

## Panel Power Meter

Certificates CE



### Model No.

KDX -	① Digital meter	② Panel meter	③ Measurement	④ Communication
①②      ③④			A 3P V, 3P A, W, PF, var, Hz, Wh, varh B 3P V, 3P A, W, PF, var, Hz C 3P V, 3P A, W, PF, var, Hz, wh, varh (No communication)	C RS-485 N/A None

CAUTION If the power is turn off, the accumulated value for 30 minutes can be deleted.

How to order Example) KDX-AC KDX-B Customized product can be produced by order.

### Overview

Digital meter which can display 3 Ø A, 3 Ø V, W, PF, var, Hz, Wh, varh and remote power monitoring by RS - 485 communication.

### Input

Range	Division	A/B	C
	Line voltage	40~500V	50~500V (Rated PT :110 or 190V)
Accuracy	Current input	0.1~6A	0.5~6A (Rated CT:5A)
	V,A	± (0.3% of rdg + 0.2% of F.S)	1.5 times of A / B
	W var	± (1.0% of rdg + 0.2% of F.S) at PF=1	
	PF	± (1.0% of rdg + 1.0°)	
	Wh varh	± (W Accuracy + 0.1 count/h)	

### Communication

Interface	RS-485, Multi-drop 2Wire
Protocol	Modbus RTU(Basic)/Melsec(option)
Address setting	0~255
Transmission distance	Maximum 1.2km
Transmission rate	9600bps

### Function

- 3-phase voltage, 3 phase current, W, PF, var, Hz, Wh, etc. and others are displayed with three windows.
- CT, PT, primary value can be set.
- RS-485 Serial Communication
- Up to 500V, direct connection is possible without PT.

### Specification

Item	Description
Aux. power	KDX-A/B: AC 90V ~ 260V(50/60Hz) /DC110V KDX-C: AC 220V(60 Hz)Only
Display method	14.2 LED(0.56Inch, Red) Update speed : 1000ms
Communication	RS-485 multi-drop 2wire, 9600bps, 0~255, Maximum 1.2km, Modbus RTU
Withstand voltage	AC 2kV/1 minute
Surge impulse	1.2/50μs 4kV, 8/20μs 2kA
Burst	Level 4(IEC 61000-4-4)
Input loss	- V : Less than 0.1VA - A : Less than 0.2VA
Operating temperature / humidity	-10°C ~ 50°C / 20~85%
Insulation resistance	More than 10MQ (500VDC )
Weight	KDX-A/B: 800g KDX-C: 1kg

## Detailed Function

### Function keys

- Circuit method selection
- PT primary voltage selection
- CT primary current selection
- Communication address setting (0 to 255)
- Wh, varh Reset

### AS Button

- A1, A2, A3, CT Primary current selection
- CT Primary current selection

Setting Mode (SET + AS Key)  
 → Setting(▽, △ Key) → save  
 (AS) Key



### VS Button

- V1, V2, V3, PT Primary current selection
- Wiring method/P.T Primary current selection

Setting Mode (SET + VS Key) → Wiring method(▽, △ Key) → Save(VS key) → P.T ratio(▽, △ Key) → save(VS Key)

### | Primary voltage value selection (Choose 500 for direct connection)

3P3W

500→380→440→3.30→6.60→7.20  
 →11.0→11.4→22.0→22.9→66.0→154

3P4W

500→380→11.4→22.9

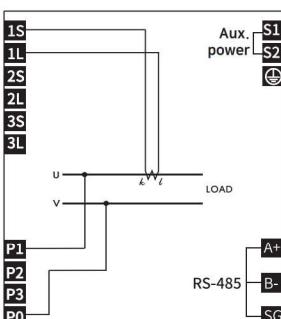
### | C.T Primary current value selection

5→10→15→20→25→30→40→50→60→70→75→80→90  
 →100→120→125→130→140→150→160→170→175→  
 180→200→225→240→250→300→400→450→500→600  
 →700→750→800→900→1000→1200→1250→1300→  
 1400→1500→1600→1700→1750→1800→2000→2500→  
 3000→3200→3500→3600→4000→5000→6000

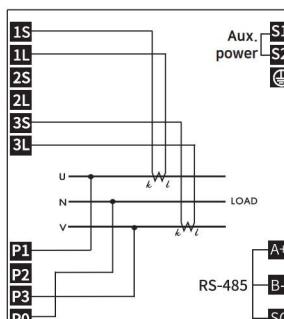
### FS Button

Select W-PF-var-Hz-Wh-varh, Communication address selection

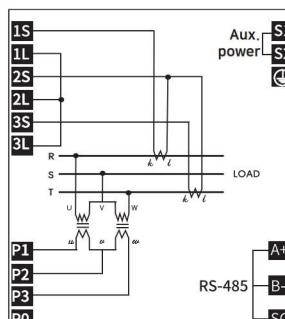
## Connection diagram



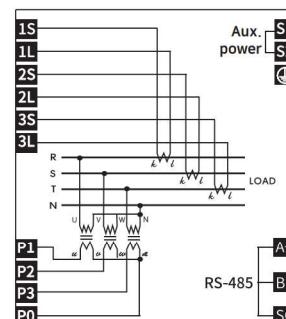
| 1P2W |



| 1P3W |



| 3P3W |



| 3P4W |

## Drawing

Refer to page 80 type D