



Certificate of Compliance

Certificate:	80194673	Master Contract:	200600
Project:	80194673	Date Issued:	2025-06-26
Issued to:	Endress+Hauser Wetzer GmbH Co. KG Obere Wank 1 Nesselwang, Bavaria 87484 Germany	Issued by:	<i>Amandeep Khatra</i> Amandeep Khatra

Attention: Michael Pfanzelt

The products listed below are eligible to bear the CSA Mark shown with adjacent indicators 'C' and 'US' for Canada and US or with adjacent indicator 'US' for US only or without either indicator for Canada only.



PRODUCTS

Class 2252 06 PROCESS CONTROL EQUIPMENT - Process Control Equipment
Class 2252 86 PROCESS CONTROL EQUIPMENT - Certified to US Standards

RU48 Process Indicator / FMA 90 Control Unit

Model(s)
RU 48, FMA90

RU48 Process Indicator / FMA 90 Control Unit - DIN mount, Panel mount and Polymeric housing field mounted version.

Notes:



Certificate: 80194673

Master Contract: 200600

Project: 80194673

Date Issued: 2025-06-26

Specifications for the range of environmental conditions for which the equipment is designed, including the following:

- Pollution degree 2
- Humidity: 5- 95% Non-condensing for (DIN Rail & Panel Mount Version)
- Overvoltage category II.
- Mode of operation: continuous.
- Altitude 3000m.
- Tambient: -35°C to +60°C (Field Unit or Panel Mount), -40°C to +60°C (DIN rail option)
- Field Unit: IP65, Panel Unit IP65 (display only). DIN Version: IP20

Rating:

Supply (Terminals 1.1, 1.2):

10.5 Vdc - 32Vdc, 15VA or

100-230 VAC (Nominal) or 85V_{AC} – 253V_{AC} (extended), 20 VA

Open collectors (Terminals 61, 62 & optional terminals 63, 64 & 65, 66)

30Vdc, 120mA

Digital inputs/switch inputs (optional) Terminals 51, 52, 53, 54, 55

30Vdc

Output circuits, limit value relay (Terminals 111, 112, 114, Terminals 211, 212, 214 (Optional), Terminals 313, 314 (Optional), Terminals 413, 414 (Optional), Terminals 513, 514 (Optional)

250Vac, 4A or 30Vdc, 4A

Analog output circuits (Terminals 71, 72 & 73, 74(Optional):

0...23 mA DC (22.5mA DC + 0.5mA HART)

Analog Input circuit (Sensor connections) – Terminals 11, 12, 13 & 21, 22, 23(Optional)

4...20 mA DC ; 14...27 V DC (load depending)

Order Code <aabdefghijklmmnnnooppqq>

aa = CA

b = 1, 2

d = A, B, C

f = 1, 2

ceghijklmmnnnooppqq is neither related to Explosion Safety nor in the scope.

Option Code details:

RU48-	aabdefghijklmmnnnooppqq	
	LEVEL TRANSMITTER FMA90	
FMA90-	aabdefghijklmmnnnooppqq	Comments
aa	Approval:	
CA	CSA C-US General Purpose	
b	Power Supply:	
1	100-230 VAC (Nominal) or 85V _{AC} – 253V _{AC} (extended)	
2	10.5-32 VDC	
c	Application Package:	Not safety relevant



Certificate: 80194673

Master Contract: 200600

Project: 80194673

Date Issued: 2025-06-26

1	Universal (level, pump control, open channel flow measurement, data logging)	
2	Universal + extended process data management	
d	Housing:	
A	DIN rail mounting, Polycarbonate, IP20	
B	Panel mounting, Polycarbonate, front IP65, rear side IP20, 96x96	
C	Field mounting, Polycarbonate, IP65 NEMA4x	
D	Field mounting, Aluminium, IP65 NEMA4x	
e	Display; Operating:	Not safety relevant
1	W/o; RJ45 Ethernet	
2	W/o; RJ45 Ethernet + WLAN	
3	3.5" TFT touch display; RJ45 Ethernet	
4	3.5" TFT touch display; RJ45 Ethernet + WLAN	
f	Sensor Connection, Analog Output:	
1	1x 4-20mA/HART input; 1x 4-20mA output	
2	2x 4-20mA/HART input; 2x 4-20mA output	
g	Relay Output:	Not safety relevant
1	1x SPDT	
5	5x (2x SPDT, 3x SPST)	
h	Digital Input; Switch Output:	Not safety relevant
A	W/o; 1x open collector	
B	4x; 3x open collector	
i	Communication:	Not safety relevant
A	HART output	
B	PROFINET	
C	EtherNet/IP	
D	Modbus TCP slave	
jj	Operating Language Display:	Not safety relevant
kk	Application Package:	Not safety relevant
ll	Calibration:	Not Safety relevant
mm	Service:	Not Safety relevant
nn	Additional Approval:	Not Safety relevant
oo	Accessory Mounted:	Not Safety relevant
pp	Accessory Enclosed:	Not in the scope
qq	Marking:	Not safety relevant

APPLICABLE REQUIREMENTS

CSA C22.2 No. 61010-1-12, UPD1:2015, UPD2:2016, AMD1:2018 - Safety requirements for electrical equipment for measurement, control, and laboratory use — Part 1: General requirements



Certificate: 80194673

Master Contract: 200600

Project: 80194673

Date Issued: 2025-06-26

ANSI/UL 61010-1 3rd Edition (2012), AMD1:2018 - Safety Requirements for Electrical Equipment for Measurement, Control, and Laboratory Use - Part 1: General Requirements

Conditions Of Acceptability

1. The RU48 Process Indicator / FMA 90 Control Unit (DC Version) shall only be powered by a power supply unit with a limited energy electric circuit in accordance with CAN/CSA C22.2 No. 61010-1-12 and ANSI/UL 61010-1, or Class 2 as defined in the Canadian Electrical Code C22.1, Section 16-200 and/or National Electrical Code (NFPA 70), article 725.121.
2. Service may only be performed by a qualified person.
3. For the 85 to 253 VAC version (mains connection), a switch marked as a circuit breaker, as well as an overload protection device (rated power $\leq 10\text{ A}$) shall be fitted in the supply line near the device (easy to reach).
4. The end enclosure (DIN rail & Panel Version), and the polymeric enclosure for Field Unit shall not be opened when the device is energized.
5. The DIN/Panel versions shall be installed in a suitable enclosure based on the environmental conditions of the end application and acceptable to the Authority having Jurisdiction.
6. The polymeric field housing shall be fitted with suitable cable entry devices compatible with the environmental conditions and Ingress protection level required.



Certificate: 80194673

Project: 80194673

Master Contract: 200600

Date Issued: 2025-06-26

Notes:

Products certified under Class(es) C225206 have been certified under CSA's ISO/IEC 17065 accreditation with the Standards Council of Canada (SCC). www.scc.ca





Supplement to Certificate of Compliance

Certificate: 80194673

Master Contract: 200600

*The products listed, including the latest revision described below,
are eligible to be marked in accordance with the referenced Certificate.*

Product Certification History

Project	Date	Description
80194673	2025-06-26	Original cCSAus certification for level and flow measurement device consisting of flow measurement display unit model RU48 and flow measurement transmitter model FMA90.