

BACK-UP ALARM SELECTION WHAT ARE THE OPTIONS?

There are several decisions to be made when selecting a back-up alarm.

First, you have the choice between a tonal alarm and a multi-frequency alarm. Industry experts have suggested either can provide an effective warning, and each has its merits as described below.

Second, you must choose an alarm with the appropriate sound pressure level (SPL). OSHA requires a reverse alarm to be audible above the surrounding noise level. If you know the ambient noise level and it remains reasonably constant, then the appropriate fixed dB alarm can be selected, whether tonal or multi-frequency.

The key is complying with the requirements of OSHA while selecting the lowest SPL alarm possible so as not to create a noise nuisance. Fortunately, ECCO pioneered another solution — the Smart Alarm®, available in either tonal or multi-frequency. Smart Alarms monitor ambient noise and automatically adjust their output to 5dB above that, satisfying OSHA's requirements. Smart Alarms are the perfect solution for worksites with inconsistent noise or varying noise levels.



TONAL VS MULTI-FREQUENCY

So what's the difference?

Tonal alarms emit sound at a single, predominant frequency resulting in the familiar “beep-beep” warning signal that we've all grown accustomed to. Conversely, multi-frequency alarms emit sound at multiple frequencies within a narrow band resulting in a “shhh-shhh” warning sound. There is no scientific evidence to prove either sound is more effective than the other in a reversing vehicle application. However, there are several points of view that should be considered when deciding which option is best for you.

BEEP
TONAL

The beep-beep sound is a familiar signal that is readily understood as a danger signal.

The sound is more piercing and therefore less likely to be masked by ambient noise such as vehicle engines.

SHHH
MULTI-FREQUENCY

Shhh-shhh is a newer sound that has been introduced as a warning signal.

The sound is perceived to be more directional.

The sound is perceived to dissipate more quickly outside the danger zone behind the vehicle.