

VOICE SOUNDERS – Up to 110 dB(A) EExd(e), Weatherproof DB3V Range



Sounder/Beacon
Combination Unit



Now VNIPO
Approved

Introduction

This range of light weight all GRP, flameproof voice sounders is intended for use in potentially explosive gas and dust atmospheres and has been designed with high ingress protection to cope with the harsh environmental conditions found offshore and onshore in the oil, gas and petrochemical industries.

The flamepaths, flare and the body, are manufactured completely from a UV stable glass reinforced polyester. Stainless steel screws and sinter are incorporated thus ensuring a corrosion free product. A tapered flamepath is used to overcome the problems of assembly of parallel spigot flamepaths.

This unit offers up to 20 seconds of speech which can be recorded via an integral microphone or an input from an external source. The unit incorporates a variable delay allowing speech to be repeated at equal intervals of up to approximately 15 seconds.

In addition, a 'mechanical bell' sound version is available.

An optional Exe terminal chamber is available.

An uncertified version is available for use in non-explosive atmospheres.

- ★ Zone 1, Zone 2 and non-Ex use.
 - ★ EExde IIC T5.
 - ★ ATEX approved, Ex II 2GD.
 - ★ Optional Exe terminal chamber.
 - ★ BASEEFA certified.
 - ★ GOST 'R' & 'K' certified.
 - ★ Chinese (CQST) certified.
 - ★ Australian (SAA) certified.
 - ★ Brazilian (Inmetro) certified.
 - ★ IP66 and IP67.
 - ★ *Certified temperature -55°C to $+70^{\circ}\text{C}$.
 - ★ All GRP corrosion free flamepaths.
 - ★ Up to 110dBA output.
 - ★ Integral volume control.
 - ★ d.c. version accepts any voltage between 12V d.c. and 48V d.c.
 - ★ End of line resistor option.
 - ★ Sounder/BeaconCombinationUnitavailable.
 - ★ Bell recording version available.
- *Depending on version.

MEDC

Specification

Certification: CENELEC EN50014, 18, 19.
 BASEEFA Cert. No. BAS00ATEX2097X, EExd IIC.
 BASEEFA Cert. No. BAS00ATEX2098X, EExde IIC.
 Zones 1 and 2.
GOST 'R' Certification: 1 Exd IIC T4 & 1 Exd IIC T4.
 Russian Fire Alarm (VNIPO) Approved.
GOST 'K' Certification: Exd IIC T4.
Chinese (CQST) Certification: Exd IIC T4
Brazilian (Inmetro) Certification: BR-Ex d IIC T5/T4/T135°C.
 BR-Ex de IIC T5/T4/T135°C.

Material: Body & horn in anti-static, UV stable, glass reinforced polyester (GRP).
 Swivel bracket & captive cover screws in stainless steel.

Finish: Body and horn, natural black or epoxy paint coated to client's colour requirements.

Sound Output: 110dB(A) (message dependent).

Volume Control: Potentiometer

Weight: 6.0kg approx. dependent on model (+0.5kg for EExe).

| Certified Temperature: | EExd | EExde | GOST 'R' & 'K' Exd | GOST 'R' Exde | Chinese Exd |
|------------------------|----------------|----------------|--------------------|----------------|----------------|
| DB3V | -20°C to +70°C | -20°C to +45°C | -20°C to +50°C | -20°C to +40°C | -20°C to +55°C |
| DB3LV | -55°C to +55°C | -55°C to +70°C | -55°C to +55°C | -55°C to +55°C | n/a |

Ingress Protection: IP66 and IP67.

Fire retardancy: GRP is fire retardant to ISO 1210.

Voltage: Up to 48V d.c.

| Current Consumption: | V | I |
|----------------------|----------|-------|
| | 12V d.c. | 1.2A |
| | 24V d.c. | 600mA |
| | 48V d.c. | 300mA |

Terminals: 6 x 2.5mm² (d.c.).

Earth Continuity: Included on EExde version.

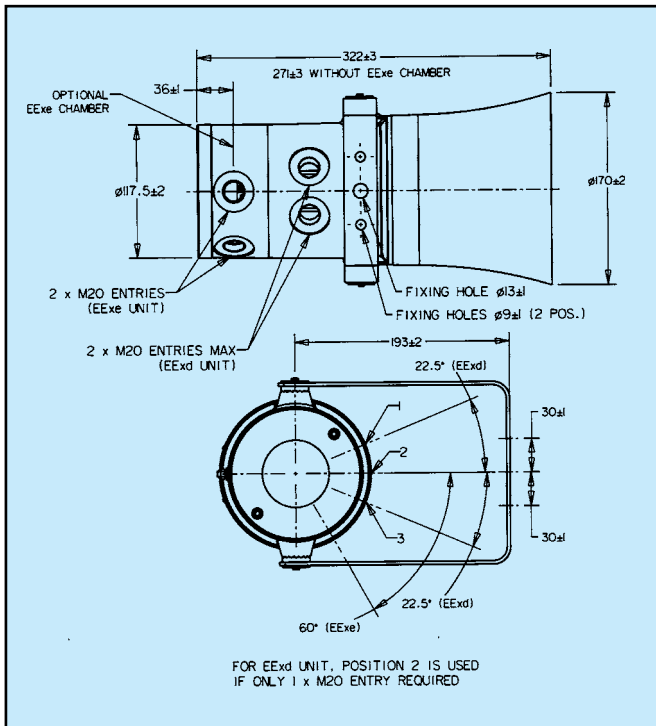
Mounting: Stainless steel bracket with ratchet facility.

Labels: Duty and tag labels optional.

Cable Entries: Up to 2 x 20mm EExd.
 2 x 20mm EExe.

Voice Recording: Up to 20 seconds recording time.

Sounder/Beacon Unit: The DB3V may be combined with an MEDC beacon to create a combined voice/visual alarm.
 Contact MEDC for price and specification



Ordering Requirements

The following code is designed to help in selection of the correct unit. Build up the reference number by inserting the code for each component into the appropriate box.

| Unit Type | Certification | Options | Entries | Colour | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|--|---------------------|---------|---------|------------|--------|---------------------|---|------|------|-------------|---|-----------|---|------------|---|----------|----|----------|----|----------------|---|--------------|----|---------------|----|---|-------|------|------|----|-----|----|----------------------|----|-----------|---|------|---|---|---------|------|-----------------|----|-----------------------|----|---|--------|------|---------------|---|-----|---|---------|----|
| <table border="1"> <thead> <tr> <th>Type</th> <th>Details</th> </tr> </thead> <tbody> <tr> <td>DB3V</td> <td>Voice unit</td> </tr> <tr> <td>DB3LV*</td> <td>Low temp voice unit</td> </tr> </tbody> </table> <p>*Available unpainted only.</p> | Type | Details | DB3V | Voice unit | DB3LV* | Low temp voice unit | <table border="1"> <thead> <tr> <th>Type</th> <th>Code</th> </tr> </thead> <tbody> <tr> <td>Uncertified</td> <td>W</td> </tr> <tr> <td>ATEX EExd</td> <td>D</td> </tr> <tr> <td>ATEX EExde</td> <td>E</td> </tr> <tr> <td>GOST 'R'</td> <td>DG</td> </tr> <tr> <td>GOST 'K'</td> <td>DK</td> </tr> <tr> <td>Chinese (CQST)</td> <td>Q</td> </tr> <tr> <td>Inmetro EExd</td> <td>DM</td> </tr> <tr> <td>Inmetro EExde</td> <td>EM</td> </tr> </tbody> </table> | Type | Code | Uncertified | W | ATEX EExd | D | ATEX EExde | E | GOST 'R' | DG | GOST 'K' | DK | Chinese (CQST) | Q | Inmetro EExd | DM | Inmetro EExde | EM | <table border="1"> <thead> <tr> <th>Label</th> <th>Code</th> </tr> </thead> <tbody> <tr> <td>Duty</td> <td>D*</td> </tr> <tr> <td>Tag</td> <td>T*</td> </tr> <tr> <td>End of line resistor</td> <td>E†</td> </tr> <tr> <td>Bell tone</td> <td>O</td> </tr> <tr> <td>None</td> <td>N</td> </tr> </tbody> </table> <p>*Please specify wording. †State value.</p> | Label | Code | Duty | D* | Tag | T* | End of line resistor | E† | Bell tone | O | None | N | <table border="1"> <thead> <tr> <th>Entries</th> <th>Code</th> </tr> </thead> <tbody> <tr> <td>1 x 20mm (EExd)</td> <td>1B</td> </tr> <tr> <td>2 x 20mm (EExd/EExde)</td> <td>2B</td> </tr> </tbody> </table> | Entries | Code | 1 x 20mm (EExd) | 1B | 2 x 20mm (EExd/EExde) | 2B | <table border="1"> <thead> <tr> <th>Colour</th> <th>Code</th> </tr> </thead> <tbody> <tr> <td>Natural Black</td> <td>N</td> </tr> <tr> <td>Red</td> <td>R</td> </tr> <tr> <td>Special</td> <td>S*</td> </tr> </tbody> </table> <p>*Please specify</p> | Colour | Code | Natural Black | N | Red | R | Special | S* |
| Type | Details | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| DB3V | Voice unit | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| DB3LV* | Low temp voice unit | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Type | Code | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Uncertified | W | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ATEX EExd | D | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ATEX EExde | E | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| GOST 'R' | DG | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| GOST 'K' | DK | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Chinese (CQST) | Q | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Inmetro EExd | DM | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Inmetro EExde | EM | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Label | Code | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Duty | D* | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Tag | T* | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| End of line resistor | E† | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Bell tone | O | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| None | N | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Entries | Code | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 1 x 20mm (EExd) | 1B | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 2 x 20mm (EExd/EExde) | 2B | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Colour | Code | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Natural Black | N | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Red | R | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| Special | S* | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |



All the above specifications, dimensions, weights and tolerances are nominal (typical) and MEDC reserve the right to vary all data without prior notice. No liability is accepted for any consequence of use.