Environmental Engineering and Management Journal

June 2014, Vol.13, No. 6, 1517-1522 http://omicron.ch.tuiasi.ro/EEMJ/



"Gheorghe Asachi" Technical University of lasi, Romania



## ENSURING SECURITY AND ENVIRONMENTAL SAFETY AT BLASTING WORKPLACES

## Leonard Lupu\*, Emilian Ghicioi, Adrian Jurca, Florin Păun

National Institute for Research and Development for Mining Safety and Explosion Proof Protection, 32-34 G-ral Vasile Milea Str., Petroşani, Romania

## Abstract

Using the blasting machines in explosive atmosphere involves the fulfillment of certain basic safety requirements in Europe. Testing blasting machines to assess compliance with specific requirements is particularly important given the existing risk of explosion that has to be minimized so as to ensure safety of life, health and environment and to prevent damage to property and the environment. This paper addresses the analysis of the essential health and safety requirements for blasting machines used in explosive atmosphere and the application and development of testing and evaluation methods.

Key words: blasting machine, explosive atmosphere, explosion protection

Received: December 2013; Revised final: June, 2014; Accepted: June 2014

<sup>\*</sup> Author to whom all correspondence should be addressed: E-mail: leonard.lupu@insemex.ro; Phone: + 40 254541622; Fax: +40 254546277