

# AR715

## The flow meter / pulse counter



4 COLORS  
DISPLAY



PROGRAMMING



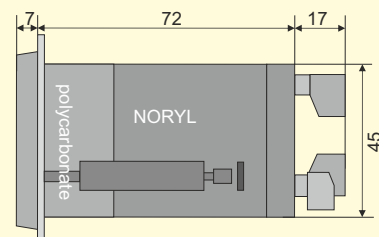
- configurable measurement mode:
  - measurement of flow and balance
  - pulse counter
  - incremental encoder (measurement of rotational speed, rate of turn, shifts)
  - dispenser (simultaneous dosing and counting)
  - frequency measurement
  - remote display via RS485, MODBUS-RTU, slave
- maximum measurement frequency:
  - 10kHz - for a flow, frequency, rotational speed
  - 30kHz - for the counter with PNP output
  - 100kHz - for the counter with NPN output
- balance capacity:  $2 \times 10^9$  [units] with sign (-1999999999 ÷ 1999999999), 10 digits when the position of dot is equal to 0
- universal pulse inputs (IN1, IN2) for flow meters, presence sensors, encoders with outputs:
  - open collector of NPN type
  - open collector of PNP type
  - contact (reed, mechanical)
- additional inputs:
  - **S** - start/stop of counting (permission for counting)
  - **R** - reset of counter/balance
  - **B** - binary input of the programmable function
- 2 relay outputs or optionally SSR with programmable operational characteristics
- analogue output 0/4 ÷ 20mA or 0/2 ÷ 10V (alarm, retransmission)
- built-in power supply adapter to power the flowmeters, encoders and other sensors 24V/50mA
- four-color LED display with adjustable brightness
- access to configuration parameters protected by a user password or no password required
- programming via 4-button membrane keypad or digital interface
- programmable function button ("F") and binary input for changing the operational modes: keypad lock, unconditional manual mode for outputs, HOLD function for displaying flow measurements, dosing start/stop
- programmable options for communication, alarms, and other configuration parameters
- methods for configuring parameters:
  - via membrane keyboard (IP65) located on the front panel of the device
  - via RS485 or PRG AR955/GP programmer and freeware: ARsoft-LOG (Windows 7/8/10)
- software and programmer allow you to view the measured value and quickly configure single or few sets of parameters previously saved in the computer for re-use, e.g. in other devices of the same type (duplicate configuration)
- high accuracy, long-term stability and immunity to interference in industrial environment
- panel housing 96x48 mm, IP65 front, IP20 of the connections side

### TECHNICAL DATA

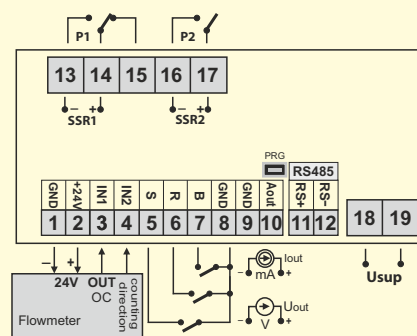
<b>Input</b>	pulse NPN, PNP, contact (reed switch, mechanical)	
<b>Accuracy of freq. measurement</b>	≤0.02 % ±1 digit (in whole of temperature range)	
<b>Accuracy of flow measurement</b>	consistent with the accuracy of the flow transmitter used	
<b>Input frequency</b>	max. 10kHz (for the meter PNP - 30kHz, for meter the NPN - 100kHz)	
<b>7-segment LED display</b>	5 digits, height 14 mm, programmable color and brightness	
<b>Bi-state outputs</b>	relay	SPDT, SPST-NO, 8A / 250 Vac (for resistance loads), standard
	SSR (option)	transistor type NPN OC, 11 V, internal resistance 440 Ω
<b>Analogue output</b> (1 current or voltage)	current	0/4 ÷ 20 mA, load $R_0 < 350 \Omega$ , no galvanic separation
	voltage (option)	0/2 ÷ 10 V, load $I_0 < 3,7 \text{ mA}$ , no galvanic separation
	output error	<0,1 % of the output range, maximum resolution 16 bit
<b>Power Supply</b>	230 Vac (85 ÷ 260 Vac) / 3 VA	
	24 Vac/dc (18 ÷ 72 Vdc/3 V, 15 ÷ 50 Vac/3 VA)	
<b>Communication interface</b> (RS485 i PRG, do not use at the same time)	RS485, MODBUS-RTU protocol, slave, galvanically separated, option	
	PRG programming link (no separation), for AR955, AR956, standard	
<b>Rated operating conditions</b>	0 ÷ 50 °C, <90 %RH (non-condensing), air and neutral gases	

### DIMENSIONS, INSTALATTION DATA

<b>Enclosure dimensions</b>	96x48x79 mm
<b>Panel window</b>	92x46 mm
<b>Material</b>	polycarbonate, NORYL 94V-0



### TERMINAL STRIPS, ELECTRICAL CONNECTIONS



### HOW TO ORDER

AR715 / □ / □ / □ / □				<table border="1"> <tr> <th colspan="2">Analog output</th> <th>Code</th> </tr> <tr> <td>0/4 ÷ 20 mA</td> <td></td> <td>WA</td> </tr> <tr> <td>0/2 ÷ 10 V</td> <td></td> <td>WU</td> </tr> </table>		Analog output		Code	0/4 ÷ 20 mA		WA	0/2 ÷ 10 V		WU					
Analog output		Code																	
0/4 ÷ 20 mA		WA																	
0/2 ÷ 10 V		WU																	
<table border="1"> <tr> <th>Supply</th> <th>Code</th> </tr> <tr> <td>230 Vac</td> <td>S1</td> </tr> <tr> <td>24 Vac/dc</td> <td>S2</td> </tr> </table>	Supply	Code	230 Vac	S1	24 Vac/dc	S2	<table border="1"> <tr> <th>Outputs</th> <th>Code</th> </tr> <tr> <td>relay</td> <td>P</td> </tr> <tr> <td>SSR</td> <td>S</td> </tr> </table>	Outputs	Code	relay	P	SSR	S	<table border="1"> <tr> <th>Interface RS*</th> <th>Code</th> </tr> <tr> <td>interface RS485</td> <td>RS485</td> </tr> </table>	Interface RS*	Code	interface RS485	RS485	
Supply	Code																		
230 Vac	S1																		
24 Vac/dc	S2																		
Outputs	Code																		
relay	P																		
SSR	S																		
Interface RS*	Code																		
interface RS485	RS485																		

For example: AR715 / S1 / P / P / WA  
AR715, supply 230 Vac, 2 relay outputs, current output

\*option for an extra fee