

Data Sheet | Item Number: 855-501/150-000

Current and voltage tap up to 50 mm²; Primary rated current: 150 A; Secondary rated current: 1 A; Rated power: 0.2 VA; Accuracy class: 0.5; fused

<https://www.wago.com/855-501/150-000>



Short description:

WAGO's Current and Voltage Tap for 50 mm² (0/1 AWG) high-current through terminal blocks provides the ideal basis for successful energy management, because current and voltage are required wherever electrical power is measured. A combination of current transformer and voltage tap, this solution can be quickly and easily mounted into the jumper slot of WAGO's 50 mm² (1/0 AWG) high-current through terminal block. An integrated fuse reliably protects downstream energy meters. An integrated current transformer (conversion ratio: 150 A/1 A) allows precise current measurement per EN 61869-2 (accuracy class: 0.5). The current output connectors are marked with S1 (black) and S2 (red). Both termination and removal of fine-stranded conductors is performed via push-buttons. The 4-pole configuration (2 x S1 and 2 x S2) provides the following advantages:

- Current transformer (S1 and S2) can be short circuited via jumper (2000-402)
 - Direct 'Y' point jumper on current transformer
- The voltage is connected using a redundant terminal block. Additionally, the current and voltage tap can be marked either using continuous marking strips or via WMB Multi Marking System.

Features:

- Power data can be directly tapped into the power supply
- Easy installation – simply insert the tap into the jumper slot of the 50 mm² (1/0 AWG) high-current through terminal block
- Integrated current transformer (150 A/1 A)
- Accuracy class: 0.5
- Fuse-protected voltage path

Notes	
Note	Suitable for 2-conductor through terminal blocks for DIN-rail mounting (285-150; 285-154) Suitable for 2-conductor through terminal blocks with mounting flanges (285-141; 285-144) Spare fuse: WAGO 855-8020

Technical data			
Input		Input – current transformer	
Measured variable	Voltage	Rated continuous thermal current I _{cth}	150 A
	Current	Rated short-time thermal current I _{th}	9 kA / 1 s
		Rated surge current I _{dyn}	22.5 kA
		Rated frequency	50 ... 60 Hz
		Primary rated current	150 A



Output – current transformer	
Secondary rated current	1 A
Rated power S _p	0.2 VA
Measurement error	
Accuracy class	0.5

Output – voltage tap	
Fuse (voltage path)	2 A; 450 V; F; 70 kA; 5 x 25 mm (WAGO 855-8020)
Rated voltage	AC 400 V

Safety and protection	
Overvoltage category	III
Pollution degree	2
Protection type	IP20
Test voltage	AC 3 kV; 50 Hz; 1 min
Highest voltage for equipment U _m	AC 720 V _{rms}

Connection data	
Feedthrough for measurement conductor	Ø ≤ 12 mm
Connection object type 1	
Connection type 1	Current output
Connection technology	Push-in CAGE CLAMP®
WAGO connector	WAGO 250 Series
Strip length	8.5 ... 9.5 mm / 0.33 ... 0.37 inches
Solid conductor	0.2 ... 1.5 mm² / 24 ... 16 AWG
Fine-stranded conductor	0.2 ... 1.5 mm² / 24 ... 16 AWG

Connection object type 2	
Connection type 2	Voltage output
Connection technology 2	Push-in CAGE CLAMP®
WAGO connector 2	WAGO 2624 Series
Strip length 2	10 ... 12 mm / 0.39 ... 0.47 inches
Solid conductor 2	0.2 ... 6 mm² / 24 ... 10 AWG
Fine-stranded conductor 2	0.2 ... 6 mm² / 24 ... 10 AWG

Physical data	
Width	20 mm / 0.787 inches
Height	68 mm / 2.677 inches
Depth	57 mm / 2.244 inches

Mechanical data	
Mounting type	via 2-conductor high-current through terminal block's jumper slot



Material data		
Housing material		PA 66
Fire load		0 MJ
Weight		66 g

Environmental requirements		
Ambient temperature (operation)		-25 ... +70 °C
Ambient temperature (storage)		-25 ... +70 °C
Relative humidity		5 ... 85 % (without condensation)
Operating altitude (max.)		2000 m

Standards and specifications		
Conformity marking		CE
Standards/specifications		EN 61869-2 EN 60947-7-3

Commercial data		
eCl@ss 10.0		27-21-09-02
eCl@ss 9.0		27-21-09-02
ETIM 8.0		EC002048
ETIM 7.0		EC002048
PU (SPU)		1 pcs
Packaging type		Box
Country of origin		NL
Customs tariff number		85043180888

Environmental Product Compliance		
RoHS Compliance Status		Compliant,No Exemption

Approvals / Certificates		
General approvals		Declarations of conformity and manufacturer's declarations

EAC					
Approval	Standard	Certificate Name	Approval	Standard	Certificate Name
EAC Brjansker Zertifizierungs- stelle	TP TC 004/2011,TP TC 020/2011	EAC RU C-DE.AM02. B.00111/19	EU-Declaration of Confor- mity WAGO GmbH & Co. KG	-	-



Downloads

Environmental Product Compliance

Compliance Search			
Environmental Product Compliance	855-501/150-000		

Documentation

Bid Text			
855-501/150-000	19.02.2019	xml 8.48 KB	
855-501/150-000	09.08.2018	docx 21.53 KB	

Instruction Leaflet		
Current and voltage tap for the 2-conductor through terminal block of the 855 series	pdf 1312.52 KB	
Aufsteck-Stromwandler	pdf 1438.11 KB	

CAD/CAE-Data

CAD data	
2D/3D Models	
855-501/150-000	

CAE data	
EPLAN Data Portal	
855-501/150-000	
ZUKEN Portal	
855-501/150-000	

1 Compatible Products

1.1 Optional Accessories

1.1.1 Fuse

1.1.1.1 Fuse



[Item No.: 855-8020](#)
Miniature fuse; 5 x 25 mm; with indicator

1.1.2 Installation

1.1.2.1 Current transformer terminal block



[Item No.: 2007-8876](#)
Compact terminal block; for 3-phase current transformer circuit; 6,00 mm²; multicoloured



[Item No.: 2007-8873](#)
Compact terminal block; for current and voltage transformers; 6,00 mm²; multicoloured



[Item No.: 2007-8874](#)
Compact terminal block; for current and voltage transformers; 6,00 mm²; multicoloured



[Item No.: 2007-8875](#)
Compact terminal block; for current transformer circuit; 6,00 mm²; multicoloured



[Item No.: 2007-8877](#)
Compact terminal block; for current transformer circuit; 6,00 mm²; multicoloured



1.1.3 Marking

1.1.3.1 Marker



Item No.: 793-5501
WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; white



Item No.: 793-502
WMB marking card; as card; MARKED; 1 ... 10 (10x); not stretchable; Horizontal marking; snap-on type; white



Item No.: 793-566
WMB marking card; as card; MARKED; 1 ... 50 (2x); not stretchable; Horizontal marking; snap-on type; white



Item No.: 793-503
WMB marking card; as card; MARKED; 11 ... 20 (10x); not stretchable; Horizontal marking; snap-on type; white



Item No.: 793-504
WMB marking card; as card; MARKED; 21 ... 30 (10x); not stretchable; Horizontal marking; snap-on type; white



Item No.: 793-505
WMB marking card; as card; MARKED; 31 ... 40 (10x); not stretchable; Horizontal marking; snap-on type; white



Item No.: 793-506
WMB marking card; as card; MARKED; 41 ... 50 (10x); not stretchable; Horizontal marking; snap-on type; white



Item No.: 793-501
WMB marking card; as card; not stretchable; plain; snap-on type; white



Item No.: 2009-115
WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; white

1.1.3.2 Marking strip



Item No.: 2009-110
Marking strips; for Smart Printer; on reel; not stretchable; plain; snap-on type; white



Item No.: 210-831
Marking strips; on reel; 2.3 mm wide; plain; Self-adhesive; white



Item No.: 210-832
Marking strips; on reel; 3 mm wide; plain; Self-adhesive; white

1.1.4 Signal conditioner

1.1.4.1 Current signal conditioner



Item No.: 857-550
Current signal conditioner; Current input signal; Current and voltage output signal; Digital output; Configuration via software; Supply voltage: 24 VDC; 6 mm module width; 2,50 mm²

1.1.4.2 Power measurement module



Item No.: 2857-570/024-001
3-Phase Power Measurement Module; 3x277/480 V/1 A; Modbus RTU; Digital output; Configuration via software; Supply voltage: 24 VDC

1.1.5 Terminal blocks

1.1.5.1 Through terminal block



Item No.: 285-154
2-conductor through terminal block; 50 mm²; lateral marker slots; only for DIN 35 x 15 rail; POWER CAGE CLAMP; 50,00 mm²; blue



Item No.: 285-150
2-conductor through terminal block; 50 mm²; lateral marker slots; only for DIN 35 x 15 rail; POWER CAGE CLAMP; 50,00 mm²; gray



Item No.: 285-144
2-conductor through terminal block; 50 mm²; lateral marker slots; with fixing flanges; POWER CAGE CLAMP; 50,00 mm²; blue



Item No.: 285-141
2-conductor through terminal block; 50 mm²; lateral marker slots; with fixing flanges; POWER CAGE CLAMP; 50,00 mm²; gray

1.1.6 Tool

1.1.6.1 Operating tool



Item No.: 210-720
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; multicoloured

Installation Notes

Installation



Installation via jumper slot



Feedthrough for primary conductors

Conductor termination



Push-in CAGE CLAMP® connection technology

Security



Integrated fuse