

A PROPOSED ORGANIZATIONAL SYSTEMIC MODEL TO RAISE PRODUCTIVITY IN A COOPERATIVE SOCIETY OF FISH PRODUCTION

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Abstract

Mexican society is organized for its operation into various systems. The economic issue is divided into three productive sectors that meet the needs of the population: the primary, secondary and tertiary sectors. The primary sector includes activities that generate non-processed food items especially. The fishing activity is located in this primary sector. Cooperatives are systems that were founded in order to provide jobs for families and in turn make an order on the capture and taking of marine products. This theoretical-methodology study focus on open systems and analysis of the El Patole Cooperative Society S.C. de R.L. de C.V. The study seeks to address the problem of the approach to the analysis of administrative and financial processes of the company, from the observation that the company is considered to be a system, inside of a larger supra economic and ecological system. The purpose of the study is to assist El Patole to become even more competitive and productive business in the commercial activity.

Keywords: Cooperative, open systems, cooperative society, systems theory, productivity

INTRODUCTION

The current century has globalized economies favoring companies that are facing many challenges to remain in the markets. The organizations have the need to make improvements in the quality of its services and / or products in order to raise efficiency standards and levels of competence. The influences of the members of the European Union, Japan and the United States are to be serious problems for internal economies of developing countries.

Trade agreements established with nations like Canada and the United States have exposed the downside of Mexican companies over foreign companies. Derived from this fact the micro, small and medium enterprises struggle to survive against transnational corporations with which they can hardly compete. Inflation, lack of affordable financing and the loss of purchasing power are domestic economic problems that have impacted negatively on cooperatives.

Mexican society is organized for its operation into various systems. The economic issue is divided into three productive sectors that meet the needs of the population: the primary, secondary and tertiary sectors. The primary sector includes activities that generate non-processed food items especially. The fishing activity is located in this primary sector. Cooperatives are systems that were founded in order to provide jobs for families and in turn make an order on the capture and taking of marine products.

This paper addresses the case under study of the Cooperative Society of Fish Production, the Patole, cooperative society of limited responsibility and variable capital (S.C. of R.L.de C.V.). The cooperative performs various tasks in fishing production in which it can be observed the application of the theory of open systems. The Patole is a company with over thirty years in the shrimp market and want to continue to be profitable in order to remain a source of employment.

Therefore, cooperatives require rethinking their business models to identify the obstacles that have made for the purpose of making a proposal to allow them to maximize their competitiveness with the various companies. This study is based on the importance and applies to the particular case of a Cooperative Society Fish Production the Patole.

Background of the problem

Mexico is one of the leading producers of marine species and is found surrounded by the Atlantic and Pacific oceans. The species that are commercially exploited are divided into four groups (FND, 2014):

- A. Breeding species: shrimp, tilapia, catfish, tilapia, trout and carp.
- B. Ground fish (queen snapper, mackerel, red snapper, shark, mullet, shark and snapper)

- C. Crustaceans and mollusks (sea urchin, shrimp, sea cucumber, lobster, conch, abalone, octopus, oysters and clams).
- D. Mass pelagic species (anchovies, tuna and sardines).

Because of the importance of fisheries in the Mexican economy, the government has designed and put into operation financing programs oriented to the reactivation of the main operatives of seafood cooperatives. The agencies that have regulated these programs are the Office of Environmental Protection (PROFEPA), Ministry of Agriculture, Livestock and Rural Development (SAGARPA) and the National Commission of Aqua culture and Fisheries (CONAPESCA, 2014). While cooperatives can be financed by government support there are organizational problems. As such a proposal for an organizational model of systemic type to increase productivity in order to study the Cooperative Society Fish Production "The Patole" SC of RL of CV.

Definition of the Problem

Most of the western economies in this century are capitalists and Mexico is no exception. The Mexican economy is based on various activities of production of goods and services. Its purpose is to satisfy the domestic demand of the population and then placing those goods and services in international markets. Productive activities are classified into three economic sectors: primary or agricultural, industrial and services or secondary or tertiary (Delgado de Cantú, 2003). Agriculture, forestry and fishing among other activities are considered in the primary sector.

In fishing, the main producers of shrimp are cooperatives. The Fish Production Cooperative Society's Patole is structured according to its productive activities. Also, the Cooperative has the proper permits for the capture and production of shrimp in the estuaries called the Dead, Flags, the Tazajal and the Patole. Of the afore mentioned estuaries, Tazajal is the most important because it presents direct communication with the sea all year round. But some organizational problems have been detected that allow it to get a consecutive growth, as well as access to more government funding programs to help it to achieve its goals. Current study explores the following research questions:

- A. Does the organizational system of the cooperative's Patole is akin to changing current environment in order to help a company that raises its productivity?
- B. What suggestions are proposed for the cooperative society The Patole to improve its administrative system?

Justification of the Study

This article aims to explain the problem in its organizational system that the cooperative society Patole faces. To determine if its organization is an obstacle to further its development, growth and production of major sources of financing. Current changes that threaten the cooperative society can be countered with improved organizational system to continue working in the best way in the future. It is critical to rescue its organizational figure because the cooperative principles are based on values such as solidarity and collective benefit.

The philosophy of the cooperative is aimed at achieving a common goal that benefits all its members on equal terms. The cooperative is essential to understand the development of the working class in Mexico to engage an ideology and forms of negotiation between social classes. The importance of the company is that it is the source of income of nineteen fishing families living in the Lomasdel MarPiactla and SanIgnacio, Sinaloa fishing camp. These families are engaged in this activity because agriculture does not generate enough income to have an optimal quality of life.

Assumption

This paper presents the development of a proposal for an organizational model of the Cooperative Society The Patole SCde RLde CV to assist in identifying the company why it has not undergone significant growth and does not access adequate support for higher funding sources to assist in its position nationally and internationally and to be a factor of social and economic benefit in its community and region.

CONCEPTUAL AND THEORETICAL FRAMEWORK

Cooperative

The theory of cooperation emerged as a support, solidarity and mutual cooperation of the working class in the capitalist system. It is a factor of development in the productive forces of the nation and is supported by the humanist philosophy. The cooperative emphasizes the primacy of human beings and their need for cooperation in order to get the services and goods required for their existence. The cooperative seeks to organize society in a fair way and eliminate economic disparities through community ownership and work (Izquierdo, 2005: 12).

The cooperative is a movement caused by the need for jobs and a better quality of life for the population movement. The first theory of the cooperative was the Frenchman Louis Blanc terming cooperatives the so called social workshops. Similarly, proposed a reduction of working hours to be more efficient productivity (Bunge, 2008). Another theorist was Saint Simon, who called the Cooperative Republic to a new economic society in which the owners

were a group of people with the same rights and obligations (Uribe, 1993). Running The Patole is based on the theory of cooperation.

The essential features of the cooperatives currently accepted in accordance with the Framework Law for Cooperatives in Latin America are:

- 1) Voluntary and open membership;
- 2) Democratic management by the partners;
- 3) Economic participation of members;
- 4) Autonomy and independence;
- 5) Education, training and information;
- 6) Cooperation among cooperatives;
- 7) Concern for community (Mariño, 2009: 3).

Moreover, the General Cooperative Societies Act sets out the following principles:

- 1) Freedom of association and voluntary retirement of partners;
- 2) Democratic administration;
- 3) Interest limitations of some contributions of the partners will be agreed if so;
- 4) Distribution of income in proportion to the share of the partners;
- 5) Promotion of cooperative education and education in the social economy;
- 6) Participation in cooperative integration;
- 7) Respect to the individual right of members to belong to any political party or religious association, and
- 8) Promotion of ecological culture (Salinas de Gortari, 1994: 2).

It can be observed the existent harmony between the laws of Latin America and the United Mexican States. Freedom of association members is emphasized, making democratic actions, to promote equality between all partners. Similarly, it seeks the benefit of the community where the cooperative is located, and the promotion of ecological culture among its members and society itself.

A cooperative society is defined as a form of social organization composed of individuals based on common interests and on the principles of solidarity, self-help and mutual aid, in order to meet individual and collective needs (Salinas de Gortari, 1994: 1). The cooperative is an important movement and is a system of people within the system that is the fishing industry, which in turn is located within the Mexican economic system.

Cooperative movement in México

The cooperative movement in the Mexican state began with the integration of rail operators, drivers, textile workers, students and teachers in the National Cooperative Party (PCN). The triumph of General Obregon in 1920 supported the principles that promoted a change in the society, a more democratic institutions and the implementation of a program supported by the cooperative (Rojas,1951: 296-308). In 1925, General Calles approved first General Cooperative Societies Act (Tinajero Portes: 1994: 199).

The cooperative movement in Mexico is regulated by the General Law of Cooperative Societies (LGSC) and the Framework Law for Cooperatives in Latin America (LMCAL). Both regulations are in harmony as mentioned on the second LMCAL article that says "The State shall guarantee the free development and autonomy of cooperatives." The country supports cooperatives and allows them the freedom to be autonomous (Mariño, 2009: 3). The LGSC states that cooperatives can be devoted to the activity and as always wish to be lawful. Cooperatives are classified as the savings and loan, consumer goods and/or services and producers of goods and/or services (DOF, 1994: 5).

In 1930, began operations Fishermen's Cooperative in the city of Esquinapa dedicated to fishing and capture of shrimp between the rivers Bastion and Cañas (Ortega Noriega, 1999: 299) rivers. Between the years 1940 and 1945, it was gradually integrating the fisheries industry. A new phase with the construction of large vessels is initiated, which brings a vast network of chained accessories, fishing tackle and related industries (Rivera Terrazas, 1981:164).

Systems theory

The general systems theory that supports open systems was developed in the 1950s by the Austrian Ludwig von Bertalanffy (1989) who defined system as a set of related elements for a common end. Bertalanffy (1989: 78) defines a system as "a complex of interacting elements". The systems are composed of interrelated parts and in turn to its environment. Systems can be closed or open. Systems are closed when they do not interact with its external environment (Stoner, 1996). Open systems are cells, living organisms in general (Bertalanffy 1989) and organizations of living beings. This description is consistent with the role of companies such as cooperatives in the primary fishing sector.

In addition, organizations are open systems because it performs two different interactions: those interactions that carry energy and /or information system (import interactions) and those returning to the medium information and /or energy (interactions export) (Johansen, 2004: 35).

The basic elements for the realization of an open system processes are the inputs, the transformation process, outputs and feedback. In his book *The Social Psychology of Organizations* of Katz and Kahn (1966: 19-26) expose the nine characteristics of open systems: Importing energy, manufacturing, export, cycles repeating events in the systems, negative entropy, information as input, dynamic state of equilibrium or homeostasis, differentiation. The import of inputs is required for their work because no system is sufficient in the development of their goods or services.

Inputs are information, energy and materials required for the system to work. In the transformation process activities are performed to convert inputs into goods or services. Outputs are the goods or services that were produced by the system, in turn can be negative as pollution or positive which are the goods or services required by society. The feedback is the societal response to processed products. It can be also negative or positive. The first is a criticism that serves correction and maintenance of the system objectives while the second activates the processes that produce a change in the objectives of the system (Castillo, 2008). Open systems perform their functions in this process necessary for the proper operation of the suprasystem and its component systems.

Churchman (1973) mentions five basic aspects of systems theory: the objectives, environment, resources, and management components. The first are the ends or goals oriented towards the system, in this case the cooperative. The second is all that is outside of the cooperative or organization in the suprasystem. The third are the internal factors used by the system to implement activities which might result in the goods or services produced. The fourth basic aspect of systems theory is the activities of the system to achieve the objectives at its best performance.

Transformation is the process in which systems use inputs and produce goods or services. Then, a sub-system export its production to a suprasystem to be used by people who need it. Cycles repeating events systems, refers to the fact of the cyclic nature of the systems in operation with other systems and the suprasystem. The negative entropy requires systems move so as to restore its energy and continue its organizational structure indefinitely.

The authors Katz and Kahn (1977: 26) state that the systems approach makes it possible to examine the stability or recurrence of activities in relation to the energy input to the system, the transformation of energy within the system and the resulting product or energy performance. The systemic model is a comprehensive model which is composed of parts that come together to achieve company goals. This is supported by various actions such as feedback, training skills and appropriate behavior and genuine concern in relations between people.

Cooperatives as open systems

The administration in the case of systems, focuses on only two phases of the administrative process, planning and control, considering the latter as the feedback system. The above issues mentioned are related to features and internal actions of the organization. Just as the elements and activities are used in their work to develop goods or services, its relationship of input procurement and export of products are related with the suprasystem.

The foregoing describes the relationship between the cooperative and a theory called the theory of systems. It can be seen that in its various partners interact cooperatively and in turn is related to the cooperative organizations that make up the fishery. Similarly fishing activity is related to forestry and agriculture as the primary sector members. Also, the primary sector is related to the secondary and tertiary sectors to form the national economy.

In order to continue its economic work, cooperatives must strive to improve their mechanisms for inclusion in the economic activities of the United Mexican States. In this fact lies the importance of the implementation of the General Systems Theory in cooperative societies. The Mexican economic system as composed of sub-systems is a supra that Garciadía (2005: 141) defines as a set of complex units that are not part of it, but are under its control.

Cooperatives are part of supranational economic system. For that reason any organization faced several challenges in order to survive as a profitable economic entity. Systems that are related to each other and make the above system are called open systems. That is, cooperative environment must be integrated efficiently to strategically adapt to outperform its competition (Garcia, 1994). Then the theory of open systems is deepened. The cooperative is a business that is within the Mexican state, i.e., it is a system within a larger system which in turn is located within a larger system called human society. Therefore systems theory will be discussed. Systems theory emerged in biology and can be adapted to organizations and businesses.

Economic systems and companies present information as an input. This can be observed in the case of the various bulletins and reports submitted to the authorities as CONAPESCA cooperatives. Dynamic homeostasis and equilibrium state is presented to maintain a flow of energy and input procurement from the environment necessary for a better balance between the system and the supra system maintenance.

The systems theory revolutionized administrative approaches for studying organizations as social systems immersed in affected and interrelated systems. There is no organization that is insulated, all are interrelated. The origin of this theory dates back to the Aristotelian concepts of cause and effect, and that every integer is part of a larger one. Recent systems theory was

extended by Ludwig Von Bertalanffy who sustained that there are no independent chemical or physical elements, i.e., all elements are made interdependent units (Bertalanffy, 1989).

The fisheries sector is composed mostly by cooperatives that perform their functions according to their goals set out in its charter and supported by the administration in its implementation through the planning and control. Similarly, cooperatives perform the resources or inputs and internal components of the transformation process that result in goods or services which are issued to the environment or supra system. The cooperative object of this study makes the shrimp aquaculture production, which is the product exported to the fisheries sector and the primary sector on suprasystem.

On the other hand, people respond to recognize the obligations of the company through self-motivation and taking responsibility for their actions and goals. The systemic model contributes to the satisfaction of higher order needs such as: personal fulfillment, status, autonomy and self-esteem, deriving a passion and employee commitment to the organization (Tirso, 2008). As can be seen, the general theory of systems is paramount to the cooperative because it is located within a larger system that is human society.

Differentiation in the organization has an internal differentiation and development of roles for the benefit of better administrative activity. Equifinality states that there are variations in the initial conditions of the system that will result in the required influence due to efficient administration of the organization. As can be observed, companies or cooperative society's partners or employees and management are paramount in the proper development of system activities that is the organization.

CONTEXTUAL FRAMEWORK: Cooperative Society of Fishing Production El Patole, S.C. de R.L. de C.V.

Cooperative societies are the main working organizations of marine products that represent an important part of the fishing sector in the Mexican economy. In 2011 alone, catching marine products amounted to 1,660.475 tonnes live weight to mention one year, according to the Statistical Yearbook of the National Commission of Aquaculture and Fisheries (CONAPESCA, 2014). Deriving this fact has been the importance of timely regularization and adjustment of such activity as seen in the various decrees and regulations issued by the appropriate authority.

Sinaloa is a state that has communication with the Pacific Ocean and has 622 km of coastline which are exploited and operated mainly by cooperatives (INEGI, 2014). The state of Sinaloa has a location and oceanographic features that let it receive the influx of three marine currents favoring to develop productive fishing activities (Rendón, 1997:193). The coast allocation of the state of Sinaloa in the North Pacific with 656km. and 17,751km² of continental

platform and 221,000 hectares of coastal lagoons revealing a formidable marine wealth (Burgos, 1982:45). The marine wealth is mainly operated by cooperatives.

The object of study of this paper is a cooperative society called The Fish Production Patole, SC of RL de CV which is a large estuarine system has a property located in an area of 49,576.65 square meters (495-76.65 ha) of 43,836.09 square meters which are used as fish farm ponds. However, the location of "Lomas del Mar Piaxtla" fishing camp is in a protected area known as Meseta Cacaxtla (Plateau Cacaxtla).

The fishing camp is located within the boundaries of the municipalities of Mazatlán and San Ignacio, Sinaloa. The way to get to "Lomas del Mar Piaxtla" is through the international road at number fifteen, at a distance of thirty miles from the port of Mazatlán. The road has twelve kilometers of dirt unpaved and thirty-six kilometers of paved road. It is also just a kilometer away from the town Márbol, Sinaloa. Similarly if used the Maxipista highway connecting the cities of Mazatlán and Culiacán, "Lomas del Mar Piaxtla" is located ten kilometers of unpaved Culiacán and Mazatlán twenty kilometers. The importance of "The Patole" is social and economical for its workers, families and the environment of the state of Sinaloa.

In the late 1970s farm families who lived in the rural area Piaxtla de Abajo were in the dilemma that the increase of the population may not allowed to subsist in a dignified manner. Previously the community had depended on farming as its foundation. However, population increase caused concern to survive because the employment provided by the field was inadequate in meeting the most basic needs of rural families.

Due to this fact it was decided to found the Cooperative Society of Fish Production "The Patole" SC de RL de CV, whose purpose was to provide a source of employment for rural families. The Patole Cooperative Society was founded in the late 1970s, composed of citizens of Piaxtla de Abajo and San Ignacio, Sinaloa, in order to jointly support the economy of the participants. Its main objective was to create a source of employment for the inhabitants of the community Piaxtla de Abajo. The Patole began acting on December 17, 1978 and obtained its registration with the authorities on June 27, 1980.

The permissions granted to the cooperative society let it to capture in the protected waters of the area called Plateau Cacaxtla shrimp, flake products and oyster. The authorities responsible for overseeing the proper performance of The Patole are the Ministry of Agriculture, Livestock, Rural Development, Fisheries and Food (SAGARPA), the Secretariat of Environment and Natural Resources (SEMARNAT) and the National Commission of Aquaculture and Fisheries (CONAPESCA, 2014).

The Cooperative Society has permission to work in four estuaries The Dead (Los Muertos), Flags (Banderillas), The Patole and The Tazajal, being the latter the most significant.

Its importance lies in two aspects: Its geographical location within the boundaries of the municipalities of Mazatlán and SanIgnacio and direct communication with the sea all year as estuarine system. The Tazajal presents a flooded fifty acres at low tide and three hundred acres in rainy area. In the above mentioned estuary met the partners to forming the cooperative where is located the fishing camp in the estuarine system that is called "Lomas del MarPiactla" SanIgnacio, Sinaloa. On 27 November 2000, President of the Republic of Mexico Ernesto Zedillo Ponce deLeónpublica decree that declared protected natural area of flora and fauna of the region known as Plateau Cacaxtla (Meseta Cacaxtla) located between the municipalities of Mazatlán and SanIgnacio. At 50,862-31-25 hectares corresponding to the Meseta Cacaxtla (PlateauCacaxtla) the "Lomas del MarPiactla" is located fishing camp. Therefore it has been necessary to modify its social object in order to suit the requirements of the XXI century.

At present the corporate purpose of the cooperative is to extract, capture and fishing collectively in national and inland waters; as well as conducting sales, transportation and industrialization of the products obtained and aquaculture production of all kinds of shellfish, fish and crustaceans. The cooperative faces competition from globalization, implementation of new technologies and environmental protection.

The cooperative society the Patole permits required by the relevant authorities Secretariat of Agriculture, Livestock, Rural Development, Fisheries and Food (SAGARPA), Ministry of Environment and Natural Resources (SEMARNAT) and the National Commission of Aquaculture and Fisheries (CONAPESCA, 2014). It is a company with over three decades in operation and nineteen families that depend on this fact lays the importance of this research.

The Patole has two specific objectives: a. Increase in production levels. B. Expand its facilities in order to preserve their products to provide the best quality required by its customers. Similarly, the cooperative has the mission of producing shrimp aquaculture of excellent quality for local, national and international market, seeking the highest levels of profitability, with the most comprehensive resource development of society and especially the human care and sustainable natural resource use. Also, in coherence The Patole presents its vision as an organization that develops productive activity in the various economic and social fields, with proper handling of resources and efficient and competitive management.

It can be seen the compromise between the objectives, mission and vision with the requirements of the companies in question of quality and better development of their goods or services. The Patole is a cooperative that has been in business for over three decades and wants to continue offering its products to consumers for as long as possible. Derived from this fact is the need to increase the implementation of management theories for best performance, with the general theory of systems suitable to its needs.

METHOD

Research designed is cross-sectional descriptive study. The method used to analyze the results is to review the various authors on the theory of open systems as are Bertalanffy, Castillo, Churchman, Garciandía, Katz, Kahn, and O. daSilva. Similarly, the descriptive analytical method is implemented on the cooperative. The research literature lists of books, laws, decrees issued for the protection of the environment and data provided by the National Commission of Aquaculture and Fisheries (CONAPESCA, 2014). Information obtained on the Cooperative Society Fish Production "The Patole" SC of RLde CV is provided by its partners, who have the willingness and desire that the studies are made to benefit the company. Similarly, the cooperative have facilitating access to official documents of the cooperative charter, minutes of meetings of the members and reports issued to the appropriate authority.

The method used for this research included the participation of all partners and answered a questionnaire on the methodology of the Likert scale. This instrument provides a valid and the popular approach consists of a set of five items presented as statements or judgments and asked the partners to react with a response. Members can choose the answer that shows their opinion on the items presented. Note that each point is assigned a numerical value in order to quantify the results. Each partner gets a score regarding its claims and in the end a total of nineteen scores are added together for a total in respect of all claims. Such statements qualify the attitude object expressing a logical relation.

ANALYSIS AND RESULTS

The systemic approach favors companies because:

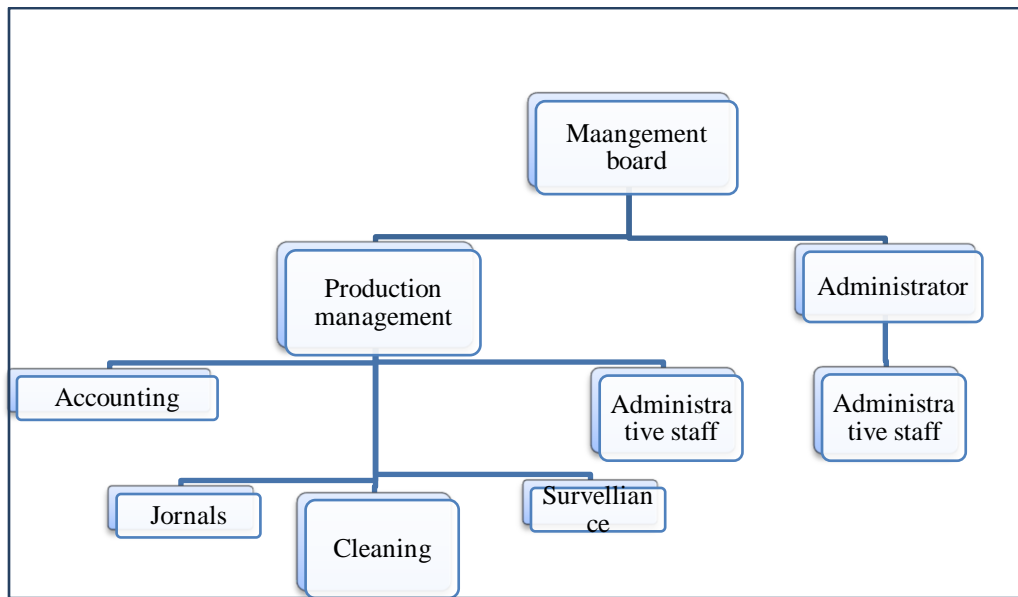
- A. Create the conditions for participation in externally financed projects.
- B. Increase the efficiency of the organization.
- C. Provides timely information for their operations.
- D. Decreases expenses and unnecessary costs.
- E. Establish more efficient processes.

The Cooperative Society of Fish Production "The Patole", "SC of RLde CV is an organization that works for the fishing activity corresponding to the Primary Sector. From its work depends nineteen families from direct jobs while indirectly benefiting the community of SanIgnacio area and Mazatlán.

Also, it benefits the state of Sinaloa in the economic and social aspects. The Patole is a company, which in turn is a system within the suprasystem of fisheries and the state of Sinaloa. Similarly, Sinaloa is a system within the suprasystem of the United Mexican States. Finally, The

Patole is a system within the ecological system of the Plateau Cacaxtla. As it can be seen in figure 1, below it can be find a systemic approach to the Cooperative Society The Patole.

Figure 1: Organization chart of the Cooperative society of fishing production- The Patole, S.C. of R.L. of C.V



*SUPRASYSTEM: MEXICAN
ECONOMIC SYSTEM*

*SUPRASYSTEM: PRIMARY SECTOR
FISHERY ACTIVITY*

Source: Based on data provided by the Cooperative Fish Production the Patole, SC of RL de CV

The key findings of the study are:

- A. The cooperative members show a resistance to systemic model, for this reason it is recommended to implement it gradually.
- B. The cooperative members does not want to assume greater responsibilities as their role as owners.
- C. The cooperative society must restructure its organizational system according to the legal structure established in LGSC.
- D. Administrative controls need to be more strict and precise.
- E. The assessment needs to be constant according to the principles of the systems approach.
- F. Implement incentives that encourage cooperative partners.
- G. Implement feedback from partners to the management of the cooperative.

DISCUSSION

Information provided by the website of CONAPESCA (2014) exposed various important data regarding fisheries in the United Mexican States.

- A. Mexico ranks #17 in worldwide fish production.
- B. This year there has been 1631,000 tonnes of seafood valued at \$ 19,000,000,000, of which 87% is caught seafood and the rest is aquaculture. While in the 2012-2013 season 11,124 tonnes were achieved, so far in the current season from 2013 to 2014 totaling 11,881 tonnes landed weight.
- C. Participation in international event SeaFoodExpo North America 2014 reported that Mexico had increased sales to \$ 15,000,000 dollars.

The general systems theory applies to the operation of fishery cooperatives. "A system can be defined as a set of interactive elements, each related to its environment, so as to form a whole" (DaSilva, 2002:244). This definition is consistent with the functions of the estuarine system "Lomas del Mar Piaxtla". This fact can be seen in its organization, because all partners have rights and obligations of work. Similarly it can be seen as the relationship of systemic theory and the Framework Law for cooperatives in Latin America stated on Participation in Chapters 4 and 5, which sets out economic partner and equal rights and obligations between the partners. Exposed as above, it reaches the reflection that the cooperative has extensive relationship with systems theory and therefore influences the sectors in which works in this case the primary.

CONCLUSION, RECOMMENDATIONS & LIMITATIONS

Implementing a model of systemic type in an organization is beneficial because it contributes to the delegation of tasks consistent with the basic principles of management. Similarly, a systemic model demonstrates that small as a company submits administrative features seen in larger companies demonstrating that management theories can be applied to any type or size of business. Also, it can be seen that the theory of cooperative systems and theory are closely related to present the cooperative as a company that works within a large system which in turn is a larger system.

The purpose of the foundation of The Patole was the benefit of cooperative members themselves and their families. For that reason, it also benefits third persons and families of members. Providers and suppliers of inputs are required by the cooperative and the customers who buy the goods produced by the cooperative. The economic entity's Patole benefits society. For this reason this paper studies the benefits and all the people involved and benefitted by its performance.

Likewise this research is in the initial study of the economic entity that is the Cooperative The Patole to continue studying it. Not only for the benefit of The Patole but also from other cooperatives of the fishing industry besides other small, medium and large companies can apply the findings from this and future studies in The Patole for their own benefit.

Final thoughts and recommendations

The systemic application of the cooperative model is based on The Patole:

- A. Diversification of supply shrimp and incorporating value-added bio-technological processes.
- B. The cooperative is based on a social nature, a philosophy of solidarity, mutual support and partnership philosophy.
- C. The objectives are set into the constituent bases.
- D. Integrate the best way to all members of the various activities required for the production of shrimp.
- E. Organizational restructuring to increase efficiency of the cooperative.
- F. Only hire external staff required in cases such as legal, administrative and financial consulting, quality control and care of the shrimp.

Derived from the above, are the following recommended:

- A. Conducting similar studies to this article in other economic entities in the sector aims to increase social benefits.
- B. Continue the performance analysis of cooperative society The Patole.
- C. Socialize between partners the advantages and benefits of the implementation of the ecosystem approach to the cooperative.

Mexico is a country with an exceptional maritime wealth: a coastline of 11,000 kilometers, an estuarine area of 16,000 square kilometers and an area of coastal lagoons of 12,500 square kilometers (Gutiérrez, 2001). These extensions are mainly operated by cooperatives in the fishing activity, which in turn belongs to the primary activities. At this point, it can be observed how the general systems theory is related to the economic functioning of society. Therefore ThePatole is a system that is within the fishery system located within the primary sector system, and in turn, within the Mexican economic system. It can be seen that within the ecological system of the Plateau Cacaxtla.

The Patole is a company that has been in business for over three decades. Also, it is an open system that works in aquaculture production of marine products especially shrimp. It

makes the process as an open system within its facilities. The whole process is performed according to the theory of open systems on a routine basis, planned and is feed back by its administration. Prior it was required an adaptation of the Patoletto the conditions required for markets and consumers that belong to the above system. Today, it should add the supraecological system by requests from the relevant authorities for the proper maintenance of Cacaxtla Plateau.

Limitations

This research has shown some limitations in access to information because the documental sources were very limited. It was necessary to interview to the members, but the barrier to supply the data were more in terms of attitudes toward the new approach.

People often resist change. For that reason, members of cooperatives have shown reluctance to implement the systemic model in the cooperative. The cooperative members were convinced that the best way was to continue with the previous model, the autocratic leader who made all the decisions. However, the leader was more interested in the systemic model to be adopted because it would be the best in the delegation of tasks and duties, as well as the functioning of the cooperative in accordance with cooperative principles of equality and mutual aid for the common good.

Arguably, it can be said that the main limitation was to change the attitude of the cooperative members to adapt to the changes and new business requirements for the sector in which they work. It is necessary to work on that the cooperative members show less resistance to change and adopt the systemic model for better performance.

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