## IOT TECHNOLOGY ON ANDROID APPLICATION IN AMMONIA WASTE MONITORING (Case Study: PT. Pupuk Kaltim Bontang, East Kalimantan)

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## ABSTRACT

PT PUPUK KALTIM's industrial development strategy prioritizes increasing fertilizer production sustainably, but it has had several adverse impacts on the surrounding community. This is due to an increase in the company's demand for ammonia. Consequently, companies will generate more waste. This increase in waste, which contains high levels of ammonia and large quantities, poses a significant health risk to local communities due to its potential for contaminating the surrounding environment. To address this challenge, a warning system has been developed to monitor and manage the ammonia spread at fertilizer companies in the community. This system utilizes data analysis and sensor technology to detect potentially hazardous ammonia levels. This warning system is designed to provide real-time information to the public regarding current environmental conditions and potential risks associated with ammonia fertilizer. The primary objective of this warning system is to enhance public awareness regarding the significance of regulating ammonia emissions from fertilizer companies. By doing so, it is hoped that the public can actively promote sustainable industrial development while maintaining environmental safety.

Keywords: Ammonia fertilizer, Sensor technology, Warning system