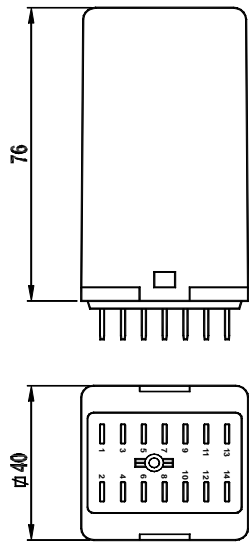


VOLTAGE MONITORING RELAY

Product ACD-U200 series Battery voltage monitoring relay	Country of Origin: The Netherlands
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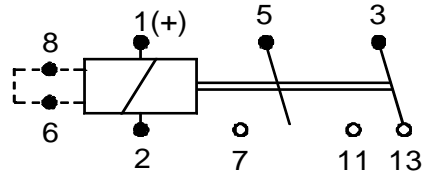
Dimensions	Company
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Connection Diagram



Description

Electronic plug-in railway monitoring relay for battery voltages.
The relay reacts on the mean value of a DC-voltage with ripple.
The pull-in voltage and hysteresis is adjustable by means of multiturn trimpotentiometers.
The pull-in time after crossing the setpoint is < 15ms.
The drop-out time is approximately 20 ms, which can be extended to 250 ms. (see below)
Optional the relay can be supplied with fixed (sealed) set values, or led indication.
The ACD relays are pluggable into standard D and D-U sockets.

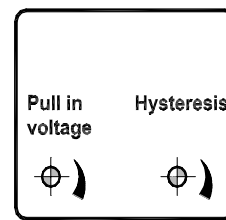
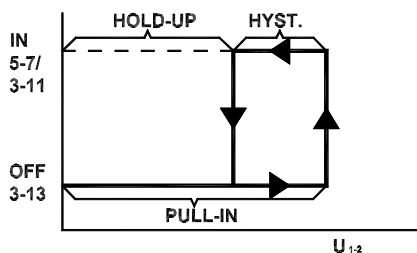
Input data

Type	U _{nom} (V)	U _{max} (V)	U _{pull-in} (V) *)	U _{hysteresis} (V)	Power consumption (W)
ACD-U201	24	35	21...33	1...8	< 0.55
ACD-U202	48	70	42...66	2...16	< 0.85
ACD-U203	72	105	63...99	3...24	< 1.15
ACD-U204	110	160	90...140	5...37	< 1.35
ACD-U205	96	140	84...132	4...32	< 1,30
ACD-U207	36	52	31...50	1,5...12	< 0.75

*) Other pull-in voltage- or hysteresis ranges are possible on request.

Triptime pull-in	<15 ms
Triptime drop-out	20 ms terminals 6/8 open
	250 ms terminals 6/8 closed
Repeat accuracy	± 1 %
Temperature coefficient	± 0.1 %/K

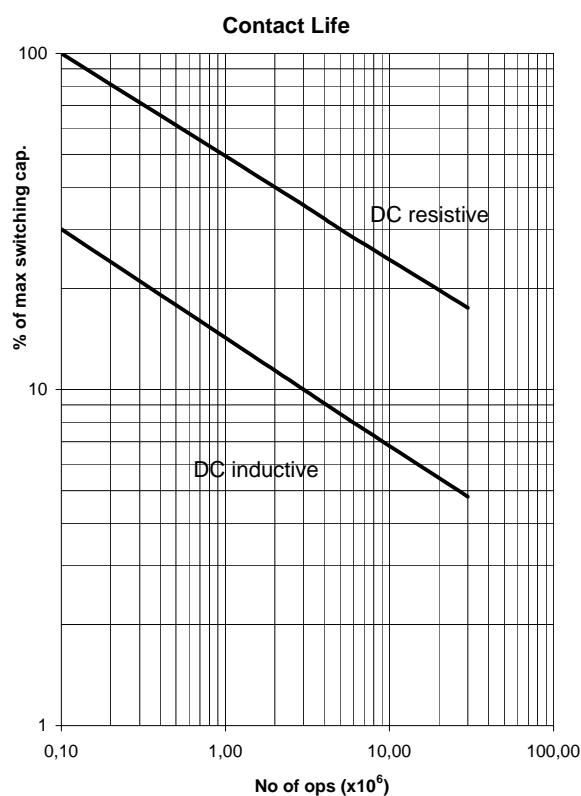
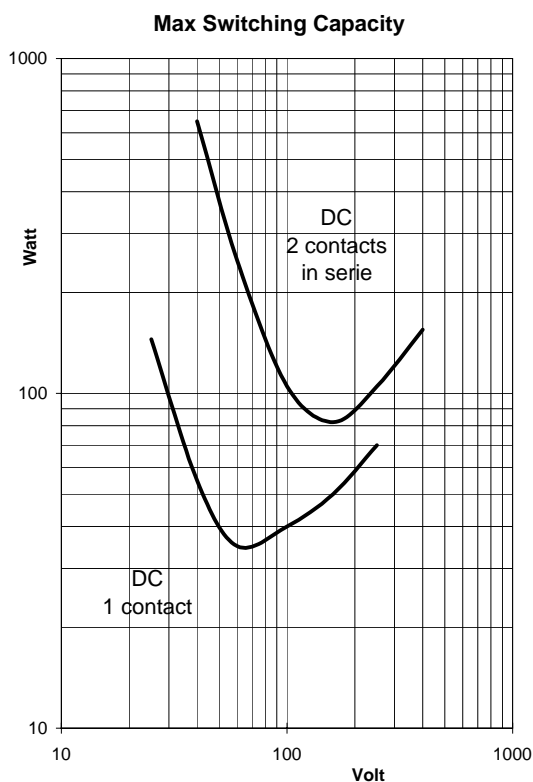
Working Principle Adjustments



Top view

Contact data			
Max. make current	15 A	Material	Ag+0.2µm Au
Max. cont. current	6 A (AC1 ; IEC 60947)	Contact gap	0.3 mm
Max. switching voltage	DC	Insulation between open contacts	1 kV; 50 Hz; 1 min
	AC		
Min. switching voltage	4V / 2mA / 0.1W-VA	Contact force	> 20 cN
Max. contact resistance	15 m Ω	Note : contacts cannot have a different position. (Forced contacts, Weld-no-transfer)	

Maximum switching capacity and contact life: see graph



General Data

Dielectric strength	Pole-Pole	IEC 60255-5	3,5 kV, 50 Hz
	Cont-Coil	IEC 60077	4 kV, 50 Hz
Pulse withstanding		IEC 60255-5	5 kV (1.2/50 µs)
EMC		IEC 60255-5	2.5 kV, 1 MHz, 400 Hz, 10 s
Vibration		IEC 60077	5 g at 50 Hz
		IEC 60571-1	2 g, 10-150 Hz
		IEC 60068-2-6	
Shock		IEC 60068-2-27	15 g, 11 ms
Mechanical life			30*10 ⁶ ops
Max. switching frequency			1200 ops/h
Weight			120 g
Temperature	T _{amb,max}		+ 70 °C
	T _{amb,min}		- 25 °C
Humidity			80 %, temporary permitted condensation
Protection			IP 40
Materials			Polyester
			Makrolon