Investment Decisions: How it influence Capital Budgeting Practices

Ikhtiar Ali Ghumro^{*}, Ashique Ali Lashari[†], Inayatullah Bhatti[‡] and Mujeeb-ur-Rehman Abro[§]

Abstract

The aim of this research is to study the investment decisions and capital budgeting practices in manufacturing sector of Pakistan. To examine the investment decisions in manufacturing sector in Pakistan. To determine the capital budgeting practices in Pakistan. Capital budgeting is very important for firm its importance cannot be overemphasize because it has long term benefits for the validity and operational functionality of the firm. Capital budgeting is followed by techniques which are helpful in decision making. In planning process these techniques play key role for choosing worth funding project. These techniques are used to get clear view of proposed projects. Previous studies work on overall financial/non-financial sector according to my limited knowledge there is no specific study in manufacturing sector. This study helps the mangers to take the corrective measures. Questionnaire is conducted by using self-delivery collection method. It was found that the net present value technique is the most preferred by the big size firms companies. Moreover, significant differences between companies of different sizes are identified. In smaller companies, earning and cost comparison are more popular.

Keywords: Investment Decisions, Capital Budgeting Practices, Manufacturing Sector

Introduction

Organizations have two types of the resources one is non-financial resources and second is financial resources. Non-financial resources involve human resources, physical resources, technological, natural resources and intellectual resources are etc. These resources are helpful to utilize the goals of the organization. These all are interlinked with each other. The resources that are physically exist these have some

^{*} Ikhtiar Ali Ghumro, Shah Abdul Latif University, Khairpur, Sindh, Pakistan. Email: mujeeb.abro@salu.edu.pk

[†] Ashique Ali Lashari, Shah Abdul Latif University, Khairpur, Sindh, Pakistan

[‡] Inayatullah Bhatti, Shah Abdul Latif University, Khairpur, Sindh, Pakistan

[§] Mujeeb-ur-Rehman Abro,Shah Abdul Latif University, Khairpur, Sindh, Pakistan

physical shape. The examples of these resources are distribution network, machinery, vehicles or building etc. Physical resources are also called tangible resources. These are used with in the boundary of the organization. These resources are helpful to promote and enhance efficiency of organization. With the passage of time physical resources have different purposes. These might be used for security purpose, these might be seen in organization in different shapes security cameras, equipment, future and fixture, toilet equipment's and safety equipment are most common.

In financial management financing decisions is the process of assessment where the financial manager asses how much and where funding is required in business. Financing decisions are the possible ways for making investment and expenses. There are three possibilities for investors they can borrow, sell share or use existing capital. Financing decisions have two bases one is equity and other is debt. Hence there are two sources where funds can be raised. From these sources different types of the funds are held available. These are bonds, loan, borrowing, debenture, retain earnings or share capital. Capital budgeting is very risky wrong decisions have inverse or irreversible effects. Investor once acquire wrong fixed assets with bearing losses assets cannot be disposed of. These decisions areconsidered more difficult because these are based on future forecasting. As mention above investment decisions are made for long period. That's why it requires future series of investments. Such investment lead uncertainty and risk. Capital expenditure not only effect the present earnings but the future profitability as well. Capital budgeting principles avoid the investors to over or under investment in a fixed asset. That's why investment decisions and capital budgeting gain international importance. Capital budgeting decisions leads large investment. These investments are very important for firms. Investors must plan and control capital investment very carefully. As such globalization improves the living standards of people it also facilitates and communicates the entire world. On the other hand, the globalization also affects the many aspects of the financing decisions making. It is the era of the technology and innovation people require more rapid changes. Technology influence the financial mangers because of the rapidly and speedily changes. Due to these changes the financial managers must think more critically while making an investment decision. All the process of investment decisions need(Megginson and Smart, 2007) high research & development and accurate forecasting for the survival. That's why the role of the financial manager gains more importance over the last two decades. The theory

Journal of Managerial Sciences

Investment Decisions: How...

and practices that was use in past cannot be applicable today because at that time the way of living and the standards of people was limited as per their needs. For the sake of financing firms has option to use debt or equity according to the need of the firm. A firm that has high growth relativelyhave opportunity to avail investment will use debt. Because such type of the firm can generate the enough cash flows to mitigate the risk that is arises from the use of the debt. On the other hand, low growth firm hesitate to use the debt option because such type of the firms has limited resources to repay debt along with interest. That's why, capital budgeting is very important while making financing decision whether to use debt or equity. Capital budgeting practices are used in most of the business. These techniques can be seen when a manger make the financing decisions. However, many of these uses used these techniques and are not familiars with the terminologies.

Literature review

Finance theory suggest several models to evaluate investment project (Schlegel, Frank and Britzelmaier, 2016) and stipulated that purpose of this study was to find relationship between capital budgeting techniques and investment decisions and reviewed that which technique is better. This research was based on questionnaire and collect data was collected from 65 German companies listed in the Frankfurt stock exchange by the help of investor relation department. They collect data by mailing to the management accounting. Secondly, they collect data from finance and accounting professionals. Company size was grouped into portions according to the revenue. They found that NPV is the most frequent technique used by mangers in capital budgeting decisions. They also found that the firm that large size use NPV and IRR while the SMES used the non-discounted firms. In the era of cut throat competition every manger is responsible to maximize the share older wealth this immense competition force to manger to use DCF method. The significance for the choice of the method and size of the company was checked by Mann Whitney U-test. As above mention test group size was tested on the ordinal scale and techniques are dichotomous scale.

Kengatharan (2016) found that there is still inconsistency between the capital budgeting theory and practices. He said that capital budgeting is the behavioral approach. He also concluded that while using the DCF method most commonly NPV, IRR, MIR and DPB are the most commonly used techniques and while using NON DCF method PB and ARR are used most commonly. For conducting these research four criteria was set which cover the methodology research philosophy,

Journal of Managerial Sciences

approach, strategy data collection and analysis. For conducting this study researcher analyses last two decades articles of different journals. The total number of the paper was 363 out of them only 201 research papers were selected. He suggested that there is still gap of capital budgeting information system there is no software product which make accurate decisions for capital budgeting. This study based on longitudinal research.

Schlegel et al, (2016) found that non DCF methods only deal with cost comparison and have no surety of maximization of wealth and argued that these steps are familiar and easier to use. Rayan and Ryan (2002) argued that the drawback of payback period it deals only the shortest period where the investment recover with its initial outlay. Hayward et al. (2016) employed cross sectional survey in this paper they focus on the nature and implication of behavioral beliefs. The survey was taken on the Australian bio technology firms. Total population was 99 and 86 % respondent were CEOs and 12.4 % was company directors. The ages of the firm were 7.5 years. They employed GMM (generalized method of movement) and OLS (ordinary least squares). They concluded that there is heterogeneity while planning ROR and NPV. They found that the ROR technique is more beneficial as compared to NPV. ROR provide the facility for both calculation of NPV and the flexibility of the project. They found that ROR helps to promote more innovations.

Sajid, Sabir and Gillani (2016) they stipulated the relationship between the leverage and investments. For conduct this research they use secondary data. Data was collected from 2009 to 2013 of 30 companies. They use three regression techniques. They apply hausman test for analysis and stipulated that random effect model is closely related with their variables. They found that leverage is negatively affect investments. It indicates that when leverage increase inversely investment will decrease. They conclude that profitability and investment have positive impact when investment increase profitability will decrease but leverage with high ratio is harm full for investment. The main objective of this study was to highlight the impact of leverage on investment plan. They said that while making financing decisions with using debt management should take wised decisions either go for it or not.

Graham and Sathye (2017) they examine that relation between capital budgeting and national culture. They check association across two countries Indonesia and Australia. The purpose of this study was to check the link and influence among culture, literature and techniques. For this purpose, semi-structured interview was conducted. The survey was conducted from listed companies from both countries. Results

Journal of Managerial Sciences

indicate that uncertainty influence capital budgeting technique (uncertainty include political, legal, economic and social influence). They found that uncertainty level is higher in Indonesia as compared to Australia. They stipulated that techniques are selected based on size and complexity and are very useful for a business.

Methodology

The population for this study is consisting upon manufacturing sectors of Pakistan stock exchange. Total 300 questionnaires were distributed by self-collection delivery. Out of this only 240 percent were received. Some questionnaire was not proper filled and containing missing values. These are excluded from sample size. Total sample size was consisting upon 212. For the purpose of data collection, we collect data from CFOs. Primary data is collected (Welman el al. 2005) first time (raw handed data) by this way researcher conduct his study. Researcher collects data from different sources to answer his questions. Data will be analyses through description and inferential model. Descriptive method involves mean, standard deviation, minimum and maximum. In inferential model correlation and regression model will be applied.For conducting research population was 405 out of them 300 distributed. After distribution I collect survey from 240 listed companies. Out of them 212 was selected incomplete data sets are not included in analysis.

Result and discussion

The study covers different variables in depth to understand capital budgeting and investment decisions.

No	Items	Mean	SD
1	"Capital Asset Pricing Model"	3.28	1.465
2	"Other capital market models"	2.69	1.301
3	"Historical returns on the company's stock"	2.93	1.431
4	"Targets set by management"	2.94	1.759
5	"Targets set by investors / owners"	3.78	1.572
N=188			

Table 1: Participant response on determine cost of equity as entire group

Determination of cost of equity

Table 1 part of questionnaire includes five questions. In this table standard deviation and mean of questions are shown as per responses. Table shows that respondents are not much familiar with capital asset pricing model. Mean is 3.28 which mean that respondents are not familiar with this technique. They lie in neutral section. And standard deviation shows the high variation. Other market returns give minimum

Journal of Managerial Sciences

value of mean having 1.431 standard deviations. The range of all item response mean is between 2.69 to 3.78. Table shows that item 5 has highest mean and variation of this question is high.

Table 2. These indicators followed by reporting style of performance on entire company or segment basis

No	Items	Mean		SD
1	Revenues / sales	1.33		.471
2	Return on sales	1.32		.466
3	Profit measures, e.g. EBIT	1.30		.460
4	Value-based measures		1.25	.431
5	Capital returns measures.		1.17	.380
6	Absolute capital measures		1.19	.396
7	Cost of debt		1.15	.359
N=212				

Table 2 part of questionnaire includes seven questions. This table is belonging to question no 1.2.1. The response of mean values lies between 1.15-1.33, it shows Pakistani firms reporting standard. There are two options are provided to respondents. The items that are shown in figure 4.1.2.9 either reported as entire company group wise or segments wise. Item 1 has high mean it shows that revenue or sale reported in annual reports according to business units or segments. Standard deviation has also high variation at this point. Item 7 lies at low mean it also indicates the same result like item number 1. Variation at this point is low.

Table 3. Company describe clear cut targets for capital return as entire company

Determination of cost of capital percentage	Respondents	Percentage	Cumulative
Yes	133	62.7	62.7
No	79	37.3	100

Table 3 shows number of respondents and percentage of their portion. In this table 62.7% respondents got capital return targets.

Table 4. Company describe clear cut targets for capital return as entire company

No	Items	Mean	SD
1	Using the calculated cost-of-capital rate	4.32	1.178
2	Specification by management	3.30	1.714

Journal of Managerial Sciences

Invest	ment Decisions: How	Ikhtiar, Ashio	<u>que,Bhatti a</u>	<u>&Mujeeb</u>
3 4	Specification by investors / owners Specification by Controlling / department	Finance	2.88 2.21	1.775 .1.567
N=133	-			

Table 4 part of questionnaire includes four questions. The response of mean values lies between 4.32–2.21, it shows Pakistani firms reporting standard. The items one is above mean. It shows that calculation of cost of capital is the most favorite technique for Pakistani manufacturing sectors. Respondent give high relevance with thistechnique. Variation at this point is also high. Item four has lowest mean it shows below mean. Variation is also high at this point.

Table 5. Company describe clear cut targets for capital return as segments

segments			
Determination of cost of			
capital	Respondents	Percentage	Cumulative
percentage			
Yes	86	40.6	40.6
No	126	59.4	100

Table 5 shows number of respondents and percentage of their portion. In this table 40.6% respondents Company describe clear cut targets for capital return as segments. And 59.4% respondent does not familiar with it.

Conclusion and Limitation

This research examines investment decisions and capital budgeting practices in manufacturing sector of Pakistan. Larger size firms use the DCF and smaller size firms use NON-DCF techniques. Smaller size firms use NON DCF techniques due to their limited capital. Every share holder tends to enhance his wealth. This makes huge pressure on the CFO's. The chased capital budgeting techniques are more closed to organization. The companies having the size from 1501 to 2000 million rupees use the NPV with strong identical tool. There are fewer firms that give free hand to manger to choose best one technique. But most of the mangers rely what statement pass from his owner for investment. Our result shows that net present value technique is more widely used by CFO's in DCF methods. In NON-DCF technique earning comparison is most preferred techniques. Internal rate is second most

Journal of Managerial Sciences

technique in NON-DCF methods. This study concluded that NPV is highly preferred technique and internal rate is less preferred technique.

This sample was limited to small size of Pakistani companies it might not cover entire population. This issue is not only existing in Pakistan, but the other countries and these practices are varying from country to country, person to person and firm to firm. It should be conducted from different countries. Furthermore, this research can be enhancing by adding upcoming influencing factors that affect capital budgeting techniques.

References

- Atkeson, A., & Cole, H. (2005). A dynamic theory of optimal capital structure and executive compensation (No. w11083). National Bureau of Economic Research.
- Bancel, F., &Mittoo, U. R. (2014). The Gap between the Theory and Practice of Corporate Valuation: Survey of European Experts. Journal of Applied Corporate Finance, 26(4), 106-117.
- Baum, C. F., Caglayan, M., & Talavera, O. (2010). Parliamentary election cycles and the Turkish banking sector. Journal of Banking & Finance, 34(11), 2709-2719.
- Bennouna, K., Meredith, G. G., &Marchant, T. (2010). Improved capital budgeting decision making: evidence from Canada. Management decision, 48(2), 225-247.
- Brigham, E. F., &Ehrhardt, M. C. (2002). Financial management: Theory & practice. Cengage Learning.
- Bryman, A., & Bell, E. (2011). Business research methods. 3rd edn.
- United Kingdom: Oxford University press.
- Campello, M., 2006. Debt financing: Does it boost or hurt firm performance in product markets? Journal of Financial Economics, 82(1): 135-172.
- Chaudhary, D. K. (2016). Capital Budgeting Practices in Beverages Industries in Nepal. International Educational Applied Scientific Research Journal, 1(1).
- Daunfeldt, S. O., &Hartwig, F. (2014). What determines the use of capital budgeting methods? Evidence from Swedish listed companies. Journal of Finance and Economics, 2(4), 101-112.
- De Andrés, P., de Fuente, G., & San Martín, P. (2015). Capital budgeting practices in Spain. BRQ Business Research Quarterly, 18(1), 37-56.
- Du Toit, M. J., &Pienaar, A. (2005). A review of the capital budgeting behaviour of large South African firms. Meditari: Research Journal of the School of Accounting Sciences, 13(1), 19-27.
- Emery, D.R., Finnerty, J.D. and Stowe, J.D. (2004) Corporate Financial Management, Pearson/Prentice Hall.
- Farrukh, S., Areal, N., & Rodrigues, A. A cross Sectional comparison of Capital Budgeting Practices in Pakistan.
- Graham, P. J., &Sathye, M. (2017). Does National Culture Impact Capital Budgeting Systems?. Australasian Accounting Business & Finance Journal, 11(2).

Journal of Managerial Sciences

- Gupta, D., &Pradhan, B. B. (2017). Capital Budgeting Decisions in India: Manufacturing Sector Versus Non-Manufacturing Sector. IUP Journal of Applied Finance, 23(1), 69.
- Halov, N., &Heider, F. (2011). Capital structure, risk and asymmetric information. The Quarterly Journal of Finance, 1(04), 767-809.
- Hartwig, F. (2012). The use of capital budgeting and cost of capital estimation methods in Swedish-listed companies. Journal of Applied Business Research (JABR), 28(6), 1451-1476.
- Hayward, M., Caldwell, A., Steen, J., Gow, D., &Liesch, P. (2016). Entrepreneurs' Capital Budgeting Orientations and Innovation Outputs: Evidence from Australian Biotechnology Firms. Long Range Planning.
- Hermes, N., Smid, P., & Yao, L. (2007). Capital budgeting practices: A comparative study of the Netherlands and China. International Business Review, 16(5), 630-654.
- Jensen, M. C. (1986). Agency costs of free cash flow, corporate finance, and takeovers. The American economic review, 76(2), 323-329.
- Johnson, D. W., & Johnson, R. T. (1999). Making cooperative learning work. Theory into practice, 38(2), 67-73.
- Johnson, N. B., & Pfeiffer, T. (2016). Capital Budgeting and Divisional Performance Measurement. Foundations and Trends in Accounting, 10(1), 1-100.
- Kalyebara, B. and Islam, S.M.N. (2014) Corporate Governance, Capital Markets, and CapitalBudgeting.
- Kengatharan, L. (2016). Capital Budgeting Theory and Practice: A Review and Agenda for Future Research. Applied Economics and Finance, 3(2), 15-38.
- Nadia Umair, (2015), Review of Capital Budgeting Techniques and Firm SizeJournal of Finance and Accounting, 6(7).
- Ryan, P. A., & Ryan, G. P. (2002). Capital budgeting practices of the Fortune 1000: how have things changed?. Journal of business and management, 8(4), 355.
- Sajid, M., Mahmood, A., &Sabir, H. M. (2016). Does Financial Leverage Influence Investment Decisions? Empirical Evidence From KSE-30 Index of Pakistan. Asian Journal of Economic Modelling, 4(2), 82-89.
- Saunders, M. N., & Lewis, P. (2012). Doing research in business & management: An essential guide to planning your project. Pearson.

Journal of Managerial Sciences

- Schlegel, D. (2014). A comparison of global empirical results on company cost-of-capital practices. International Journal of Business and Globalisation 10, 12(1), 53-62.
- Schlegel, D., Frank, F., &Britzelmaier, B. (2016). Investment decisions and capital budgeting practices in German manufacturing companies. International Journal of Business and Globalisation, 16(1), 66-78.
- Sekaran, U., &Bougie, R. (2016). Research methods for business: A skill building approach. John Wiley & Sons.
- Viviers, S., & Cohen, H. (2011). Perspectives on capital budgeting in the South African motor manufacturing industry. Meditari Accountancy Research, 19(1/2), 75-93.
- Welch, I. (2004). Capital structure and stock returns. Journal of political economy, 112(1), 106-131.
- Welman, C., Kruger, F., & Mitchel, B. (2005). Research Methodology. Oxford University Press, Cape Town, 3.
- Zubairi, H. J. (2008). Capital Budgeting-Decision Making Practices in Pakistan

Journal of Managerial Sciences