



# DIRIS Digiware U

## Voltage measurement module

Multi-circuit metering  
& measurement



diris-dw-005\_a.cat

DIRIS Digiware U-10/U-20/ U-30



Configuration  
with EasyConfig,  
see page 618.

### Function

The **DIRIS Digiware U** module measures voltage for the entire system. This pools together all voltage measurements.

The Digiware RJ45 Bus allows you to pass voltage measurements as well as power supply and communication to all connected products.

### Advantages

- 1 single voltage measurement point for the entire system.
- Single point of protection for voltage measuring.
- A complete, dedicated solution:
  - metering,
  - monitoring voltage,
  - quality analysis of the supplied voltage.
- No hazardous voltage on cabinet doors.
- Adapted to all types of network: single-phase, three-phase.

### The solution for

- Industry
- Building
- Infrastructure
- Data center



### Strong points

- 1 single voltage measurement point for the entire system
- Plug & Play
- Compact



RJ45 (Digiware Bus) cables are available.

### Conformity to standards

- IEC 61557-12



- ISO 14025



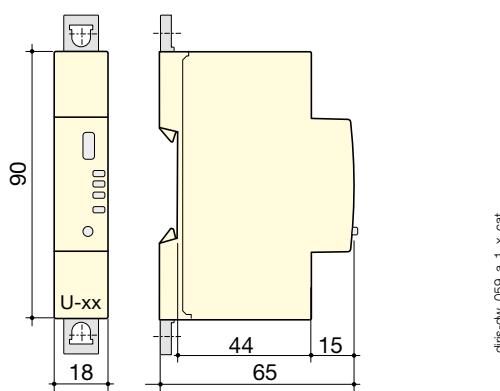
- UL



Application	Voltage measurement module		
	Metering	Monitoring	Analysis
			
<b>DIRIS Digiware U</b>	<b>U-10</b>	<b>U-20</b>	<b>U-30</b>
Multi-measurement			
U12, U23, U31, V1, V2, V3, f	•	•	•
U system, V system			•
Ph/N unbalance			•
Ph/Ph unbalance			•
Quality analysis			
THDv1, THDv2, THDv3, THDu12, THDu23, THDu31		•	•
Individual harmonics U & V (up to rank 63)			•
Voltage dips, cutoffs and surges (EN 50160)			•
Alarms			
On threshold			•
History of average values			
45 days (max)			•
Format			
Width/number of modules	18 mm / 1	18 mm / 1	18 mm / 1

## Dimensions

### DIRIS Digiware U



## Specifications

### Measuring characteristics

#### Voltage measurement - DIRIS Digiware U

Characteristics of the network measured	50-300 VAC (Ph/N) - 87-520 VAC (Ph/Ph) - CAT III
Frequency range	45 ... 65 Hz
Frequency accuracy	Class 0.02
Network type	Single-phase/ Two-phase / Two-phase with neutral / Three-phase / Three-phase with neutral
Measurement by voltage transformer	Primary: 400 000 VAC Secondary: 60, 100, 110, 173, 190 VAC
Input consumption	≤ 0.1 VA
Permanent overload	300 VAC Ph/N
Accuracy of voltage measurement	Class 0.2
Connection	Removable screw terminal block, 4 positions, stranded or solid 0.2 ... 2.5 mm <sup>2</sup> cable

### Communication specifications

#### USB

Protocol	Modbus RTU on USB
Function	Configuration of DIRIS Digiware U and I modules
Location	On each DIRIS Digiware U and I measurement module
Connection	Type B micro USB connector

## References

Digiware connection cables		Reference	DIRIS Digiware		Reference
RJ45 cables for Digiware Bus	Length 0.10 m	4829 0181	U-10	Metering	4829 0105
	Length 0.20 m	4829 0188	U-20	Monitoring	4829 0106
	Length 0.50 m	4829 0182	U-30	Analysis	4829 0102
	Length 1 m	4829 0183			
	Length 2 m	4829 0184			
	Length 5 m	4829 0186			
	Length 10 m	4829 0187			
	Reel 50 m + 100 connectors	4829 0185			
	Digiware bus terminating resistor (supplied with C and D devices)	4829 0180			
USB configuration cable		4829 0050			
Accessories		Description of accessories	To be ordered in multiples of	Reference	
		Fuse holder to protect voltage inputs (type RM) 3 pole	4	5601 0018	
		gG 10x38 0.5 A fuses	10	6012 0000	