IS TRAINING A SUNKEN COST?

Yahya Alshehhi¹

¹Károly Ihrig Doctoral School of Management and Business, University of Debrecen, Debrecen, Hungary. yahya.alshehhi@econ.unideb.hu

Abstract Training investment tends to portray diverse advantages for any company, regardless of its cost-effectiveness. The decision for training depends on the utilization of organizational benefits. The aimed of this study to investigate the relationship between decision of training investment and the theory of cost in perspective of accounting and economics. The foundation of collecting data was a secondary resource and employed analyzeing the previous researches as methodology approach. The study found the decision of investing in training is likely depended on opportunity cost concept as a strategic tools to gain competitive advantage and benefits in economicst view. More than that a framework and definition term created regarding a notable negative relationship between sunken costs and turnover.

Keywords: Training investment; decision making; cost theory; sunk cost; company turnover; sunken training cost.

JEL classification: D03; D21; M53

1. Introduction

Training can be a sunken cost even in one way. When a training investment is in such a manner that it is constantly done to replace a higher rate of turnover ratio then it becomes a sunken cost. It is important to ensure that a balance between turnover ratio and training investment is achieved for the avoidance of training becoming a sunken cost (Noe, 2010). As much as the individual cost relates to knowledge and commitment, they contribute significantly to determining the sunken cost of any organization. Individual capital is related to any organizations value, especially regarding the procedures, routines, systems and technologies.

2. Litureture review

Training (Definition)

Training often referred to as organizational training, is teaching or providing a person usually an employee of a particular organization with the required and necessary skills and knowledge that helps him or her meet the organization's goals, values and objectives (Noe, 2010).

Benefits of training

Organizational training ensures an employee equips himself or herself with the outstanding capabilities for improved productivity and performance. It is evident that training provides the best determinant factors for the establishment of steadily

sunk cost since it determines turnover (Ahmed Al-Dujaili, 2013). These adjustments are vital for the performance of the organization and, therefore, their mastery boosts the competitive advantage of the organization. Furthermore, training is a mechanism of creating intellectual capital that is important in the advancement of any organization. Noe (2010) asserts that training improves self-motivated creativity that correlates with the performance of any organization.

Expectations from training

According to Ahmed Al-Dujaili (2013), the expectations of training are diverse depending on the scope and type of organization as well as the organizational structure. It is notable that many companies are continuing to involve their employees in higher-leverage training with an expectation of meeting and exceeding the business goals and objectives. Likewise, these trainings are geared towards creating an outstanding instructional design process that benchmarks the organization in a direction aimed at competing in the international market.

Secondly, investors presume training as a mechanism of developing competitive skills that help in outdoing new entrants into the market (Forrester, 2012). As much as the decision for training depends on the financial situation of the organisation, most companies expect it as a mechanism of attracting more customers by creating the power of positive engagement. As much as training is good for any organization in its chain to performing better, and effectively, it also contributes significantly to diverse losses if not managed well (Noe, 2010).

Investment training and how it is recorded in the books of account

Training is recorded as an increased value of intangible assets as well as the human capital. Ideally, training is an intangible asset, and human capital continues to attract more companies, as it is perceived as a method of gaining an advantage over competitors (Forrester, 2012). The reason training is recorded as intangible is the fact that it increases the organization's value. However, it also considers other elements such as customer capital, intellectual capital and social capital. Nevertheless, all these subsidiary assets relate to training that forms the core determinant. Likewise, human capital constitutes diverse attributes, life experiences, inventiveness, enthusiasm and knowledge. According to Forrester (2012), boosting of the human capital require training resulting in its recording in the books of accounting and economics as intangible assets. Any organisation with outstanding human capital tend to have a greater market share and continuous penetration into the market.

Training cost in perspective of accounting and economics

Training costs in the accounting perspective refer to a combination of gains and losses that form part of organizational business operations. In short, it provides the comparison of one aspect of economic action with another (Noe, 2010). The determination of these costs depends on money, time and resources. Accounting comprises of costs such as a variable cost, sunken cost, and opportunity cost. The determination of these costs depends on the other related factors such as training investment.

From an economic perspective, training investment decision investment is only worth venturing in if the results of measuring the business costs, with the inclusion of opportunity costs and ignoring sunken costs, gives a profit of zero or better (Liang, Lee and Tung, 2014). However, this principle does not apply in measuring the performance regarding accounting profit.

Cost Theory (Definition)

The definition of costs differs slightly from accounting and economics. In the accounting perspective, cost refers to the value of money already used up in the production process and, therefore, not available for any other use (Forrester, 2012). Under this perspective, the amount is only recoverable if the amount of money expended provides additional accounts of profit. In the economic perspective, cost refers to gains and losses in money, resources and time of one course in comparison with another. Dwomoh (2015) further notes that the comparison involves gains and losses that result from taking an action or from an action already taken. The major difference in these perspectives is that economic cost also includes opportunity cost.

Types of costs

In economics and accounting, there are diverse costs. An opportunity cost is a substitute cost that requires earlier prediction for the effective pursuance of a particular action. It incorporates certain benefits to businesses. An opportunity cost is an alternative cost for pursuing a given accomplishment. Opportunity cost determines the level of output (Karevold and Teigen, 2010).

The second one is sunken cost. A sunk cost is one that is already used in business operations and cannot be re-used. A sunk cost draws a considerable distinction from other impending costs such as R&D expenses and inventory costs. Sunk costs are autonomous of other future events (Peltokorpi, Allen and Froese, 2014). Moreover, sunken costs are an indication of the cost that is already incurred and there are no any other means of reversing them. Training investment decision depends on these opportunity costs and sunk costs to maintain a balance in the overall performance of an organisation.

The variable cost is also significant in economics and accounting. Variable costs are those costs that fluctuate depending on the volume of production of an organisation (Forrester, 2012). For instance, as the production increases the variable costs rises and as the production decreases variable cost also reduces. On the other hand, there is also fixed costs which do not change with the changing production volume. Often, it involves costs of organizational assets.

Term cost as recorded in accounting and economics

Term cost entails measurements related to accounting principles with limited implications for managerial perspectives of businesses. For example, accounting standards assert for a balanced in the long-lived assets; the organisation should spread the cost over the life of the asset. Financial accounting constitutes the particulars on depreciation (Noe, 2010). However, business perspectives,

especially training investment decisions involve all the expense incurred from the time of the asset acquisition if borrowing was essential in obtaining the asset. Karevold and Teigen (2010) note that there are certain term costs that are considered irrelevant in the decision making in the perspective of accounting. For example, the costs incurred by the owner of an asset, such as time and effort are considered as tax return and are only relevant to the owner and the not the person acquiring the asset. Therefore, such costs are considered as sunken costs, although they only apply to the owner of the business in the process of deicing on training as a scheme of improving performance.

Definition of sunk costs

A sunk cost is an incurred cost that cannot be recovered. It differs substantially from other future costs such as R&D expenses and inventory costs (Wang & Yang, 2001). Sunk costs independence makes them unique to other costs. Sunk costs involve activities that connect with corporate and governmental innovation through the R&D scheme. Roth, Robbert and Straus (2014) outline that the aim of the sunken cost is to build the R&D of an organization through the provision of innovative ideas and talents.

Factors that affect sunk costs on economic decision-making

Familiarity with sunken costs and decision-making

Familiarity, which relates to sunken costs, has a significant impact on the economic decision making, especially regarding training investment (Khawsaad, 2013). Nevertheless, that impact differs between the progress of decision making and utilization. It is worth noting that there has been a consistent confrontation of the utilization decisions of the decision makers on a daily basis. In fact, some of the decision makers do not even understand that there are making an economic decision, and therefore, do not apply to the domain-specific knowledge.

Time delay in sunk costs and decision-making

The relationship between sunk cost, opportunity cost and training decision making is also evident in the domain of time (Karevold and Teigen, 2010). The time delay in the process of planning for other training sessions is itself a sunk cost as it limits that progress of other operations. Time also has a significant impact on other costs such as opportunity costs that also varies depending on the fluctuations of sunk costs. Furthermore, time contributes considerably to mental accounts, with training investment in particular. For instance, the delay in allocation of funds for subsequent trainings may result in irrelevancy of the training progress resulting in increased sunk costs. Consequently, this is likely to create significant impact on the decision making process. The impact of time on sunken assets and decision making comprise of two important economics aspects, that is, the prospective accounting and coupling (Roth, Robbert and Straus, 2014).

Company Turnover (Definition)

Turnover is the act of replacing one employee with another employee (Peltokorpi, Allen and Froese, 2014). The cause of replacement can be due to various reasons such as retirement, termination of contract, transfers, resignation, death and interagency. Therefore, to cater for the shortage in the workforce, the organization is likely to opt for replacement resulting in a turnover.

Effects of turnover in an organization

First, turnover results in an expensive training of new employees on the skills and talents required for the smooth running of the organization. The process of carrying out an interview as well as job postings to find another new qualified person is always hectic (Khawsaad, 2013). In turn, an organization is likely to incur extra costs in finding the right person as well as ensuring that these people train to acquire the necessary knowledge. Often, people who have worked in the organisation for long retire or rather resign without a plan resulting in such negative implications (Roth, Robbert and Straus, 2014). Furthermore, coupling tends to moderate the impact of payment on consumption in such a manner that there is an attenuation in the consumption, utility as well as buffering of the pain of paying for the consumption pleasure.

Second, the concentration of the analysis on the performance of employees further links turnover to a training investment decision. From the results, it is evident that there is a notable increase total expenditures as the amount of employees' replacements increase. As outlined by Dwomoh (2015), the variance in Net Property together with New Capital Expenditures at the same time is an indication of the relationship between capital investments and labor. Ideally, the size of labor, which depends on training, determines the turnout. Nevertheless, Peltokorpi, Allen and Froese (2014) records that creating a sufficient reason for the relationship has been still not effective since additional employment and training results in reduced turnover.

The rate of turnover used

Exploring the rate of turnover uses U.S. Census Bureau's annual data. The data which majorly focus on the entry and exit of employees in the industry in the United States provide a close understanding of the turnover rate which is presently at 12% (Dwomoh, 2015). The review of the turnover rate involves the perspectives of economics and accounting. Understanding turnover ratio builds the relationship of sunken costs and turnover entails the consideration of two different sunk costs' proxies such as the Total Capital Expenditures for Structures as well as Equipment for Companies with Employees.

The relationship between training investment, sunk costs and turnover

According to Noe (2010), the normative principles of economic decision-making are dependent on the sunk cost effect. As much as some economists assert that education and training are likely to reduce the incidence of sunken cost effect, skill acquisition and analogical reasoning elaborate that training only influences

superior knowledge storage, more accurate problem-solving skills, and retrieval abilities. Furthermore, the access of knowledge differs from an expert to another limiting the significance of education and training in solving the issue of sunken costs.

3. Discussion and summary

Noe (2010) posits that training investment decision is an aspect of intellectual capital accounts that relates to creativity. Even though the context of the training investment account is difficult to understand, it provides a link to various determinants of business capital such as opportunity costs and sunken costs. The financial structure together with the investment decision-making entails distinct costs such as financial capital, structural assets as well as individual capital, which are also the key determinants of sunken costs and opportunity cost.

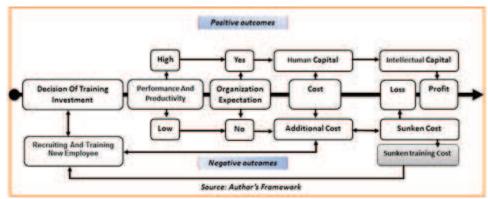


Figure 1: Sunken Training Cost's Framework

Source: The author's framework.

The author's framework above (Figure 1) has two dimensions. The above of center crossing line is representing the positive outcomes, and the below is representing the negative outcomes. The framework shows the relationship between decision investment training and other facets that regulate business costs. It represents the author's idea of how sunken cost influences decision training investment. Notably, recruiting a new employee as presented in above contributes to additional costs such as human capital and intellectual capital that results in a loss of an organization. It is important for any organization to limit the incidences of guitting a given job position as it results in unwanted additional starting costs of training. An extensive and consistent recurring of such costs contributes to other components such as reduced performance and productivity. Furthermore, the organizational expectations go down to an extent that it results to losses. The process of recruiting and training a new employee contributes specifically to sunken training cost. The continuous existence of such costs sums up in the long run, contributing to the entire organizational sunken costs. Therefore, training investment significantly contributes to sunken costs.

It is worth noting that at times a training investment can be a sunken cost if in the process of turnover, the new employee is incapable of meeting the organizational goals and objectives (Karevold and Teigen, 2010). It is evident that some of the new employees in an organisation are likely to incur adverse cases of unproductivity limiting the operational systems of the organisation. The authors assert that the organisation will be not in a position to meet its other systems resulting in unbalanced management. Under such circumstances, training investment becomes a sunken cost.

In general, there is a notable negative relationship between sunken costs and turnover. The aggregated sample of turnover together with sunk costs shows a negative coefficient depicting a negative relationship. Thus, sunken training cost defined as The continuous existence of such costs sums up in the long run, contributing to the entire organizational sunken costs in help by high ratio of job turnover and the employee not meeting oragnazition's goals and objective after been trained.

Chung (2015) posits that an introduction of opportunity cost in the regression results in a controlled size of the number of employees in the turnout, making it a significant element. In fact, opportunity costs have a significant positive effect on controlling the size of any industry as well as its decision-making. Therefore, for efficient decision making, particularly in training investment, it is important to incorporate business opportunity cost as it makes a significant contribution to balancing turnover and sunk costs. It is important to note that the existence of any outstanding business performance depends on its opportunity cost as a strategic tool for gaining competitive advantage (Khawsaad, 2013).

4. Conclusion

Decision training investment, just as presented in the framework is dependent on other factors including sunken costs. Companies with higher sunk costs tend to experience more volatile profits and higher turnover. Further, these companies tend to experience lower training investment decisions. Also, their opportunity costs are always low as they are not able to balance their turnover and sunk costs. For competitive advantage, it is vital for any organisation or organisation to maximize its present value, especially on entry costs such as turnover and opportunity costs. On the other hand, that organisation needs to focus on scraping values unforeseen expenditures such as sunk costs. Nevertheless, for effective decision-making, it is important to consider all the economic and accounting costs. The existence of lower turnover together with lower opportunity depicts the inability of an organisation to make a positive decision on investing more in training as it is likely to result in adverse consequences.

5. Acknowledgements

I would like to express my true appreciation to my advisor Prof. Dr. Nabradi, Andrus, the Director of the Institute of Applied Economics and head of Department of Business Economics, Faculty of Economics and Business, University of

Debrecen. For the continuous support of my Ph.D study and related research, for his patience, motivation, and immense knowledge.

References

Ahmed Al-Dujaili, M.A., 2013. Study of the relation between types of the quality costs and its impact on productivity and costs: a verification in manufacturing industries. *Total Quality Management & Business Excellence*, 24(3-4), pp.397-419. Chung, M., 2015. An Experimental Study on the Sunk Cost Effect in Decision Making. *The Korean Academic Association of Business Administration*, 28(10), pp.2717-2734.

Dwomoh, G., 2015. The Relationship Between Organizations' Acquired Knowledge, Skills, Abilities (SKAs) and Shareholders Wealth Maximization: The Mediating Role of Training Investment. *The Journal Of Investment Management*, 4(5), pp.171.

Forrester, D.A.R., 1967. The costs and benefits of industrial training. *Education+Training*, 9(2), pp.60-65.

Karevold, K.I. and Teigen, K.H., 2010. Progress framing and sunk costs: How managers' statements about project progress reveal their investment intentions. *Journal of Economic Psychology*, *31*(4), pp.719-731.

Khawsaad, P., 2014. Individual Investment and Training Investment Decision. *Available at SSRN 2489519*.

Rong-Da Liang, A., Lee, C.L. and Tung, W., 2014. The role of sunk costs in online consumer decision-making. *Electronic Commerce Research and Applications*, 13(1), pp.56-68.

Noe, R.A., 2010. Employee training and development. McGraw-Hill/Irwin.

Peltokorpi, V., Allen, D.G. and Froese, F., 2015. Organizational embeddedness, turnover intentions, and voluntary turnover: The moderating effects of employee demographic characteristics and value orientations. *Journal of Organizational Behavior*, 36(2), pp.292-312.

Roth, S., Robbert, T. and Straus, L., 2015. On the sunk-cost effect in economic decision-making: a meta-analytic review. *Business Research*,8(1), pp.99-138.

Wang, X.H. and Yang, B.Z., 2001. Fixed and sunk costs revisited. *The Journal of Economic Education*, 32(2), pp.178-185.