IRJET

Financial Management Practices Used in Local Building Contracting Companies in Tanzania

Kimata N. Malekela¹, Obedi B. Marobhe²

¹School of Architecture, Construction Economics and Management, Ardhi University, Dar es Salaam, Tanzania ²School of Architecture, Construction Economics and Management, Ardhi University, Dar es Salaam, Tanzania ***

Abstract - Basing on previous literature relating to the local contractors in Tanzania, it was observed that most of local contractors lack skills on financial management structures and tools which are essential for their career advancement. Moreover, the local contractors lack knowledge on how the financial management practices can be used to enhance and/or maximize their profitability. This study aimed at identifying the frequencies of financial management practices used in local building contracting companies in Tanzania. This research used structured questionnaire as a lone tool for data collection where by questionnaires were distributed to a total of sixty local building contractors. Fifty filled questionnaires were collected representing 83.3% of response rate. The study involved assessment of five financial management practices (Working Capital Management, Accounting Information Systems, Financial Reporting and Analysis, Capital Structure Management and Fixed Asset Management) where by Accounting Information System(grand mean of 4.23) and Working Capital Management(grand mean of 4.07) are the most frequently used aspects of financial management practices by local building contracting companies in Tanzania. The study recommends that local building contracting companies should increase the use of CSM and FRA towards achieving a better financial performance by their companies.

Key Words: Financial management, Financial management practices, Local building contracting companies, Tanzania

1. INTRODUCTION

Financial management can be described as a discipline dealing with how companies make economic choices in conjunction with the techniques of analyzing instruments taken during decision-making [47]. Financial management is categorised in terms of long-term and short-term choices. The divisions involves enhancing company's value by making sure that returns on investment exceeds cost of investing, taking into consideration the monetary risks. Financial management integrates the concept of time, fund and risk by establishing their interrelation in making financial decision [16].

[5] described financial management practices as the techniques adopted by managing officers, chief monetary officers and other directors in dealing with financial resources. Working Capital Management (WCM), Accounting

Information Systems (AIS), Financial Reporting and Analysis (FRA), Capital Structure Management (CSM) and Fixed Asset Management (FAM) are the extremely and widely used financial management practices by businesses. All of these procedures are essential to organizations' effective economic management. The adaptation of these practices is different from one industry to another due to the nature of the respective industry.

Construction industry is a very unique sector where by the stakeholders in the industry faces unique challenges compared to other stakeholders in other industries. Furthermore, most of the bankrupt contractors in construction industry were making profit at the time of their failure, but deprived financial management is among the main motives for their failure regardless of the profitability of the companies. Due to these unique characteristics of the construction industry, it is often necessary to modify the financial management principles used by other sectors before applying them to the construction industry [48].

[44] reported a high growth rate of the construction industry (8.4%) in the quarter of 2017 making it the third growing industry in Tanzania. As a result, the construction activities grew up to 15.7% making the construction industry one of the huge contributors to the Tanzania national income. Regardless of the growth rate of the construction industry, a lot of local construction companies in Tanzania have experienced many challenges concerning financial status which led to the consistency in the closure of the construction companies.

The aim of this study is to identify the frequencies of financial management practices used in local building contracting companies. Nevertheless, the study concentrated on the most significant used financial management practices out of five financial management practices which are Working Capital Management (WCM), Accounting Information Systems (AIS), Financial Reporting and Analysis (FRA), Capital Structure Management (CSM) and Fixed Asset Management (FAM).

2. FINANCIAL MANAGEMENT PRACTICES

For the drive of this segment, financial management practices are described and delineated as the performs used in the aspects of capital structure management, accounting information systems, financial reporting and analysis, working capital management, and fixed asset management by



the managing directors, financial manager, and other stakeholders.

2.1 Types of Financial Management Practices

2.1.1 Capital Structure Management

Capital Structure Management (CSM) refers to the management and supervision of a business's capital structure. A corporation's capital structure means the mix of different sources of capital [50]. Furthermore, most corporations are financed by a blend of debts and shares. The price of every element of the capital structure is measured relating to the complete quantity when defining the capital cost of a corporation. This calculates the weighted average capital cost (WACC) of the corporation. The WACC is further used to calculate the net present value (NPV) for corporation project capital planning. A reduced WACC will produce a greater NPV, so it is always ideal to achieve a reduced WACC [50].

2.1.2 Working Capital Management

Working Capital Management (WCM) relates to capital for daily company works and short-term funding decisions. These include handling with the connection among shortterm possessions of a corporation and company's short-term liabilities. WCM's goal is to guarantee that the corporation continues its daily activities and has satisfactory cash circulation to encounter both growing short term debts and future work expenditures. The framework of WCM contains management of inventories, receivables, payables and cash [50].

2.1.3 Accounting Information System

Accounting information system (AIS) is a frequently computer-based system of documents and registers which syndicates accounting codes and notions with the advantages of an information system and its usage is to examine and note company trades in order to formulate pro forma and provide customers with accounting statistics. AIS assists in evaluation of the economic statements' accounting data [46]. [50] claims that the major benefit of computerized AIS is that reporting is mechanized and modernized. Reporting is a main instrument for administrations to understand precisely abridged, timely data used for making choice, policy making and economic reporting.

2.1.4 Financial Reporting and Analysis

Financial Reporting and Analysis (FRA) is vital in a corporate because recording and arranging the AIS do not encounter purposes except when system reports are examined, evaluated and used to make organizational choices. Financial statements commonly deliver the necessary data for arrangement and choice making. Materials derived from business invoices can further be used through past valuations forming part of assessment, design and making choice [16].

2.1.5 Fixed Assets Management

As long as this study is concerned, emphasis is put on mobile resources; purchasing capital properties normally lead in the competitive benefit of a corporation in a long period. Huge spending and extraordinary procurement are defined by capital equipment. Acquiring capital properties generally needs quite a big spending on assets, which can occasionally lead to extravagancy and may need specific economic insinuations. Therefore, purchasing fixed assets is an outlay funded from long-term compared to working capital which is a day to day expenditure [50]. Correct choice of capital equipment will create revenues in the business. Improper choices can have ruinous implications for the company as it will not be able to sell machinery in the brief term. Lastly, with precaution, top managers must contemplate acquiring fixed assets [21].

2.2 Theories of Financial Management Practices

Theories and models are formulated to clarify, forecast, and comprehend a given phenomenon that test and prolong prevailing knowledge, inside the bounds of the serious limiting theories [57]. A theory's choice should be controlled by its suitability, ease to apply, and descriptive order. The theoretical analysis also helps researchers in understanding the prevailing knowledge [6]. This section hence explains the selected theories that governed this study.

2.2.1 Modigliani and Miller Capital Structure Theory

The progressive examination on capital structure theory was founded by Modigliani and Miller (1958) (cited as [38]). Modigliani and Miller validated that the company's value is self-determining of its capital construction. They pointed out that while the company's value is autonomous of its capital structure, the interest paid on the debt shows the distinction. Furthermore, they distinguished that concept by noting that since the interest costs are tax deductible as a result of the law that guides income tax in many countries, the firms running their businesses in these countries decreases the cost of risk and upsurges the cash streams after taxation.

In addition, since payments on dividends are nontaxable, businesses are obligatory to pay the duty on each of their revenues and consequently, leading to equity shares becoming a very expensive capital source. As a result, this partial treatment makes the organizations to use more debt within their investment schemes. The work of Modigliani and Miller provides a premise to different analysts for further research [38]. According to [33], Building contractors in



Tanzania are facing a challenge of having high corporate tax, in which building contractors may adopt this theory by the use of more debt to benefit from it.

2.2.2 Liquidity Preference Theory

The model idea was originally created by Keynes (1936) (cited as [24]) so as to clarify the assurance of the rate of interest as determined by the supply and demand for cash. [34] claimed that the desire for cash as a benefit was estimated to be dependent on the superior unavoidable by not holding bonds. [34] contended that Interest rates can't be a payment for sparing all things considered in light of the fact that, if an individual accumulates his savings in cash, stock it under his cushion, he will acquire no interest, in spite of the fact that he has in any case withheld from spending all his present income.

[34] noted that interest for liquidity is dictated by three assumed processes; to start with the transactions intention, the prudent thought where people want to have liquidity basing on unprecedented issues that require big spending, and projected intent where people hold liquidity on the notion that the cost of bond will decrease after a certain period. From this theory, it is obvious that any building contracting company must hold pertinent cash, in which proper management practices regarding its money/liquidity. For a building contractor executing different projects, having enough cash to execute the project is paramount because any mismanagement of cash may lead to loss to the contractor

2.2.3 Cash Management Theory

Miller and Orr (2009) (cited as [37]) developed this model trying to create a more rational way to deal with management of money over Baumol's model. The theory figures out how to attain a sensible level of genuineness without being excessively detailed. The model assumes that the cumulative cash flows are constantly dispersed with the mean and standard deviation being very low. This is a probabilistic model which agrees with unpredictability in finance management.

Money should similarly be kept up at an optimal level. It might likewise lead to prolonged cost because of abusing, waste and theft. [15] noted that excessively or deficient level of money equalizations means money is not appropriately used. Insufficient level of finance for a building contractor can cause stoppage in business operations which is so dangerous in construction perspectives. Stoppage of business in contracting company has prolonged consequences such as liquidated damages, loss in projects and so on.

2.2.4 Agency Theory

Among the key issues that consequence in misperception among managers and stakeholders is the matter of free cash flows. Office charges rose from detachment of proprietorship control and conflicting circumstances among classifications of operatives [22]. [58] portrays debt as a disciplinary instrument that can be used to guarantee that managers are motivated to the creation of wealth for the shareholders. In this way, in the businesses that have great cash stream and profits, growth of the level of debt that the firm holds can be used as a tool through which the managers and their powers can be reduced in order to avoid them using the assets of the firm for their own benefit at the expense of the business.

2.2.5 Pecking Order Theory

Myers (1984) (cited as [43]) created the Pecking Order Theory. The model emphasizes that companies prefer interior finance to finance from outer sources. The theory also claims that companies would want debt over equity in situations where they want external financing. Because of information asymmetry, the companies have no predetermined or optimum debt-to-equity ratio. Conservative methods are used by companies when it comes to dividends and debts as a capital sources is used to maximize profit.

The greatest preference is the usage of inner sources of finance (reserved income and depreciation impacts) before resorting to any outside sources. Internal capital sources do not incur flotation expenses and do not require any extra exposure of branded financial data that could result in more austere market discipline and a probable damage of competitive benefit. For a case where a company is obligated to usage of external source of finance, this order of financial sources must be chosen: debt, exchangeable securities, preferred shares, and shared stock [43].

2.3 Financial Management in Construction Companies

Financial Management involves usage of a corporation's financial resources of corporations. This comprises of the usage of money and properties (Fixed and Current assets). Financial decisions affect a business's financial status in the future [45]. Specifically on construction companies, the choice to tender on a certain project have a prodigious influence on the financial status of a corporation.

According to [48], prior to the contractor's verdict to tender on a project, The boss is obligated to deal with the following matters: Corporation has sufficient liquid to perform the work or other sources of finance; The company's willingness to get attached to the work; The alterations needed to be done in the business's monetary assembly so the corporation to have a connection to the scheme; Ability to do all works or



the corporation should delegate other tasks; Rent or acquisition the extra tools/machinery required for the project; how to finance the acquisition of the equipment; Will this project involve the business to raise its overhead headquarters; What is the added profit and overhead to the tender. The responses to all these issues will influence the finances of the corporation [56].

3. METHODOLOGY

Structured questionnaires were organized to collect the data for the drive of addressing the goals of this research. The questionnaire was divided into three segments; the first one was about the general introduction of the respondent, second segment focused on Financial management practices used by local building contractors. The second part was subdivided into five parts which aimed at determining how local building contractors use the five financial management elements.

3.1 Questionnaire Design

The questions were designed in a system that it assisted the examiner to acquire every essential data concerning financial management practices from the sample. The financial management practices were obtained from the literature review, where by the practices was presented in the questionnaire. A pre-trial and pilot study was performed (20% of the sample size) to make sure that the questionnaire provides usable and consistent data. Cronbach's Alpha was used to measure the accuracy of the research instrument from the questionnaires collected for pilot study.

The questionnaires were then administered to finance stakeholders in local building contracting companies to identify the frequencies of financial management practices used in local building contracting companies in a 5 point likert scale from very frequently (5), frequently (4), averagely (3), rarely (2) and not at all (1). Mean score was used to rank the financial management practices where by factors with the mean score above 4.0 were considered to be very significant, and the factors with mean score from 3.0 to 4.0 were considered to be significant and factors with mean score from 2.0 to 3.0 were considered to be moderately significant while factors with mean score below 2.0 were considered to be insignificant.

Nevertheless, adequacy of sample was tested using Kaiser-Meyer-Olkin (KMO). KMO is used to test the adequacy of data and suitability for inferential statistical tests. The value of KMO of greater than 0.5 is considered to be acceptable and suitable for statistical analysis [30]. Alongside with KMO, the Bartlett's Test of Sphericity was used to indicate whether the variables are unconnected and therefore inappropriate for structure discovery. The results of these two tests were used in determining the minimum standard required to proceed with factor analysis.

After testing of sampling adequacy and reliability using KMO coefficient and cronbach alpha results, factor analysis was conducted. The reason for conducting factor analysis is to create factor loadings for every statement which helps to reduce larger set of statements into a smaller set of statements referred to as principal components. The extraction of the factors followed the Kaiser Criterion where an eigen value of 1 or more indicates a unique factor.

3.2 Sample Size

The population of this study has heterogeneous characteristics, containing registered local building contracting companies class I to III; hence the study adopted formula by [28] for stratified sampling

$$n = \left[\frac{z^2 pq N}{[e^2(N-1) + Z^2 pq]}\right]$$
(1)

Whereby "n" refers to the sample size; "N" refers to the complete population; "Z" refers to the confidence rate; "e" refers to the margin / sample mistake; "p" refers to the variation of degree, which is 2%; and "q" refers to 1-p.

Figures adopted in sampling are confidence level (Z) - 95% (1.96) and sampling error (e) - 5%. The values used in this study are rational and effective and adopted in different studies like of Luvara et al. (2018). From the calculations as shown in the appendix II, The sample size is presented in Table 1 below.

Class of Registration	Population	Proposed Sample
Class I	70	21
Class II	53	19
Class III	57	20
Total population	180	60

 Table -1: Sample Size from Local Building Contracting

 Companies in Dar es Salaam

The complete number of sample size chosen as shown in Table 1 above is 60 registered Class I to Class III local building contractors in Dar-es-Salaam. [28] stated that a sample size covering at least 15% of the study population is reliable for making conclusion. This study is comprised of sample size of 60 registered local building contractors covering 33.3% of the population.

L



International Research Journal of Engineering and Technology (IRJET) Volume: 07 Issue: 12 | Dec 2020

www.irjet.net

3.3 Response to Questionnaires

The questionnaires were distributed to the chosen companies, in which the researcher collected an overall of 83.33% of the distributed questionnaires as presented in Table 2.

Table -2: Response Rate of Local Building Contracting
Companies

Class	Distributed Questionnaires	Returned Questionnaires	Respon se rate		
Class I	21	13	61.9%		
Class II	19	19	100%		
Class III	20	18	90%		
Total	60	50	83.33%		

4. RESULTS AND DISCUSSION

Data collected from the questionnaire was edited to ensure totality, coded, amended and inserted into SPSS version 16.0. Data coding includes allocating number(s) to the responses of the respondents in order to be entered in software [51].

Cronbach's Alpha was used to measure the accuracy of the research instrument from the questionnaires collected for pilot study. Cronbach's Alpha is the most accurate measure since it provides answers which are error free and steady [51]. According to [18], instruments with Cronbach's Alpha coefficients of 0.60 are regarded to have an average reliability while coefficient of 0.70 and above indicates that the instrument has a high reliability standard. The results are as indicated in Table 3 in which all items were comprised in the research tool because they contained coefficients of more than 0.70 which are considered to be highly reliable for the tool [18].

Table -3:	Reliability Analysis
-----------	-----------------------------

Financial	Cronbach's	Cronbach's	Numbe				
management	Alpha	Alpha	r of				
practices		based on	items				
		standardiz					
		ed items					
Working capital	0.727	0.724	7				
management							
Accounting	0.721	0.680	3				
Information							
system							
Financial	0.783	0.726	4				
reporting and							
analysis							
Capital	0.713	0.721	6				
structure							
management							
Fixed assets	0.752	0.748	7				

management			
Returns on	0.896	0.900	5
assets			

4.1 Financial Management Practices Used in Local **Building Contracting Companies**

This section aimed at identifying the frequencies of financial management practices used in local building contracting companies. Descriptive statistics and factor analysis were conducted for each aspect of financial management so as to determine the most frequently used practices.

4.1.1 Working Capital management

Table 4 portrays that the most used working capital practice is the "maintenance of the proper records of all owed to a company (assets/receivables)" where by 80% of the respondents agreed with the frequent use of the practice (mean of 4.16). This was followed by "Assurance of the sufficient cash flow to meet daily needs" and "having system for managing cash for day to day activities" which was both second ranked and bearing mean of 4.14. The least used working capital practice is "Preparation of cash flow forecasts to identify future surpluses and deficits" which is having a mean of 3.94. Nevertheless, the working capital management as whole had a grand mean of 4.07 which means that Working capital practices are very frequently used by the Local contracting companies.

Furthermore, the component matrixes for working capital management statements were determined as shown in Table 4. From the results, every factor contained value exceeding 0.4 therefore they were reserved intended for further analysis. The results presented that the KMO value was 0.579 which exceeds the minimum acceptance amount of 0.5, hence the information are satisfactory and suitable for inferential statistical tests. The Sphericity Bartlett's Test of was conducted, which was likewise extremely noteworthy (Chisquare = 157.712 with 21 degree of freedom, at p < 0.05). These findings provide an outstanding justification for carrying out further statistical analysis.

Analysis of the total variance shows that the seven statements on the management of working capital can be factored into one element. As shown in Table 4, the Total variance explained by the extracted factor was 79.836%.

Any business enterprise must make sure that they use proper WCM practices so as to ensure there are sufficient fund to meet daily cash requirement. The results revealed that the local building contracting companies mostly maintains proper records for all debts owed to a company (assets/receivables). This helps them to know the time when they will expect cash from other organization(s) who owe money to them.



The findings further revealed that Local building contracting firms has system for managing cash for day to day activities. Every firm has its own motive for holding money, either for transaction reasons, precautionary reasons or speculative reasons [48]. For either of the motive, the company must have a good system so that when the company needs cash, it will be available. Also, the least ranked practice was "Preparation of cash flow forecasts to identify future surpluses and deficits" with the mean of 3.94. It was revealed that all of the WCM practices are used by the local building contracting companies.

4.1.2 Accounting Information System

Table 5 shows that "usage of computer in keeping and processing financial transactions" is the most used AIS practice which had a mean of 4.34. This is followed by "having a system of processing of financial information" which is second ranked and bears a mean of 4.18. The least used AIS practice is "having a system of storing financial information" which bears a mean of 4.14. AIS practices at large bears a grand mean of 4.23 which shows AIS is very frequently used by Local building contracting firms.

Furthermore, the component matrixes for accounting information system statements were determined as shown in the table 5 below. From the results, every factor contained value of greater than 0.4 therefore the factors were reserved ready for next step of analysis.

The results presented that the KMO value was 0.570 which exceeds the minimum acceptance ratio of 0.5; hence the information is satisfactory and suitable for inferential statistical tests (Table 4.5). The Sphericity Bartlett's Test was conducted, which was extremely substantial (Chi-square = 31.200 with 3 degree of freedom, at p < 0.05). These answers provide an outstanding rationale for further statistical analysis to be carried out.

Factor analysis was carried out after testing the sampling adequacy and reliability using the KMO coefficient and the Cronbach alpha outcomes. Total Variance analysis designates that the three statements on accounting information system can be integrated into a single factor. As presented in Table 5, the total variance explained by the factor extracted was 60.955%.

The findings revealed that, the most used AIS practice by local building contracting companies are "having a system of processing of financial information" and "having a system of processing of financial information". A good company must treat their financial information (statements) with a great care because those are the one which are used to track the performance of companies. Some business decisions needs to be made considering the past performance in relation to the decision made by the management. Nevertheless, "having a system of storing financial information" is the third and least used AIS practice with mean of 4.16. This means that all of the AIS practices are very frequently used by the local building contracting companies and the three practices are interrelated. Without storing of the financial information, the company cannot process them.

4.1.3 Financial Reporting and Analysis

Table 6 presents that the respondents' understandings on the FRA practices of their companies, where by "preparation of financial statements of the company in line with the financial accounting standards" is the most used FRA practice which bears a mean of 4.16. This was followed by "Regular preparation of financial statements" and "preparation of financial statements" and "preparation of financial statements in accordance with General Accepted Accounting Principles (GAAP)" which had a mean of 4.04 and 3.8 respectively. The least used FRA practice was "Regular publication of financial statements" which had a mean of 2.88. FRA as whole bears a grand mean of 3.72 which implies that FRA practices are frequently used by the Local building contracting companies.

Furthermore, the component matrixes for FRA statements were determined as shown in the Table 6 below. From the outcomes, for further assessment, all variables contained coefficients higher than 0.4.

The findings, as abridged in Table 6, showed that the KMO value was 0.592, which exceeds the minimum acceptance value of 0.5, hence the information are satisfactory and appropriate for inferential statistical tests. The Sphericity Bartlett's Test was conducted, which was also very significant (Chi-square = 24.627 with 6 degree of freedom, at p < 0.05). These findings provide an outstanding reason for carrying out further statistical analysis.

Following testing of sampling adequacy and reliability with the outcomes of KMO coefficient and Cronbach alpha, factor analysis was carried out. Analysis of the total variance shows that the four statements on the management of working capital can be integrated into a lone factor. As portrayed in Table 6, the total variance explained by the extracted factor was 71.706%.

"Preparation of financial statements of the company in line with the financial accounting standards" was the most used FRA practice by local building contracting companies. Preparation of the financial statement in accord of the GAAP helps other stakeholders to understand them and making helpful contribution by making analysis out of them. Also the Local building contracting companies prepares the financial statements in a regular basis (normally prepared in annual interval); this helps in keeping track of the business after a specified period. Nevertheless, the findings revealed that the findings revealed that "Regular publication of financial statements" is the least used FRA practice. Publication of the financial statements helps the stakeholders in the respective industry to make analysis on the performance of the sector at large along with the solutions for any problem prevailing in the industry. Lack of the published data in the construction industry (specifically on Local building contractors) makes it difficult for the stakeholders to make such analysis for the betterment of the sector.

4.1.4 Capital Structure Management

Table 7 presents the respondents' understandings on the Capital structure management of the local contracting companies they are working for. It was revealed that the top ranked used CSM practice is "consideration of cost of capital before choosing source of fund" which had a mean of 4.14. This was followed by "Assurance of proper mix of debts and equity shares in the company" and "fully utilisation of the debt facility according to its capability" which had a mean of 3.82 and 3.80 respectively. The least used CSM practices are "Quoting the company is on the National Stock Exchange" and "preference of debt over equity capital" which had a mean of 2.3 and 3.3 respectively. The CSM practices as whole had a grand mean of 3.5 which implies that CSM practices are frequently used by the Local building contracting companies.

Furthermore, the component matrixes for Capital structure management statements were determined as shown in the Table 7 below. From the results, all factors contained coefficients of greater than 0.4 except one component which had factor loading of 0.390; hence all other components were reserved for subsequent analysis.

As abridged in Table 7, the results presented that the KMO value was 0.516 which exceeds the minimum acceptance rate of 0.5; hence the information is tolerable and appropriate for inferential statistical tests. The Sphericity Bartlett's Test was conducted, which was similarly extremely significant (Chi-square = 157.712 with 21 degree of freedom, at p < 0.05). These findings provide an outstanding justification for carrying out further statistical analysis.

Using KMO coefficient and Cronbach alpha outcomes, factor analysis was performed after testing of sampling suitability and consistency. Analysis of the total variance shows that the six capital structure management statements can be integrated into one lone factor. As revealed in Table 7, the explained total variance by the extracted factor was 70.698%.

Capital structure of a company involves how the management uses different sources of fund to finance the business. The most used sources of fund are Debt and Equity shares in which a proper mix of the two can enhance the profitability of the company. The findings revealed that the Local building contracting companies ensures that there is a proper mix of debts and equity shares (second ranked factor) which is good for enhancing the profits of the firms.

Cost of capital is also a very important factor to consider before engaging in any source of fund. The findings revealed that the most used CSM practice is the consideration of cost of capital before choosing the source of fund. This is very helpful because there are sources of funds which are very expensive such as Bank overdrafts, in which using that source frequently will affect largely the profitability of the company. Debts is a very good source of fund for companies because, the use of debt gives tax advantages to the businesses. This further means that, the more the company uses debt, the more the company gets tax advantage. The findings also revealed that local building contracting companies uses the debt facility according to its capability to enhance profitability of the company.

National stock of Exchange is a completely computerized electronic exchange scheme which offers easy exchange to the financiers all over the country and abroad. Being quoted in the NSE helps the company to easily sell the shares of the company to other investors so as to widen their capital. The findings of this study revealed that most of local building contracting companies are not quoted on the NSE. This means that they cannot get the benefits of using NSE facility for issuing equity shares.

4.1.5 Fixed Assets Management

Table 8 presents the respondents' understandings on the fixed assets management practices of the local contracting companies. It was discovered that the most used FAM practice is "Compulsory authorization of capital expenditure on fixed assets by senior management" which had a mean of 4.42. This next most used FAM practices were "Approval of Movement of fixed assets by senior management" and "maintenance of fixed assets register" which had a mean of 4.02 and 3.80 respectively. The least used FAM practices are "Tagging fixed assets by using computer system" and "Regular counting of fixed assets" which had a mean of 3.5 and 3.58 respectively. The FAM practices combined had a grand mean of 3.83 which means that they are frequently used by local building contracting companies.

Furthermore, the component matrixes for fixed assets management statements were determined as shown in the Table 8 below. From the results, all factors contained coefficients of greater than 0.4 except one component which had factor loading of 0.329; hence all other components were reserved for following analysis.

Table 8 presentation shows that the KMO value was 0.545 which exceeds the minimum acceptance value of 0.5; hence data collected are satisfactory and suitable for inferential statistical tests. The Sphericity Bartlett's Test of was conducted, which was correspondingly extremely significant

(Chi-square = 78.300 with 15 degree of freedom, at p < 0.05). These findings provide an outstanding explanation for carrying out succeeding statistical analysis.

Factor analysis was carried out after testing the sampling adequacy and reliability using the KMO coefficient and the Cronbach alpha results. Total Variance analysis indicates that single factor can be factored from the seven statements on fixed asset management. As shown in Table 8, the total variance explained by the extracted factor was 73.846%.

Any contracting company must possess fixed assets which can help the company to conduct their day to day activities for example plants, equipment, real estate and so on. The findings revealed that acquisition of fixed assets in local building contracting companies must be authorized by senior management. This is good because the senior management of the company knows the fixed assets that are appropriate for the business. Nevertheless, the findings further revealed that the senior management in local building contracting companies is responsible for authorizing the movement of the fixed assets from one position to another.

The findings further showed that the least used FAM practice is "Tagging fixed assets by using computer system". The local building contracting firms tend to ignore this practice, but it is one of important FAM practice used by companies in different industries. Using of FAM helps the company to recognize a fixed asset by giving a unique barcode or/and unique serial number. This is the best practice for movable fixed assets that are the most used by the contractors such as excavators, concrete mixers, compactors, trucks and so on.

4.1.6 Summary of Financial Management Practices Used by Local Building Contracting Companies

The results of the analysis of data pointed out different matters concerning the financial management practices in the Local building contracting companies in Tanzania. First of all, this study recognized that there are several financial management practices which are frequently used by Local building contracting companies in Tanzania and which correspond with previous studies that have been undertaken earlier. According to the findings, accounting information system is most frequently used by local building contracting companies in Tanzania; having a grand mean of 4.23. This has been followed by working capital management with the grand mean of 4.07. Capital structure management carried the least grand mean of 3.50.

Specifically on the components of the independent variables, the most used practice is under accounting information system which states that "company uses computer in keeping and processing financial transactions". It carried mean of 4.34 which means local building contractor are very frequently using computer to keep and process their financial transactions. Also from the findings, it was revealed that local building contractors in Tanzania are rarely quoted in the NSE, which means they do not sell shares in the NSE. Also, most of the local building contractors in Tanzania do not publish regularly their financial statements unlike other studies in different industries.



e-155N: 2	2395-0056	
p-ISSN: 2	2395-0072	

		VF	F	Δ	R	NA				
S/N	Working capital management	••	-	~	n	1411	TNR	Mean	СМ	R
,	······································		%	%	%	%				
1	The company has a system for managing cash for day to day activities	44	34	18	0	4	50	4.14	0.482	2
2	Maintains inventory(goods in stock like building materials) records which are updated regularly	32	46	18	4	0	50	4.06	0.762	5
3	Optimal cash balances are maintained by the company at all times	28	46	20	6	0	50	3.96	0.410	6
4	Maintains proper records for all debts owed by a company (liabilities/payables)	30	50	20	0	0	50	4.10	0.879	4
5	Maintains proper records for all debts owed to a company (assets/receivables)	36	44	20	0	0	50	4.16	0.932	1
6	Ensures there is sufficient cash flow to meet daily needs	26	62	12	0	0	50	4.14	0.843	2
7	Prepares cash flow forecasts to identify future surpluses and deficits	22	54	20	4	0	50	3.94	0.762	7
	GRAND MEAN							4.07		
Kaise	r-Mever-Olkin (KMO) Measure of sampling A	dequac	v: 0.57	'9						

Table -4: Descriptive Statistics for Working Capital Management

Sphericity Bartletts test is significant at 0.05; Chi-square 157.712 and degree of freedom (df) is 21.

Total variance explained (V.E): 75.895%.

Extraction Method: Principal Component Analysis based on Eigenvalue greater than 1.

TNR - Total number of response, % - Percentage, R - Rank, CM - Component matrix, VF - Very frequent, F - Frequent, A -Average, R – Rarely, NA- Not at all.

Table -5: Descriptive Statistics for Accounting Information System

S/N	Accounting Information System	VF	F	Α	R	NA	TNR	Mean	СМ	R
		%	%	%	%	%				
1	The company uses computer in keeping and processing financial transactions	54	34	8	0	4	50	4.34	0.869	1
2	The company has a system of storing financial information	28	60	12	0	0	50	4.16	0.555	3
3	The company has a system of processing of financial information	40	46	10	0	4	50	4.18	0.875	2
GRAND MEAN								4.23		
Kaise	r-Meyer-Olkin (KMO) Measure of sampling A	dequa	cy: 0.57	70.						
Spher	ricity Bartletts test is significant at 0.05;Chi-so	quare 3	31.20 a	nd deg	ree of fi	reedom	(df) is 3.			
Total	variance explained (V.E): 60.955%.									
Extra	ction Method: Principal Component Analysis	based	on Eige	envalue	e greate	r than 1				
TNR	- Total number of response, % - Percentage, R	- Ranl	к, СМ –	Compo	onent m	atrix, V	F – Very fi	requent, F	- Freque	nt, A –

Average, R – Rarely, NA- Not at all.

S/N	Financial reporting and analysis		F	Α	R	NA	TNR	Mean	СМ	R
		%	%	%	%	%				
1	The financial statements of the company are prepared in line with the financial	22	72	6	0	0	50	4.16	0.711	1



International Research Journal of Engineering and Technology (IRJET) e-IS

T Volume: 07 Issue: 12 | Dec 2020

www.irjet.net

e-ISSN: 2395-0056 p-ISSN: 2395-0072

	accounting standards									
2	The financial statements are prepared in a regular basis	28	56	8	8	0	50	4.04	0.703	2
3	The financial statements are prepared in accordance with General Accepted Accounting Principles(GAAP)	16	48	36	0	0	50	3.80	0.672	3
4	The financial statements are published regularly	6	32	24	20	18		2.88	0.635	4
	GRAND MEAN		3.72							
17 .										

Kaiser-Meyer-Olkin (KMO) Measure of sampling Adequacy: 0.592.

Sphericity Bartletts test is significant at 0.05; Chi-square 24.627 and degree of freedom (df) is 6.

Total variance explained (V.E): 71.706%.

Extraction Method: Principal Component Analysis based on Eigenvalue greater than 1.

TNR - Total number of response, % - Percentage, R – Rank, CM – Component matrix, VF – Very frequent, F – Frequent, A – Average, R – Rarely, NA- Not at all.

Table -7: Descriptive Statistics for Capital Structure Management

S/N	Capital structure management	VF	F	A	R	NA	TNR	Mean	СМ	R
		%	%	%	%	%				
1	The company ensures proper mix of debts (mortgages, bank loans etc) and equity (shares) in the company	26	36	32	6	0	50	3.82	0.566	2
2	The company has fully utilized the debt facility according to its capability	20	52	16	12	0	50	3.80	0.706	3
3	The company prefers debt over equity capital	8	30	50	8	4	50	3.30	0.724	5
4	The motives for decision of the Capital source are formulated based on tax savings	18	40	36	6	0	50	3.70	0.629	4
5	The company is quoted on the National Stock Exchange(NSE)	8	10	20	28	34	50	2.30	0.390*	6
6	The company considers cost of capital before choosing source of fund	44	36	10	10	0	50	4.14	0.442	1
	GRAND MEAN					-		3.50		
Kaiser-Meyer-Olkin (KMO) Measure of sampling Adequacy: 0.592. Sphericity Bartletts test is significant at 0.05; Chi-square 157.712 and degree of freedom (df) is 21.										

Total variance explained (V.E): 70.698%.

L

Extraction Method: Principal Component Analysis based on Eigenvalue greater than 1.

TNR - Total number of response, % - Percentage, R – Rank, CM – Component matrix, VF – Very frequent, F – Frequent, A – Average, R – Rarely, NA- Not at all.

Table -8: Descriptive Sta	cistics for Fixed Assets Management
---------------------------	-------------------------------------

		VF	F	Α	R	NA				
S/N	Fixed assets management	%	%	%	%	%	TNR	Mean	СМ	R
1	The company maintains a fixed assets register	20	42	36	2	0	50	3.80	0.580	3
2	There is a system of tracking the company's fixed assets (E.g. Maintenance, Loss, etc.)	22	38	34	6	0	50	3.76	0.448	4
3	The fixed assets are tagged using computer system	16	44	18	18	4	50	3.50	0.735	7
4	Movement of fixed assets have to be approved by senior management	22	58	20	0	0	50	4.02	0.476	2



International Research Journal of Engineering and Technology (IRJET) e-

Volume: 07 Issue: 12 | Dec 2020

www.irjet.net

e-ISSN: 2395-0056 p-ISSN: 2395-0072

5	Fixed assets count is carried out regularly	4	50	46	0	0	50	3.58	0.683	6
6	Capital expenditure on fixed assets must be	54	38	4	4	0	50	4.42	0.506	1
	authorized by senior management									
7	The repair and maintenance of fixed assets	18	36	46	0	0	50	3.72	0.329*	5
	is carried out regularly									
	GRAND MEAN							3.83		

Kaiser-Meyer-Olkin (KMO) Measure of sampling Adequacy: 0.545.

Sphericity Bartletts test is significant at 0.05; Chi-square 78.300 and degree of freedom (df) is 15. Total variance explained (V.E): 73.846%.

Extraction Method: Principal Component Analysis based on Eigenvalue greater than 1.

TNR - Total number of response, % - Percentage, R – Rank, CM – Component matrix, VF – Very frequent, F – Frequent, A – Average, R – Rarely, NA- Not at all.

5. CONCLUSIONS

The aim of this paper is to identify the frequencies of financial management practices used in local building contracting companies. The study comprised of five aspects of financial management practices. The study revealed that the most significant practice used by Local building contracting companies in Tanzania is AIS with a grand mean of 4.23. This was followed by WCM, FAM, FRA, and CSM consecutively with grand means of 4.07, 3.83, 3.72 and 3.50 respectively. The study also revealed that the least significant financial management practices used by local building contracting companies are CSM and FRA consecutively which bears grand means of 3.50 and 3.72 respectively.

6. RECOMMENDATIONS

The study determined that CSM and FRA are the least used aspects of financial management practices in spite of their importance especially towards enhancing the financial performance of the local building contracting companies. The study therefore recommends the local building contracting companies to increase the use of CSM and FRA towards achieving a better financial performance by their companies.

Lastly, this paper suggests that the stakeholders in building construction industry especially Contractors registration board to encourage local building contracting companies to enhance the use of the aspects of financial management practices so as to enable them to achieve a favorable financial performance.

Table 9. List of abbreviations

Statement	Abbreviation				
Accounting Information system	AIS				
Component matrix	СМ				
Capital structure management	CSM				
Fixed assets management	FAM				
Financial reporting and analysis	FRA				
General Accepted Accounting	GAAP				

Principles	
Kaiser-Meyer-Olkin	КМО
National Bureau of Statistics	NBS
Net Present Value	NPV
Returns on assets	ROA
Statistical Package for the Social	SPSS
Sciences	
Tanzania Construction Industry	TCI
Weighted Average Cost of Capital	WACC

REFERENCES

- [1] Addo I. K. (2017). The effect of financial management practices on the financial performance of top 100 small and medium enterprises in Kenya. Unpublished MBA thesis University of Nairobi, Kenya.
- [2] BMI, (2016). Tanzania Infrastructure Report Includes 10-Year Forecasts To 2025. London: BMI Research.
- [3] Boeije, H. (2010). Analysis in Quantitative Research, London Sage Publications.
- [4] Chitkara, K.K. (2011). Construction Project Management, Planning, Scheduling and Controlling, 2nd Edn., Tata McGraw Hills.
- [5] Chung, S. H. and Chuang, J. H. (2010), The effect of financial management practices on profitability of small and medium enterprises in Veitnam, Meiho University.
- [6] Cooper, R. D. & Schindler, S. P. (2014). Business Research Methods 12th edn. New York, NY: McGraw-Hill.
- [7] Creswell, J. W. (2007). Five qualitative approaches to inquiry, Qualitative inquiry and research design, 2(3), pp. 53-80.
- [8] CSP, (2016). Country Strategy Paper 2016-2020. United Republic Of Tanzania.
- [9] Dawson, J. F. (2013). Moderation in management research: What, why, when and how, Journal of Business and Psychology, 3(5), 4 67.
- [10] Durdyev, S. and Ismail, S. (2012). Role of the construction industry in economic development of Turkmenistan. Energy Education Science and

Т



Technology Part A: Energy Science and Research, 29(2), pp. 883-890

- [11] Famma, E. and Fench, K. (2000) Forecasting Profitability and Earnings, The journal of business, 73(2), pp 161-75.
- [12] Farouq B. U. (2016), Effect of financial management practices on the business efficiency of small and medium enterprises in Nigeria. Unpublished PhD in Entrepreneurship Jomo Kenyatta University of agriculture and technology.
- [13] Frank, M. Z. and Goyal, V. K. (2003), Testing the pecking order theory of capital structure, Journal of financial economics, 67(2), pp 217-248.
- [14] Fwamba R. S. (2017), Influence of financial management practice on financial performance of sugar manufacturing companies in Kenya. Unpublished PhD in Business administration Jomo Kenyatta University of agriculture and technology.
- [15] Ghadome, M. and Thaeer, S. (2008), The decision to finance and its impact on the company's performance: An Empirical Study on a sample of companies listed on the Amman Stock Exchange Securities, Journal Jordanian Applied Sciences, 7(3), pp 1-24.
- [16] Gitman, L. (2011). Principles of Managerial Finance. 10th Edn., Addison Wesley Publishers.
- [17] Green, C. J., Murinde, V., and Suppakitjarak, J. (2002), Corporate financial structures in India, Centre for International, Financial and Economics Research, 4(2), pp 2-4.
- [18] Hair, J. F., Black, W. C., Babin, B. J. and Anderson, R.E. (2010). Multivariate Data Analysis. 7th Edn., Pearson, New York.
- [19] Hawawini, G., & Viallet, C. (1999). Finance for Executives: Managing for value creation, Cincinnati Ohio: South Western publishers.
- [20] Hillier, F. S. and Lieberman G. J. (2005), Introduction to operations research, 10th Edn., New York: McGrawHill Education.
- [21] Hugo H., Amador M., Aguiar M. and Werning I. (2008), Equilibrium default, Society for Economic Dynamics, 15(2) pp. 15-39.
- [22] Jensen, M., and Meckling, W. (1988), Theory of the Firm: Managerial Behavior, Agency Cost and Ownership Structure. Journal of Financial Economics, 3, pp 305–360.
- [23] Justino, M. (2015), Factors influencing the failure of small enterprises in a selected municipality in Luanda, Angola. Unpublished MBA dissertation Cape Peninsula University of Technology.
- [24] Keynes J. M. (1936), The general theory of employment, interest and money, London: Macmillan publishers.
- [25] Kihaule, A. (2011), Analysis of Determinants of Rural Households Purchase of Micro Health Insurance Plans in Tanzania. Nairobi, Research

Proposal approved and funded by the African Economic Research Consortium (AERC).

- [26] Kitonga,K.G. (2013), The relationship between financial management practices and financial performance in the shipping industry in Kenya. Unpublished MBA project University of Nairobi, Kenya.
- [27] Kombo, D.K. & Tromp, D.L.A. (2009). Proposal and Thesis Writing: An Introduction. Nairobi: Paulines Publications Africa.
- [28] Kothari, C.R., (2004), Research Methodology: methods and techniques. 2nd Edn., New Delhi: New age International (p) Limited Publishers.
- [29] Kwame, K. (2007). Working capital management practices of small firms in the Ashanti region of Ghana. Retrieved from: http://www.ssrn.com
- [30] Leech N. L., Onwuegbuzie A. J., Collins K. M. (2012) Qualitative Analysis Techniques for the Review of the Literature, The Qualitative Report, 17(28), pp 1-28.
- [31] Luvara V., Phoya S., Tesha D., Lyimo K. (2018), Critical factors causing delay and cost overrun in public building projects in Dar-es-Salaam, Tanzania, Paripex indian journal of research, 7(7), pp 23-55
- [32] Macharia K. K. (2015), The relationship between financial management practices and financial performance in the dairy industry in Kenya. Unpublished MBA thesis University of Nairobi, Kenya.
- [33] Makere I. (2017), An examination of challenges for handling Taxation by building contractors in Tanzania, MSc. Dissertation, Department of Building economics, Dar-es-Salaam: Ardhi University.
- [34] Malekela K. N., Mohamed J., Ntiyakunze S. K., Mgwatu M. I. (2017), Risk Factors Causing Variations on Forecasted Construction Cash Flows of Building Projects in Dar-es-Salaam, Tanzania, International Journal of Construction Engineering and Management, 6(2), pp 46-55.
- [35] Malik M. and Rakshit D. (2005), EVA and Traditional Performance Measures: Some Empirical Evidence, The Indian Journal of Commerce, 57(2), pp 32-37.
- [36] Mchome, E. E., (2014). Development of a Model for Improvement of Transport Network in Informal Settlements in Dar es Salaam, Tanzania, PhD Thesis, University of Dar es Salaam.
- [37] Miller, M. and Orr, D. (2009), A Model of the Demand for Money by Firms, The Quarterly Journal of Economics, 80(3), pp 413–435.
- [38] Modigliani, F. and Miller, F. (1961), Dividend policy, growth and valuation of shares, Journal of Business Policy, 4(40), pp 411-423.
- [39] Modigliani, F. and Miller, M. (1958), The cost of capital, corporate finance and the theory of investment, American Economic review, 48(6), pp 261-297.



Volume: 07 Issue: 12 | Dec 2020

www.irjet.net

- [40] Moore, J. and Reichert, A. (1989), A Multivariate Study of Firm Performance and the Use of Modern Analytical Tools and Financial Techniques Interfaces; 19th Edn., Pearson Prentice Hall, New Jersey.
- [41] Muthoni C. E. (2016). The Effect of Financial Management Practices on the Performance of Saccos in Hospitality Industry: A Case Study of Five Star Hotel Saccos in Nairobi. Unpublished MBA thesis United States international university africa.
- [42] Mwita, R. (2013), An Assessment of Challenges Facing Local Contractors when Bidding for Large Roads Works. Masters Dissertation Mzumbe University - DSM Campus Dissertation.
- [43] Myers, S. C. (1984), The capital structure puzzle, The journal of finance, 36(3), pp 16-43.
- [44] Nyerere, M. J. (2016), Achievements, Challenges and Strategies in Building Capacity of Local Contractors; Association of Citizen Contractors Tanzania (ACCT): Proceedings of CRB Annual Consultative Meeting 2016, Dar es Salaam.
- [45] Nyongesa, M.N. (2011). An Examination of the Relationship between Financial Performance and Financial Management Practices of Insurance Companies in Kenya. Unpublished MBA project University of Nairobi, Kenya.
- [46] Orwel, A. (2009), Accounting Basic: What is the Accounting Cycle? IASRI, New Delhi.
- [47] Pandey, I. M. (2010), Financial Management. New Delhi: Vikas Publishing House PVT Ltd.
- [48] Peterson S. J. (2009). Construction accounting and financial management. 2nd Edn., Pearson Prentice Hall, New Jersey.
- [49] Quinlan, C. (2011). Business Research Methods. Hampshire,UK: Cengage Learning EMEA.
- [50] Romney, P. J. (2009), Accounting Information Systems, 11th Edn., Pearson Prentice Hall, New Jersey.
- [51] Sekaran, U. and Bougie, R. (2011), Research Methods for Business: A Skill Building Approach, 5th Edn., New Delhi: Aggarwal printing press
- [52] Shyam-Sunder, L. and Myers, S. (1999) Testing static tradeoff against perking order models of, Journal of financial economics, 16(7), pp 352-420.
- [53] Son, D. D., Marriot, N., and Marriot, P. (2006), Users' perceptions and uses of financial reports of small and medium companies in transitional economies: Qualitative evidence from Vietnam, Quali Res in Acc and Man, 3(30),pp 218 235.
- [54] Sutter K. D. (2017). Financial analysis of the construction industry; Innovation and company performance. A Master of science in complementary studies and business economics dissertation submitted at Ghent University.
- [55] Taherdoost, H. (2017) Determining Sample Size: How to Calculate Survey Sample Size, International

Journal of Economics and Management Systems, 2(7), pp 322-420.

- [56] Tang, S. L. (2015), Construction financial management, 1st Edn., Oxford : Blackwell.
- [57] Torraco, R. (2007), Low-skilled adults in the United States: A case of human resource underdevelopment, Human Resource Development Review, 6(4), pp 343-352.
- [58] Williamson, O. E. (1988), Corporate Finance and Corporate Governance, The journal of finance, 43(3), pp 567-591.
- [59] Zikmund, G. W., Babin, J. B., Carr, C. J. and Griffin, M. (2010). Business Research Methods. 8th Edn., Hampshire, UK: Cengage Learning.