

## **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 CML 23.0075X** Page 1 of 3 Certificate history:

Issue No: 0 Status: Current

2023-08-02 Date of Issue:

Applicant: **Sensonics Ltd** 

Northbridge Road Berkhamsted Herts. HP4 1EF **United Kingdom** 

Equipment: **QZA** Accelerometer

Optional accessory:

Intrinsic Safety "i" Type of Protection:

Marking: Ex ia IIB T5 Ga

-20°C to +75°C

Approved for issue on behalf of the IECEx

Certification Body:

Position: **Certification Officer** 

Signature:

(for printed version)

(for printed version)

2023-08-02

**Ben Trafford** 

This certificate and schedule may only be reproduced in full.
This certificate is not transferable and remains the property of the issuing body.
The Status and authenticity of this certificate may be verified by visiting <a href="https://www.iecex.com">www.iecex.com</a> or use of this QR Code.

Certificate issued by:

**Eurofins E&E CML Limited Unit 1, Newport Business Park New Port Road** Ellesmere Port, CH65 4LZ **United Kingdom** 







## **IECEx Certificate** of Conformity

Certificate No.: **IECEx CML 23.0075X** Page 2 of 3

Date of issue: 2023-08-02 Issue No: 0

Manufacturer: **Sensonics Ltd** 

Northbridge Road Berkhamsted Herts. HP4 1EF

**United Kingdom** 

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 Report:

GB/CML/ExTR23.0075/00

**Quality Assessment Report:** 

GB/BAS/QAR17.0019/04



# IECEx Certificate of Conformity

Certificate No.: IECEx CML 23.0075X Page 3 of 3

Date of issue: 2023-08-02 Issue No: 0

### **EQUIPMENT**:

Equipment and systems covered by this Certificate are as follows:

Refer to Annex for Full Details.

SPECIFIC CONDITIONS OF USE: YES as shown below:

Refer to Annex for Full Details.

Annex:

IECEx CML 23.0075X Annex.pdf





Annexe to: IECEx CML 23.0075X Issue 0

Applicant: Sensonics Ltd

Apparatus: QZA Accelerometer

### **Description**

The Model QZA is an accelerometer designed to measure vibration and provide an electrical output proportional to the vibration. It consists of a piezoelectric crystal and an encapsulated PCB housed in a stainless steel enclosure. Electrical connections are made by either a connector, a flying lead or cables within a conduit.

The equipment has the following safety parameters,

**Input Parameters** 

QZA

Connector With Integral Cable

 $U_i = 28V$   $C_i = 20 \text{ nF}$   $C_i^* = 20 \text{ nF} + 200 \text{ pF/m}$ 

 $I_i = 0.005 \text{ A}$   $L_i = 0$   $L_i = 0 + 1 \text{ uH/m}$ 

 $P_i = 1 \text{ W}$ 

\* Subject to the following maximum limits:

 $\begin{array}{lll} \text{Group IIB} & \text{627 nF} \\ \text{Group IIA} & \text{2.05 } \mu \text{F} \end{array}$ 

### **Conditions of Manufacture**

The following are conditions of manufacture

i. Where the product incorporates certified parts or safety critical components, the manufacturer of the product defined on this certificate shall continually monitor these parts/components for any modifications introduced by the manufacturer(s) of these constituent parts. If the manufacturer of any constituent part introduces any changes which affect the compliance of the certified product that is the subject of this certificate, the manufacturer is required to have this certificate updated.



Certificate Annex IECEx Version: 9.0 Approval: Approved Eurofins E&E CML Limited Newport Business Park New Port Road Ellesmere Port CH65 4LZ

T +44 (0) 151 559 1160 E info@cmlex.com



### **Specific Conditions of Use**

The following relate to the installation and/or safe use of the equipment:

i. The equipment may be supplied with an integral cable attached, the cable has the following parameters:

 $Cc \le 200 \text{ pF/m}$ 

 $Lc \le 1 \mu H/m$ 

The user shall take into account the length of the integral cable and the above stated parameters in conjunction with any additional field wiring.