IMPACT OF HEALTH AND SAFETY REGULATIONS ON SMALL AND MEDIUM- SIZED ENTERPRISE CONTRACTORS IN GHANA

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Abstract—Occupational Health and Safety (OHS) practices of Small and Medium-Sized Enterprise (SMEs) contractors in Ghana is at an alarming state. The purpose of the study was to examine the impact based on the given measurement variables from literature. The study adopted Delphi survey method to collect data from experts (construction professionals and academics) through email. Rating of the variables by the experts were based on either the impact was considered to be very high or high. Microsoft EXCEL, spread-sheet software was used in the data analysis. Four variable reached high degree on consesus, out of the twelve measurement variables. Only three measuement variable reached high degree of consensus under the interquatile deviation.

Keywords: Health and safety, measurement variables, regulations, SMEs contractors.

I. INTRODUCTION

Majority of the construction industries in Ghana are Small and Medium-Sized Enterprise (SMEs) [2], [7], [8], [9]. Reference [7] is of the view that their domination has contributed to the Health and Safety (H&S) problems. The major challenging issue is lack of comprehensive national Occupational Health and Safety (OHS) policy as pointed out in the [3] report. Others include weak OHS infrastructures, insufficient OHS education, untrained and inadequate OHS professionals, and lack of proper monitoring and surveillances for occupational health and safety diseases and injuries. Reference [1] observed lack of body responsible for ensuring and implementation of the necessary requirements for the establishment of the missing national policy in Ghana. Reference [6] argues that lack of skilled human resources, inadequate government support for regulatory institutions and inefficient institutional frameworks responsible for health and safety standards are additional factors. In addition to these factors, the absence of H&S regulations developed specifically for the construction sector has prevented the implementation of H&S standards on construction sites. This problems call for an argent measures to be put in place in order to improve OHS. Reference [5] is of the opinion that construction companies' attitudes towards health and safety (H&S) in Ghana have been affected by institutional structure responsible for H&S implementing standards at workplaces. The paper discusses the current trends of OHS in Ghana.

II. DESIGN/METHODLOGY

The study adopted a Delphi survey method in the data collection. The survey was carried out immediately the Health and Safety (H&S) conceptualised model has been dveloped and questionnaires designed. Experts were made up of construction professionals and academics. The list of experts was generated from peered reviewed conference proceedings and journal articles. It was also based on their articles written on H&S and construction industry practices in Ghana. Eighteen invitation letters were sent to the experts through email to indicate their willingness to participate in the study. Eleven experts showed their interest to participate in the study. During the first stage of the Delphi questionnaire administration, four experts were further dropped. The remaining seven experts concluded the survey. Experts were asked to rate the impact of other factors in predicting Health and Safety (H&S) compliance of SMEs contractors in Ghana. The rating of the SMEs contractors were based on either the impact was considered very high or high. Instruction to experts and an impact scale is shown in Table 1 below. High.Data obtained from the Delphi survey was analysed with Microsoft EXCEL, spread-sheet software. The output from the analysis was a set of descriptive statistics such as means, median, standard deviations and derivatives of these statistics. The results were further presented in tables and bar-charts. The steps in conducting Delphi survey has not been discussed in this paper due to litted space.

Instruction for authors
If the impact is considered to be high, then **'X'** should be marked under the '**7**' or **'8'** box depending on whether your opinion is inclined more towards high or very high impact.

Please use your experience, expertise and judgement to rate what you perceive the average negative or positive influence of the various features are for H&S compliance and the Ghanaian SME's contractors at large would be if the described elements were lacking or present.

Table 1: Impact scale

No impact		Low impact		Medium impact		High impact		Very high impact	
1	2	3	4	5	6	7	8	9	10

III. CURRENT TRENDS OF OCCUPATIONAL HEALTH AND SFAETY IN GHANA

Reference [1], [4) have shown that there are currently two major edicts that have provided guidance in the provision of occupational or industrial safety and health services, practice and management in Ghana. These include the Factories, Offices and Shops Act 1970, Act 328 and the Mining Regulations 1970 LI 665. These have driven the mining and the labour sectors and are therefore very limited in scope, by considering the multifaceted distribution of industrial operations that we have in Ghana. There is the Workmen's Compensation Law 1987(PNDC 187) which relates to compensation for personal injuries caused by accidents at work and hence, indirectly impacts on monitoring worker or workplace safety. As per the International Labour Organisation (ILO) convention number 155 1981, member countries must formulate, implement and periodically review a coherent policy on Occupational Safety and Health (OSH) and work environment. The Labour Act 2003, Act 651, Part XV, sections 118 to 120 apparently directs employers and employees in their roles and responsibilities in managing Occupational Health, Safety and Environment in the nation. Reporting of accidents and occupational illnesses is not specified. It is not clear or does not specify what to consider as occupational illness and person responsible for the implementation of corrective actions as per recommendations. Currently, accidents that occur in factories are expected to be reported to the Department of Factory Inspectorate (DFI) but companies hardly report such events to the inspectorate for investigation and correction. Little attention has been paid to or there is no positive effect of the action of the DFI on the factories. The positive signs seen on "Safety and Health practice infection" among some of the companies are due to the influx of some multinational companies into the country. It is clear that the multinational companies have given their corporate expectations with specific requirements in the Occupational Safety and Health practices. This stems from their requirements for the contractors and subcontractors to follow their Health and Safety (H&S) standards.

CONCLUSION

Even though, consensus was reached among the experts on all the factors that affect SMEs contractors H&S Regulations, only three measurement variables reached high degree of consensus. Explanation of the selected variables for the factors that affect SMEs contractors H&S regulations in Ghana have provided in the main work of my research.

DISCUSSION OF RESULTS

Interquartile Deviation (IQD≤ 1) indicates high degree of consensus. Table 2 shows high degree of consensus in changes in company structure, and ownership at various stages of growth and lack of personnel to monitor changing legal requirements. The representation of the degree of consensus of the various variables is shown in Figure 1.

Table 2: Factors that affect SMEs Contractors H&S Regulation

Measurement Variables	Median	IQD≤ 1
Changes in company structure	6	0.75
Changes in ownership at various stages of growth	5	0.58
Lack of H&S experts	6	4.5
Lack of finance in the management of H&S regulation	6	2.75
Lack of finance in the management of H&S regulation	6	3.5
Short track records of H&S regulations	5	1.0
Company limited cash flow	5	2.5
Lack of enforcement from the legislative bodies overseeing the implementation of OSH Act	7	1.93
Lack of knowledge to understand H&S regulations	7	3.0
Lack of knowledge to interpret H&S rules	7	3.25
Lack of knowledge to identify hazards or risks	7	2.5
Lack of interest in compliance with environmental health regulations	6	2.75

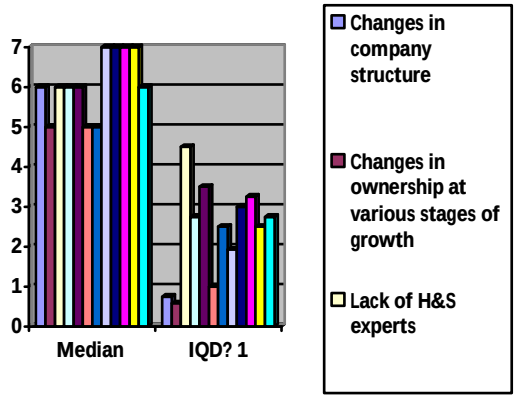


Figure 1: Factors that affect SMEs Contractors H&S Regulations

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