

POLLUTION CRISIS MANAGEMENT GUIDELINE FOR INDUSTRIAL PLANTS IN INDUSTRIAL ESTATE IN THAILAND

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ABSTRACT

Aim: This research investigates the characteristics of management guideline for pollution crisis from industrial plants in industrial estate in Thailand.

Methodology: The model has been simulated from the findings of both qualitative and quantitative of 500 questionnaires distributed to managers/administrators of the industrial business enterprises in Thailand that won the global ISO 14001 or green industry rewards. The data were analyzed by descriptive categorized into light and heavy industries, and by SEM to conduct the model in compatible with the empirical data.

Finding: The result reveals that: 1) the pollution crisis management guideline for industrial plants in industrial estate in Thailand consists of 4 factors i.e. policy, knowledge management, innovation & technology and resource management. The managers/administrators gave very high importance at 4.18 on light industry and 3.80 on heavy industry respectively. The analysis of the importance on each aspect shows high importance in most factors, 2) the development of SEM shows that the model fits with the empirical data at the 0.051 Chi-square probability levels, relative Chi-square at 1.243, goodness of fit index at 0.970 and root mean square error of approximation at 0.022. 3) The hypothesis result shows the following influencing factors: knowledge management has direct influence on policy at the statistically significant level of 0.05, knowledge management has direct influence on innovation and technology at the statistically significant level of 0.001, knowledge management has direct influence on resource management at the statistically significant level of 0.01, innovation & technology has direct influence on policy at the statistically significant level of 0.05 and innovation and technology has direct influence on resource management at the statistically significant level of 0.05.

Conclusion: The pollution crisis management guideline for industrial plants in industrial estate in Thailand four main factors which are very high important on resources in industrial business of both light and heavy industries. The factors are ranked according to their important levels referred Likert's scale as follows: policy, knowledge management, innovation & technology and resource management. Both light and heavy industries give the most important factor on resources to be guideline for industrial plants in industrial estate for Thailand. The evaluation of structural equation modeling of the simulation model in pollution crisis management showed passing the criteria of the model fitting with the empirical data. It was found that Chi-square probability levels equaled 0.051, relative Chi-square was 1.243, goodness of fit index was 0.970 and root mean square error of approximation was 0.022.

Keywords: Pollution Crisis, Industrial Estate, Structural Equation Model (SEM).