Teamwork and leadership styles, their relationship with decision making in the organization: a review

Trabajo en equipo y estilos de liderazgo, su relación con la toma de decisiones en la organización. Artículo de revisión

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ABSTRACT:
This research analyzes the relationship between teamwork - leadership styles - decisions making. This relationship was qualitatively determined through the interpretive hermeneutic method. The results reveal linearity in some models of decision making and the concentration of the process in a person. Two trends are presented: individual decision making (hierarchical leadership) and team decision making (participative leadership). It is concluded that the application of one or another trend will depend on the circumstances (situational leadership).

Keywords: decision making, teamwork, leadership styles

RESUMEN:
Esta investigación analiza la relación entre el trabajo en equipo - estilos de liderazgo - toma de decisiones. Esta relación se determinó cualitativamente a través del método hermenéutico interpretativo. Los resultados revelan linealidad en algunos modelos de toma de decisiones y la concentración del proceso en una persona. Se presentan dos tendencias: toma de decisiones individuales (liderazgo jerárquico) y toma de decisiones en equipo (liderazgo participativo). Se concluye que la aplicación de una u otra tendencia dependerá de las circunstancias (liderazgo situacional).

Palabras clave: toma de decisiones, trabajo en equipo, estilos de liderazgo

1. Introduction

Decisions making is a daily activity whose objective is to assess the conditions to make the most appropriate decision since an appropriate decision in a specific context may not be the case in another (Salinas and Rodríguez, 2011). Simon (1976) distinguishes an empirical level and a normative level as to how things are and how they should be in values and facts. Decision making is the selection of an action among different options. An important aspect in decision-making is how the party involved perceives the situation under study. In some cases, the situation under study may be perceived by some managers as a problem and by others as a normal or favorable situation. Decisions in an organization are based on the same premises, normative and empirical elements. These premises are called premises of fact and value. The premises of fact correspond to the knowledge and information of the organization and its environment; those of value include the goals and the legal and moral restrictions (Doval, 2009).

The objective of this research, therefore, is to analyze theoretical models of decision making in companies and determine their relationship to teamwork and leadership styles. The study is documentary type. Applying the interpretive hermeneutic method, classical authors were analyzed to qualitatively determine the relationship between these three variables.

2. Decision making. Conceptualization

Simon (1976) defined decision-making as a systematic process to choose the option that offers the best chance of improving the efficiency and effectiveness of the organization to create value in all interest groups. According to Aktouf (1998), decision making is the process by which an option is reached, supposedly clarified, informed and motivated. It is about choosing among several possible ways of acting with a view to achieving a goal, in given conditions and circumstances. This process involves a series of partial and sequential acts that will lead the decision maker from the awareness to the need to choose a solution among the most appropriate, taking into account the situation and going through the collection and processing of all necessary information.

Robbins (2004) is based on the selection of an option between two or more alternatives to solve a problem. That is why it is necessary that the decision maker apply rationality when choosing the most consistent and maximum value options. For Peña (2006), the taking of decisions is the process by which a choice is made among several options to solve different situations of life. Koontz, Weirich and Cannice (2012) define it as the selection of a course of action among several
alternatives; and it constitutes, therefore, the main aspect of planning. Table 1 summarizes the decision-making definitions presented with the proposed approaches.

<table>
<thead>
<tr>
<th>Author</th>
<th>Concept</th>
<th>Approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>Simon (1976)</td>
<td>Systematic process to choose the option that offers the best chances of improving the efficiency and effectiveness of the organization in order to create value in all stakeholders.</td>
<td>Limited rationality (decision maker satisfaction prevails over an optimal decision). Administrative and organizational vision in decision making.</td>
</tr>
<tr>
<td>Aktouf (1998)</td>
<td>Process by which a supposedly clarified, informed and motivated option is reached.</td>
<td>Rational and simple (the intuitive, emotive and ideological factors are dispensable, to the point of being totally ignored).</td>
</tr>
<tr>
<td>Robbins (2004)</td>
<td>Selection of an option between two or more options to solve problems.</td>
<td>Limited rationality (decision maker satisfaction prevails over an optimal decision).</td>
</tr>
<tr>
<td>Peña (2006)</td>
<td>Process through which a choice is made between alternatives to solve different situations of life.</td>
<td>Limited rationality.</td>
</tr>
<tr>
<td>Koontz, Weihrich and Cannice (2012)</td>
<td>Selection of a course of action among several alternatives.</td>
<td>Limited rationality (decision maker satisfaction prevails over an optimal decision).</td>
</tr>
</tbody>
</table>

For the purposes of this study, the definition of decision-making given by Simon (1976) is assumed because his approach is based on the complexity of this process. Firstly, because decisions must be based on the value that they add to the purpose pursued and not only because of the interest of the decision maker. Secondly, because it takes into consideration the systematic process element which implies the structuring in the decision making process. Thirdly, he indicates in his definition that decision making goes hand in hand with the exhaustive analysis of options, both to benefit the organization and those who will be touched by the decision made.

3. Components of decision making. Theoretical models

Based on Robbins (2004) and Koontz (1998), decision-making can be divided into two components: levels and basic processes.

3.1. Levels of decision-making

Decisions are made at different hierarchical or administrative levels of the organization. Authors such as Peña (2006), Gil and Giner (2013) and Gutiérrez (2014) propose their models based on this.

3.1.1. Peña Model

For Peña (2006), decisions are made at three levels: strategic, tactical and operational.

**Strategic decisions:** they are made by senior managers. They refer to the relationships between the organization and its environment; they are transcendental because they determine the general goals that affect the entire organization; and at the same time, they outline the long-term plans to achieve those objectives. They are not repetitive, so information is scarce and its effects are not reversible. Mistakes in these decisions can compromise the organization and therefore require a high degree of accountability.

**Tactical decisions:** they are made by middle managers. They try to efficiently allocate available resources to achieve the objectives set at the strategic level. They can be repetitive and the degree of repetition is sufficient to rely on precedent. Their consequences tend to occur over a not-so-long period of time and are generally reversible. They relate to plant layout, budget distribution, or production planning.

**Operational decisions:** these are made by executives who are at the lowest level and relate to the company’s ordinary activities. Their repeatability is high and they are often translated into automatic routines and procedures, so the necessary information is readily available.

3.1.2. Gil and Giner Model

Gil and Giner (2013) claim that decisions are classified according to the level or subsystem at which they are taken: strategic, administrative and operational levels.

**Strategic subsystem:** it makes its decisions based on the system of values and the information received from the environment and from the company.

**Administrative subsystem:** it is in charge of translating policies, objectives or strategies into realities corresponding to the intermediate line. It translates the decisions enunciated by the strategic subsystem (top management) and transforms them into operative ones.
Operational subsystem: "... it translates the decisions enunciated in a more or less abstract way and transforms them into operational" (p. 107).

This approach, unlike the previous one, has a systems perspective, which indicates that the decision will be influenced by internal actors (company personnel) and external actors of the organization (suppliers, competitors, partners, governmental instances, among others) and decision-makers will seek feedback during the process and focus on the organization as a whole and not with separate hierarchical levels.

3.1.3. Gutiérrez Model

Gutiérrez (2014) establishes this classification starting from the concept of organizational structure, assuming that the level of the decision maker, in the structure mentiones, is connected with the decision; Gutierrez distinguishes the following strata:

**Strategic or planning decisions**: they are taken by top management decision makers. They are relevant because involve the goals and objectives of the organization, are long-term, non-repetitive, not very reversible and the errors in them can compromise the performance of the company.

**Tactical or piloting decisions**: they are made by middle managers, can be repetitive and have less impact on the organization in the short term.

**Operative decisions**: they are executed by company line personnel; they are characterized by their high repetitiveness, routine and with availability of information.

This model, like that of Peña (2006), focuses on organizations with well-defined hierarchical structures, characteristic of a routine production system. They omit those organizations that might have matrix and flexible structures in which decisions are usually made in interdisciplinary and interdepartmental teams. The flow of decision making is one way: from top to bottom.

The different proposals on the levels at which decisions are made in the organization are summarized in the following table.

<table>
<thead>
<tr>
<th>Author</th>
<th>Levels</th>
<th>Approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>Peña (2006)</td>
<td>Strategic</td>
<td>Tactical</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Operative</td>
</tr>
<tr>
<td>Gil and Giner (2013)</td>
<td>Strategic</td>
<td>Administrative</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Operative</td>
</tr>
<tr>
<td>Gutiérrez (2014)</td>
<td>Strategic or planning</td>
<td>Tactical or piloting</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Operative</td>
</tr>
</tbody>
</table>


3.2. Basic processes in decision making

Next are the proposals of Simon (1957), Cyert and March (1963); Lindblom (1966); March, and Olsen (1972); Vroom-Yetton (1973); Mintzberg, Raisinghani, and Theoret (1976) and Archer (1980) regarding the decision-making process.

3.2.1. Model of limited rationality

For Simon (1957), the rationality in the decision process is limited; and the manager makes decisions that satisfy him, discovers acceptable solutions for real problems and is content with satisfactory alternatives. To understand management, we must perceive how people solve problems and make decisions. The person has enormous limitations in his capacity to take into account (in order to make a decision) all the facts that occur in the world or in what surrounds him, which would be relevant for that decision. These limits arise, according to Simon, because people have limited knowledge and limited abilities to analyze the consequences of their own knowledge. There are serious limits to predict the future and the reactions of others in response to those decisions. The decision-making process established by Simon's limited rationality model is as follows:

**To formulate the problem**: a visible problem is identified that reflects the interests and background of the manager.

**To identify the decision criteria**: a set of limited criteria is identified.

**To assign the weights to the criteria**: a simple model is constructed to evaluate and classify the criteria; the personal interest of the decision-maker strongly influences the decisions.

**To develop the alternatives**: a limited set of similar alternatives is identified.

**To analyze the alternatives**: based on a chosen solution, each one of the alternatives is evaluated in terms of the decision criteria.

**To select an alternative**: the search for alternatives continues until finding a solution that is satisfactory and sufficient, after which the search ends.

**To implement the alternative**: various considerations of politics and power influence so that people accept the decision and commit to apply it.

**To evaluate**: measurements of the results of a decision are rarely objective enough to eliminate the personal interests of the evaluator; the use of resources destined to previous commitments may increase, despite previous failures and evidence that the allocation of additional resources is not justified.

It can be stated that Simon sees decision-making as a systematic, rational and complex process that requires teamwork to make the final decision because, as each sub process suggests, group discussions will be required in each case.
3.2.2. Organizational behavior model

It was established in 1963 by Cyert and March and it distinguishes three stages in the process of determining organizational objectives: decision process or bargaining with the active group to determine the composition and general conditions of the coalition, internal organizational control process to state and elaborate the objectives and process of adaptation to experience.

An important idea formulated by Cyert and March is that decision-making in the organization occurs not only under conditions of limited rationality, but also under circumstances of uncertainty and ambiguity. Sometimes, decisions are made in a confusing, unsound manner, without prior elaboration and with little logic.

The authors define the organization as a decision-making system and as a political coalition, that is, a group of people who negotiate among themselves to distribute power within the organization. When conceiving the organization as a coalition, the possibility of conflicts in the organization is recognized, due to the existence of multiple goals that cannot be met at the same time.

Although this information is oriented towards the establishment of a behavior alternatives map, it seeks the most satisfactory decision. This level of satisfaction is closely linked to the level of aspiration that the individual or individuals who make the decision have. Once he or the decision makers have established the alternatives, they proceed to evaluate them sequentially until they find the one that equals or exceeds their aspiration level.

Cyert and March approaches indicate that decision-making in the organization cannot be done in a consensual and systematic way all the time, because the factors of uncertainty and human behavior are incorporated as influential in the decision-making process, which could cause mistakes in the final decision, conflicts between the participants and the formation of subgroups.

3.2.3. Incremental model

Lindblom (1966), author of the incremental model, proposes the following steps to solve problems on the part of the decision maker:

1. Identify, scrutinize and express in coherent order those objectives and other values that, according to the opinion, should govern the choice of a solution to the problem.
2. Thoroughly examine all possible means to obtain these values.
3. Examine carefully the probable consequences of using each of the possible means.
4. Choose a medium - a policy or special combination of policies - that obtains a maximum of values or tries to reach a certain acceptable level of achievement.

Lindblom (1959) analyzed the practices of organizations and concluded that they acted differently from the rational model. Based on his observations, he proposed the method of successive comparisons, according to which the decision maker would act on the object through stages. Thus, the substitution of a current policy should be done through another policy which will only be differentiated from the first by its increase, thus avoiding errors derived from drastic modifications that could not be perfectly evaluated due to the difficulty it presents to foresee all possible consequences.

As noted, Lindblom incorporates policies and values as key elements to guide the decision-making process and increase the possibilities of making the right decisions. One policy can be replaced by another, as long as the next one improves on the previous one, its effects are not drastic and values are taken into account. Under this model, decision making must be done in multidisciplinary work teams.

3.2.4. Trash Can Model

Proposed by Cohen, March and Olsen (1972), it is situated within a stream of social and organizational thought, with origins in school initiated by Simon. This model does not formulate a more or less fixed scheme like the previous ones, but proposes recommendations about decision styles that can be taken into account depending on the situation. In the first place, it postpones the most complicated organizational problems, since at the time of making quick decisions they are not the most urgent. Then, the model mentions those problems that have long been treated, but have not yet been solved. It is then when they are moved to other fields of decision for their future rethinking and more simple solution. Finally, there is the decision for problem solving considered as the typical case in which the Trash Can Model can be applied. In it, usually, a group presents a seemingly rational solution and the problem can be considered resolved. As shown in Figure 1, the decision model proposed by Cohen, March and Olsen is not established as a sequence of steps, but as a decision-making system.

Figure 1
Trash Can Model
Figure 1 shows key elements: Problems: points of dissatisfaction with current activities and performances. Potential solutions: ideas that someone proposes to adapt, form a flow of alternative solutions throughout the organization. Participants: employees who enter and leave the organization. Selection opportunities: occasions in which an organization makes decisions. They take place when agreements are signed, people are hired or a new product is authorized.

According to this model, the problems can be dealt with and solved at any of the hierarchical levels of the organization. In this case, a diagram of decision making at the middle management level is presented. Depending on the complexity of the problem, work teams are formed and participants can come from different departments. The problems to be decided on may have different origins, as well as who will make the decision to solve them; and the organization will have different opportunities to make the most appropriate decision.

The authors of this model approach decision-making as a complex, non-sequential system in which the key is not to establish solutions step by step (as “a recipe”) to make decisions based on a problem, but rather to identify the elements key to a phenomenon or problem situation; and depending on it, address it as a whole. Moreover, they incorporate in their model the relevance of prioritizing problems according to their magnitude and the ability of the organization to solve it within a certain period of time.

3.2.5. Contingency model

Vroom and Yetton (1973) studied how a manager should make decisions, taking into account the context of developing ideas individually or in groups and a series of leadership styles, depending on the situation in which decisions are made. It can be said that they do not handle a prescriptive model, but rather a guide of recommendations.

The authors define seven questions that managers must answer to diagnose the situation and determine the most appropriate leadership style to make the decisions: How important is the quality of the decision? Do I have the right information and enough expertise to make a high quality decision? How structured is the problem? Is the acceptance of the decision by the subordinates and their commitment to the decision critical for the effective execution of the decision? Can I make the decision myself and be sure that it will be accepted by my subordinates and I will receive their cordial cooperation? How motivated are the subordinates to achieve the organizational objectives as they are represented in this problem? Is conflict between subordinates likely for the preferred solution or decision to this problem?

From the diagnosis of the situation, the manager must identify the managerial style that leads to choose the most appropriate decision, according to the type of problem presented and the welfare of his company. Finally, the manager must introduce the final solution and be aware that this will depend on whether he has made a correct diagnosis and the level of the impact of this decision on one or more employees (see figure 2).
Figure 2 shows leadership styles based on the degree of employee participation and the ability to make administrative decisions. Depending on the context and the problem to be solved, the corresponding management style will be chosen.

**AI Autocrat.** The leader solves all problems and makes a decision individually using the information available at the time of the decision.

**AII Autocrat.** The leader obtains the necessary information from his subordinates and then decides without involving them in the formulation and evaluation of alternative decisions. This style involves subordinates only to the extent that they provide the information for the leader's personal decision.

- **CI Advisory.** The leader shares individually the information related to the problem with the employees, requests and obtains from them suggestions regarding the solution of the problem and carefully considers these inputs to personally make the decision.

- **CII Consultative.** The leader shares the problems with the subordinates as a group, considers their ideas and suggestions and based on this, makes the decision.

- **GII Group.** The leader shares the problems with the group and together they generate and evaluate alternatives in an attempt to reach a consensus in the solution of the problem. In this style, the leader accepts, adopts and executes the solutions recommended by the whole group.

The situational factors that influence the method are relatively logical: when the quality of the decision is important and the followers have useful information, then, AI and AII are not the best methods. When the leader sees the quality of the decision as important, but the followers do not, GII is inappropriate. When the quality of the decision is important, when the problem is not structured and the leader lacks information or skills, GII is the best. When the acceptance of the decision is important and the followers are in a position not to accept an autocratic decision, AI and AII are inappropriate. When the acceptance of the decision is important but the followers are likely to disagree among them, AI, AII and CII are not appropriate because they will not give an opportunity to settle for the differences that are to be resolved. When the quality of the decision is not important but the acceptance of the decision is important, GII is the best method. When the quality of the decision is the most important and everyone agrees with this and the decision will not be able to be taken autocratically, then, GII is the best method.

This model clearly relates leadership style to decision making and teamwork. The more autocratic the leadership, the more centralized the decision will be. The importance of considering the context or circumstances in order to assume a certain style of leadership in the decision-making process reveals, according to this model, that the environment determines, in part, the process mentioned and that teamwork can also be carried out depending on the circumstances and the decision (situational leadership).

### 3.2.6. Progressive Decision Model
Minzberg, Raisinghani and Theoret (1976) describe three characteristic phases in the decision-making process (identification, development and selection) without indicating a sequential relationship between them (see figure 3).
The identification phase in strategic decision making comprises decision recognition and diagnostic activities. In this phase, opportunities, problems and crises are identified and the decision-making activity is remembered. The development phase is considered by the authors as the soul of the model in which more resources are consumed. In this phase, one or more solutions to the problem are proposed and the aim is to find solutions already reached in the previous phase. In the selection phase, the best solution alternative is chosen. It is possible that several processes can be executed to select the best option from the previous phase. However, the possibility of new alternatives for solving problems that have not been detected in the identification phase of the problems is not left out.

This model explains decision making as a complex non-linear process even when the presence of phases is indicated; it contemplates a systemic approach by incorporating in the diagnosis the recognition of opportunities (which are associated with the external part of the organization) and allows for the assumption that the problems and crises identified can be internal and external. Each phase of decision making is presented as a process carried out by a work team in which everyone participates to select the most appropriate decision, which implies that the process is coordinated by a participatory leadership even when the model does not explicitly establish it.

3.2.7. Economic Rationality Model

This model proposed by Archer (1980) recommends a series of steps that managers and work teams must follow to increase the likelihood that their decisions are logical and well formulated. A rational decision results in the maximum achievement of goals within the limits imposed by the situation. This information can be used to identify, evaluate and choose the objectives that will be achieved.

The steps to follow are:

- **Analyze the environment.** External information that can influence the decision is analyzed.
- **Define and diagnose the problem.** Evaluate the perceived factors and determine the causes of the real problem, not just the symptoms.
- **Set goals.** Point out the direction toward which decisions and actions should be directed.
- **Look for alternative solutions** in order to achieve the objectives, additional information, think creatively, consult experts, and undertake research and similar actions.
- **Compare and evaluate alternative decisions,** the expected results and the cost of each action must be considered.
- **Choose among alternative solutions.** This is difficult when the problem is complex and ambiguous and involves high degrees of risk or uncertainty.
- **Implement the selected solution.** It includes communicating the decision to the people affected and getting them to commit to putting it into practice.
- **Monitoring and control of the results.** It requires that the individuals or teams control the activities of the implementation and follow up with the evaluation of the results.

Archer (1980) graphically describes the rational model by means of a systemic logical sequence analysis that establishes how to decide (see figure 4).

![Diagram of the Rational Model](Figure 4)

**Figure 4**

Rational Model
Archer’s model can be considered centralized in the analyst whose leadership in the decision-making process is expected to be autocratic. In addition, it is presented as a linear process that does not raise the possibility that for any reason it could be returned to earlier phases. However, considering both internal and external aspects of the organization that could serve as an input to make the final decision, it gives a systemic and integrative approach to the model.

The model raises the search for alternative solutions that, although not indicated, could be proposed by people other than the analyst. This model offers the possibility of communicating the decision to the people affected so that they commit themselves to put it into practice. This leads to conclude that the model is implicitly supported in teamwork in each of its phases, and the analyst is represented as a facilitator of the process, from the beginning to the end. Next, the decision-making models explained above are presented in a consolidated manner.

### Table 2
Decision Making Models

<table>
<thead>
<tr>
<th>Authors</th>
<th>PROCESSES</th>
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<th></th>
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</thead>
<tbody>
<tr>
<td>Simon (1957)</td>
<td>Formulate the problem</td>
<td>Identification of limitations</td>
<td>Identify elements to solve a problem</td>
<td>Problems</td>
<td>Diagnose the situation</td>
<td>Identify the problems</td>
</tr>
<tr>
<td>Cyert y March (1963)</td>
<td>Identify decision criteria</td>
<td>Identification of differences among actors (conflicts)</td>
<td>Examine the possible ways to obtain the means to solve the problem</td>
<td>Potential solutions</td>
<td>Identify the management style to choose the solution</td>
<td>Develop solutions</td>
</tr>
<tr>
<td>Lindblom (1966)</td>
<td>Assign weights</td>
<td>Formation of coalitions</td>
<td>Analyze the consequences of using media to solve a problem</td>
<td>Participants</td>
<td>Implement the final solution</td>
<td>Select the solution</td>
</tr>
<tr>
<td>Cohen, March, and Olsen (1972) (*)</td>
<td>Develop alternatives</td>
<td>Search for satisfactory solutions</td>
<td>Select the means to solve a problem</td>
<td>Opportunities of choice</td>
<td></td>
<td>Search for alternative solutions</td>
</tr>
<tr>
<td>Vroom and Yetton (1973)</td>
<td>Select an alternative</td>
<td>Choose the option accepted by the coalition (satisfactory)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mintzberg Risinghani and Theoret (1976)</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>Archer (1980)</td>
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</table>
As observed, the models establish a set of phases or stages in the decision-making process. The limited rationality model points to seven phases, highlighting the limitations of both rationality and better performance in the daily decision-making processes that most people perform. The results obtained are satisfactory, but it is not possible to maximize as is the Archer’s model.

The Cyert and March’s model continues with limited rationality, but emphasizing the nature of the problem and optimizing the decision stages in five. Lindblom establishes four stages based on the incremental strategy, under which decisions are made not from scratch, but from the experience lived by the decision maker. In the Trash Can model, problems, solutions, selection opportunities and participants are involved; emphasizing the priority of problems that can be solved. Vroom and Yetton, meanwhile, highlight what is the decision process to use and the decision influence in the supervisor-subordinate relationship, having the options of autocratic, consultative or group leadership. Mintzberg, Raisinghani and Theoret model highlights three complex phases without obligatory order. The last model, that of economic rationality, refers to the individual being closer to rationality by the way in which each phase is described.

The models studied visualize their conceptualization through particular approaches of their authors, framed by the trends that dominated in their time. However, most of them establish guidelines and actions that lead to the solution of problems both individually and in teams. Therefore, we consider that a particular decision-making model should not be chosen, but a combination that can include rationality, efficiency and effectiveness, the humanistic and complex nature of the decision-making process, supported by human processes such as situational or contingency leadership and teamwork. Many of the decisions in current organizations must be taken in a short time; which makes it increasingly difficult to decide from a rational approach; this leads to decisions being made with incomplete information, deficient projections and a great deal of uncertainty.

4. Proposal for an Integrated Decision-Making Model

Based on the analysis of the different decision-making models, the following model is proposed (see figure 5).
This model emphasizes the selection stage among the proposed alternatives. Prior to the stages of the model, the structural study of the organization and the independence in the decisions of the hierarchical levels must be set.

The model is developed in six stages which, as will be seen, are not developed linearly, but it is possible to return to another stage, depending on the circumstances and nature of the decision to be taken.

**Stage 1. Characterization of the problem.** It identifies the nature of the problem, its scope and incidence in the administrative processes of the organization (planning, organization and control). Classify the problem and assess its scope within and outside the organizational structure.

**Stage 2. Alternative solutions.** Possible alternative solutions are considered, based on the rules and procedures of the organization, the levels of authority, knowledge and expertise of those involved.

**Stage 3. Selection of the best alternative(s).** Whether personal, organizational, individual or group, the selection will involve vital factors in the process such as: experience and knowledge of those involved in decision making, experimentation, research and analysis, according to the nature of the problem and the alternatives proposed. This stage will determine how successful the previous stages were and how successful the next ones will be, which could determine the success or failure of the overall process.

**Stage 4: Implementation of the decision.** The reasoned decision will be delivered to the entities responsible for its execution, according to the parameters established and disseminated by the levels of authority and direction. Commitments are established for its fulfillment.

**Stage 5: Evaluation of the implementation.** According to the nature of the decision and its impact on the organization, indicators and parameters are established to measure whether the proposed solution leads to the satisfactory achievement of objectives. If the results obtained are not satisfactory, we return to the selection stage with possible revisions of the previous stages.

It is important to clarify that the proposed model is not linear; however, it is explained step by step for didactic reasons. If necessary, if the dynamics of the decision-making process requires it, one stage can return to an earlier stage or even to the initial one. The proposed model is summarized below:

### Table 3: Integrated Model for Decision Making

<table>
<thead>
<tr>
<th>Processes</th>
<th>Characterization of the problem</th>
<th>Establish alternative solutions</th>
<th>Selection of alternatives</th>
<th>Decision</th>
<th>Decision Implementation</th>
<th>Evaluation of implementation</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Identify the nature of the problem, its scope and impact on the substantive processes of the organization.</strong></td>
<td><strong>Possible alternative solutions within the framework of the rules and procedures of the organization and the levels of authority involved.</strong></td>
<td><strong>The alternative that satisfies the established objectives will be chosen.</strong></td>
<td><strong>The solution taken at the selection stage will be argued and disseminated.</strong></td>
<td><strong>The reasoned decision will be delivered to the entities responsible for its execution.</strong></td>
<td><strong>Define the parameters and indicators that will measure whether the proposed solution leads to the solution of the problem.</strong></td>
<td></td>
</tr>
</tbody>
</table>

Source: self-elaboration

### 5. Conclusions

Organizational decisions, from the theoretical perspectives analyzed, must have a strong systemic component based on the complexity of the problem to be addressed and the organizational context. Even when, in general, decisions are made in complex circumstances, not all the time is this way; such is the case of decisions associated with routine work, which can be taken quickly and not necessarily by a representative of senior management. Under these circumstances, the assumed leadership style is vital. However, in most of the models analyzed, decision-making is presented as systemic processes that require teamwork and a leader capable of coordinating actions in a participatory manner and thus choose, individually or as a team, the most appropriate alternative.

The presence of two tendencies is noticed: the making of individual decisions (that can be associated to a hierarchical leadership) and in a team (that can be associated to a participative leadership). The orientation towards one or another trend will depend on the circumstances of the decision and the problem on which it is necessary to decide. This indicates that the decisions are made according to the context, the goals, the nature of the problems (structured or routine), which means that the decision making process is often a systematic process to choose the option that offers us the best chance of improving the efficiency and effectiveness of our organizations and that interest groups are as little affected as possible.

Like any human-based process, it is important that the leader and his team consider intangible aspects when deciding, for example, social and political factors, and not only, the economic-financial impact of the decision. Generally, the intangible occurs unexpectedly and can negatively impact a decision made based only on monetary calculations. Decision-making requires the open exchange of points of view and knowledge, having a shared vision of decision-making and the goals of the company and valued learning and equipment.

It can be concluded that the proposed integrated model promotes communication, the exchange of points of view and knowledge, which could lead to a shared vision of decision making and the company’s objectives and goals. It is recommended that this proposed model be applied in companies of different nature to be validated and reformulated if necessary.
Bibliographic references

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