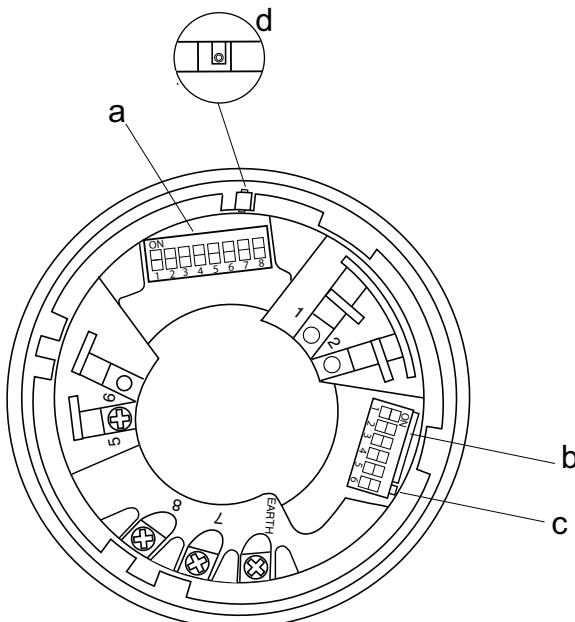
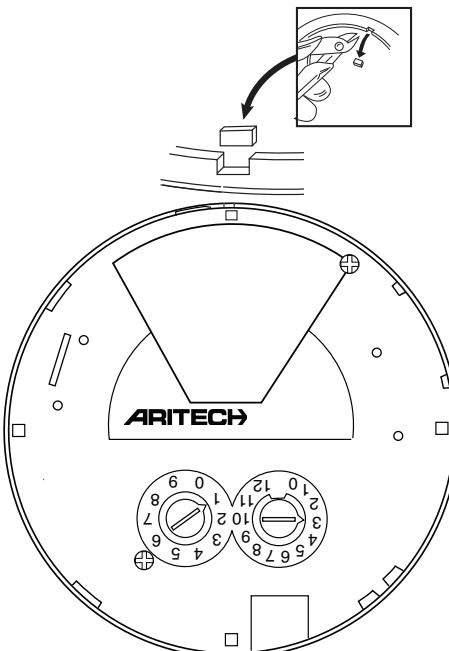


EN**DE****FR****NL****PT****IT****PL****LT****RU****SK****HU****1****2**

EN Installation instructions

Description

This document includes installation information for the Aritech DB2368IAS addressable, loop powered base-sounder with integrated short-circuit isolator.

The DB2368IAS base-sounder is designed for use in Aritech addressable fire systems running the 2000 Series protocol and is designed for indoor use only.

The sounder can be put into different operating modes.

To avoid sound interference between devices in the same locality, the sounders are synchronised automatically.

Installation



CAUTION: This product must be installed by qualified personnel adhering to the TS54-14 specification and any other applicable local authority regulations.

The DB2368IAS is polarity sensitive.

WARNING: The IU2016 isolator and DB2003 mounting base must not be installed in the same loop as the DB2368IAS Base-Sounder with integrated isolator.

NOTE: The foam gasket supplied with the device must always be installed to ensure compliance with the ingress protection requirements of EN54-3.

Placement and spacing

Locate ceiling mounted detector bases near the centre of the room or hall whenever possible. Always place bases a minimum of 100 mm from any wall. When the base is wall mounted, the top of the base should be 100-300 mm from the ceiling. When more than one detector is used, use the spacing of 9 m as a guide on smooth ceilings. Other spacing may be used depending on ceiling height, high air movement, and other conditions or response requirements.

Where NOT to place detectors

One of the major causes of nuisance alarms is improper placement of detectors. Avoid locating detectors:

- Too close to kitchens or wood stoves where smoke can be generated.
- In garages and furnace rooms (due to exhaust fumes).
- Too close to bathrooms. This can cause problems from steamy baths or showers.
- Where normal ambient air temperature can exceed 40°C, such as attics.

Electrical connections

Terminal	Line
1	Not used
2	Not used
5	Line in / out (positive)
6	Not used
7	Line in (negative)
8	Line out (negative)
EARTH	Screen or functional earth

Addressing

Each device requires a numeric address between 1 and 128 for identification purposes. This is set using switches 1- 8 on the Address Selector DIP switch (see figure 1a). See the table at the end of this document for a complete list of address settings.

Tone selection and volume control

The device tone is set using switches 1-5 on the Tone Selector DIP switch (see figure 1b). See the table at the end of this document for a complete list of tone / DIP switch settings.

Switch 6 on the Tone Selector DIP switch is used to select the required sound output (See figure 1c). The default setting (switch OFF) is high output. Changing the switch to ON reduces the sound output by 8 dB.

Installing the detector head

To install a detector head, insert the head and rotate it clockwise until it is properly aligned and “sets” into the base.

Stand-alone installation

The DB2368IAS base-sounder can be used as a stand-alone device without a detector. For this purpose sounder “caps” are available that may be fitted instead of the detector.

Part Number	Description
AS2368CAP-R	Red cap for DB2368IAS
AS2368CAP-W	White cap for DB2368IAS

Locking mechanism

The detector or cap can be locked in position as follows:

- Remove the plastic tab on the detector or cap as shown in figure 2, before attaching to the base-sounder.
- Once the detector or cap is attached to the base-sounder, lock into position by unscrewing the 1.5mm, AF hexagon socket head screw until it prevents the detector or cap from being rotated. (See figure 1d)

Isolator

The sounder incorporates an integrated short-circuit isolator. The yellow LED on the side of the device will illuminate whenever the isolator activates.

Maintenance and testing

Basic maintenance is reduced to an annual inspection. Do not modify internal wiring or circuitry. Test all devices after installation.

Troubleshooting

The analogue value returned to the control panel in the communications protocol can be used to check the status of the sounder and isolator as follows:

Analogue value	Status
1	Sounder fault
4	Isolator activated
5	Sounder fault + isolator activated
32	Normal state
33	1st sound activated
34	2nd sound activated
35	3rd sound activated

Before investigating individual units for faults, check the system wiring is fault free. Earth faults on data loops may cause communication errors.

Common problems and causes include:

Problem	Possible Cause
No response or missing	Incorrect address setting or incorrect loop wiring (polarity reversed)
Device fails to operate	Control panel has incorrect cause and effect programming

Technical specification

Supply voltage 17 to 28 VDC

Current consumption @ 24 VDC:

Switch on surge < 1.2 mA

Standby < 400 µA

Alarm 5.1 mA

Isolated <6 mA

Isolator pass current 800 mA max.

Peak Sound Level @ 90° ± 3 dB(A) 90 dBA at 1m*

Number of Tones 32

Frequency Range 400 - 2850 Hz*

Volume Adjustment 8db (Typical)

Synchronisation Automatic with other AS2300 range sounders

Casing High Impact ABS

IP rating (gasket fitted) IP21

Cable size min.0.28mm²/max. 2.5mm²

Operating temperature -10°C to +55°C

Storage temperature -10°C to +55°C

Relative humidity (non condensing) 5% to 95%

Dimensions (dia x h) 115 x 43mm

Weight 140g

Device Type Code 0E (H)

*Depends on selected tone and input voltage. See tone table for details. Certified on tones 2,3,6,7 & 13 only.

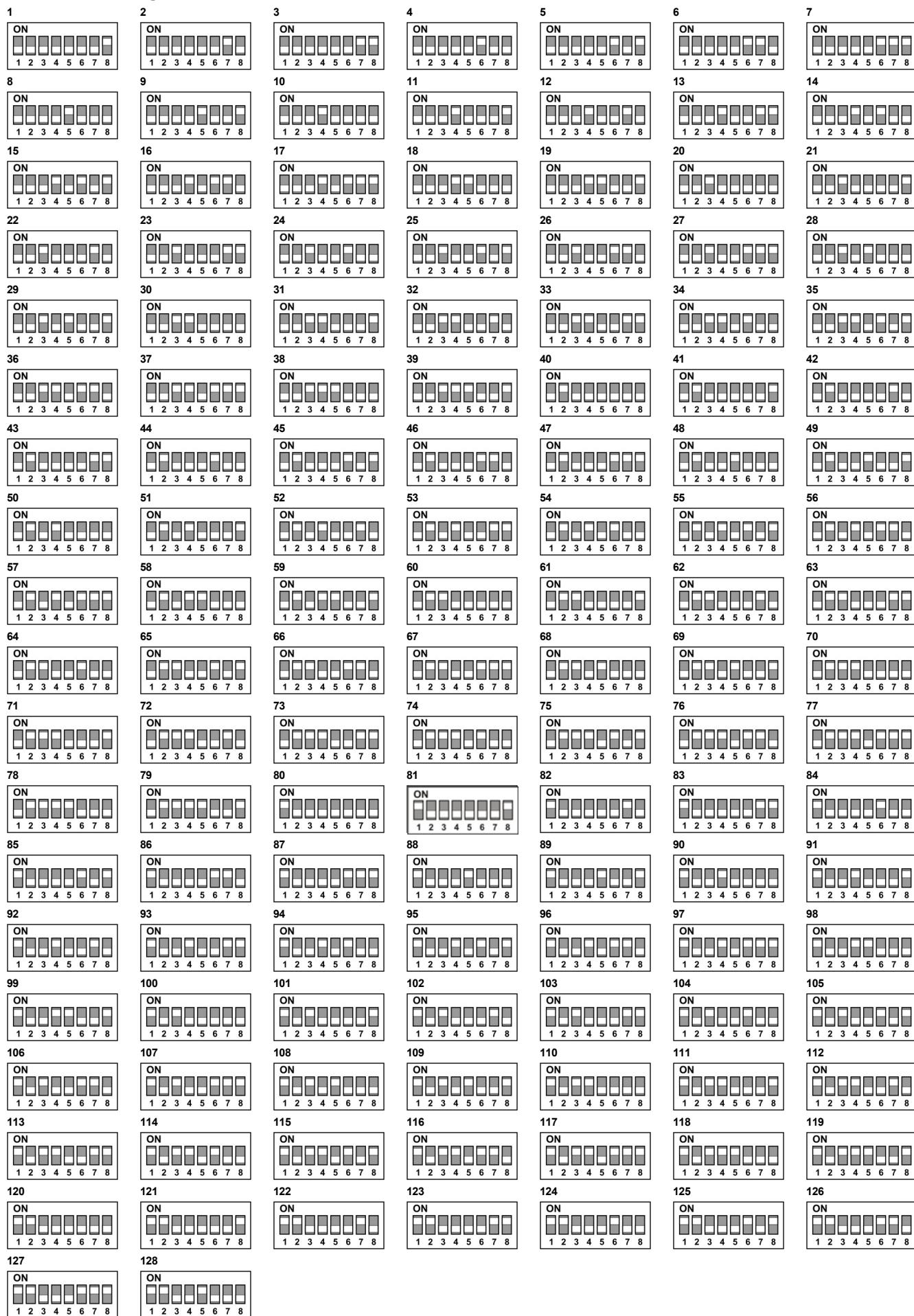
Certification and approvals information	
Product code	D2368IAS-R & DB2368IAS-W
Description	Addressable Sounder with Integrated Isolator
Certification	
Compliance	EN54-3 Type A EN54-17
CPD certification body	BRE Global Ltd and LPCB
CPD certificate number	0832-CPD-1682
CPD certificate year	The year of certification is included in the first two digits of your product serial number (located on the product identification label)
Technical Data Document	18-187219



Products marked with this symbol cannot be disposed of as unsorted municipal waste in the European Union. For proper recycling, return this product to your local supplier upon the purchase of equivalent new equipment, or dispose of it at designated collection points. For more information see: www.recyclethis.info.

**DB2368IAS Series Addressable Loop Powered Base Sounder with integrated short-circuit isolator
Installation Instructions**

Address settings



DB2368IAS Series Addressable Loop Powered Base Sounder with integrated short-circuit isolator
Installation Instructions

TONE SETTING

ALARM 1	TONE TYPE	TONE DESCRIPTION/ APPLICATION	DIP SWITCH	ALARM 2	ALARM 3	Max.dBA @1m
1.	—	970Hz	ON 1 2 3 4 5 6	18	4	90
2.	□□□□□□	800Hz/970Hz @2Hz	ON 1 2 3 4 5 6	1	4	90
3.	~~~~~	800Hz–970Hz @1Hz	ON 1 2 3 4 5 6	1	4	90
4.	— — — —	970Hz 1s OFF/1s ON	ON 1 2 3 4 5 6	1	4	90
5.	□□□□□□	970Hz, 0.5s/ 630Hz, 0.5s	ON 1 2 3 4 5 6	4	4	90
6.	□□□□□□	554Hz, 0.1s/ 440Hz, 0.4s (AFNOR NFS 32 001)	ON 1 2 3 4 5 6	1	4	88
7.	／＼＼＼	500–1200Hz,3.5s/ 0.5s OFF(NEN 2575 2000 'Dutch Slow whoop')	ON 1 2 3 4 5 6	1	4	89
8.	— — — —	420Hz 0.625s ON/0.625s OFF (Australia AS1670 Alert tone)	ON 1 2 3 4 5 6	9	4	89
9.	／＼＼＼	500–1200Hz,0.5s/ 0.5s OFFx 3/1.5s OFF (AS1670 Evacuation)	ON 1 2 3 4 5 6	1	4	87
10.	□□□□□□	550Hz/440Hz @0.5Hz	ON 1 2 3 4 5 6	19	4	90
11.	--- ---	970Hz, 0.5s ON/0.5s OFF x 3/ 1.5s OFF (ISO 8201)	ON 1 2 3 4 5 6	1	4	90
12.	--- ---	2850Hz, 0.5s ON/0.5s OFF x 3/1.5s OFF (ISO 8201)	ON 1 2 3 4 5 6	1	4	84
13.	~~~~~	1200Hz – 500Hz @1Hz (DIN 33 404)	ON 1 2 3 4 5 6	1	4	87
14.	—	400Hz	ON 1 2 3 4 5 6	18	4	84
15.	□□□□□□	550Hz, 0.7s/1000Hz, 0.33s	ON 1 2 3 4 5 6	1	4	90
16.	~~~~~	1500Hz – 2700Hz @3Hz	ON 1 2 3 4 5 6	1	4	86
17.	—	750Hz	ON 1 2 3 4 5 6	1	4	83
18.	—	2400Hz	ON 1 2 3 4 5 6	1	4	84
19.	—	660Hz	ON 1 2 3 4 5 6	18	4	79
20.	— — — —	660Hz 1.8s ON/1.8s OFF	ON 1 2 3 4 5 6	19	4	79
21.	— — — —	660Hz 0.15s ON/0.15s OFF	ON 1 2 3 4 5 6	19	4	78
22.	□□□□□□	510Hz, 0.25s/ 610Hz, 0.25s	ON 1 2 3 4 5 6	1	4	89
23.	□□□□□□	800/1000Hz 0.5s each (1Hz)	ON 1 2 3 4 5 6	1	4	90
24.	~~~~~	250Hz – 1200Hz @12Hz	ON 1 2 3 4 5 6	1	4	85
25.	~~~~~	500Hz – 1200Hz @0.33Hz	ON 1 2 3 4 5 6	1	4	90
26.	~~~~~	2400Hz – 2900Hz @ 9Hz	ON 1 2 3 4 5 6	18	4	82
27.	~~~~~	2400Hz – 2900Hz @3Hz	ON 1 2 3 4 5 6	18	4	84
28.	~~~~~	800Hz – 970Hz @100Hz	ON 1 2 3 4 5 6	1	4	84
29.	~~~~~	800Hz – 970Hz @9Hz	ON 1 2 3 4 5 6	1	4	87
30.	~~~~~	800Hz – 970Hz @3Hz	ON 1 2 3 4 5 6	1	4	88
31.	— —	800Hz, 0.25s ON/1s OFF	ON 1 2 3 4 5 6	1	4	90
32.	／＼＼＼	500Hz – 1200Hz, 3.75s/0.25s OFF (AS2220)	ON 1 2 3 4 5 6	8	4	90