IECEx Certificate of Conformity

INTERNATIONAL ELECTROTECHNICAL COMMISSION
IEC Certification System for Explosive Atmospheres

for rules and details of the IECEx Scheme visit www.iecex.com

Certificate No.:	**IECEx ExTC 18.0016X**	Page 1 of 5	Certificate history:
Status:	**Current**	Issue No: 1	Issue 0 (2019-01-29)
Date of Issue:	2022-10-05		
Applicant:	**Compac Industries Ltd** 52 Walls Road Penrose Auckland 1061 **New Zealand**		
Equipment:	**Compac Coriolis Meters - V50 and KG100**		
Optional accessory:			
Type of Protection:	**Intrinsic safety 'i'**		
Marking:	Ex ib IIA T4 Gb -40°C ≤ Tamb ≤ +70°C		

Approved for issue on behalf of the IECEx Certification Body: **Ajay Maira**

Position: **Certification Authority**

Signature: (for printed version)

Date: (for printed version) 2022-10-05

1. This certificate and schedule may only be reproduced in full.
2. This certificate is not transferable and remains the property of the issuing body.
3. The Status and authenticity of this certificate may be verified by visiting www.iecex.com or use of this QR Code.

Certificate issued by:

Ex Testing and Certification Pty Ltd
1/30 Kennington Drive
Tomago NSW 2322
Australia

TESTING & CERTIFICATION

IECEx Certificate of Conformity

Certificate No.: **IECEx ExTC 18.0016X**

Date of issue: 2022-10-05

Issue No: 1

Manufacturer: **Compac Industries Ltd**
52 Walls Road
Penrose
Auckland 1061
New Zealand

Manufacturing locations:

This certificate is issued as verification that a sample(s), representative of production, was assessed and tested and found to comply with the IEC Standard list below and that the manufacturer's quality system, relating to the Ex products covered by this certificate, was assessed and found to comply with the IECEx Quality system requirements.This certificate is granted subject to the conditions as set out in IECEx Scheme Rules, IECEx 02 and Operational Documents as amended

STANDARDS :
The equipment and any acceptable variations to it specified in the schedule of this certificate and the identified documents, was found to comply with the following standards

IEC 60079-0:2017 Explosive atmospheres - Part 0: Equipment - General requirements
Edition:7.0

IEC 60079-11:2011 Explosive atmospheres - Part 11: Equipment protection by intrinsic safety "i"
Edition:6.0

This Certificate **does not** indicate compliance with safety and performance requirements other than those expressly included in the Standards listed above.

TEST & ASSESSMENT REPORTS:
A sample(s) of the equipment listed has successfully met the examination and test requirements as recorded in:

Test Reports:

AU/EXTC/ExTR18.0014/00 AU/ExTC/ExTR22.0044/00

Quality Assessment Report:

AU/TSA/QAR08.0008/09

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EQUIPMENT:
Equipment and systems covered by this Certificate are as follows:

The Compac V50 and KG100 Meters are Coriolis flow meters, each comprising several printed circuit boards mounted inside an enclosure. The enclosure for the V50 meter is made from polycarbonate or polycarbonate/ABS and the KG100 meter enclosure is made from zinc coated mild steel (Zintex) with a powder coat finish.

The V50 Meter comprises the following boards - CI225 – MSP PCB, CI226 – DSP PCB, CI529 – Display PCB and a CI231 - V50 Connector board interconnected by board connectors and cables. External connection to the V50 Meter is made to connector J1 on the CI225 board via an integral 4 core cable up to 5 metres in length terminated with a 10 pin receptacle. An extension cable extending the total length of cable to 50 metres may also be used.

The KG100 Meter comprises the following boards - CI225 – MSP PCB, CI226 – DSP PCB, CI529 – Display PCB, CI508 – KG100 Adaptor board and CI263 – Rigid Flexi Connector interconnected by board connectors and cables. External connection to the KG100 Meter is made to connector J201 on the CI508 board via an integral 6 core cable up to 5 metres in length terminated with a 10 pin receptacle. An extension cable may also be used extending the total length of cable to 50 metres for the KG100 (with CI508).

SPECIFIC CONDITIONS OF USE: YES as shown below:
Refer to Annex for details.

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DETAILS OF CERTIFICATE CHANGES (for issues 1 and above)
Refer to Annex for details

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Certificate No.: **IECEx ExTC 18.0016X**

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Issue No: 1

Additional information:
ExTC job 21083

Annex:

IECEx ExTC 18.0016X-1 Annex.pdf

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Annexe

Annexe for Certificate No.:	IECEx ExTC 18.0016X	Issue No.:	1

Description:

Refer to certificate

Specific Conditions of Use pertaining to Issue 0 of this Certificate:

Refer to Issue 0 of this certificate.

Drawing list pertaining to Issue 0 of this Certificate:

Refer to Issue 0 of this certificate.

Variations permitted by Issue 1 of this certificate:

- Obsoletion of the CI516 and CI520 PCBAs
- Addition of the CI529 PCBA
- Minor changes to the circuits on CI225 and CI226
- Change in the notified body on the marking labels

The equipment description and conditions of use have been revised to address the addition and removal of PCBAs accordingly. Additionally, the drawings table has been revised for greater clarity.

Specific Conditions of Use pertaining to Issue 1 of this certificate:

1. The following parameters shall be considered when connecting the equipment to an intrinsically safe circuit:

V50 Meter J1 (Doc CI225 Schematics Sht 5)	
Ui	6 V
Ii	235 mA
Pi	1.1 W
Li	50 µH
Ci	137 µF

KG100 Meter (with CI508) J201 (Doc CI508 Schematics Sht 2)	
Ui	6 V
Ii	235 mA
Pi	1.1 W
Li	50 µH
Ci	137 µF

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Annexe

Annexe for Certificate No.:	IECEx ExTC 18.0016X	Issue No.:	1

Drawings Associated with the Issue 1 of this Certificate:

Manufacturer's Documents				
Title:	Drawing No.:	Pages	Rev. Level:	Date:
*C5000 Control Unit Labels *(V50 & KG100 Meter)*	AP392	Sheets 6 and 7	C	2022-10-04
*Installation & Safety Data for V50 Meter	AP400	2	C	2022-10-05
*Installation & Safety Data for KG100 Meter with CI508	AP401	2	C	2022-10-05
*Coriolis Meter Wiring	AP403	5	B	2022-04-19
*KG100 Meter - Display assembly	ASM0058A	1	A	2021-05-21
*Coriolis Meter - MSP *(Schematic)*	CI225	1-5	E	2022-08-30
*Coriolis Meter - MSP *(PCB layout)*	CI225	6-10	E	2021-05-28
*CP-MSP2-CI225 *(BOM)*	CI225P	1	E	2022-09-01
*Coriolis Meter - DSP *(Schematic)*	CI226	1-6	G	2022-08-30
*Coriolis Meter - DSP *(PCB layout)*	CI226	7-14	G	2022-04-06
*CI2226P DSP *(BOM)*	CI226P	2	G	2022-04-19
Rigid Flex Connector *(Schematic)*	CI231	1	C	2018-09-03
Rigid Flex Connector *(PCB layout)*	CI231	2-8	C	2018-09-03
*CP-RFLEXI-CI231 *(BOM)*	CI231P	1	C	2022-10-04
Rigid Flexi Connector *(PCB layout)*	CI263	Sheets 3 to 7	B	2018-08-30
CP-MTR-TMPFLX *(BOM)*	CI263P	1	B	2018-08-31
KG100 Adaptor *(Schematic)*	CI508	1-2	B	2018-09-04

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Annexe

Annexe for Certificate No.:	IECEx ExTC 18.0016X	Issue No.:	1

Manufacturer's Documents				
Title:	Drawing No.:	Pages	Rev. Level:	Date:
KG100 Adaptor *(PCB layout)*	CI508	3-6	B	2018-09-04
CP-C5K-KG-ADPT *(BOM)*	CI508P	1	B	2018-09-04
*Display for Coriolis Meter – Micro *(Schematic)*	CI529	1	C	2022-08-31
*Display for Coriolis Meter – Micro *(PCB layout)*	CI529	2-5	C	2022-04-19
*CP-C5K-KGMDSP2 *(BOM)*	CI529P	1	C	2022-04-19
*350 BAR KG Meter *(Materials - Sh 1, Overall Dimensions - Sh 2 & 3 and CI529 Display Add-on Sh 4)*	MAD0028D	4	E	2022-09-05
LPG Meter *(Overall Dimension - Sh 1, Assembly - Sh 2 and Seal Details - Sh 3)*	MAD0048B	3	B	2015-10-12

*Note: An * is included before the title of documents that are new or revised.*