Management Decision Process and Accounting Instruments Used in Decision Analysis

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Abstract

The research carried out in this article is a Behavioral Accounting Research, based on the following approach: How do individuals react to various issues in the field of accounting? The main purpose of this type of research is to describe the current decision-making behavior, to evaluate the quality of this process, as well as to develop and test theories in the sphere of psychological processes, which determine the behavior. Therefore, the content of this article will be based on the deductive approach, starting from theory to practice, with some research trends designed to verify the extent to which certain theoretical aspects mentioned above are confirmed by the practice in the field.

Key words: accounting, decizional process, risk mnagement
J.E.L. classification: B26, G38

1.Introduction

Many times tens discussions appear between those who consider that be best decisions are taken based on numerical calculations, on some templates of past events and those who base their decisions on more subjective degrees of confidence related to the unsure future. This controversy has not yet found its solution. The issue comes down to each person's vision on how the past conditions the future. The future cannot be quantified, because it is an unknown (Bernstein P., 2014). The individual has always wanted to project the future based on the present or based on past experiences. Any decision related to risk results in two distinct elements and at the same time, indissolubly linked: the objective reality and the subjective vision about the value of what can be gained or lost, as a consequence of that decision. Objective calculations, as well as the degree of confidence, are essential elements; none of them are adequate without the other. "The value of our expectation always signifies something in the middle between thebestwecan hope for and theworstwecan fear" (Hacking, 1975, p. 144), "The Risk of losing any sum is the reverse of Expectation; and the true measure of it is, the product of the Sum adventured multiplied by the Probability of the Loss" (Abraham de Moivre, De Mensura, 1711). In an economy based market, information represents a force that gives powers of decision to those who have it, ever if it does not represent the absolute truth. One of the most respected mentors in business, Warren Buffett said: *„It takes 20 years to build a reputation and five minutes to ruin it. If you think about that, you'll do things differently."* and it seems that it is true. In the current economy, in a world developed from an information technological point of view, you are a click away of success or failure. If we were to think about what Buffet said, the most important asset of an organization is its reputation and among the elements that influence this reputation we find: the quality of products (40%), business grounds (34%) and social responsibility (56%).

2.Theoretical background on the researched topic

Practices regarding decision-making processes have been for a long time tackled in the academic and practitioner literature (Behram, 2012, p.733). The benefits requested went beyond simply reducing the risk by extending performance improvements throughout the company (Grable et al., 2009, p.396). Numerous studies have shown the need to develop risk-based decision models;

Azuma et al. (2006) and Endsley et al. (2007). Moreover, the need for the development of decision models that can describe the risk attitude of people from a systematic point of view is felt (V. Sankaranarayanan, et al. 2007, p.256), also (Cordell, 2002, p.30) and (Watts et al., 2000, p.95).

3. Research methodology

The research is part of a positivist scientific approach, of course not being deprived of some critical and interpretive ideas that aim to explain different concepts, but also to highlight possible solutions to the identified problems. For the scientific examination of the problems and to achieve the objectives and the proposed goals we will use the following research methods:

- *the analytical method* will be used to conduct an analysis of the theoretical approach of decisions and their role in the decision-making process
- *qualitative and quantitative research method* by collecting data
- *the method of induction and deduction*

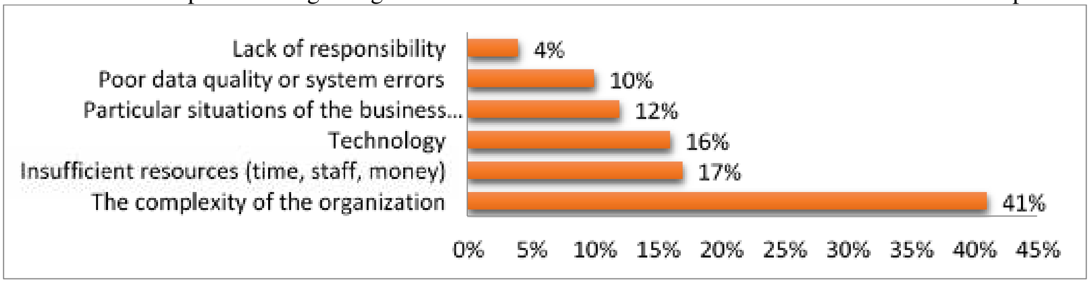
4. The implications of globalization on the decision-making process

The sectorial information enjoys an increasing interest from the creditors and analysts due to the fact that it allows to assess the development strategy and the evolution of the results of the multi-activity group, offering the support of the cross-sectorial comparisons at international level. The information must be prepared, audited and disseminated in accordance with the highest quality standards regarding: accounting, financial and non-financial reporting and auditing. Developing the concept of risk management at the organization level by implementing work procedures specific to each department, supporting internal control and internal audit systems will ensure the identification and control of the risks faced by the entity, in order to achieve the proposed objectives. The audit is required annually by an independent auditor, in order to provide an objective and neutral guarantee on the financial statements that have been prepared and presented by the entity. The channels for disseminating information ensure, in this way, the correct and timely and efficient access of users to relevant information.

There are studies carried out in different countries, studies that have shown that there are considerable differences regarding the decision system adopted by organizations. Thus, in the UK, top managers do not have sufficient knowledge to make decisions about, for example, launching a new product. They leave this decision responsibility on the shoulders of marketing specialists. On the other hand, in France, general managers have a multilateral training and therefore prefer to take responsibility for decisions. The Nordic countries focus on the quality of the production and the technical aspects and less on the managerial aspects and the Japanese when making an important decision involves everyone in the organization, who will be affected by it. The main motivation is the tendency to globalize the activities of multinational companies, the global company being characterized by economies and by an organizational culture beyond the national cultures (Filip, 2012, p.116).

CFO Europe Research Services applied a series of questionnaires to approximately 193 directors of European companies. All respondents came from companies with more than $ 750 million in annual worldwide revenues. The purpose of this study was to highlight the quality of managerial decisions. 75% of the managers of the companies want the financial department of the entity that they manage to offer more support in making decisions and focus less on the actual processing of transactions. As can be seen in Chart no.1 in the top of choices regarding the barriers affecting the financial information presented later to the managers there are:

Chart no. 1. The top choices regarding the barriers that influence the financial information of the companies



Source: processing by Management information and performance: CFOs face new demands for high-quality data that drives decisions

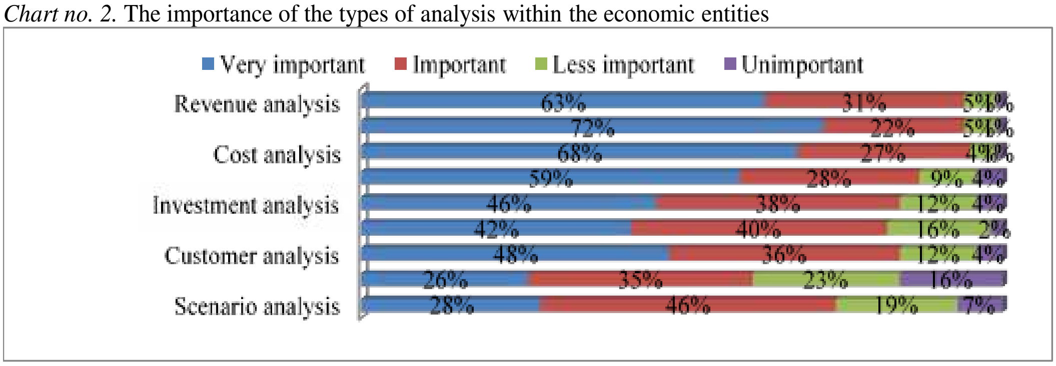
Therefore, it can be observed that the relevance of the financial information presented to the managers can be affected first of all by the size of the respective organizations, followed by the lack of resources such as the personnel, the money and even the time required to submit the reports to the decision maker. In the last place, with only 4% there is the lack of responsibility of the staff. Because the economic decisions are influenced to a large extent by the accounting decisions in the table below, we presented the accounting decisions, their constraints and the methods of adoption (Necula Sabina et al. 2013, p.15).

In the Anglo-Saxon vision, the financial-accounting analysis allows the stakeholder to assess the degree of profitability and risk of his placement. Starting from the idea that the capital market is efficient and transparent, the economic entities will not be able to falsify, through accounting artifices, the value of the equities since the financial statements are only sources of information for the investors. As any economic entity is considered to be wealth creator, performance analysis should not be limited only to financial profitability and an expansion on economic profitability will be pursued. (Chart no.2)

In Germany and France, the analysis of the results is accompanied by the study of the evolution of added value, and some German entities present besides the ordinary financial statements also the picture of the added value.

Comparing the organizations in Eastern Europe with those in the West in terms of performance indicators, it has been established that 50% of companies in the West use working capital as the most relevant performance indicator. On the other hand, only 30% of companies in Eastern Europe do this, focusing in particular on turnover.

Chart no. 2. The importance of the types of analysis within the economic entities



Source: processing by Management information and performance:CFOs face new demands for high-quality data that drives decisions

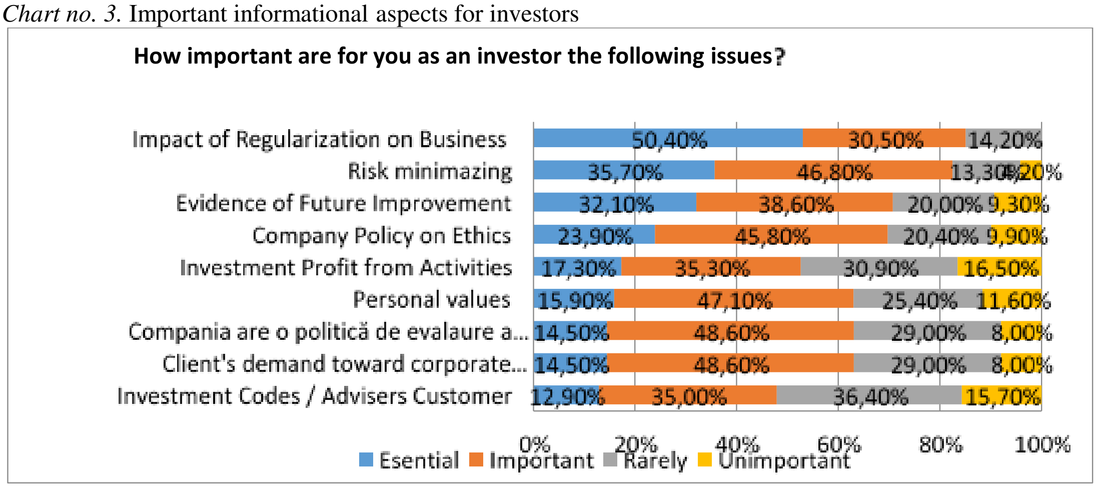
A study conducted by the Association of Chartered Certified Accountants (ACCA) reveals that investors are skeptical about the information provided by companies. The main conclusions of the study included (Financial Audit Magazine, Year XI, no. 104 - 8/2013):

- after the financial crisis of 2007, 69% of investors became more skeptical about the information provided by companies;
- 63% give more confidence to the information generated outside the company;
- 63% consider that the management has too much authority over the reported figures;

- 63% believe that the volume of information provided by companies has encouraged "hyper-investments";
- 46% believe that mandatory quarterly reporting should be abandoned;
- 93% expressed their support for the concept of integrated reporting.

Erste& Young, one of the world's leading audit firms, has published a study, "Tomorrow's investment rules: global survey of institutional investors on non-financial performance", about the value of non-financial information for investors. The study identifies the most important trends and practices in evaluating information on corporate performance in environmental, social and corporate governance. (Chart no.3)

Chart no. 3. Important informational aspects for investors

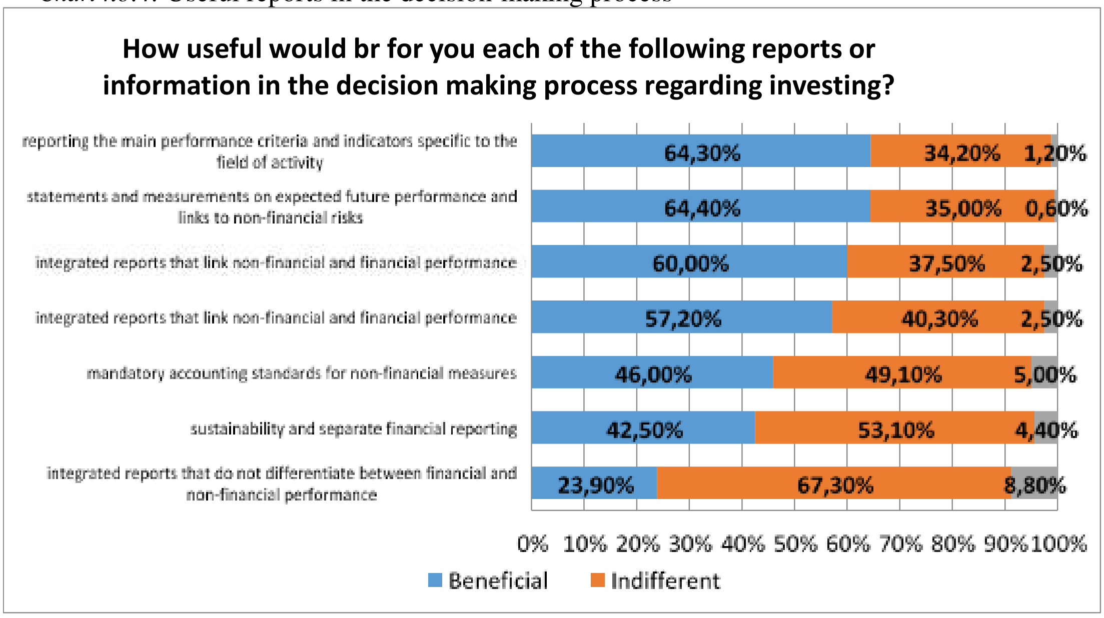


Source: processing by Erste&Young

Most of the surveyed investors use the non-financial information of the companies when evaluating the return on assets.

One of the most important reasons they do this is that non-financial information allows them to anticipate and reduce the risks associated with investments.(Chart no.4)

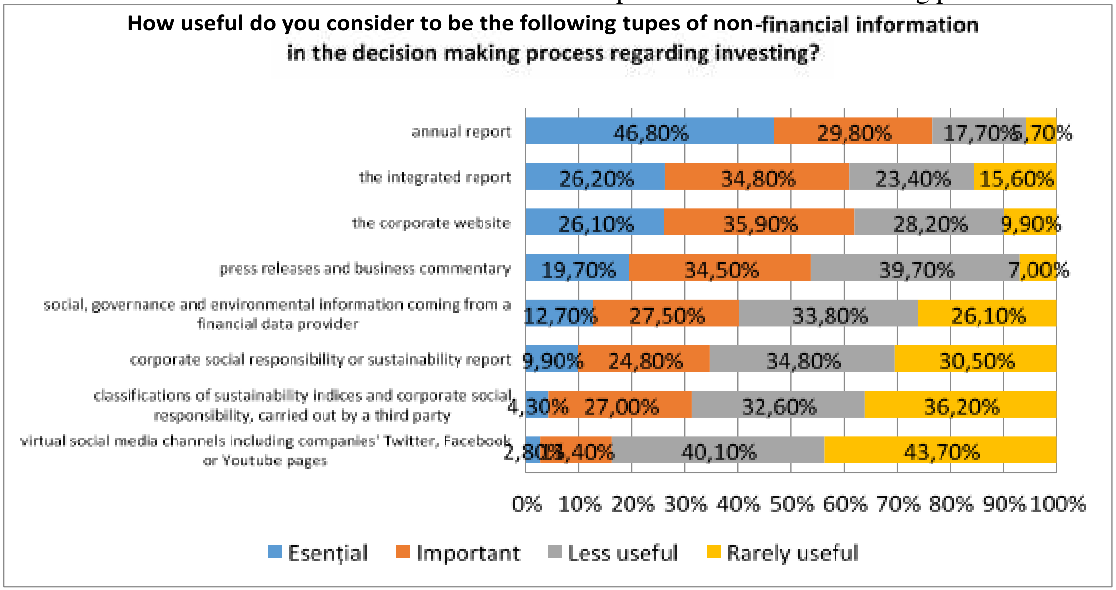
Chart no.4. Useful reports in the decision-making process



Source: processing by Erste&Young

Among the aspects that investors are very careful about are corporate governance, the strategy by which the company aims to create long-term value, but especially the data relevant to the field in which it operates "material data". (Chart no.5)

Chart no. 5. The usefulness of non-financial reports in the decision-making process



Source: processing by Erste&Young

Another problem that arises in relation to the choice of informational decision support systems is: *to what extent do they depend on a technological or organizational determinant?* The question that arises is whether the technical performance of electronic products, and therefore the potential of the information system, is really an advantage for the entity or are they generating contradictions that require the choice of standard models? It should not be overlooked that, the entity's networks are created thanks to the potential of new information and communication technologies, and that the technology does not condition, but even supports the new elections, that the development of strategies for collaborations and partnerships may be the result of the possibilities made available by the informational systems. Indeed, the externalization of some activities requires the elaboration of the organizational procedures in order to ensure the coordination of the activities.

In practice, it has been observed that European financial analysts are increasingly using market-oriented methods, trying to take into account factors such as the geographical distribution of turnover and the state of the sector. To meet this idea come also the International Financial Reporting Standards (IFRSs) that wish to ensure comparability between the financial statements of the different economic entities and to overcome the difficulties that arise.

5. Conclusions

In summary, the new trends in risk management in decision making are largely related to the so-called dual decision-making model in which rational analysis is combined with intuition. A variety of terms are used by many theorists and practitioners in the field, including quasi-rationality, conscious, subconscious, or rational and irrational thinking. Although there are terminological differences, the essence of changes in the daily decision-making process remains unchanged and involves making global decisions in which the reasoning is mixed with the intuition of a manager. Rational analysis has been extensively researched in empirical studies and is well documented in the literature on this topic. Therefore, the intention to try and seek answers to the question regarding the role of intuition in decision making, as well as, in particular, the determinants of its effective application seems to be justified.

We must not absolve: in practice, decision makers never face a single decision problem, and the information system provides a wide range of information. Therefore, the cost-profit approach must be focused on the collective effect of decisions within a company. For example, a complex and costly accounting system can provide sufficient data and even functionality for budgeting. In simpler situations (let's say the supply requirement is established), a cheap application implemented on a computer or even a user-designed model in a usual development environment can provide sufficient data to substantiate the decision, in terms of economic efficiency.

The limits of any structured decision-making approach are essentially the same as in the case of problem solving:

- as a rule, the methods of decision making are presented as rational and clear. Complications, iterations and uncertainties are not indicated, and the process seems linear. In practice, managers go through the various stages back and forth several times. Whether you approach decision making in a linear and rational way, or on the contrary, in an iterative way, there are many difficulties that you may face.
- it is often difficult or expensive to collect all the necessary information.
- it is not always easy to identify goals that may meet your needs as you perceive them. Often you have to accept a compromise to best meet different interests or divergent goals.
- generating options can be costly and time consuming.
- often you do not have enough time to think creatively.
- evaluating alternatives can also be time consuming.
- estimates of expected outcomes often have a high degree of uncertainty.
- finally, even if you reach what you think is an ideal decision, it can be rejected by others.

There are several alternatives, inspired by the ideas of Boone (2003), namely:

- *approaching the less ideal solution*. Try to view the ideal solution, then choose the option that seems closest to the ideal one and is likely to be accepted.
- *intuitiv eapproach. Make the decision of choice intuitively - as you often do - but be as honest with yourself as you can. State the real reasons why you chose the alternative. Can you justify them openly in front of others? Isn't your real motive, for example, comfort or fear of acting? Wouldn't you have thought of a little more?*
- *negativeapproach.* Instead of targeting the best option, find reasons to reject the options. This eliminates the weaker options, one by one, until left with the "least bad option".
- *addressingchangingcircumstances.* You can eliminate from options by analyzing how well each one would stand if conditions changed, that is, if the forecasts you made about the future turned out to be incorrect. Change those conditions that an option seems most sensitive to, then choose the one that seems to best withstand the changing circumstances.

Accounting information becomes a primary and primordial resource of decision-making processes, used both for the elaboration of strategic development plans in accordance with the organizational culture of each economic entity, and for the projection of operational plans in harmony with the medium and long-term development strategy.

6. References

- Azuma, R., Daily. M., & Furmanski. C., 2006. *A review of time critical decision making models and human cognitive processes*. In Aerospace Conference
- Behnam, M., 2012. Decision making process: typology, intelligence, and optimization. *Journal of Intelligent Manufacturing* no.23, pp.733–746.
- Boone N. M., Lubitz L.S., 2003. A review of difficult investment policy issues. *Journal of Financial Planning*, May, pp.56-63.
- Cordell, D.M., 2002. Risk tolerance in two dimensions. *Journal of Financial Planning,* May, pp. 30-36
- Drucker P., 1993. *Managing for results*, New York: Harper Collins.
- Filip, R., 2012. *Management internațional*, Bucharest : ASE Publishing House.
- Grable J., Roszkowski M., Joo S., O'Neill B., Lytton R., 2009. A test of the relationship between self classified financial risk-tolerance and investment risk-taking behavior. *International Journal of Risk Assessment and Management*, Vol. 12, No. 2-4, pp.396 – 419.
- Grable J.E, 2008. Risk tolerance, in Xiao, J. J., (ed.), *Handbook of Consumer Finance Research*. New York: Springer.

- Necula Sabina – Cristina, Radu Laura-Diana, 2013, *Decision –making process and their implementation in digital accounting practices*, Revista MPRA (Munich Personal RePEc Archive), no. 54546, http://mpra.ub.uni-muenchen.de/51546/ [Accessed 17.09.2019], p.15
- *Studii, cercetări, analize*, Revista Audit Financiar, Anul XI, nr.104 – 8/2013.
- Trenca, I., 2007, *Fundamente ale managementului financiar*, Casa Cărţii de Ştiinţă, Cluj-Napoca.
- V. Sankaranarayanan, M. Chandrasekaran, S. Upadhyaya, 2007, *Towards modeling trust based decisions: A game theoretic approach,* Computer Security–ESORICS Springer Berlin Heidelberg.
- Watts R., Zimmerman J., 2000, *Positive Accounting Theory: A ten Year Perspective,* The Accounting Review, Vol. 65, no. 1, pp.95-112.