IMPACT OF STRATEGIC PROTECTIONISM IMPLEMENTED BY BRAZIL AND ARGENTINA IN THE FIELD OF MEXICAN AUTO INDUSTRY

José G. Vargas-Hernández, Lic. María Laura García Pérez, Arturo Santillán García

University Center for Economic and Managerial Sciences, University of Guadalajara, Zapopan, Jalisco, México, jvargas2006@gmail.com, jgvh0811@yahoo.com, josevargas@cucea.udg.mx

Abstract: Today protectionist actions have been highly adopted by the nations, that in order to cope with the constant crises that threaten to slow economic growth. The cancellation of trade agreements has led to a strategic management restructuring, which now seeks to minimize the negative effects. Mexico is not the exception, because last year suffered the imposition of a series of protectionist guidelines by Brazil and Argentina, which were intended to reduce the number of exports that are made to these South American economies. This study intends to analyze the impact and strategic changes adopted by Mexico in the automotive industry as a result of these regulations. Using a method of analysis of quantitative and qualitative data is to estimate the damages to the sector as well as the measures taken by Mexico to decrease side effects.

Keywords: Automotive industry, international trade, institutions based view, protectionism, game theory.

JEL: F13, F51, F55.

INTRODUCTION

Globalization is understood according to García (2008) as a process that involves the integration of national economies into an international environment by establishing trade relations defined by the exchange of goods, services, technology, human capital and foreign direct investment. At present, globalizing activities have gained significant importance in the economic dynamics of the countries. In the specific case of México to date it has 12 free trade agreements with 44 countries, 28 Agreements for the Promotion and Reciprocal Protection of
Investments and trade agreements in the framework of the Latin American Integration Association. All these demonstrate a globalizing activity important for the Mexican country.

Similarly, the opening of markets has led to delays in the growth of economies as a result of global crises. Doporto, Fossati and Galperin (2009) tell that since October 2008 the countries have adopted measures aimed at protecting their internal market, which want to generate stimuli for economic sectors. These solutions range from commercial to state aid measures, which have been adopted by countries according to their conditions. On the one hand, the developed countries have chosen to trade measures, while developing countries have mostly resorted tariff measures on imported goods, as well as regulations implementing that act as non-tariff measures.

Such measures were adopted in 2012 by Brazil, who after reporting a deficit in the bilateral relationship with Mexico, threatened to leave the Economic Complementation Agreement 55 regarding importing cars. This action has resulted in a series of negotiations that lead in a new agreement between the two countries. Argentina reacted similarly, who later established protectionist measures in its trade relationship with Mexico in the same area.

The aim of this work lies in analyzing the impact and strategic changes adopted by Mexico in the automotive industry as a result of protectionist measures imposed by Brazil and Argentina to Mexican exports of light vehicles.

**BACKGROUND OF THE PROBLEM**

In 2008 the crisis originated in the U.S. raised a number of issues in commerce and trade. According to Doporto, Fosalti and Galperin (2009), the crisis led to greater restrictions established credit provision. It was settled a lot of investment, and household’s consumption decreased of many products that are not considered basic. This led to the end of the year resulted in a lower aggregate demand that globally generated deterioration in trade. So that, trade flows were affected, and caused a drop in production, which drove the economies to opt economies by protectionist measures, which are contrary to the neoliberal ideals who dominate the world. The goal of these solutions was to counteract the negative effects on the economy.

The trade relationship with Brazil has successfully grown 252% from 2001 to 2011. Today, Brazil represents Mexico’s seventh largest trading partner.
worldwide, and is considered the main South American partner. Exports have shown a growth rate of 736% in the same period, from $ 585 million in 2001-4891000 dollars in 2011, representing a favorable outcome for the business relationship; just as in the same period imports by Mexico from Brazil have grown by 117% from U.S. $ 2.101 million to 4.561 billion dollars. Within this relationship the profits of Mexico have been such that in 2010 there was a surplus of $ 330 million (Banco de México), 2012, a, b, c.).

Economic Complementation Agreement (ACE) No. 53 governs the commercial relationship between Mexico and Brazil, which came into force since 2003. Within this agreement there are a diverse set of tariff preferences ranging from 20% to 100%. Because this agreement is very limited in practical terms, both countries consider the possibility of establishing a Free Trade Agreement. Similarly, the ACE No. 54 governs the commercial relationship between México and MERCOSUR, a sub-regional bloc to which Brazil belongs. ACE No. 55 refers to the agreement between Mexico and MERCOSUR trade bloc focused on automotive related. Also, in 2005 México and Brazil signed a General Cooperation Agreement on Scientific, Technical and Training between PEMEX and Petrobras (Proméxico, 2012, a, b, c).

The new global conditions imposed by the Argentine government, coupled with the improvements in investment and domestic consumption, have led to improved economic conditions in the country. This has generated a satisfactory relationship with Mexico. In 2011 Argentina was considered as the partner of Mexico number 20 worldwide. In the period from 2001 to 2011 there has been an increase in exports of 703%, to reach 1.958 billion dollars. At the end of 2011, the trade balance was in surplus business relationship of 897 million favoring to Mexico, taking into account that since 2001 the trade balance had presented a deficit for Mexico, it can be seen that the relationship has begun to generate positive benefits (Banco de México, 2012, a, b, c).

Similarly, in Mexico’s imports from Argentina there has been an increase of 140% over the same period, from $ 441 million to U.S. $ 1.061 million (Banco de México, 2012, a, b, c.). The trade relationship between Mexico and Argentina are governed by a total 22 agreements: 1 strategic partnership, 4 tax-financial, 1 of tourism, 1 of economic cooperation, 3 economic complementation, 1 of investments, 3 in energy, 2 in agricultural, 5 in trade and investment and 1 in investment. As with Brazil, the relationship is regulated by the ACE No. 54 and No. 55 (Proméxico, 2011).
DEFINING THE PROBLEM

In early 2012, within the Mexico-Brazil trade relationship a dispute arose: The trade balance between both countries suffered a deficit that harmed Brazilian interests in the bilateral relationship. Because of this, Brazil threatened to abandon the Economic Complementation Agreement ACE-55, which entered into force since 2003, and from 2007 established a free trade relationship for light vehicles exchange between the two countries (Proméxico, 2012, a, b, c). With the attempt to quit, Brazil sought to protect their domestic markets by applying a 35% tariff on trade of this kind. Due to the economic importance representing Brazil, considered the main South American partner of México, it was forced to renegotiate the agreement, reformulating its strategies as a way to counteract collateral damage.

As part of the agreements reached, it was set strict quotas limiting exports. Quotas will remain in a period of three years. At the end of the term it is proposed to return to the free trade formerly enjoyed. The restrictions are as follows: for the first year the fee is U.S. $ 1.45 billion for the second and $ 1.56 billion and for the third year it will increase the quota to 1.64 billion dollars (AMIA, 2012, a, b, c, d, e, f, g, h, I, j.). According to considerable international consultancy conducted by IHS Automotive, this measure represented a significant obstacle to the development of trade, because the new conditions allowed only during the first year (2012) sales were projected at around 93,000 units, far below the 147000 units sold in 2011.

As a ripple effect, months after renegotiating the bilateral agreement between Mexico and Brazil, in June 2012 Argentina decided to abandon the Economic Complementation Agreement ACE-55, using a 35% tariff imposed on imports of light vehicles from Mexico. According to Undersecretary of Foreign Trade, in response to this situation, the Mexican government decided to implement a “measure mirror” setting a 20% tariff on cars imported from the South American country. The cancellation of the agreement for Mexico represented a setback in the development of the business relationship, because, according to AMIA exports falling by about 900 million was a foregone conclusion.

On October 22, 2012, Mexico requested before a WTO a dispute settlement panel, arguing that the measures imposed by Argentina harmed negatively Mexican exports. Along with this demand, the European Union, Japan and the United States expressed similar complaints to the WTO. At the conclusion of the consultation period there was not got any solution, so that the business relationship between the two countries was seriously affected. By the end of 2012, an agree-
ment was reached that in order to counteract the negative effects, like Brazil, it was established export quotas, which would remain in force for a period of three years, so that at the term is expected return to free trade system. For the first year the amount of exports should not exceed the sum of $ 575 million Dollars, for the second quarter $ 625 million of Dollars and 187.5 million for the third quarter (AMIA, 2012, a, b, c, d, e, f, g, h, I, j,).

According to the problems identified, the following question arises: What is the impact on the sector and strategic changes adopted by Mexico in the automotive industry as a result of protectionist measures imposed by Brazil and Argentina to Mexican exports of light vehicles?

**JUSTIFICATION**

There is no denying the importance of international trade to the growth of nations. According to the WTO (2010), this activity allows the exchange and technology improvement through innovation generated by learning. In the same way, in the short and medium term, external demand can improve the level of savings and the situation of the financial system when not profits are obtained from domestic demand. So it is important for nations to establish international business relationships that help to improve production levels and efficiency of it, thus improving the level of competition and the quality of the inputs required.

Within the context of Mexico’s foreign trade, it has gained considerable importance in the economy of the country. The following table shows the evolution of the share of exports in GDP from 2008 to 2011:

<table>
<thead>
<tr>
<th>Year</th>
<th>Share of GDP</th>
</tr>
</thead>
<tbody>
<tr>
<td>2008</td>
<td>28%</td>
</tr>
<tr>
<td>2009</td>
<td>28%</td>
</tr>
<tr>
<td>2010</td>
<td>30%</td>
</tr>
<tr>
<td>2011</td>
<td>32%</td>
</tr>
</tbody>
</table>

**Source:** Own elaboration based on data from the World Bank (Banco Mundial, 2012).

The above table shows a positive trend in the growth of export activity, which through the years has been consolidated due to the establishment of trade agreements and free trade agreements. Similarly, it emphasizes the importance of
strengthening international trade relations that promise optimal benefit level to promote the economic growth of the country.

Within the balance of manufactured goods, exports related to the automotive industry are occupying 32.7% of total sales, which highlights the importance of this sector in foreign trade (INEGI, 2013). From 2009 to 2011 exports related to this industry showed an increase of 75.2%. In regard to light vehicle exports to Latin America, they accounted for 15% in 2011, compared to 11% that was reached in 2010 (Proméxico, 2012, a, b, c.). Because of this it is important to study those external variables that can negatively impact the performance of export activity in the country.

Mexico’s relationship with Brazil and Argentina gives a great importance to exchanges related to the automotive industry. Just to Brazil in 2010, a 59% increase in exports was related to this sector. While in Argentina, in 2011 exports of this kind totaled the amount of 888.3 million dollars (Proméxico, 2012, a, b, c.).

The importance of the automotive sector in the Mexican economy is evident. Internationally, the automotive industry has placed Mexico ranking 8th among the top producers and at Latin America area México is ranking in second place. In 2011, it had a share of GDP of 3.6%. The sector has 8 firms producing light vehicles, 10 dedicated to the production of heavy vehicles and about 1100 part makers (Proméxico, 2012, a, b, c.). The Latin American market is up the month of April 2013, 13.0% of exports of vehicles in Mexico, ranking second only behind the United States (AMIA, 2013, a, b, c, and d.).

Considering the positive trends in the sector, it is vital to constantly monitor environmental conditions, due to the existence of variables that have the potential to impact heavily on performance. Such is the case of new restrictions on Mexican exports of light vehicles in Brazil and Argentina, considering the importance of both partners and the share of this sector in the economy. The study of this issue can generate knowledge about the dynamics of trade between nations, which can contribute to making-decisions in the future.

**WORKING HYPOTHESIS**

According to the importance of this sector in the growth of the Mexican economy, and considering the current conditions in trade relations with Brazil and Argentina, it is presented the following hypothesis:
Protectionist actions implemented in Brazil and Argentina to the imports of light vehicles from Mexican exports is affecting the performance of the sector, thereby generating strategic changes to courses in order to counteract the collateral damage and adapt actions to the new conditions of environment.

CONCEPTUAL-THEORETICAL FRAMEWORK
This essay is essentially based on the popular institutional based-view which serves as the theoretical perspective that explains the behavior of institutions or “rules of the game” involved in strategic management. Institutions are considered one of the essential elements for making decisions, because not only resource management can ensure by itself the scope and development objectives of competitiveness, but it is also relevant to consider that the behavior of an economic entity. In this case a country is limited by these series of guidelines encompassing ethical or regulatory standards involved in the final actions.

Applying it to the field of study that concerns, institutional-based view gives a proper theoretical explanation about how strategies can be modified according to environmental conditions. This type of modifications made to the organizational structure of the country directly impact the decisions of others, so it is important to study this theoretical perspective in order to enrich the scope of this work.

Similarly, it is relevant to the theoretical framework the use of “Game Theory” which provides adequate conceptualization about the strategic interaction between economic agents. In this case, considering the relationship between nations, which seek to maximize the level of benefits courses of action adapting to the dynamics of the environment? One of the variables in strategic management in the case of protectionism is given by the change in the rules of the game, which seeks to protect the interests of each of the participants. The study of both theories shows an integrated theoretical explanation that allows analyzing the strategic behavior of nations within the framework of the existing “rules of the game”.

A. The institutions-based view in international trade relations.
The human being, in his quest to find personal development, makes decisions using rationality, which is part of its nature. Given this premise, it is considered that the set of actions carried out in the environment have the ultimate objective of maximizing personal gain, so this behavior is named within economic theory, as a “rational” behavior. Those who possess the ability to make rational decisions can adapt to environmental conditions and will therefore be able to survive variations thereof.
According to Simon (1957), it is impossible for the human being to be able to grasp at all the existing information environment and thus to have the ability to make objective decisions. To Simon (1957), human rationality is limited. Therefore, within the information processing, it is involving a number of subjective elements that shape the final decisions. Such elements may be the beliefs, values and ideologies held by the individual.

Within the environment of trade relations, it has been established a set of principles that serve as determinants of the behavior of nations. This regulation has evolved over time, establishing increasingly complex structures that meet current social needs. Such regulations are known as institutions, which are defined by North (1990) as the rules of the game in a society or, more formally, social constraints and obligations created by humans that shape human interaction.

This set of “rules” is generally classified as follows: Informal and formal. North (1990) explains that formal institutions are those formed by the entire set of laws, regulations and rules, on which there is a figure of authority that imposes penalties, if these principles are not respected by the individuals. Similarly, within this classification are informal institutions, which are composed of the set of ethical, cultural and normative. This set of rules form what is known as the institutional framework.

The uncertainty represents a significant obstacle to the establishment of goals. For North (1990) the lack of information on how the partner will act prevents the economic entity to achieve the objectives within the international environment. Nations seek the means to allow for relevant supply information on conditions outside, which gives the tools to shape the strategies according to the global dynamics, considering an appropriate level of certainty.

The global environment is difficult to predict, even acting in environments which are relatively stable. Peng (2006) tells us that there are two kinds of institutions that reduce uncertainty: Formal and informal. Informal institutions in this context are based on personal relationships, which as its name says, being “informal” are established by means of the word. In that respect there are no contracts requiring forced participants to comply with its obligations, but that trust plays a key role.

On the other hand, formal institutions known as transaction at hand are based on a set of rules that must be respected by the participants. Within these
exchanges is essential to involve a third member who serves as the regulator of the relationship (Peng, 2006). This will respect the agreements established within the exchanges. Formal institutions represent thus regulating means international relations since the establishment of trade agreements between countries seeking to reduce uncertainty about how to act the counterparty when it seeks to protect its interests.

Institutions serve as one of those key variables within strategic management. The view based on institutions is seeking to understand the dynamics and the relationship between strategic decisions and institutions, so that the courses of action are consistent with the conditions of the external environment. Inside the importance of institutions Peng (2006) it is mentioned that the institutionalism approach handles two proposals. The first relates to the assumption that economic entities and their representatives make decisions based on rationality, seeking to maximize the benefit, so their decisions are being affected by the existing institutional frameworks. Similarly, the proposal theory two, tells that generally the complementation of formal and informal institutions is when there are highly weak formal settings, so informal institutions offer the ideal structure for reducing uncertainty, by what ensures that decisions result in actions aimed correctly.

The importance of the rules of the game in the performance of nations is evident. The fixed established normativity action fields that shape the strategic behavior of countries, which is why it is essential to establish formal agreements to achieve to neutralize search interests of both parties. With this it is expected to promote efficient business relationships that generate benefits to stakeholders.

**B. Game Theory in the strategic interaction of nations.**

Another theory that is relevant to the study of the phenomenon of protectionism is game theory. Because decisions made by one of the partners may affect the course of action adopted by the counterparty, it is considered that there is a strategic interaction, which is a key variable for the study of this theory.

The use of game theory in the context of international trade provides an overview of analysis that can understand the strategic environment among nations. The theory maintains the principle of dependency among participants in what is called a “game”, since the actions of each player significantly impact the decisions of the counterparty. The game theory formally studies situations of conflict and cooperation among players, and allows us to analyze the strategic scenarios which may face an individual, firm or nation (Turocy and Stengel, 2001).
According Turocy and Stengel (2001), the game is defined as a formal model that shows a situation of strategic interaction, which is considered the relationship between various “players” who are faced with the search for optimal solutions to a problem of decision. Within the study that concerns this analysis, in the context of trade relations between the nations, players are considered the countries involved in trade relations, which in this case refer to Mexico, Brazil and Argentina.

Because players make decisions rationally according to their wishes, this causes that influence in a certain way the type of decisions made by the other party, which is why the strategic interaction within each other’s wishes result to be considered in-dispensable player for achieving optimal solutions (Fernández, 2004). Within the study it is considered the concept of cooperative game, in which it is, specified the payment amount, or outcomes, that the parties will obtain if their behavior tends to cooperation. This type of cooperative games can be highly observable in international relations, where power plays a fundamental role in the interaction. The power tends to excel in conditions where negotiations have failed, so that the influence of a party can set the course of the relationship (Turocy and Stengel, 2001).

In contrast, the non-cooperative game is one in which participants make decisions based solely on satisfying their own interests (Turocy and Stengel, 2001). Within the framework of trade relations, both parties are aware of the effect their actions cause in the performance of the other party. Because the relationship is based on partnerships, as in the case of Mexico and its commercial relations with Brazil and Argentina, generated agreements seek benefits for the parties involved. So that the modifications made within the strategic interaction change the action scheme of the counterparty. That’s why in addition to caring personal interests, decisions are based on the interests of the other player, which is stipulated in existing trade agreements, with results in cooperative games.

**CONTEXTUAL FRAMEWORK**

Within the framework in which the problem develops, it is essential to analysis automotive sector in the economy, and the valuation of trade with Brazil and Argentina, which can give significant information about the context in which it is presented the protectionist problem.

**A. Automotive Manufacturing in Mexico**

In 2011 the production of the automotive was record-breaking in its history, because it amounted to 2.55 million vehicles manufactured. With this record,
México did overtake France and Spain, ranking eighth in the world production. In the same year sales to international markets accounted for 28.4% of total exports. This level represented 1.4 more times than oil exports of the country.

The projections for this sector remain positive for 2015 when it is expected to reach production of 3.7 million units. In terms of employment generation, it also has considerable importance in the country’s economy because it generates more than 550,000 direct and indirect jobs. It is important to note that the benefits in cost and skilled labor with which the country counts within the terminal branch of the light vehicle industry, have led to various automakers to consider this country as a strategic point for investment (Proméxico, 2012, a, b, c.)

B. Business relations with Brazil
Brazil is considered the main South American trading partner of Mexico. At global scale it occupies the sixth place among major economies. Trade relations with China have grown through the years, which have been reflected in trade indicators from 2001 to 2011 when exports showed an increase of 736%. 71% of exports to this country are composed of manufactured products, of which 48% are cars. With respect to imports, it had originated 117% growth, from 2,101 md in 2001 to 4561 md in 2011. Within the period of January 1999 to December 2011, Brazilian companies with operations in Mexico generated an economic impact of 1.1478 billion dollars, registering a considerable investment of 299 million directed primarily (51%) of manufacturing companies (Proméxico, 2012, a, b, c.).

The automotive sector has great growth opportunities in this business relationship. In 2011 light vehicle exports to Brazil increased 59% in 2010, 9% of foreign car sales in Brazil were from Mexican companies, which meant an increase of 47%. The importance of the automotive sector in Mexico-Brazil relationship is remarkable, because this category represents one of the pillars of their trade relationships (Proméxico, 2012, a, b, c.).

C. Business relations with Argentina
Argentina is considered as the second largest economy in South America. According to the projections, it is expected moderate growth in the economy as a result of import growth and inflationary pressures. Within the commercial relationship with Mexico, exports grew by 703% in the period of 2001 to 2011. Within these exchanges, manufacturing occupied 99% of exports to Argentina, which mostly were cars and car parts. In the period between 1999 and 2011 the Argentine companies with operations in Mexico made investments amounting to 651.9
million. In 2011 there was an investment retirement representing a decrease of 651% (Proméxico, 2011).

In this context the auto trade has made a significant growth trend. In 2011 the total sales of vehicles to Argentina added an amount of 888.3 million dollars. Added to this, Mexico has a considerable advantage in production over Argentina, as during the 2011 vehicle production totaled 2.69 million units (Proméxico, 2011).

**METHOD**

For the analysis of the impact of protectionist measures is necessary to study a series of statistics that can provide objectively a clear picture about the changes arising in the variables of interest, which is why the use of a quantitative approach is essential for the estimation of damages to the sector. Similarly, it is important the analysis of information with a qualitative approach that allows it to study the characteristics of the phenomenon. So research complements and seeks an understanding of the dimensions of the problem and favors the generation of full conclusions. The selected method is vital to the development of research, because it establishes the methodological support that will allow the selection of appropriate information to explain the research problem.

**ANALYSIS OF RESULTS**

Trade restrictions took effect from the month of March 2012, so it will be analyzed the trend of exports starting from that date until the month of April 2013:

*Table 2.* Change in exports to Latin America from March to December of 2012.

<table>
<thead>
<tr>
<th>Month</th>
<th>2011</th>
<th>2012</th>
<th>Change %</th>
<th>2011</th>
<th>2012</th>
</tr>
</thead>
<tbody>
<tr>
<td>March</td>
<td>30,899</td>
<td>38,513</td>
<td>24.6</td>
<td>16.0</td>
<td>16.3</td>
</tr>
<tr>
<td>April</td>
<td>23,106</td>
<td>21,391</td>
<td>-7.4</td>
<td>16.3</td>
<td>12.7</td>
</tr>
<tr>
<td>May</td>
<td>24,275</td>
<td>31,942</td>
<td>31.6</td>
<td>13.7</td>
<td>17.1</td>
</tr>
<tr>
<td>June</td>
<td>27,013</td>
<td>31,229</td>
<td>15.6</td>
<td>14.4</td>
<td>13.6</td>
</tr>
<tr>
<td>July</td>
<td>22,937</td>
<td>21,223</td>
<td>-7.5</td>
<td>11.7</td>
<td>10.2</td>
</tr>
<tr>
<td>August</td>
<td>28,333</td>
<td>27,325</td>
<td>-3.6</td>
<td>16.7</td>
<td>14.5</td>
</tr>
<tr>
<td>September</td>
<td>28,885</td>
<td>32,269</td>
<td>11.7</td>
<td>14.9</td>
<td>16.7</td>
</tr>
<tr>
<td>October</td>
<td>28,752</td>
<td>33,115</td>
<td>15.2</td>
<td>14.9</td>
<td>15.3</td>
</tr>
<tr>
<td>November</td>
<td>35,236</td>
<td>27,180</td>
<td>-22.9</td>
<td>17.7</td>
<td>12.4</td>
</tr>
<tr>
<td>December</td>
<td>29,690</td>
<td>20,275</td>
<td>-31.7%</td>
<td>17.3</td>
<td>13.1</td>
</tr>
</tbody>
</table>

*Source:* Based on data from the AMIA, (2013, a, b, c, d.)
As can be seen in the tables above, from March to October 2012 there were only decreases during the month of April, July and August, which were not very significant because in the subsequent months resubmitted increases in exports. From the month of November the onslaught of new regulations was more evident. In November 2012, turned out to be significantly decreased upon reaching -22.9%, and that a month earlier it had achieved an increase of 15.2%. Declines in exports continued appearing from this month, because in December the percentage was -31.7% (AMIA, 2012, a, b, c, d, e, f, g, h, I, j.), followed by the month of January 2013 with a rate of -56.2% February with -50.2% in March to -31.7, during the month of April was moderately decreased to achieve a rate of -12.1% (AMIA, 2013, a. b, c, d.)

Table 3. Variation of exports in Latino America January to April of 2013.

<table>
<thead>
<tr>
<th>Month</th>
<th>2012</th>
<th>2013</th>
<th>Variation</th>
<th>Participation %</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>%</td>
<td>2012</td>
</tr>
<tr>
<td>January</td>
<td>32,364</td>
<td>14,182</td>
<td>-56.2</td>
<td>20.7</td>
</tr>
<tr>
<td>February</td>
<td>37,992</td>
<td>18,938</td>
<td>-50.2</td>
<td>19.2</td>
</tr>
<tr>
<td>March</td>
<td>43,084</td>
<td>29,424</td>
<td>-31.7</td>
<td>19.0</td>
</tr>
<tr>
<td>April</td>
<td>27,400</td>
<td>24,081</td>
<td>-12.1</td>
<td>15.2</td>
</tr>
</tbody>
</table>

Source: Own elaboration with data from AMIA, 2013.

The above figures clearly show that the effects caused by the restrictions applied by both nations were not immediate, but presented gradually to the point of generating significant reductions in the volume of exports of vehicles. The new guidelines on exports, which are valid until 2013, caused that the loss in the Mexico-Argentina relationship was 36.8% and in the case of the relationship with Brazil of 71.9% (AMIA, 2013).

As regards production, the following table shows that not greatly affected the number of units produced in the country, but in the month of December is shown a considerable reduction to reach the amount of units 180,597 (AMIA, 2012). This may be attributed to the celebrations raised during that month, so it causes a decrease in productivity.
Table 4. Variation of the units produced

<table>
<thead>
<tr>
<th>Year</th>
<th>Month</th>
<th>Produced units</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td>March</td>
<td>268,625</td>
</tr>
<tr>
<td></td>
<td>April</td>
<td>206,389</td>
</tr>
<tr>
<td></td>
<td>May</td>
<td>228,048</td>
</tr>
<tr>
<td></td>
<td>June</td>
<td>268,368</td>
</tr>
<tr>
<td></td>
<td>July</td>
<td>238,146</td>
</tr>
<tr>
<td></td>
<td>August</td>
<td>248,835</td>
</tr>
<tr>
<td></td>
<td>September</td>
<td>253,444</td>
</tr>
<tr>
<td></td>
<td>October</td>
<td>282,283</td>
</tr>
<tr>
<td></td>
<td>November</td>
<td>265,001</td>
</tr>
<tr>
<td></td>
<td>December</td>
<td>180,597</td>
</tr>
<tr>
<td>2013</td>
<td>January</td>
<td>242,855</td>
</tr>
<tr>
<td></td>
<td>February</td>
<td>246,197</td>
</tr>
<tr>
<td></td>
<td>March</td>
<td>238,519</td>
</tr>
<tr>
<td></td>
<td>April</td>
<td>238,766</td>
</tr>
</tbody>
</table>

Source: Own elaboration with data from AMIA, 2013.

Because productivity has not been affected by protectionist impositions, it can be deduced that those units that stopped to export to the Latin American market now is looking to direct them to other global markets. Within the collected statistical data it can be seen that in those months in which there was a drop in Latin American exports, simultaneously showed increases in other markets. The following table reflects this assumption:

Table 5. Markets in which there was an increase in exports during 2012 and 2013

<table>
<thead>
<tr>
<th>2012</th>
<th>Month in which there was a decline in exports to Latin America</th>
<th>Markets in which there was an increase simultaneously</th>
</tr>
</thead>
<tbody>
<tr>
<td>April</td>
<td>Africa, Asia and Europa.</td>
<td></td>
</tr>
<tr>
<td>July</td>
<td>United States and Africa</td>
<td></td>
</tr>
<tr>
<td>August</td>
<td>Africa, Asia and Europa.</td>
<td></td>
</tr>
<tr>
<td>November</td>
<td>United States and Africa</td>
<td></td>
</tr>
<tr>
<td>December</td>
<td>Canada, Africa and Europa</td>
<td></td>
</tr>
<tr>
<td>2013</td>
<td>January</td>
<td>United States</td>
</tr>
<tr>
<td></td>
<td>February</td>
<td>Canada and Asia</td>
</tr>
<tr>
<td></td>
<td>March</td>
<td>Africa and Asia</td>
</tr>
<tr>
<td></td>
<td>April</td>
<td>United States, Asia y Europa</td>
</tr>
</tbody>
</table>

Source: Based on data from the AMIA, 2013.

The search for new markets is one of the new strategies implemented by the Mexican government in order to place in potential areas those vehicles that for the period of three years may not be marketed in the Latin American market, so that the damages sought not impact on the productivity of the sector indices,
which is really vital considering the global prestige that counts the Mexican automotive industry worldwide.

CONCLUSIONS

According to the study of the information collected, this analysis the above assumption: Protectionist actions by Brazil and Argentina to Mexican exports of light vehicles actually have generated impact on the performance of the sector, because as previously shown, exports to the Latin American market have declined in recent months. Similarly, the search for new potential markets proves to be a vital task for the development of the automotive sector, so that according to the data, there is a slight growth in exports to alternative markets such as Asia, Africa and Europe.

It is then shown that a change in the “rules of the game” can generate significant damages in the performance of nations. In the overall scheme, trade relations should be based on cooperation agreements that provide benefits for the parties involved, considering that strategic interaction has an important role in decision making. International agreements serve the purpose of protecting the interests of both parties, but in the case of Brazil and Argentina, it was missed the agreements. Thus in an improvised makeshift, Mexico had to adapt to new conditions in the negotiation, so sought minimize the damages to the sector.

Protectionist measures offer solutions in the short or medium term to economies, because it effectively protects the economic sector, but long-term business relationships are damaged with partners. When applied discriminative measures other nations generally respond the same way. Thus, it is likely that this type of action terminating within a trade war, as happened with the claim that Argentina beat Mexico to the WTO, which caused the business relationship to wear. The implementation of these measures is usually done in an effort to seek higher revenues from local industry, which results in the loss of major trading partners that consume a significant amount in the market, so foreign exchange loss generated by the damage to the economy outweigh the benefits.
REFERENCES


AMIA (Asociación Mexicana de la Industria Automotriz), (2013b). Boletín de prensa Febrero 2013


José G. Vargas-Hernández, Lic. María Laura García Pérez, Arturo Santillán García

IMPACT OF STRATEGIC PROTECTIONISM IMPLEMENTED BY BRAZIL AND ARGENTINA IN THE FIELD OF MEXICAN AUTO INDUSTRY

proteccionismo? Revista del CEI, 15, pp. 89-123.


