DATASHEET - ATR-11-S-IA

Position switch, 1N/O+1N/C, wide, IP65_x





Delivery program

71 0		
Basic function		Position switches Safety position switches
Part group reference		ATR
Product range		Rounded plunger
Degree of Protection		IP65
Features		Basic device, expandable
Ambient temperature	°C	-25 - +70
Snap-action contact		Yes
Contacts		
N/O = Normally open		1 N/O
N/C = Normally closed		1 NC 🏵
Notes		Θ = safety function, by positive opening to IEC/EN 60947-5-1
Contact sequence		- + + + + + + + + + + + + + + + + + + +
Contact travel = Contact closed = Contact open		$\begin{array}{c} 13.14 \\ 21.22 \\ 13.14 \\ 21.22 \\ 0 \\ 1.6 \\ 3.0 \\ 2w = 4.5 mm \end{array} \rightarrow$
Positive opening (ZW)		yes
Colour		
Enclosure covers		Grey
Enclosure covers		
Housing		Insulated material
Connection type		Screw terminal
Notes For degree of protection IP65, use V-M20 (206910) cable glands with conne	cting thread of max. 9 mm	length.

Technical data General

General				
Standards			IEC/EN 60947	
Climatic proofing			Damp heat, constant, to IEC 60068-2-78; damp heat, cyclical, to IEC 60068-2-30	
Ambient temperature		°C	-25 - +70	
Mounting position			As required	
Degree of Protection			IP65	
Terminal capacities		mm ²		
Solid		mm ²	1 x (0.75 - 2.5) 2 x (0.75 - 1.5)	
Flexible with ferrule		mm ²	1 x (0.5 - 1.5) 2 x (0.5 - 1.5)	
Contacts/switching capacity				
Rated impulse withstand voltage	U _{imp}	V AC	6000	
Rated insulation voltage	Ui	V	500	

Overvoltage category/pollution degree			111/3
Rated operational current	l _e	А	
AC-15			
24 V	le	А	10
220 V 230 V 240 V	le	А	6
380 V 400 V 415 V	le	А	4
DC-13			
24 V	le	А	10
110 V	le	А	1
220 V	le	Α	0.5
Supply frequency		Hz	max. 400
Short-circuit rating to IEC/EN 60947-5-1			
max. fuse		A gG/gL	6
Repetition accuracy		mm	0.02
Mechanical variables			
Lifespan, mechanical	Operations	x 10 ⁶	20
Notes			(If approached from the side: 6)
Contact temperature of roller head		°C	≦ 100
Mechanical shock resistance (half-sinusoidal shock, 20 ms)			
Standard-action contact		g	25
Snap-action contact		g	2
Operating frequency	Operations/h		≦ 6000
Actuation			
Mechanical			
Actuating force at beginning/end of stroke		Ν	1.0/8.0
Max. operating speed with DIN cam		m/s	1/1
Notes			for angle of actuation $\alpha=0^{\circ}/30^{\circ}$

Design verification as per IEC/EN 61439

Technical data for design verification			
Rated operational current for specified heat dissipation	In	А	6
Heat dissipation per pole, current-dependent	P _{vid}	W	0.13
Equipment heat dissipation, current-dependent	P _{vid}	W	0
Static heat dissipation, non-current-dependent	P _{vs}	W	0
Heat dissipation capacity	P _{diss}	W	0
Operating ambient temperature min.		°C	-25
Operating ambient temperature max.		°C	70
IEC/EN 61439 design verification			
10.2 Strength of materials and parts			
10.2.2 Corrosion resistance			Meets the product standard's requirements.
10.2.3.1 Verification of thermal stability of enclosures			Meets the product standard's requirements.
10.2.3.2 Verification of resistance of insulating materials to normal heat			Meets the product standard's requirements.
10.2.3.3 Verification of resistance of insulating materials to abnormal heat and fire due to internal electric effects			Meets the product standard's requirements.
10.2.4 Resistance to ultra-violet (UV) radiation			Meets the product standard's requirements.
10.2.5 Lifting			Does not apply, since the entire switchgear needs to be evaluated.
10.2.6 Mechanical impact			Does not apply, since the entire switchgear needs to be evaluated.
10.2.7 Inscriptions			Meets the product standard's requirements.
10.3 Degree of protection of ASSEMBLIES			Does not apply, since the entire switchgear needs to be evaluated.
10.4 Clearances and creepage distances			Meets the product standard's requirements.
10.5 Protection against electric shock			Does not apply, since the entire switchgear needs to be evaluated.
10.6 Incorporation of switching devices and components			Does not apply, since the entire switchgear needs to be evaluated.
10.7 Internal electrical circuits and connections			Is the panel builder's responsibility.
10.8 Connections for external conductors			Is the panel builder's responsibility.
10.9 Insulation properties			

10.9.2 Power-frequency electric strength	Is the panel builder's responsibility.
10.9.3 Impulse withstand voltage	Is the panel builder's responsibility.
10.9.4 Testing of enclosures made of insulating material	Is the panel builder's responsibility.
10.10 Temperature rise	The panel builder is responsible for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.
10.11 Short-circuit rating	Is the panel builder's responsibility. The specifications for the switchgear must be observed.
10.12 Electromagnetic compatibility	Is the panel builder's responsibility. The specifications for the switchgear must be observed.
10.13 Mechanical function	The device meets the requirements, provided the information in the instruction leaflet (IL) is observed.

Technical data ETIM 7.0

Sensors	(EG000026) /	End	switch	(FC000030))
0013013	(LUUUUU20)/	LIIU	30010011	120000000	/

Electric engineering, automation, process control engineering / Binary sensor technology, safety-related sensor technology / Position switch / Position switch (Type 1) (ecl@ss10.0.1-27-27-06-01 [AGZ382015])

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Number of contacts as normally open contact Image: Provide the sector of t	Number of safety auxiliary contacts		0
Number of contacts as change-over contact Image: Provide the sector of the sector	Number of contacts as normally closed contact		1
Type of interface Mone Type of interface for safety communication Mone Construction type housing Mone Material housing Luboid Coating housing Duby Type of ontrol element Mone Alignment of the control element Mone Type of electric connection Mone With status indication Mone Suitable for safety functions Mone Explosion safety category for gas Mone Anbient temperature during operating Mone Degree of protection (IP) Mone	Number of contacts as normally open contact		1
Type of interface for safety communication Image: Sector Sect	Number of contacts as change-over contact		0
Construction type housing Cuboid Material housing Plastic Coating housing Other Type of control element Plunger Alignment of the control element Other Type of electric connection Other With status indication Other Suitable for safety functions Image: Status indication Explosion safety category for gas Image: Status indication Ambient temperature during operating Image: Status indication Ambient temperature during operating Image: Status indication Degree of protection (IP) Image: Status indication	Type of interface		None
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Type of control element Plunger Alignment of the control element Other Type of electric connection Image: Control element Vith status indication Image: Control element Suitable for safety functions Image: Control element Explosion safety category for gas Image: Control element Ambient temperature during operating Image: Control element Image: Control element Image: Control element Imag	Material housing		Plastic
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Explosion safety category for dust None Ambient temperature during operating °C 25 - 70 Degree of protection (IP) Image: Constant operation o	Suitable for safety functions		Yes
Ambient temperature during operating °C 25 - 70 Degree of protection (IP) IP65	Explosion safety category for gas		None
Degree of protection (IP)	Explosion safety category for dust		None
	Ambient temperature during operating	°C	25 - 70
Degree of protection (NEMA) Other	Degree of protection (IP)		IP65
	Degree of protection (NEMA)		Other

Dimensions

