Adoption of Entrepreneurial Skills in Small and Medium Size Construction Firms in Abuja Nigeria: The Barriers

Ukwumonun Etubi & K.C. Okolie
Department of Building, Faculty of Environmental science
Nnamdi Azikiwe University Awka, Nigeria

ABSTRACT
The study examined barriers to adoption of entrepreneurial skills required of small and medium scale construction firms’ operation in Abuja. One research question and hypothesis guided the study. The study adopted descriptive research design. The population of the study consisted of 976; 401 managers and 572 contractors in registered small and medium sized building construction firms in Abuja. A sample size of 278; 119 managers and 159 contractors were used for the study. The sample size for this study was determined using Taro Yamane’s sample reduction formula. The data for this study was collected using structured questionnaire. The face and content validity of the instrument was established using the opinions of three experts from the Department of Building, Faculty of Environmental Sciences, Nnamdi Azikiwe University, Awka. The reliability of the instrument was established using Cronbach alpha; which yielded a reliability coefficient of 0.77.

The findings of the study revealed that that barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja include limited access to training programs, regulatory barriers, financial constraints, and lack of access to mentorship among others. The study among others recommended Barriers to skill development should be addressed by managers of building construction firms by providing access to training and mentorship programmes for staff.

KEYWORDS
entrepreneurial skills; small and medium sized building construction firms; barriers; performance.

INTRODUCTION
Today’s world is undoubtedly characterized by certain characteristics such as rapid changes and developments, complexity and competition. In recent times, many organizations operate in a dynamic, ambiguous, and evolving environment as a result of rapid changes and developments, complexity and competition experienced in different sector of human endeavours. One of the most prominent features of the present era is the dramatic changes that take place in thinking, ideology, social values, ways of doing things, and many other life phenomena (Hjorth and Steyaert, 2010). This observable changes are influencing application of entrepreneurial skills in building construction firms.

Construction industry as an organization is a social set-up which has a boundary that separates it from its environment, pursues its own collective goals and controls its own performances. Thus, an organization is an entity set up for a purpose. The main purpose for any going concern is to create utility. The satisfaction of customers of any enterprises results from the creation of and delivery of quality goods and services. It is important to emphasize that in any formal organization; interactions are rationally coordinated and directed through time on a continuous basis. In fact, many small and medium size businesses in building construction firm are springing up in recent years.

National Council on Industry in Osotimehin and Olajide (2012) defined small scale enterprises as enterprises whose total cost, including working capital but excluding cost of land, is over N1million but not more than N40 million and a labor size of between 11 and 35 workers. However, small scale enterprises refer to those enterprises whose total fixed assets excluding working capital does not exceed N10million with total number of employees ranging from 5-25. The continued existence of these businesses required entrepreneurial skills.
Entrepreneurial skills for business operation as follow: accounting and financial competency skills, marketing skills, problem-solving skills, and general business skills. But for the purpose of this study, human relation skills, managerial skills, problem-solving skills and ICT skills are put into consideration. Previous research by Obiegbu (2012), Olaitan et al. (2016) and others affirmed host of other components that combine together to cause skills gap part of which are: demand for multi-skill approach, demand for new skills, lack of educational training, rapid change in technology and inappropriate skills and inadequate training. It has been noted that the construction craftsmen have been criticized due to incompetency in their various disciplines and this has caused a bad impression on the kind of jobs produced and delivered. They are not regarded because of their low performance and poor work attitude which has an adverse effect on the industry. Researches have been conducted in this regard and noted the challenges therein (Alinaitwe et al., 2014; Nowak, 2015). These factors contributing to the skills barrier are demand for multi-skills approach, demand for new skills, lack of educational training, rapid technology advancement, inappropriate skills and inadequate training. The internal barriers are: insufficient skill know-how, resource constraints, and difficulties in measurement of skill performance.

The Single skills approach is where workers master one specific craft trade. This is common in Nigeria and it is becoming increasingly inappropriate for the present-day industry (Aphanite et al., 2013). It is also among the factors that causes skills gap. Conversely, multiskilling is the ability of a worker to carry out various jobs learnt in formal and non-formal setting which involves acquisition of skills knowledge and attitude used in various roles in the workplace. Multiskilling according to Collins dictionary is the act of training workers and entrants to engage in different roles and jobs. Ejohwomu et al. (2016) highlighted that parts of the benefit of multiskilling is that it validates for a longer period of employment and gives maximum rate of income, it equally allows longevity of employment and also gives maximum income with reduced number of employees. Multiskilling have been discussed by different researchers to be very effective on issue of employment and job-related issues in area of skilled workers and craftsmanship (Lill, 2019). Multi skilled workers have a variety of skills and these makes them to be competitive and they stay longer on project embarked upon (Lill, 2009; Ejohwomu et al., 2006). There are some disadvantages of multiskilling. These include meeting license requirements, resistance to change and lack of training (Dada and Ekpe, 2016).

Currently there is a call for new skills demand in construction industry, this was due to technological development and the introduction of information technology in construction industry, which is required in operating tools and equipment's by the labour pool for work (Mackenzie et al., 2000). Introduction of new technologies to the construction industry have redefined and called for new skills in other to improve performance and productivity (Wells and Walls, 2013). Introduction of new technology has greatly affected the performance of the craft men due to the out-of-date training they had previously acquired coupled with lack of various types of skills and showing lack of expertise.

Also, it is widely known and have been criticized, that, most craft men are not competent and lack adequate skills in their profession. This has been traced back to education and training curriculum which needs to be reviewed according to Awe, (2010). The lack of competence and adequate skills has contributed greatly to skills gap in Nigeria. The issue of education is a worldwide problem. Many researchers argued that even in developed countries, the issue of quality of education is dwindling and is a major concern for all. Therefore, it is considered by many studies as the main reason for the skills gap (World Bank, 2017; Livanos, 2019). Inappropriate skills and inadequate training from non-experts to the craft trainees has contributed greatly to skills gap challenges in the construction industry.

Inexperience and poor workmanship on the part of the craft worker, has also contributed to the issue of skills gap coupled with being new on the job role. The inability to effect changes, and to fully operate and utilise the new technology and the intricacies of the new job role creates skills gap more than ever before (Awe, 2010). The shortage of craft skilled workforce in the construction industry to adapt to changes with the recent advancement in technology with the use of tools and equipment have been problematic for a long time.
According to Ogbu (2015), stringent code of ethics was identified as one of the factors hindering the adoption of marketing strategies by QS firms in Nigeria. Ogbu opined that the attitude of the early professionals that “we are not in business but simply responding to our peers” request for services” which has been passed down to generations of construction professionals has affected marketing in practice more than those actually set by the professional code of conduct.

STATEMENT OF THE PROBLEM
Small and medium-sized construction firms are often not considered by all categories of clients for projects of higher complexities and profitability for fear of their abilities to meet set parameters. It is the usual practice that ‘white elephant projects’ are awarded to big/large construction firms that are mostly owned by foreign investors and this scenario has not enabled the potential of small and medium-sized construction firms to be explored in terms of global competitiveness. In order to change this scenario, adoption of entrepreneurial skills is required among small and medium-sized construction firms (Mitrofanova et al., 2015).

Undoubtedly, there are barriers to the adoption of those entrepreneurial skills more especially among building construction firms in Abuja as observed by Geophery (2021). This study is therefore imperative as it seeks to identify possible hindrance to the adoption of entrepreneurial skills in building construction firms in Abuja.

AIM AND OBJECTIVES
The aim of this study is to investigate barriers to the adoption of entrepreneurial skills required of small and medium sized construction firms in Abuja, Nigeria. Specifically, the study seeks to;

(1) Determine the barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja Nigeria

Research Questions
The following research questions were raised to guide the study.

(1) What are the barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja Nigeria?

Research Hypothesis
The following research hypothesis were formulated and tested at 0.05 level of significance.

H01: Barriers to the adoption of entrepreneurial skills in small and medium sized construction firms have no significant effect on the performance of small and medium sized construction firms in Abuja Nigeria.

METHOD
The study adopted descriptive survey research design. The population of the study consisted of 976; 401 managers and 572 contractors in registered small and medium sized building construction firms in Abuja. A sample size of 278; 119 managers and 159 contractors were used for the study. The sample size for this study was determined using Taro Yamane's sample reduction formula. The data for this study was collected using structured questionnaire. The questionnaire had two sections A and B. Section A contained items on the demographic data of the respondents while Section B contained 13 items related to research question. The questionnaire was weighted on a five-point Likert Scale, where 1= undecided, 2= strongly disagree, 3 = disagree, 4= agree and 5 = strongly agree. The researcher with the help of three research assistants administered the questionnaire and engaged the respondents in follow-up phone calls to ensure good response rate. The face and content validity of the instrument was established using the opinions of three experts from the Department of Building, Faculty of Environmental Sciences, NnamdiAzikiwe University, Awka. The reliability of the instrument was established using a pilot test of twenty selected building professionals, construction managers and contractors from Nasarawa State, which is outside the study area but have similar features to the studied area. Data collected was analysis using Cronbach alpha which yielded a reliability coefficient of 0.78. Arithmetic mean were used to analyze data related to the research question. Standard deviation was used to determine the homogeneity or otherwise of the respondents’ ratings. The mean ratings were interpreted using the real limit of 3.50. Thus, any item that had a mean rating of 3.50 and above was regarded as agreed while any item with a mean rating less than 3.50 was regarded as not agreed. The t-test statistical tool was used in the analysis of hypothesis.
The null hypothesis was rejected where the calculated p-value was less than the 0.05 level of significance, it meant that there was a significant difference between mean scores. Conversely, where the calculated p-value was greater than or equal to the level of significance (0.05), it meant that there was no significant difference and the hypothesis was accepted.

RESULTS

Research Question 1
What are the barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja, Nigeria?

TABLE 1: Mean scores of Respondents on the barriers to the adoption of entrepreneurial skills in small and medium sized construction firms.

<table>
<thead>
<tr>
<th>S/N</th>
<th>Item Description</th>
<th>N</th>
<th>Mean</th>
<th>S.D</th>
<th>Remark</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Limited Access to Training Programs: Small and medium sized construction firms face challenges in accessing relevant and effective training programs for the development of entrepreneurial skills.</td>
<td>275</td>
<td>3.64</td>
<td>.482</td>
<td>A</td>
</tr>
<tr>
<td>2</td>
<td>Regulatory Barriers: Regulatory complexities and bureaucratic hurdles pose significant barriers to the adoption of entrepreneurial skills in small and medium sized construction firms.</td>
<td>275</td>
<td>3.63</td>
<td>.485</td>
<td>A</td>
</tr>
<tr>
<td>3</td>
<td>Financial Constraints: Financial constraints hinder small and medium sized construction firms from investing in training and development programs focused on entrepreneurial skills.</td>
<td>275</td>
<td>3.61</td>
<td>.489</td>
<td>A</td>
</tr>
<tr>
<td>4</td>
<td>Lack of Access to Mentorship: Small and medium sized construction firms face challenges in accessing mentorship programs that could guide them in developing and implementing entrepreneurial skills.</td>
<td>275</td>
<td>3.54</td>
<td>.499</td>
<td>A</td>
</tr>
<tr>
<td>5</td>
<td>Market Competition: Intense competition within the construction industry creates challenges for Small and medium sized construction firms in allocating time and resources to develop entrepreneurial skills.</td>
<td>275</td>
<td>3.52</td>
<td>.500</td>
<td>A</td>
</tr>
<tr>
<td>6</td>
<td>Resource Constraints: Limited resources, including manpower and technology, act as barriers to Small and medium sized construction firms in adopting and effectively implementing entrepreneurial skills.</td>
<td>275</td>
<td>3.52</td>
<td>.501</td>
<td>A</td>
</tr>
<tr>
<td>7</td>
<td>Limited Collaboration Opportunities: Limited opportunities for collaboration with other industry players and stakeholders hinder the exchange of knowledge and experience in entrepreneurial skill development for Small and medium sized construction firms.</td>
<td>275</td>
<td>3.50</td>
<td>.501</td>
<td>A</td>
</tr>
<tr>
<td>8</td>
<td>Perceived Risk Aversion: Small and medium sized construction firms may perceive entrepreneurial practices as risky, leading to hesitation in their adoption due to fear of potential negative consequences.</td>
<td>275</td>
<td>3.49</td>
<td>.501</td>
<td>A</td>
</tr>
<tr>
<td>10</td>
<td>Resistance to Change: There is a resistance to change within small and medium sized construction firms, making it challenging to introduce and implement entrepreneurial practices.</td>
<td>275</td>
<td>3.46</td>
<td>.499</td>
<td>A</td>
</tr>
</tbody>
</table>
Result in Table 1 reveals that with a mean decision rule of 2.5, respondents indicated that the barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja include: Limited access to training programs, regulatory barriers, financial constraints, lack of access to mentorship, market competition, resource constraints, limited collaboration opportunities, perceived risk aversion, resistance to change, inadequate government support and lack of awareness.

**Hypothesis 1**
There is no significant difference in the mean scores responses of respondents on the barrier to the adoption of entrepreneurial skills among small and medium sized construction firms in Abuja, Nigeria.

**TABLE 2: T-Test on the Mean Scores Responses of Respondents on the barrier to the adoption of entrepreneurial skills among small and Medium Sized Construction Firms in Abuja, Nigeria.**

<table>
<thead>
<tr>
<th>Variable</th>
<th>N</th>
<th>Mean</th>
<th>Std. Deviation</th>
<th>Cal. t</th>
<th>df</th>
<th>P-value</th>
<th>Remark</th>
</tr>
</thead>
<tbody>
<tr>
<td>Entrepreneurial Skills Required</td>
<td>275</td>
<td>40.03</td>
<td>2.841</td>
<td>244.167</td>
<td>274</td>
<td>0.000</td>
<td>Significant</td>
</tr>
</tbody>
</table>

The result as shown in Table 2 shows the calculated t-value of 233.669, with 274 degrees of freedom, indicating a highly significant result. The p-value, reported as 0.000, suggests that the observed difference is statistically significant at 0.05 level of significance. Therefore, the null hypothesis is rejected. There is no significant difference in the mean scores responses of respondents on the barrier to the adoption of entrepreneurial skills among small and medium sized construction firms in Abuja, Nigeria.

**DISCUSSION**
Findings of the study revealed that there are various barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja. These barriers can be broadly categorized into external environmental factors and internal generated factors: One of the main external environmental factors identified in the study was limited access to training programmes, regulatory barriers, complex and costly licensing procedures, restrictive policies, financial constraints, lack of access to mentorship, resource constraints, resistance to change.

The findings of the study are in agreement with Yankah (2015), who identified external environmental factors and internal-generated factors as barriers to the adoption of marketing in QS firms. These factors include limited resources, lack of access to training, resistance to change, and inadequate government support. Obiegbu (2012) and Olaitan et al. (2016) further support this by noting that skills gaps are caused by a combination of factors, including the demand for multi-skill approaches, lack of educational training, and rapid changes in technology. These factors all contribute to the limited access to training programs and inadequate skills development for entrepreneurs in small and medium sized construction firms.
Seuneke et al. (2013) also found that the occurrence of entrepreneurial learning processes can lead to the development of entrepreneurial skills. The findings of the study is also in consonance with that of Wiskerke (2013) who highlighted the importance of access to mentorship and collaboration opportunities, which were also identified as barriers. The findings of the study further revealed that there is no significant difference in the mean scores of responses of registered building professionals on the barrier to the adoption of entrepreneurial skills among small and medium sized construction firms in Abuja, Nigeria.

**CONCLUSION**

Based on the findings of the study, it was concluded that barriers to the adoption of entrepreneurial skills in small and medium sized construction firms in Abuja include limited access to training programs, regulatory barriers, financial constraints, and lack of access to mentorship, market competition, resource constraints, and limited collaboration opportunities, perceived risk aversion, resistance to change, inadequate government support and lack of awareness.

**RECOMMENDATIONS**

On the basis of the findings and the conclusion reached, the following recommendations were made.

1. Barriers to skill development should be addressed by managers of building construction firms by providing access to training and mentorship programmes for staff.
2. Government and industry associations should provide financial assistance, access to training programs, and mentoring opportunities to address these barriers.

**REFERENCES**


