

VELOX 30300 and 30301 Series

Addressable External Powered Sounders



Technology

The VELOX 3030x Addressable range of Sounders with state of the art microprocessor controlled technology, are loop connected and powered from the range of VELOX fire alarm control panels auxiliary output or any EN54-4 approved power supply. The new range of devices is fully addressable by VELOX range of control panels, provided with in-built isolators to enhance reliability. The new range of devices approved to EN54-3 and EN54-17.

The new range of sounders are supplied with 32 tones to comply with world-wide of sounder tones requirements, and thanks for the VTC "Variable Time Communication" protocol of VELOX, all the sounders are fully synchronised.

5 Years Warranty

The VELOX clients enjoy five years warranty on all the VELOX devices. An extra added advantages when installing the VELOX range of products.

Approvals & Standards

The Velox 30300 and 30301 sounders products comply with the following British and European standards. BS EN 54-3 and EN54-17

Features

- Connected on the same fire detection loop
- Automatic or Manual Addressing functions.
- Built-in Short Circuit Isolator and EN54-17 certified.
- EN54-3 approved.
- 32 tones plus a selectable override tone
- Deep-Base IP65
- Features base locking system as standard
- Unique twist and lock bayonet mounting system

Cost effective installation is an added benefit

The new 30000 range of sounders is addressed and connected on the same VELOX fire detection loop, however, powered externally from an EN54-4 power supply or the range of VELOX fire detection panels.

Up to 240 sounders can be connected on the VELOX loop over 2Km loop length, which means cost-effective utilisation of the VELOX loop by connecting the max number of sounders without the worry on the loop load.

Each unit entirely controlled by a state of the art microprocessor to ensure the full monitoring of the input power supply, as well as controlling the inbuilt isolator to protect the detection loop from any single faults of open, short or even earth leakage.

The 30000 range of devices are compatible with the VELOX family 5000, 4000, and 2000 range of fire alarm control panels.

Commissioning is never easier

VELOX wants to make it easy for the installer, neither dip or rotary switches are required to address the devices, nor barcode scanners or other complicated methods of installation are needed.

Automatic addressing is an added benefit to the many others of VELOX technology, where the fire alarm control panel sequentially addresses each device and makes sure that no duplicate addresses are allowed. Furthermore, when needed to assign an address in a non-sequential fashion, the manual programming via the VELOX detector programming tool is utilised.

Zero Downtime

Each device supplied with inbuilt short circuit isolator, in case of a single fault; no device lost in the loop. This feature shall not only provide higher reliability to the performance as well but also facilitates easy installation to comply with the latest standards and regulations

Applications

The VELOX 30300 and 30301 series of external powered addressable Sounders can fit many applications where 240 sounders are required to be installed on the same loop without the need for drawing power from the VELOX Fire Detection Loop.

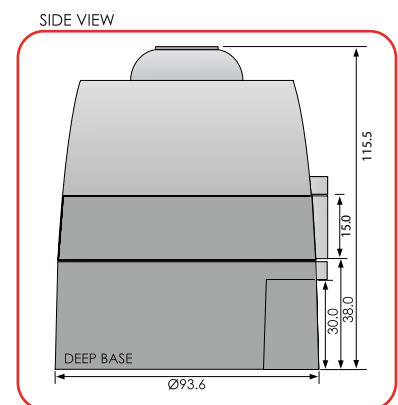
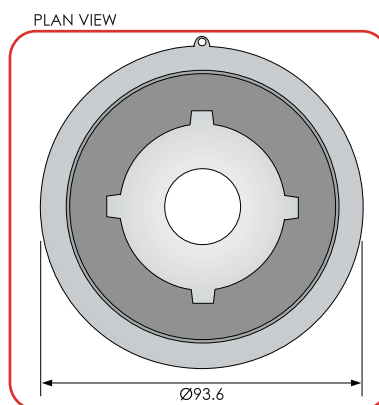
Applications such as long corridors, car parks, malls, hotels to name a few, take advantage of the VELOX 30000 range technology.

Inbuilt isolator in each device, provides the utmost reliability while connecting 240 devices over 2Km loop length, and ensuring that no sounder lost in the action of the single fault such as short circuit or open circuit or even earth leakage.

The vast variety of 32 tones that complies with worldwide requirements of sound tones makes these devices suitable for use worldwide.

The sounder activated by a specific command sent from the fire alarm control panel. Communication established via the VELOX Variable Time Communication (VTC) protocol. The VTC allows the VELOX devices to communicate in high communication immunity over a long distance of 2km loop length.

Product Overview & Dimensions



Technical Specifications

Voltage Range (Vdc)	21-30, Loop Powered
Number of Tones	32
Operating frequency (Hz)	440-2900
Temperature range (C)	-20 to +70
Max Current (mA) @ 24VDC	8.3 - 30.8
Fault Protection	Inbuilt Isolator
Material	ABS fire retardant plastic
Protection Rating	IP65C (DEEP BASE)
Boxed Weight (kg)	.031kg
body colours	Red for Wall Mounted
Typical Current Consumption (mA)	6.2 – 17.1
Addressing	Automatic or Manual

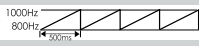
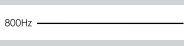



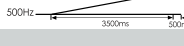

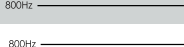
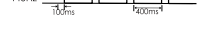

Performance

Volume setting	High	Med	Low
Sound Output, Typical (dBA)	102.3	97.6	82.1
Sound output, anechoic chamber (dBA)	99.9	95.6	80.1
Sound Output, reverberation chamber (dBA)	117.7	110.7	95.3

Order Codes

30300	External Powered Addressable Wall Mounted Sounder
31301	External Powered Addressable Weatherproof Wall Mounted Sounder

Approved Tone List - Graphical

no. name	1st stage frequency	1st stage graphical	2nd stage frequency	2nd stage graphical
1 LF Sweep	800-1000Hz swept every 500ms (2Hz)		800Hz continuous	
8 LF Continuous tone BS5839	800Hz continuous		800Hz continuous	
11 Dutch sweep	970Hz continuous		500-1200Hz for 3500ms, then off for 500ms	
25 German DIN tone	1200-500Hz swept every 1000ms (1Hz)		800Hz continuous	
27 French tone AFNOR	554Hz for 100ms, then 440Hz for 400ms		800Hz continuous	

Approved Tone List - Performance

no. name	1st stage tone	switch (23456)	typical current (mA)			typical sound output (dBA)		
			low	medium	high	low	medium	high
1 LF Sweep (Cranford sweep)	800-1000Hz swept every 500ms (2Hz)	11111	7.3	12.4	17.3	80.1	95.6	99.9
8 LF Continuous tone BS5839	800Hz continuous	11000	8.6	11.5	15.8	79.8	94.7	98.4
11 Dutch sweep	970Hz continuous	10101	7.0	13.1	17.8	80.2	95.5	100.1
25 German DIN tone	1200-500Hz swept every 1000ms (1Hz)	00111	7.0	13.7	19.3	79.5	95.0	99.0
27 French tone AFNOR	554Hz for 100ms, then 440Hz for 400ms	00101	6.2	9.3	11.6	76.9	93.1	95.9

EN54-3 Approved Minimum Sound Output at 1 Meter

Tone 1 -			Vertical Plane		
Horizontal Plane			Angle	21.6V	28V
Angle	21.6V	28V	Angle	21.6V	28V
15°	92.6	94.6	15°	93.3	95.2
45°	95.7	97.8	45°	96.0	98.0
75°	97.7	99.5	75°	97.8	99.8
105°	97.8	99.6	105°	97.7	99.7
135°	96.0	98.0	135°	96.0	97.9
165°	91.3	93.2	165°	90.6	92.4

Tone 27 - French AFNOR Tone					
Horizontal Plane			Vertical Plane		
Angle	21.6V	28V	Angle	21.6V	28V
15°	87.8	89.7	15°	88.0	89.8
45°	92.2	94.1	45°	92.6	94.5
75°	93.7	95.7	75°	94.1	96.3
105°	94.0	95.7	105°	93.9	95.8
135°	92.5	94.4	135°	92.2	94.0
165°	85.6	87.5	165°	86.1	88.1

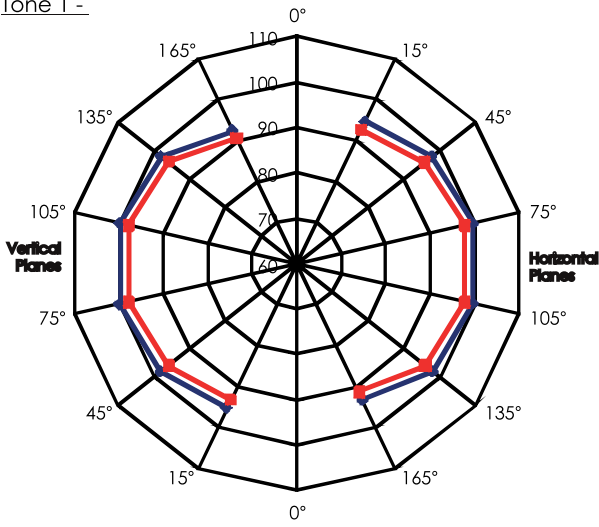
Continuous 800Hz Tone (Over ride Tone)					
Horizontal Plane			Vertical Plane		
Angle	21.6V	28V	Angle	21.6V	28V
15°	90.3	92.3	15°	90.3	92.3
45°	93.5	95.4	45°	93.3	95.3
75°	96.1	98.0	75°	95.8	97.8
105°	95.9	97.9	105°	95.7	97.6
135°	93.9	95.8	135°	93.4	95.3
165°	89.6	91.5	165°	87.4	89.6

Tone 11 - Dutch Sweep Tone					
Horizontal Plane			Vertical Plane		
Angle	21.6V	28V	Angle	21.6V	28V
15°	92.7	94.6	15°	92.2	94.1
45°	96.0	98.0	45°	96.4	98.4
75°	97.8	99.7	75°	97.8	99.8
105°	97.8	99.6	105°	97.5	99.5
135°	96.0	98.0	135°	96.3	98.1
165°	90.5	92.4	165°	91.3	93.2

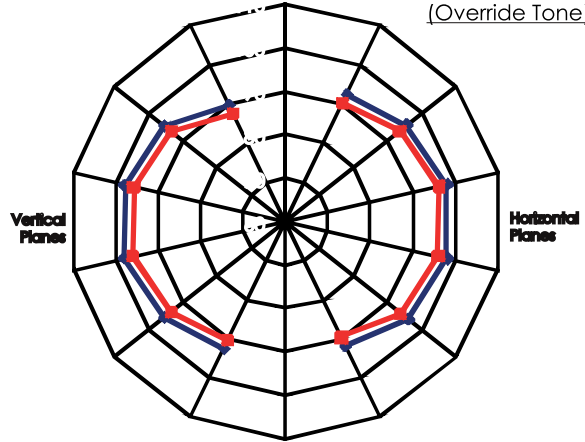
Tone 25 - German DIN Tone					
Horizontal Plane			Vertical Plane		
Angle	21.6V	28V	Angle	21.6V	28V
15°	91.6	93.5	15°	90.8	92.8
45°	95.7	97.7	45°	95.2	97.0
75°	96.9	98.9	75°	97.1	99.1
105°	97.0	98.9	105°	97.0	98.9
135°	95.5	97.4	135°	95.0	97.0
165°	90.3	92.3	165°	90.0	91.9

EN54-3 Approved Polar Diagrams

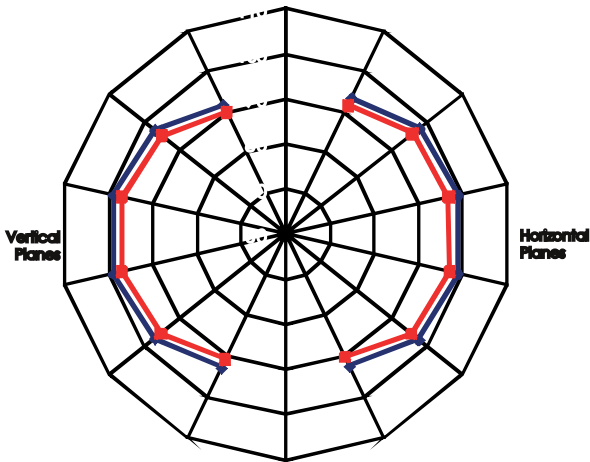
Tone 1 -



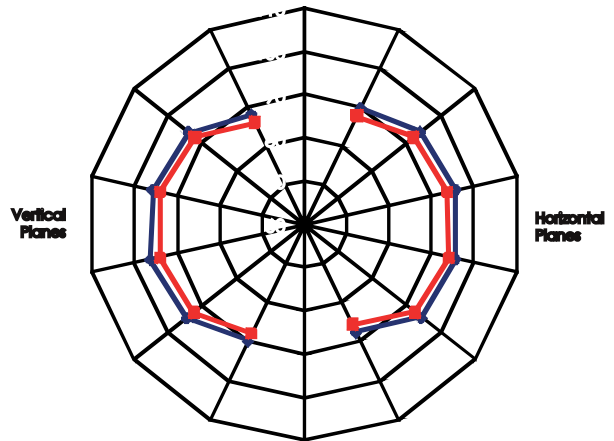
Continuous 800Hz Tone (Override Tone)



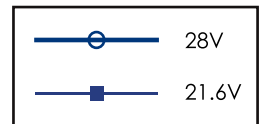
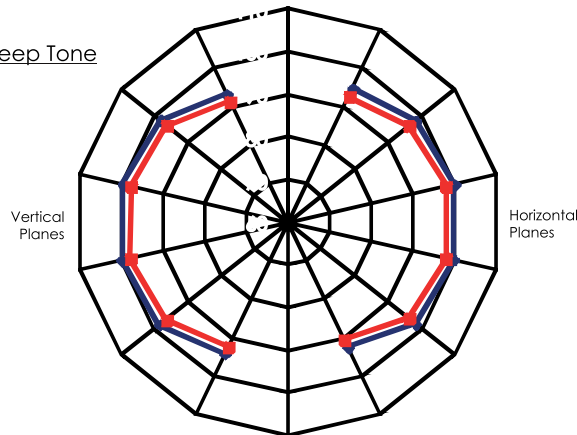
Tone 25 - German DIN Tone



Tone 27 - French AFNOR Tone



Tone 11 - Dutch Sweep Tone



As our policy is one of constant product improvement the right is therefore reserved to modify product specifications without prior notice
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