digital display instruments: H, HS and HB.
- The H type power factor digital display meter is a digital display instrument, which through direct AC sampling, active power value is calculated by software and directly display by digital tubes (LED).
- HS type digital display active power meter is a digital display instrument based on H type by adding one RS-485 communication interface output (using Modbus protocol) to facilitate networking.
- HB type digital active power meter adds 4-20mA analog output function on the basis of H type.

Typical Products Introduction



Terminal schematic diagram



Terminal schematic diagram

Model specification

Product model	Phase number	Shape code (code details are shown in outline dimensions table)			Communication	Analog output 4~20 mA
		72	80	96		
ASKYH□H	Single-phase	✓	✓	✓		
ASKYH□H3	Three-phase	✓	✓	✓		
ASKYH□HS	Single-phase	✓	✓	✓	✓	
ASKYH□H3S	Three-phase	✓	✓	✓	✓	
ASKYH□HB	Single-phase	✓	✓	✓		✓
ASKYH□H3B	Three-phase	✓	✓	✓		✓

ASKY Series Multi-function Network Electric Meter

Performance features

LED display

LCD display

- High-precision measurement of three-phase voltage, three-phase current, active power, reactive power, apparent power, power factor, frequency electrical parameters
- Positive and negative active/reactive energy metering
- Provide digital tube or LCD display, local data query
- The menu is intuitive, and the key operation is simple
- Current, voltage ratio Programmable
- Support RS-485 communication, Modbus-RTU protocol
- Support switching input, switching output, analog transmit output, power pulse output
- Easy installation, simple wiring and small work amount
- Wide-range AC/DC universal power supply: AC/DC85V-265V
- Can complete the networking of various communication software in SCADA and PLC

Technical index

- Measurement accuracy
  Voltage: Level 0.5
  Current: Level 0.5
  Active power: Level 0.5
  Reactive power: Level 0.5
  Power factor: Level 0.5
  Frequency: ±0.02Hz
  Active energy: Level 0.5 or level
  Reactive energy: Level 1 or Level 2

- Signal input
  Wiring method: three-phase four-wire, three-phase three-wire
  Rated voltage: AC57.7V, AC100V, AC220V, AC380V
  Rated current: AC 1A, AC 5A
  Overload: Voltage: 1.2 times (continuous), 2 times/1 second (instantaneous)
  Voltage: 1.2 times (continuous), 10 times/5 seconds (instantaneous)
  Power consumption voltage: <1VA/Phase, Current: <0.4VA/Phase
  Impedance voltage: > 200 kΩ, current: 20 mΩ
  Frequency: 45-65Hz

- Auxiliary power supply
  Operating range: AC/DC: 85V-265V
  Power consumption: <3VA

- Functional module
  Communication interface: support 1-way
  RS-485 communication, Modbus-RTU protocol
  Baud rate: 600-9600 bps, default 9600 bps
  Switching input: support 4-way dry contact input
  Switch output: support 2-way relay output
  Capacity: AC 250V/5A, DC 30V/5A

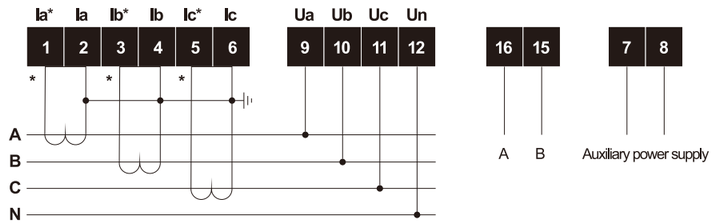
- Environment
  Operating temperature: - 10 ~55℃
  Storage temperature: - 25 ~70 ℃
  Relative humidity: <90%, no corrosive gas
  Altitude: <2500m

- Safety
  Insulation resistance: > 100MΩ
  AC withstand voltage: AC 2kV

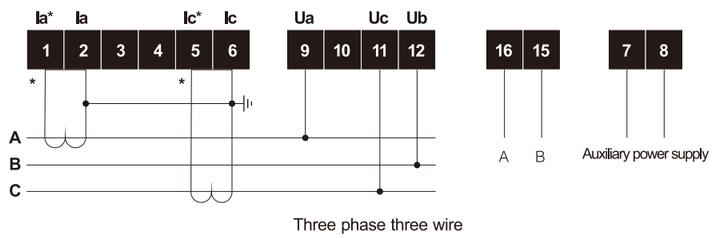
- Measuring and Controlling Performance of Electromagnetic Compatibility
  Accord with GB/T 14598.14-1998 standard,
  Electrostatic Discharge Level 3 Test
  Accord with GB/T 14598.13-1998 standard,
  Level 3 Test of 1MHz Pulse Group Interference
  Accord with GB/T 14598.10-2007 standard,
  Fast Transient Interference Level 3 Test
  Accord with GB/T 14598.9-2002 standard,
  Radiate Electromagnetic field interference Level 3 Test

- Outline dimensions
  Frame dimensions (mm):
  72x72；80x80；96x96
  Opening dimensions(mm):
  67x67；77x77；91x91

Terminal arrangement diagram



Three phase four wire



Three phase three wire

(Note: If the wiring diagram is inconsistent with the wiring diagram on the instrument case, please refer to the wiring diagram on the instrument case)

- Rated input voltage should not be higher than the rated input voltage of the product (100V or 380V), otherwise PT should be considered. In order to facilitate maintenance, it is recommended to use connector bar.
- Standard rated input current 5A or 1A, if larger than 5A should use external CT. If there are other instruments connected to the CT, the connection should be in series. Before removing the current input connection of the product, must disconnect the primary circuit or the short secondary circuit of the CT. In order to facilitate maintenance, it is recommended to use the connector bar.
- Ensure that the input voltage and current correspond to each other, the phase sequence is consistent and the direction is consistent, otherwise there will be errors in power and energy values and loads.
- Instruments can work in three-phase four-wire mode or three-phase three-wire mode. Users should choose the appropriate wiring mode according to the site use. Generally, three-phase three-wire mode is used in the absence of neutral line, and three-phase four-wire mode is used in the presence of neutral line. It should be noted that the field wiring mode must be consistent with the wiring mode set in the meter, otherwise the measurement data of the instrument is incorrect.

Specification selection

Function / Model	Real-time measurement						Energy metering		Switching signal input	Switching signal output	Analog output 4~20mA	Communication RS485	Display mode
	Three phases voltage	Three phases current	Active power	Reactive power	Power factor	Frequency	Active energy	Reactive energy					
ASKY72W3	●	●	●	●	●	●	●	●	—	—	✓	✓	Three rows LED
ASKY80W3	●	●	●	●	●	●	●	●	—	—	✓	✓	
ASKY96W3	●	●	●	●	●	●	●	●	—	—	✓	✓	
ASKY72W3Y	●	●	●	●	●	●	●	●	—	—	✓	✓	Field LCD
ASKY80W3Y	●	●	●	●	●	●	●	●	—	—	✓	✓	
ASKY96W3Y	●	●	●	●	●	●	●	●	✓(four)	✓(two)	✓	✓	

Note: ● switching signal input, ✓ is optional function

ASKY series multi-function harmonic meter

Product overview

- ASKY961 meters adopt the newest micro processing and digital signal technology, having complete functions like three phases energy measurement and display, energy accumulation, power quality analysis, main and sub input/output and network communication.
  Its LCD display screen is big and high-definition.
  The meters can be used as meters alone instead of a lot of traditional analog meters, also can be used as the front-end device of the power monitoring system(SCADA), achieving the remote data collection and control.
- With the industrial standard RS-485 communication interface and MODBUS communication protocol, ASKY series meters are the ideal choice of SCADA system integration. ASKY series multi-function electric meter is not only used in measurement, its rich and flexible I/O functions also makes it can fully meet the requirements of distributed RTU, achieving the remote communication, remote measurement, remote control and metering all in one. It is mainly used in power transformation & distribution automation, intelligent switchboard cabinet, industrial automation and intelligent building energy management system.

Product features

- Powerful data acquisition and processing capabilities. Have complete measurement and calculation functions for three phases voltage, three phases current, total active power, total reactive power, total power factor, frequency, total active energy, harmonic distortion of voltage/current, the 2-31 order harmonic ratio of voltage/current.
- Have 2 ways relays control output(optional)
- Have 4 ways switching value input function(optional)
- Through RS-485 interface, adopting MODBUS protocol, communicate with other devices(optional)

Oder instruction

- ASKY961 multi-function harmonic analysis meter has the universal (AC/DC) power input interface. Unless otherwise specified, the standard type with AC/DC220V power interface is provided. The meter operating voltage range is AC/DC85-265V. Please ensure the provided power is suitable for this product to prevent from damaging product.
- For areas with poor gird quality, it is suggested to install the surge protector at power circuit in case of lightning strikes, and install fast pulse suppressor. The suggested wire size is 1.5mm².
- When ordering, please specify the required model and power supply, input signal and transformation ratio, wiring type and other relevant content.
  For example: Model: ASKY961 Power: AC220 Electricity network: 3 phases 4 lines (3PT/3CT)
  Input signal: AC220V/5A
- Output: 2 ways relays Frequency: 45-55Hz Communication: RS-485 interface, MODBUS-RTU protocol
  Note: switching input, switching output and communication are optional functions.

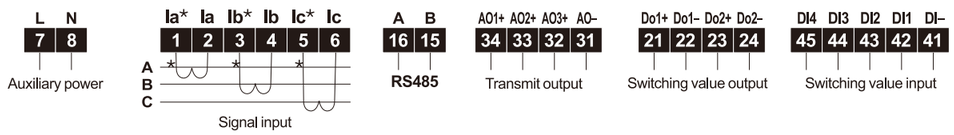
TECHNICAL INDEX

Technical parameters			Specification
Input/output (optional))	Network		3 phases 3 lines, 3 phases 4 lines
		Rating	AC 0~100V、AC 0~380V
		Over load	1.2 times continuous instantaneous 2 times/10 seconds
		Power consumption	<0.8VA
		Impedance	>200kΩ
		Accuracy	Level 0.2
		Rating	AC 1A、5A
		Over load	1.2 times continuous instantaneous 2 times/10 seconds
		Power consumption	<0.2VA
		Impedance	>0.1Ω
		Three-phase unbalance	$\frac{\lvert Im-Iav \rvert}{Iav}$ x100%
		Accuracy	Level 0.5 level 0.2
	Frequency		Range 45~65Hz , Accuracy: 0.01Hz
	Power		Active power, reactive power, apparent power Accuracy: level 0.5
	4 quadrant electricity		Accuracy of active energy measurement is 1%;Accuracy of reactive energy measurement is 2%
	Maximum/minimum		Each phase/line voltage; each line current; active power, reactive power, apparent power, power factor, frequency, required maximum and minimum as well as time of occurrence
	Harmonic measurement		Hormonic order: 2~31; THD accuracy： ±5%
	Communication		Asynchronous half duplex N.8.1， E.8.1， 0.8.1
			RS485 Modbus-RTU protocol 1200/2400/4800/9600bps
	Switching value input		4 ways: dry contact; Optical isolation voltage: 5000Vac(RMS)
	Relay output		2 ways: node capacity is 5A/250Vac or 5A/30Vdc. Relay output has two options, “electrical level” and “pulse”.
Power	Voltage range		AC/DC 85V~265V
	Power consumption		<3VA
Insulation resistance			⩾ 100MΩ
Power frequency withstand voltage			Among power, input, output 2kV/1min(AC effective value)
Mean time between failures			⩾ 5000h
Operating conditions			Temperature: -10℃~45℃； Humidity: ≤90%; No corrosive gas
Altitude			⩽ 2500m

Wiring method

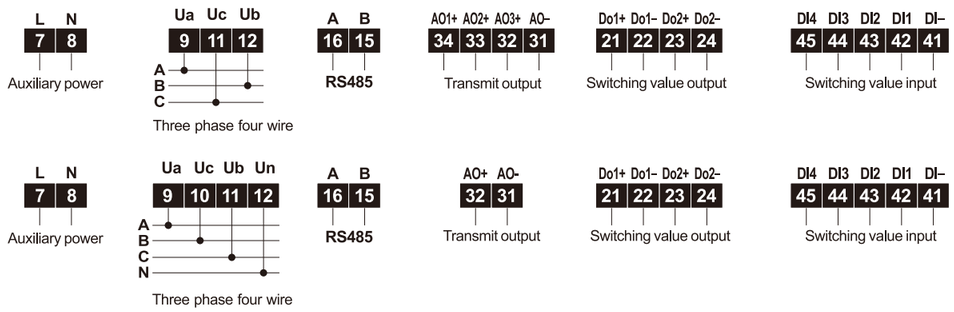
Single-phase Ammeter

Three-phase Ammeter

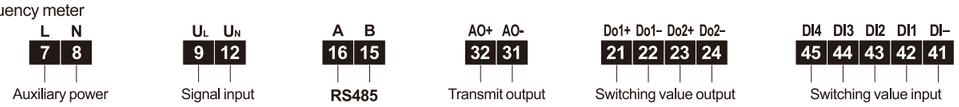


Single-phase Voltmeter

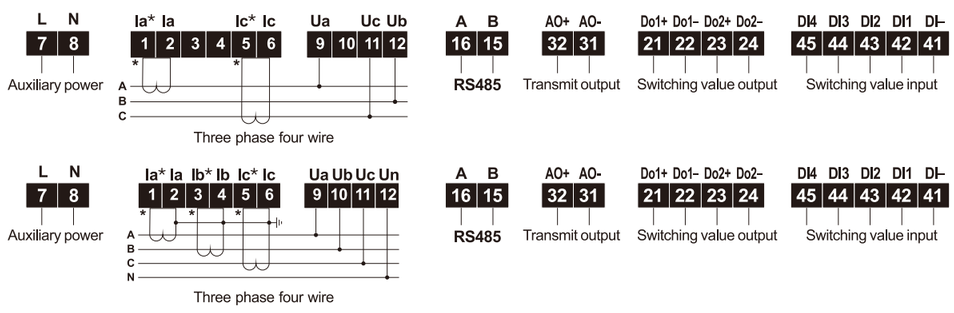
Three-phase Voltmeter



Frequency meter



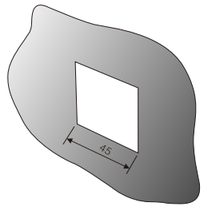
Active Power Meter Reactive Power Meter Power Factor Meter Multifunctional Meter



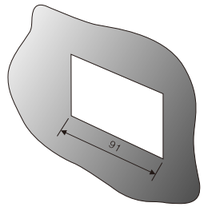
Note: please refer to the wiring diagram along with the product for the detailed wiring method.

ASKY SERIES INTELLIGENT METER OUTLINE DIMENSIONS

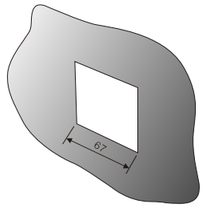
Shape code：48
Frame dimensions（mm）：48×48
Opening hole dimensions（mm）：45×45



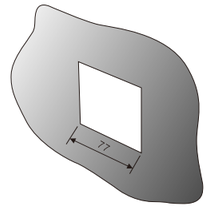
Shape code：49
Frame dimensions（mm）：48×96
Opening hole dimensions（mm）：45×91



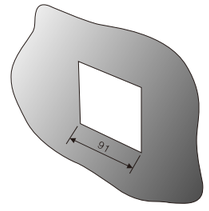
Shape code：72
Frame dimensions（mm）：72×72
Opening hole dimensions（mm）：67×67



Shape code：80
Frame dimensions（mm）：80×80
Opening hole dimensions（mm）：77×77



Shape code：96
Frame dimensions（mm）：96×96
Opening hole dimensions（mm）：91×91



Quick selection table

Cabinet type	Function requirement	Meter dimensions	Meter model
Incoming line cabinet	LED digital tube displays all electricity, energy, communication, switching value or transmit output	80 × 80	ASKY80W3
		96 × 96	ASKY96W3
	LCD liquid crystal displays all electricity, energy, communication, switching value	80 × 80	ASKY80W3Y
		96 × 96	ASKY96W3Y
Outgoing fixed cabinet(GGD)	Single phase current	80 × 80	ASKY80A
		96 × 96	ASKY96A
	Single phase voltage	80 × 80	ASKY80V
		96 × 96	ASKY96V
	Three phases current	80 × 80	ASKY80A3
		96 × 96	ASKY96A3
	Three phases voltage	80 × 80	ASKY80V3
		96 × 96	ASKY96V3
	Single phase current, one channel transmit, communication	80 × 80	ASKY80ABS
		96 × 96	ASKY96ABS
	Single phase voltage, one channel transmit, communication	80 × 80	ASKY80VBS
		96 × 96	ASKY96VBS
	Three phases current, one channel transmit, communication	80 × 80	ASKY80A3BS
		96 × 96	ASKY96A3BS
	Three phases voltage, one channel transmit, communication	80 × 80	ASKY80V3BS
		96 × 96	ASKY96V3BS
	LED digital tube display all electricity, energy, communication	80 × 80	ASKY80W3S
		96 × 96	ASKY96W3S
	LCD liquid crystal displays all electricity, energy, communication, switching value	80 × 80	ASKY80W3YS
		96 × 96	ASKY96W3YS
Outgoing line drawer cabinet (MNS, GCK)	Single phase current	48 × 48	ASKY48A
		72 × 72	ASKY72A
	Single phase voltage	48 × 48	ASKY48V
		72 × 72	ASKY72V
	Three phases current	72 × 72	ASKY72A3
		80 × 80	ASKY80A3
	Three phases voltage	72 × 72	ASKY72V3
		80 × 80	ASKY80V3
	Single phase current, one channel transmit, communication	72 × 72	ASKY72ABS
		80 × 80	ASKY80ABS
	Single phase voltage, one channel transmit, communication	72 × 72	ASKY72VBS
		80 × 80	ASKY80VBS
	Three phases current, one channel transmit, communication	72 × 72	ASKY72A3BS
	Three phases voltage, one channel transmit, communication	72 × 72	ASKY72V3BS
	LED digital tube display all electricity, energy, communication	72 × 72	ASKY72W3S
		80 × 80	ASKY80W3S
	LCD liquid crystal displays all electricity, energy, communication, switching value	80 × 80	ASKY80W3YS
Outgoing line metering cabinet	LED digital tube display all electricity, energy, communication	72 × 72	ASKY72W3S
		80 × 80	ASKY80W3S
		96 × 96	ASKY96W3S
	LCD liquid crystal displays all electricity, energy, communication, switching value	80 × 80	ASKY80W3YS
		96 × 96	ASKY96W3YS