Provision of In-situ Noise Measurement for Excavator Mounted Hydraulic Breaker

ANEWR
Environmental & I.T. Consultants

CLIENT : CHINA NATIONAL CHEMICAL ENGINEERING HONG KONG LIMITED

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Background

According to the Noise Control Ordinance, a Construction Noise Permit is required for machine to carry out construction works. To apply for the Construction Noise Permit (CNP) of an excavator mounted hydraulic breaker, the sound power levels, attested to the excavator, should be submitted to the Environmental Protection Department (EPD) for purposes of CNP application assessment. Specifically, the application required a noise measurement report prepared by a competent acoustical professional to guarantee the quality of the noise measurement. Noise measurement shall be carried out to evaluate the Sound Power Level for each CNP application.

Our Roles

ANewR Consulting Limited was appointed by China National Chemical Engineering Hong Kong Limited (CNCE) to carry out in-situ noise measurement to determine the sound power level (SWL) of an excavator mounted hydraulic breaker in support of the CNP application. The noise measurement for the excavator mounted hydraulic breaker was carried out with reference to the international standard *ISO 3746:2010 Acoustics -- Determination of sound power levels and sound energy levels of noise sources using sound pressure -- Survey method using an enveloping measurement surface over a reflecting plane.*

Key Values to Client

ANewR carried out noise measurements for the CNP application of the excavator mounted hydraulic breaker. Our competent acoustical professionals possess in-depth knowledge of the international measurement standards and are familiar with the local assessment methods for the CNP application. Thus, we were able to offer advice with every single detail of CNP application up to the satisfaction of the EPD. In addition, we also utilised a state-of-the-art multichannel acoustic measurement system to carry out the most efficient measurements.