

# FLASHING SOUNDERS

## BExCS 110-05D | BExDCS 110-05D



Combination devices for visual and acoustic alarms

- Stainless steel protective cage and stainless steel mounting bracket for 360° positioning.
- Extremely intensive light reflection due to 5 joules xenon flash.
- 32 different tones incl. DIN tone, UK00A/PFEER conformant, 2 externally controllable tones (via plus or minus in DC version).
- Acoustic and visual signal can be controlled separately.
- Synchronised flash frequency (1 Hz) or alternating flash mode in system operation.
- Highly resistant to corrosion and suitable for the toughest environments.
- Adjustable volume (except 12 V DC version).
- Flashing light is insensitive to vibration, impact and shock.



protection system


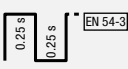

















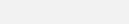





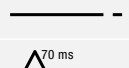
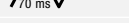



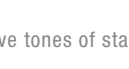



operating temperature




| PRODUCT                          | BEx(D)CS 110-05D sounder                                    |   |  |         |         |
|----------------------------------|---|---|--|---------|---------|
| Rated voltage                    | 230 V   | 115 V   | 48 V   | 24 V    | 12 V    |
|                                  | AC 50   60 Hz   |   | DC   |         |         |
| Operating range                  | ±10 %   | ±10 %   | ±25 %  | ±25 %   | ±25 %   |
| Nominal current consumption      | 56 mA   | 110 mA  | 130 mA   | 250 mA  | 195 mA  |
| PRODUCT                          | BEx(D)CS 110-05D flashing light                             |   |  |         |         |
| Rated voltage                    | 230 V   | 115 V   | 48 V   | 24 V    | 12 V    |
|                                  | AC 50   60 Hz   |   | DC   |         |         |
| Operating range                  | ±10 %   | ±10 %   | 42–54 V  | 20–28 V | 10–14 V |
| Nominal current consumption      | 55 mA   | 140 mA  | 180 mA   | 270 mA  | 750 mA  |
| PRODUCT                          | BExCS 110-05D   |   | BExDCS 110-05D   |         |         |
| Explosion protection             | II 2G Ex d IIB T4 -50 °C ... +70 °C Ta                      |   | II 2GD Ex d IIB T4 T100°C                                |         |         |
| Category (area of use)           | 2G (Zone 1)<br>3G (Zone 2)                                  |   | 2G (Zone 1) / 2D (Zone 21)<br>3G (Zone 2) / 3D (Zone 22) |         |         |
| Certificate of conformity        | KEMA 03 ATEX 2545 X   |   | KEMA 01 ATEX 2223 X                                      |         |         |
| Testing body                     | KEMA  |   | KEMA   |         |         |
| Sound pressure level             | 110 dB(A)   |   |  |         |         |
| Sound level reduction            | -9 dB   |   |  |         |         |
| Flash energy                     | 5 J   |   |  |         |         |
| Flash rate                       | approx. 1 Hz = 60 flashes/min                               |   |  |         |         |
| Storage temperature              | -50 °C ... +70 °C   |   |  |         |         |
| Relative humidity                | 90 %  |   |  |         |         |
| Protection system (EN 60529)     | IP 66/67  |   |  |         |         |
| Duty cycle                       | 100 %   |   |  |         |         |
| Service life of the light source | light emission still 70 % after 8,000,000 flashes           |   |  |         |         |
| Material                         | lens  | glass   |  |         |         |
|                                  | housing   | die-cast aluminium LM6, similar to RAL 3000 (flame red)                                   |  |         |         |
|                                  | horn  | ABS self-extinguishing, similar to UL 94 V0 & 5VA FR ABS, Ex II 2D anti-static ABS, black |  |         |         |
| Connecting terminals             | 0.5–4.0 mm <sup>2</sup>                                     |   |  |         |         |
| Cable entry                      | 2 / 1x closed, 1x open (M20), optionally PG13.5 or 1/2" NPT |   |  |         |         |
| Weight                           | AC  | 5.0 kg  |  |         |         |
|                                  | DC  | 4.8 kg  |  |         |         |

**TONE TABLE**

| NO.            | DESCRIPTION – BASIC TONE  | STAGE              |   | NO. | DESCRIPTION – BASIC TONE | STAGE |   |
|----------------|---|--------------------|---|-----|--------------------------|-------|---|
|                |   | 2                  | 3   |     |                          | 2     | 3 |
| 1              | Continuous tone   | 1000 Hz            |            | 31  | 11                       |       |   |
| 2 <sup>1</sup> | Alternating tone, UK BS5839-1 (fire alarm, railway crossing)      | 1000 Hz<br>800 Hz  |  EN 54-3   | 17  | 5                        |       |   |
| 3              | Slow whoop  | 1200 Hz<br>500 Hz  |            | 2   | 5                        |       |   |
| 4              | Sweeping (fast)   | 1000 Hz<br>800 Hz  |            | 6   | 5                        |       |   |
| 5              | Continuous tone   | 2400 Hz            |            | 3   | 27                       |       |   |
| 6              | Sweeping  | 2900 Hz<br>2400 Hz |            | 7   | 5                        |       |   |
| 7              | Sweeping (fast)   | 2900 Hz<br>2400 Hz |            | 10  | 5                        |       |   |
| 8              | Sweeping  | 1200 Hz<br>500 Hz  |            | 2   | 5                        |       |   |
| 9              | Sawtooth, DIN tone 33404-3 Germany (emergency signal), PFEER PTAP | 1200 Hz<br>500 Hz  |  EN 54-3   | 15  | 2                        |       |   |
| 10             | Alternating tone  | 2900 Hz<br>2400 Hz |          | 7   | 5                        |       |   |
| 11             | Interrupted tone  | 1000 Hz            |          | 31  | 1                        |       |   |
| 12             | Alternating tone  | 1000 Hz<br>800 Hz  |          | 4   | 5                        |       |   |
| 13             | Interrupted tone  | 2400 Hz            |          | 15  | 5                        |       |   |
| 14             | Interrupted tone  | 800 Hz             |          | 4   | 5                        |       |   |
| 15             | Continuous tone   | 800 Hz             |          | 2   | 5                        |       |   |
| 16             | Interrupted tone  | 660 Hz             |  EN 54-3 | 18  | 5                        |       |   |
| 17             | Alternating tone, France NFS 32-001 (fire alarm)                  | 554 Hz<br>440 Hz   |  EN 54-3 | 2   | 27                       |       |   |
| 18             | Interrupted tone, Sweden SS031711 (air raid warning)              | 660 Hz             |          | 2   | 5                        |       |   |
| 19             | Sweeping, France NFC48-265  | 1600 Hz<br>1400 Hz |          | 2   | 5                        |       |   |
| 20             | Continuous tone, Sweden SS031711 (all-clear signal)               | 660 Hz             |          | 2   | 5                        |       |   |
| 21             | Alternating tone, Sweden SS031711                                 | 554 Hz<br>440 Hz   |          | 2   | 5                        |       |   |
| 22             | Interrupted tone  | 554 Hz             |          | 2   | 5                        |       |   |
| 23             | Interrupted tone  | 800 Hz             |          | 6   | 5                        |       |   |
| 24             | Sweeping (medium), UK BS5839-1                                    | 1000 Hz<br>800 Hz  |          | 29  | 5                        |       |   |
| 25             | Sweeping  | 2900 Hz<br>2400 Hz |          | 29  | 5                        |       |   |
| 26             | Interrupted tone, (fast variable), bell                           | 1450 Hz            |         | 2   | 1                        |       |   |
| 27             | Continuous tone   | 554 Hz             |        | 26  | 5                        |       |   |
| 28             | Continuous tone   | 440 Hz             |        | 2   | 5                        |       |   |
| 29             | Sweeping (fast), UK BS5839-1                                      | 1000 Hz<br>800 Hz  |        | 7   | 5                        |       |   |
| 30             | Interrupted tone, Australia AS2220, AS1610, AS1670                | 420 Hz             |        | 32  | 5                        |       |   |
| 31             | Sawtooth, DIN tone 33404-3 Germany (emergency signal)             | 1200 Hz<br>500 Hz  |        | 11  | 1                        |       |   |
| 32             | Slow whoop, Australian evacuation alarm AS2220                    | 1200 Hz<br>500 Hz  |        | 26  | 1                        |       |   |

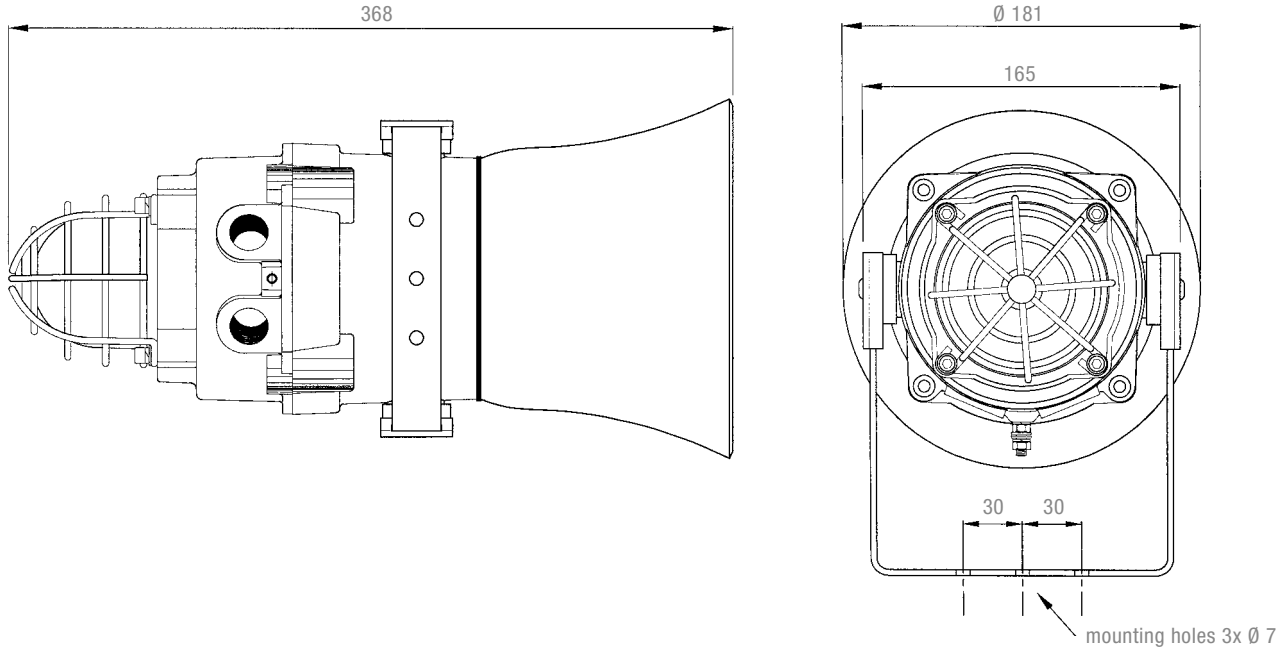
<sup>1</sup> factory setting

The sounder can be set externally to the respective tones of stage 2 & 3. Tone 2 is preset.

| ARTICLE NO.  | BExCS 110-05D |             |             |
|--|---------------|-------------|-------------|
| Lens colour  | 230 V AC      | 115 V AC    | 24 V DC     |
|  | 32074105000   | 32074155000 | 32074805000 |

Article numbers for other colours and voltages on request.

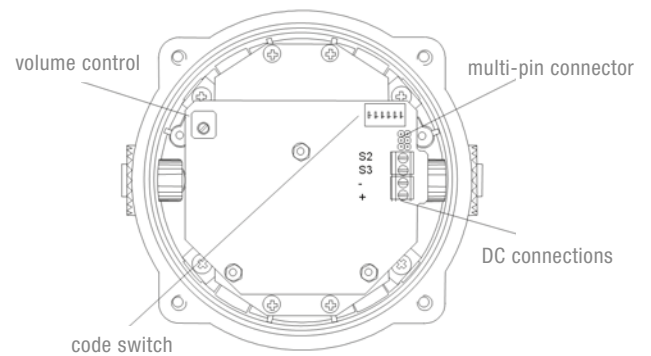
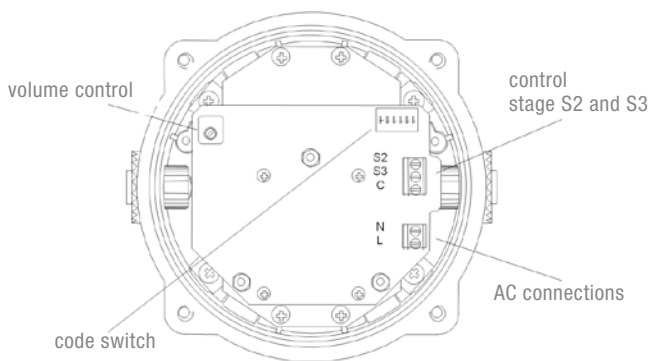
DIMENSIONS



CONNECTION DIAGRAMS

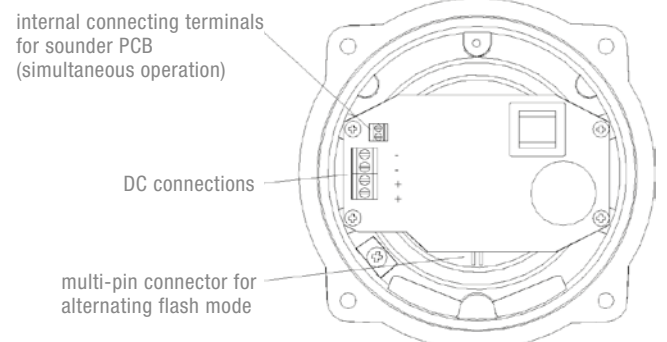
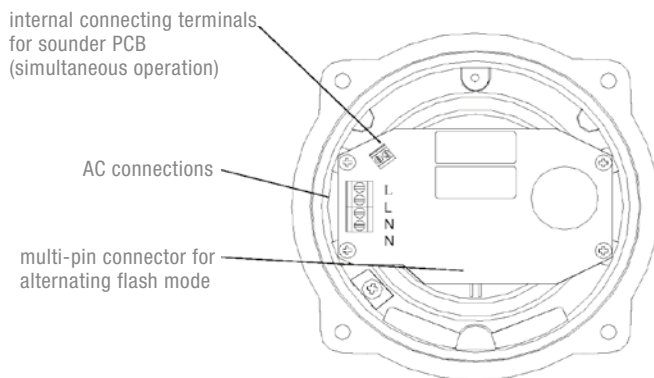
sounder – AC

sounder – DC



flashing light – AC

flashing light – DC



MANUFACTURER'S DECLARATION

We hereby declare that the explosion-protected flashing light with the type designation **BExCS 110-05 D, BExDCS 110-05D** has been developed and manufactured in accordance with section 5.1.2 of EN 50014.

**This declaration is based on compliance with the following regulations and standards:**

- |              |   |
|--------------|---|
| 94/9/EG      | CE conformity   |
| EN 50014     | Electrical equipment for areas at risk of explosions – General requirements |
| EN 50018     | Pressure-resistant encapsulation “d”  |
| EN 50281-1-1 | Electrical equipment for use in areas with combustible dust                 |