


EXPANDING BUSINESS TO LATIN AMERICA

Internationalization plan for a Born-again
global company

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ABSTRACT

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EXPANDING BUSINESS TO LATIN AMERICA:
Internationalization plan for a Born-again Global company

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This thesis is done to support and guide a Spanish based company to find the best market for the business expansion plan on area of business related to the paper industry. For this, the aim is to find a target country in Latin America. The selection of the target market, is based on a pre-study of the market. If the pre-study of the market is not properly done it can bring unexpected problems and unnecessary costs to the company. However, many of these problems can be foreseen by profound market research on the sector of products or services related to the companies' trade.

The methods applied in analysis are not commonly used on financial area. One example is the principal component analysis, which, in this study, is used to reduce the big data in order to analyse the result easier. Matlab is a common tool in the researches related to the area of engineering, but in this research, it is used to execute the Principal component analysis as a part of financial study. The differences between the countries' paper demand, production and importation volumes of the market is studied, by calculating the Apparent National Consumption per capita on different paper sections and analysing it's development and standard deviation. Apart from this other macro-economic, population, country access and easy doing business related factors are studied. The result, the target country, is obtained by using the Principal Component Analysis and the Apparent National Consumption result. When the target country is clear the Internationalization strategy is planned based on the guidelines of Uffe Bundgaard-Jorgensen.

Internationalization strategy is important support and guide for a company that wants to expand business. Fast internationalization of companies has been popular topic in the last decades. This has been because many new companies have started their business on the global market instead of founding the business first on domestic market. This phenomenon is called Born Global. The traditional companies that have not started on the global markets; what opportunities do they have for the fast internationalization? The Born Again Global are companies that internationalize fast after having had strong position on domestic market for many years. To achieve this a company needs an internationalization plan, including a profound market research on the sector of products or services they are trading.

Key words: internationalization, born-again global, principal component analysis

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ABBREVIATIONS AND TERMS

ANC	Apparent National Consumption
CR_Factor	Country Risk factor
FAO	Food and Agriculture Organisation of the United Nations
FDI	Foreign Direct Investment
PCA	Principal Component Analysis
FSI	Fragile States Index
T-factor	Tariff factor
PC-Analysis	Principal Component Analysis
σ	Standard Deviation

1 INTRODUCTION

1.1 Research topic

Growing businesses must take in consideration the option of internationalising their company and find new markets, new business opportunities and new challenges. In 1492 Columbus arrived in a new and unknown land. He travelled with three boats: Niña, Pinta and Santa Maria and landed to Bahaman islands. From that moment, the American continent has been important trading partner with Europe.

Internationalization is a current topic as the technology has improved so much and has offered new opportunities for companies to trade easily across borders. The Internet has changed the world for good. People order from the other side of the world products which they can't find at the local stores or they get the same products with better price ordering from the net.

The commissioner is a Spanish based company operating on paper industry, not only selling and distributing paper but also providing services related to other companies' paper handling. From now on the commissioner is referred as Company. The Company suggested the topic for the thesis *Expanding business to Latin America*. However, the Latin American market was interesting to me because many years of work experience on the Hispanic markets. Due to this I have got to know many businesses on the paper sector and how they operate. The market analysis is also structured based on my experiences with problems when one needs to compare factors and rates that are not directly comparable. In this research Matlab is used for these comparisons as platform for the Principal Component analysis. Matlab is not generally used in the world of finance, but it could be implemented more for of the people who are interested in learning how to use it.

1.2 Research questions

The focus is to plan the internationalization. The aim is to help the Company to find the best country and plan the entrance.

The research question to develop the aim is:

- Which is the best target country for expanding the business in Latin America for the Company?

The pre-work before starting operations in a foreign country is essential, this means finding the country that is the most eligible from the paper business point of view.

When the result is obtained, the internationalization strategy can be planned based on the theories. The sub question is;

- Which is the best way to enter the market?

1.3 The Structure of the thesis

Section one tells about the background on the topic selection and presents the research questions and a general view on the thesis.

Section two gives an overview on the Internationalization theories since beginning of the last century until the recent studies.

Section three is the theoretical frame work of the research based on one Internationalization strategy.

The focus of the section four is in the methodologies and the data acquisition and the analysis methods and the obtained results of the analysis are presented in the section five.

Section six presents the internationalization plan and final section seven focuses on the conclusions.

2 THEORIES OF INTERNATIONALIZATION

2.1 The development of the internationalization

One of the most known and referred theory of internationalization is the Uppsala model or so-called process theory. The study was done by Swedish researchers Johansson and Vahlne, 1977. This theory has been updated during the years and it is still referred in recent studies. Other theory from the 70s is the Eclectic theory by Williamson, 1975 and Dunning, 1979. These studies have given a good basis for many companies to build their plan of Internationalization during the years. In the figure 1 there is a presentation of the internationalization theories and their development since the late 19th century.

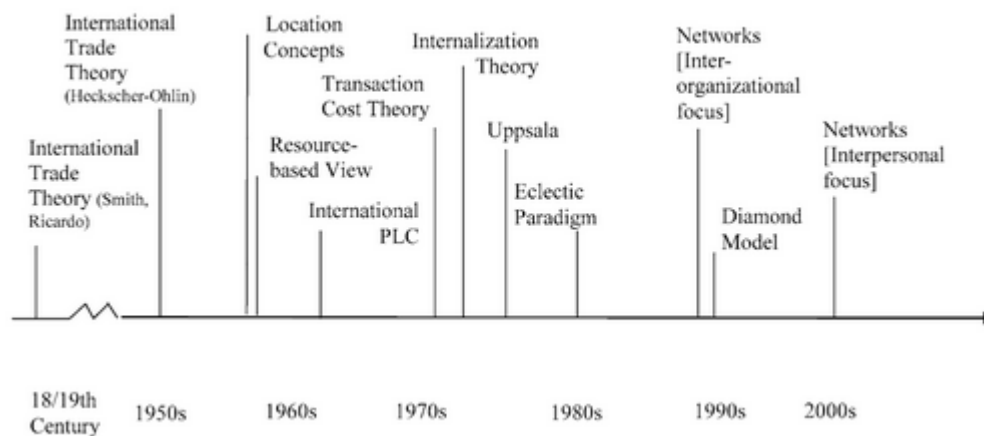


FIGURE 1. The development of internationalization theories (Glowik, 2016, 110)

Studying different theories helps the company to understand what they truly expect. Do they want to internationalize fast or is it a plan for the next 10 years? The Uppsala model considers the internationalization as a slow process. This is because company needs to acquire experiential knowledge and gradually increase the commitment to foreign markets. It considers the internationalization as a chain process and the knowledge acquisition and the commitment happens in stages. (Johansson & Vahlne, 1977; 1990)

2.2 Born Global

In the era of computers, globalisation and internet, do we really need so slow process for internationalization? Arenius, Gabrielsson and Sasi (2005, 5-6) studied the rapid internationalization enabled by the Internet. Internet can be used as the sales channel and the use of it has increased rapidly. The so called Born Globals have shown that with good planning and calculation and with global networks, the internationalization of a company can be done fast and with good results. What is a Born Global? The definition of Oviatt and Mc Dougall (1994, 49) is that it is “a business organisation that from inception, seeks to derive significant competitive advantage of the use of resources and the sale of outputs in multiple countries.” As per Cavusgil & Knight (2009, 10) the facilitating factors for Born Global companies are: Market globalisation, advanced communications and information, Product technology advances, Global niche markets and Global networks.

The Internet has given opportunities for companies with less resources to internationalise. Opening a Web page, offering a service to order can be a door opening for a small firm to grow and become an international corporation. The global networks give a huge advantage for fast internalization.

Companies referred as Born Global are usually recently established that internationalize at early stage. Could the Born Global strategy be used in companies that have been on their domestic market already for many years? For these cases, the concept derived from Born Globals is Born-again global. This refers to companies that have had good position in domestic market, have internationalized fast in global markets. Companies with strong knowledge base, have good possibilities to internationalize fast. (Bell et al. 2003, 345-346)

The concept Born global was originally presented by Australian consultants McKinsey & Co. in 1993 (Cavusgil & Knight 2009, 14). They noticed that many small Australian companies began exporting in early stage, within two years of the establishment of the company. The term "Born Global" appeared first in 1993 in an article written by Michael Rennie referring to the study of McKinsey & Co. His definition was: "These firms did not slowly build their way into international trade. Contrary to popular wisdom, they were born global" (Rennie, 1993.) The example company was Cochlear which was operating on production of implants for the deaf. The company was based in Australia, but with help of its strong network with the hospitals in Switzerland, Germany and the United States it internationalized very fast. (Rennie, 1993)

In 1994 Oviat and McDougal presented their observation on the early stage ventures didn't follow the traditional internationalization steps but internationalized very fast. The Born global ignore the domestic market until they have strong global position. The debate over Born global has developed and expanded. The debate is concentrated among three concepts on how the entrepreneur companies internationalize:

- Gradual global
- Born global
- Born-again global

2.3 Born-again Global

Born-again global are called as the "extension to the Born Global phenomenon" (McNaughton, 2001). According to McNaughton (2001), these companies first put focus on domestic market, then like a Fenix bird, they re-emerge as in international company. The Born-again global mostly represent traditional industries, not high technology. These companies can internationalize fast due to the secure turnover in domestic market. According to Cavusgill and Knight (2005, 11) a team member's entrepreneur and international spirit, push the company to internationalize fast. Hurmerinta and Peltomäki (2003, 226) present a similar idea as they consider internationalization as result of human behaviour:

- Open mindset
- Innovative
- Global mindset

Born global and Born-again global don't follow the traditional internationalization theories, that consider the international process should be done in stages, such as the earlier mentioned Uppsala model does. As mentioned in the article by Rennie (1993) the strategic focus is in networks. The networks and alliances are considered as enabling process in the internationalization. It's considered (Hurmerinta and Peltomäki 2003, 226) that the learning should be done through personal relationships. Thus, the people behavioural characters, who are participating in the internationalization, are in key position. Accord-

ing to Crysostome and Molz (2014, 3-12) the internationalization performance and strategy are linked to the “time horizon of internationalization, the optimal entry model, and geographic distance and industry types”.

According to Minniti et al. (2006, 160-161), when going global there is a common ground for Born Global and Born-Again Global companies. To manage the risk, these companies internationalize simultaneously through combination of processes. For example, by outsourcing the accounting in target country the Company can avoid losing money in case they do not have enough knowledge on the legal requirements of the specific country. To find a reliable accounting office they could use their Networks asking for recommendations. This way they are combining the enabling processes and enacting processes as outsourcing is enacting process and use of Networks id enabling process.

In the below figure 2, the division of these processes are presented clearly. The enacting processes are related for example to the technology, investments and outsourcing and enabling to the Networks and Alliances.

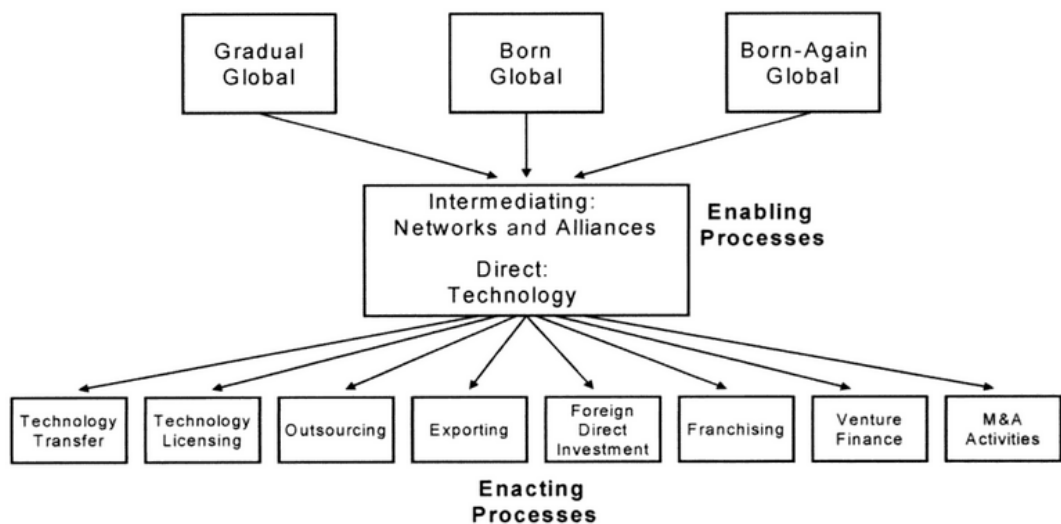


FIGURE 2. Company-level processes (Minniti et al 2006, 160)

Enabling processes are the ones that help the company to expand to international markets with co-operation. This is very important factor in the early internationalization.

3 THEORETICAL FRAME WORK

3.1 Internationalization Strategy

Bundgaard-Jorgensen (2016, 89) argue that the strongest motives for a company to internationalize are:

- To improve their presence across the market
- Improve competitive advantages

The right strategy requires a feasible plan for 2-4 years and it's always unique for each company. There are some standard factors for the Internationalization strategy. These are presented in the below figure 3.

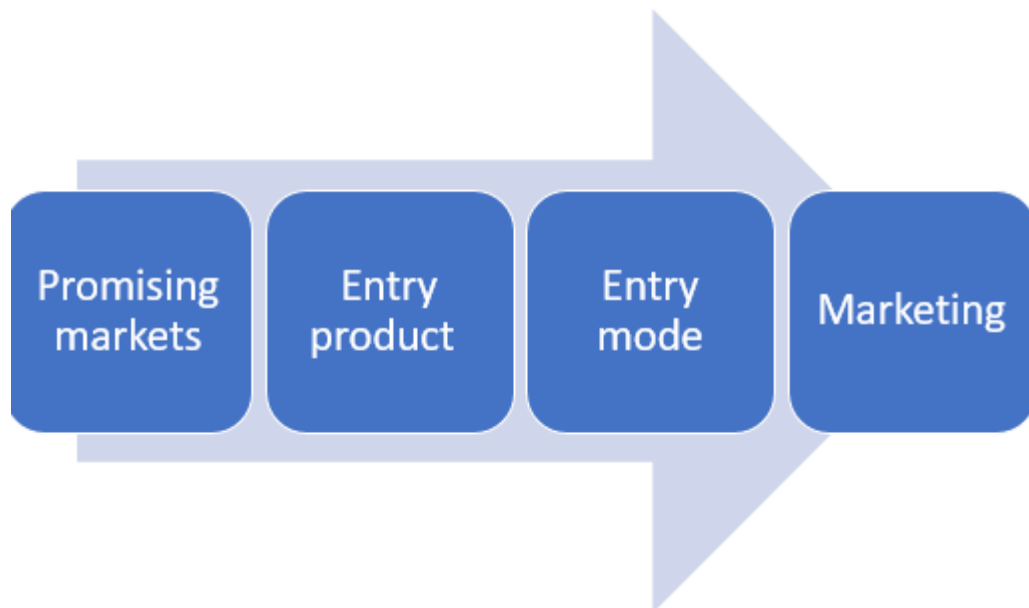


FIGURE 3. Internationalisation strategy guidelines by Bundgaard-Jorgensen (2016)

First step is to find the market which is most promising. For this is needed to review the history of the market and analyse it. Second step is to define the product; standardizing or adapting and the third step the entry mode, for these the decision comes from the Company. Fourth is the marketing plan. Each of these steps should be closely monitored along

with competence mapping. Competence mapping refers to the management teams' competences. Along the process new challenges can arise which need different setup of skills. (Bundgaard-Jorgensen 2016, 98-99)

3.1.1 Promising markets

To find the promising markets, macro-economic factors, population, access and business environment must be analysed. For this Bundgaard-Jorgensen recommends a PEST analysis, meaning political, economic, social and technical factors. In addition, some legal and environmental factors should be considered. Other calculations concern the costs of transportations and tariffs. (Bundgaard-Jorgensen 2016, 89)

According to Boumphrey (2016), many companies don't invest enough time in studying the market before doing the entry selection. She argues that because of the poor pre-study, they face unforeseen complications and extra costs. In the below figure 4 there is presented a model of systematic and logical analyse approach.



FIGURE 4. Factors affecting market selection (Boumphrey, 2016)

One key barrier mentioned by Bundgaard-Jorgensen (2016, 90) is the language. It's essential to acquire through recruiting the needed language skills, if not possessed. Lack of good language skills can lead to unexpected problems.

3.1.2 Entry product or service

After the market is studied, the focus is in the product or the service. The question is; can it be marketed in its current form or does it need some standardisation and adaptation? The adaptation is an additional cost usually in marketing and promotion. It can mean packaging, sales process or marketing the product differently than in the domestic market.

3.1.3 Entry mode

Company should choose an entry mode for internationalization. The decision making is described *to make or to buy*, either own assets or contracted assets. *To make* means the acquirement of development of the assets. In case the company can contract for them, it's referred as *to buy*. The decision to have own assets or contracted assets is a critical decision for the success of the internationalization. (Susman 2007, 231-233)

The decision *to make or buy* is related to network connections and to company's motivation. They divide the firms in two groups: Customer followers and new market seekers. The customer followers, as they already have their sales partner in the new market, tend to have their own assets, thus they apply the *to make*- mode. The market seekers, as they lack the clientele in the new market, tends to follow the *to buy* mode. Glowik (2011, 14) makes the internationalization motivation division in four groups:

1. Demand orientated
2. Supply orientated
3. Follow the customer
4. Follow the competitor

The loss is higher with bigger resources in case of failure. When choosing the entry mode, the level of control influences on the decision. For example, exporting compared to Foreign Direct Investment (FDI), is considered as low-control mode of entry, because the goods can be sent from different part of the world, without investing in local warehouses. However, exporting through direct sales (FDI) is considered high-control mode of entry in comparison with "exporting through agents, representatives and distributors" (Susman 2007, 233).

The company needs to decide between the high-control mode or the low-control mode.

To make this decision the company considers:

- the cost
- required resources for sales and service
- implication of the choice, on Intellectual Property (IP) protection

The product complexity, meaning that before it's sold there has been modifications to the product, has influence on the entry mode. The companies with bigger IP are said to prefer the high-control mode, thus having their own sales and marketing in the target countries. (Susman, 2007, 233)

If the company decides to go for the low-control mode, there are two channels for exportation. The decision whether to use Agents or Distributors should be based on analysis by comparing the competencies, business terms and reputation. The difference is that agent is described as a middleman and the distributor an independent merchant. (Bundgaard-Jorgensen 2016, 94)

There are different ways to form strategic alliances. The core benefit is the shared learning. Many problems can be avoided with right alliance such as legislation, IP and tax related matters (Bundgaard-Jorgensen, 2016, 95-96). There are two main ways to form strategic alliances. First are the contractual agreements, which is a contract between two-part companies for example of marketing and distributing each other's products. These are called non-equity ventures. The Joint ventures are called equity ventures, because it involves founding a company between two parent companies that are strategically alliance. The problem of joint venture is in the shared control; the alliance is possibly not so effective. (Buckley 2016, 190-200)

The use of agents and distributors limits the company's potential as they don't have control over the product marketing. The local presence in the markets can open more opportunities for the growth. The FDI can benefit the local salary system, which can be lower and they can lower the costs of Supply chain. However, as already mentioned FDI is risky. FDI is an expensive option. Because of the high costs of FDI, merging with a local company or taking over a local business could be more convenient option for the market entry. Merging can also have other benefits such as already existing networks, which in case of FDI Company must build many times from zero.

Company must decide on how many countries should be entered. The entry depends on the product or service and the level of the risk. For example, a service which needs relatively small investment is not so risky, thus it's reasonable to enter on many countries at the same time.

The Waterfall Strategy, which is presented on the left side of the figure 5, is an entry mode where company enters first to the most eligible market. As time and experience grows they can expand to other countries. In the Sprinkler Strategy, which is presented on the right side on the Figure 5, the company enters to many countries at the same time (Weitz & Wensley 2002, 460).

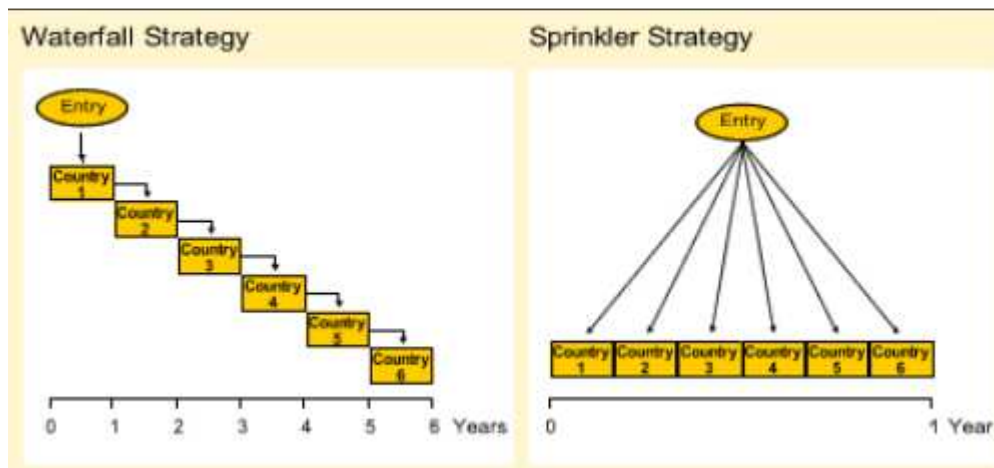


FIGURE 5. Market Entry modes (Kar 2011)

If the company enters the market with a service the entry could be easily done in various countries at the same time with low risk.

3.1.4 Marketing plan

The next planning point is to find the best way to sell the product or service to the customers. Bundgaard-Jorgensen (2016, 105) describes the elements of marketing plan:

- Pricing
- Channels
- Promotion
- Logistics

Other researchers have different approaches or marketing plans. For example Ros and Sealey argue that the marketing planning should be started on thinking the current situation and information on the following four points:

- The product or service
- Customers and prospects
- Competitors
- Own business

The critical success factors must be found and define the object. Which is the best way to reach the object? (Ros & Sealey 2012, 5-7)

4 METHODOLOGY

4.1 Research methodology

“I often say that when you can measure what you are speaking about, and express it in numbers, you know something about it; but when you cannot express it in numbers, your knowledge is of a meagre and unsatisfactory kind; it may be the beginning of knowledge, but you have scarcely, in your thoughts, advanced to the stage of science, whatever the matter may be” (Kelvin, 1883, 73).

Following the logic of Lord Kelvin, the target country can be resolved thoroughly by mathematical analysis, which consists of quantitative and qualitative parts, because the areas that are investigated are very different. As there is no direct score for each parameter, some must be measured by using qualitative methods.

When building the analysis, the company's operations on the paper business area is considered. All decisions concerning the elements included in the analysis are from paper business point of view. The structure of the research is presented in the figure 6 below.

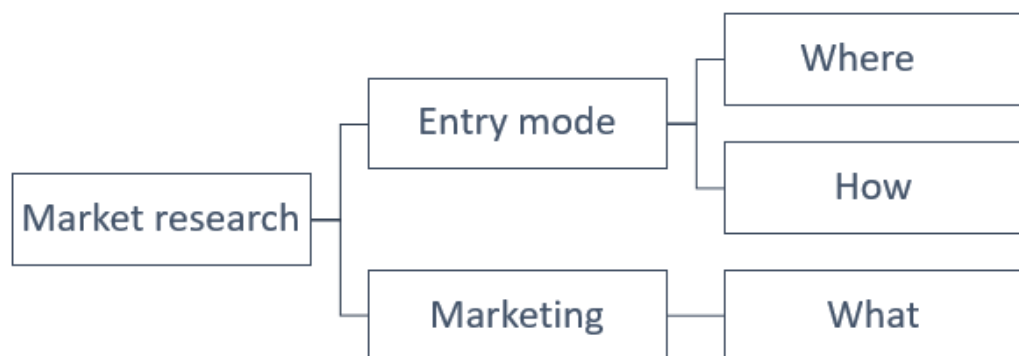


FIGURE 6. Structure of the research

In the part "Market research" the main question is answered: which is the target country? The "entry mode" and the "marketing" are related to the sub question: which is the best way to enter the market?

Qualitative and quantitative have common ground and the reliability is the concern of both methods. (Taylor 2005, 5) The research methodologies are well chosen, if they give relevant answers to the questions posed. For the first research question concerning the target country the best methodology is to combine quantitative and qualitative analysis. The ANC analysis, concerning the importation, exportation and production of paper in each country the applied methodology is quantitative, because all the data is ready in numerical form and they are analysed based on statistics. However, the risk assessment part is done by using a qualitative methodology as there are factors that are not presented as statistical records and are based on the assessment of the researcher. These results are converted and presented as scores, so they can be analysed together with the statics as presented in the figure 7.

ACN analysis Statistics Statistics Statistics	Quantitative: Production Importation Exportation
Risk Assesment Mosler Method Mosler Method Mosler Method Mosler Method	Qualitative: Fragile States Index Debt Unemployment Corruption Index
PC-Analysis Mosler Method Indicators of the Business environment Indicators of the Business environment Indicators of the Business environment Indicators of the Business environment Indicators of the Business environment Indicators of the Business environment	Quantitative: Risk assessment Gross Domestic Product Tariff Getting credit Enforcing contracts Trading across borders Human development index

FIGURE 7. Research methodologies

For the second question: How to enter the market, the best results are obtained by qualitative methodology, this is presented in the below figure 8. This is because the market entry product or service, must be defined by the company. This information is received by semi-structured interview with the company's representatives. This means that the flow and the objective of the interview was planned with some questions but the situation was unformal and there were many things that came up without having planned.

Company's representatives interview Semi-Structured	Qualitative
--------------------------------------------------------	-------------

FIGURE 8. Qualitative study.

There was no possibility to structure the whole interview as the people interviewed were persons with lot of business knowledge and had strong experience-based view on the company's vision and objective.

4.2 Analysis approach

The selection of the countries came directly from the Company. The Company's language is Spanish, so all South American countries where Spanish is official language are considered. Only Spanish speaking country left out is Venezuela, which is excluded due to the unstable situation. In addition to these two Central American countries; Mexico and Costa Rica are included in the study.

4.2.1 The ANC analysis

The ANC analysis is the determined quantity of a product that the market requires (World Bank Publication 2000, 101.) The Apparent National Consumption considers importation, exportation and production.

The Apparent National Consumption is calculated based on the following formula:

$$ANC = Production + Importation - Exportation \quad (1)$$

Adding the production to the importation and then reducing the exportation the Apparent National consumption is obtained. After this the result is divided by the population to receive the Apparent National Consumption Per Capita.

4.2.2 The Mosler Method

The Mosler Method is a qualitative analysis to mitigate the risk of each country (Fuentes 2005, 1). In this research this method is applied to obtain a risk score for each country.

It consists of:

- Risk identification
- Analysis and evaluation of the factors that can impact on the manifestation of the risk

The objective is to obtain information that is easy to mitigate the risk and calculate its class and dimension. The analysis is done in four phases.

- 1) Risk definition
- 2) Risk analysis
- 3) Risk evaluation
- 4) Classification of risk

First the definition of the impact of the risk is defined. In the Table 1 they are presented as Function criteria (F). Second definition is the substitution criteria(S), meaning how easily the possible goods affected can be changed. Third is the profundity (P) meaning; how serious the consequences of the risks are in care the risk materializes? Fourth is the Extending criteria (E) evaluating; how large impact the risk has? Fifth parameter is the aggression (A) estimating how probable it is the risk occurs. Sixth parameter is the vulnerability, meaning how probable the damages of the risk are. (Fuentes 2015, 1-3)

Function criteria (F)		Criterion Extending (E)	
5: Very badly		5: International	
4: Seriously		4: National	
3: Medium		3: Regional	
2: Slightly		2: Local	
1: Very slightly		1: Individual	
Substitution criteria (S)		Criterion of aggression (A)	
5: Very hard		5: Very high	
4: Hard		4: High	
3: Without many difficulties		3: Normal	
2: Easily		2: Low	
1: Very easily		1: Very low	
Criterion Profundity (P)		Vulnerability criteria (V)	
5: Very serious		5: Very high	
4: Serious		4: High	
3: Limited		3: Normal	
2: Mild		2: Low	
1: Very mild		1: Very low	

TABLE 1. Six criterions of Mosler

Based on the results the risk is quantified per a numerical scale. After all values, have been given, the risk can be calculated.

For these two concepts is used:

- 1) Risk Character "C"

$$C = FS + PE \quad (2)$$

- 2) Probability "Pb"

$$Pb = AV \quad (3)$$

With the results of these two calculations, it's possible to proceed to the next phase;

- 3) Quantifying the risk concerned "ER"

$$ER = CPb \quad (4)$$

- 4) Risk classification

With the results obtained ER, and through a comparison with the Risk Assessment Criterion Table, the final qualitative value is obtained. (Fuentes 2015, 1-3)

Based on these factors the risk assessment can be performed and the Risk Score is obtained.

4.2.3 Principal component analysis

There are multiple variants such as the risk factors and different statistics that must be compared. The Principal Component Analysis (PCA) is an excellent method, when it comes to multiple variants. PCA is used when there is not much knowledge of the result when starting the analysis, there is only a huge amount of data (Takane, 2016, xv.) With this method, all the received data is reduced in to one graphic thus, it's possible to understand better the meaning of the numbers.

The PCA tries to explain the structure of the variances and covariance of set of variables, through linear combinations. These principal components, are not correlated between each other. Each maximises it's variance. PCA aims to reduce or simplify the data and facilitates it's analysis and interpretation through linear combinations. The reduction or simplification is possible because usually many of the variability of the data can be explained by small number of principal components, which can now be analysed instead of bigger number of dimensions. (Dallas, 2013)

In this research the method is used to reduce the data of many parameters in order to see the result in one graph. The parameters considered in the PC-Analysis can be seen in the figure 9 below highlighted with blue colour.

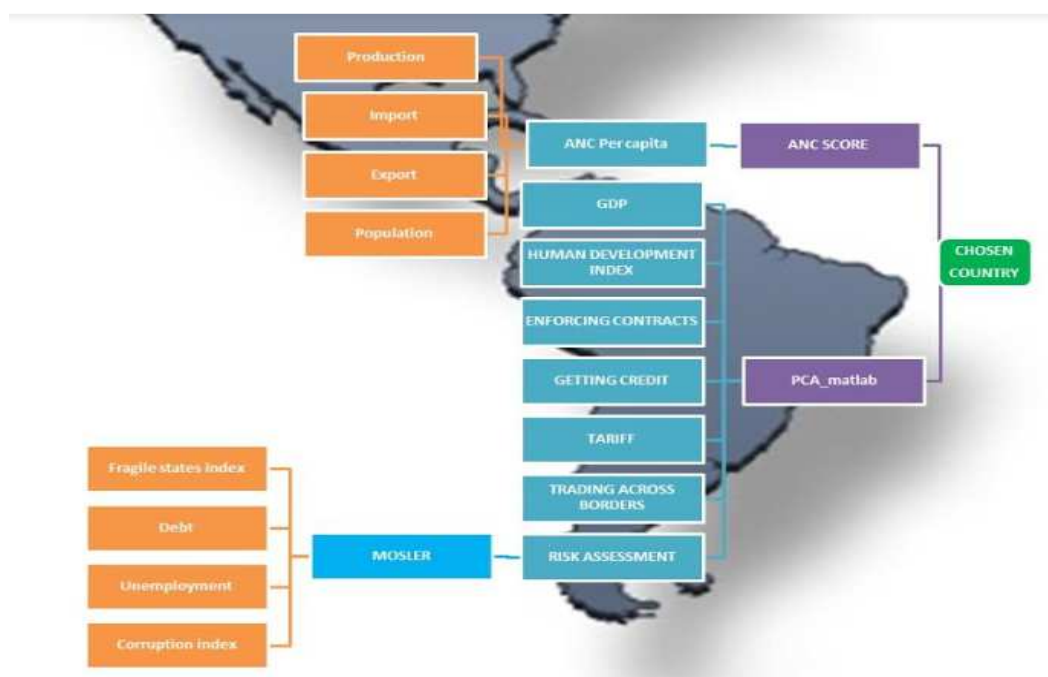


FIGURE 9. The structure of the Market research

These parameters concern the Risk assessment and the indicators of the business environment.

4.3 Methods of data collection and manipulation

The statistics used in this research are from reliable sources and the information can be openly accessed in the Internet. For example, the data to calculate the ANC Score was extracted from the Food and Agriculture Organization of the United Nations and exported to Excel.

With Excel, it is easy to get additional information on the data, for example the trend and the standard deviation. From the trend can be seen the development of the ANC Per Capita and standard deviation indicates the stability that the trend has had.

4.3.1 The Mosler Method and the indicators on business environment

After having researched the impacts on certain parameters on business and countries economy from various sources, the following ones were chosen for the analysis as recommended by Boumphrey (2016):

Macro-economic, Population related factors, Access related parameters and Easy doing Business related parameters.

4.3.2 Macro-economic parameters

The macro-economic parameters which are applied in the Risk assessment using the Mosler Method are:

- Fragile states index
- Debt

Fragile states index 2017 is used to measure the stability of the countries. It is a means of political risk assessment and gives warning on possible conflicts. It highlights a countries pressures and shows if they are in the brink of failure. (FFP, 2017) In the below figure 10

there is a visual presentation on the Fragile states index in the countries that are studied. Chile Argentina and Uruguay are on green, meaning they are stable countries.

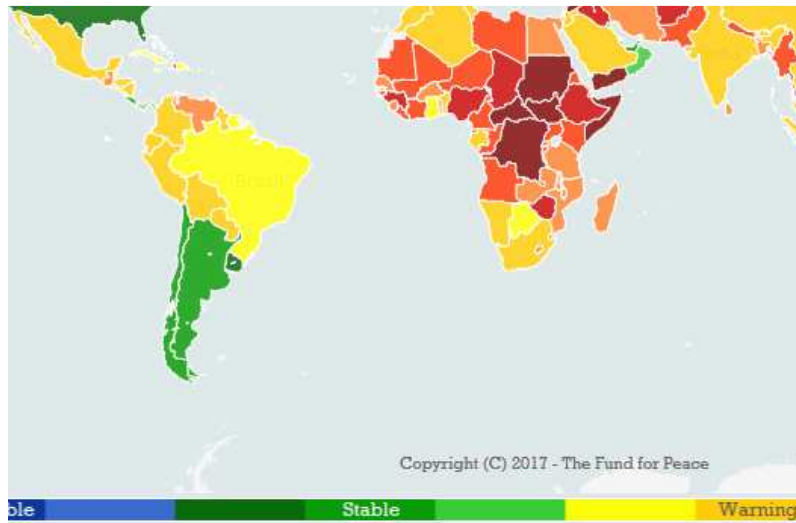


FIGURE 10. Fragile states index 2017 (FFP, 2017)

The countries are ranked based on the scores. The country which has the biggest score is the most Fragile thus, in the Fragility Ranking it is number 1. (FFP, 2017)

The way how country's debt develops is important from perspective of its economic impact. High country debt can lead to an economic crisis. (ECB, 2017)

4.3.3 Population related factors

Population related factors are applied in the Risk assessment using the Mosler Method. These are:

- Unemployment/Method Mosler
- human development index/Method Mosler

While more unemployment in a country, less is the revenue on states taxes. Thus, the ability to spend money is weaker. (Hudson, 2013) Human development index indicates the growth and development of the country. It also explains why countries with same Gross national income (GNI) per capita, can have so different results concerning human development. (UNDP, 2016) In the below figure 11 is explained how the human development index is calculated.

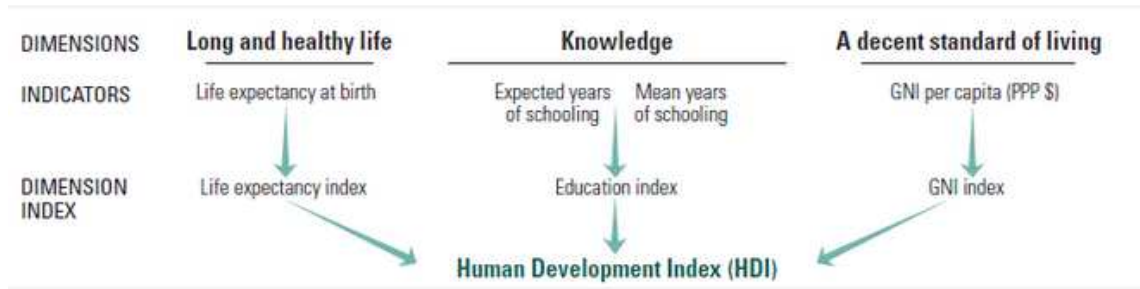


FIGURE 11. Human development index (UNDP, 2016)

4.3.4 Access related parameters

Access related parameters are:

- Tariffs
- Trading across borders
- Gross Domestic Product

Investopedia defines a tariff as “a tax imposed on imported goods and services” (Investopedia, 2017). There can be big differences between countries tariffs. By knowing countries tariffs, surprising costs can be avoided. Trading across borders is related to the logistic of the goods. It includes documentary compliance border compliance and domestic transport. (WB, 2017)

Gross Domestic Product is a coefficient indicator and it describes what is happening in the country as it is “the is the total market value of all goods and services produced, including total consumer, investment, and government spending, plus the value of exports, minus the value of imports”. (Peavler, 2017)

4.3.5 Easy doing Business related parameters

Easy doing Business related parameters:

- Corruption
- Enforcing contracts
- Getting Credit

Corruption has a direct link to the economic growth and it is important to assess countries integrity as this measures the transparency of the operations. Enforcing contracts indicates the time and cost of resolving problems in court. It measures the efficiency of the court system. This is important from economic growth and development point of view. The logic behind this indicator is presented in the below figure 12. In countries where legal institutes are not effective law related improvements don't have big impact. (WB, 2017)

Subindicator	Mean	Median	Min	Standard deviation	
				Max	Standard deviation
Number of required procedures between filing a suit and enforcement of judgment	38	38	20	55	7
Time taken to resolve the dispute (in calendar days)	605	543	120	1,800	308
Cost to defendant and plaintiff including attorney and court fees, expressed as a percentage of the claim value	34	26	0	163	28

FIGURE 12. Enforcing contracts (WB, 2008, 34)

Worlds bank define the indicator “Getting Credit” as measurement of “borrowers and lenders legal rights and the availability of credit information”. The below figure 13 presents the calculation behind the indicator getting credit.

Subindicator	Mean	Median	Min	Standard deviation	
				Max	Standard deviation
Strength of legal rights index (0-10) Index contains 10 criteria dealing with collateral and bankruptcy laws to protect borrowers and lenders	5	4	0	10	2
Depth of credit information index (0-6) Index contains 6 criteria dealing with the scope, accessibility, and quality of information available through public or private credit registries	3	3	0	6	2

FIGURE 13. Getting Credit (WB, 2008, 36)

4.3.6 Inverse proportion

The values that are inverse proportion to the convenience of doing international business, are subtracted from their highest value with the given value of each country.

4.3.7 Data reduction tool

Now that each country has its own risk score by the Mosler method and the business environment related factors are listed, the whole data can be reduced by Principal component analysis. Matlab is used for the calculation platform and the option Matlab guide

was used to create a graphical user interface. The tool created for the Company, to where the data is uploaded and the graphs are easily created is called PCA_matlab and it was done in Matlab Guide. The Company can later use this tool in case they want to analyse only certain parameters of the study. The figure 14 in the below is a screen shot of the PCA_matlab tool.

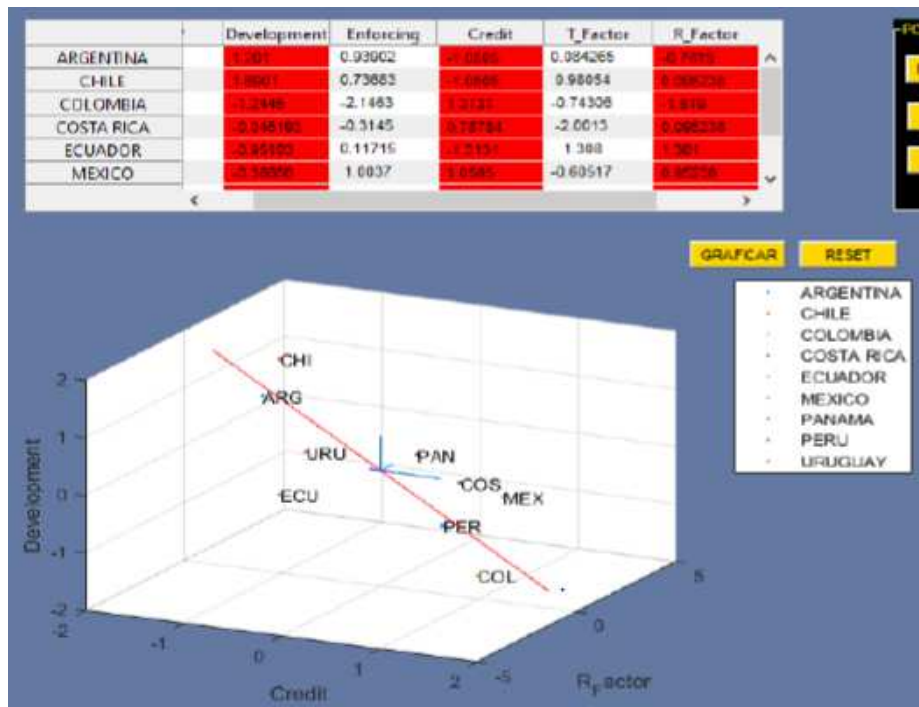


FIGURE 14. PCA_matlab

All the data concerning indicators of business environment, is uploaded in Matlab. For example, in the above figure 14 in the columns there is visible the Human development score, enforcing contracts Getting credit, Tariff Factor (T-Factor) and the Country Risk factor (CR_factor). When the file is uploaded, the program creates a graphic based on the numerical information in Cartesian coordinate system in one, two or three dimensions, depending which column or columns one wants see in graphic.

First step is to normalise the numeric information. Then the program searches the principal component and finally the points are transferred to a new axis of coordinates, where the axis are the first principal components. After this the numbers are ready for the final analysis which means comparing the PCA result with the ANC analysis results.

4.3.8 Market entry mode interview

The company itself needs to be the one to define which is the entry product or service. To reach this goal, a qualitative method; semi-structured interview was used. There is only two clear questions, otherwise the information came by discussion. The rapport is constructed with the interviewed persons, trying to get them to express their ideas in their own way. (Cohen, 2006).

The interview was done in the office in Madrid Spain with the CEO, CFO, Sales director and the Marketing responsible of the company. Based on their comments and expectations, a plan how to enter the market was possible to sketch. The experience was impressive as the interviewed persons were high-class professionals, with huge knowledge based on years of experience on running business in the paper market.

5 RESULTS

The obtained results concerning Chile are presented as an example. The complete results are found in the appendix 2 *Analysis Data*.

5.1 Apparent National Consumption

The markets research started with a study of the Production, Import quantity and Export quantity vs. the population of certain paper types in each country.

In the below table 2 there is presented the data concerning the newsprint paper numbers, based on which the ANC and the trend could be calculated. The year, production tonnes, import quantity, export quantity, were exported from the Internet. Based on these numbers the rest of the calculations could be done, such as the ANC per capita, trend and the standard deviation.

TABLE 2. Newsprint Chile years 1997-2016 (FAO, 2017)

Area	Chile							
Item Code	1671							
Item	Newsprint							
	Production	Import	Export	ANC		ANC		Standard
Year	tonnes	Quantity	Quantity	tonnes	Population	Per capita	Trend	deviation
1997	184000	22000	146000	60000	14694835	4,1	-0,067	1,341
1998	163000	24000	117000	70000	14887756	4,7		
1999	225000	3400	164000	64400	15076952	4,3		
2000	244000	3400	183000	64400	15262754	4,2		
2001	276000	0	176000	100000	15444969	6,5		
2002	275000	0	219000	56000	15623635	3,6		
2003	344000	1000	229000	116000	15799542	7,3		
2004	273000	1000	247000	27000	15973778	1,7		
2005	362000	1000	248000	115000	16147064	7,1		
2006	334000	472	259870	74602	16319792	4,6		
2007	306000	472	232000	74472	16491687	4,5		
2008	289000	1000	220000	70000	16661942	4,2		
2009	292000	1000	230598	62402	16829442	3,7		
2010	252000	22000	206000	68000	16993354	4,0		
2011	282000	422	211127	71295	17153357	4,2		
2012	245000	2265	160410	86855	17309746	5,0		
2013	167000	4968	96550	75418	17462982	4,3		
2014	112400	9646	54056	67990	17613798	3,9		
2015	96800	9267	53741	52326	17762681	2,9		
2016	98000	9267	53741	53526	17909754	3,0		
						4,4		

The Food and Agriculture Organisation of the United Nations publishes data about the production and importation and exportation of different types of paper and these statistics were used in this study.

The following figure 15 presents as a graph the information which is visible in numbers in table 2. A graph makes it easier to understand, how the behaviour of the ANC has developed during the latest years. In the example in the figure 15, there is presented the newspaper consumption in Chile. The production during the latest years has gone down, and the importation has increased. The trend is decreasing as people are consuming less newspaper.

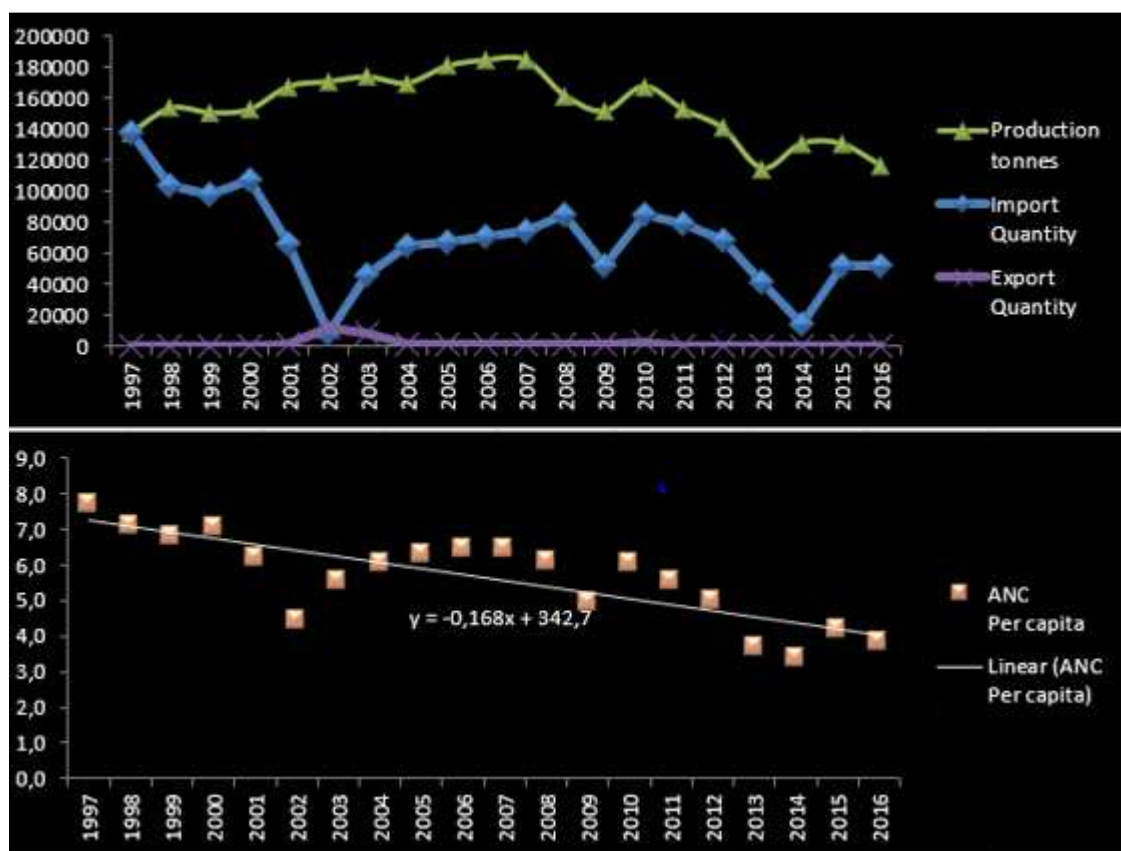


FIGURE 15. Newspaper Chile ANC per capita and the trend

The ANC, the standard deviation and the trend of newspaper consumption for all countries is presented in the below table 3. In Costa Rica the trend is increasing, meaning the demand of the newspaper is growing. However, the standard deviation is big, which is a negative factor. While more stable the demand on market the smaller is the standard deviation. The complete information is visible in the appendix 2 *Analysis data*.

TABLE 3. Newspaper ANC of all countries

Newsprint			
	ACN Per capita	Trend	Standard deviation
Ecuador	4,1	0,12	1,15
Peru	2,4	0,03	0,28
Panama	2,7	0,07	0,83
Costa Rica	6,7	0,14	2,96
Chile	4,4	-0,07	1,34
Colombia	1,9	-0,03	0,37
Uruguay	2,6	-0,04	0,46
Mexico	3,6	-0,07	0,71
Argentina	5,6	-0,17	1,24

The ranking based on the ANC of the Newspaper is presented in the below table 4.

Based on the demand Costa Rica is the number one, concerning the newsprint-paper. But the standard deviation 2,96 cannot be ignored. This means the growth has not been stable.

TABLE 4. The ANC ranking of the Newspaper per country.

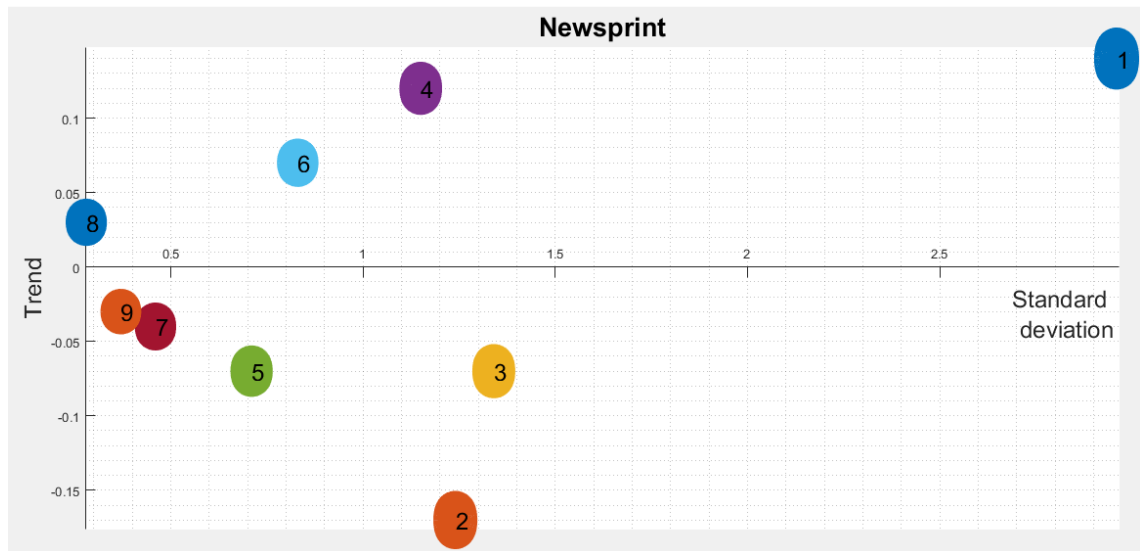
1st Costa Rica	2nd Argentina	3rd Chile	4th Ecuador	5th Mexico
6th Panama	7th Uruguay	8th Peru	9th Colombia	

In the research, there was not only considered the ANC but also the character and changes of the development during the last 17 years. A formula was tried to find to relate these three variables (ANC, trend, Standard deviation), which would directly give a value for each country included in the study and compare the results. Such formula was not found thus the selection was done based on decision criterions.

The more reliable result is obtained when combining all three variables. In the below table 5 there is presented the ranking considering ANC, standard deviation and the trend. This

is more exact as it includes more parameters. The number in the painted circles indicates the countries as shown in the table 5 and it's area indicates the ANC. The consumption volume can be seen from the size of the circle, the bigger the circle the bigger the consumption. This analysis is done as per each selected paper type and the results are presented in the appendix 2 *Analysis data*.

TABLE 5. Ranking of all countries with standard deviation and trend.



The blue circle with number one is Costa Rica. As earlier mentioned it is number 1 in this example case because of the highest newspaper consumption. However, the ideal country as per standard deviation is the blue circle 8 Peru, because it has the smallest standard deviation meaning the growth in that country has been more stable. However, the consumption is smaller in Peru which can be seen from the size of the circle. The circles which are on the upper side of the trend line present countries with biggest growth and where the demand has historically grown faster. On the lower side of the line, there are countries which growth has been negative. For example, the circle number two, representing Argentina, has it's trend negative, and the circle number 4 Ecuador has positive trend.

In the below table 6 there is presented the ranking of the seven chosen paper types for all countries that have been included in the study. Chile is highlighted with yellow colour and considered as the most eligible market based on consumption, because it appears the most among the three highest paper consuming countries. It is six times among the three biggest consumers. On the second position, there is Mexico because it appears five times among the three biggest consumers. On the third position appears Costa Rica because it

appears three times among the three biggest consumers. For example, in the Newspaper sector based on the ANC, Chile has the third place but its standard deviation is less than Costa Rica's (number 1). This means that there is less risk in Chile on Newspaper sector because the market is historically more stable. When Chile is compared with Argentina, although they have the same standard deviation, the trend has higher tendency in Chile. This means that the paper consumption per capita has grown more in Chile during the last years than in Argentina.

TABLE 6. Ranking of all countries per all paper types.

	1º	2º	3º	4º	5º
Newsprint	Costa Rica	Argentina	Chile	Ecuador	Mexico
Printing and writing papers, coated	Mexico	Chile	Argentina	Costa Rica	Uruguay
Other paper and paperboard	Costa Rica	Chile	Mexico	Argentina	Uruguay
Household and sanitary papers	Chile	Mexico	Costa Rica	Uruguay	Argentina
Cartonboard	Mexico	Panama	Chile	Argentina	Costa Rica
Wrapping papers	Mexico	Panama	Chile	Argentina	Costa Rica
Other papers mainly for packaging	Ecuador	Uruguay	Colombia	Costa Rica	Chile
	6º	7º	8º	9º	
Newsprint	Panama	Uruguay	Peru	Colombia	
Printing and writing papers, coated	Peru	Colombia	Ecuador	Panama	
Other paper and paperboard	Colombia	Ecuador	Peru	Panama	
Household and sanitary papers	Colombia	Ecuador	Peru	Panama	
Cartonboard	Peru	Uruguay	Colombia	Ecuador	
Wrapping papers	Peru	Uruguay	Colombia	Ecuador	
Other papers mainly for packaging	Argentina	Peru	Mexico	Panama	

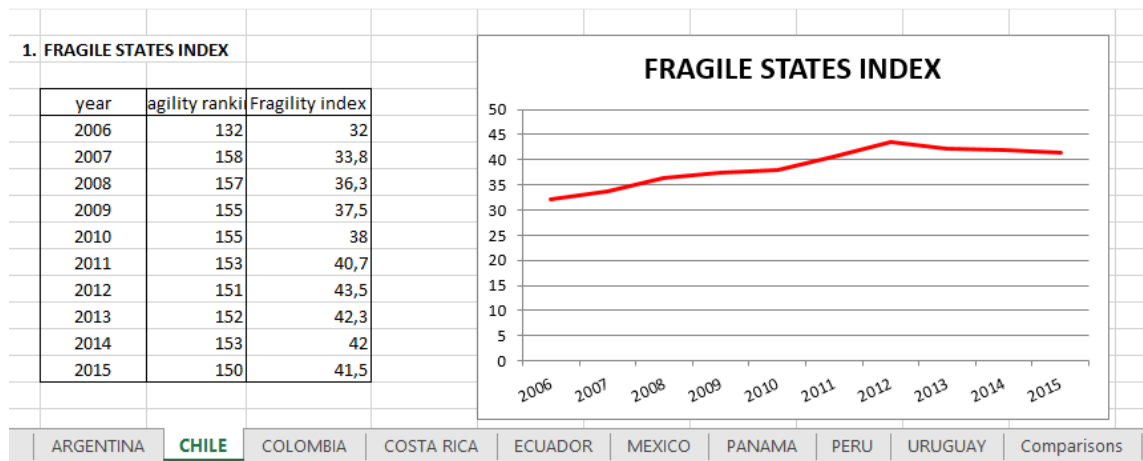
The same analysis is done for all paper types. Based on the assessment concerning the Apparent National Consumption, the conclusion is that Chile is the most eligible market. In order to get more exact data on the market and its risk, few other analyses were done for these countries.

5.2 Risk analysis: The Mosler Method

The Country Risk score is obtained with the help of the Mosler analysis. In the below table 7 on the left side, there is presented the statistics of the example country Chile from 2006 to 2015 on the Fragile States index. The Fragility ranking as previously mentioned,

is better while the number is bigger. These numbers are presented in the column next to the year. The Fragility index is presented next to the ranking. The graphic on right side gives have better perspective of the development of this parameter during the latest years. It is visible that this indicator has got better until the peak on year 2012. After this it has remained stable.

TABLE 7. Fragile States index development in Chile



The statistics used in this analyse are taken from the Fund for Peace. This organization makes yearly assessments and analyses on the Fragile States Index (FFP, 2017).

In the table 8 there is presented the risk information of the Fragile States Index including the country, product, damage and the risk definition. This table helps to understand what exactly is measured.

TABLE 8. Risk information

RISK INFORMATION	
1 RISK	FRAGILE STATES INDEX
2 LOCALIZATION	Chile
3 ECONOMIC GOOD	PAPER
4 DAMAGE	STAGNATION IN THE SALE OF THE PRODUCT
5 DEFINITION OF THE RISK	<i>The internal conflicts of the country can have an impact on the development of paper trade.</i> Although this risk does not directly influence, it can be taken into account

The values in the table 9 present the qualitative part of the Risk Assessment. The risk is mitigated with help of the data presented in table 7. First there is the Function criteria that measures the negative consequences. The second is the substitution criteria which measures how easily the goods are replaced. Third is the criterion profundity, which measures the effects on the company image in case the risk materialises. Criterion extending measures how far the damages could extend. The risk character “C” and probability “Pb” are calculated by formulas 2-4 as explained in part 4.2.2

TABLE 9. Fragile States Index Risk Score, Chile

46	CHILE	42
47	FRAGILE STATES INDEX	12
48	Function criteria (F)	2
49	Substitution criteria (S)	2
50	Criterion Profundity (P)	2
51	Criterion Extending (E)	1
52	Criterion of aggression (A)	1
53	Vulnerability criteria (V)	2
54	a) Risk character "C"	6
55	b) Probability "Pb"	2
56	c) Quantifying the risk concerned	12

In the below table 10 there is presented the FSI score for all countries on the light green colour. The cell in dark green is the total Country Risk score.

TABLE 10. The Mosler score for all countries on FSI

ARGENTINA	48
FRAGILE STATES INDEX	24
CHILE	42
FRAGILE STATES INDEX	12
COLOMBIA	54
FRAGILE STATES INDEX	48
COSTA RICA	42
FRAGILE STATES INDEX	12
ECUADOR	33
FRAGILE STATES INDEX	36
MEXICO	36
FRAGILE STATES INDEX	48
PANAMA	39
FRAGILE STATES INDEX	24
PERU	39
FRAGILE STATES INDEX	36
URUGUAY	51
FRAGILE STATES INDEX	12

The same analysis is performed for Debt, Unemployment and Corruption Index. From these parameters, a general risk score is obtained for each country. In the below table 11 there is the risk description on the Debt and what it measures.

TABLE 11. Risk information: Debt

RISK INFORMATION	
1 RISK	2. DEBT
2 LOCALIZATION	ARG, CHL, COL, CRI, ECU, MEX, PAN, PER, URY.
3 ECONOMIC GOOD	PAPER
4 DAMAGE	LOW PRODUCT SALE
5 DEFINITION OF THE RISK	<i>Debt is a negative element in the country's economy and this can influence a low product sale and would be a good indicator when comparing the business feasibility among several countries.</i>

In the below table 12 there is presented Chile's statistics of the Debt in millions of euros and divided by population. There is also the GDP in millions of euros, GDP divided by population and the GDP %.

TABLE 12. Debt statistics 1999-2016 concerning Chile

2. DEBT					
Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	9408	619	70483	4638	13,3
2000	11132	723	84263	5472	13,2
2001	11457	736	79241	5089	14,5
2002	11199	715	73740	4706	15,2
2003	8506	537	66871	4222	12,7
2004	8219	514	79778	4986	10,3
2005	6912	428	98833	6114	7,0
2006	6153	377	123273	7548	5,0
2007	4912	298	126575	7669	3,9
2008	6001	360	122049	7314	4,9
2009	7209	427	123682	7328	5,8
2010	14083	825	164647	9648	8,6
2011	20090	1164	181086	10494	11,1
2012	24811	1422	207835	11914	11,9
2013	26683	1513	209578	11886	12,7
2014	29319	1645	196428	11024	14,9
2015	37973	2109	218600	12140	17,4
2016					

The debt is presented together with the GDP to understand better the financial situation of the country. For example, if two countries have the same amount of debt but one has higher GDP, it has better financial situation than the other. The below figure 16 shows the development of the debt and GDP in Chile.



FIGURE 16. Development of the debt and GDP in Chile

In the below table 13, there is presented the debt score of Chile.

TABLE 13. The Mosler Analysis on the Debt concerning Chile

DEBT	12
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	2
c) Quantifying the risk concerned	12

In the below table 14 there a presentation on the debt scores of all countries.

Chile has the lowest debt score 12. Argentina, Colombia, Uruguay and Mexico have the highest score 48

TABLE 14. The Debt scores of all countries

ARGENTINA	48
DEBT	48
CHILE	42
DEBT	12
COLOMBIA	54
DEBT	48
COSTA RICA	42
DEBT	36
ECUADOR	33
DEBT	24
MEXICO	36
DEBT	48
PANAMA	39
DEBT	36
PERU	39
DEBT	24
URUGUAY	51
DEBT	48

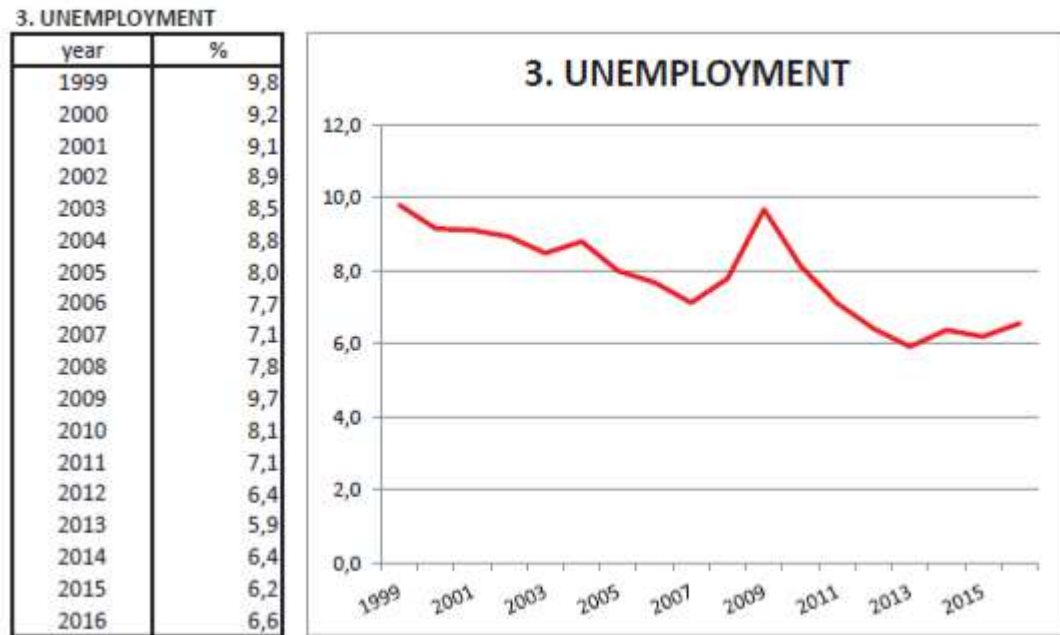
The below table 15 presents the risk information on Unemployment and what it measures.

TABLE 15. Risk information: Unemployment

RISK INFORMATION	
1 RISK	3. UNEMPLOYMENT
2 LOCALIZATION	ARG, CHL, COL, CRI, ECU, MEX, PAN, PER, URY.
3 ECONOMIC GOOD	PAPER
4 DAMAGE	LOW SALE OF THE PRODUCT
5 DEFINITION OF THE RISK	<i>Unemployment is a negative factor, which influences the volume of sales of the product or the failure to pay.</i>

The below table 16 presents the statistics since year 1999 to 2016 of Chiles unemployment percentage. The development, which has been positive in Chile, can be seen on the graph on the right side. The unemployment percentage has decreased.

TABLE 16. Statistics unemployment years 1999-2016 Chile



The unemployment score for Chile based on the Mosler analysis is presented in the table 17.

TABLE 17. The Mosler analysis on unemployment in Chile

UNEMPLOYMENT	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72

In the below table 18 there is presented the unemployment scores for all countries. Mexico has the lowest unemployment score; 24. Argentina, Chile, Colombia and Uruguay have the highest scores; 72.

TABLE 18. Unemployment Mosler scores all countries.

ARGENTINA	48
UNEMPLOYMENT	72
CHILE	42
UNEMPLOYMENT	72
COLOMBIA	54
UNEMPLOYMENT	72
COSTA RICA	42
UNEMPLOYMENT	48
ECUADOR	33
UNEMPLOYMENT	48
MEXICO	36
UNEMPLOYMENT	24
PANAMA	39
UNEMPLOYMENT	48
PERU	39
UNEMPLOYMENT	48
URUGUAY	51
UNEMPLOYMENT	72

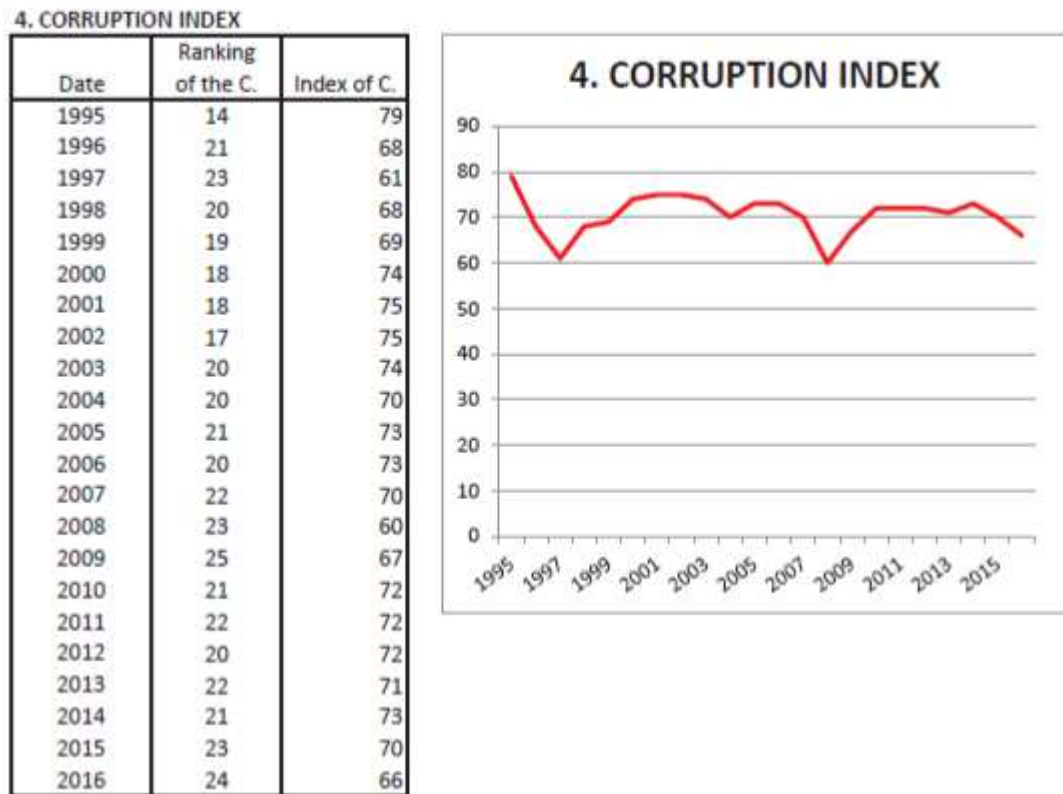
In the below table 19 there is presented the risk information of the Corruption index and what it measures.

TABLE 19. Risk information: Corruption index

RISK INFORMATION	
1 RISK	4. CORRUPTION INDEX
2 LOCALIZATION	ARG, CHL, COL, CRI, ECU, MEX, PAN, PER, URY.
3 ECONOMIC GOOD	PAPER
4 DAMAGE	PROBLEMS WITH THE AUTHORITIES
5 DEFINITION OF THE RISK	<i>In a country with a high rate of corruption, financial development may be affected.</i> Sometimes justice can not be found in the midst of corrupt authorities.

The following table 20 presents Chile's statistics concerning corruption index since year 1999 to year 2016. On the right side, the development is presented as graph.

TABLE 20. Statistics, Corruption index years 1995-2016, Chile



The Mosler score concerning the corruption index for Chile is presented in the table 21.

TABLE 21. The Mosler analysis Corruption index, Chile

CORRUPTION INDEX	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72

All the Mosler scores concerning the corruption index are presented in the table 22. Ecuador have the lowest score; 24. Chile, Costa Rica and Uruguay had the highest scores; 72.

TABLE 22. The Mosler score on corruption of each country

ARGENTINA	48
CORRUPTION INDEX	48
CHILE	42
CORRUPTION INDEX	72
COLOMBIA	54
CORRUPTION INDEX	48
COSTA RICA	42
CORRUPTION INDEX	72
ECUADOR	33
CORRUPTION INDEX	24
MEXICO	36
CORRUPTION INDEX	24
PANAMA	39
CORRUPTION INDEX	48
PERU	39
CORRUPTION INDEX	48
URUGUAY	51
CORRUPTION INDEX	72

Below in the table 23, there is an example of the Chiles results after all risks are mitigated. The Mosler analysis for Chile gives an average the risk scores 42.

TABLE 23. Country Risk Score, Chile

46	CHILE	42
47	FRAGILE STATES INDEX	12
57	DEBT	12
67	UNEMPLOYMENT	72
77	CORRUPTION INDEX	72
87		

The results for all countries presented in the table 24. Ecuador has the lowest Country Risk score 33; it is the best result meaning the risk based on previously presented parameters is lowest. However, this is not the result of the whole analysis. These scores are one of the seven parameters considered in the PC-analysis.

TABLE 24. Country Risk Scores for all countries.

		SCORE
3		
4	ARGENTINA	48
46	CHILE	42
88	COLOMBIA	54
130	COSTA RICA	42
172	ECUADOR	33
214	MEXICO	36
256	PANAMA	39
298	PERU	39
340	URUGUAY	51

Ecuador did well in the risk analysis but it's ANC performance is poor compared to the biggest consumers. It was among the three biggest consumers only once. This was other papers mainly related to packaging. If the business was related only to packaging paper, Ecuador could be strong candidate for the first position as the target country from the perspective of lowest country risk. But this study is not considering only packaging paper sector. Also, this is a score which will be included in another analysis thus there will be more factors concerning the countries situation assessed, but by using a different method.

5.2.1 Tariff and Country Risk Score

The obtained Country Risk score must be converted in form that can be compared with the other data. This means the value needs to be inverse as explained in part 4.3.6. The same must be done for the tariff. Due to this the used numbers are the T-factor and CR_factor. In the below table 25, there is the original value of Tariff and Country Risk Score and the inverse value as T-factor and CR_Factor.

As Costa Rica has the highest tariff, its T-Factor is 0 and Colombia has the highest country risk, its CR_Factor is 0. For example, Argentina's T-factor is 12,1, this value is obtained by subtracting Argentina's Tariff value 30,2 from Costa Rica's Tariff value 42,3.

TABLE 25. T-Factor and CR-Factor

	Tariff	T_Factor	Country Risk Score	CR_Factor
ARGENTINA	30,2	12,1	48	6
CHILE	25,0	17,3	42	12
COLOMBIA	35,0	7,3	54	0
COSTA RICA	42,3	0,0	42	12
ECUADOR	23,1	19,2	33	21
MEXICO	34,2	8,1	36	18
PANAMA	27,7	14,6	39	15
PERU	30,0	12,3	39	15
URUGUAY	28,7	13,6	51	3

The following statistics are taken from reliable sources and are available in the Internet. The Human Development index was obtained from United Nations Development Program Reports. The data on Enforcing Contracts, Getting Credit and Trading across Borders were found from the internet pages of the World Bank. The GDP per capita is taken from Spanish analytics page Datos Macro which is used in Hispanic countries. This data is presented in the below table 26.

TABLE 26. PC-analysis parameters.

	GDP(€/Pop)	Human Develop	Enforcing Contr	Getting Credit	T_Factor	CR_Factor	Transfront
ARGENTINA	12137	0,827	64,81	50,00	12,1	6	65,36
CHILE	12140	0,847	62,81	50,00	17,3	12	80,56
COLOMBIA	5448	0,727	34,29	95,00	7,3	0	62,83
COSTA RICA	10400	0,776	52,41	85,00	0,0	12	79,32
ECUADOR	5765	0,739	56,68	45,00	19,2	21	68,65
MEXICO	8240	0,762	65,45	90,00	8,1	18	82,09
PANAMA	11838	0,788	48,1	75,00	14,6	15	85,47
PERU	5526	0,740	60,7	80,00	12,3	15	71,45
URUGUAY	13949	0,795	54,44	60,00	13,6	3	55,98

This data in table 26 and the results of the Mosler analysis are uploaded and processed in the PC_Matlab. The result of the PC analysis is presented in the below figure 17.

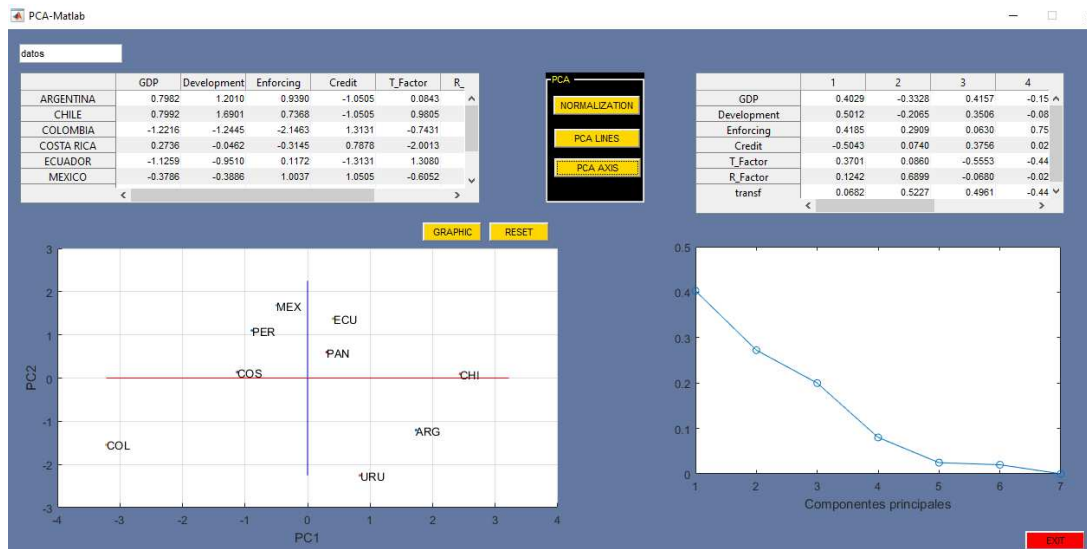


FIGURE 17. PC_Matlab result.

If the data of the table 26 should be presented in one graphic, it could not be done because it would need 7 dimensions in one graphic. It's not possible to present 7 dimensions in our reality of three dimensions. In figure 17 there is a presentation in three dimensions, but the figure is difficult to interpret due to perspective problem, one cannot see if the real distance of the points. Due to this the dimensions were reduced in two to be able to interpret the exact result. If it was reduced to one dimension, there would be a lot of information lost. Keeping it in two dimensions gives more perspective and the interpretation is more reliable. The dimensions are reduced with help of the PC_Matlab. With this presentation, the parameters can be properly analysed.

In figure 17, on lower left side in the Cartesian plane, the red line is the first principal component. PC_Matlab creates these two axes and they are constructed by considering certain percentage of the 7 dimensions. The difference between these two axes is in the percentage that certain dimensions are considered by PC_Matlab. These percentages are presented in the below figure 18.

	1	2
GDP	0.4029	-0.3328
Development	0.5012	-0.2065
Enforcing	0.4185	0.2909
Credit	-0.5043	0.0740
T_Factor	0.3701	0.0860
R_Factor	0.1242	0.6899
transf	0.0682	0.5227

FIGURE 18. Percentages for the axes in Cartesian plane

In the diagram in the figure 17, the first and second principal component equals to approximately 70% of the total managed data of the table 26. The axe 2 which is presented as blue line on figure 17, considers most the CR_factor and trading across borders. The axe 1, which is presented as red line on figure 17 considers more the rest of the parameters. Because it considers more parameters than the axe 2, its result is considered more reliable. On the red axe Chile has the best result, because in the five first parameters it obtained the highest value. In the last two parameters which are mostly considered in the blue line Chile doesn't have the highest value, it has central value. On the blue line, the second principal component, Mexico has the best result. However, on the red line there are five countries with better performance than Mexico

To deduce the target country the PC-analysis result must be assessed with the ANC analysis. Chile and Mexico were the biggest paper consumers. Chile was among the three biggest paper consumers six times and Mexico five times. The ANC performance of these two countries is listed below table 27.

TABLE 27. The biggest paper consumers based on ANC

CHILE:	MEXICO:
1st place:	1st place:
· Household and sanitary papers	· Printing and writing papers
2nd place:	· Cartonboard
· Printing and writing papers	· Wrapping papers
· Other paper and paperboard	2nd place:
3rd place:	· Household and sanitary papers
· Newsprint	3rd place:
· Cartonboard	· Other paper and paper board.
· Wrapping paper	

Based on the ANC performance it's difficult to choose the target country as these two countries both have on the same level the consumption. Mexico has more 1st places than Chile although Chile is more times among the three biggest. However, considering that Chile had better performance than Mexico on the PC-Analysis it is considered as the best target country.

6 INTERNATIONALIZATION PLAN

6.1 The Strategy

Following the principles presented earlier in the text by Bundgaard-Jorgensen (2016) and based on the interview with the management team, the internationalization strategy can be now defined. In the below figure 19 the strategy is presented step by step.

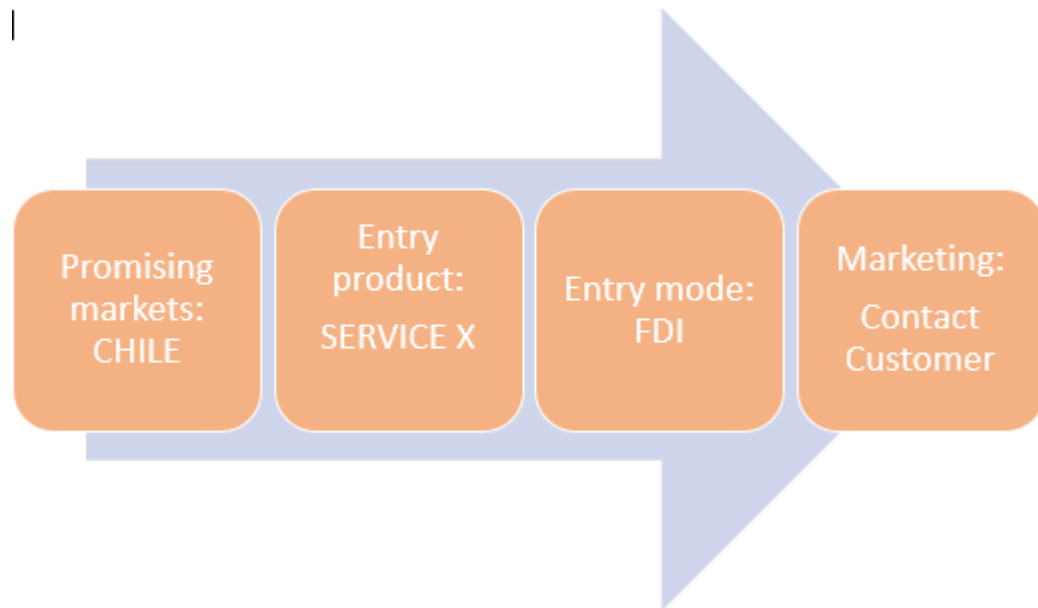


FIGURE 19. The Company's Internationalization Strategy

6.2 Promising Country

The analysis showed that Chile is the best environment for expanding the business in Latin America for this business. The ANC performance was the best although Mexico had good performance as well. However, from our company's perspective Chile has better location as the potential big customers are easily and fast accessed, such as Peru and Ecuador. From this point of view Mexico is relatively far.

6.3 Entry Product

To choose the entry product it was necessary to discuss the company's management team. The results of the country analysis were presented to them. After this the way, how to enter the market was discussed. Based on the discussion to make a rapid internationalization, the best entry mode is not a product yet a service. The company has a service which is unique on the paper market, which they are providing already in the European market. However as the Company's identity is not revealed in this thesis, detailed description on the service is not given either. The decision, why to go on with service is because it is lot less risky than to start to compete directly with the local paper sellers without having any connections or reputation on the market.

6.3.1 Patent

The patent must be applied in each country, there is no continental patent that could be applied. Thus, the recommendation is to apply the patent in all countries which the Company is planning to have business. The government of Peru has published a guide on how to apply patent in Peru and in other South American countries. This material could be used when planning the patent. It also lists all documents which need to be filled and the prices of the operations. (Indecopi, 2011)

6.4 The entry mode: Foreign Direct Investment

The service is related to a machine. The main investment is the cost of parts needed to build the machine. If the internationalization fails, the machine can be sent to Europe and the company can use it there. In the beginning only one company representative would be needed on the new continent. Also, the machine will have some storing costs. The needed inversion is not big. However, the paper sale is not completely abandoned idea. The service is the entry mode for the new market. When the company manages to settle in this business environment, after few years the paper sales can be implemented as part of the business offer. The paper sales business was seen by the company as too risky to internationalize rapidly and it would have needed a lot bigger investment.

Where to store the machine? To answer this question, must be investigated where the paper mills are located as the service is related to the paper reels. Perhaps the most convenient place for the machine would be the northern part of Chile, thus it can be moved easily to Peru, Colombia, Ecuador or Argentina. Also, the tariff needs to be considered when thinking the location. To enter one country could have different cost that to enter another one. The Company can use the information of the tariffs in different countries when making the decision. The Sprinkler-strategy is applied in this entry mode, meaning the business will expand many countries at the same time, not only in one.

6.5 Marketing Plan

For the marketing on the service, the plan is to conduct a survey. By contacting the production managers of the mills can be found out their level of interest concerning the service that the company would be offering in South America. The experience when dealing with South Americans is that they give high value on the European products and people. Thus, in the beginning of the survey when explaining what the service is about, it's good to promote that this service has been received with open arms in many European countries and it's unique, the company holds a patent on the machine. As the company holds the patent, there are no competitors who could offer the same service. The service will be offered to various countries, considering the possibility to transport the machine.

Best method to offer the service is to talk face to face with the possible customers. This means using the existing networks. It's not enough to make phone calls because companies do not tell about their functions easily.

7 CONCLUSIONS

7.1 Learning points

The research question which country is the most convenient for expanding business was replied on reliable way. There are lot of different results on the studies, depending on the chosen parameters. Leaving out the corruption index the result would have changed drastically. For example, the grey markets are a problem in South America. This means companies who deliberately avoid paying taxes. These companies look legal, but trading with them is a big risk. The governments can support these companies depending on how corrupted the country is.

However, if a company is planning to set a business in a country, the knowledge on the corruption level is essential. The tool: PCA_Matlab, can be used by the Company if they want to analyse only certain parameters. They can upload only the statistics of the corruption and compare which country has the biggest problem.

Thus, when assessing the results of a market analysis and taking business decisions based on them, it is very important to see the detailed description on which parameters were considered. Otherwise the results cannot be considered as reliable for the company's needs. This analysis was built from the perspective of internationalization. To offer a product in a foreign country one must know how much the demand and the offer is. Also, the trend is important, is it growing or decreasing. The big data was reduced by using the Principal component analysis. This is a method of analysis that could be implemented more in the financial study. Matlab is typically related as a competence in engineering studies. However, the financial studies curriculum would certainly benefit on having some Matlab courses included, too

Based on the study the Company was more convinced not to start paper sales in South America. The big data analysis is a knowledge package or an introduction to the South American Paper Business world. Studying the results, the Company knows what to expect. The future customers are paper and cardboard sellers and manufacturers. The business environment was revealed in the analysis for example the levels of corruption, the development of the countries and the tariffs.

The pace of the internationalization is related to the product or service. The decision to start the business by offering a service instead of paper sales, reflected the high level of business intelligence and the experience of the CEO. The service has less risk although it is a direct investment. The risk is shared as the machine can be used elsewhere in case the business does not develop in the expected way. Had the internationalization started by selling paper, the risk would be higher, to make a quick internationalization the cost would be big and there are many competitors who already have contacts on the market. The traditional Uppsala model probably would have been the better way for the internationalization, if the paper had been the chosen product. The planning would have taken more time and a lot more calculations and risk scenarios would be needed. Although if the paper sales could be done only by using internet the situation would be different. Apparently in China the e-commerce is going well on paper sector. You can order paper reels from Alibaba and pay by Alipay. However, this possibility was not found from Amazon.

In Latin America, the payment methods are a problem. The credit cards are not set up for cross border purchases. Perhaps the Block chain accounts could be one of the keys to solve this problem. It would be good to conduct a separate study on the payment terms and payment methods in Latin America. Also, the logistics is a challenge for the e-commerce. The cost to deliver a single reel can be high. During the semi-structured interview, it was discovered that the company had previously conducted a study on e-commerce. This was an idea that was considered as an option, but at this point to offer the Service is considered the best option. It is possible that when the payment methods and the infrastructures are developed more, the e-commerce is again an option.

Other important matter is who oversees the internationalization. According to Cavusgil and Knight (2015, 11) the fast internationalization of the company depends on company's internal projects carried out in entrepreneurial spirit. The company needs to have committed workers to internationalize fast. The person who is executing the change must believe in the change, otherwise it will not succeed. In the internationalization, the open mind and readiness to learn new things and the will to succeed are the key elements when choosing the person.

The internationalization is possible to do fast without having to invest a big amount of money and taking a big risk. The key is what the company is offering to the market. In this case the company can provide a new service on an old market. There are competitors offering the same end service, but not so easily and fast than what this company can offer.

7.2 Avenues for further studies

The used analysis method allows to continue the study even further. This method is not tied in the paper industry. If the Company wants to export chocolate or other products, this study could be conducted to find out the demand, production, exportation and the risks by just replacing the ANC values with the ones of the product in question.

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APPENDICES

Appendix 1. Interview

Interview

Which is the best way to enter the market?

CFO: The risk is too high to enter with the paper sales. That's why we would enter the market with a service.

CEO: We have a patent in Europe for a Mobile saw to cut the paper reels. The specialty is that it can be taken to the factory. Currently when cutting is needed the reels are sent to a place where they can be cut. The parts for the Saw can be bought and in case the project in South America fails, the machine can be sent to Europe where it's part of our business.

Which are the steps to proceed with the project?

SALES MANAGER: First should be clarified what kind of service the factories are now using for cutting the reels. They should be contacted and directly asked. Also, they could be asked if they would be interested in this service we can offer. Then the process for the patent should be clarified, if it can be applied for the whole continent or does it need to be applied country by country.

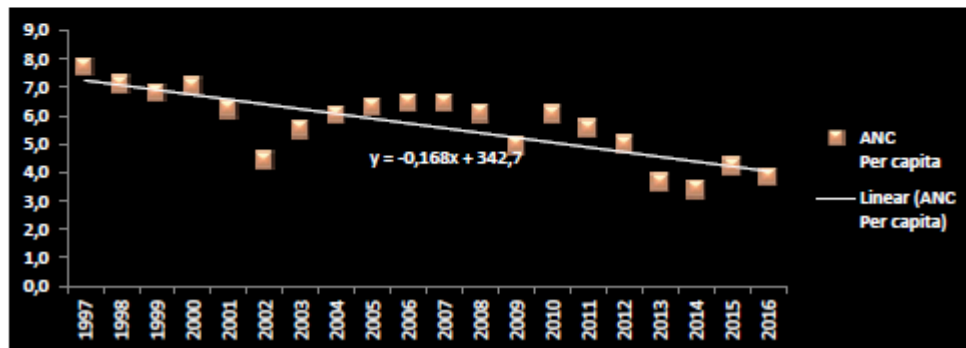
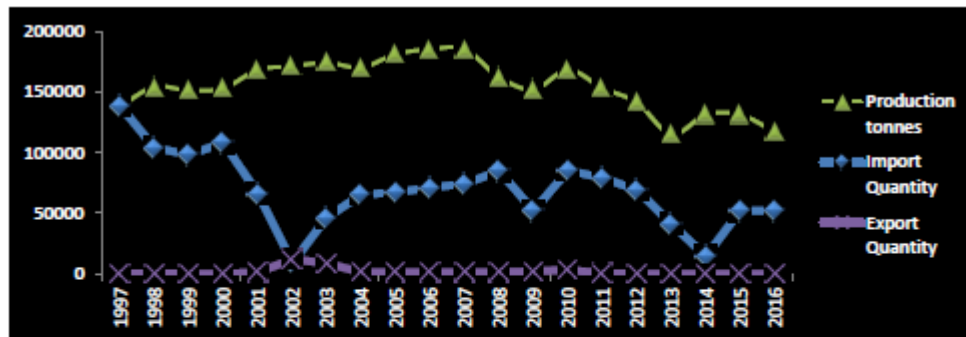
CEO: Storing costs for the machine are important, are there big regional differences in the prices. Good way is to call to a production director in a paper mill and ask about their process, then present the process we offer and ask if they would be interested.

CFO: We had a thesis worker few years ago working on e-commerce. This option could be reviewed again as the payment methods and the e-commerce has developed.

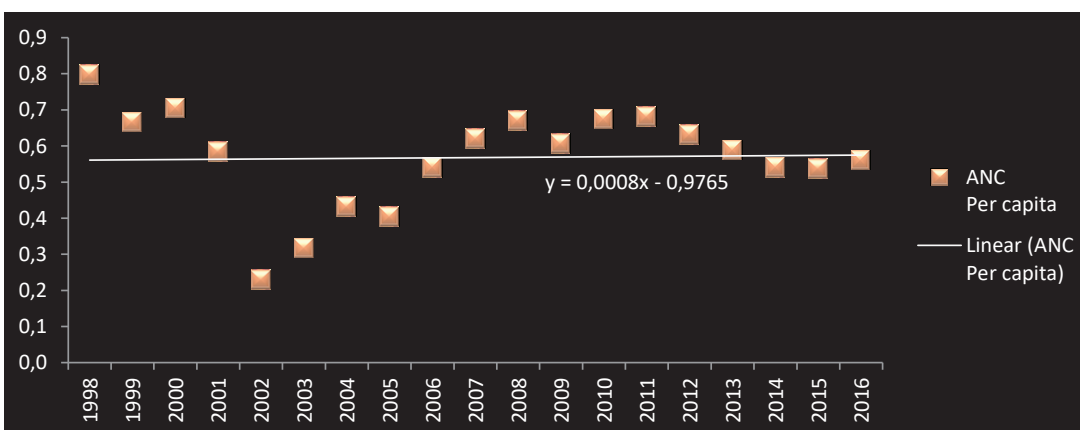
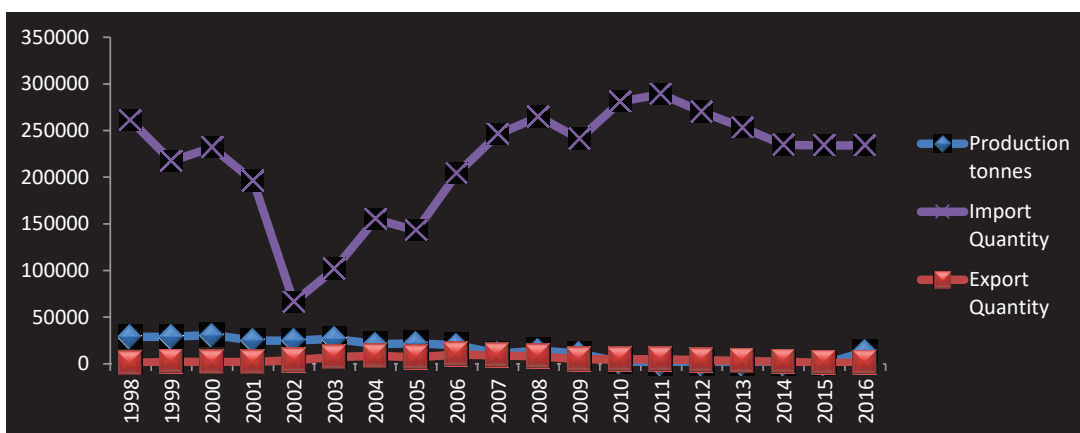
Appendix 2. Analysis Data

Domain Forestry Production and Trade								
Area Code 9								
Area Argentina								
Item Code 1671								
Item Newsprint								
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	138000	138400	200	276200	35833969	7,7	-0,168	1,235
1998	154000	104000	200	257800	36241590	7,1		
1999	151000	98000	0	249000	36648068	6,8		
2000	153000	108000	0	261000	37057452	7,0		
2001	168000	66000	1000	233000	37471509	6,2		
2002	171000	9000	12000	168000	37889370	4,4		
2003	174000	46243	8593	211650	38309379	5,5		
2004	170000	65163	1286	233877	38728696	6,0		
2005	181000	67000	1000	247000	39145488	6,3		
2006	185000	71000	1000	255000	39558890	6,4		
2007	185000	74100	1000	258100	39970224	6,5		
2008	162000	84701	1000	245701	40382389	6,1		
2009	152000	52000	2000	202000	40799407	5,0		
2010	168000	85000	3000	250000	41223889	6,1		
2011	153000	79000	425	231575	41656879	5,6		
2012	141000	69000	85	209915	42096739	5,0		
2013	115000	41009	162	155847	42539925	3,7		
2014	131000	14479	83	145396	42981515	3,4		
2015	131000	52000	83	182917	43417765	4,2		
2016	117000	52000	83	168917	43847430	3,9		
						5,6		

3,0



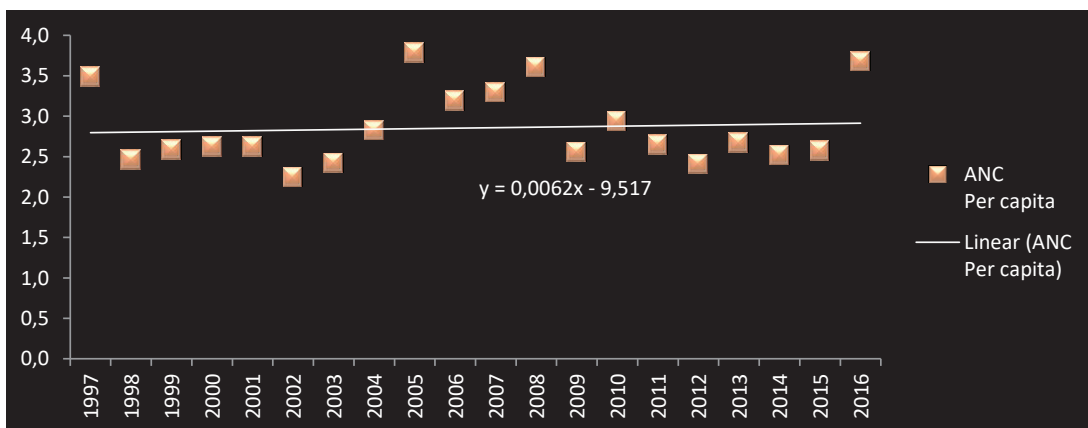
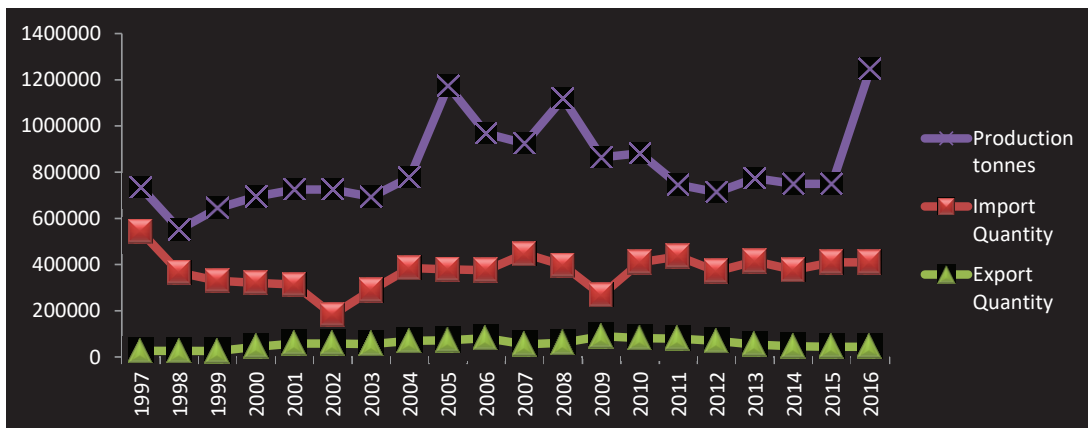
Item Code	1616							
Item	Printing and writing papers, coated							
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	29000	261100	800	289300	36241590	0,8	0,001	0,139
1999	29000	217300	2200	244100	36648068	0,7		
2000	31000	232000	2000	261000	37057452	0,7		
2001	25000	196000	2000	219000	37471509	0,6		
2002	25000	66000	4000	87000	37889370	0,2		
2003	27000	101675	7241	121434	38309379	0,3		
2004	21000	154919	8533	167386	38728696	0,4		
2005	22000	142817	6766	158051	39145488	0,4		
2006	20000	204000	10000	214000	39558890	0,5		
2007	11000	246000	9000	248000	39970224	0,6		
2008	14000	264711	8000	270711	40382389	0,7		
2009	11000	241000	5000	247000	40799407	0,6		
2010	2000	281000	5000	278000	41223889	0,7		
2011	0	289000	5000	284000	41656879	0,7		
2012	0	270000	4000	266000	42096739	0,6		
2013	0	253269	3110	250159	42539925	0,6		
2014	0	234725	2147	232578	42981515	0,5		
2015	0	234000	1000	233000	43417765	0,5		
2016	13000	234000	1000	246000	43847430	0,6		
						0,6		



Item Code 1675

Item **Other paper and paperboard**

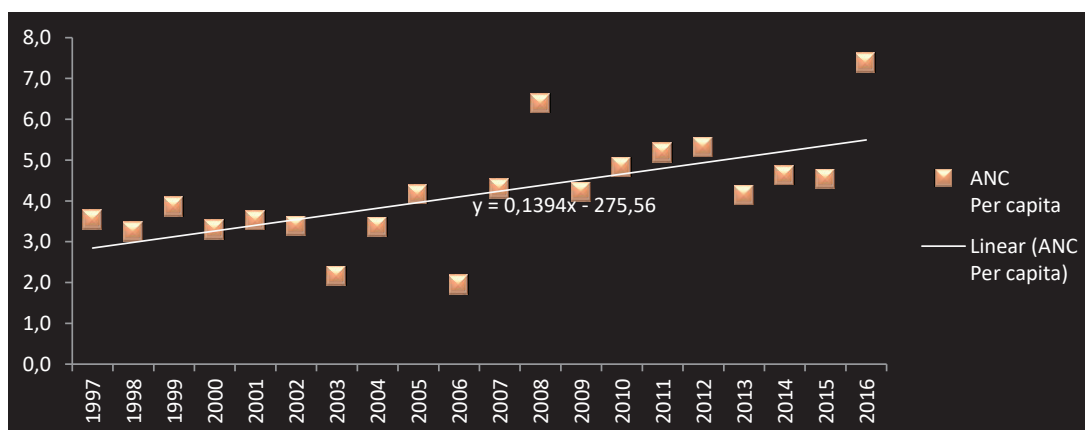
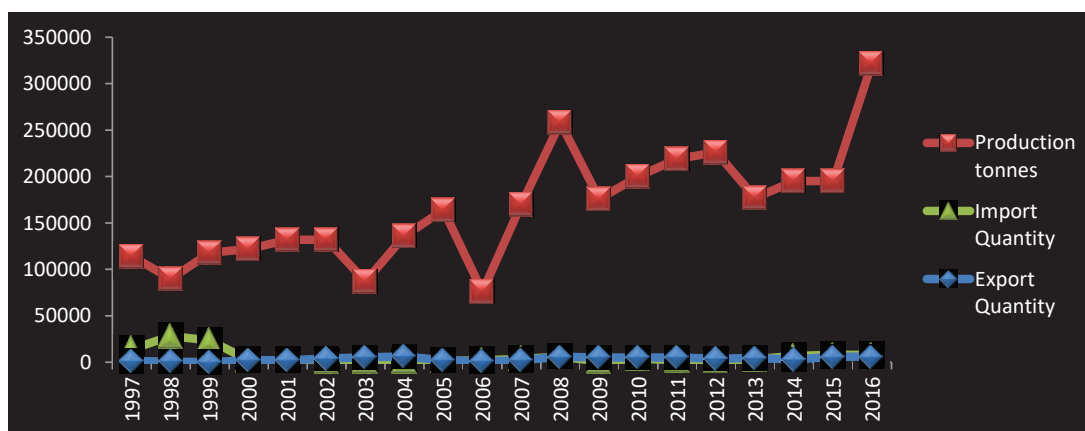
Year	Production	Import	Export	ANC		Trend	Standard deviation
	tonnes	Quantity	Quantity	tonnes	Population Per capita		
1997	734000	542300	26400	1249900	35833969	3,5	0,006 0,475
1998	552000	365300	26500	890800	36241590	2,5	
1999	644000	329700	25750	947950	36648068	2,6	
2000	694000	321000	44040	970960	37057452	2,6	
2001	725000	314000	58000	981000	37471509	2,6	
2002	725000	182846	58122	849724	37889370	2,2	
2003	693000	289345	55886	926459	38309379	2,4	
2004	778000	385053	69883	1093170	38728696	2,8	
2005	1174000	379424	72711	1480713	39145488	3,8	
2006	967000	376000	82000	1261000	39558890	3,2	
2007	924000	446900	55000	1315900	39970224	3,3	
2008	1120000	397188	62000	1455188	40382389	3,6	
2009	864000	268000	90000	1042000	40799407	2,6	
2010	882000	410000	82000	1210000	41223889	2,9	
2011	746000	435000	79000	1102000	41656879	2,6	
2012	713000	371446	70308	1014138	42096739	2,4	
2013	774000	414844	53324	1135520	42539925	2,7	
2014	749440	377388	46183	1080645	42981515	2,5	
2015	749440	410000	44390	1115050	43417765	2,6	
2016	1247000	410000	44390	1612610	43847430	3,7	



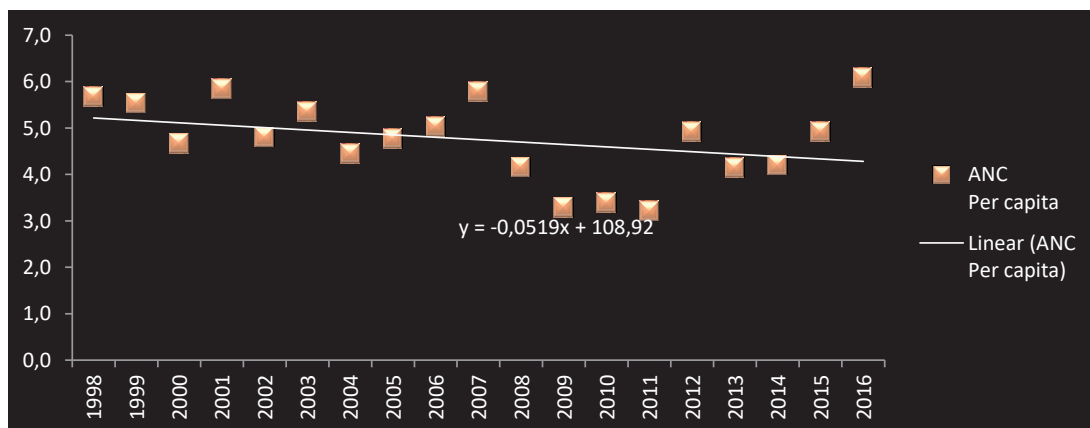
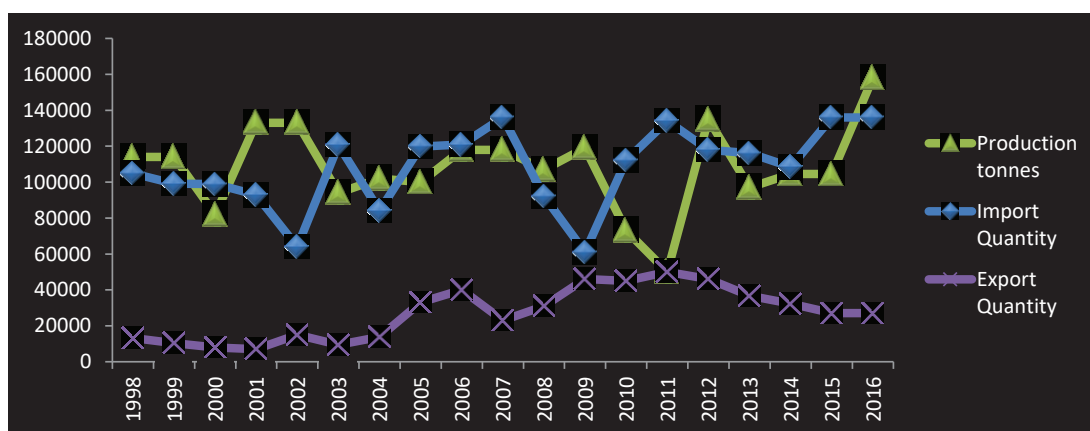
Item Code 1676

Item Household and sanitary papers

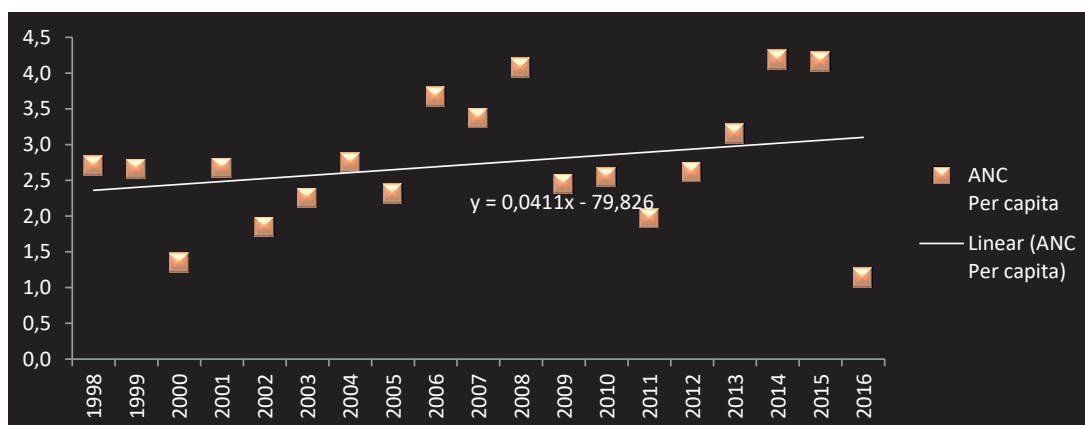
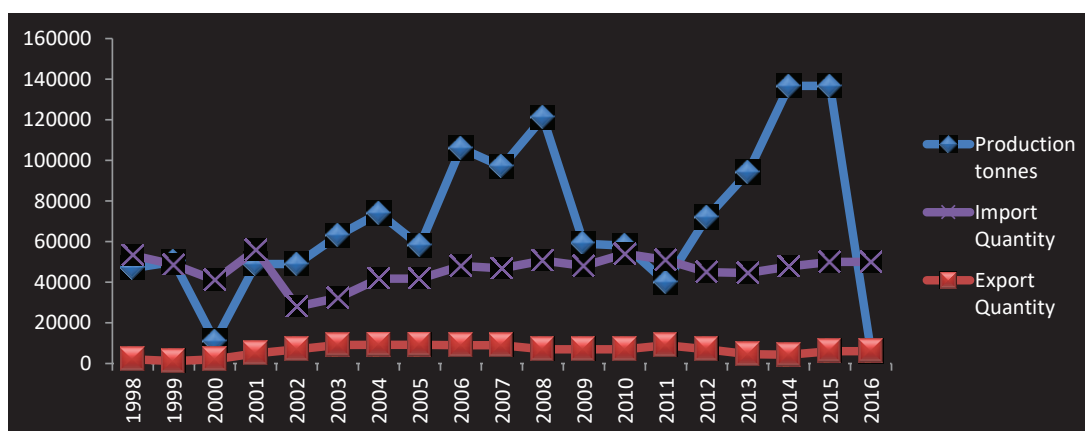
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	114000	14000	1100	126900	35833969	3,5	0,139	1,281
1998	90000	28200	600	117600	36241590	3,2		
1999	118000	23300	0	141300	36648068	3,9		
2000	122000	2000	2000	122000	37057452	3,3		
2001	132000	2000	2000	132000	37471509	3,5		
2002	132000	300	4000	128300	37889370	3,4		
2003	87000	942	5378	82564	38309379	2,2		
2004	136000	355	6148	130207	38728696	3,4		
2005	164000	1186	2111	163075	39145488	4,2		
2006	76000	2000	1000	77000	39558890	1,9		
2007	170000	3700	2000	171700	39970224	4,3		
2008	258000	5843	6000	257843	40382389	6,4		
2009	176000	1000	5000	172000	40799407	4,2		
2010	200000	4000	5000	199000	41223889	4,8		
2011	219000	2000	5000	216000	41656879	5,2		
2012	226000	1446	4000	223446	42096739	5,3		
2013	177000	3243	4314	175929	42539925	4,1		
2014	195000	6881	3026	198855	42981515	4,6		
2015	195000	8000	6000	197000	43417765	4,5		
2016	322000	8000	6000	324000	43847430	7,4	4,2	



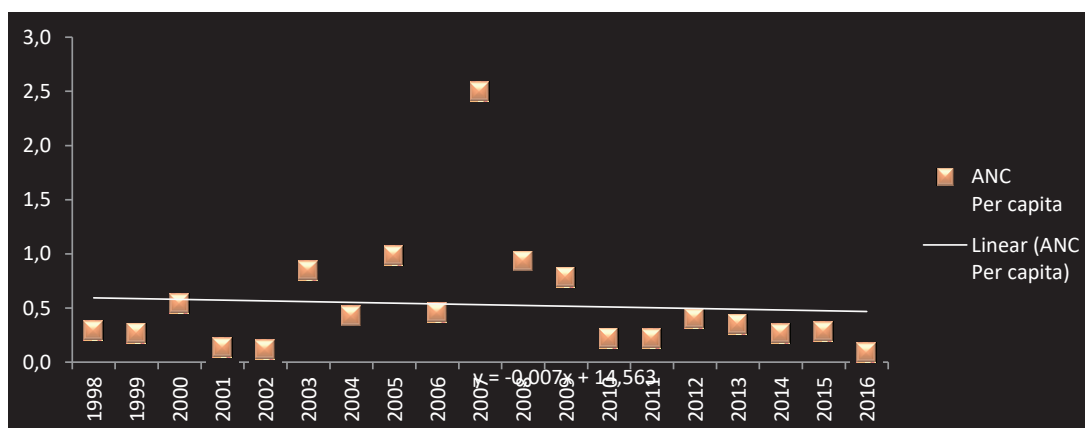
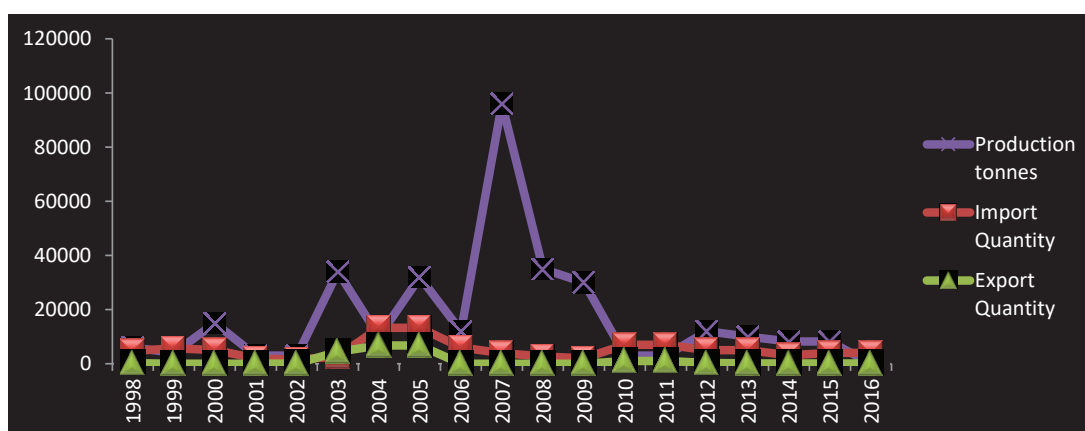
Item Code	1618							
Item	Cartonboard							
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	114000	104800	13200	205600	36241590	5,7	-0,052	0,865
1999	114000	99100	10400	202700	36648068	5,5		
2000	82000	99000	8000	173000	37057452	4,7		
2001	133000	93000	7000	219000	37471509	5,8		
2002	133000	64000	15000	182000	37889370	4,8		
2003	94000	120632	9431	205201	38309379	5,4		
2004	102000	83969	13832	172137	38728696	4,4		
2005	100000	119821	33094	186727	39145488	4,8		
2006	118000	121000	40000	199000	39558890	5,0		
2007	118000	136000	23000	231000	39970224	5,8		
2008	107000	92017	31000	168017	40382389	4,2		
2009	119000	61000	46000	134000	40799407	3,3		
2010	73000	112000	45000	140000	41223889	3,4		
2011	50000	134000	50000	134000	41656879	3,2		
2012	135000	118000	46000	207000	42096739	4,9		
2013	97000	116108	36666	176442	42539925	4,1		
2014	104529	108398	32346	180581	42981515	4,2		
2015	104529	136000	27000	213529	43417765	4,9		
2016	158000	136000	27000	267000	43847430	6,1		
						4,7		



Item Code	1621							
Item	Wrapping papers							
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	47000	53200	2100	98100	36241590	2,7	0,041	0,875
1999	50000	48700	1200	97500	36648068	2,7		
2000	11000	41000	2000	50000	37057452	1,3		
2001	49000	56000	5000	100000	37471509	2,7		
2002	49000	28000	7000	70000	37889370	1,8		
2003	63000	32378	9072	86306	38309379	2,3		
2004	74000	41753	9200	106553	38728696	2,8		
2005	58000	41752	9200	90552	39145488	2,3		
2006	106000	48000	9000	145000	39558890	3,7		
2007	97000	46800	9000	134800	39970224	3,4		
2008	121000	50684	7000	164684	40382389	4,1		
2009	59000	48000	7000	100000	40799407	2,5		
2010	58000	54000	7000	105000	41223889	2,5		
2011	40000	51000	9000	82000	41656879	2,0		
2012	72000	45000	7000	110000	42096739	2,6		
2013	94000	44585	4570	134015	42539925	3,2		
2014	136702	47733	4389	180046	42981515	4,2		
2015	136702	50000	6000	180702	43417765	4,2		
2016	6000	50000	6000	50000	43847430	1,1		
						2,7		



Item Code	1622								
Item	Other papers mainly for packaging								
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation	
1998	6000	4700	200	10500	36241590	0,3	-0,007	0,551	
1999	4000	5700	50	9650	36648068	0,3			
2000	15000	5000	40	19960	37057452	0,5			
2001	3000	2000	0	5000	37471509	0,1			
2002	3000	1546	122	4424	37889370	0,1			
2003	34000	2741	4430	32311	38309379	0,8			
2004	10000	13274	6747	16527	38728696	0,4			
2005	32000	13274	6747	38527	39145488	1,0			
2006	12000	6000	0	18000	39558890	0,5			
2007	96000	3900	0	99900	39970224	2,5			
2008	35000	2670	0	37670	40382389	0,9			
2009	30000	2000	0	32000	40799407	0,8			
2010	3000	7000	1000	9000	41223889	0,2			
2011	3000	7000	1000	9000	41656879	0,2			
2012	12000	5000	308	16692	42096739	0,4			
2013	10000	5035	155	14880	42539925	0,3			
2014	8209	3130	74	11265	42981515	0,3			
2015	8209	4000	119	12090	43417765	0,3			
2016	0	4000	119	3881	43847430	0,1			
						0,5			



Domain Forestry Production and Trade

Area Code 40

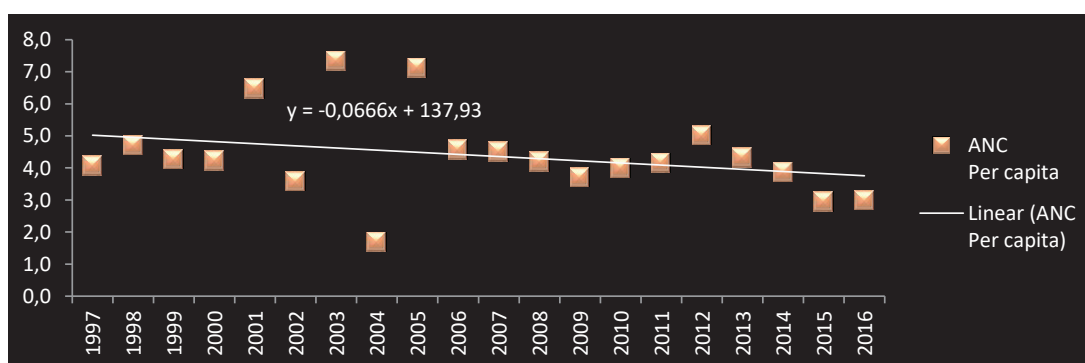
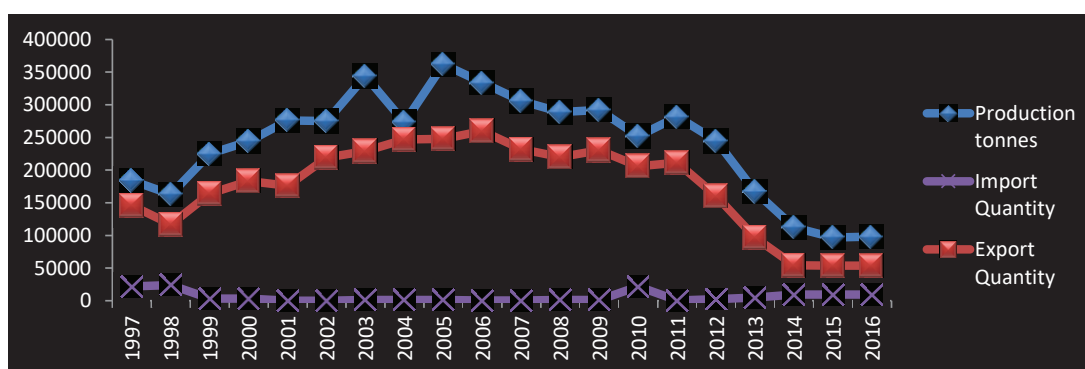
Area Chile

Item Code 1671

Item Newsprint

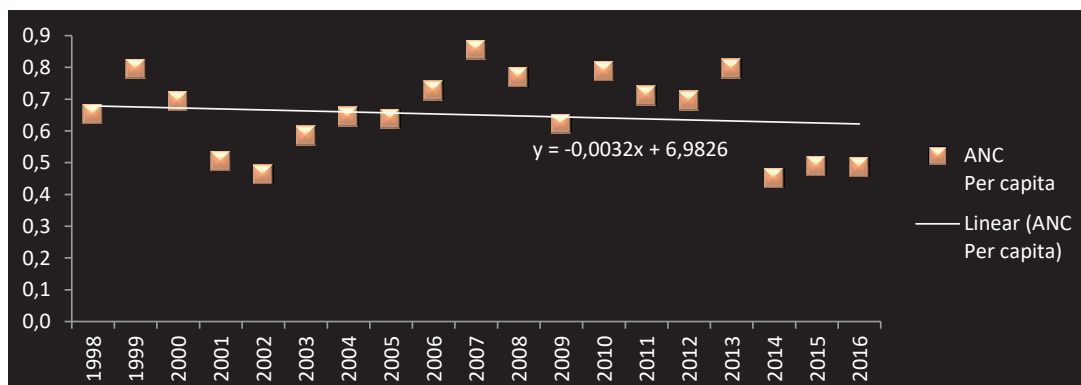
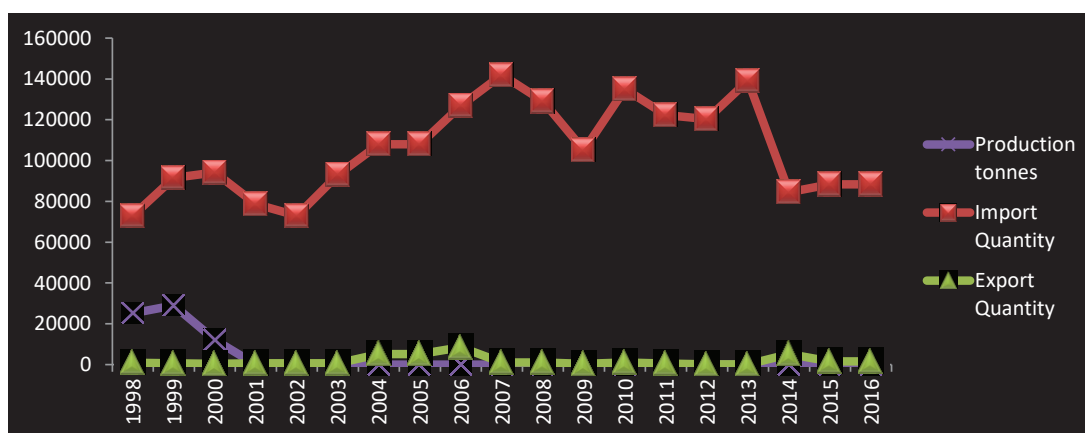
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	184000	22000	146000	60000	14694835	4,1	-0,067	1,341
1998	163000	24000	117000	70000	14887756	4,7		
1999	225000	3400	164000	64400	15076952	4,3		
2000	244000	3400	183000	64400	15262754	4,2		
2001	276000	0	176000	100000	15444969	6,5		
2002	275000	0	219000	56000	15623635	3,6		
2003	344000	1000	229000	116000	15799542	7,3		
2004	273000	1000	247000	27000	15973778	1,7		
2005	362000	1000	248000	115000	16147064	7,1		
2006	334000	472	259870	74602	16319792	4,6		
2007	306000	472	232000	74472	16491687	4,5		
2008	289000	1000	220000	70000	16661942	4,2		
2009	292000	1000	230598	62402	16829442	3,7		
2010	252000	22000	206000	68000	16993354	4,0		
2011	282000	422	211127	71295	17153357	4,2		
2012	245000	2265	160410	86855	17309746	5,0		
2013	167000	4968	96550	75418	17462982	4,3		
2014	112400	9646	54056	67990	17613798	3,9		
2015	96800	9267	53741	52326	17762681	2,9		
2016	98000	9267	53741	53526	17909754	3,0		

4,4



Item Code 1616
 Item Printing and writing papers, coated

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	25146	72994	927	97213	14887756	0,7	-0,003	0,126
1999	29000	91500	700	119800	15076952	0,8		
2000	12000	94200	400	105800	15262754	0,7		
2001	0	78600	700	77900	15444969	0,5		
2002	0	73000	700	72300	15623635	0,5		
2003	0	93000	700	92300	15799542	0,6		
2004	0	108000	5108	102892	15973778	0,6		
2005	0	108000	5108	102892	16147064	0,6		
2006	0	126950	8500	118450	16319792	0,7		
2007	0	142000	1000	141000	16491687	0,9		
2008	0	129000	1000	128000	16661942	0,8		
2009	0	105000	402	104598	16829442	0,6		
2010	0	135000	1000	134000	16993354	0,8		
2011	0	122356	474	121882	17153357	0,7		
2012	0	120315	131	120184	17309746	0,7		
2013	0	139185	163	139022	17462982	0,8		
2014	0	84547	5153	79394	17613798	0,5		
2015	0	88383	1549	86834	17762681	0,5		
2016	0	88383	1549	86834	17909754	0,5		

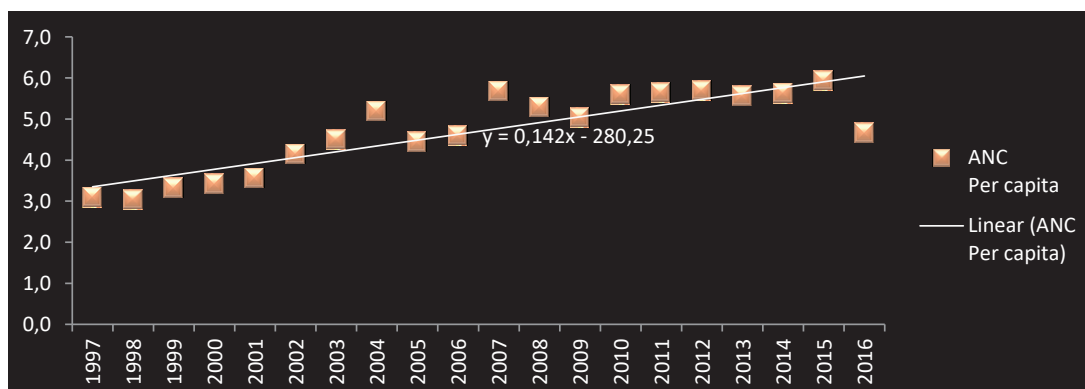
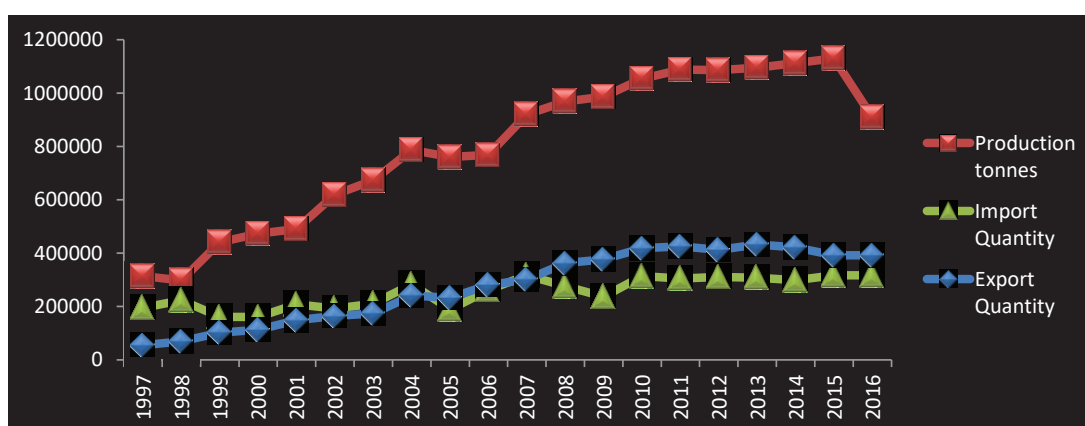


Item Code 1675

Item **Other paper and paperboard**

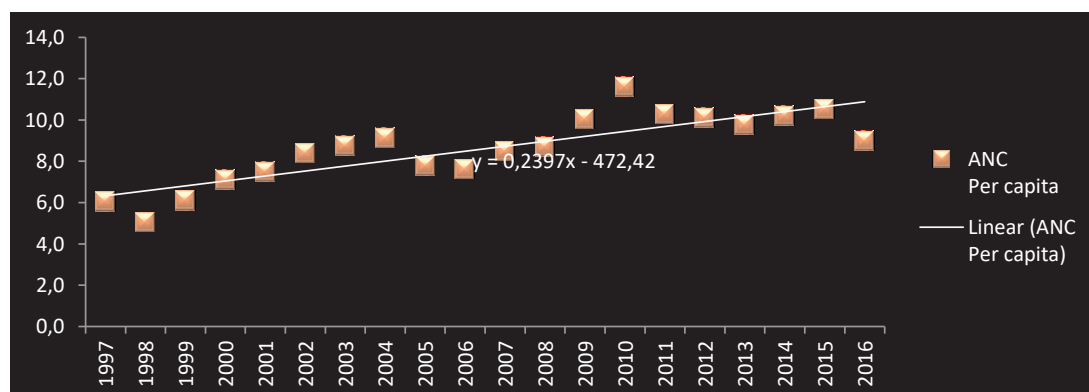
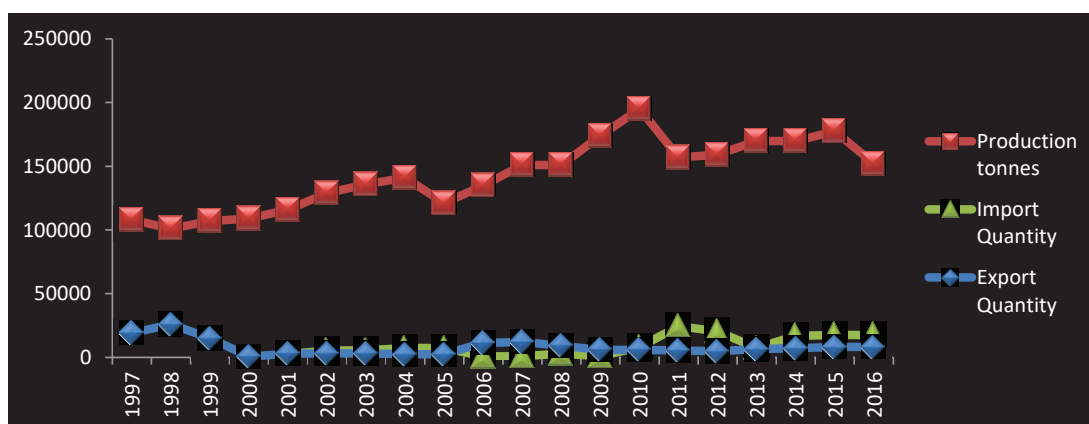
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	314000	195300	55000	454300	14694835	3,1	0,142	0,975
1998	297822	224000	69001	452821	14887756	3,0		
1999	441000	161000	102200	499800	15076952	3,3		
2000	473000	161000	112900	521100	15262754	3,4		
2001	490000	208100	148300	549800	15444969	3,6		
2002	619000	192400	164500	646900	15623635	4,1		
2003	673000	210400	173700	709700	15799542	4,5		
2004	787000	283639	241229	829410	15973778	5,2		
2005	760000	189402	232326	717076	16147064	4,4		
2006	768000	262200	280870	749330	16319792	4,6		
2007	920000	316900	300920	935980	16491687	5,7		
2008	968000	276000	362920	881080	16661942	5,3		
2009	987000	237000	377317	846683	16829442	5,0		
2010	1054000	314000	418180	949820	16993354	5,6		
2011	1088000	304618	425319	967299	17153357	5,6		
2012	1086000	310908	411920	984988	17309746	5,7		
2013	1095000	308250	432530	970720	17462982	5,6		
2014	1112800	299187	421381	990606	17613798	5,6		
2015	1129900	316635	392429	1054106	17762681	5,9		
2016	910000	316635	392429	834206	17909754	4,7		

4,7



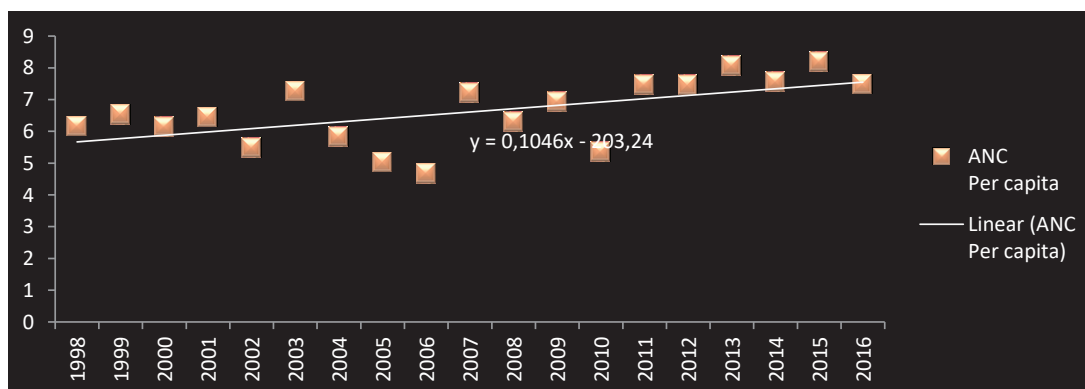
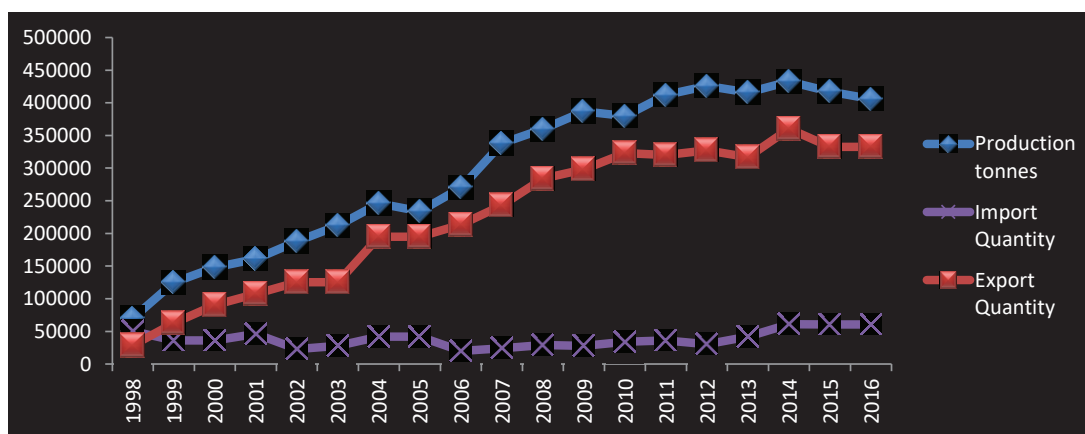
Item Code 1676
 Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	108000		19000	89000	14694835	6,1	0,240	1,697
1998	101000		26000	75000	14887756	5,0		
1999	107000		15000	92000	15076952	6,1		
2000	109000		600	108400	15262754	7,1		
2001	116000	2500	3000	115500	15444969	7,5		
2002	129000	5400	3100	131300	15623635	8,4		
2003	136000	5400	3100	138300	15799542	8,8		
2004	141000	7298	2467	145831	15973778	9,1		
2005	121000	7298	2467	125831	16147064	7,8		
2006	135000	700	11500	124200	16319792	7,6		
2007	151000	1000	12000	140000	16491687	8,5		
2008	151000	3000	9000	145000	16661942	8,7		
2009	174000	1000	6000	169000	16829442	10,0		
2010	195000	8000	6000	197000	16993354	11,6		
2011	157000	24545	5406	176139	17153357	10,3		
2012	159000	20415	4830	174585	17309746	10,1		
2013	170000	7347	6611	170736	17462982	9,8		
2014	169700	16968	7101	179567	17613798	10,2		
2015	177600	17544	8297	186847	17762681	10,5		
2016	152000	17544	8297	161247	17909754	9,0		
						8,6		



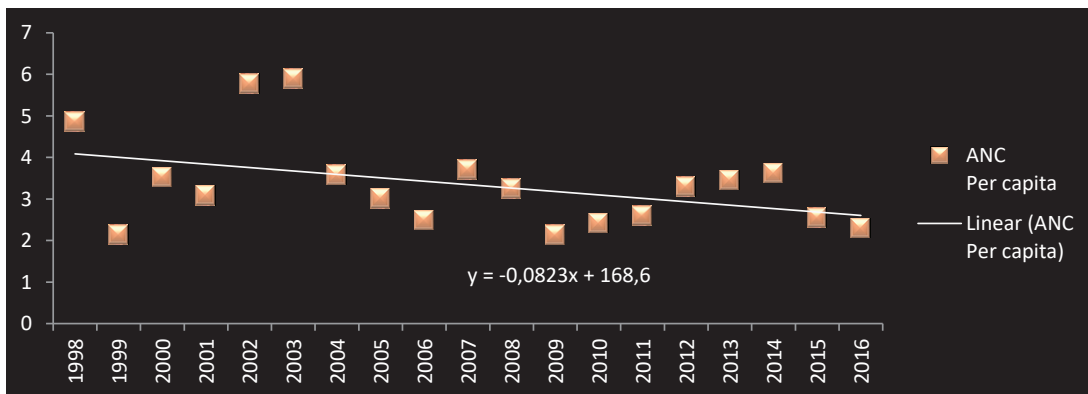
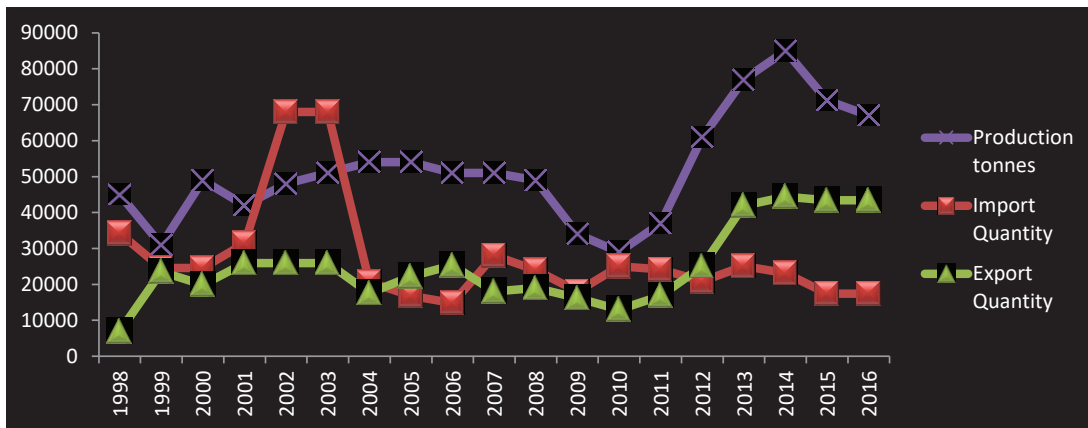
Item Code 1618
 Item **Cartonboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	70381	50117	28721	91777	14887756	6,2	0,105	1,024
1999	125000	36021	62600	98421	15076952	6,5		
2000	148000	36021	90300	93721	15262754	6,1		
2001	161000	46000	107400	99600	15444969	6,4		
2002	188000	23000	125400	85600	15623635	5,5		
2003	212000	28000	125400	114600	15799542	7,3		
2004	246000	42000	194848	93152	15973778	5,8		
2005	234000	42000	194848	81152	16147064	5,0		
2006	270000	20000	213700	76300	16319792	4,7		
2007	338000	24000	243000	119000	16491687	7,2		
2008	360000	29000	284000	105000	16661942	6,3		
2009	387000	28000	298315	116685	16829442	6,9		
2010	380000	34000	323000	91000	16993354	5,4		
2011	412000	36089	320170	127919	17153357	7,5		
2012	426000	30216	327149	129067	17309746	7,5		
2013	416000	41815	316851	140964	17462982	8,1		
2014	432600	60919	360252	133267	17613798	7,6		
2015	417200	60611	332470	145341	17762681	8,2		
2016	406000	60611	332470	134141	17909754	7,5		
						6,6		



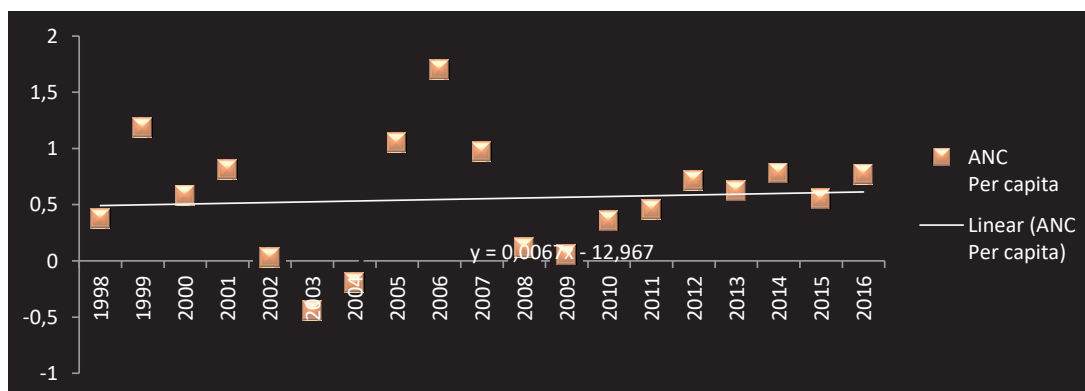
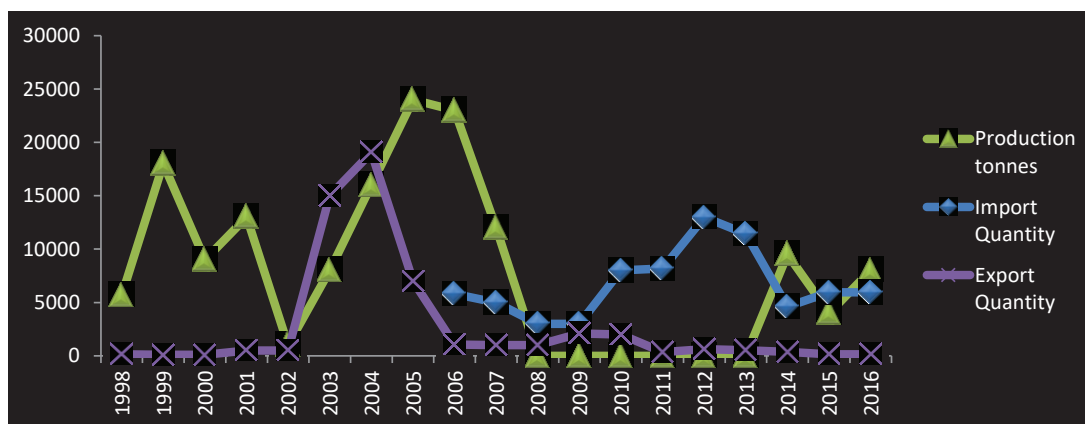
Item Code 1621
 Item Wrapping papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	45000	34210	6926	72284	14887756	4,9	-0,082	1,106
1999	31000	24589	23500	32089	15076952	2,1		
2000	49000	24589	19900	53689	15262754	3,5		
2001	42000	31400	25900	47500	15444969	3,1		
2002	48000	68000	25900	90100	15623635	5,8		
2003	51000	68000	25900	93100	15799542	5,9		
2004	54000	20660	17562	57098	15973778	3,6		
2005	54000	16823	22245	48578	16147064	3,0		
2006	51000	14800	25300	40500	16319792	2,5		
2007	51000	28000	18000	61000	16491687	3,7		
2008	49000	24000	19000	54000	16661942	3,2		
2009	34000	18000	16198	35802	16829442	2,1		
2010	29000	25000	13000	41000	16993354	2,4		
2011	37000	24228	16826	44402	17153357	2,6		
2012	61000	20905	25074	56831	17309746	3,3		
2013	77000	25121	41928	60193	17462982	3,4		
2014	85000	23168	44403	63765	17613798	3,6		
2015	71200	17437	43431	45206	17762681	2,5		
2016	67000	17437	43431	41006	17909754	2,3		
						3,3		



Item Code 1622
 Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	5683		134	5549	14887756	0,4	0,007	0,510
1999	18000		100	17900	15076952	1,2		
2000	9000		100	8900	15262754	0,6		
2001	13000		500	12500	15444969	0,8		
2002	1000		500	500	15623635	0,0		
2003	8000		15000	-7000	15799542	-0,4		
2004	16000		19058	-3058	15973778	-0,2		
2005	24000		7000	17000	16147064	1,1		
2006	23000	5800	1050	27750	16319792	1,7		
2007	12000	5000	1000	16000	16491687	1,0		
2008	0	3000	1000	2000	16661942	0,1		
2009	0	3000	2108	892	16829442	0,1		
2010	0	8000	2000	6000	16993354	0,4		
2011	0	8184	343	7841	17153357	0,5		
2012	0	12995	632	12363	17309746	0,7		
2013	0	11424	534	10890	17462982	0,6		
2014	9500	4608	369	13739	17613798	0,8		
2015	4000	5966	151	9815	17762681	0,6		
2016	8000	5966	151	13815	17909754	0,8		
						0,6		



Domain Forestry Production and Trade

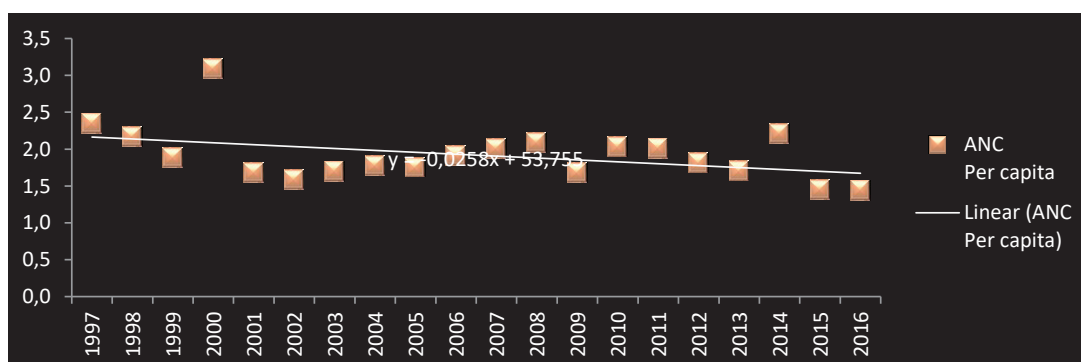
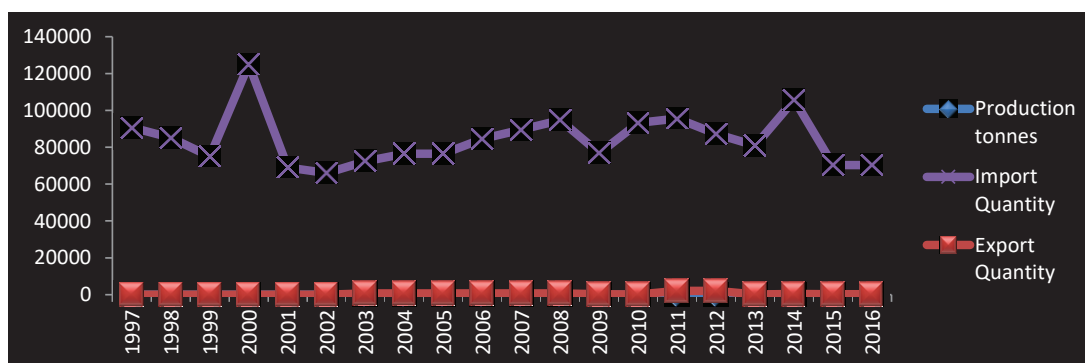
Area Code 44

Area Colombia

Item Code 1671

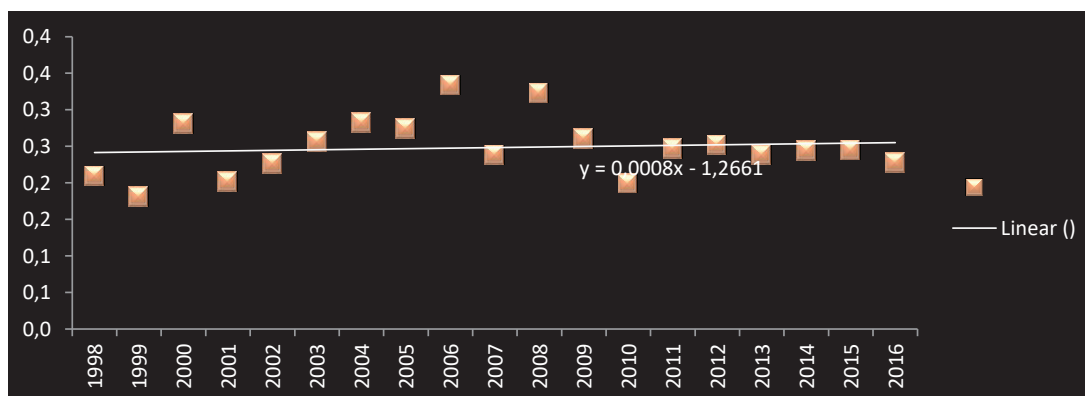
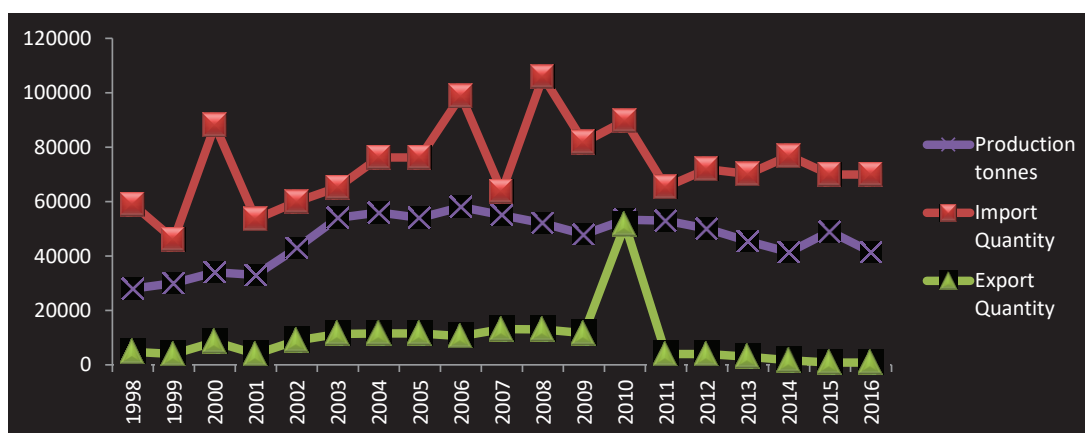
Item Newsprint

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	0	90800	0	90800	38645411	2,3	-0,026	0,369
1998	0	85100	0	85100	39234062	2,2		
1999	0	75000	0	75000	39819279	1,9		
2000	0	125000	0	125000	40403958	3,1		
2001	0	69000	0	69000	40988909	1,7		
2002	0	66000	0	66000	41572491	1,6		
2003	0	72334	649	71685	42152151	1,7		
2004	0	76476	649	75827	42724163	1,8		
2005	0	76476	649	75827	43285634	1,8		
2006	0	84620	649	83971	43835722	1,9		
2007	0	89570	649	88921	44374572	2,0		
2008	0	94700	649	94051	44901544	2,1		
2009	0	76759	277	76482	45416181	1,7		
2010	0	93209	48	93161	45918097	2,0		
2011	0	95540	2084	93456	46406646	2,0		
2012	0	87235	2084	85151	46881475	1,8		
2013	0	80879	107	80772	47342981	1,7		
2014	0	105757	429	105328	47791911	2,2		
2015	0	70391	230	70161	48228697	1,5		
2016	0	70391	230	70161	48653419	1,4		



Item Code 1616
 Item Printing and writing papers, coated

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	28000	59000	4800	82200	39234062	0,2	0,001	0,039
1999	30000	46100	4000	72100	39819279	0,2		
2000	34000	88000	8500	113500	40403958	0,3		
2001	33000	53500	4000	82500	40988909	0,2		
2002	43000	60000	9000	94000	41572491	0,2		
2003	54000	65241	11358	107883	42152151	0,3		
2004	56000	76198	11500	120698	42724163	0,3		
2005	54000	76198	11500	118698	43285634	0,3		
2006	58000	98884	10542	146342	43835722	0,3		
2007	55000	63800	13139	105661	44374572	0,2		
2008	52000	105900	13000	144900	44901544	0,3		
2009	48000	81770	11640	118130	45416181	0,3		
2010	53300	89755	51538	91517	45918097	0,2		
2011	53052	65413	4016	114449	46406646	0,2		
2012	50000	71975	3951	118024	46881475	0,3		
2013	45462	70143	2969	112636	47342981	0,2		
2014	41355	76804	1690	116469	47791911	0,2		
2015	49000	69898	827	118071	48228697	0,2		
2016	41449	69898	827	110520	48653419	0,2		

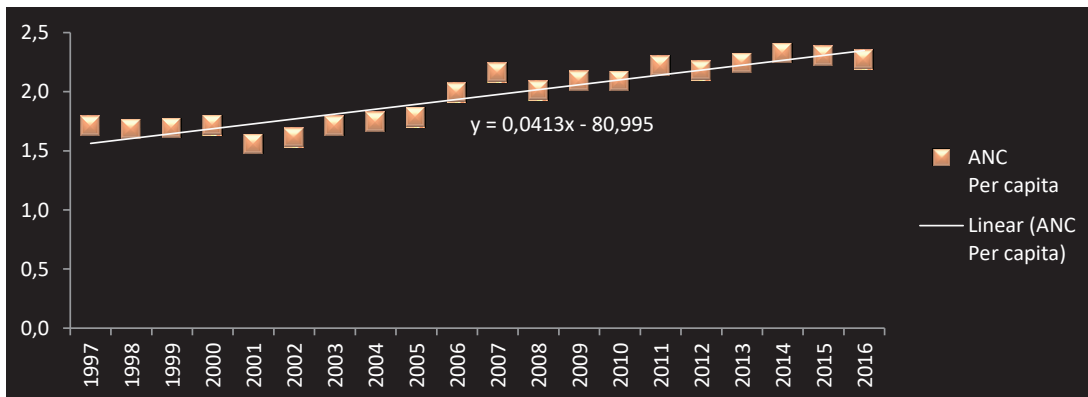
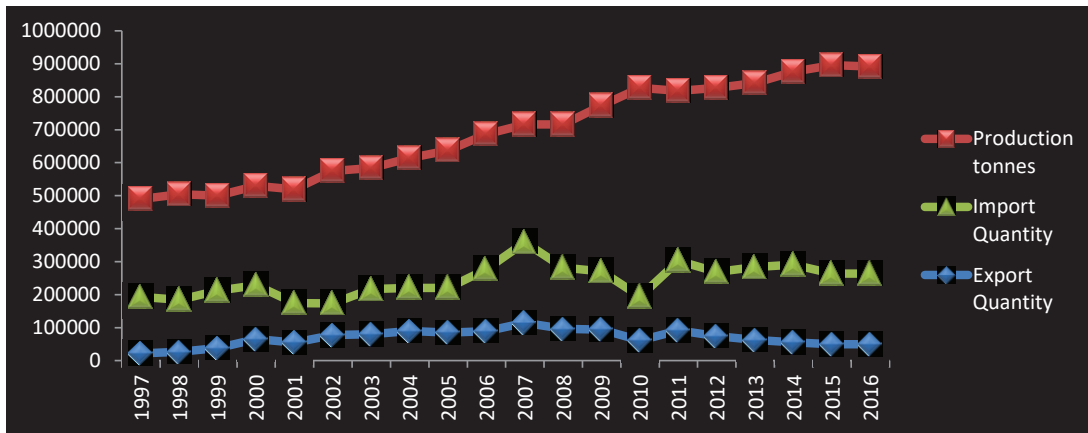


Item Code 1675

Item **Other paper and paperboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	490000	193600	21800	661800	38645411	1,7	0,041	0,263
1998	504000	183800	26800	661000	39234062	1,7		
1999	500000	212200	38400	673800	39819279	1,7		
2000	530000	228800	64800	694000	40403958	1,7		
2001	519000	174400	54600	638800	40988909	1,6		
2002	575000	173400	77350	671050	41572491	1,6		
2003	584000	216658	80131	720527	42152151	1,7		
2004	614000	220503	89493	745010	42724163	1,7		
2005	637000	220503	84893	772610	43285634	1,8		
2006	687000	276924	89345	874579	43835722	2,0		
2007	716000	358680	114443	960237	44374572	2,2		
2008	716000	281800	96000	901800	44901544	2,0		
2009	774000	270371	93957	950414	45416181	2,1		
2010	826700	194123	60993	959830	45918097	2,1		
2011	817865	302762	91611	1029016	46406646	2,2		
2012	827277	269150	74353	1022074	46881475	2,2		
2013	841759	283222	63075	1061906	47342981	2,2		
2014	875861	291200	55698	1111363	47791911	2,3		
2015	895948	263484	49288	1110144	48228697	2,3		
2016	891626	263484	49288	1105822	48653419	2,3		

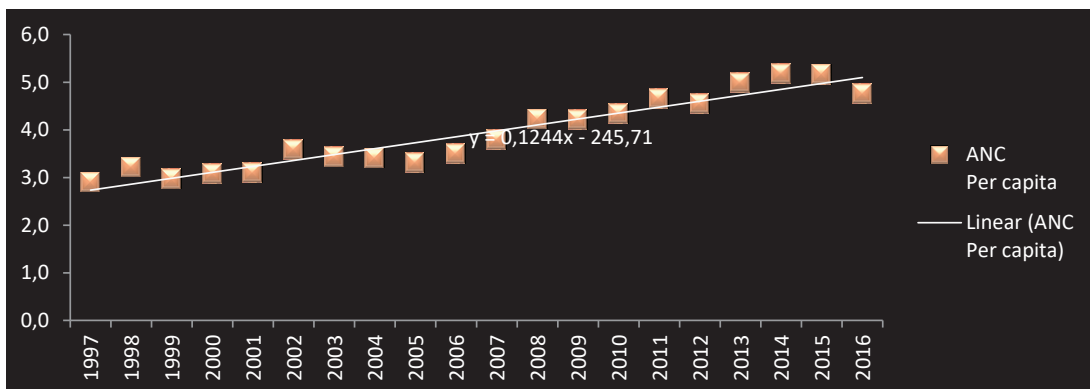
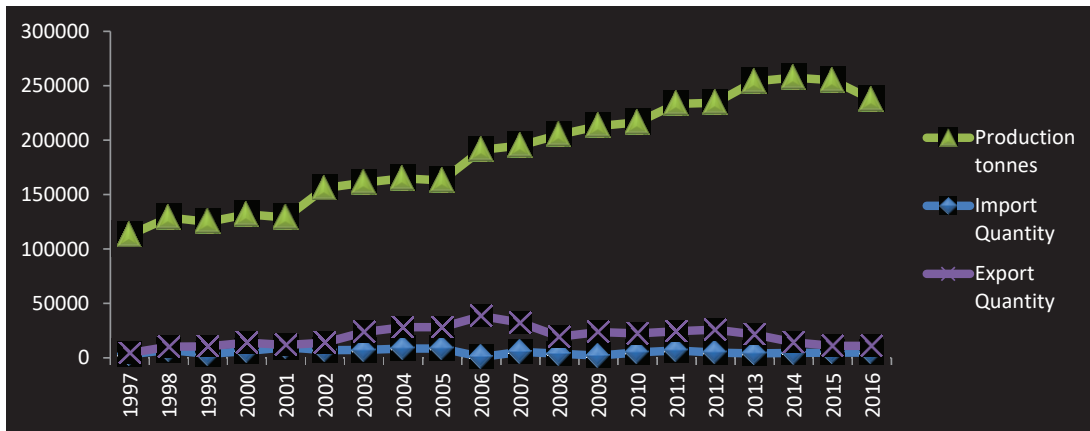
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Item Code 1676

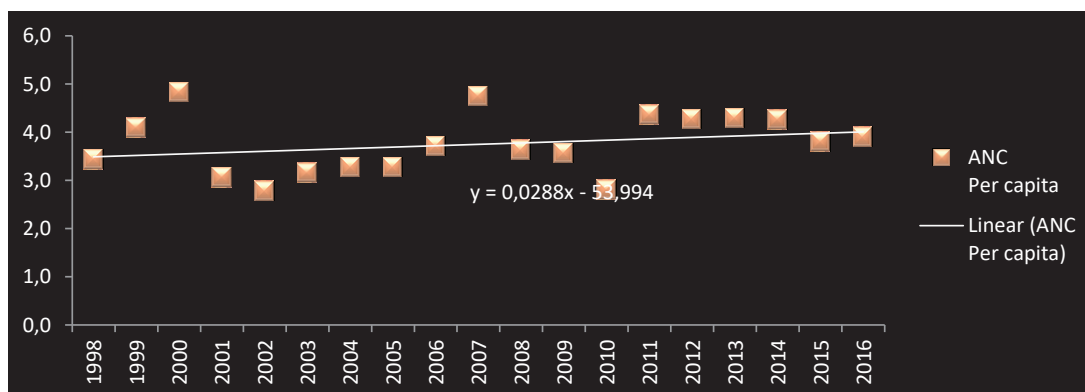
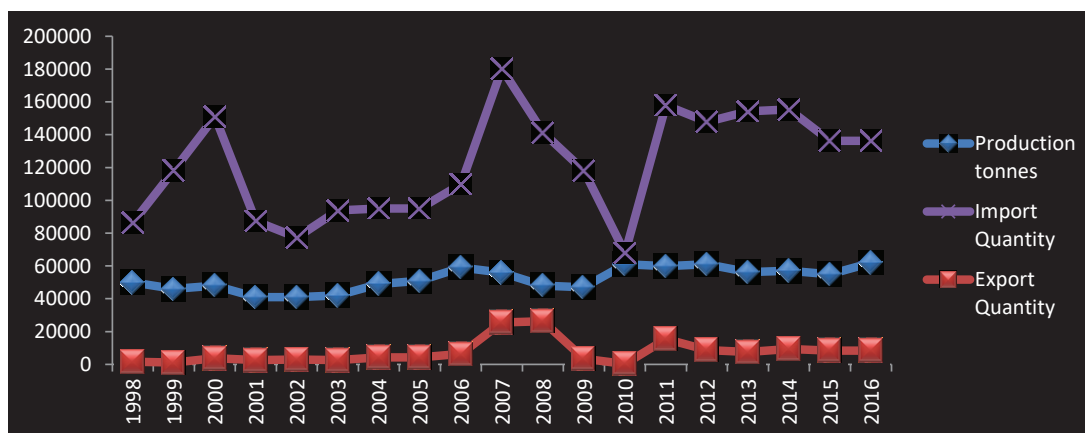
Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	113000	3400	4400	112000	38645411	2,9	0,124	0,771
1998	129000	7300	10200	126100	39234062	3,2		
1999	125000	3600	10600	118000	39819279	3,0		
2000	132000	6200	13900	124300	40403958	3,1		
2001	129000	9700	11800	126900	40988909	3,1		
2002	156000	7000	14000	149000	41572491	3,6		
2003	161000	7184	23572	144612	42152151	3,4		
2004	165000	8500	28211	145289	42724163	3,4		
2005	163000	8500	28211	143289	43285634	3,3		
2006	191000	800	38341	153459	43835722	3,5		
2007	195000	5500	32390	168110	44374572	3,8		
2008	205000	3900	19400	189500	44901544	4,2		
2009	213000	2117	23732	191385	45416181	4,2		
2010	216400	5027	22352	199075	45918097	4,3		
2011	233454	6774	24400	215828	46406646	4,7		
2012	234380	4738	26010	213108	46881475	4,5		
2013	253928	3954	21493	236389	47342981	5,0		
2014	257481	4468	14333	247616	47791911	5,2		
2015	255000	4911	11022	248889	48228697	5,2		
2016	237308	4911	11022	231197	48653419	4,8		
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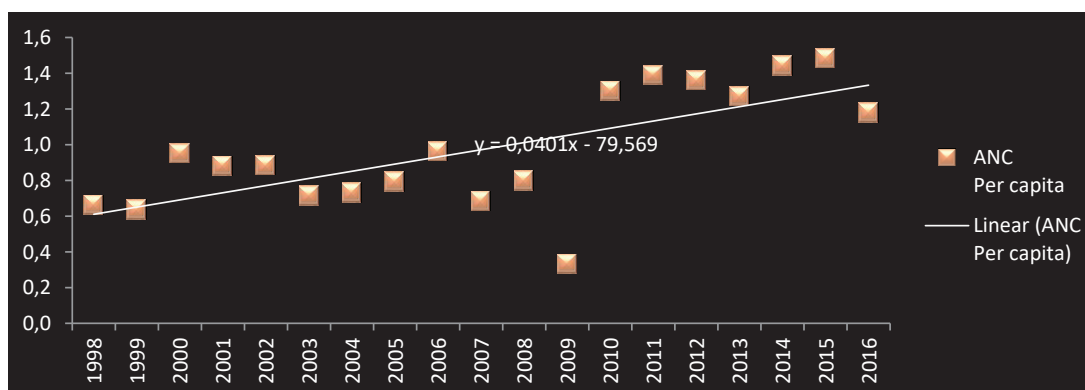
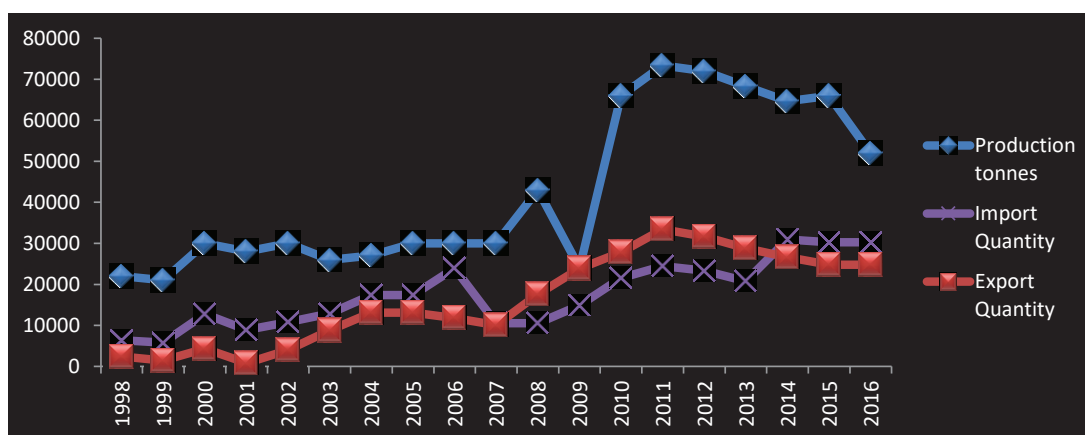
Item Code 1618
Item **Cartonboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	50000	86400	1700	134700	39234062	3,4	0,029	0,613
1999	46000	118300	1100	163200	39819279	4,1		
2000	48000	151000	3800	195200	40403958	4,8		
2001	41000	87200	2600	125600	40988909	3,1		
2002	41000	77300	3000	115300	41572491	2,8		
2003	42000	93856	2699	133157	42152151	3,2		
2004	49000	95098	4336	139762	42724163	3,3		
2005	51000	95098	4336	141762	43285634	3,3		
2006	59000	109890	6453	162437	43835722	3,7		
2007	56000	180200	25600	210600	44374572	4,7		
2008	48000	141400	26300	163100	44901544	3,6		
2009	47000	118178	3425	161753	45416181	3,6		
2010	61000	67870	257	128613	45918097	2,8		
2011	59816	157823	15547	202092	46406646	4,4		
2012	61000	147872	8737	200135	46881475	4,3		
2013	56305	154190	7515	202980	47342981	4,3		
2014	57043	155492	9333	203202	47791911	4,3		
2015	55000	136354	8439	182915	48228697	3,8		
2016	61898	136354	8439	189813	48653419	3,9		



Item Code 1621
 Item Wrapping papers

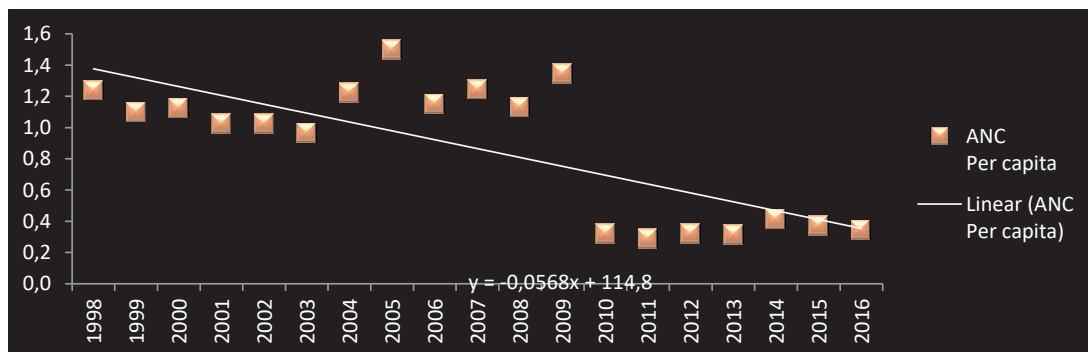
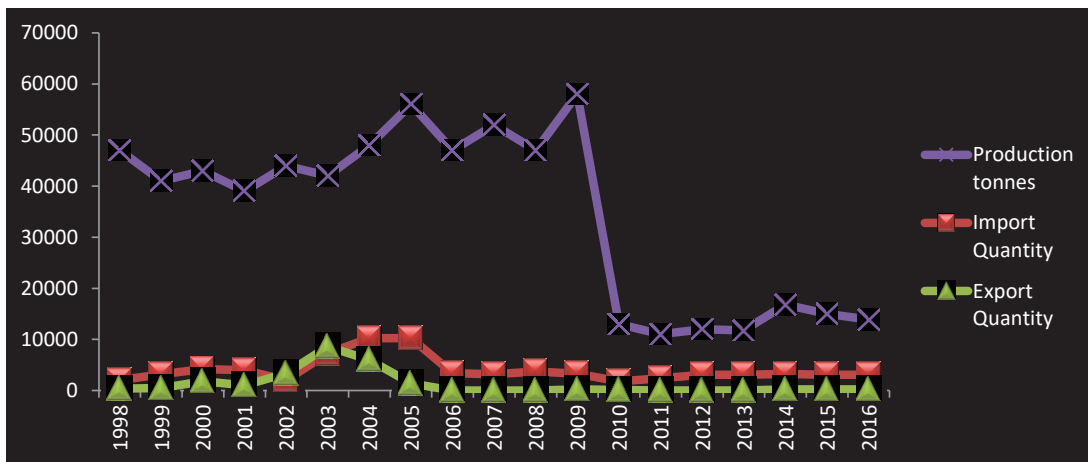
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	22000	6400	2400	26000	39234062	0,7	0,040	0,329
1999	21000	5800	1400	25400	39819279	0,6		
2000	30000	12800	4300	38500	40403958	1,0		
2001	28000	8900	800	36100	40988909	0,9		
2002	30000	10800	4000	36800	41572491	0,9		
2003	26000	12892	8796	30096	42152151	0,7		
2004	27000	17394	13096	31298	42724163	0,7		
2005	30000	17394	13096	34298	43285634	0,8		
2006	30000	23931	11800	42131	43835722	1,0		
2007	30000	10500	10100	30400	44374572	0,7		
2008	43000	10500	17600	35900	44901544	0,8		
2009	24000	14879	23834	15045	45416181	0,3		
2010	66000	21545	27852	59693	45918097	1,3		
2011	73376	24486	33423	64439	46406646	1,4		
2012	72000	23349	31623	63726	46881475	1,4		
2013	68260	20731	28807	60184	47342981	1,3		
2014	64661	30943	26641	68963	47791911	1,4		
2015	66000	30272	24776	71496	48228697	1,5		
2016	51918	30272	24776	57414	48653419	1,2		
						1,0		



Item Code 1622

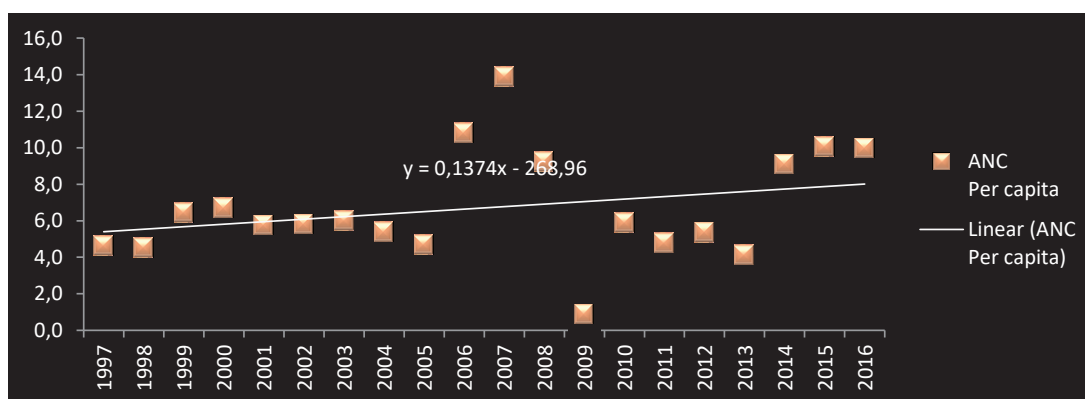
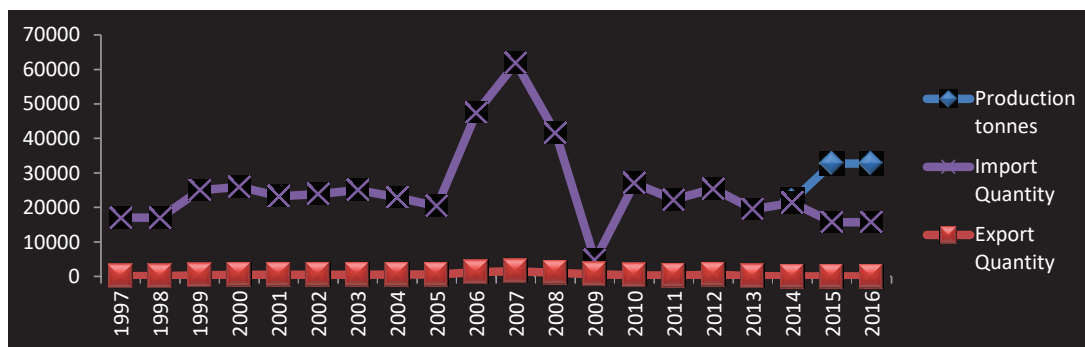
Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	47000	2000	400	48600	39234062	1,2	-0,057	0,430
1999	41000	3200	500	43700	39819279	1,1		
2000	43000	4200	1800	45400	40403958	1,1		
2001	39000	4000	1000	42000	40988909	1,0		
2002	44000	2000	3350	42650	41572491	1,0		
2003	42000	7284	8595	40689	42152151	1,0		
2004	48000	10246	6000	52246	42724163	1,2		
2005	56000	10246	1400	64846	43285634	1,5		
2006	47000	3400	0	50400	43835722	1,1		
2007	52000	3200	0	55200	44374572	1,2		
2008	47000	3700	0	50700	44901544	1,1		
2009	58000	3268	214	61054	45416181	1,3		
2010	13000	1788	96	14692	45918097	0,3		
2011	11032	2366	11	13387	46406646	0,3		
2012	12000	3066	2	15064	46881475	0,3		
2013	11749	3073	2	14820	47342981	0,3		
2014	16811	3228	234	19805	47791911	0,4		
2015	15000	3097	192	17905	48228697	0,4		
2016	13863	3097	192	16768	48653419	0,3		
						0,9		



Domain Forestry Production and Trade
Area Code 48
Area Costa Rica
Item Code 1671
Item Newsprint

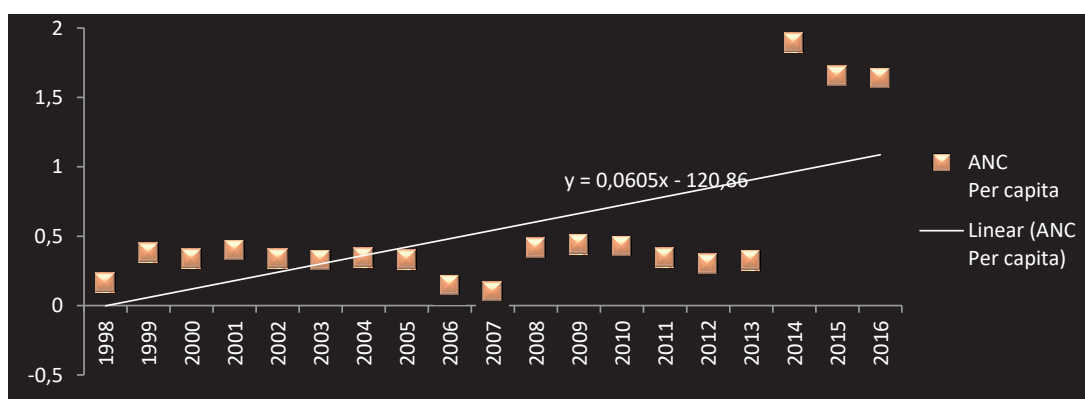
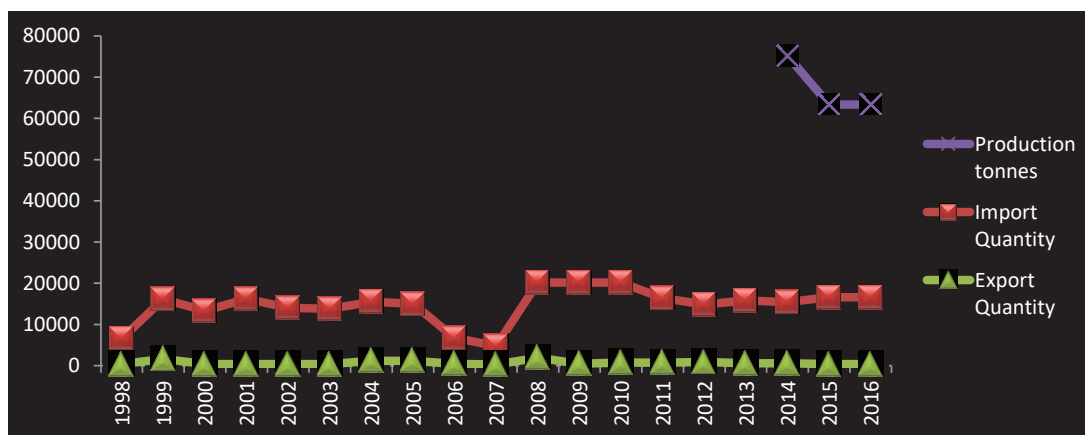
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997		17000	100	16900	3657000	4,6	0,137	2,960
1998		17000	100	16900	3747000	4,5		
1999		25000	300	24700	3838000	6,4		
2000		26000	500	25500	3810000	6,7		
2001		23230	500	22730	3953000	5,8		
2002		23872	500	23372	4022000	5,8		
2003		25030	500	24530	4086000	6,0		
2004		22951	571	22380	4152000	5,4		
2005		20356	571	19785	4215000	4,7		
2006		47523	1265	46258	4279000	10,8		
2007		61852	1505	60347	4340000	13,9		
2008		41700	1000	40700	4404000	9,2		
2009		4680	658	4022	4469000	0,9		
2010		26993	308	26685	4534000	5,9		
2011		22281	279	22002	4592000	4,8		
2012		25448	450	24998	4654122	5,4		
2013		19478	82	19396	4706401	4,1		
2014	22050	21337	48	43339	4757575	9,1		
2015	32731	15674	12	48393	4807852	10,1		
2016	32731	15674	12	48393	4857274	10,0		



Item Code 1616
 Item **Printing and writing papers, coated**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		6541	400	6141	3747000	0,2	0,060	0,537
1999		16178	1600	14578	3838000	0,4		
2000		13300	400	12900	3810000	0,3		
2001		16224	400	15824	3953000	0,4		
2002		14055	400	13655	4022000	0,3		
2003		13777	400	13377	4086000	0,3		
2004		15515	1170	14345	4152000	0,3		
2005		15054	1170	13884	4215000	0,3		
2006		6750	433	6317	4279000	0,1		
2007		4767	279	4488	4340000	0,1		
2008		20164	1934	18230	4404000	0,4		
2009		20164	442	19722	4469000	0,4		
2010		20164	769	19395	4534000	0,4		
2011		16406	680	15726	4592000	0,3		
2012		14821	880	13941	4654122	0,3		
2013		15848	605	15243	4706401	0,3		
2014	75193	15426	571	90048	4757575	1,9		
2015	63344	16605	404	79545	4807852	1,7		
2016	63344	16605	404	79545	4857274	1,6		

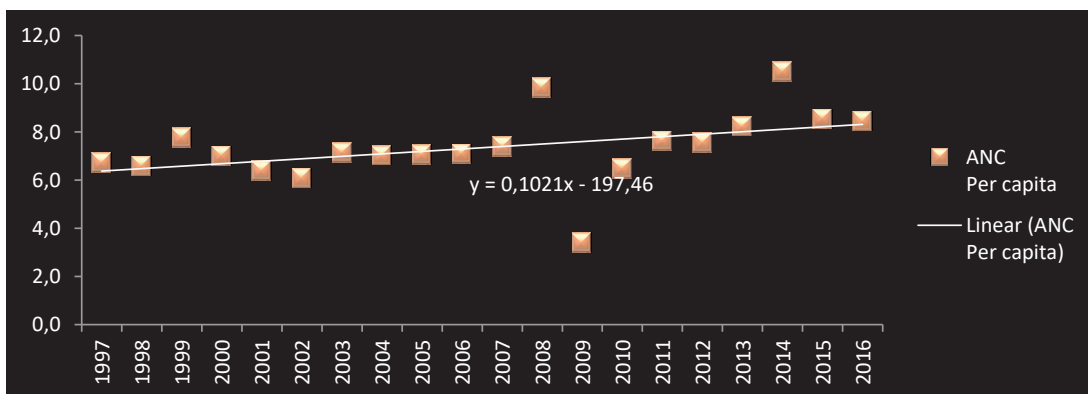
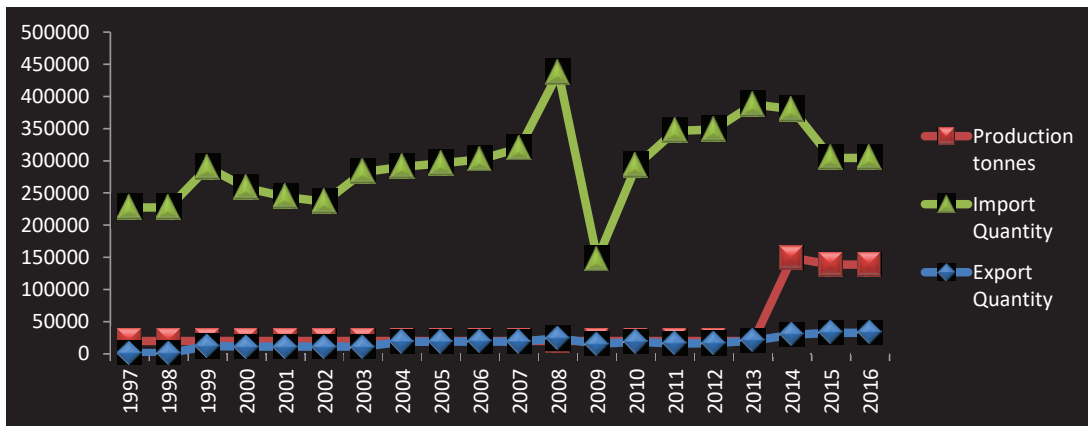
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Item Code 1675
 Item **Other paper and paperboard**

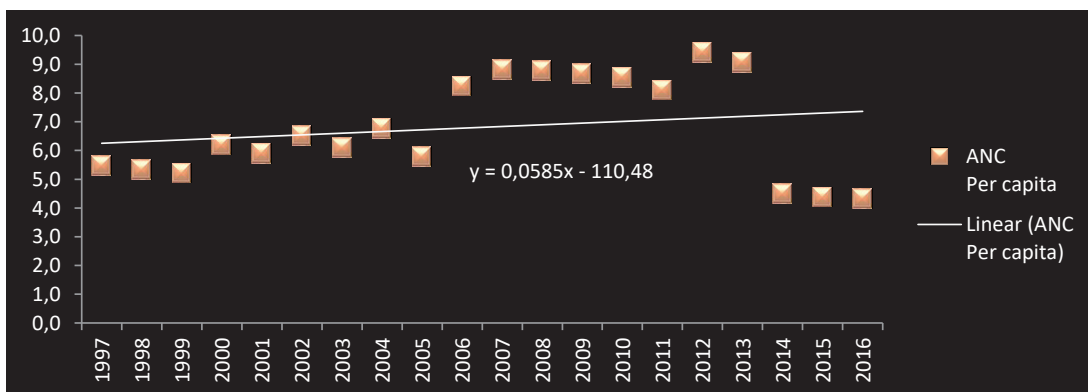
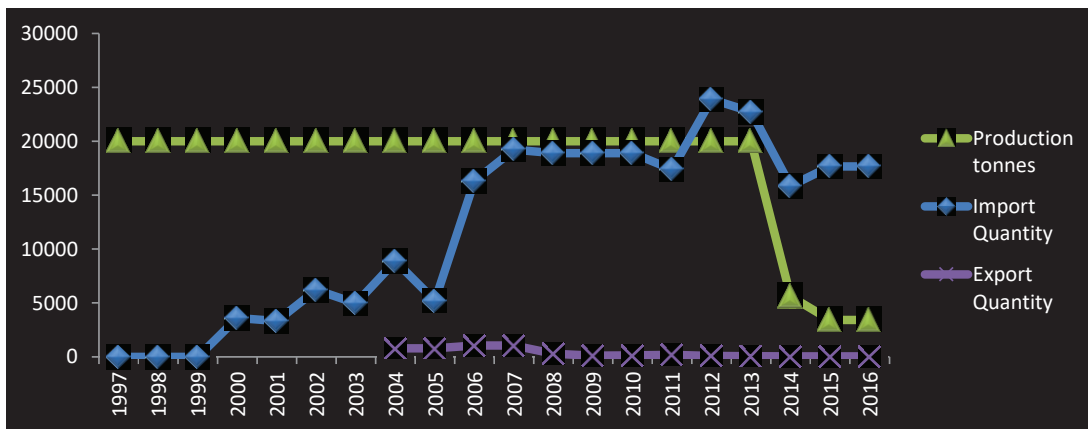
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	20000	227400	1300	246100	3657000	6,7	0,102	1,451
1998	20000	227400	1300	246100	3747000	6,6		
1999	20000	289900	12000	297900	3838000	7,8		
2000	20000	257800	11200	266600	3810000	7,0		
2001	20000	243706	11200	252506	3953000	6,4		
2002	20000	236237	11200	245037	4022000	6,1		
2003	20000	282745	11200	291545	4086000	7,1		
2004	20000	290752	18804	291948	4152000	7,0		
2005	20000	296182	18804	297378	4215000	7,1		
2006	20000	302175	19172	303003	4279000	7,1		
2007	20000	319516	18946	320570	4340000	7,4		
2008	20000	437151	24392	432759	4404000	9,8		
2009	20000	147770	15634	152136	4469000	3,4		
2010	20000	292324	18965	293359	4534000	6,5		
2011	20000	346371	15941	350430	4592000	7,6		
2012	20000	348741	16758	351983	4654122	7,6		
2013	20000	387628	20377	387251	4706401	8,2		
2014	149328	380128	29762	499694	4757575	10,5		
2015	138595	304405	32739	410261	4807852	8,5		
2016	138595	304405	32739	410261	4857274	8,4		

7,3



Item Code 1676
 Item Household and sanitary papers

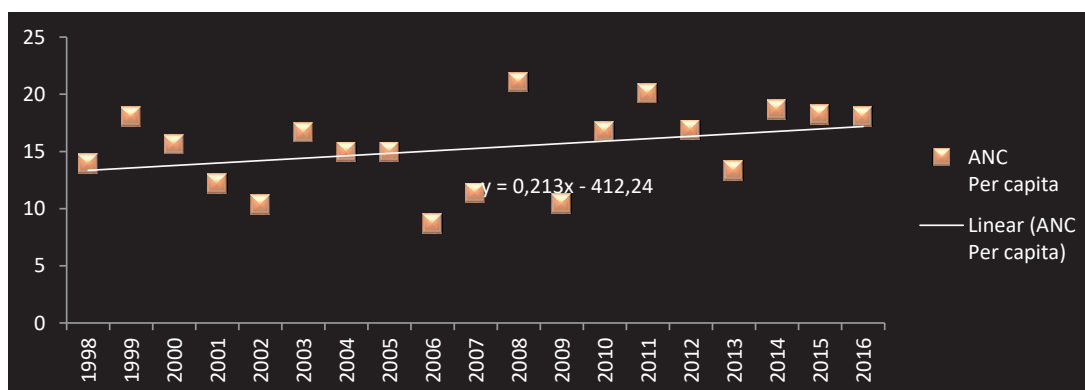
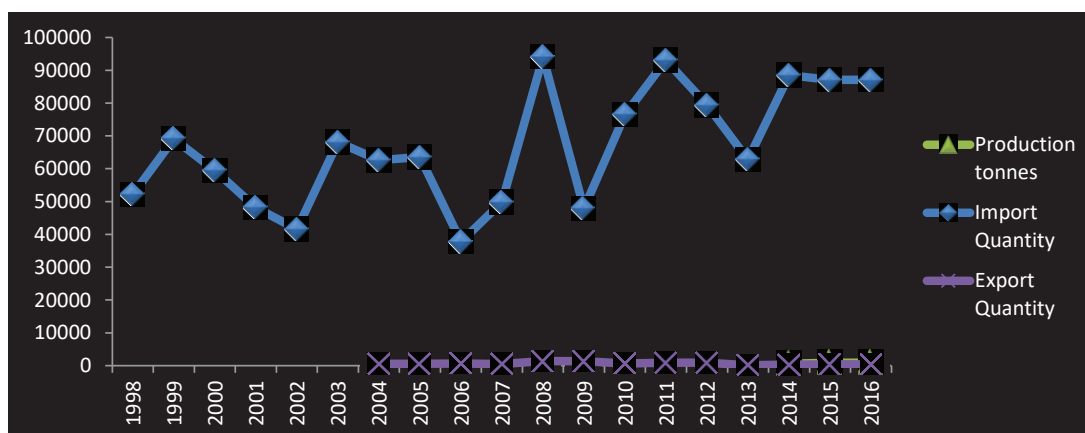
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	20000	0		20000	3657000	5,5	0,058	1,726
1998	20000	0		20000	3747000	5,3		
1999	20000	0		20000	3838000	5,2		
2000	20000	3600		23600	3810000	6,2		
2001	20000	3318		23318	3953000	5,9		
2002	20000	6211		26211	4022000	6,5		
2003	20000	4966		24966	4086000	6,1		
2004	20000	8878	793	28085	4152000	6,8		
2005	20000	5203	793	24410	4215000	5,8		
2006	20000	16305	1055	35250	4279000	8,2		
2007	20000	19234	1055	38179	4340000	8,8		
2008	20000	18900	288	38612	4404000	8,8		
2009	20000	18900	103	38797	4469000	8,7		
2010	20000	18900	151	38749	4534000	8,5		
2011	20000	17380	179	37201	4592000	8,1		
2012	20000	23891	79	43812	4654122	9,4		
2013	20000	22738	73	42665	4706401	9,1		
2014	5607	15851	47	21411	4757575	4,5		
2015	3424	17661	47	21038	4807852	4,4		
2016	3424	17661	47	21038	4857274	4,3		



Item Code 1618
 Item **Cartonboard**

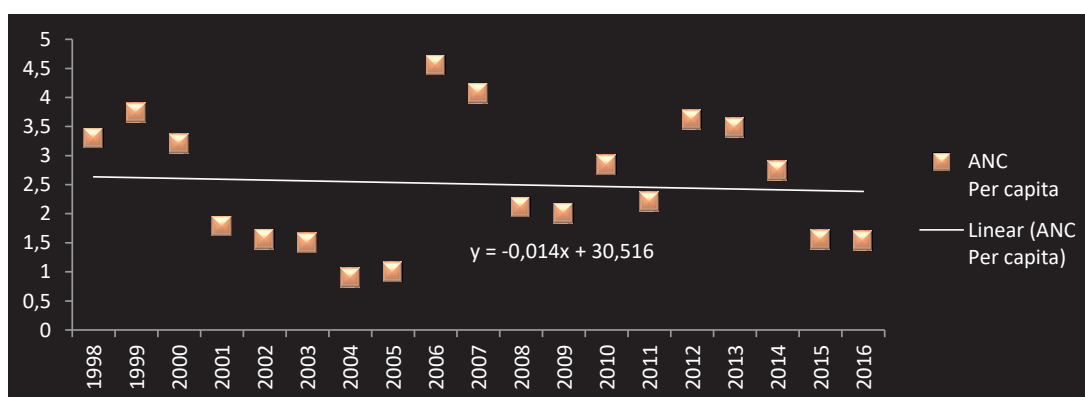
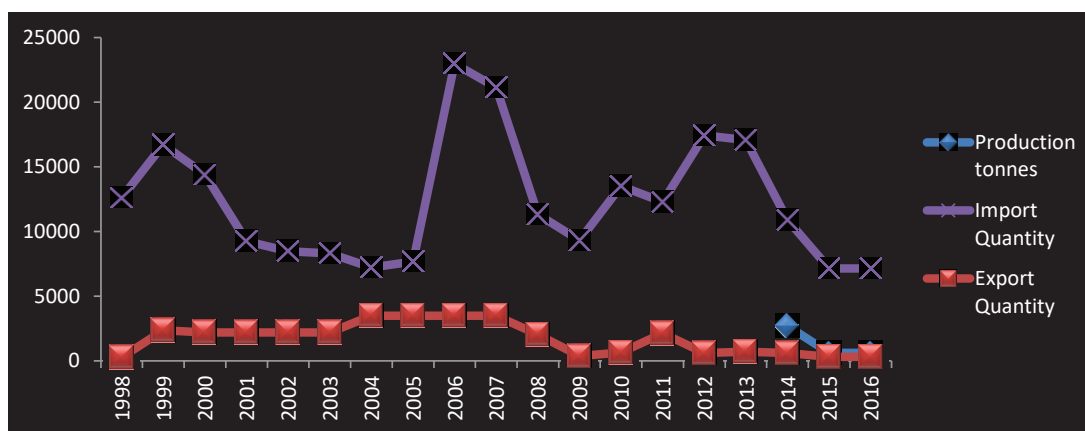
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		52184		52184	3747000	13,9	0,213	3,499
1999		69132		69132	3838000	18,0		
2000		59500		59500	3810000	15,6		
2001		48141		48141	3953000	12,2		
2002		41552		41552	4022000	10,3		
2003		68130		68130	4086000	16,7		
2004		62589	580	62009	4152000	14,9		
2005		63558	580	62978	4215000	14,9		
2006		37786	686	37100	4279000	8,7		
2007		49812	460	49352	4340000	11,4		
2008		94078	1363	92715	4404000	21,1		
2009		47953	1366	46587	4469000	10,4		
2010		76553	629	75924	4534000	16,7		
2011		93027	915	92112	4592000	20,1		
2012		79431	915	78516	4654122	16,9		
2013		62783	123	62660	4706401	13,3		
2014	572	88476	327	88721	4757575	18,6		
2015	900	87057	434	87523	4807852	18,2		
2016	900	87057	434	87523	4857274	18,0		

15,3



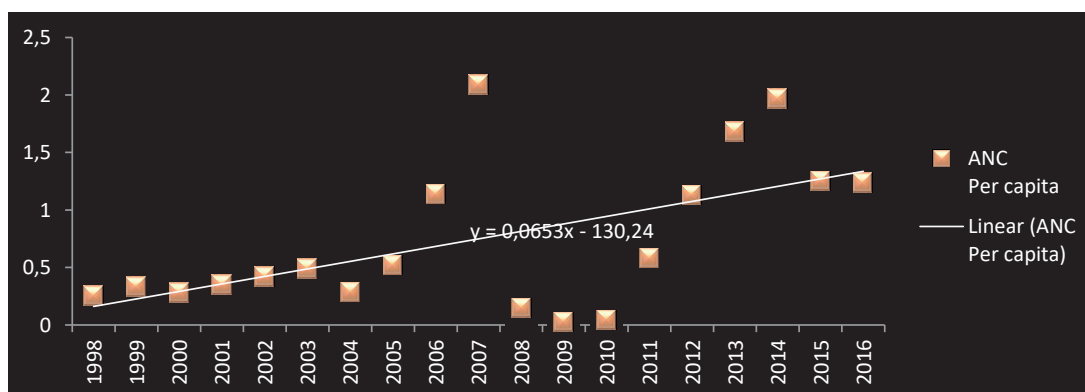
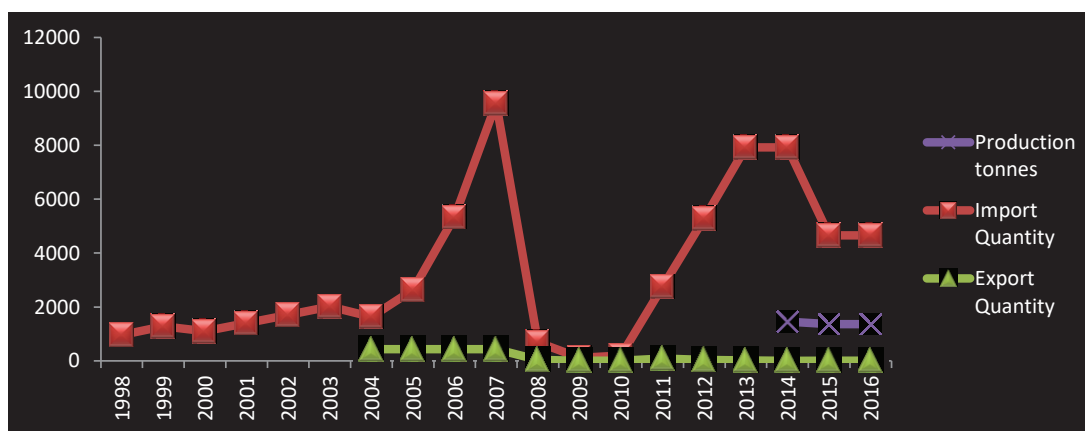
Item Code 1621
 Item Wrapping papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		12630	270	12360	3747000	3,3	-0,014	1,088
1999		16731	2366	14365	3838000	3,7		
2000		14400	2200	12200	3810000	3,2		
2001		9251	2200	7051	3953000	1,8		
2002		8476	2200	6276	4022000	1,6		
2003		8302	2200	6102	4086000	1,5		
2004		7220	3492	3728	4152000	0,9		
2005		7683	3492	4191	4215000	1,0		
2006		22979	3492	19487	4279000	4,6		
2007		21146	3492	17654	4340000	4,1		
2008		11322	2032	9290	4404000	2,1		
2009		9315	370	8945	4469000	2,0		
2010		13511	649	12862	4534000	2,8		
2011		12279	2138	10141	4592000	2,2		
2012		17444	603	16841	4654122	3,6		
2013		17086	709	16377	4706401	3,5		
2014	2701	10906	597	13010	4757575	2,7		
2015	621	7146	307	7460	4807852	1,6		
2016	621	7146	307	7460	4857274	1,5		



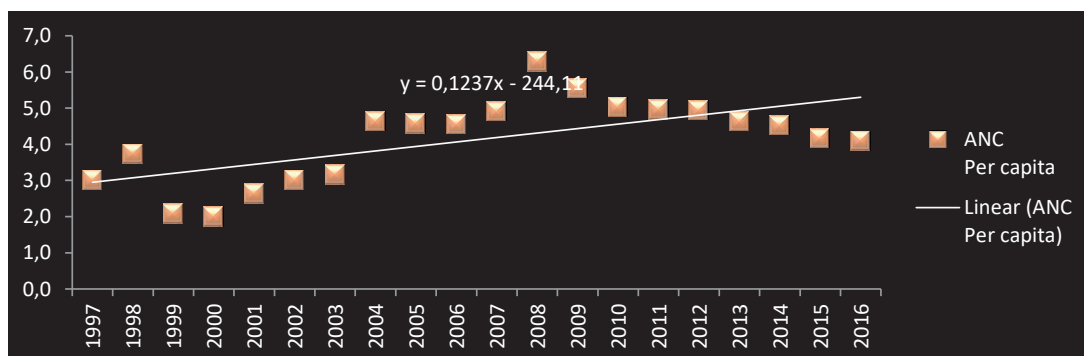
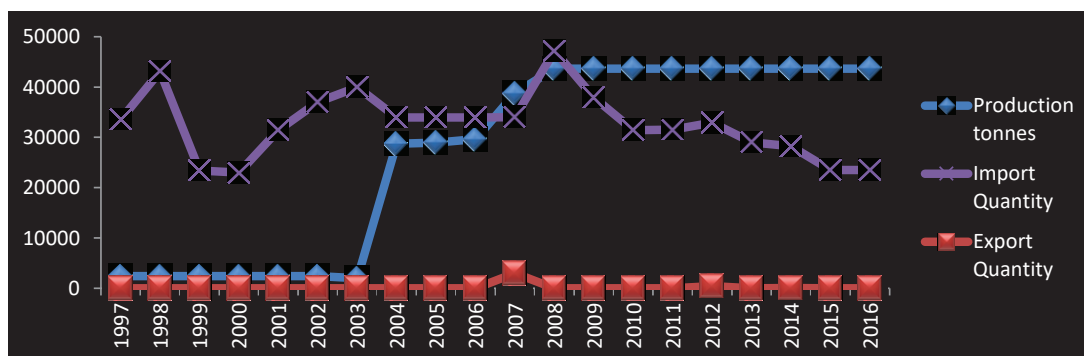
Item Code 1622
 Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		965		965	3767373	0,3	0,065	0,650
1999		1278		1278	3848723	0,3		
2000		1100		1100	3925443	0,3		
2001		1400		1400	3996798	0,4		
2002		1700		1700	4063204	0,4		
2003		2017		2017	4125971	0,5		
2004		1636	434	1202	4187038	0,3		
2005		2639	434	2205	4247841	0,5		
2006		5343	434	4909	4308794	1,1		
2007		9562	434	9128	4369469	2,1		
2008		690	36	654	4429508	0,1		
2009		114	4	110	4488263	0,0		
2010		194	4	190	4545280	0,0		
2011		2756	82	2674	4600474	0,6		
2012		5288	35	5253	4654122	1,1		
2013		7920	13	7907	4706401	1,7		
2014	1457	7920	2	9375	4757575	2,0		
2015	1363	4657	7	6013	4807852	1,3		
2016	1363	4657	7	6013	4857274	1,2		



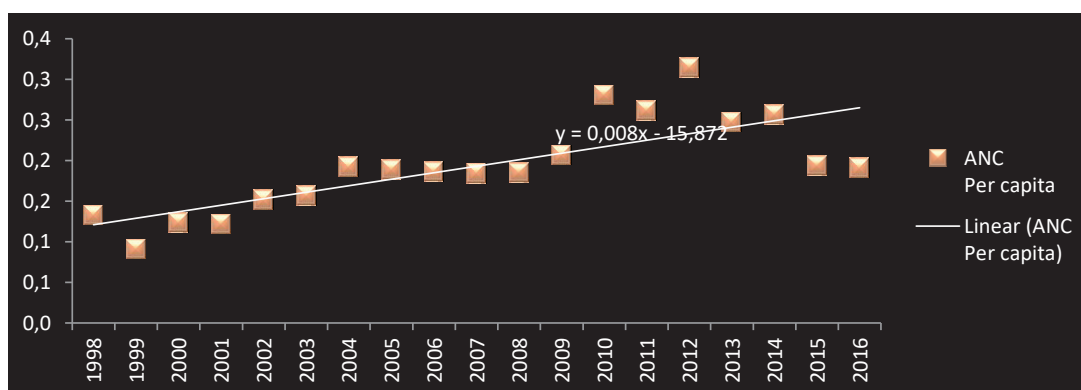
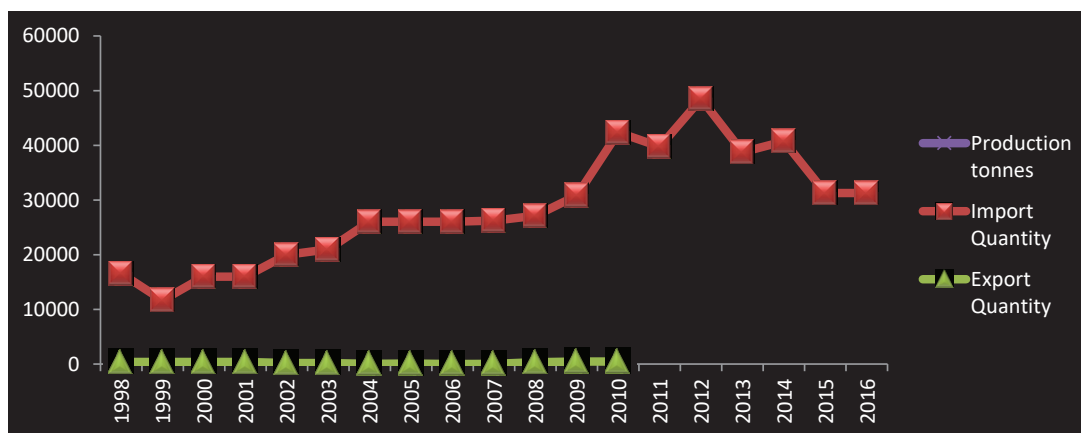
Domain Forestry Production and Trade
Area Code 58
Area Ecuador
Item Code 1671
Item Newsprint

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	2400	33500	0	35900	11924993	3,0	0,124	1,147
1998	2400	43100	0	45500	12163885	3,7		
1999	2400	23400	0	25800	12398691	2,1		
2000	2400	23000	0	25400	12628596	2,0		
2001	2400	31400	0	33800	12852755	2,6		
2002	2400	37000	0	39400	13072060	3,0		
2003	2000	40000	0	42000	13289601	3,2		
2004	28716	33965	22	62659	13509647	4,6		
2005	28942	33965	22	62885	13735233	4,6		
2006	29636	33965	22	63579	13967480	4,6		
2007	38749	34000	3000	69749	14205453	4,9		
2008	43654	47200	4	90850	14447562	6,3		
2009	43654	37931	27	81558	14691275	5,6		
2010	43654	31436	0	75090	14934690	5,0		
2011	43654	31557	4	75207	15177355	5,0		
2012	43654	32951	449	76156	15419666	4,9		
2013	43654	29000	20	72634	15661547	4,6		
2014	43654	28267	40	71881	15903112	4,5		
2015	43654	23524	16	67162	16144368	4,2		
2016	43654	23524	16	67162	16385068	4,1		



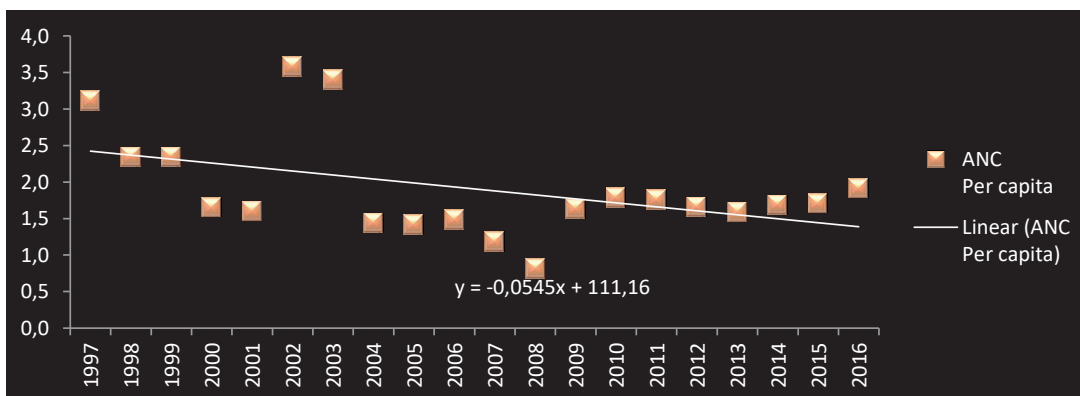
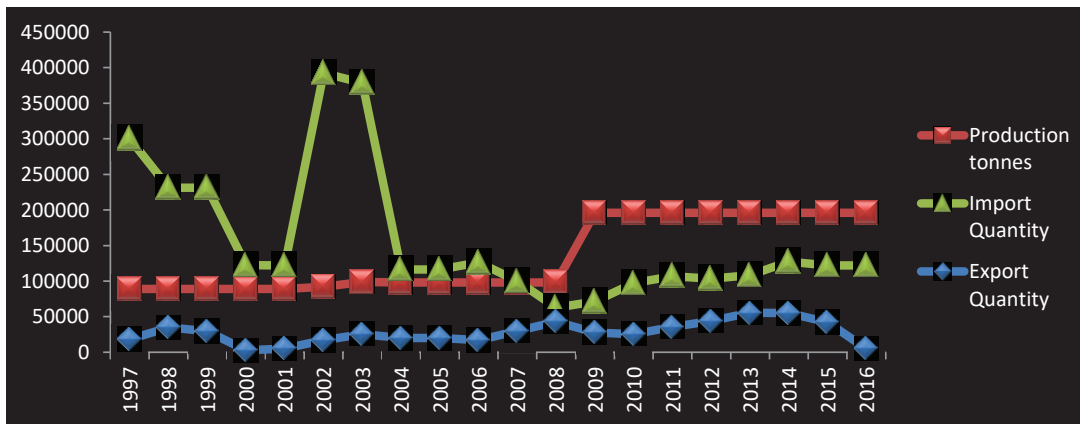
Item Code 1616
 Item Printing and writing papers, coated

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		16552	382	16170	12163885	0,1	0,008	0,058
1999		11651	382	11269	12398691	0,1		
2000		16000	382	15618	12628596	0,1		
2001		16000	382	15618	12852755	0,1		
2002		20000	173	19827	13072060	0,2		
2003		21000	174	20826	13289601	0,2		
2004		26045	47	25998	13509647	0,2		
2005		26045	62	25983	13735233	0,2		
2006		26045	1	26044	13967480	0,2		
2007		26200	17	26183	14205453	0,2		
2008		27100	350	26750	14447562	0,2		
2009		30851	460	30391	14691275	0,2		
2010		42383	460	41923	14934690	0,3		
2011		39725		39725	15177355	0,3		
2012		48504		48504	15419666	0,3		
2013		38742		38742	15661547	0,2		
2014		40748		40748	15903112	0,3		
2015		31293		31293	16144368	0,2		
2016		31293		31293	16385068	0,2		



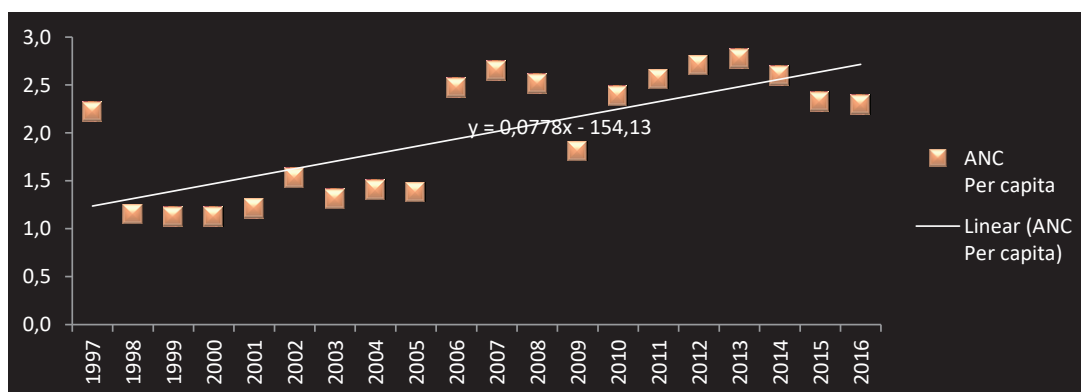
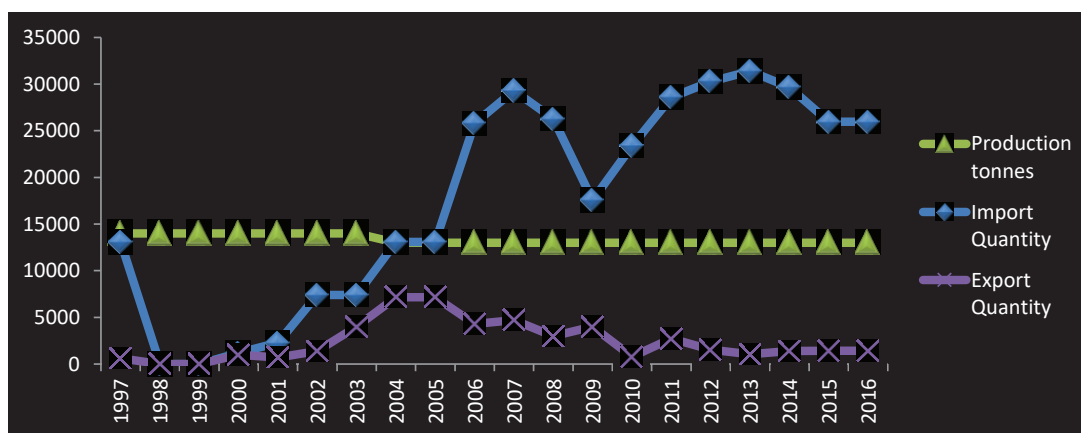
Item Code 1675
 Item **Other paper and paperboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	89000	300200	18100	371100	11924993	3,1	-0,054	0,716
1998	89000	231101	35001	285100	12163885	2,3		
1999	89000	231101	29600	290501	12398691	2,3		
2000	89000	122600	2700	208900	12628596	1,7		
2001	89000	122200	5200	206000	12852755	1,6		
2002	92000	392400	16950	467450	13072060	3,6		
2003	99000	378400	25550	451850	13289601	3,4		
2004	98000	116285	19965	194320	13509647	1,4		
2005	98000	116285	19965	194320	13735233	1,4		
2006	98000	126149	17108	207041	13967480	1,5		
2007	98000	99979	29911	168068	14205453	1,2		
2008	98000	62645	43087	117558	14447562	0,8		
2009	196000	71325	27806	239519	14691275	1,6		
2010	196000	97249	25537	267712	14934690	1,8		
2011	196000	106850	35597	267253	15177355	1,8		
2012	196000	103435	43863	255572	15419666	1,7		
2013	196000	108235	55611	248624	15661547	1,6		
2014	196000	127418	54946	268472	15903112	1,7		
2015	196000	122066	42239	275827	16144368	1,7		
2016	196000	122066	4800	313266	16385068	1,9		



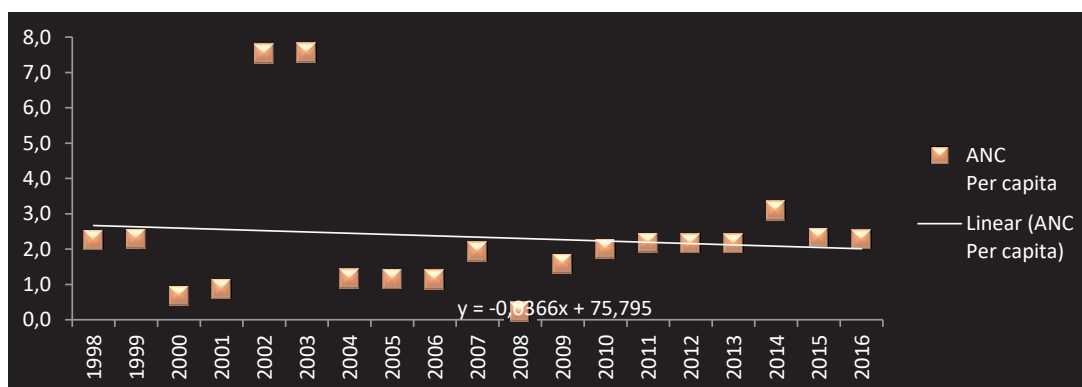
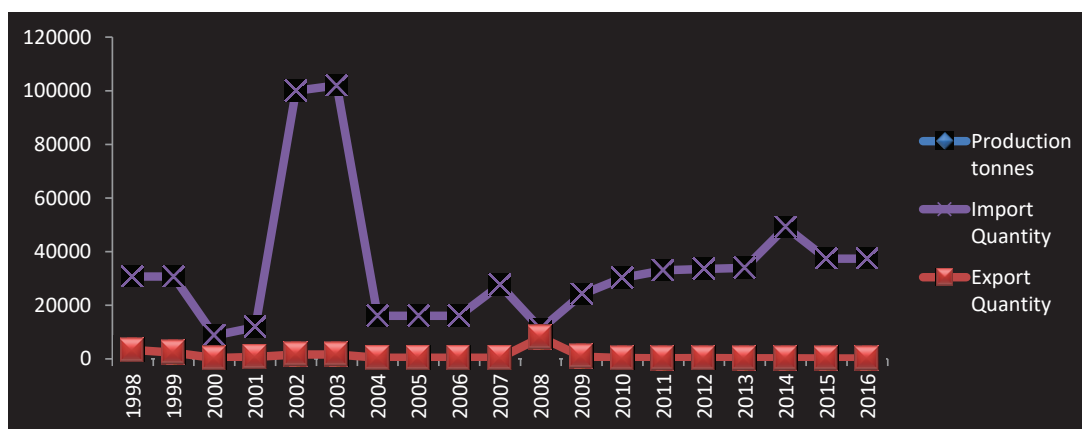
Item Code 1676
 Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	14000	13100	600	26500	11924993	2,2	0,078	0,623
1998	14000	0	0	14000	12163885	1,2		
1999	14000	0	0	14000	12398691	1,1		
2000	14000	1200	1000	14200	12628596	1,1		
2001	14000	2300	700	15600	12852755	1,2		
2002	14000	7400	1400	20000	13072060	1,5		
2003	14000	7400	4000	17400	13289601	1,3		
2004	13000	13100	7157	18943	13509647	1,4		
2005	13000	13100	7157	18943	13735233	1,4		
2006	13000	25800	4300	34500	13967480	2,5		
2007	13000	29300	4700	37600	14205453	2,6		
2008	13000	26300	3000	36300	14447562	2,5		
2009	13000	17567	4000	26567	14691275	1,8		
2010	13000	23394	799	35595	14934690	2,4		
2011	13000	28575	2734	38841	15177355	2,6		
2012	13000	30265	1549	41716	15419666	2,7		
2013	13000	31393	1039	43354	15661547	2,8		
2014	13000	29652	1386	41266	15903112	2,6		
2015	13000	25983	1419	37564	16144368	2,3		
2016	13000	25983	1419	37564	16385068	2,3		
						2,0		



Item Code 1618
 Item **Cartonboard**

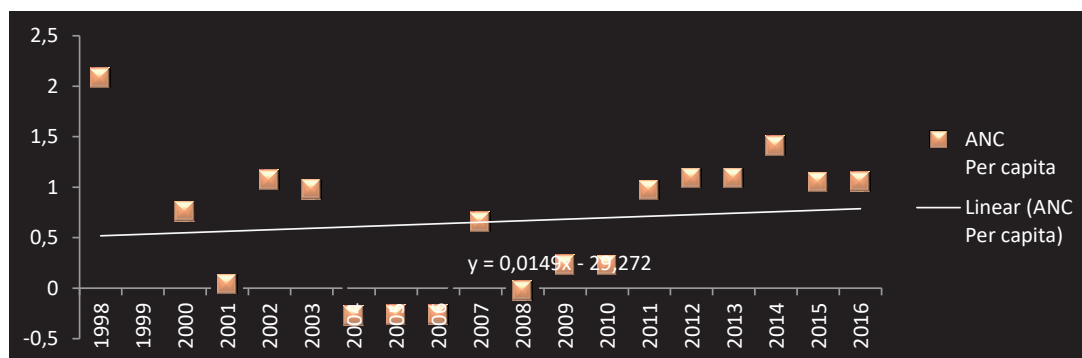
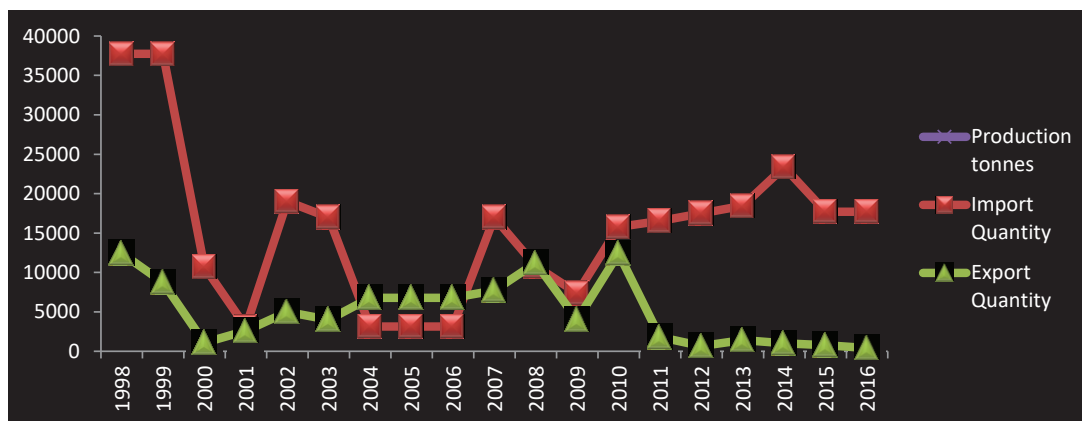
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		30688	3394	27294	12163885	2,2	-0,037	1,964
1999		30688	2381	28307	12398691	2,3		
2000		8700	300	8400	12628596	0,7		
2001		11800	700	11100	12852755	0,9		
2002		100000	1600	98400	13072060	7,5		
2003		102000	1600	100400	13289601	7,6		
2004		16100	374	15726	13509647	1,2		
2005		16100	374	15726	13735233	1,1		
2006		16100	374	15726	13967480	1,1		
2007		27600	374	27226	14205453	1,9		
2008		11100	8000	3100	14447562	0,2		
2009		24015	779	23236	14691275	1,6		
2010		30223	326	29897	14934690	2,0		
2011		33045	190	32855	15177355	2,2		
2012		33565	309	33256	15419666	2,2		
2013		33983	211	33772	15661547	2,2		
2014		49220	210	49010	15903112	3,1		
2015		37349	153	37196	16144368	2,3		
2016		37349	153	37196	16385068	2,3		



Item Code 1621
 Item Wrapping papers

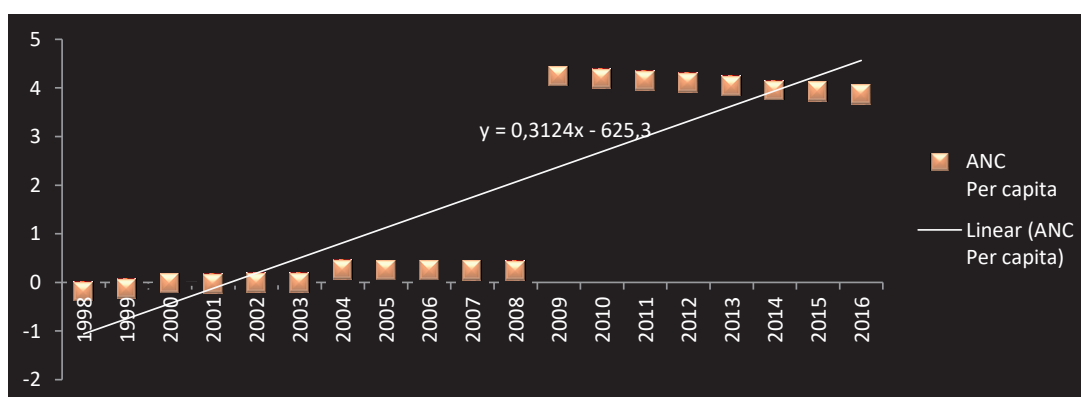
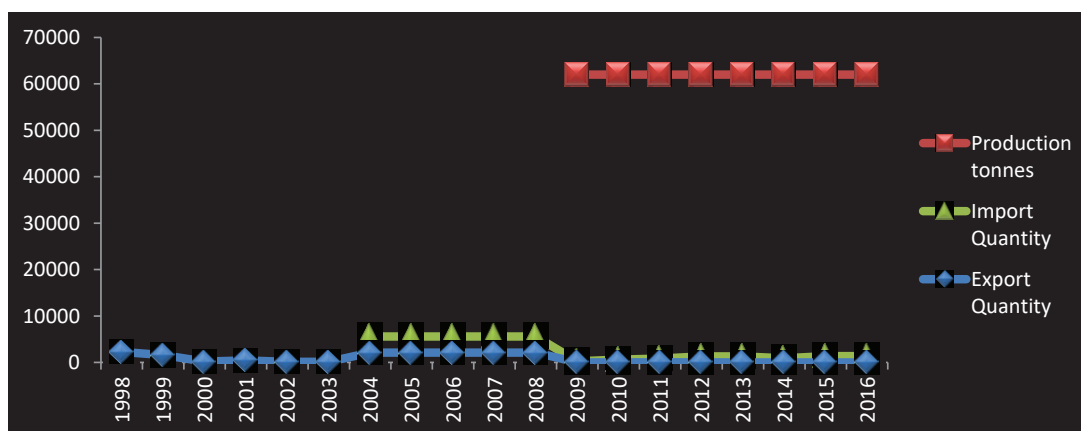
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		37743	12444	25299	12163885	2,1	-0,010	0,749
1999		37743	8731	29012	12398691	2,3		
2000		10700	1100	9600	12628596	0,8		
2001		3100	2600	500	12852755	0,0		
2002		19000	5000	14000	13072060	1,1		
2003		17000	4000	13000	13289601	1,0		
2004		3148	6793	-3645	13509647	-0,3		
2005		3148	6793	-3645	13735233	-0,3		
2006		3148	6793	-3645	13967480	-0,3		
2007		17000	7700	9300	14205453	0,7		
2008		10800	11200	-400	14447562	0,0		
2009		7371	4000	3371	14691275	0,2		
2010		15794	12407	3387	14934690	0,2		
2011		16525	1793	14732	15177355	1,0		
2012		17484	668	16816	15419666	1,1		
2013		18462	1414	17048	15661547	1,1		
2014		23388	1020	22368	15903112	1,4		
2015		17702	771	16931	16144368	1,0		
2016		17702	414	17288	16385068	1,1		

0,7



Item Code 1622
 Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998			2263	-2263	12163885	-0,2	0,312	2,025
1999			1588	-1588	12398691	-0,1		
2000			200	-200	12628596	0,0		
2001			400	-400	12852755	0,0		
2002			150	-150	13072060	0,0		
2003			150	-150	13289601	0,0		
2004		5588	2137	3451	13509647	0,3		
2005		5588	2137	3451	13735233	0,3		
2006		5588	2137	3451	13967480	0,2		
2007		5588	2137	3451	14205453	0,2		
2008		5588	2137	3451	14447562	0,2		
2009	62000	248	0	62248	14691275	4,2		
2010	62000	592	7	62585	14934690	4,2		
2011	62000	852	23	62829	15177355	4,1		
2012	62000	1283	23	63260	15419666	4,1		
2013	62000	1321	0	63321	15661547	4,0		
2014	62000	882	0	62882	15903112	4,0		
2015	62000	1370	0	63370	16144368	3,9		
2016	62000	1370	0	63370	16385068	3,9		



Domain Forestry Production and Trade

Area Code 138

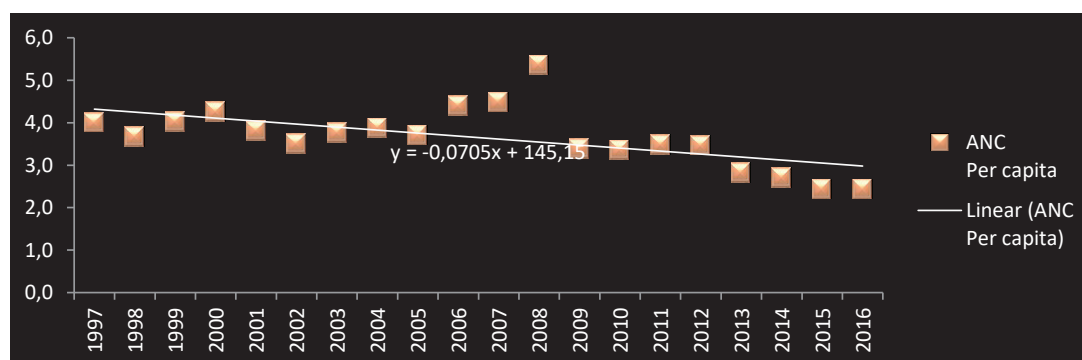
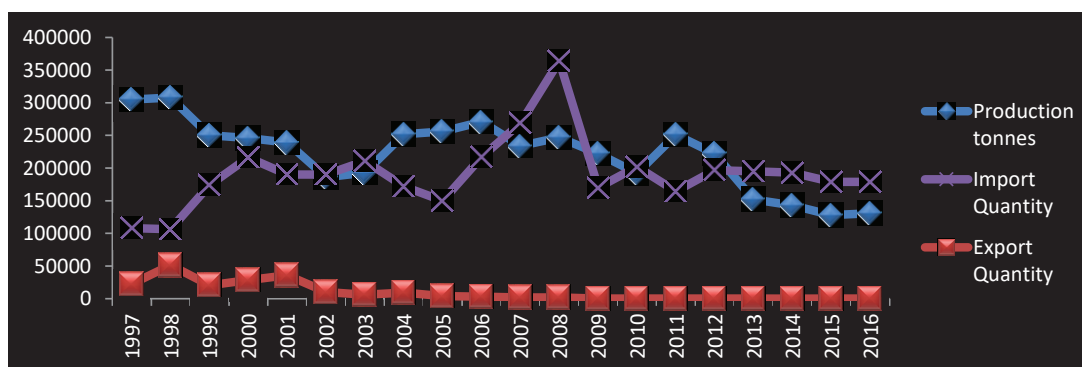
Area Mexico

Item Code 1671

Item Newsprint

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	305000	108000	22600	390400	97281739	4,0	-0,071	0,714
1998	308000	106400	51400	363000	98821456	3,7		
1999	250000	173800	20500	403300	100300579	4,0		
2000	246000	216200	28300	433900	101719673	4,3		
2001	239000	190000	36000	393000	103067068	3,8		
2002	186000	190000	10000	366000	104355608	3,5		
2003	193000	211000	6000	398000	105640453	3,8		
2004	252000	172000	9526	414474	106995583	3,9		
2005	256000	150000	4000	402000	108472228	3,7		
2006	271000	217000	3000	485000	110092378	4,4		
2007	234000	269000	2000	501000	111836346	4,5		
2008	247000	364000	2000	609000	113661809	5,4		
2009	222000	170027	226	391801	115505228	3,4		
2010	192000	202116	286	393830	117318941	3,4		
2011	251000	164581	227	415354	119090017	3,5		
2012	222000	196585	113	418472	120828307	3,5		
2013	152000	195221	135	347086	122535969	2,8		
2014	143000	192979	54	335925	124221600	2,7		
2015	128000	179079	357	306722	125890949	2,4		
2016	131000	179079	357	309722	127540423	2,4		

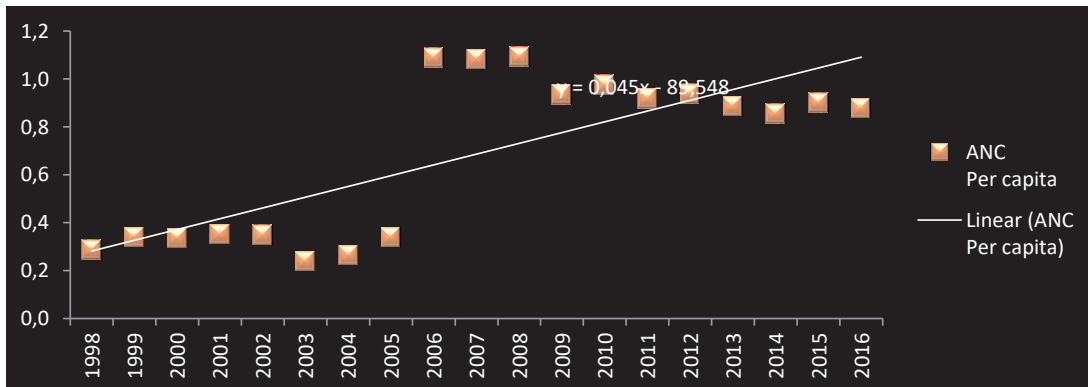
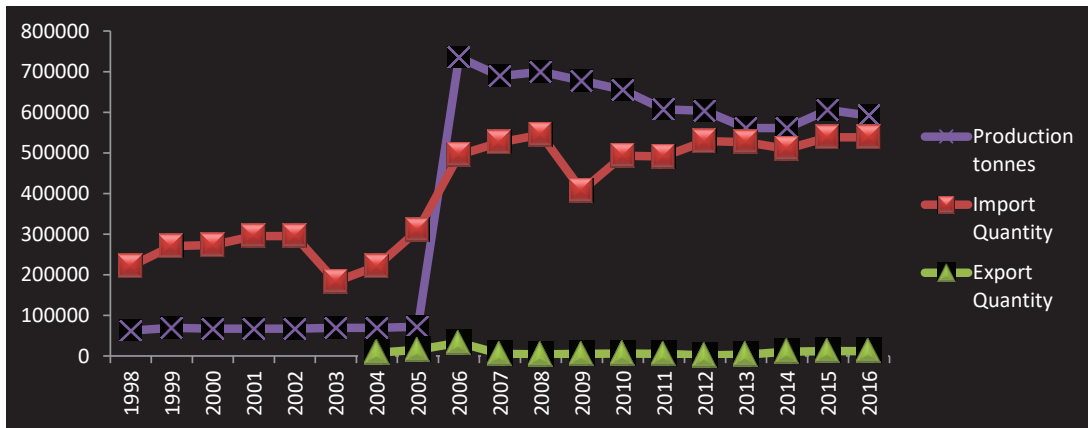
3,6



Item Code 1616
 Item **Printing and writing papers, coated**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	62500	221250		283750	98821456	0,3	0,045	0,335
1999	69200	270591		339791	100300579	0,3		
2000	67000	273000		340000	101719673	0,3		
2001	67000	295000		362000	103067068	0,4		
2002	67000	295000		362000	104355608	0,3		
2003	69000	183000		252000	105640453	0,2		
2004	69000	221000	8100	281900	106995583	0,3		
2005	72100	310000	15000	367100	108472228	0,3		
2006	735000	495000	32837	1197163	110092378	1,1		
2007	689000	526000	5000	1210000	111836346	1,1		
2008	700000	545000	4000	1241000	113661809	1,1		
2009	678000	407310	5226	1080084	115505228	0,9		
2010	655000	492974	5617	1142357	117318941	1,0		
2011	607000	491151	5006	1093145	119090017	0,9		
2012	604000	528960	1324	1131636	120828307	0,9		
2013	561000	526540	3155	1084385	122535969	0,9		
2014	561000	509744	10301	1060443	124221600	0,9		
2015	606000	538686	12246	1132440	125890949	0,9		
2016	592000	538686	12246	1118440	127540423	0,9		

0,7

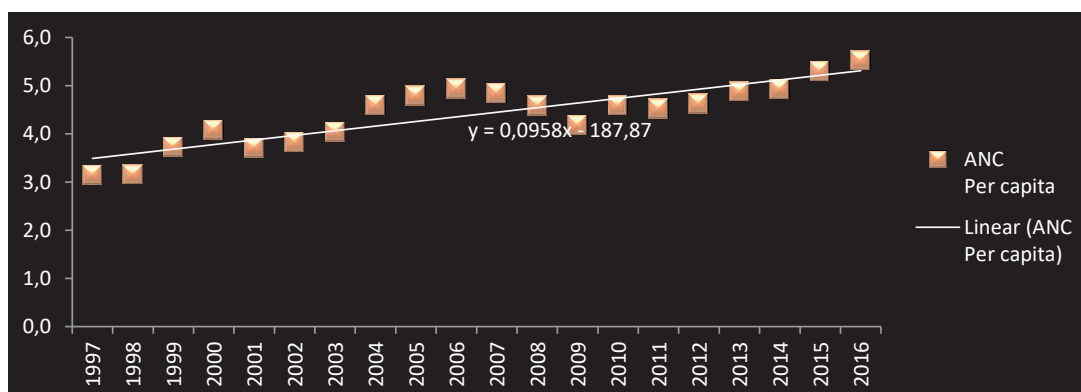
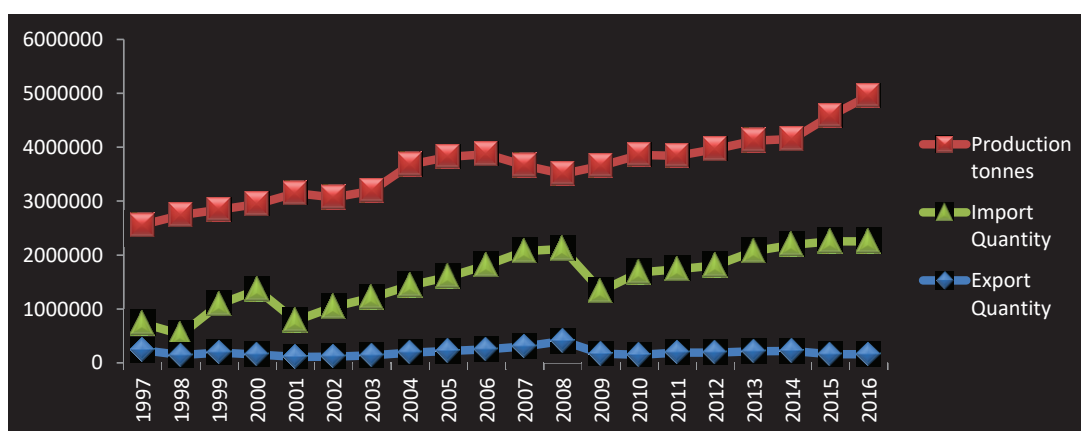


Item Code 1675

Item **Other paper and paperboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	2563000	731100	234900	3059200	97281739	3,1	0,096	0,652
1998	2740000	527999	144800	3123199	98821456	3,2		
1999	2841999	1087000	189800	3739199	100300579	3,7		
2000	2949000	1356438	154800	4150638	101719673	4,1		
2001	3147000	783000	110000	3820000	103067068	3,7		
2002	3069000	1037800	115600	3991200	104355608	3,8		
2003	3195000	1211000	140600	4265400	105640453	4,0		
2004	3678000	1435000	188600	4924400	106995583	4,6		
2005	3823000	1597000	222000	5198000	108472228	4,8		
2006	3870000	1810336	250415	5429921	110092378	4,9		
2007	3659000	2072293	308000	5423293	111836346	4,8		
2008	3504000	2111711	406000	5209711	113661809	4,6		
2009	3656000	1336960	168931	4824029	115505228	4,2		
2010	3857000	1677978	147391	5387587	117318941	4,6		
2011	3843000	1735044	191952	5386092	119090017	4,5		
2012	3969000	1805636	190732	5583904	120828307	4,6		
2013	4122000	2073736	215054	5980682	122535969	4,9		
2014	4151000	2189703	220195	6120508	124221600	4,9		
2015	4582000	2254238	159560	6676678	125890949	5,3		
2016	4952000	2254238	159560	7046678	127540423	5,5		

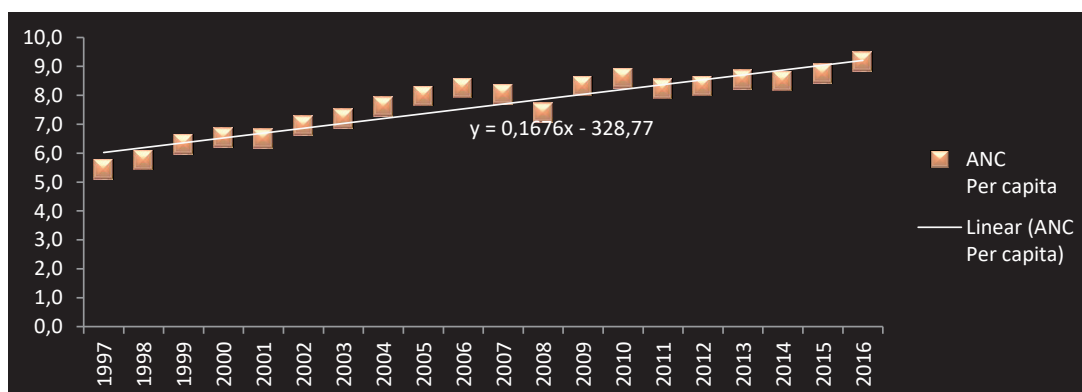
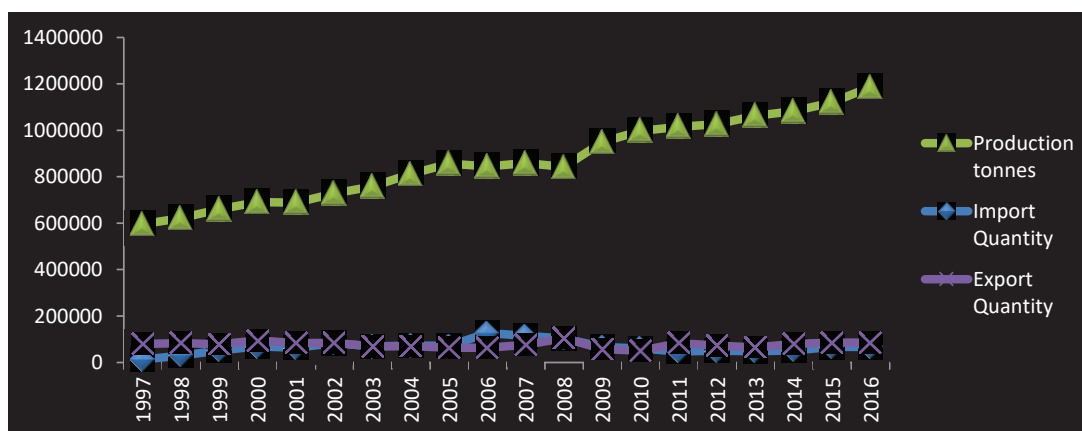
4,4



Item Code 1676
 Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	596000	13200	79500	529700	97281739	5,4	0,168	1,057
1998	622000	30000	83400	568600	98821456	5,8		
1999	660000	51700	79000	632700	100300579	6,3		
2000	691000	70000	95600	665400	101719673	6,5		
2001	689000	64000	84000	669000	103067068	6,5		
2002	728000	83000	85000	726000	104355608	7,0		
2003	758000	70000	69000	759000	105640453	7,2		
2004	812000	73000	71000	814000	106995583	7,6		
2005	857000	72000	64000	865000	108472228	8,0		
2006	845000	127000	64000	908000	110092378	8,2		
2007	859000	115000	76000	898000	111836346	8,0		
2008	843000	103000	105000	841000	113661809	7,4		
2009	950000	66606	57250	959356	115505228	8,3		
2010	997000	60521	50590	1006931	117318941	8,6		
2011	1015000	47630	83760	978870	119090017	8,2		
2012	1027000	50608	73497	1004111	120828307	8,3		
2013	1063000	48928	64688	1047240	122535969	8,5		
2014	1083000	51396	80084	1054312	124221600	8,5		
2015	1120000	67663	86292	1101371	125890949	8,7		
2016	1187000	67663	86292	1168371	127540423	9,2		

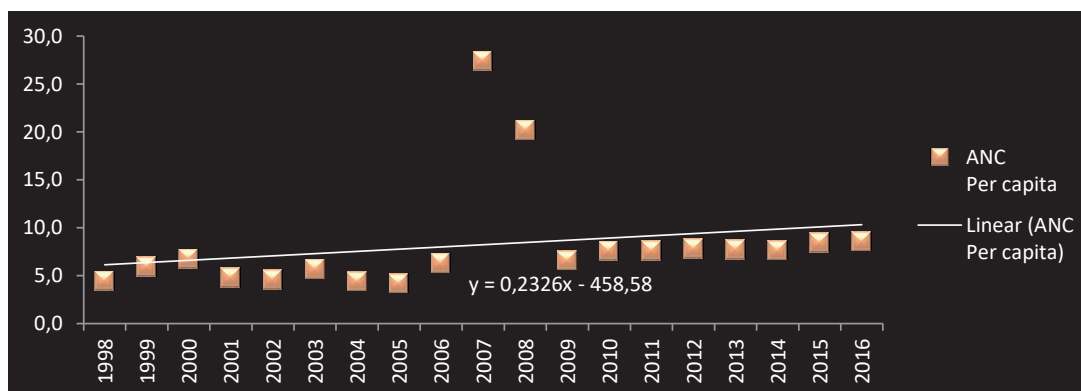
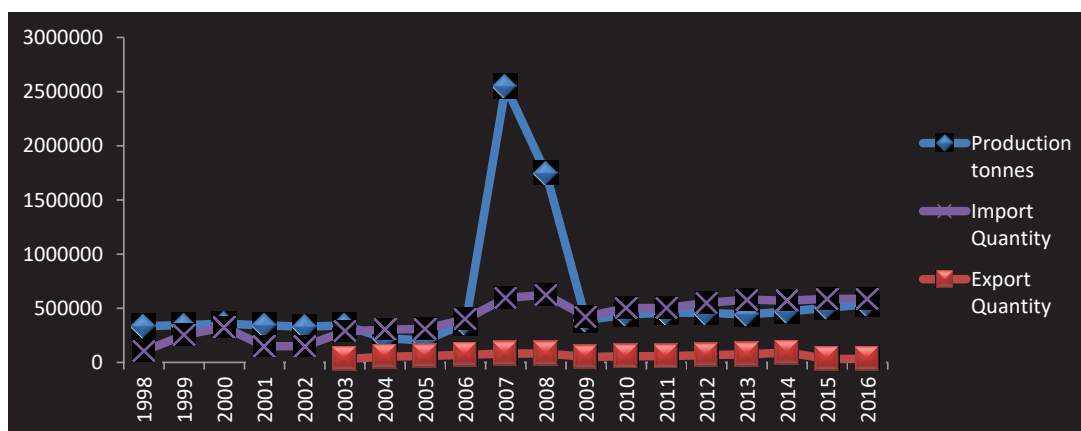
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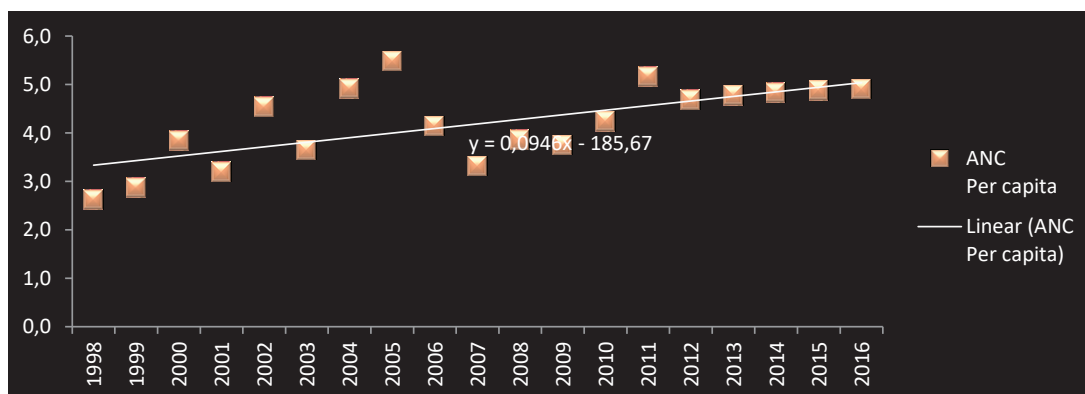
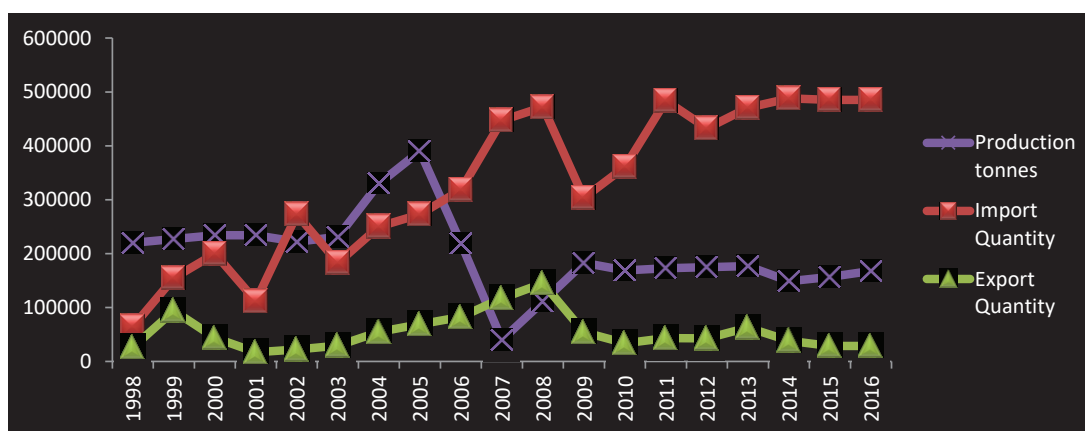
Item Code 1618
Item **Cartonboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	334589	104882		439471	98821456	4,4	0,233	5,781
1999	345294	251428		596722	100300579	5,9		
2000	356000	324500		680500	101719673	6,7		
2001	343000	150000		493000	103067068	4,8		
2002	329000	150000		479000	104355608	4,6		
2003	343000	287000	31000	599000	105640453	5,7		
2004	222000	301000	51000	472000	106995583	4,4		
2005	203000	310000	60000	453000	108472228	4,2		
2006	362000	398580	68872	691708	110092378	6,3		
2007	2548000	595000	81000	3062000	111836346	27,4		
2008	1748000	625000	83000	2290000	113661809	20,1		
2009	390000	421249	50362	760887	115505228	6,6		
2010	441000	501249	56261	885988	117318941	7,6		
2011	460000	501182	57847	903335	119090017	7,6		
2012	456000	549117	66935	938182	120828307	7,8		
2013	441000	578900	75096	944804	122535969	7,7		
2014	469000	570550	91395	948155	124221600	7,6		
2015	505000	587594	32790	1059804	125890949	8,4		
2016	537000	587594	32790	1091804	127540423	8,6		

8,2



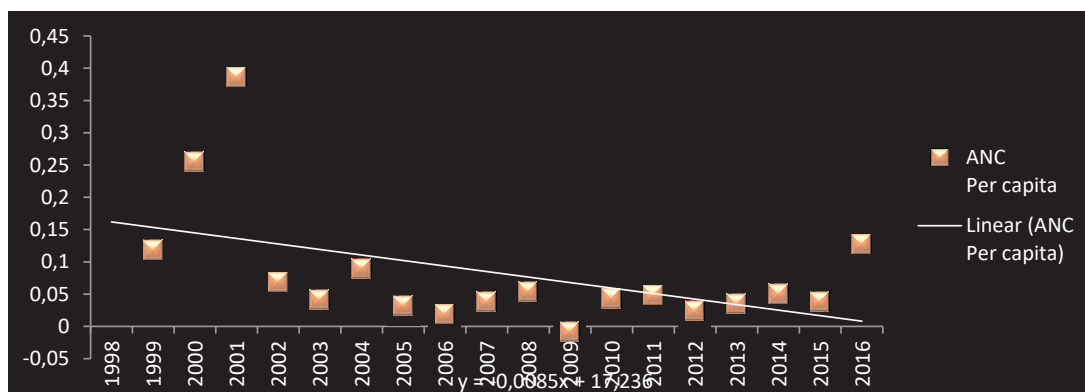
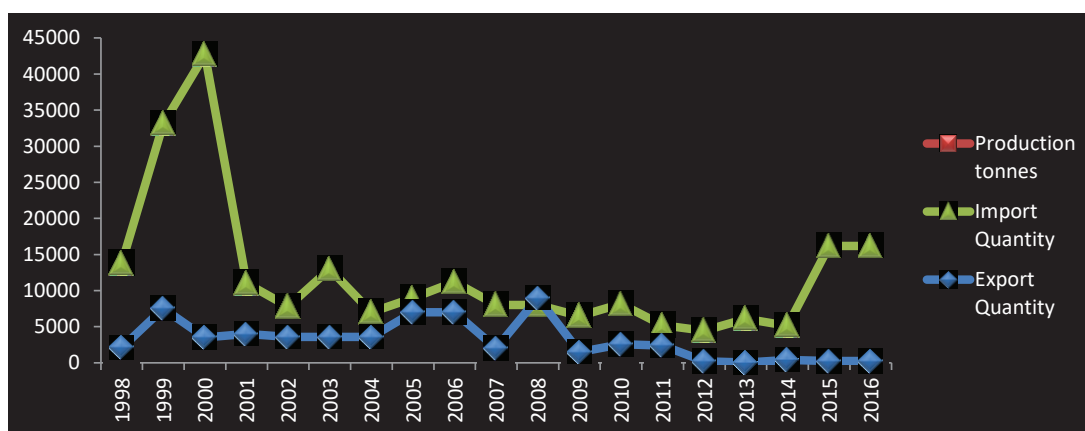
Item Code	1621							
Item	Wrapping papers							
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	219926	64642	26294	258274	98821456	2,6	0,095	0,813
1999	226963	154963	94159	287767	100300579	2,9		
2000	234000	200000	43700	390300	101719673	3,8		
2001	234000	112000	17000	329000	103067068	3,2		
2002	222000	273000	22000	473000	104355608	4,5		
2003	231000	183000	29000	385000	105640453	3,6		
2004	330000	250000	55000	525000	106995583	4,9		
2005	390000	273000	69000	594000	108472228	5,5		
2006	219000	318574	82435	455139	110092378	4,1		
2007	40000	447000	117000	370000	111836346	3,3		
2008	111000	472000	145000	438000	113661809	3,9		
2009	183000	303541	54433	432108	115505228	3,7		
2010	169000	361141	33757	496384	117318941	4,2		
2011	173000	483687	43313	613374	119090017	5,2		
2012	175000	432735	42975	564760	120828307	4,7		
2013	177000	470528	62830	584698	122535969	4,8		
2014	149000	488050	38220	598830	124221600	4,8		
2015	157000	485217	28550	613667	125890949	4,9		
2016	168000	485217	28550	624667	127540423	4,9		
						4,2		



Item Code 1622

Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		13801	2106	11695	98821456	0,1	-0,007	0,094
1999		33085	7541	25544	100300579	0,3		
2000		42700	3500	39200	101719673	0,4		
2001		11000	4000	7000	103067068	0,1		
2002		7800	3600	4200	104355608	0,0		
2003		13000	3600	9400	105640453	0,1		
2004		7000	3600	3400	106995583	0,0		
2005		9000	7000	2000	108472228	0,0		
2006		11206	7003	4203	110092378	0,0		
2007		8000	2000	6000	111836346	0,1		
2008		8000	9000	-1000	113661809	0,0		
2009		6464	1509	4955	115505228	0,0		
2010		8160	2568	5592	117318941	0,0		
2011		5212	2385	2827	119090017	0,0		
2012		4445	228	4217	120828307	0,0		
2013		6113	42	6071	122535969	0,0		
2014		5139	388	4751	124221600	0,0		
2015		16202	245	15957	125890949	0,1		
2016		16202	245	15957	127540423	0,1		0,1



Domain Forestry Production and Trade

Area Code 166

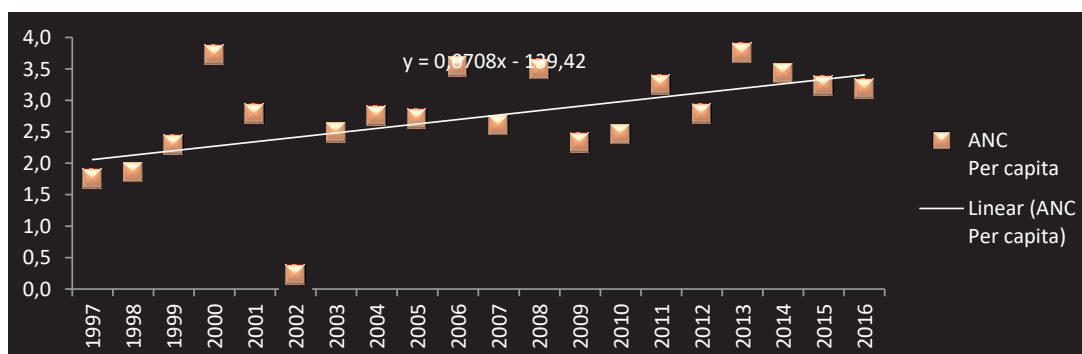
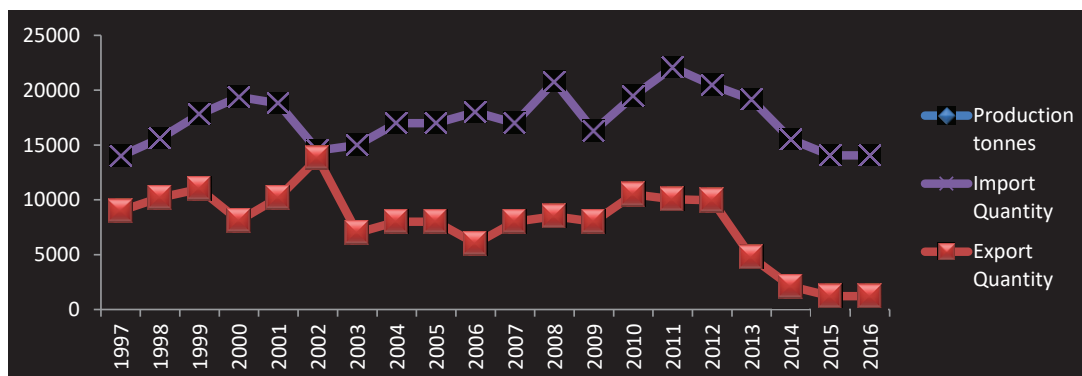
Area Panama

Item Code 1671

Item Newsprint

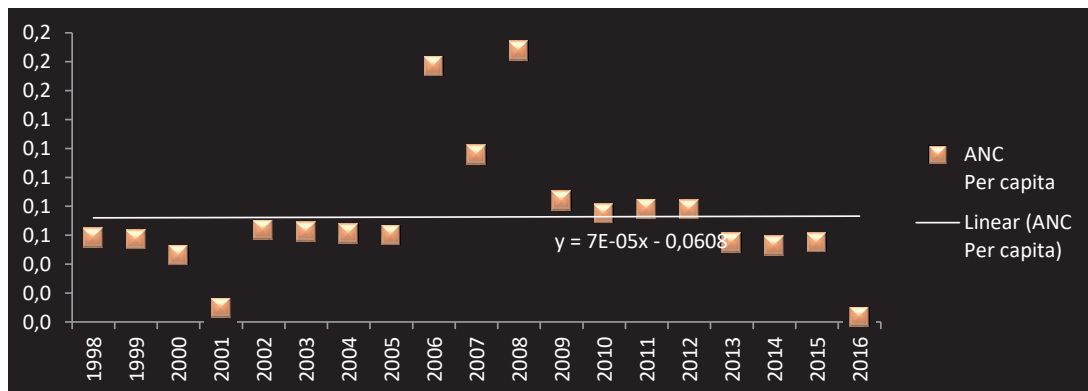
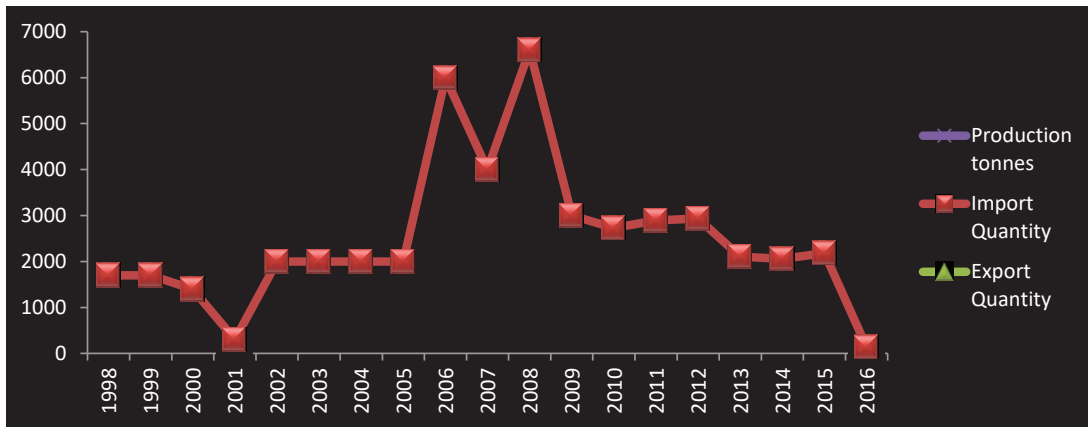
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997		14000	9000	5000	2853941	1,8	0,071	0,828
1998		15600	10200	5400	2912328	1,9		
1999		17800	11000	6800	2971197	2,3		
2000		19400	8100	11300	3030347	3,7		
2001		18800	10200	8600	3089684	2,8		
2002		14500	13800	700	3149265	0,2		
2003		15000	7000	8000	3209174	2,5		
2004		17000	8000	9000	3269541	2,8		
2005		17000	8000	9000	3330465	2,7		
2006		18000	6000	12000	3391905	3,5		
2007		17000	8000	9000	3453807	2,6		
2008		20800	8500	12300	3516268	3,5		
2009		16300	8000	8300	3579385	2,3		
2010		19470	10503	8967	3643222	2,5		
2011		22090	10057	12033	3707782	3,2		
2012		20484	9962	10522	3772938	2,8		
2013		19151	4759	14392	3838462	3,7		
2014		15502	2118	13384	3903986	3,4		
2015		14044	1218	12826	3969249	3,2		
2016		14044	1218	12826	4034119	3,2		

2,7



Item Code 1616
 Item Printing and writing papers, coated

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		1700		1700	2912328	0,1	0,000	0,046
1999		1700		1700	2971197	0,1		
2000		1400		1400	3030347	0,0		
2001		300		300	3089684	0,0		
2002		2000		2000	3149265	0,1		
2003		2000		2000	3209174	0,1		
2004		2000		2000	3269541	0,1		
2005		2000		2000	3330465	0,1		
2006		6000		6000	3391905	0,2		
2007		4000		4000	3453807	0,1		
2008		6600		6600	3516268	0,2		
2009		3000		3000	3579385	0,1		
2010		2730		2730	3643222	0,1		
2011		2895		2895	3707782	0,1		
2012		2937		2937	3772938	0,1		
2013		2104		2104	3838462	0,1		
2014		2058		2058	3903986	0,1		
2015		2179		2179	3969249	0,1		
2016		140		140	4034119	0,0		

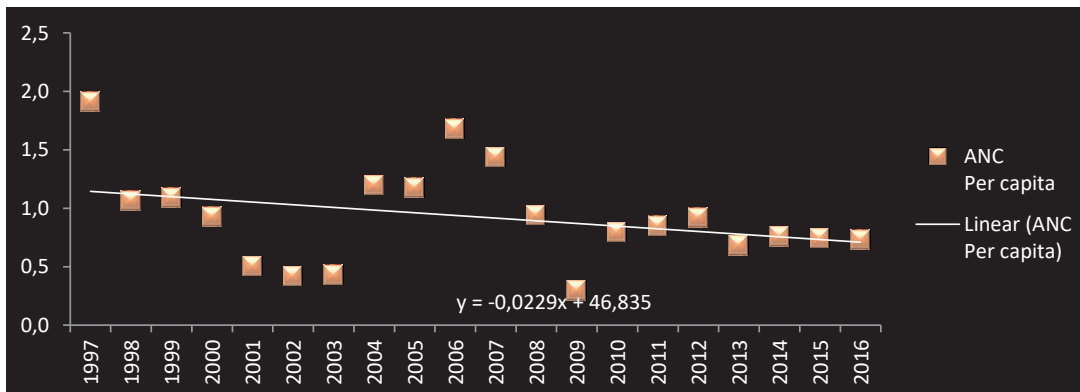
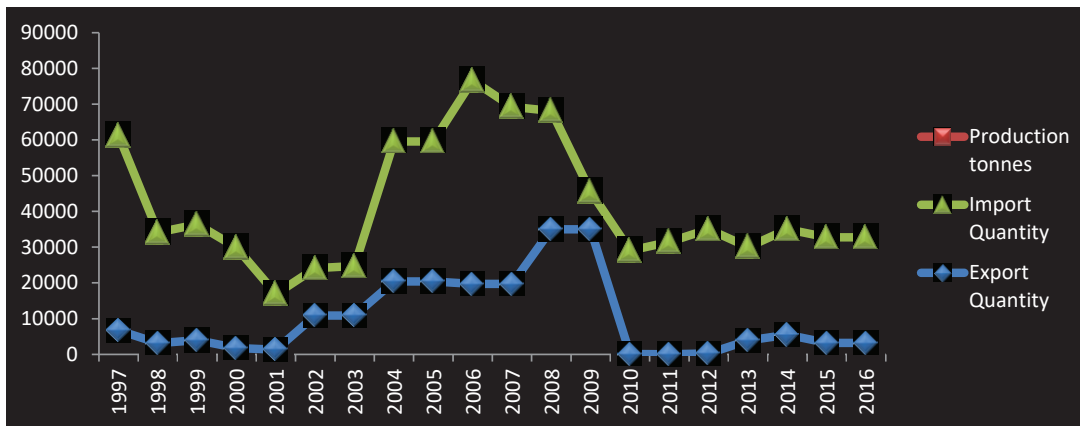


Item Code 1675

Item **Other paper and paperboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997		61200	6700	54500	2853941	1,9	-0,023	0,412
1998		34100	3150	30950	2912328	1,1		
1999		36390	4000	32390	2971197	1,1		
2000		29900	1800	28100	3030347	0,9		
2001		16900	1360	15540	3089684	0,5		
2002		24100	10900	13200	3149265	0,4		
2003		24700	10900	13800	3209174	0,4		
2004		59537	20411	39126	3269541	1,2		
2005		59537	20411	39126	3330465	1,2		
2006		76647	19761	56886	3391905	1,7		
2007		69300	19761	49539	3453807	1,4		
2008		68100	35000	33100	3516268	0,9		
2009		45595	35000	10595	3579385	0,3		
2010		29028	89	28939	3643222	0,8		
2011		31445	53	31392	3707782	0,8		
2012		35011	261	34750	3772938	0,9		
2013		30026	3885	26141	3838462	0,7		
2014		35044	5472	29572	3903986	0,8		
2015		32746	3210	29536	3969249	0,7		
2016		32746	3210	29536	4034119	0,7		

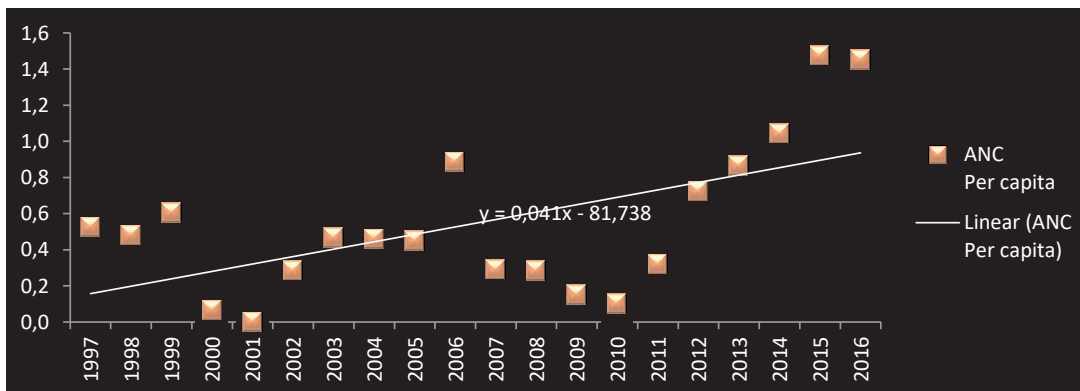
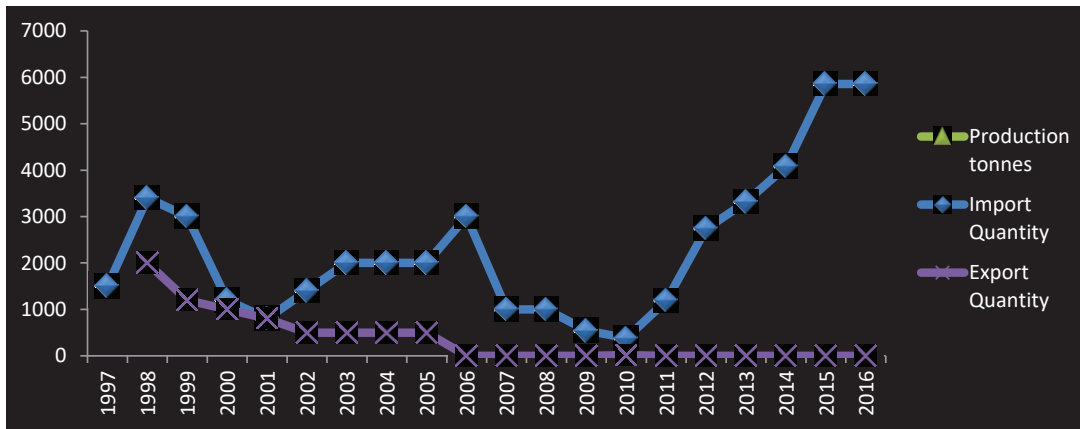
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Item Code 1676

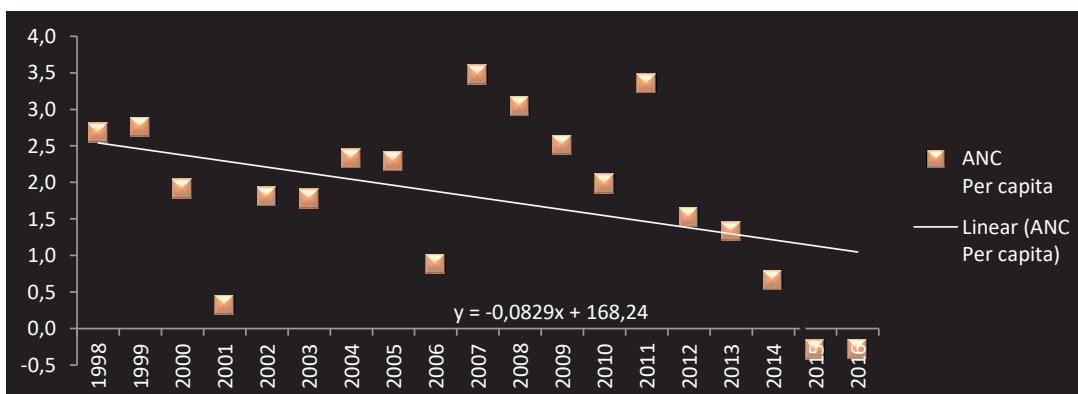
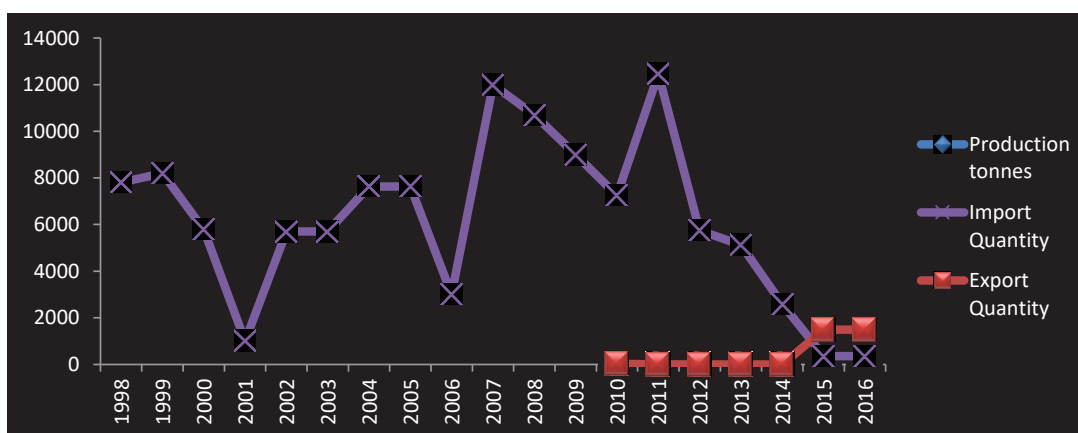
Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997		1500		1500	2853941	0,5	0,041	0,420
1998		3400	2000	1400	2912328	0,5		
1999		3000	1200	1800	2971197	0,6		
2000		1200	1000	200	3030347	0,1		
2001		800	800	0	3089684	0,0		
2002		1400	500	900	3149265	0,3		
2003		2000	500	1500	3209174	0,5		
2004		2000	500	1500	3269541	0,5		
2005		2000	500	1500	3330465	0,5		
2006		3000	0	3000	3391905	0,9		
2007		1000	0	1000	3453807	0,3		
2008		1000	0	1000	3516268	0,3		
2009		545	0	545	3579385	0,2		
2010		382	13	369	3643222	0,1		
2011		1185	0	1185	3707782	0,3		
2012		2736	0	2736	3772938	0,7		
2013		3316	0	3316	3838462	0,9		
2014		4076	0	4076	3903986	1,0		
2015		5856	0	5856	3969249	1,5		
2016		5856	0	5856	4034119	1,5		
						0,5		



Item Code 1618
Item **Cartonboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		7800		7800	2912328	2,7	-0,083	1,127
1999		8200		8200	2971197	2,8		
2000		5800		5800	3030347	1,9		
2001		1000		1000	3089684	0,3		
2002		5700		5700	3149265	1,8		
2003		5700		5700	3209174	1,8		
2004		7628		7628	3269541	2,3		
2005		7628		7628	3330465	2,3		
2006		3000		3000	3391905	0,9		
2007		12000		12000	3453807	3,5		
2008		10700		10700	3516268	3,0		
2009		9000		9000	3579385	2,5		
2010		7245	31	7214	3643222	2,0		
2011		12458	5	12453	3707782	3,4		
2012		5745	0	5745	3772938	1,5		
2013		5123	0	5123	3838462	1,3		
2014		2583	0	2583	3903986	0,7		
2015		357	1494	-1137	3969249	-0,3		
2016		357	1494	-1137	4034119	-0,3		
						1,8		

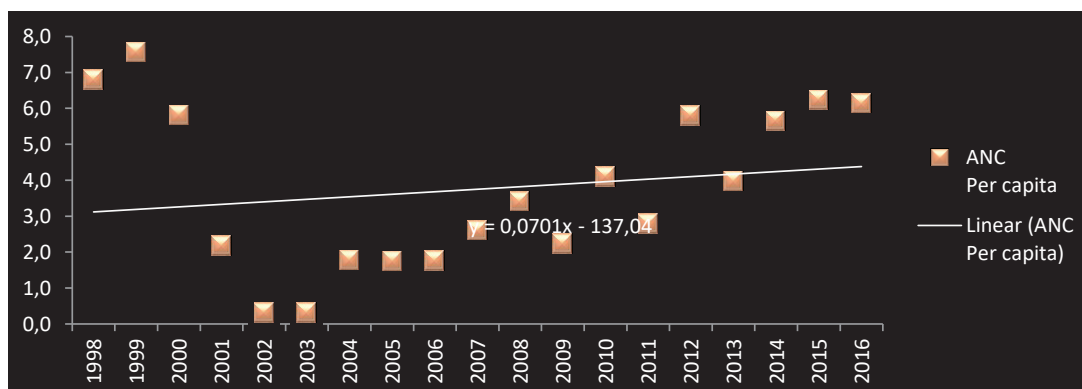
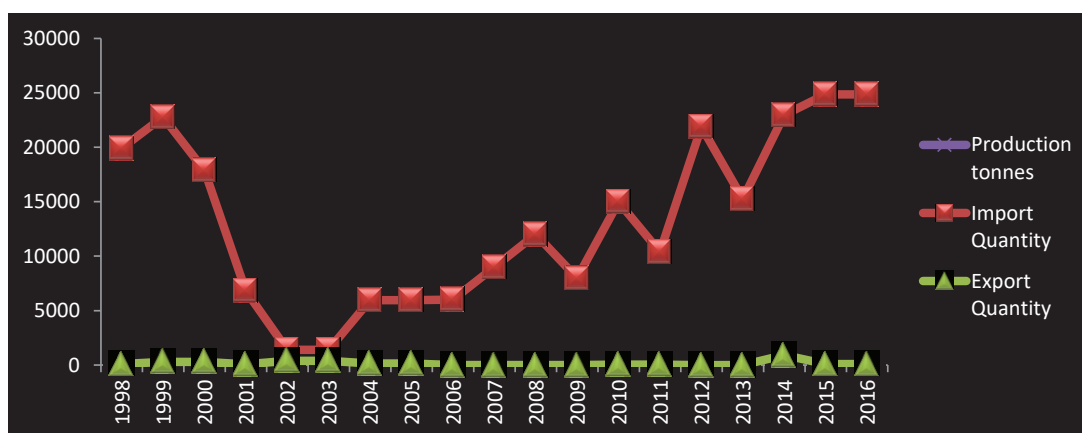


Item Code 1621

Item **Wrapping papers**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		19900	100	19800	2912328	6,8	0,070	2,243
1999		22800	300	22500	2971197	7,6		
2000		17900	300	17600	3030347	5,8		
2001		6800	60	6740	3089684	2,2		
2002		1400	400	1000	3149265	0,3		
2003		1400	400	1000	3209174	0,3		
2004		5962	150	5812	3269541	1,8		
2005		5962	150	5812	3330465	1,7		
2006		6000	0	6000	3391905	1,8		
2007		9000	0	9000	3453807	2,6		
2008		12000	0	12000	3516268	3,4		
2009		8000	0	8000	3579385	2,2		
2010		14994	43	14951	3643222	4,1		
2011		10373	46	10327	3707782	2,8		
2012		21884	1	21883	3772938	5,8		
2013		15265	0	15265	3838462	4,0		
2014		22975	914	22061	3903986	5,7		
2015		24863	96	24767	3969249	6,2		
2016		24863	96	24767	4034119	6,1		

3,7

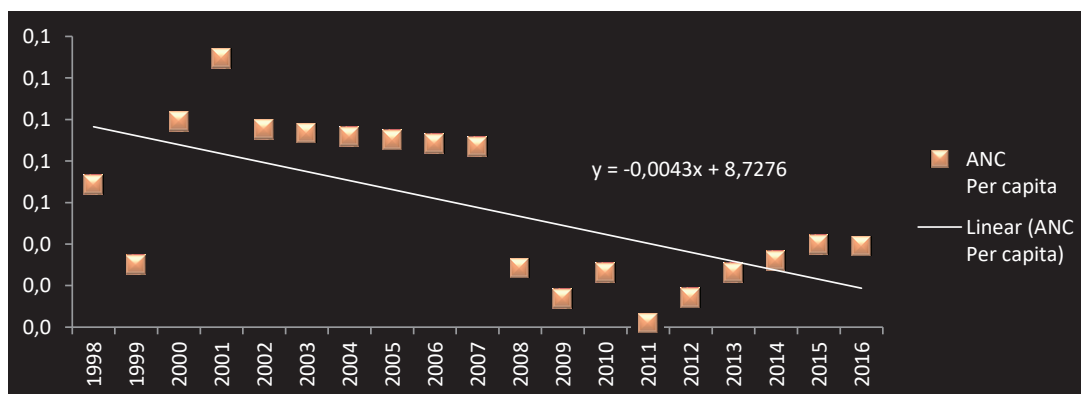
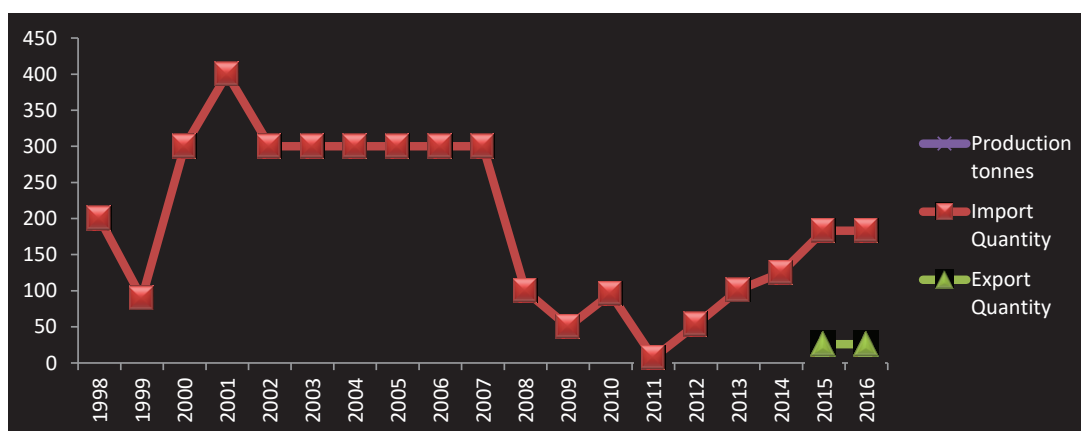


Item Code 1622

Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		200		200	2912328	0,1	-0,004	0,038
1999		90		90	2971197	0,0		
2000		300		300	3030347	0,1		
2001		400		400	3089684	0,1		
2002		300		300	3149265	0,1		
2003		300		300	3209174	0,1		
2004		300		300	3269541	0,1		
2005		300		300	3330465	0,1		
2006		300		300	3391905	0,1		
2007		300		300	3453807	0,1		
2008		100		100	3516268	0,0		
2009		50		50	3579385	0,0		
2010		96		96	3643222	0,0		
2011		7		7	3707782	0,0		
2012		53		53	3772938	0,0		
2013		101		101	3838462	0,0		
2014		125		125	3903986	0,0		
2015		183	26	157	3969249	0,0		
2016		183	26	157	4034119	0,0		

0,1



Domain Forestry Production and Trade

Area Code 170

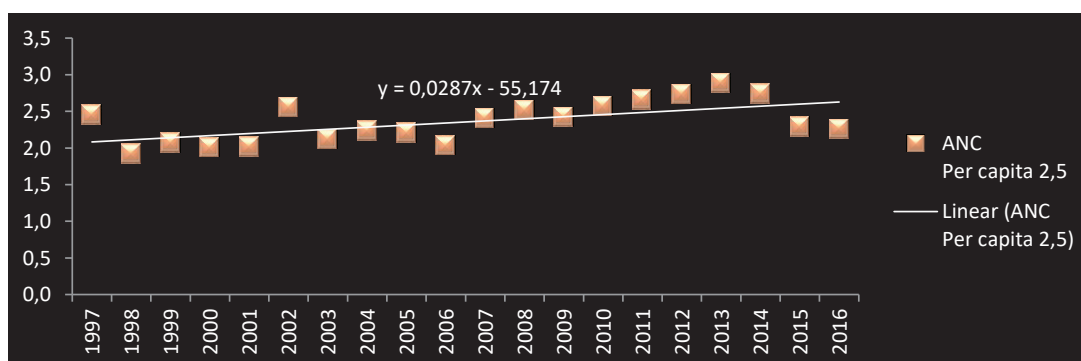
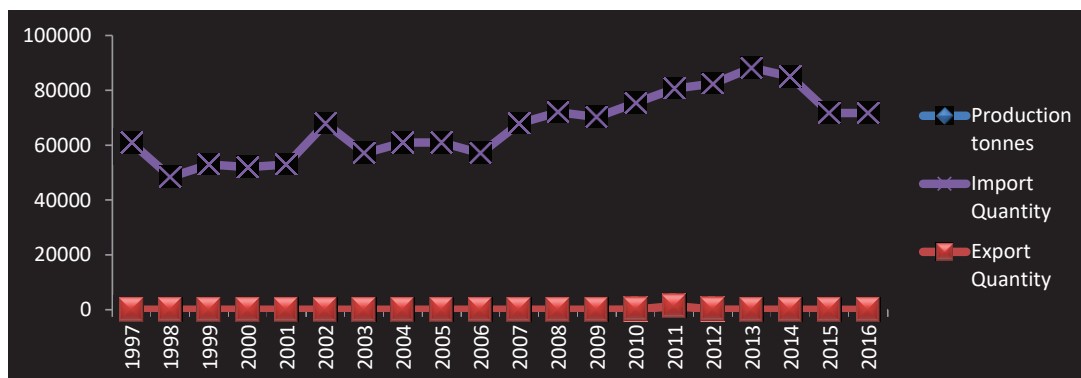
Area Peru

Item Code 1671

Item Newsprint

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997		60900	0	60900	24827406	2,5	0,029	0,282
1998		48400	0	48400	25199748	1,9		
1999		53000	0	53000	25561299	2,1		
2000		52000	0	52000	25914879	2,0		
2001		53000	0	53000	26261363	2,0		
2002		68000	0	68000	26601467	2,6		
2003		57000	0	57000	26937738	2,1		
2004		61000	0	61000	27273194	2,2		
2005		61000	0	61000	27610410	2,2		
2006		57000	0	57000	27949944	2,0		
2007		68000	0	68000	28292724	2,4		
2008		72000	0	72000	28641980	2,5		
2009		70248	0	70248	29001507	2,4		
2010		75470	50	75420	29373646	2,6		
2011		80598	1352	79246	29759989	2,7		
2012		82482	48	82434	30158966	2,7		
2013		88250	0	88250	30565716	2,9		
2014		84916	0	84916	30973354	2,7		
2015		71708	4	71704	31376671	2,3		
2016		71708	4	71704	31773839	2,3		

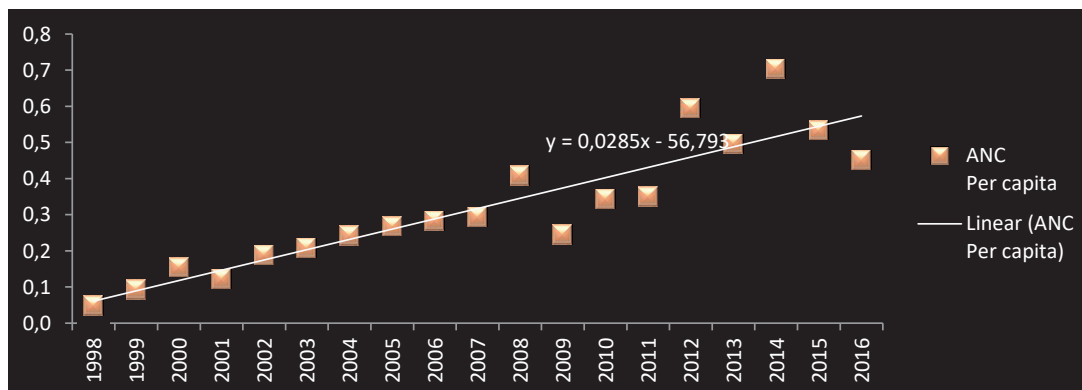
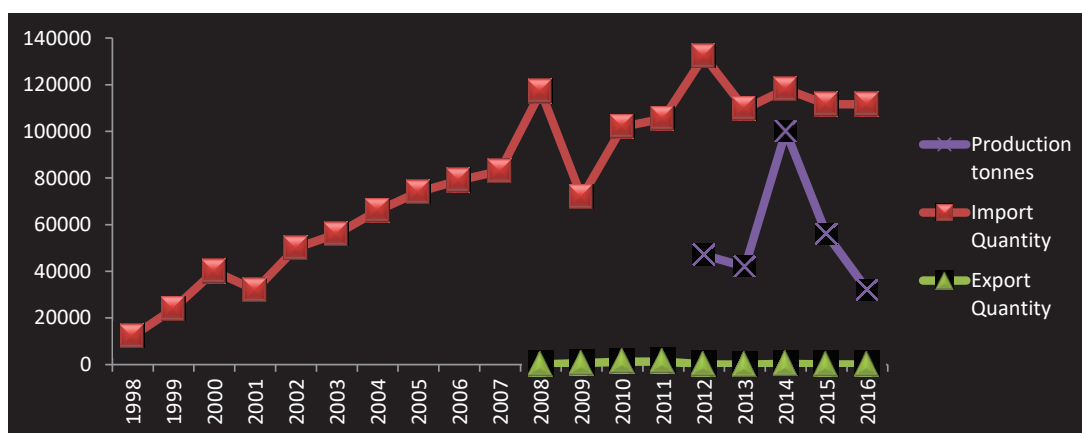
2,4



Item Code 1616
 Item **Printing and writing papers, coated**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998		12190		12190	25199748	0,0	0,028	0,177
1999		24000		24000	25561299	0,1		
2000		40000		40000	25914879	0,2		
2001		32000		32000	26261363	0,1		
2002		50000		50000	26601467	0,2		
2003		56000		56000	26937738	0,2		
2004		66000		66000	27273194	0,2		
2005		74000		74000	27610410	0,3		
2006		79000		79000	27949944	0,3		
2007		83000		83000	28292724	0,3		
2008		117000	14	116986	28641980	0,4		
2009		71743	655	71088	29001507	0,2		
2010		101995	1181	100814	29373646	0,3		
2011		105423	1298	104125	29759989	0,3		
2012	47000	132214	56	179158	30158966	0,6		
2013	42000	109616	4	151612	30565716	0,5		
2014	100000	118122	272	217850	30973354	0,7		
2015	56000	111580	69	167511	31376671	0,5		
2016	32000	111580	69	143511	31773839	0,5		

0,3

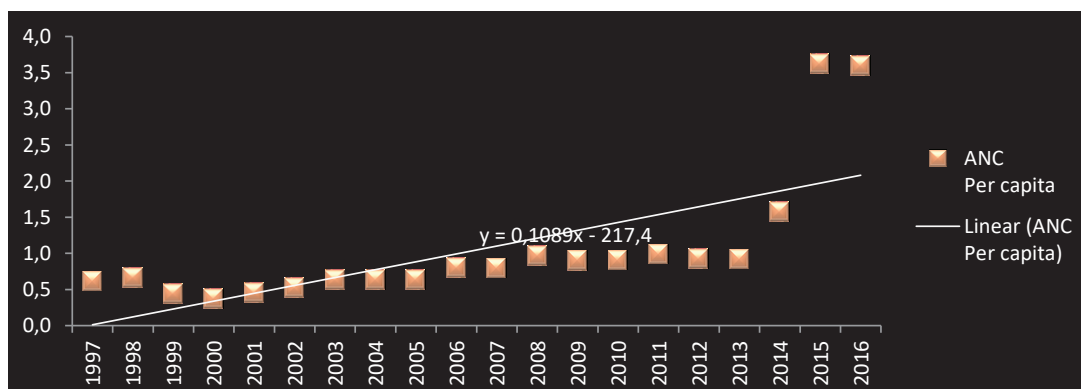
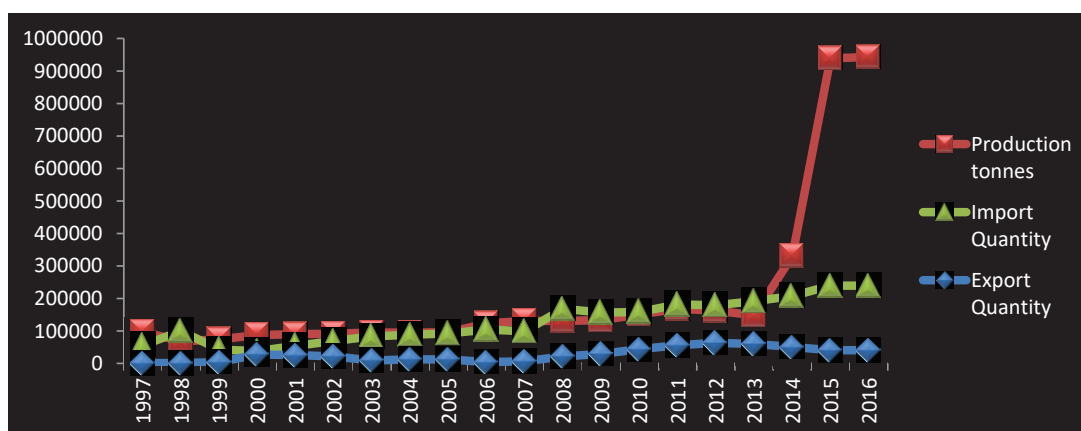


Item Code 1675

Item **Other paper and paperboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	97000	55700	1000	151700	24827406	0,6	0,109	0,916
1998	68000	99600	1000	166600	25199748	0,7		
1999	74000	42000	4000	112000	25561299	0,4		
2000	87000	38000	27600	97400	25914879	0,4		
2001	89900	54000	25400	118500	26261363	0,5		
2002	91800	69000	21200	139600	26601467	0,5		
2003	94800	83000	9400	168400	26937738	0,6		
2004	94800	88000	12400	170400	27273194	0,6		
2005	95357	92000	12400	174957	27610410	0,6		
2006	123000	104000	4400	222600	27949944	0,8		
2007	131000	99000	6400	223600	28292724	0,8		
2008	131000	168000	21722	277278	28641980	1,0		
2009	133000	156426	28844	260582	29001507	0,9		
2010	151000	158574	43816	265758	29373646	0,9		
2011	168000	181133	55336	293797	29759989	1,0		
2012	162158	179004	63356	277806	30158966	0,9		
2013	148000	191303	59581	279722	30565716	0,9		
2014	331000	207674	51080	487594	30973354	1,6		
2015	939000	239332	40410	1137922	31376671	3,6		
2016	943000	239332	40410	1141922	31773839	3,6		

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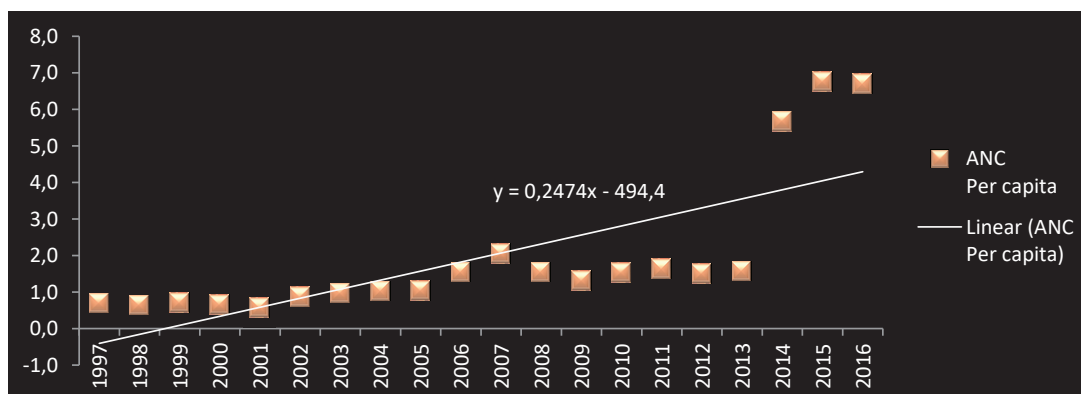
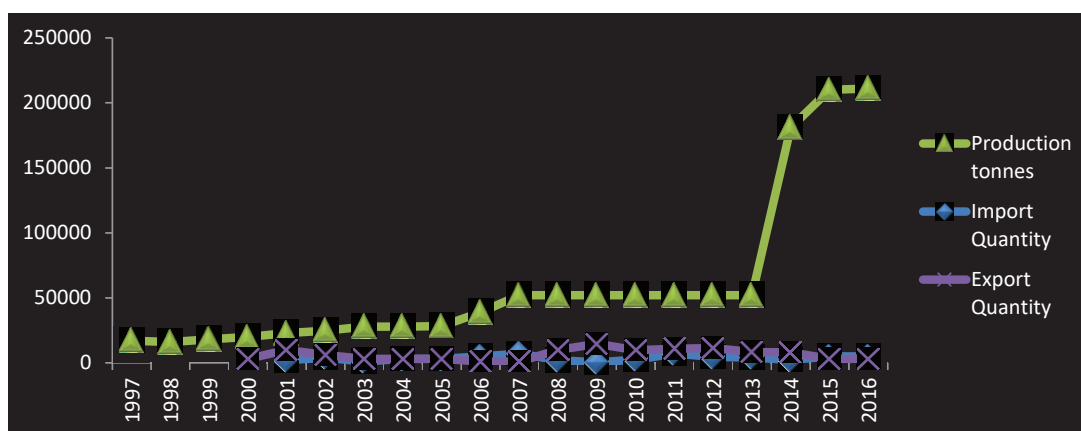


Item Code 1676

Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	17000			17000	24827406	0,7	0,247	1,962
1998	16000			16000	25199748	0,6		
1999	18000			18000	25561299	0,7		
2000	20000		3000	17000	25914879	0,7		
2001	22900	2000	10000	14900	26261363	0,6		
2002	24800	4000	6000	22800	26601467	0,9		
2003	27800	1000	3000	25800	26937738	1,0		
2004	27800	3000	3000	27800	27273194	1,0		
2005	28357	3000	3000	28357	27610410	1,0		
2006	39000	5000	1000	43000	27949944	1,5		
2007	52000	7000	1000	58000	28292724	2,0		
2008	52000	2000	10000	44000	28641980	1,5		
2009	52000	376	14608	37768	29001507	1,3		
2010	52000	2426	9662	44764	29373646	1,5		
2011	52000	7123	10706	48417	29759989	1,6		
2012	52000	4540	11430	45110	30158966	1,5		
2013	52000	4163	8257	47906	30565716	1,6		
2014	181000	2291	8023	175268	30973354	5,7		
2015	210000	4889	3024	211865	31376671	6,8		
2016	211000	4889	3024	212865	31773839	6,7		

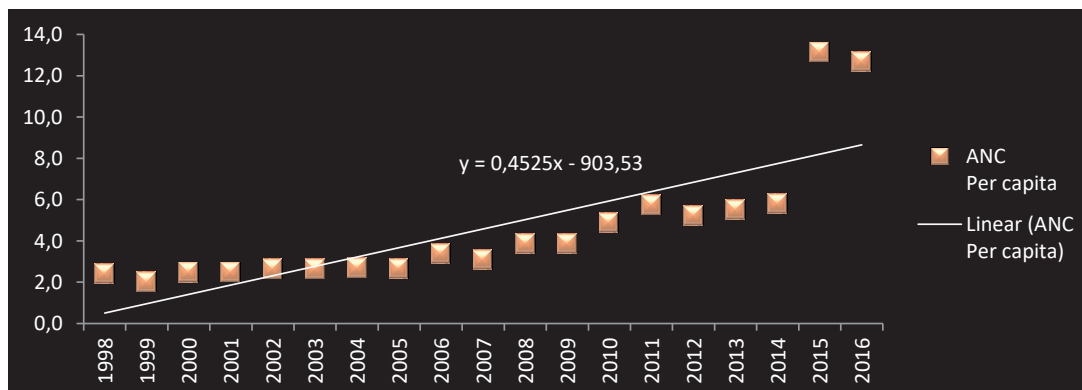
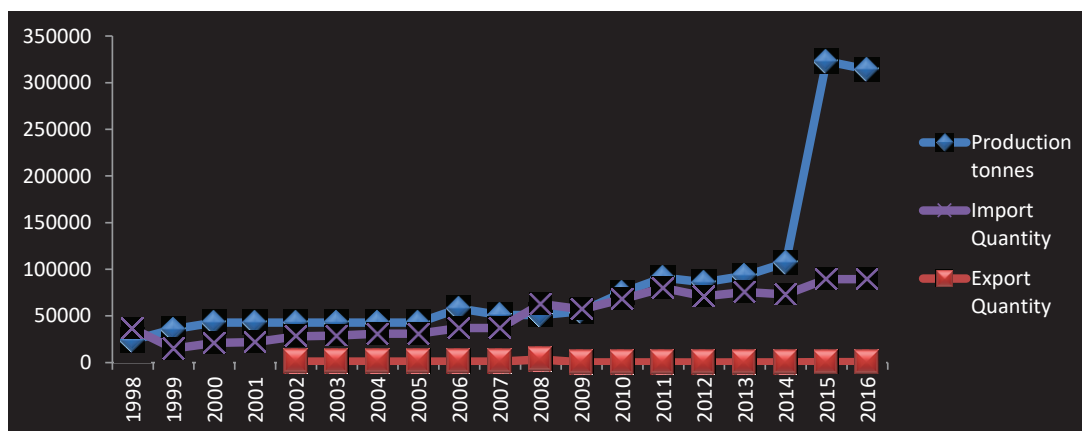
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Item Code 1618
Item **Cartonboard**

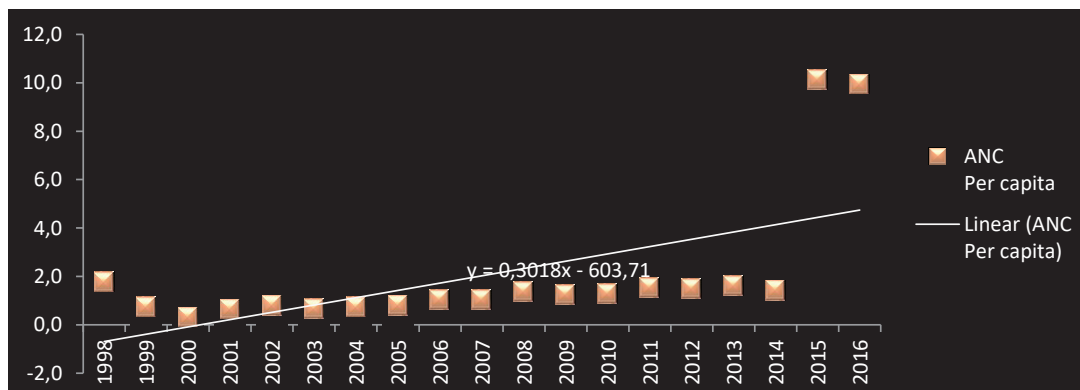
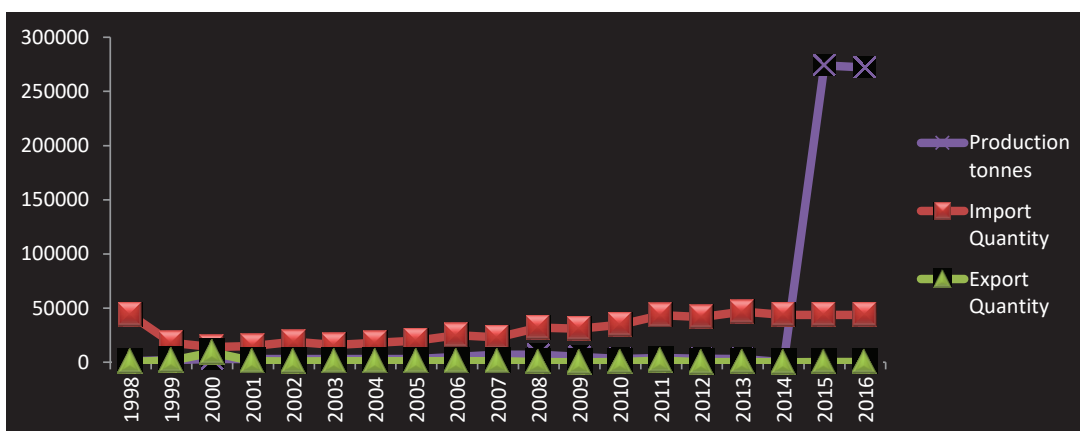
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	24000	36439		60439	25199748	2,4	0,452	3,188
1999	36000	15000		51000	25561299	2,0		
2000	43000	21000		64000	25914879	2,5		
2001	43000	22000		65000	26261363	2,5		
2002	43000	28000	1000	70000	26601467	2,6		
2003	43000	29000	1000	71000	26937738	2,6		
2004	43000	31000	1000	73000	27273194	2,7		
2005	43000	31000	1000	73000	27610410	2,6		
2006	58000	37000	1000	94000	27949944	3,4		
2007	51000	37000	1000	87000	28292724	3,1		
2008	51000	63000	3371	110629	28641980	3,9		
2009	55000	57031	94	111937	29001507	3,9		
2010	75000	68216	363	142853	29373646	4,9		
2011	91000	80022	159	170863	29759989	5,7		
2012	86000	71057	87	156970	30158966	5,2		
2013	93000	75540	265	168275	30565716	5,5		
2014	107000	72977	342	179635	30973354	5,8		
2015	323000	89420	444	411976	31376671	13,1		
2016	314000	89420	444	402976	31773839	12,7		

4,6



Item Code	1621							
Item	Wrapping papers							
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	1000	43727	375	44352	25199748	1,8	0,302	2,845
1999	2000	18000	1500	18500	25561299	0,7		
2000	3000	14000	9000	8000	25914879	0,3		
2001	3000	15000	1000	17000	26261363	0,6		
2002	3000	19000	800	21200	26601467	0,8		
2003	3000	16000	1000	18000	26937738	0,7		
2004	3000	18000	1000	20000	27273194	0,7		
2005	3000	20000	1000	22000	27610410	0,8		
2006	5000	25000	1000	29000	27949944	1,0		
2007	7000	23000	1000	29000	28292724	1,0		
2008	7000	32000	130	38870	28641980	1,4		
2009	5000	31004	27	35977	29001507	1,2		
2010	3000	34684	70	37614	29373646	1,3		
2011	4000	43419	1390	46029	29759989	1,5		
2012	3158	41566	13	44711	30158966	1,5		
2013	3000	46766	108	49658	30565716	1,6		
2014	0	43775	41	43734	30973354	1,4		
2015	274000	43569	131	317438	31376671	10,1		
2016	272000	43569	131	315438	31773839	9,9		

2,0

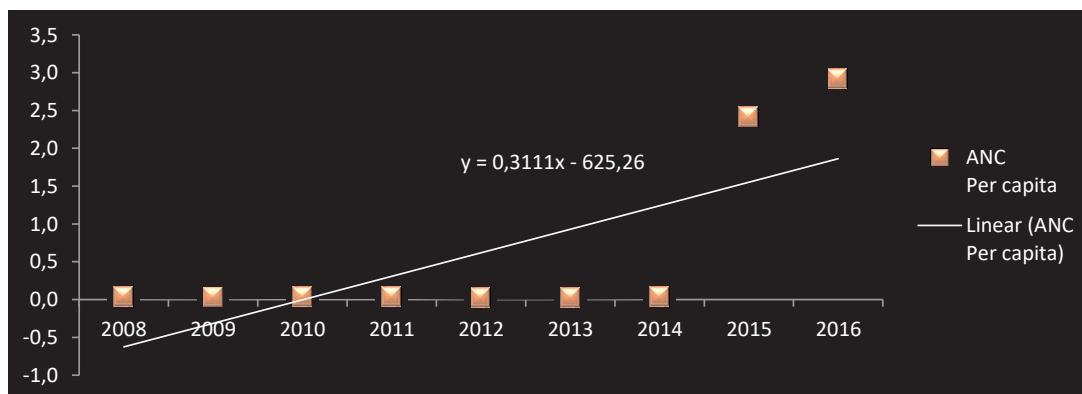
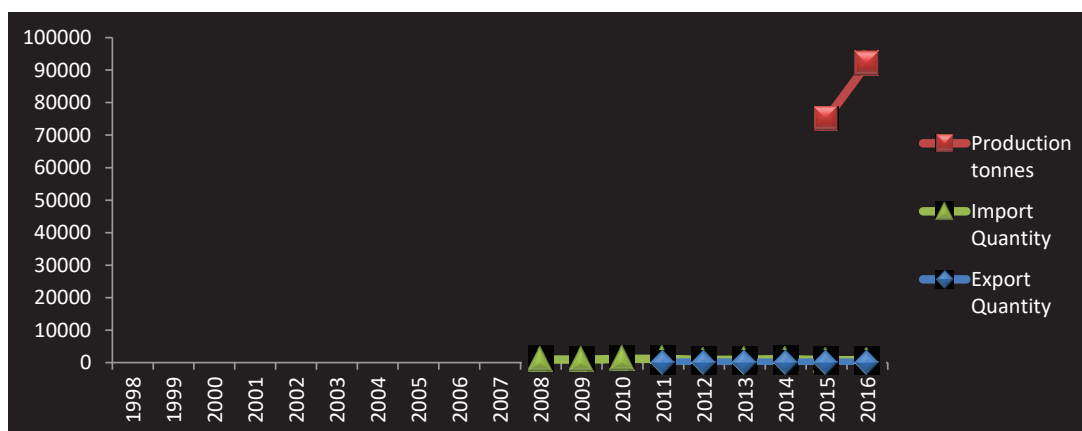


Item Code 1622

Item **Other papers mainly for packaging**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998				0	25199748	0,0	0,082	0,841
1999				0	25561299	0,0		
2000				0	25914879	0,0		
2001				0	26261363	0,0		
2002				0	26601467	0,0		
2003				0	26937738	0,0		
2004				0	27273194	0,0		
2005				0	27610410	0,0		
2006				0	27949944	0,0		
2007				0	28292724	0,0		
2008		1000		1000	28641980	0,0		
2009		907		907	29001507	0,0		
2010		1136		1136	29373646	0,0		
2011		1160	2	1158	29759989	0,0		
2012		834	0	834	30158966	0,0		
2013		876	0	876	30565716	0,0		
2014		1084	0	1084	30973354	0,0		
2015	75000	735	0	75735	31376671	2,4		
2016	92000	735	0	92735	31773839	2,9		

0,3



Domain Forestry Production and Trade

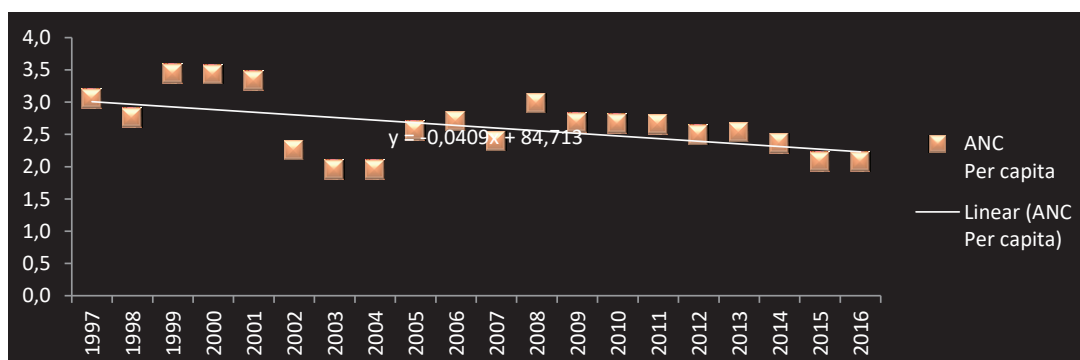
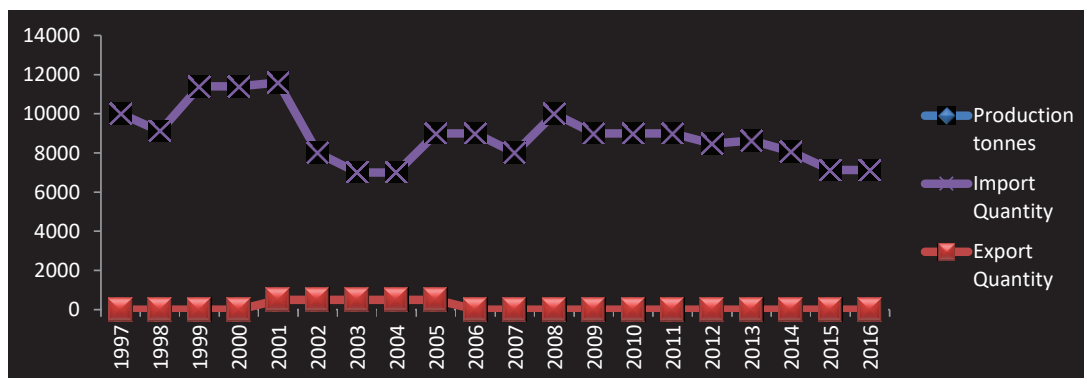
Area Code 234

Area Uruguay

Item Code 1671

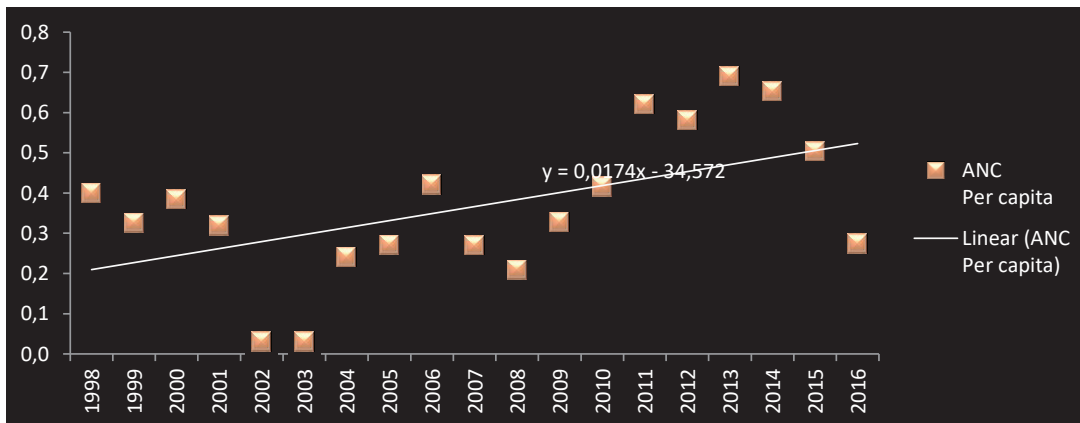
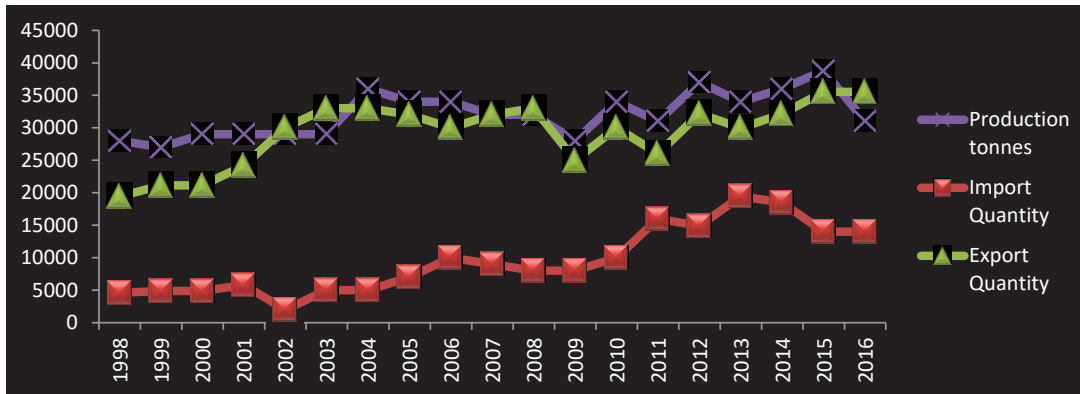
Item Newsprint

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997		10000	3	9997	3271010	3,1	-0,041	0,457
1998		9100	3	9097	3292138	2,8		
1999		11400	0	11400	3309318	3,4		
2000		11400	0	11400	3321245	3,4		
2001		11600	500	11100	3327103	3,3		
2002		8000	500	7500	3327773	2,3		
2003		7000	500	6500	3325637	2,0		
2004		7000	500	6500	3324096	2,0		
2005		9000	500	8500	3325612	2,6		
2006		9000	0	9000	3331043	2,7		
2007		8000	0	8000	3339741	2,4		
2008		10000	0	10000	3350824	3,0		
2009		9000	0	9000	3362755	2,7		
2010		9000	0	9000	3374415	2,7		
2011		9000	0	9000	3385624	2,7		
2012		8471	0	8471	3396777	2,5		
2013		8636	0	8636	3408005	2,5		
2014		8067	0	8067	3419546	2,4		
2015		7129	0	7129	3431552	2,1		
2016		7129	0	7129	3444006	2,1		



Item Code 1616
 Item Printing and writing papers, coated

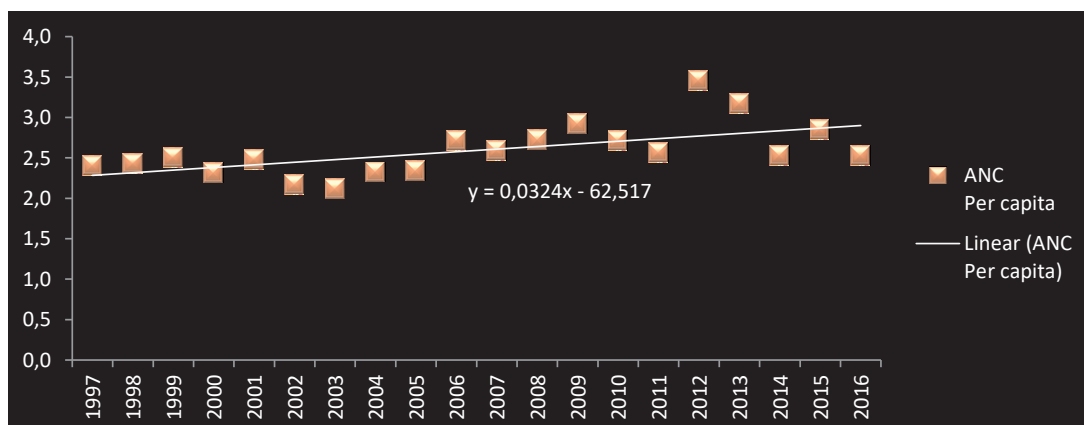
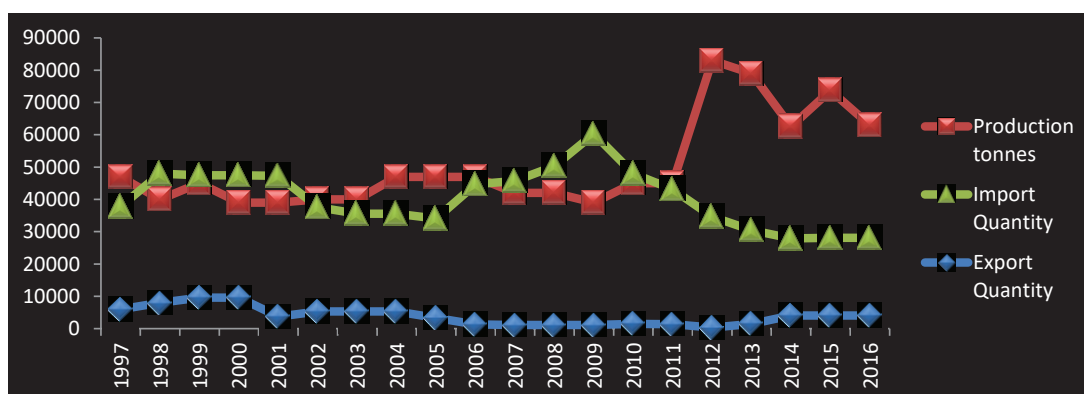
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	28000	4592	19420	13172	3292138	0,4	0,017	0,186
1999	27000	4906	21138	10768	3309318	0,3		
2000	29000	4906	21138	12768	3321245	0,4		
2001	29000	5800	24200	10600	3327103	0,3		
2002	29000	2000	30000	1000	3327773	0,0		
2003	29000	5000	33000	1000	3325637	0,0		
2004	36000	5000	33000	8000	3324096	0,2		
2005	34000	7000	32000	9000	3325612	0,3		
2006	34000	10000	30000	14000	3331043	0,4		
2007	32000	9000	32000	9000	3339741	0,3		
2008	32000	8000	33000	7000	3350824	0,2		
2009	28000	8000	25000	11000	3362755	0,3		
2010	34000	10000	30000	14000	3374415	0,4		
2011	31000	16000	26000	21000	3385624	0,6		
2012	37000	14903	32203	19700	3396777	0,6		
2013	34000	19476	29983	23493	3408005	0,7		
2014	36000	18476	32160	22316	3419546	0,7		
2015	38800	13997	35548	17249	3431552	0,5		
2016	31000	13997	35548	9449	3444006	0,3		



Item Code 1675

Item **Other paper and paperboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	47000	37800	6000	78800	3271010	2,4	0,032	0,324
1998	39999	48000	8000	79999	3292138	2,4		
1999	45000	47500	9600	82900	3309318	2,5		
2000	39000	47500	9600	76900	3321245	2,3		
2001	39000	47300	3700	82600	3327103	2,5		
2002	40000	37600	5300	72300	3327773	2,2		
2003	40000	35600	5300	70300	3325637	2,1		
2004	47000	35600	5300	77300	3324096	2,3		
2005	47000	34029	3275	77754	3325612	2,3		
2006	47000	44700	1300	90400	3331043	2,7		
2007	42000	45700	1100	86600	3339741	2,6		
2008	42000	50300	1100	91200	3350824	2,7		
2009	39000	60300	1100	98200	3362755	2,9		
2010	45000	48000	1450	91550	3374415	2,7		
2011	45000	43090	1350	86740	3385624	2,6		
2012	83000	34625	325	117300	3396777	3,5		
2013	79000	30463	1487	107976	3408005	3,2		
2014	62510	27929	4034	86405	3419546	2,5		
2015	73727	28080	4047	97760	3431552	2,8		
2016	63000	28080	4047	87033	3444006	2,5		

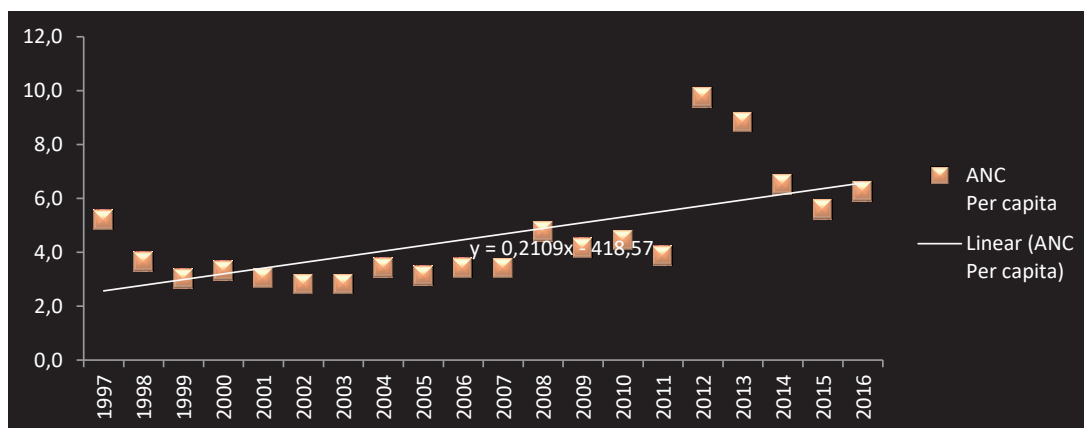
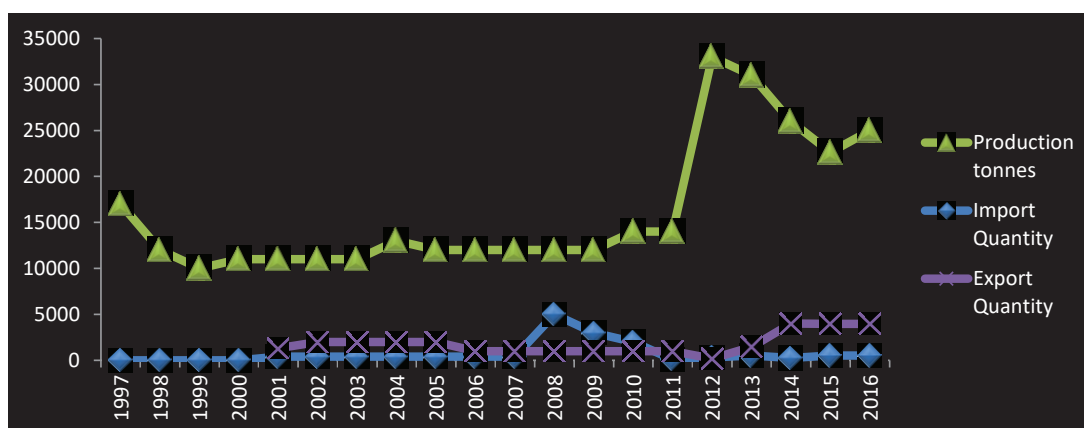


Item Code 1676

Item Household and sanitary papers

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1997	17000	0		17000	3271010	5,2	0,211	1,961
1998	12000	0		12000	3292138	3,6		
1999	10000	0		10000	3309318	3,0		
2000	11000	0		11000	3321245	3,3		
2001	11000	400	1300	10100	3327103	3,0		
2002	11000	400	2000	9400	3327773	2,8		
2003	11000	400	2000	9400	3325637	2,8		
2004	13000	400	2000	11400	3324096	3,4		
2005	12000	400	2000	10400	3325612	3,1		
2006	12000	400	1000	11400	3331043	3,4		
2007	12000	400	1000	11400	3339741	3,4		
2008	12000	5000	1000	16000	3350824	4,8		
2009	12000	3000	1000	14000	3362755	4,2		
2010	14000	2000	1000	15000	3374415	4,4		
2011	14000	90	1000	13090	3385624	3,9		
2012	33000	313	186	33127	3396777	9,8		
2013	31000	528	1462	30066	3408005	8,8		
2014	26000	258	4000	22258	3419546	6,5		
2015	22622	520	3952	19190	3431552	5,6		
2016	25000	520	3952	21568	3444006	6,3		

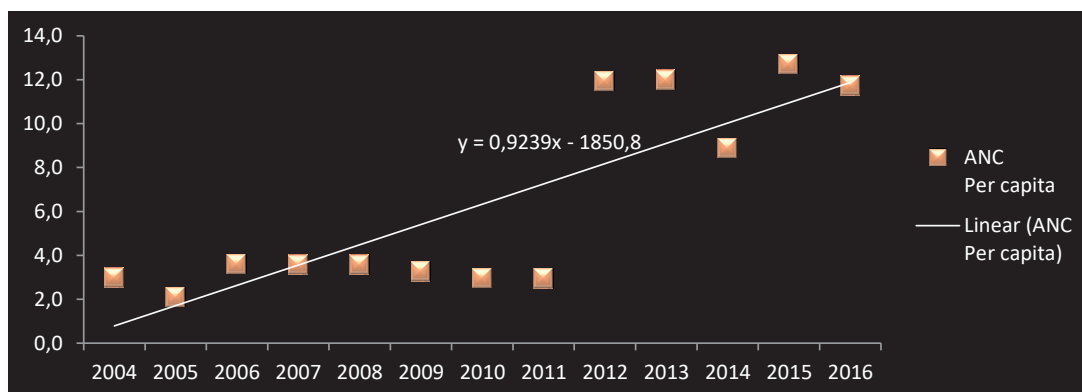
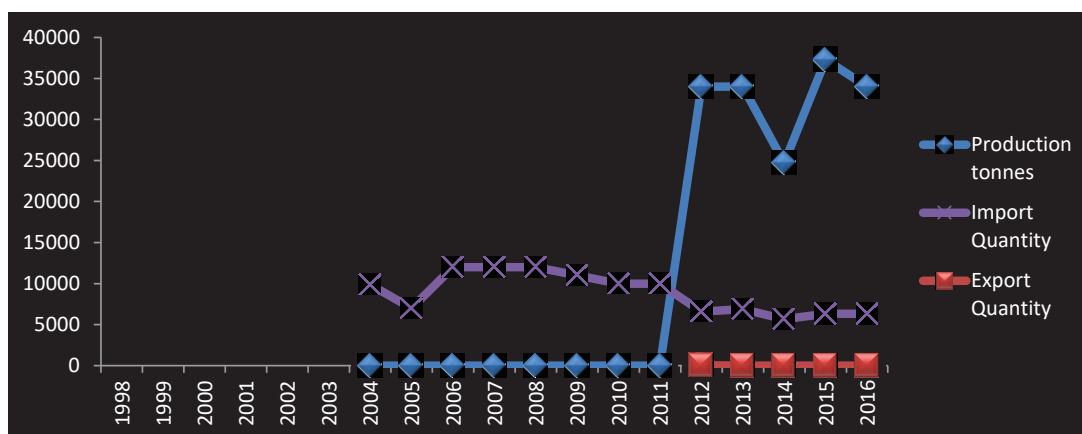
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Item Code 1618

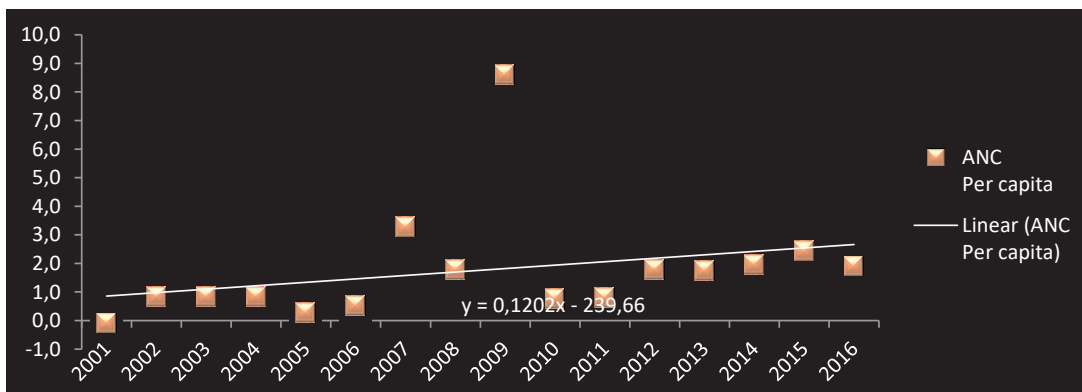
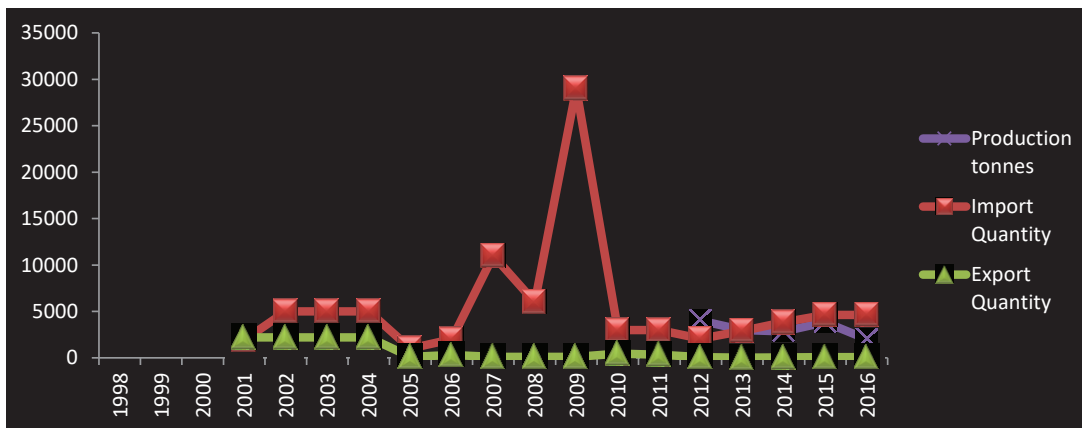
Item **Cartonboard**

Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998				0	3292138	0,0	0,728	4,642
1999				0	3309318	0,0		
2000				0	3321245	0,0		
2001				0	3327103	0,0		
2002				0	3327773	0,0		
2003				0	3325637	0,0		
2004	0	9900		9900	3324096	3,0		
2005	0	7000		7000	3325612	2,1		
2006	0	12000		12000	3331043	3,6		
2007	0	12000		12000	3339741	3,6		
2008	0	12000		12000	3350824	3,6		
2009	0	11000		11000	3362755	3,3		
2010	0	10000		10000	3374415	3,0		
2011	0	10000		10000	3385624	3,0		
2012	34000	6594	51	40543	3396777	11,9		
2013	34000	6870	0	40870	3408005	12,0		
2014	24700	5660	0	30360	3419546	8,9		
2015	37295	6340	0	43635	3431552	12,7		
2016	34000	6340	0	40340	3444006	11,7		
						4,3		



Item Code 1621
 Item Wrapping papers

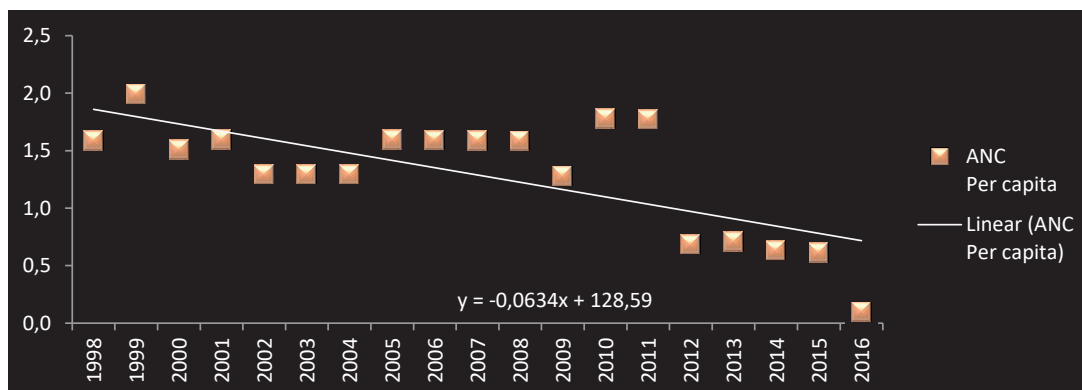
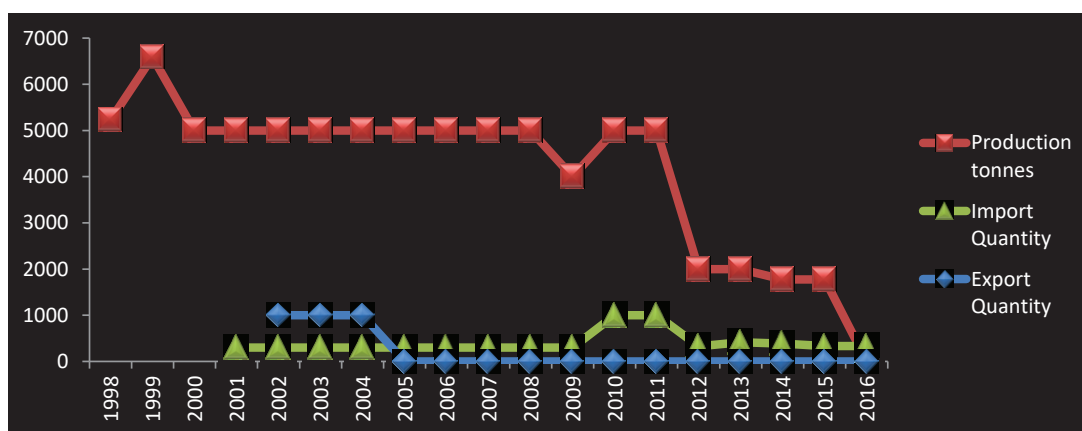
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998				0	3292138	0,0	0,146	1,958
1999				0	3309318	0,0		
2000				0	3321245	0,0		
2001		1900	2200	-300	3327103	-0,1		
2002		5000	2200	2800	3327773	0,8		
2003		5000	2200	2800	3325637	0,8		
2004		5000	2200	2800	3324096	0,8		
2005		1011	106	905	3325612	0,3		
2006		2000	300	1700	3331043	0,5		
2007		11000	100	10900	3339741	3,3		
2008		6000	100	5900	3350824	1,8		
2009		29000	100	28900	3362755	8,6		
2010		3000	450	2550	3374415	0,8		
2011		3000	350	2650	3385624	0,8		
2012	4000	2071	64	6007	3396777	1,8		
2013	3000	2912	20	5892	3408005	1,7		
2014	2834	3848	33	6649	3419546	1,9		
2015	3834	4610	87	8357	3431552	2,4		
2016	2000	4610	87	6523	3444006	1,9		



Item Code 1622

Item **Other papers mainly for packaging**

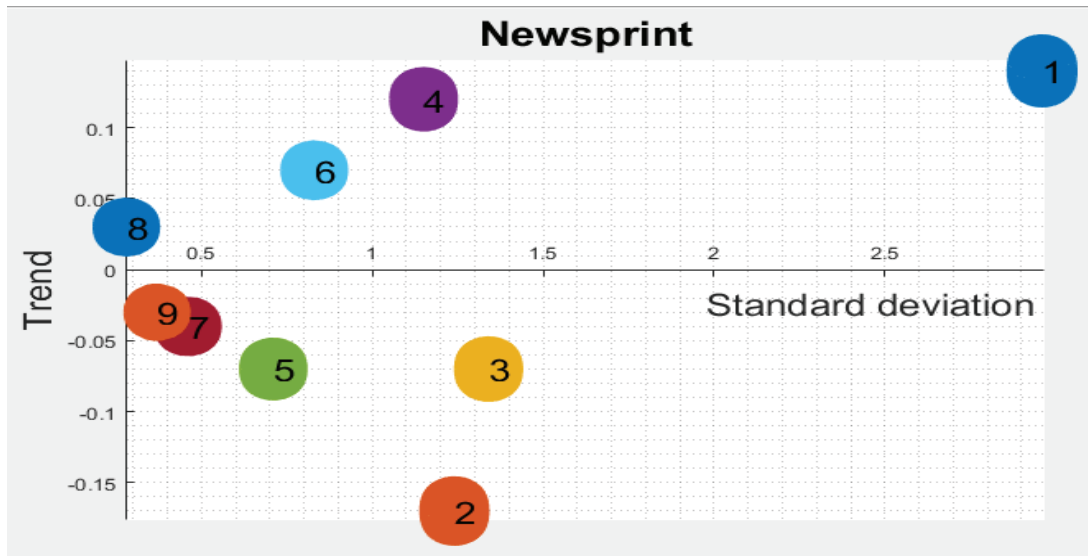
Year	Production tonnes	Import Quantity	Export Quantity	ANC tonnes	Population	ANC Per capita	Trend	Standard deviation
1998	5227			5227	3292138	1,6	-0,063	0,503
1999	6591			6591	3309318	2,0		
2000	5000			5000	3321245	1,5		
2001	5000	300		5300	3327103	1,6		
2002	5000	300	1000	4300	3327773	1,3		
2003	5000	300	1000	4300	3325637	1,3		
2004	5000	300	1000	4300	3324096	1,3		
2005	5000	300	0	5300	3325612	1,6		
2006	5000	300	0	5300	3331043	1,6		
2007	5000	300	0	5300	3339741	1,6		
2008	5000	300	0	5300	3350824	1,6		
2009	4000	300	0	4300	3362755	1,3		
2010	5000	1000	0	6000	3374415	1,8		
2011	5000	1000	0	6000	3385624	1,8		
2012	2000	326	0	2326	3396777	0,7		
2013	2000	417	0	2417	3408005	0,7		
2014	1776	387	0	2163	3419546	0,6		
2015	1776	333	0	2109	3431552	0,6		
2016	0	333	0	333	3444006	0,1	1,3	



Ranking: Newsprint

	ACN Per capita	Trend	Standard deviation
Argentina	5,6	-0,17	1,24
Chile	4,4	-0,07	1,34
Colombia	1,9	-0,03	0,37
Costa Rica	6,7	0,14	2,96
Ecuador	4,1	0,12	1,15
Mexico	3,6	-0,07	0,71
Panama	2,7	0,07	0,83
Peru	2,4	0,03	0,28
Uruguay	2,6	-0,04	0,46

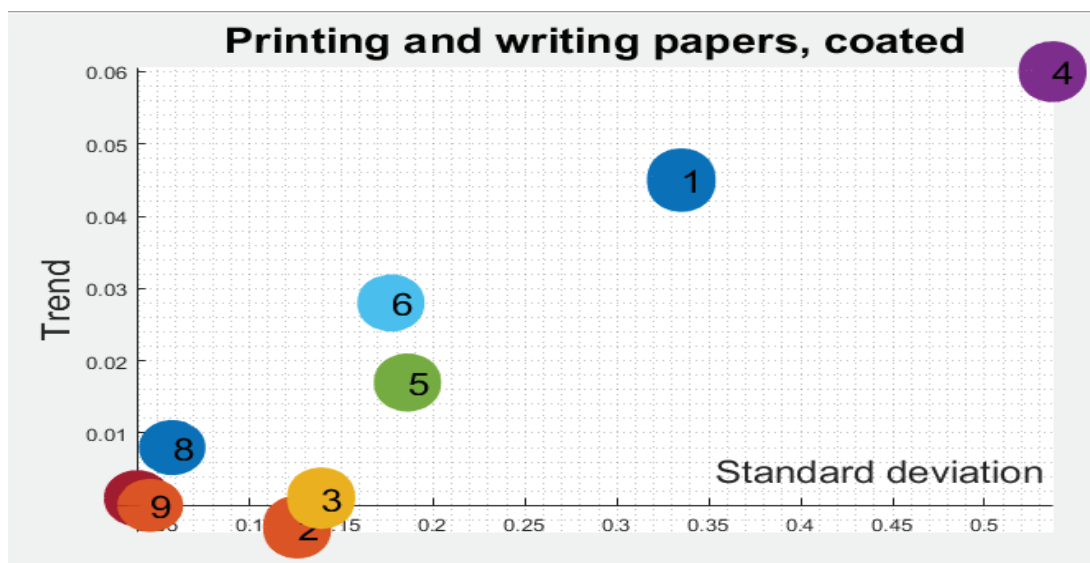
1st Costa Rica 2nd Argentina 3rd Chile 4th Ecuador 5th Mexico 6th Panama 7th Uruguay 8th Peru 9th Colombia



Ranking: Printing and writing papers, coated

	ACN Per capita	Trend	Standard deviation
Argentina	0,57	0,001	0,139
Chile	0,65	-0,003	0,126
Colombia	0,25	0,001	0,039
Costa Rica	0,54	0,060	0,537
Ecuador	0,19	0,008	0,058
Mexico	0,69	0,045	0,335
Panama	0,07	0,000	0,046
Peru	0,32	0,028	0,177
Uruguay	0,37	0,017	0,186

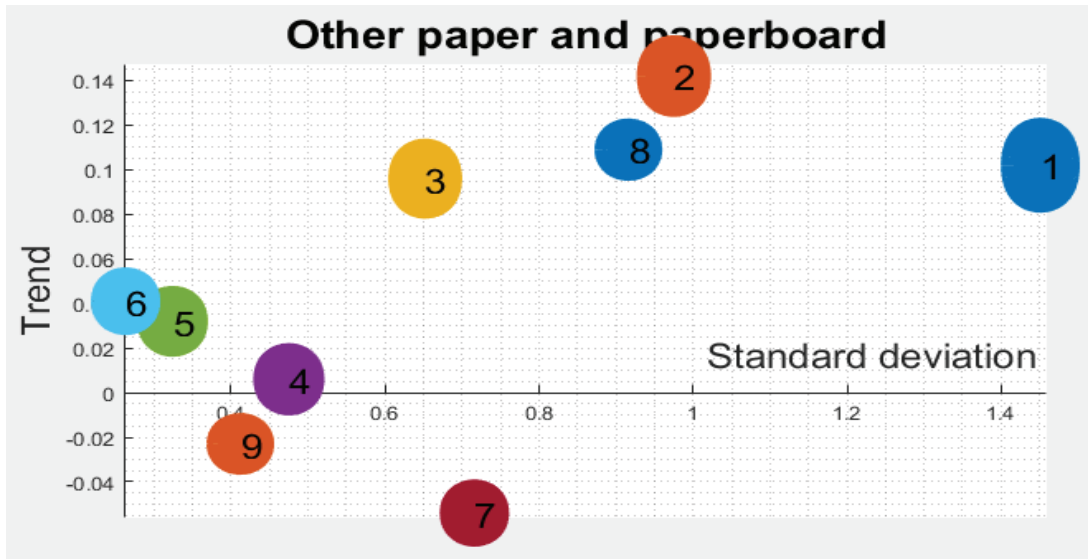
1st Mexico 2nd Chile 3rd Argentina 4th Costa Rica 5th Uruguay 6th Peru 7th Colombia 8th Ecuador 9th Panama



Ranking: Other paper and paperboard

	ACN Per capita	Trend	Standard deviation
Argentina	2,9	0,006	0,475
Chile	4,7	0,142	0,975
Colombia	2,0	0,041	0,263
Costa Rica	7,3	0,102	1,451
Ecuador	1,9	-0,054	0,716
Mexico	4,4	0,096	0,652
Panama	0,9	-0,023	0,412
Peru	1,0	0,109	0,916
Uruguay	2,6	0,032	0,324

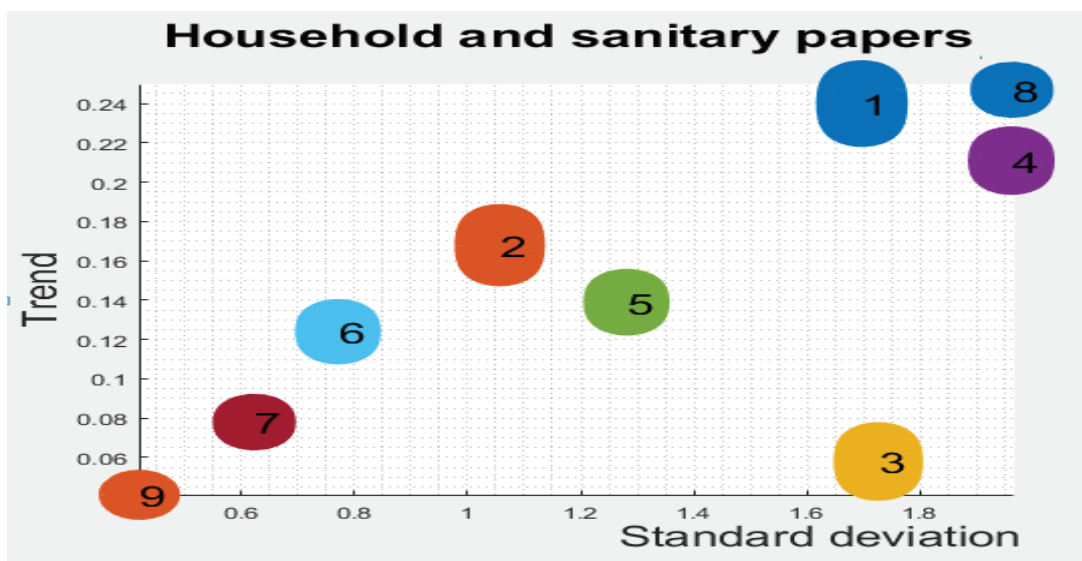
1st Costa Rica 2nd Chile 3rd Mexico 4th Argentina 5th Uruguay 6th Colombia 7th Ecuador 8th Peru 9th Panama



Ranking: Household and sanitary papers

	ACN Per capita	Trend	Standard deviation
Argentina	4,2	0,139	1,281
Chile	8,6	0,240	1,697
Colombia	3,9	0,124	0,771
Costa Rica	6,8	0,058	1,726
Ecuador	2,0	0,078	0,623
Mexico	7,6	0,168	1,057
Panama	0,5	0,041	0,420
Peru	1,9	0,247	1,962
Uruguay	4,6	0,211	1,961

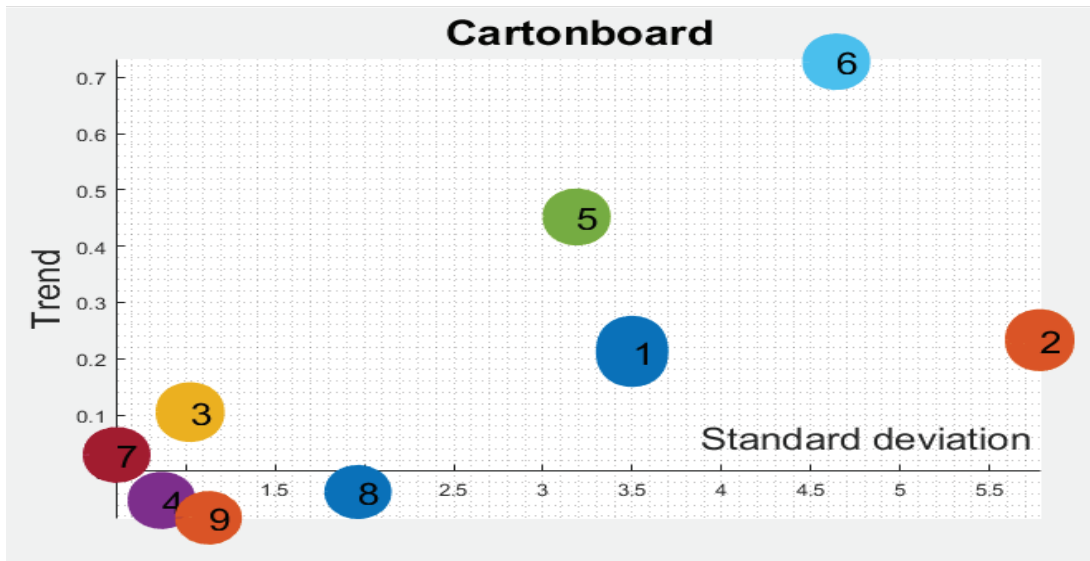
1st Chile 2nd Mexico 3rd Costa Rica 4th Uruguay 5th Argentina 6th Colombia 7th Ecuador 8th Peru 9th Panama



Ranking: Cartonboard

	ACN	Trend	Standard deviation
	Per capita		
Argentina	4,7	-0,052	0,865
Chile	6,6	0,105	1,024
Colombia	3,7	0,029	0,613
Costa Rica	15,3	0,213	3,499
Ecuador	2,3	-0,037	1,964
Mexico	8,2	0,233	5,781
Panama	1,8	-0,083	1,127
Peru	4,6	0,452	3,188
Uruguay	4,3	0,728	4,642

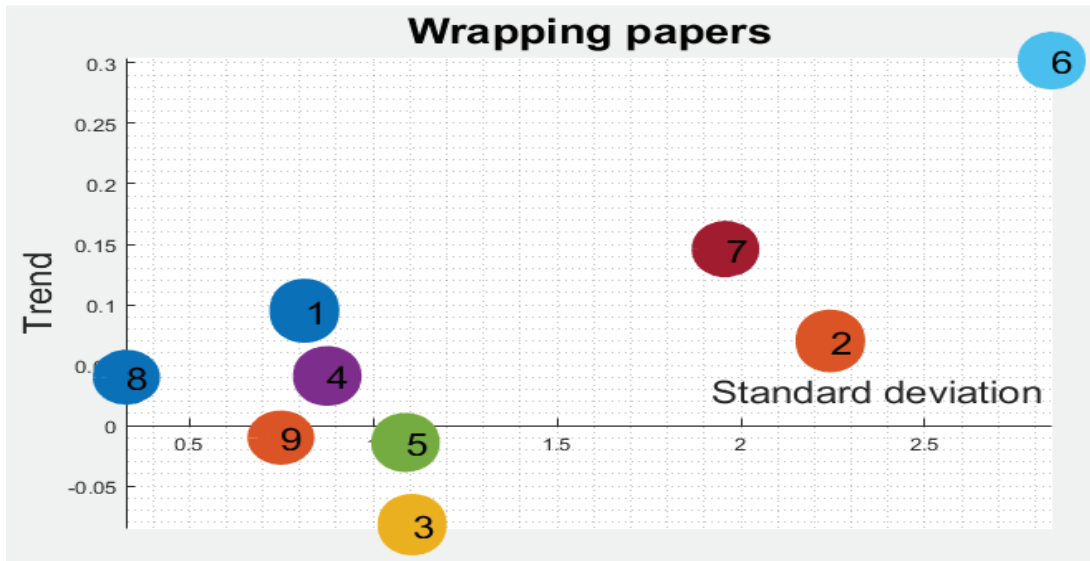
1st Costa Rica 2nd Mexico 3rd Chile 4th Argentina 5th Peru 6th Uruguay 7th Colombia 8th Ecuador 9th Panama



Ranking: Wrapping papers

	ACN Per capita	Trend	Standard deviation
Argentina	2,7	0,041	0,875
Chile	3,3	-0,082	1,106
Colombia	1,0	0,040	0,329
Costa Rica	2,5	-0,014	1,088
Ecuador	0,7	-0,010	0,749
Mexico	4,2	0,095	0,813
Panama	3,7	0,070	2,243
Peru	2,0	0,302	2,845
Uruguay	1,5	0,146	1,958

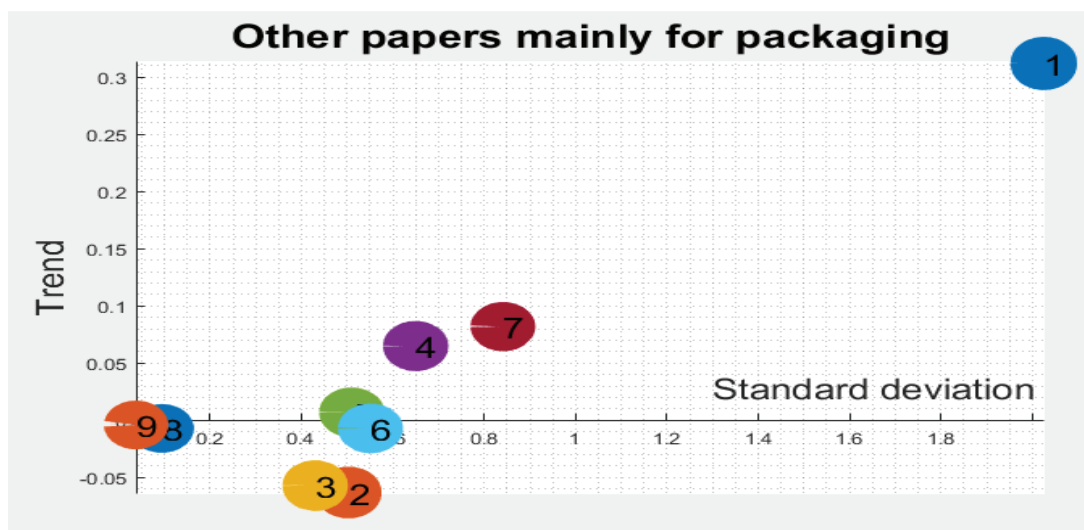
1st Mexico 2nd Panama 3rd Chile 4th Argentina 5th Costa Rica 6th Peru 7th Uruguay 8th Colombia 9th Ecuador



Ranking: Other papers mainly for packaging

	ACN Per capita	Trend	Standard deviation
Argentina	0,5	-0,007	0,551
Chile	0,6	0,007	0,510
Colombia	0,9	-0,057	0,430
Costa Rica	0,7	0,065	0,650
Ecuador	1,8	0,312	2,025
Mexico	0,1	-0,007	0,094
Panama	0,1	-0,004	0,038
Peru	0,3	0,082	0,841
Uruguay	1,3	-0,063	0,503

1st Ecuador 2nd Uruguay 3rd Colombia 4th Costa Rica 5th Chile 6th Argentina 7th Peru 8th Mexico 9th Panama



Total Ranking

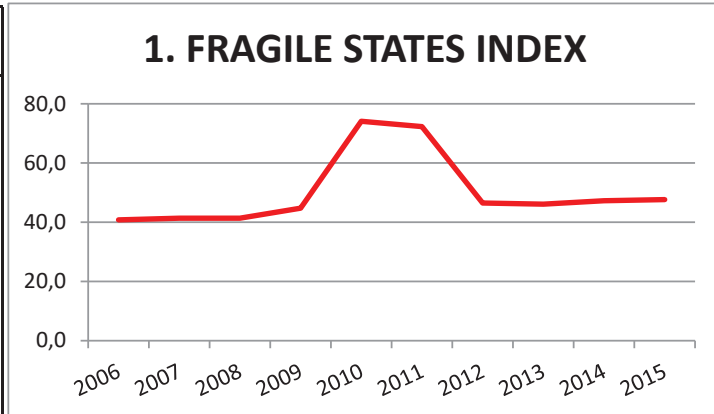
	1st	2nd	3rd	4th	5th
Newsprint	Costa Rica	Argentina	Chile	Ecuador	Mexico
Printing and writing papers, coated	Mexico	Chile	Argentina	Costa Ric	Uruguay
Other paper and paperboard	Costa Rica	Chile	Mexico	Argentina:	Uruguay
Household and sanitary papers	Chile	Mexico	Costa Rica	Uruguay	Argentina
Cartonboard	Mexico	Panama	Chile	Argentina:	Costa Rica
Wrapping papers	Mexico	Panama	Chile	Argentina:	Costa Rica
Other papers mainly for packaging	Ecuador	Uruguay	Colombia	Costa Ric	Chile

	6th	7th	8th	9th
Newsprint	Panama	Uruguay	Peru	Colombia
Printing and writing papers, coated	Peru	Colombia	Ecuador	Panama
Other paper and paperboard	Colombia	Ecuador	Peru	Panama
Household and sanitary papers	Colombia	Ecuador	Peru	Panama
Cartonboard	Peru	Uruguay	Colombia	Ecuador
Wrapping papers	Peru	Uruguay	Colombia	Ecuador
Other papers mainly for packaging	Argentina	Peru	Mexico	Panama

ARGENTINA

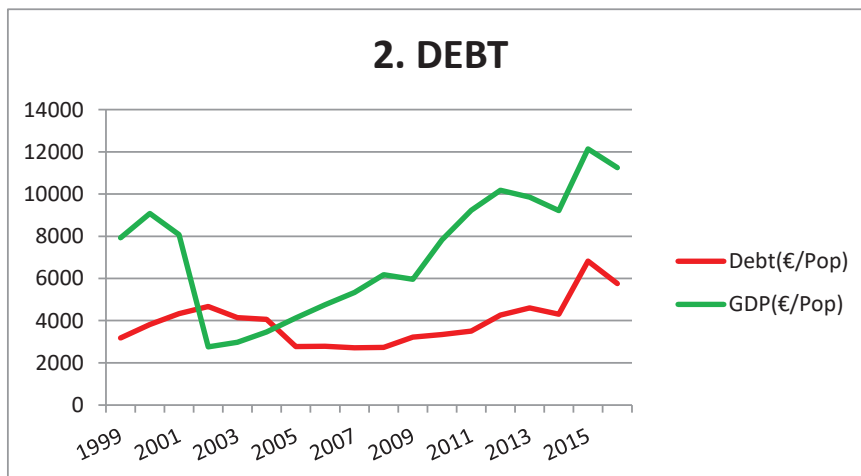
1. FRAGILE STATES INDEX

Year	Fragility ranking	Fragility index
2006	122	40,8
2007	149	41,4
2008	151	41,4
2009	148	44,7
2010	101	74,1
2011	101	72,3
2012	145	46,5
2013	144	46,1
2014	144	47,3
2015	141	47,6



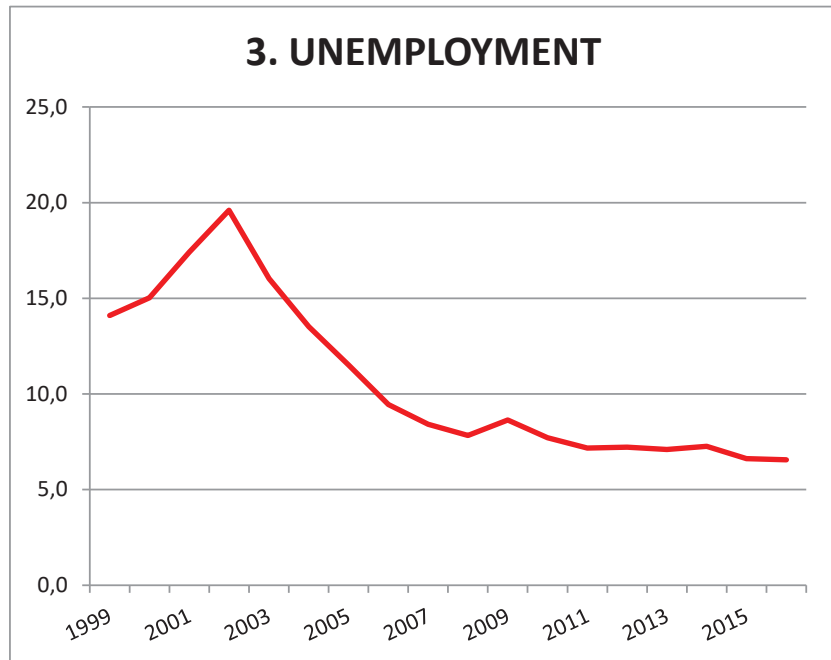
2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	115640	3177	288678	7931	40,1
2000	140419	3817	334009	9080	42,0
2001	161030	4334	300011	8074	53,7
2002	175126	4668	103475	2758	169,2
2003	157061	4147	112826	2979	139,2
2004	155353	4064	132436	3465	117,3
2005	107076	2775	159531	4134	67,1
2006	108730	2790	185209	4752	58,7
2007	106800	2714	209779	5330	50,9
2008	108326	2725	245671	6181	44,1
2009	129328	3222	239070	5957	54,1
2010	136434	3345	319262	7827	42,7
2011	144340	3498	381027	9235	37,9
2012	177808	4261	424699	10177	41,9
2013	194264	4603	415633	9848	46,7
2014	184868	4301	396074	9215	46,7
2015	296189	6822	526945	12137	56,2
2016	252555	5760	493278	11250	51,2



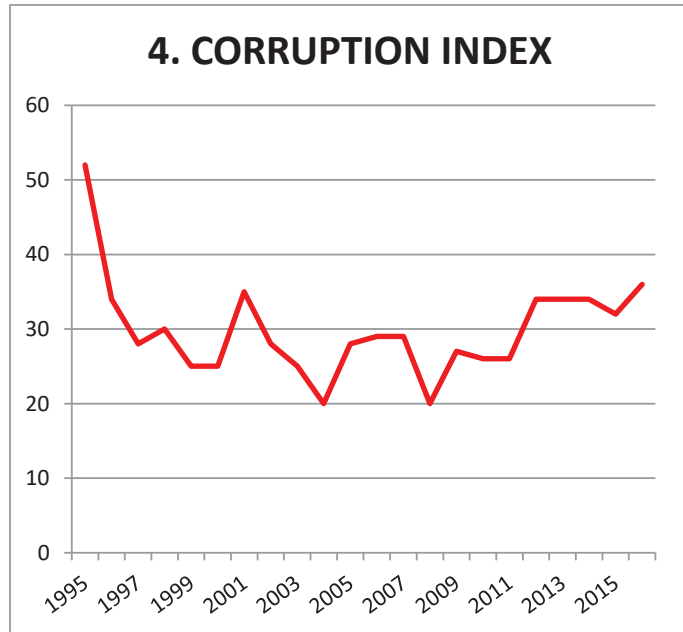
3. UNEMPLOYMENT

year	%
1999	14,1
2000	15,0
2001	17,4
2002	19,6
2003	16,0
2004	13,5
2005	11,5
2006	9,4
2007	8,4
2008	7,8
2009	8,6
2010	7,7
2011	7,2
2012	7,2
2013	7,1
2014	7,3
2015	6,6
2016	6,6



4. CORRUPTION INDEX

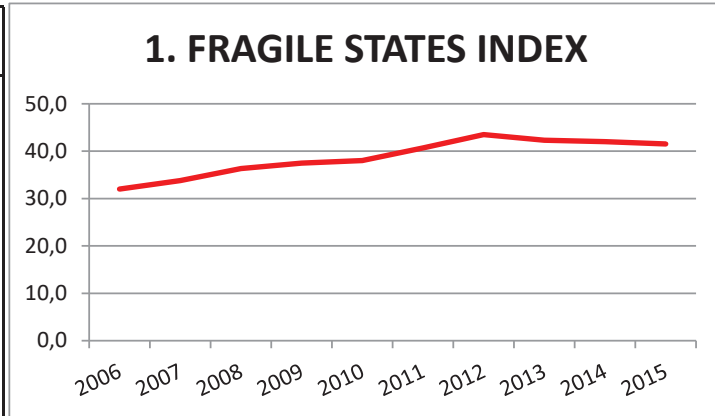
Date	Ranking of the C.	Index of C.
1995	24	52
1996	35	34
1997	42	28
1998	61	30
1999	80	25
2000	76	25
2001	57	35
2002	70	28
2003	92	25
2004	108	20
2005	97	28
2006	93	29
2007	105	29
2008	109	20
2009	120	27
2010	123	26
2011	129	26
2012	105	34
2013	106	34
2014	107	34
2015	107	32
2016	95	36



CHILE

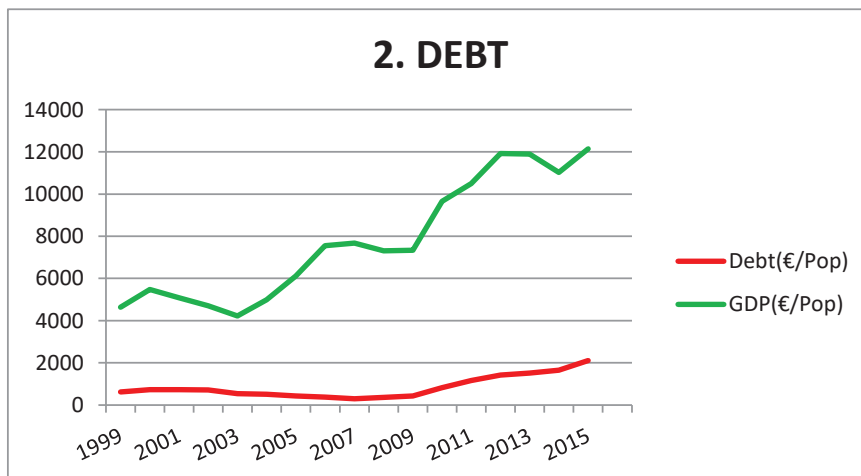
1. FRAGILE STATES INDEX

Year	Fragility ranking	Fragility index
2006	132	32,0
2007	158	33,8
2008	157	36,3
2009	155	37,5
2010	155	38,0
2011	153	40,7
2012	151	43,5
2013	152	42,3
2014	153	42,0
2015	150	41,5



2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	9408	619	70483	4638	13,3
2000	11132	723	84263	5472	13,2
2001	11457	736	79241	5089	14,5
2002	11199	715	73740	4706	15,2
2003	8506	537	66871	4222	12,7
2004	8219	514	79778	4986	10,3
2005	6912	428	98833	6114	7,0
2006	6153	377	123273	7548	5,0
2007	4912	298	126575	7669	3,9
2008	6001	360	122049	7314	4,9
2009	7209	427	123682	7328	5,8
2010	14083	825	164647	9648	8,6
2011	20090	1164	181086	10494	11,1
2012	24811	1422	207835	11914	11,9
2013	26683	1513	209578	11886	12,7
2014	29319	1645	196428	11024	14,9
2015	37973	2109	218600	12140	17,4
2016					



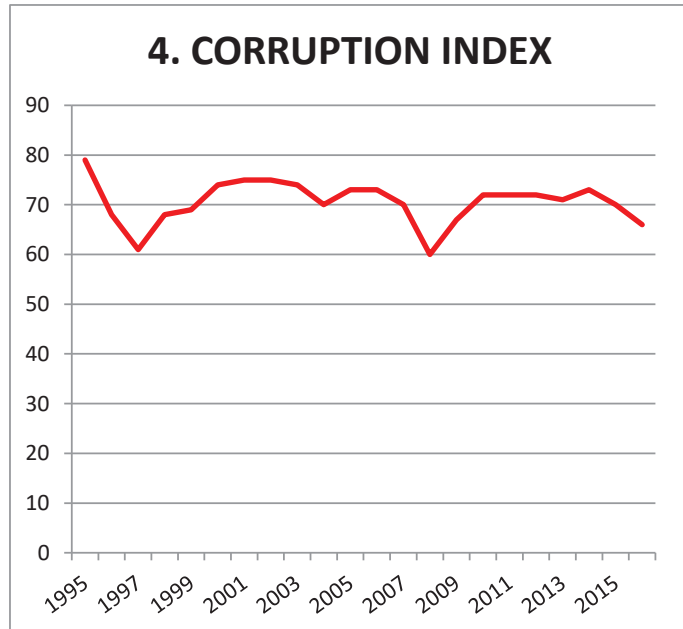
3. UNEMPLOYMENT

year	%
1999	9,8
2000	9,2
2001	9,1
2002	8,9
2003	8,5
2004	8,8
2005	8,0
2006	7,7
2007	7,1
2008	7,8
2009	9,7
2010	8,1
2011	7,1
2012	6,4
2013	5,9
2014	6,4
2015	6,2
2016	6,6



4. CORRUPTION INDEX

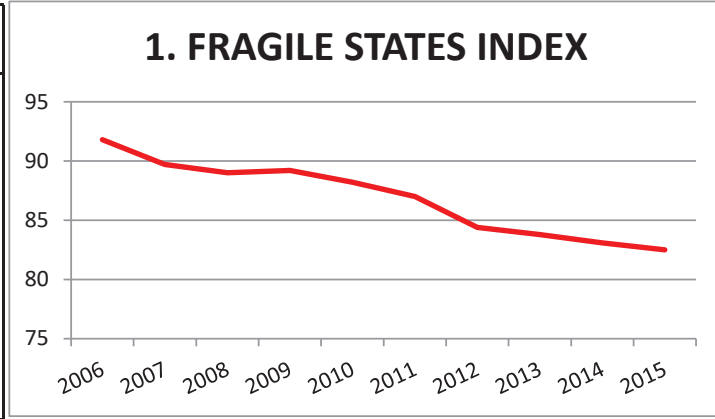
Date	Ranking of the C.	Index of C.
1995	14	79
1996	21	68
1997	23	61
1998	20	68
1999	19	69
2000	18	74
2001	18	75
2002	17	75
2003	20	74
2004	20	70
2005	21	73
2006	20	73
2007	22	70
2008	23	60
2009	25	67
2010	21	72
2011	22	72
2012	20	72
2013	22	71
2014	21	73
2015	23	70
2016	24	66



COLOMBIA

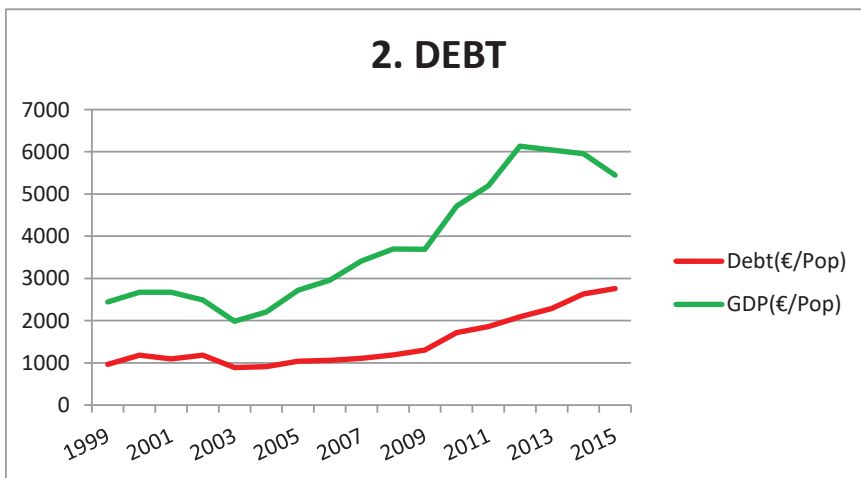
1. FRAGILE STATES INDEX

Year	Fragility ranking	Fragility index
2006	27	91,8
2007	33	89,7
2008	37	89
2009	41	89,2
2010	46	88,2
2011	44	87
2012	52	84,4
2013	57	83,8
2014	59	83,1
2015	61	82,5



2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	38475	966	97355	2445	39,5
2000	47797	1183	108137	2676	44,2
2001	44768	1092	109648	2675	40,8
2002	48991	1178	103581	2492	47,3
2003	37452	888	83668	1985	44,8
2004	38815	909	94133	2203	41,2
2005	45036	1040	117794	2721	38,2
2006	46347	1057	129632	2957	35,8
2007	49146	1108	151379	3411	32,5
2008	53359	1188	166101	3699	32,1
2009	59063	1300	167689	3692	35,2
2010	78803	1716	216455	4714	36,4
2011	86145	1856	240975	5193	35,7
2012	97941	2089	287539	6133	34,1
2013	108148	2284	286251	6046	37,8
2014	125918	2635	284775	5959	44,2
2015	133115	2760	262758	5448	50,7
2016					



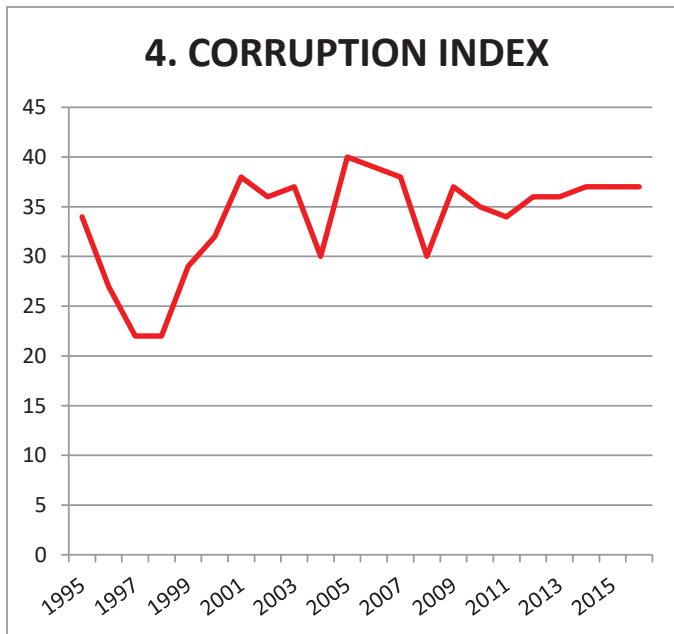
3. UNEMPLOYMENT

year	%
1999	20,1
2000	20,1
2001	15,0
2002	15,6
2003	14,2
2004	13,7
2005	11,9
2006	11,7
2007	11,2
2008	11,3
2009	12,1
2010	11,8
2011	10,9
2012	10,4
2013	9,7
2014	9,2
2015	9,0
2016	9,9



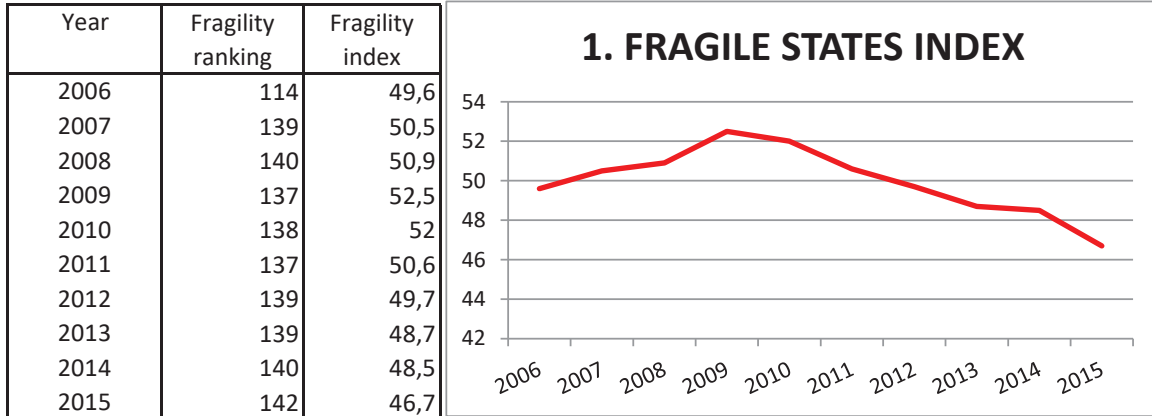
4. CORRUPTION INDEX

Date	Ranking of the C.	Index of C.
1995	31	34
1996	42	27
1997	50	22
1998	79	22
1999	72	29
2000	60	32
2001	50	38
2002	57	36
2003	59	37
2004	60	30
2005	55	40
2006	59	39
2007	68	38
2008	70	30
2009	75	37
2010	78	35
2011	80	34
2012	94	36
2013	94	36
2014	94	37
2015	83	37
2016	90	37



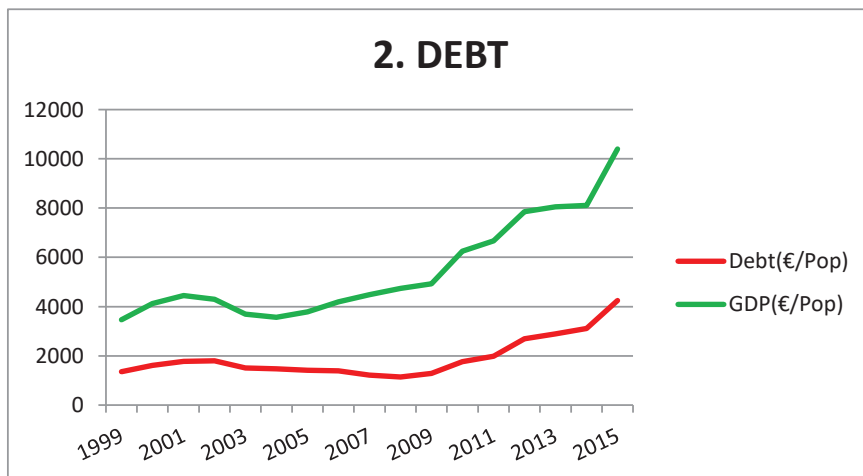
COSTA RICA

1. FRAGILE STATES INDEX



2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	5215	1355	13334	3465	39,1
2000	6319	1610	16203	4128	39,0
2001	7079	1771	17787	4450	39,8
2002	7283	1792	17476	4301	41,7
2003	6204	1504	15223	3690	40,8
2004	6144	1467	14922	3564	41,2
2005	6014	1416	16071	3783	37,4
2006	5984	1389	18046	4188	33,2
2007	5304	1214	19596	4485	27,1
2008	5048	1140	20971	4734	24,1
2009	5780	1288	22101	4924	26,2
2010	8034	1768	28388	6246	28,3
2011	9149	1989	30688	6671	29,8
2012	12507	2687	36569	7857	34,2
2013	13579	2885	37893	8051	35,8
2014	14793	3109	38585	8110	38,3
2015	20413	4246	50000	10400	40,8
2016					



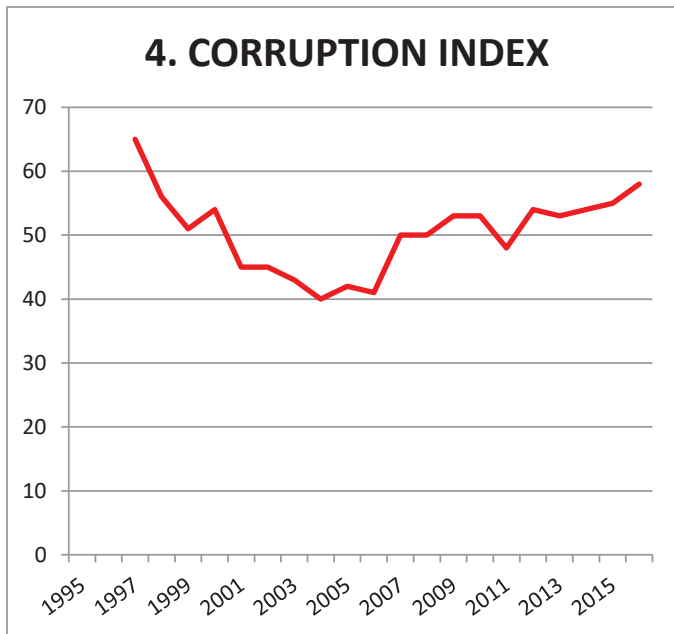
3. UNEMPLOYMENT

year	%
1999	5,9
2000	5,1
2001	5,9
2002	6,3
2003	6,6
2004	6,4
2005	6,6
2006	5,7
2007	4,5
2008	4,8
2009	7,7
2010	8,9
2011	10,3
2012	10,2
2013	9,4
2014	9,6
2015	9,6
2016	9,0



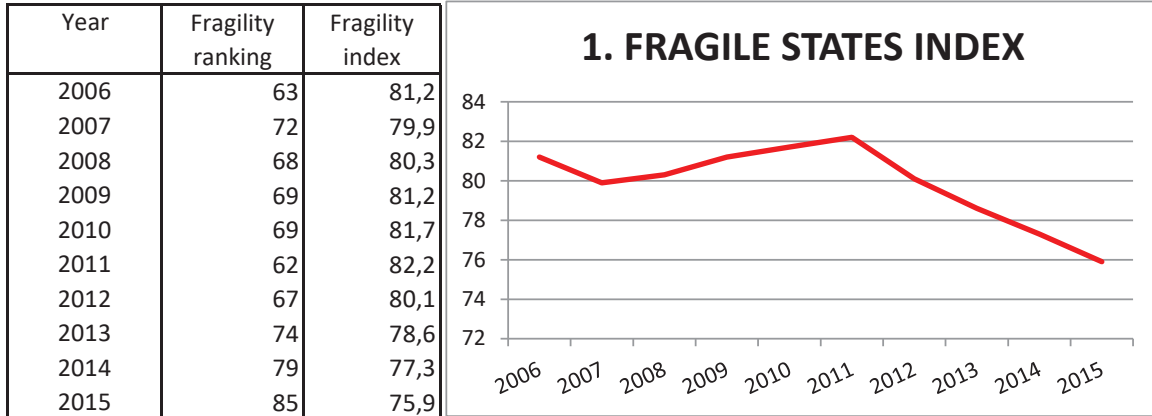
4. CORRUPTION INDEX

Date	Ranking of the C.	Index of C.
1995	31	
1996	42	
1997	50	65
1998	79	56
1999	72	51
2000	60	54
2001	50	45
2002	57	45
2003	59	43
2004	60	40
2005	55	42
2006	59	41
2007	68	50
2008	70	50
2009	75	53
2010	78	53
2011	80	48
2012	94	54
2013	94	53
2014	94	54
2015	83	55
2016	90	58



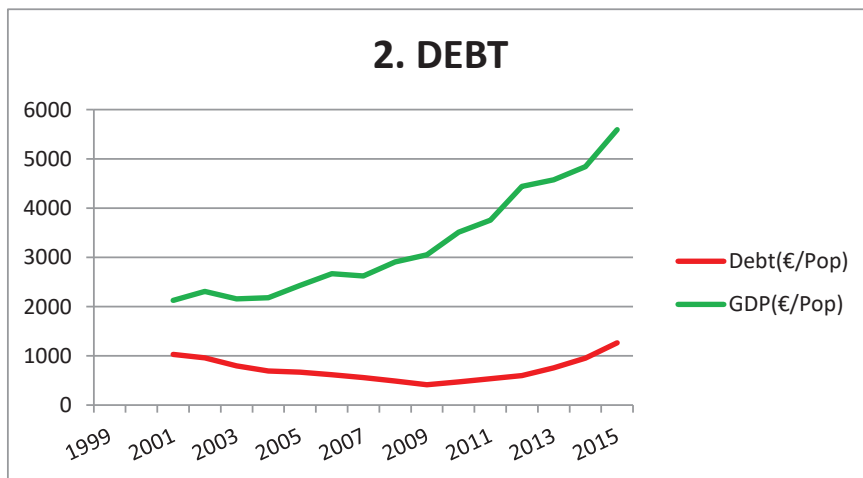
ECUADOR

1. FRAGILE STATES INDEX



2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999					
2000					
2001	13219	1028	27320	2126	48,4
2002	12542	959	30191	2310	41,5
2003	10612	799	28671	2157	37,0
2004	9369	694	29417	2177	31,8
2005	9209	670	33363	2429	27,6
2006	8575	614	37275	2669	23,0
2007	7947	559	37219	2620	21,4
2008	7020	486	41993	2907	16,7
2009	6064	413	44824	3051	13,5
2010	6991	468	52467	3513	13,3
2011	8103	534	56952	3752	14,2
2012	9236	599	68435	4438	13,5
2013	11797	753	71629	4574	16,5
2014	15152	953	76998	4842	19,7
2015	20410	1264	90290	5593	22,6
2016					



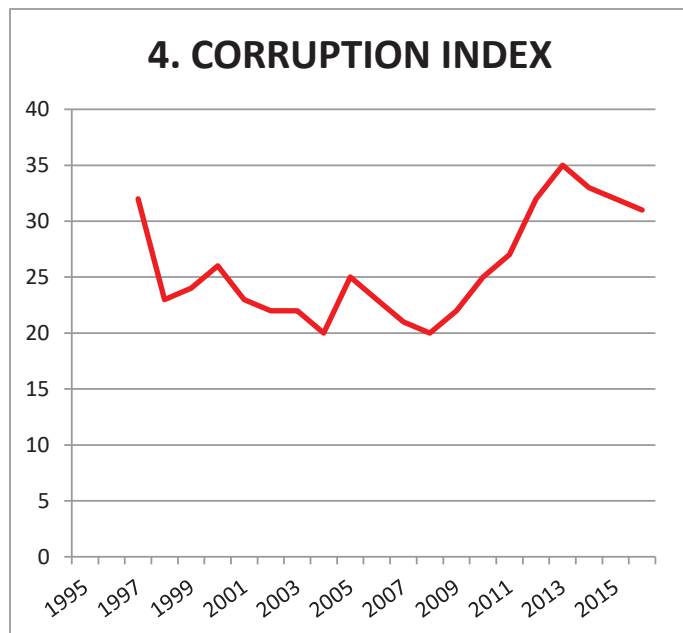
3. UNEMPLOYMENT

year	%
1999	14,4
2000	9,0
2001	10,7
2002	9,1
2003	11,4
2004	8,6
2005	7,7
2006	7,7
2007	6,1
2008	7,3
2009	6,5
2010	5,0
2011	4,2
2012	4,1
2013	4,2
2014	3,8
2015	4,8
2016	5,4



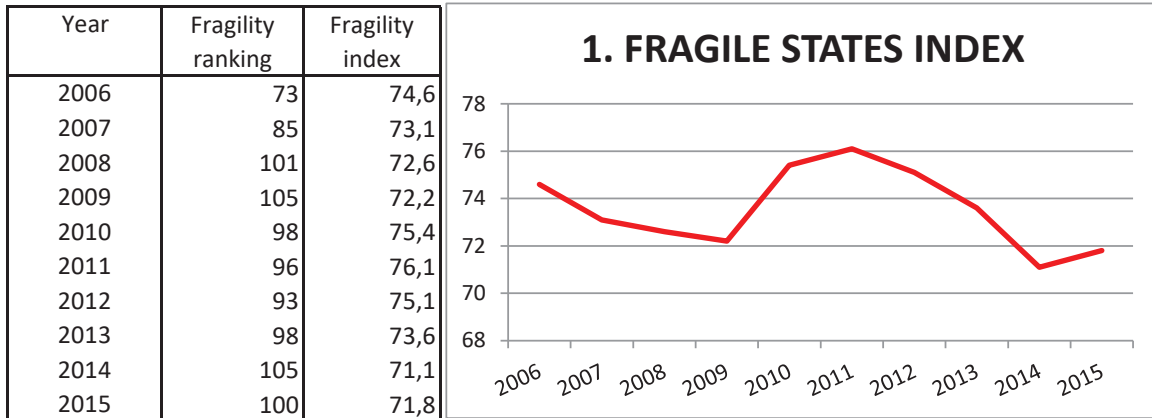
4. CORRUPTION INDEX

Date	Ranking of the C.	Index of C.
1995		
1996		
1997	39	32
1998	77	23
1999	82	24
2000	74	26
2001	79	23
2002	89	22
2003	113	22
2004	112	20
2005	117	25
2006	138	23
2007	150	21
2008	151	20
2009	146	22
2010	127	25
2011	120	27
2012	118	32
2013	102	35
2014	110	33
2015	107	32
2016	120	31



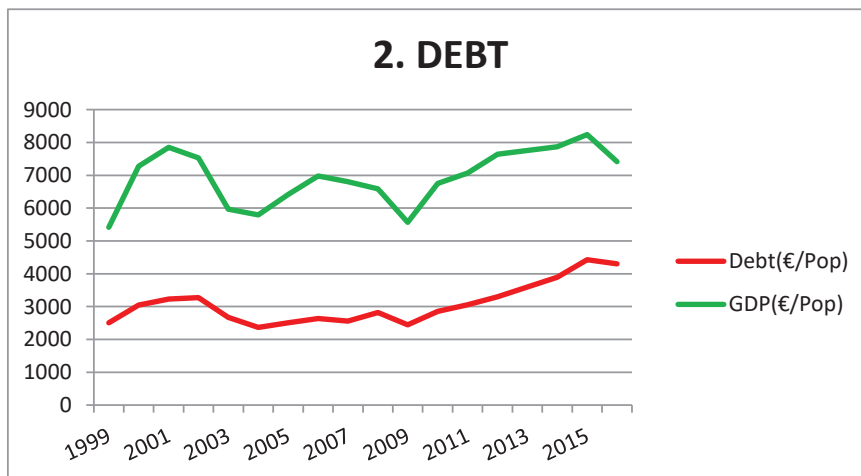
MEXICO

1. FRAGILE STATES INDEX



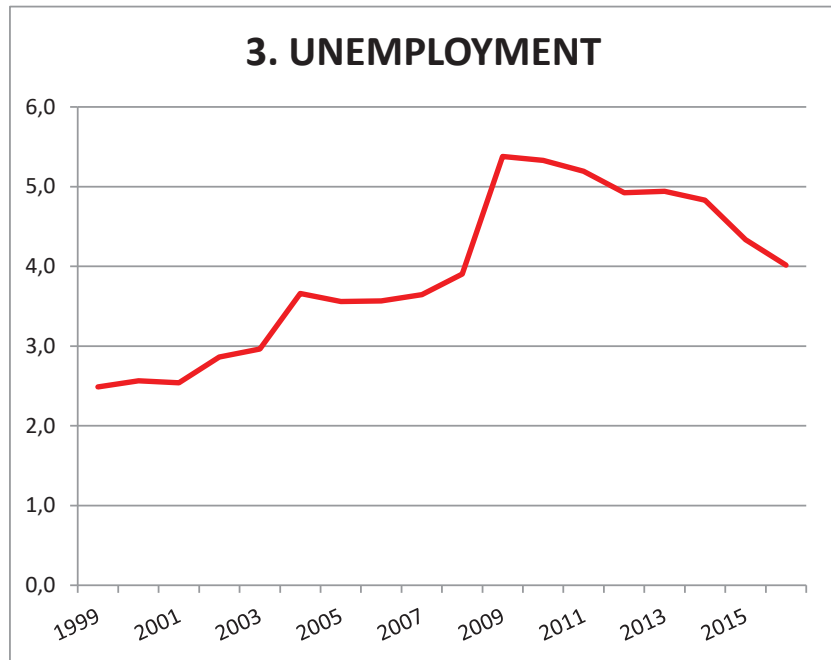
2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	251582	2508	543168	5415	46,3
2000	309632	3044	739861	7274	41,9
2001	332647	3227	809161	7851	41,1
2002	341298	3271	785202	7524	43,5
2003	282248	2672	630763	5971	44,7
2004	253046	2365	619533	5790	40,8
2005	271352	2502	695438	6411	39,0
2006	290699	2641	768751	6983	37,8
2007	285748	2555	761305	6807	37,5
2008	320474	2820	748294	6584	42,8
2009	282237	2443	642555	5563	43,9
2010	334530	2851	792172	6752	42,2
2011	363621	3053	841728	7068	43,2
2012	398474	3298	923011	7639	43,2
2013	440426	3594	950176	7754	46,4
2014	483568	3893	977090	7866	49,5
2015	557342	4427	1037321	8240	53,7
2016	549146	4306	945228	7411	58,1



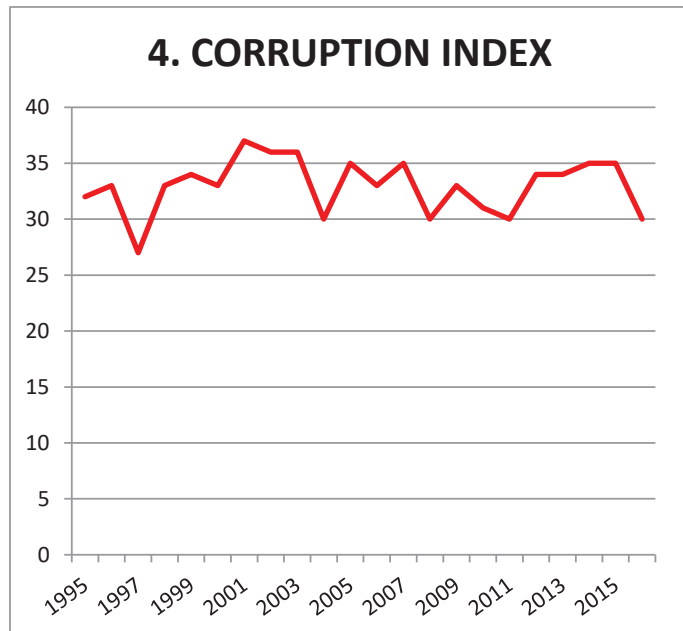
3. UNEMPLOYMENT

year	%
1999	2,5
2000	2,6
2001	2,5
2002	2,9
2003	3,0
2004	3,7
2005	3,6
2006	3,6
2007	3,6
2008	3,9
2009	5,4
2010	5,3
2011	5,2
2012	4,9
2013	4,9
2014	4,8
2015	4,3
2016	4,0



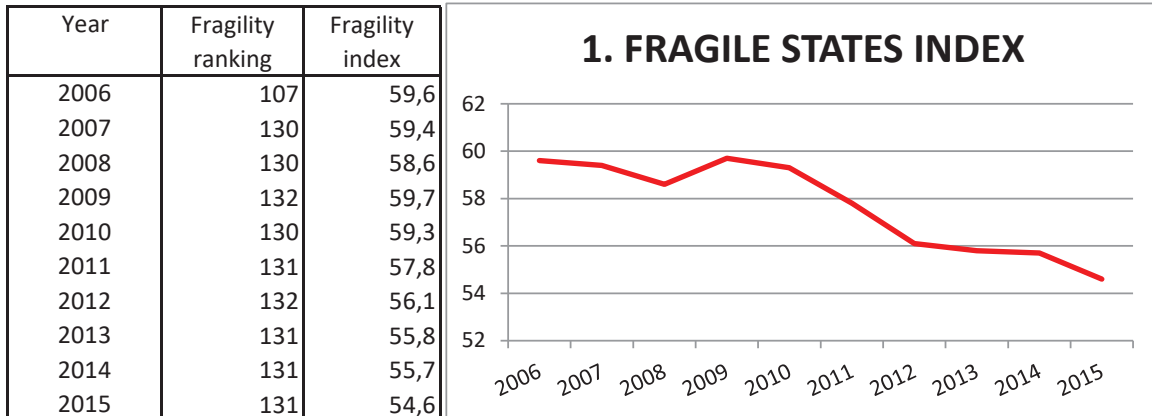
4. CORRUPTION INDEX

Date	Ranking of the C.	Index of C.
1995	32	32
1996	38	33
1997	47	27
1998	55	33
1999	58	34
2000	59	33
2001	51	37
2002	57	36
2003	64	36
2004	64	30
2005	65	35
2006	70	33
2007	72	35
2008	72	30
2009	89	33
2010	98	31
2011	100	30
2012	105	34
2013	106	34
2014	103	35
2015	95	35
2016	123	30



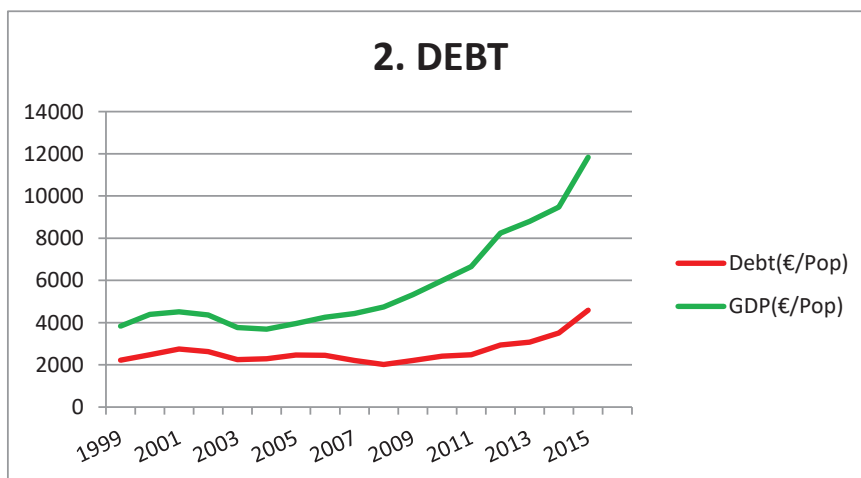
PANAMA

1. FRAGILE STATES INDEX



2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
1999	6604	2223	11381	3830	58,0
2000	7515	2480	13322	4396	56,4
2001	8500	2751	13959	4518	60,9
2002	8257	2622	13742	4364	60,1
2003	7203	2245	12106	3772	59,5
2004	7475	2286	12069	3691	61,9
2005	8213	2466	13161	3952	62,4
2006	8330	2456	14451	4260	57,6
2007	7640	2212	15292	4428	50,0
2008	7092	2017	16673	4742	42,5
2009	7883	2202	19067	5327	41,3
2010	8763	2405	21813	5987	40,2
2011	9209	2484	24694	6660	37,3
2012	11096	2941	31098	8242	35,7
2013	11809	3076	33775	8799	35,0
2014	13719	3514	37009	9480	37,1
2015	18215	4589	46987	11838	38,8
2016					



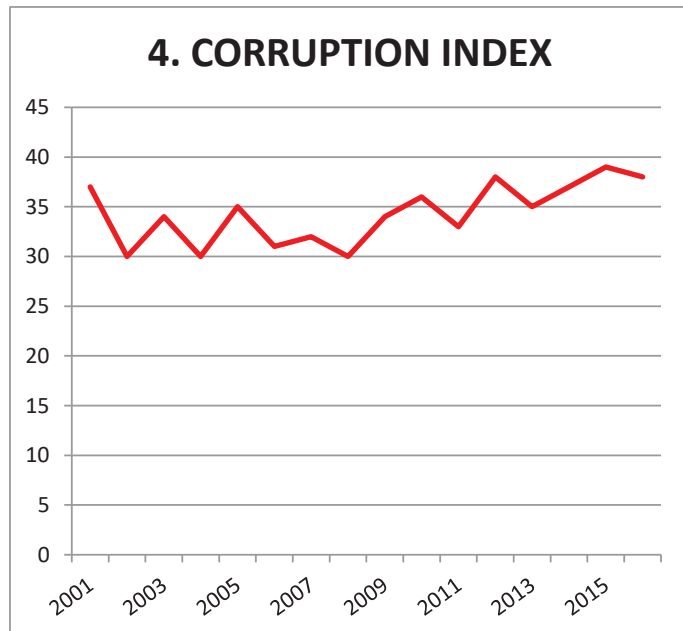
3. UNEMPLOYMENT

year	%
1999	11,8
2000	13,1
2001	14,0
2002	13,5
2003	13,0
2004	11,7
2005	9,8
2006	8,7
2007	6,4
2008	5,6
2009	6,6
2010	6,5
2011	4,5
2012	4,1
2013	4,1
2014	4,8
2015	5,3
2016	5,8



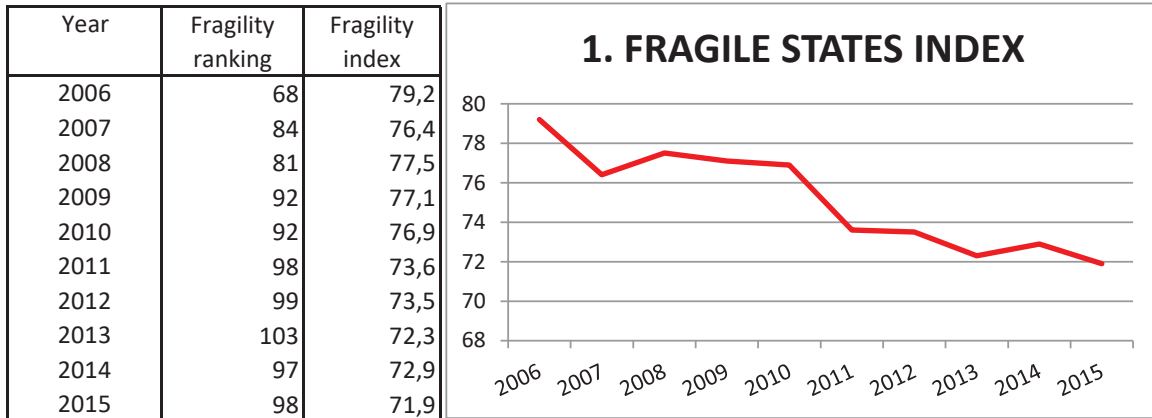
4. CORRUPTION INDEX

Date	Ranking of the C.	Index of C.
1995		
1996		
1997		
1998		
1999		
2000		
2001	51	37
2002	67	30
2003	66	34
2004	62	30
2005	65	35
2006	84	31
2007	94	32
2008	85	30
2009	84	34
2010	73	36
2011	86	33
2012	83	38
2013	102	35
2014	94	37
2015	72	39
2016	87	38



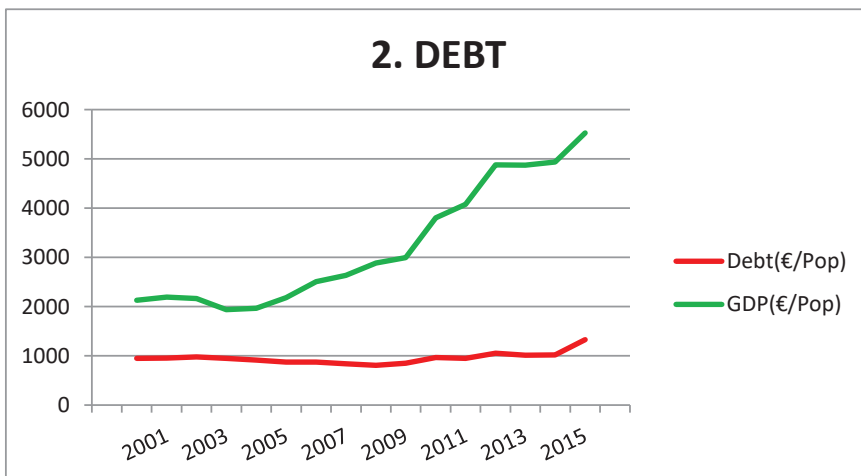
PERU

1. FRAGILE STATES INDEX



2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
2000	24503	946	55224	2131	44,4
2001	24983	951	57630	2194	43,4
2002	25972	976	57584	2165	45,1
2003	25559	949	52197	1938	49,0
2004	24858	911	53630	1966	46,4
2005	24049	871	60260	2183	39,9
2006	24337	871	69996	2504	34,8
2007	23760	840	74562	2635	31,9
2008	23106	807	82670	2886	27,9
2009	24705	852	86764	2992	28,5
2010	28442	968	111650	3801	25,5
2011	28230	949	121244	4074	23,3
2012	31765	1053	147123	4878	21,6
2013	30929	1012	148984	4874	20,8
2014	31613	1021	152820	4934	20,7
2015	41675	1328	173403	5526	24,0



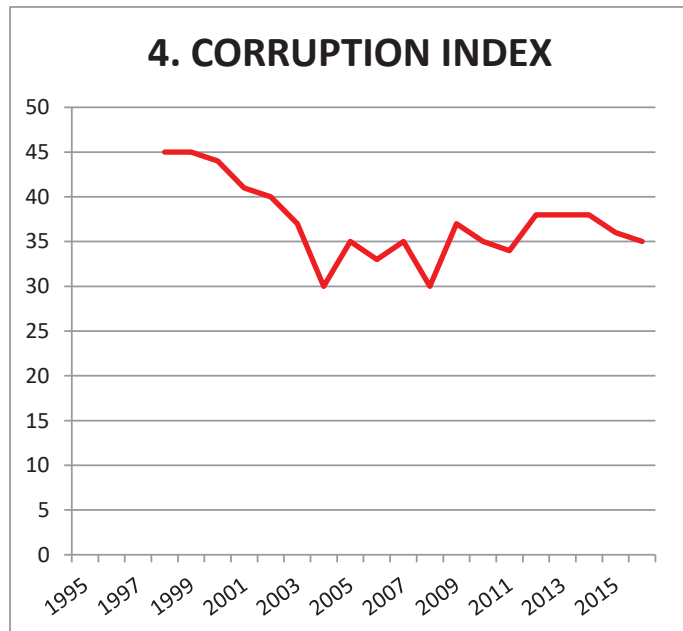
3. UNEMPLOYMENT

year	%
1999	8,0
2000	7,3
2001	7,9
2002	7,7
2003	8,3
2004	9,0
2005	8,3
2006	7,2
2007	6,5
2008	6,6
2009	4,4
2010	4,0
2011	3,9
2012	3,6
2013	4,0
2014	4,1
2015	4,4
2016	4,9



4. CORRUPTION INDEX

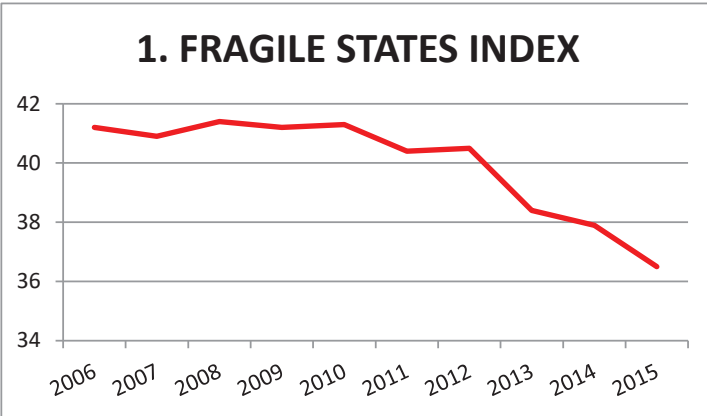
Date	Ranking of the C.	Index of C.
1995		
1996		
1997		
1998	41	45
1999	40	45
2000	41	44
2001	44	41
2002	45	40
2003	59	37
2004	67	30
2005	65	35
2006	70	33
2007	72	35
2008	72	30
2009	75	37
2010	78	35
2011	80	34
2012	83	38
2013	83	38
2014	85	38
2015	88	36
2016	101	35



URUGUAY

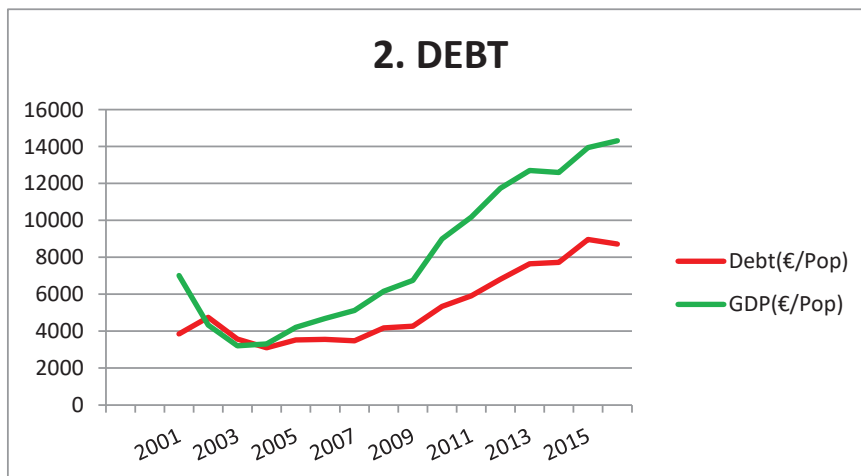
1. FRAGILE STATES INDEX

Year	Fragility ranking	Fragility index
2006	120	41,2
2007	150	40,9
2008	151	41,4
2009	154	41,2
2010	153	41,3
2011	153	40,4
2012	154	40,5
2013	155	38,4
2014	155	37,9
2015	155	36,5



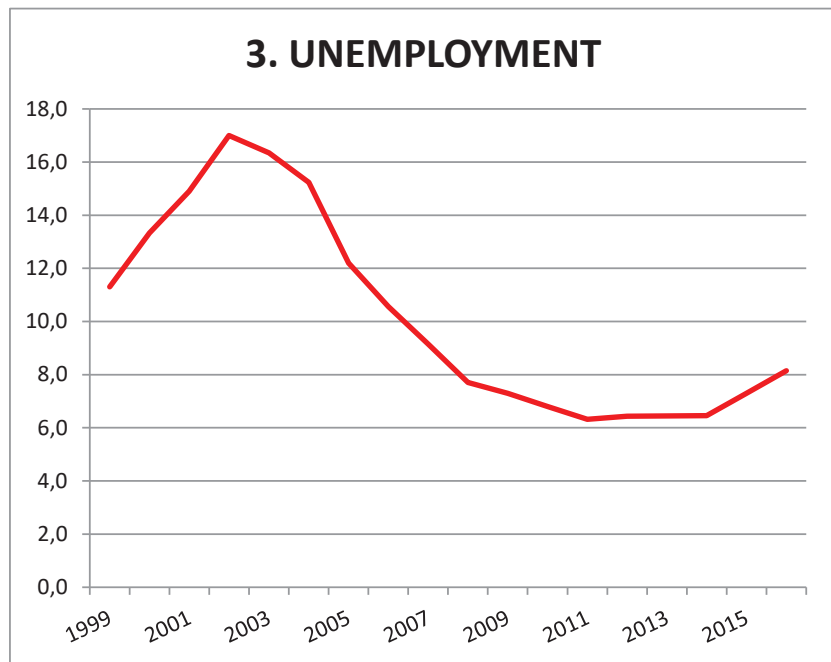
2. DEBT

Year	Debt(M.€)	Debt(€/Pop)	GDP(M.€)	GDP(€/Pop)	% GDP
2000					
2001	12813	3851	23344	7016	54,9
2002	15817	4753	14416	4332	109,7
2003	11903	3579	10667	3208	111,6
2004	10314	3103	11020	3315	93,6
2005	11720	3524	13984	4205	83,8
2006	11828	3551	15626	4691	75,7
2007	11637	3484	17119	5126	68,0
2008	13978	4172	20646	6161	67,7
2009	14344	4266	22699	6750	63,2
2010	18038	5346	30388	9005	59,4
2011	20026	5915	34455	10177	58,1
2012	23133	6810	39902	11747	58,0
2013	26070	7650	43318	12711	60,2
2014	26448	7734	43083	12599	61,4
2015	30774	8968	47866	13949	64,3
	30043	8723	49297	14314	60,9



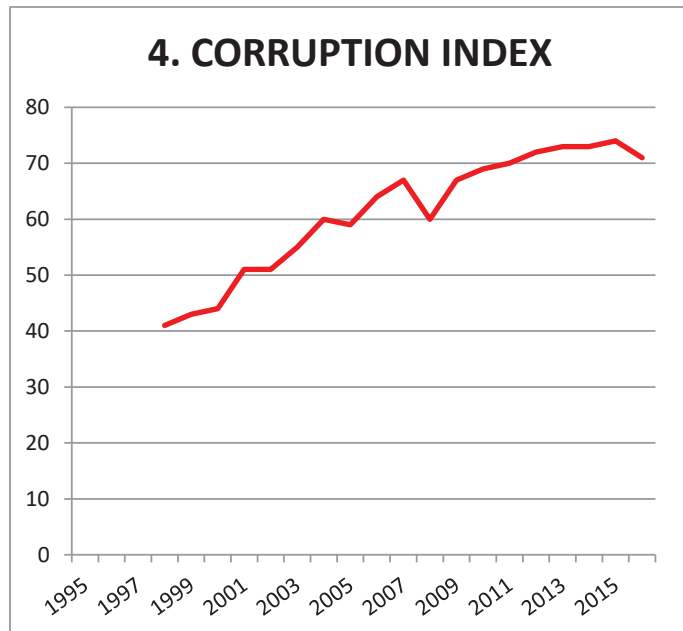
3. UNEMPLOYMENT

year	%
1999	11,3
2000	13,3
2001	14,9
2002	17,0
2003	16,4
2004	15,2
2005	12,2
2006	10,6
2007	9,1
2008	7,7
2009	7,3
2010	6,8
2011	6,3
2012	6,4
2013	6,4
2014	6,5
2015	7,3
2016	8,2



4. CORRUPTION INDEX

Date	Ranking of the C.	Index of C.
1995		
1996		
1997		
1998	35	41
1999	42	43
2000	41	44
2001	35	51
2002	32	51
2003	33	55
2004	28	60
2005	32	59
2006	28	64
2007	25	67
2008	23	60
2009	25	67
2010	24	69
2011	25	70
2012	20	72
2013	19	73
2014	21	73
2015	21	74
2016	21	71



Mosler method results: Argentina

	SCORE
ARGENTINA	48
FRAGILE STATES INDEX	24
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	4
c) Quantifying the risk concerned	24
DEBT	48
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	4
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	8
c) Quantifying the risk concerned	48
UNEMPLOYMENT	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72
CORRUPTION INDEX	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48

Mosler method results: Chile

	SCORE
CHILE	42
FRAGILE STATES INDEX	12
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	2
c) Quantifying the risk concerned	12
DEBT	12
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	2
c) Quantifying the risk concerned	12
UNEMPLOYMENT	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72
CORRUPTION INDEX	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72

Mosler method results: Colombia

	SCORE
COLOMBIA	54
FRAGILE STATES INDEX	48
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	4
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	8
c) Quantifying the risk concerned	48
DEBT	48
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	4
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	8
c) Quantifying the risk concerned	48
UNEMPLOYMENT	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72
CORRUPTION INDEX	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48

Mosler method results: Costa Rica

	SCORE
COSTA RICA	42
FRAGILE STATES INDEX	12
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	2
c) Quantifying the risk concerned	12
DEBT	36
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	6
c) Quantifying the risk concerned	36
UNEMPLOYMENT	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48
CORRUPTION INDEX	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72

Mosler method results: Ecuador

	SCORE
ECUADOR	33
FRAGILE STATES INDEX	36
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	6
c) Quantifying the risk concerned	36
DEBT	24
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	4
c) Quantifying the risk concerned	24
UNEMPLOYMENT	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48
CORRUPTION INDEX	24
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	3
c) Quantifying the risk concerned	24

Mosler method results: Mexico

	SCORE
MEXICO	36
FRAGILE STATES INDEX	48
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	4
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	8
c) Quantifying the risk concerned	48
DEBT	48
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	4
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	8
c) Quantifying the risk concerned	48
UNEMPLOYMENT	24
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	3
c) Quantifying the risk concerned	24
CORRUPTION INDEX	24
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	3
c) Quantifying the risk concerned	24

Mosler method results: Panama

	SCORE
PANAMA	39
FRAGILE STATES INDEX	24
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	4
c) Quantifying the risk concerned	24
DEBT	36
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	6
c) Quantifying the risk concerned	36
UNEMPLOYMENT	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48
CORRUPTION INDEX	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48

Mosler method results: Peru

	SCORE
PERU	39
FRAGILE STATES INDEX	36
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	6
c) Quantifying the risk concerned	36
DEBT	24
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	4
c) Quantifying the risk concerned	24
UNEMPLOYMENT	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48
CORRUPTION INDEX	48
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	2
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	6
c) Quantifying the risk concerned	48

Mosler method results: Uruguay

	SCORE
URUGUAY	51
FRAGILE STATES INDEX	12
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	1
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	2
c) Quantifying the risk concerned	12
DEBT	48
Function criteria (F)	2
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	4
Vulnerability criteria (V)	2
a) Risk character "C"	6
b) Probability "Pb"	8
c) Quantifying the risk concerned	48
UNEMPLOYMENT	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72
CORRUPTION INDEX	72
Function criteria (F)	3
Substitution criteria (S)	2
Criterion Profundity (P)	2
Criterion Extending (E)	1
Criterion of aggression (A)	3
Vulnerability criteria (V)	3
a) Risk character "C"	8
b) Probability "Pb"	9
c) Quantifying the risk concerned	72