



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 BAS 18.0035X	Page 1 of 4	<u>Certificate history:</u>
Status:	Current	Issue No: 3	Issue 2 (2021-08-04) Issue 1 (2019-09-05) Issue 0 (2018-08-22)
Date of Issue:	2023-03-07		
Applicant:	Sensear Pty Limited 4 Hehir Street, Belmont, WA, 6104 Australia		
Equipment:	SM1P Headset		
Optional accessory:	MFP00148 Boom Microphone; SMBM0002 Throat Microphone; SRCK61XXCCXXSM1P Ex Interface Cable		
Type of Protection:	Intrinsic Safety		
Marking:	With BAT00003: Ex ia I Ma (-20°C ≤ Ta ≤ +60°C) Ex ia IIC T3 Ga (-20°C ≤ Ta ≤ +40°C)		
	With BAT00005: Ex ib I Mb (-20°C ≤ Ta ≤ +60°C) Ex ib IIC T4 Gb (-20°C ≤ Ta ≤ +40°C) Ex ib IIIC T155°C Db (-20°C ≤ Ta ≤ +40°C)		

Approved for issue on behalf of the IECEx
Certification Body:

R S Sinclair

Position:

Technical Manager

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:

SGS Baseefa Limited
Rockhead Business Park
Staden Lane
Buxton, Derbyshire, SK17 9RZ
United Kingdom





IECEx Certificate of Conformity

Certificate No.: **IECEx BAS 18.0035X**

Page 2 of 4

Date of issue: 2023-03-07

Issue No: 3

Manufacturer: **Sensear Pty Limited**
4 Hehir Street,
Belmont, WA, 6104
Australia

Manufacturing locations: **Sensear Pty Limited**
4 Hehir Street,
Belmont, WA, 6104
Australia

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:

[GB/BAS/ExTR18.0115/00](#)
[GB/BAS/ExTR22.0205/00](#)

[GB/BAS/ExTR19.0166/00](#)

[GB/BAS/ExTR21.0136/00](#)

Quality Assessment Report:

[AU/TSA/QAR10.0006/11](#)



IECEx Certificate of Conformity

Certificate No.: **IECEx BAS 18.0035X**

Page 3 of 4

Date of issue: 2023-03-07

Issue No: 3

EQUIPMENT:

Equipment and systems covered by this Certificate are as follows:

The Type SM1P Electronic Ear-Muff is a battery powered, noise cancelling, headphone set designed to reduce background noise. It consists of two, plastic, ear cups each of which contains a speaker. Attached to the left-hand ear cup is a boom microphone, assembly number MFP00148 or throat microphone SMBM0002. These are plugged into a connector mounted in the left-hand ear cup enclosure wall. Small microphones are also mounted in both the left-hand side and the right-hand side enclosure walls, one in each. The right-hand, ear cup has a compartment with a lid which contains two connectors, i.e. a USB connector and a 3.5 mm stereo connector. A connector mounted in the right-hand, ear cup enclosure wall is used to optionally connect an external radio via a separate, cable mounted, interface unit identified as an SRCK61XXCCXX SM1P Ex Interface Cable, or to other EX approved devices with a separate Cable interface unit identified as SRCK62XXCCXX, this interface being associated with, and certified as part of, this equipment.

The SRCK61XXCCXX and SRCK62XXCCXX Interface Cables have the following intrinsic safety parameters at the connectors:

Ui = 9V
li = 2.22A (not a limiting factor)
Pi = 1.3W
Ci = 0.09uF
Li = 0uH

The following models are covered by this certificate:

SM1P	Base Model – All Features
SM1PW	No cabled Connection to any other device. Bluetooth® only
XBT	No Cable, No Short Range Radio – Just Bluetooth®
SM1PDP	Same as base Model: removes large speaker – adds earplugs with transducers
SM1B	No Short Range Radio, No Bluetooth®
SM1PWDP	No cable connection, removes large speaker - adds earplugs with transducers

<u>With BAT00003</u>	<u>With BAT00005</u>
Ex ia I Ma (-20°C ≤ Ta ≤ +60°C)	Ex ib I Mb (-20°C ≤ Ta ≤ +60°C)
Ex ia IIC T3 Ga (-20°C ≤ Ta ≤ +40°C)	Ex ib IIC T4 Gb (-20°C ≤ Ta ≤ +40°C)
	Ex ib IIIC T155°C Db (-20°C ≤ Ta ≤ +40°C)

SPECIFIC CONDITIONS OF USE: YES as shown below:

1. Potential Electrostatic hazard, clean with damp cloth only
2. The operating ambient temperature range is: -20°C to +60°C for Group I and: -20°C to +40°C for Group IIC and IIIC



IECEx Certificate of Conformity

Certificate No.: **IECEx BAS 18.0035X**

Page 4 of 4

Date of issue: 2023-03-07

Issue No: 3

DETAILS OF CERTIFICATE CHANGES (for issues 1 and above)

Variation 3.1

To permit new PCBs and revised terminal parameters.

ExTR: **GB/BAS/ExTR22.0205/00**

File Reference: **22/0490**