

ABSTRACT PROCEEDING

Occupational Safety as a Path to Poverty Alleviation: Implementing JSA and HIRARC in an Indonesia's Mining Company

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Abstract. This study aims to analyze hazard risks, provide risk assessments, and design risk control recommendations for miners. This study employed a qualitative method through observation and interviews with five miners in Banyuwangi, Indonesia, and the manager. This study identified several potential hazards associated with the Job Safety Analysis (JSA) method, assessed their risks, and evaluated hazard control using the Hazard Identification, Risk Assessment, and Risk Control (HIRARC) method. Based on the analysis, several recommendations were developed to reduce potential hazards. These include the use of personal protective equipment such as safety helmets, shoes, gloves, goggles, respirators, and earplugs, as well as light exercise activities like stretching to reduce muscle injury and proper body positioning to avoid back pain. Hazard control can also be implemented in the work environment, including leveling uneven roads, inspecting and trimming trees at risk of falling, installing guardrails on cliff edges, and constructing retaining walls in landslide-prone areas. The findings of this study highlight that JSA and HIRARC controls can help reduce the risk of workplace accidents frequently experienced by miners, from high to medium risk. These recommended hazard controls allow miners to work safely and comfortably, increasing productivity and, in turn, improving well-being.