Mining And Surface Certification (Pty) Ltd

2015/021934/07

THIS CERTIFICATE IS ISSUED AS AN I.A. CERTIFICATE IN TERMS OF THE MINE HEALTH AND SAFETY ACT, ACT NO 29 OF 1996 (AND REGULATIONS), THE OCCUPATIONAL HEALTH AND SAFETY ACT (ACT 85 OF 1993) AND REGULATION 17 OF THE ELECTRICAL MACHINERY REGULATIONS

IA CERTIFICATE	MASC S/23-8582X	**Issue**	1
Issue Date	11 November 2024	**Expiry Date**	11 November 2027
**** Based on Certificate No**	IECEx LCI 10.0038X	**Issue / Variations / Amendment**	2
Requested by	**MSA – The Safety Company** 1000 Cranberry Woods Township, PA 16066 United States of America		
Manufacturer	**MSA - The Safety Company** 1000 Cranberry Woods Drive Cranberry Township, PA 16066 United States of America		
Description	**Functional description**: Gas Sensor Calibration Cap, type PRIMAX IR, is a self-contained device, battery operated and is used as calibration tool for use with PRIMAX IR gas sensors. Communication between calibration cap device and sensor is done via IR. PRIMAX IR Calibration Cap is used locally at the main sensor to calibrate (PRIMA IX sensor) and calibration process can start automatically. The calibration cap display indicates the zero-gas cylinder symbol and flashes, thanks to internal IR diode, and indicating that the device is in Zero Calibration Mode. PRIMAX IR Calibration Cap is an autonomous device, powered supplied by one poly-carbon monofluoride lithium coin cell, Panasonic, type BR1632A. **Mechanical description**: The external enclosure is made of polycarbonate / ABS alloy and has an LCD display.		
Equipment	Gas sensor Calibration Cap		
MARKING: **Original marking as per certificate ** remains applicable.** **IA number must be added.**	**Type:** **Ex Marking:**	Gas sensor Calibration Cap Ex ia IIC T4 Gb - 30°C to +60°C	
	IA Number: **Warnings:**	MASC S/23-8582X (To be additionally marked on equipment) See Base Certificate ** (original marking must be applied)	
Quality Assurance report (QAR) / Notification (QAN):	FR/INE/QAR08.0011/14		

Compliance:

The equipment as described above has been allocated the rating Explosion Protected 'as above' utilizing the SANS/IEC Standards:

- SANS (IEC) 60079-0: 2012 Equipment - General requirements
- SANS (IEC) 60079-11: 2012 Equipment protection by intrinsic safety "i"

Note: This certificate covers only the listed standards and does not imply compliance to any other standard, related or inferred. It is up to the manufacturer to ensure that the product complies to all relevant standards for the application.

Special conditions of safe use "X":

- Refer to Annex A below for more details.

Conditions of manufacture:

- Refer to Annex A below for more details.

S. Jordaan
TECHNICAL SPECIALIST

C. van Brakel
TECHNICAL OFFICER

This certificate covers all units sold as long as the QAR/QAN remains valid.
According to the relevant requirements of the MHS Act and the OHS Act, production units of explosion protected equipment are required to comply with third party quality assurance (an approved mark scheme or batch testing by an accredited test laboratory).

Apparatus in hazardous locations is subject to the following provisions as applicable, which shall be adhered to:
SANS 10086 requirements;
Any conditions mentioned in the above certificate;
Any relevant requirements of the MHS Act;
Any restrictions and conditions enforced by the chief inspector of mines, principal inspector (Group I equipment) or chief inspector of factories (Group II equipment).

Mining And Surface Certification (Pty) Ltd
Unit 5 Lelyta Park, 45 Jurg Avenue, Hennopspark, Ext 87
Centurion 0157

IA CERTIFICATE: MASC S/23-8582X
Equipment: Gas sensor Calibration Cap
(Expiry date: 11 November 2027)

ANNEX A

This document is based on and must be read in conjunction with certificate IECEx LCI 10.0038X.	
Description (According to Base Certificate) **	
"Refer to description in Base Certificate ** (and any applicable schedules/issues/variations)."	
Supplementary	• Issue 1: Supplemented for review asper NCoP 2398
Standard compliance	See Base Certificate **
Special conditions of safe use ("X")	• The apparatus can be only powered by a Panasonic type BR1632A cell. • Ambient temperature : - 30°C to +60°C
Conditions of manufacture	• None.
Conditions of Certification	• This IA Certificate covers all units sold from the date of this document to the expiry date of this certificate. • As per ARP 0108: 2018 / NCoP 2398: 2022 (as applicable) a maximum three yearly review is required on this IA Certificate (expiry is determined as per the QAR/QAN/QMS expiry date). • The apparatus must be additionally marked with the MASC marking details above. • This approval only covers the equipment as certified above and does not include any scheduled additions or variations / amendments / new issues to the certificate(s), made after the above date. • The equipment does not need to be re-tested when used on the conditions and with such restrictions as prescribed by the certificate on which this IA Certificate is based and any other conditions in this IA Certificate. • The certification on which this IA Certificate is based must remain valid. • The extent of the requirements in the ARP 0108:2018 / NCoP 2398: 2022 (as applicable), SANS 10108 and any other applicable regulations on the certification of the equipment must remain unchanged. • The Ex-quality assurance notification/report for the equipment must remain valid
Conclusion:	• From the above and the selective examination of the documentation, nothing contrary to the requirements of the applicable standards was found, provided that the equipment / component is used as described in the above document / certificate and according to the MASC conditions below. A MASC IA certificate is issued based on the work done as per the Base Certificate **. • The routine tests for production units according to the Base Certificate ** must be complied with (if applicable).

Mining And Surface Certification (Pty) Ltd Reg No: 2015/021934/07
Directors: Roelof Viljoen & Francoius du Toit
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e-mail: **info@masc-ex.co.za**

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 LCI 10.0038X**

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Certificate history:
Issue 1 (2013-06-28)
Issue 0 (2010-10-29)

Status: **Current**

Issue No: 2

Date of Issue: 2020-07-17

Applicant: **MSA - The Safety Company**
1000 Cranberry Woods Drive
Cranberry Township, PA 16066
United States of America

Equipment: **Gas sensor Calibration Cap**

Optional accessory:

Type of Protection: **ia**

Marking: MSA - The Safety Company

Address : ....

Type : PRIMAX IR Calibration Cap

Serial number : ...

Year of construction : ...

Ex ia IIC T4 Gb

IECEx LCI 10.0038 X

Ambient temperature : - 30°C to +60°C

Approved for issue on behalf of the IECEx Certification Body: **Julien GAUTHIER**

Position: **Certification Officer**

Signature:
(for printed version)

Date:
(for printed version)

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:

Laboratoire Central des Industries Electriques (LCIE)
33 Avenue du General Leclerc
Fontenay-aux-Roses FR-92260
France

IECEx Certificate of Conformity

Manufacturer: **MSA - THE SAFETY COMPANY**
1000 Cranberry Woods Dr
Cranberry Township
Pennsylvania 16066-5296
United States of America

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 60079-0:2011 Explosive atmospheres - Part 0: General requirements
Edition:6.0

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:

FR/LCI/ExTR10.0041/00 FR/LCI/ExTR10.0041/01 FR/LCI/ExTR20.0001/00

Quality Assessment Report:

FR/INE/QAR08.0011/10

IECEx Certificate of Conformity

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

The device is a self-contained, battery operated calibration tool for use with PrimaX IR gas sensors.

SPECIFIC CONDITIONS OF USE: YES as shown below:
The apparatus can be only powered by a Panasonic type BR1632A cell.

Ambient temperature : - 30°C to +60°C

IECEx Certificate of Conformity

DETAILS OF CERTIFICATE CHANGES (for issues 1 and above)
Issue 00 (2010/10/30) : Initial assessment according to requirements of IEC 60079-0 : 2004 (Edition 4.0) and IEC 60079-11 : 2006 (Edition 5.0) standards.

Issue 01 (2013/06/28) : Normative update according to IEC 60079-0 : 2011 (Ed. 6) and IEC 60079-11 : 2011 (Ed. 6) requirements.

Issue 02 (current) :

- Modification of company name : Mine Safety Appliances Company becomes MSA - The Safety Company,

- Technical document update,

- Modification of plastic material of external enclosure.

Annex:

LCI 10.0038X-MSA_safety_company-PRIMAX_IR_- Issue 02 - Annex 01.pdf

Annex 01 to Certificate
IECEx LCI 10.0038 X issue 02

FULL EQUIPMENT DESCRIPTION

Functional description:
Gas Sensor Calibration Cap, type PRIMAX IR, is a self-contained device, battery operated, and is used as calibration tool for use with PRIMAX IR gas sensors.
Communication between calibration cap device and sensor is done via IR.

PRIMAX IR Calibration Cap is used locally at the main sensor to calibrate (PRIMA IX sensor) and calibration process can start automatically.
The calibration cap display indicates the zero gas cylinder symbol and flashes, thanks to internal IR diode, and indicating that the device is in Zero Calibration Mode.

PRIMAX IR Calibration Cap is an autonomous device, powered supplied by one poly-carbonmonofluoride lithium coin cell, Panasonic, type BR1632A.

Mechanical description:
The external enclosure is made of polycarbonate / ABS alloy and has an LCD display.

MARKING

MSA – The Safety Company
Address : …
Type : PRIMAX IR Calibration Cap
Serial number : …
Year of construction : …
Ex ia IIC T4 Gb
IECEx LCI 10.0038 X
-30°C ≤ Tamb ≤ +60°C

RANGE DETAILS

Product range: Only one model.

RATINGS

Equipment is powered supplied by a non-replaceable lithium primary battery PANASONIC, BR1632A type.

FULL CONDITIONS OF CERTIFICATION (ou FULL SCHEDULE OF LIMITATIONS)

a) Ambient temperature range: -30°C to +60°C.
b) The apparatus must only be powered by a primary battery, Panasonic, type BR1632A.

ROUTINE TESTS

None.

APPARATUS OVERVIEW

General view of the equipment :

PRIMAX IR Calibration Cap

ADDITIONAL MANUFACTURING LOCATIONS

None.

TEST & ASSESSMENT REPORTS

A sample(s) of the equipment listed has successfully met the examination and test requirements as recorded in

Test Report:

FR/LCI/ExTR10.0041/00
FR/LCI/ExTR10.0041/01
FR/LCI/ExTR20.0001/00.

Quality Assessment Report:

FR/LCI/QAR08.0011/10.