

PASPORT SOUND LEVEL SENSOR

This guide covers the major features of this product - it does not cover all of the available functions. This guide is not intended to replace the original equipment manual. Please refer to the manual for more detailed operating instructions and safety information.

EQUIPMENT DESCRIPTION

The PASPort Sound Level Sensor [1] measures sound levels or intensity of sound sources within 10 feet between 30 decibels and 110 decibels and works in conjunction with the Xplorer GLX.

Sound levels can be measured in:

- Decibels (dBC) – The dBC weighting scale corresponds to the total sound level generated.
- Decibels (dBA) – the dBA weighting scale filters out some of the sound frequencies to more closely match the frequency response of the human ear. It therefore represents the sound level that we perceive and is more commonly used in workplace condition assessments.
- Sound Intensity ($\mu\text{W}/\text{m}^2$) – The sound intensity is calculated from the dBC measurement, and represents the amount of power in the sound per square metre.

This manual covers the functions and range of the sensor. For use of the Xplorer GLX, please view the associated manual.



Figure 1: PASPort Sound Level Sensor

EQUIPMENT OPERATION

BASIC OPERATION

1. Connect the sensor to one of the four available ports on top of the Xplorer GLX [2], or use the available extension cord between the GLX and the sensor [3].
2. An optional handle can be screwed into the side of the sensor [4]



Figure 2: Ports on Top of GLX



Figure 3: Sensor Extension Cable



Figure 4: Handle Attachment

3. Hold the sound sensor towards [5] the source of sound that is being measured.



Figure 5: Aperture to be pointed towards source of sound

SETTINGS

The Sound Sensor has three buttons [6] on it to change the sensitivity level of the sensors. The range of each setting is:

-  : 70dB to 110dB
-  : 50dB to 90dB
-  : 30dB to 70dB



Figure 5: Setting Buttons


When you first plug the sensor into the GLX the  setting is automatically selected. When the sound level falls outside of the range of the current setting, it will be noticeable by a flat line at the minimum or maximum value [6] of the current setting. At this point the setting will need to be changed to ensure that accurate values are being obtained.



Figure 6: Value Out of Range