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Evaluating the Impact of a New Product on the Sales of other Products

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Abstract

The purpose of this article is to evaluate the impact of a new product on the sales of other products. Launching a new product may lead to increase or decrease of sales in the products of the same group. Customers may continue buying standard products or they may be oriented to new products. New products may cause internal competition. Statistical methods are applied. Time series analysis is used. Transactional database of a confectionary factory is the main source of data. The time series analysis is carried in two datasets – quantities of sales of three products on a daily basis and on a monthly basis. The main methods used are time series analysis and regression analysis. The three time series (corresponding to the three products) are separated into two parts – before and after launching the new product. It is proved that the new product does not affect the sales of the two other products. The new product is well accepted and its sales increase together with the sales of the two other products.

Keywords: launching a new product, sales analysis, forecasting, time series analysis, SPSS, transactional sales database, data transformations, SQL

Introduction

Sales analysis consists of a lot of techniques. Many methodologies have been developed to forecast sales. Building a model

with several independent variables and one independent variable (usually the quantity of future sales) gives a vague idea of what happens in real life. Usually regression analysis is applied to find a trend – the dependency of sales on time. It should be marked that all models have an error. The error shows that other factors influence sales, but they are not included in the model.

Launching a new product is a creative technique. New products are invented because the life of people changes. Some people die, other people are born, other people start working. The change of generations leads to an inevitable change in the portfolio of products. A new product may be well accepted by the market or it may be rejected. Sometimes the logistics curve (or logistics function) is used by marketing specialists to describe the lifecycle of a new product. Since the market is very sensitive to all changes there may be a slight difference between textbooks and business.

Forecasting of sales is widely discussed and described. The launch of a new product starts generating transactional data. Since the product is new, the transactional database does not contain enough historical data to predict sales. Moreover the real trend may not be noticed graphically. Seasonal decomposition could not be done.

Literature review

Conventional retail markets are known to be quite different from electronic markets. Ahluwalia et al. (2013) examine the effect on pricing in relation to proximity to a culturally and socially significant peak shopping day [7]. They study the effects of consumer's product rating, product popularity, and featured product website rankings. This study is based on a real case study. Data are extracted from a B2C retailer. Some articles (Brent et al., 2014, Singh and Das, 2013) focus on salesperson turnover [2], [8]. Their study uses database collected from ten different firms. Discriminant analysis is used.

Sales analysis is often connected with analysis of seasonal variations. Andy et al. (2013) try to identify seasonal variations in store-level visitor grocery demand [1]. Store trading information is used. Spatial analysis is applied. The authors prove a significant degree of seasonality in terms of their revenue.

New product development is widely studied. Lofsten (2014) studies the product innovation processes. He finds determinants of

product innovation processes [4]. The author tests the relationship between innovation performance and business performance (sales and profitability).

Some authors (Rojas-Mendez and Rod, 2013) use face-to-face survey questionnaires to analyze sales of wine producers [5]. They compare two different instruments for assessing market orientation. Food supply chains and small producers in confectionary factories are studied by Ogelthorpe and Heron (2013). They try to identify the observable operational and supply chain barriers and constraints that occur in local food supply chains [3].

New products usually affect sales of other products. Mokhtar (2013) investigates the relationship between customer focus and new product performance [9]. Data are collected using mail questionnaire survey approach. The results revealed that customer focus has a statistically significant association with new product performance. Graner and Missler-Behr (2013) try to find key determinants of the successful adoption of new product development methods [6]. Their article adopts a structural equation modeling approach and analyzes the subject based on a large empirical sample of 410 product development projects.

Data preparation

For the sake of the analysis of the impact of a new product in a confectionary factory, transactional data for sales are used. The period is January 2011 until May 2013. The new product is croissant with chocolate, launched on 30 March 2012. The two other products are croissant with Turkish delight and croissant with marmalade (launched on 14 January 2011). We do not use questionnaires. We use transactional data to monitor sales. The transactional database consists of 332 000 records. The extraction of data starts with Query 1. The result of its execution is given in Table 1.

Table no.1. Extracting the first date of launching products

Code_item	Name_item	First Ofdate
189	Croissant with Turkish delight	14 January 2011
190	Croissant with chocolate	30 March 2012
191	Croissant with marmalade	14 January 2011

The SQL code for getting the initial information is the following:

```
SELECT Sales_transactions.code_item, Items.name_item,
First(Sales_transactions.date_doc) AS FirstOfdate_doc
FROM Items INNER JOIN Sales_transactions ON Items.code_item =
Sales_transactions.code_item
GROUP BY Sales_transactions.code_item, Items.name_item
HAVING (((Sales_transactions.code_item)=189)) OR
(((Sales_transactions.code_item)=190)) OR
(((Sales_transactions.code_item)=191))
ORDER BY Sales_transactions.code_item,
First(Sales_transactions.date_doc);
```

Now we have three time series – for the sales of three products. We have to monitor sales of items 189 and 191 before and after 30 March 2012. The new product is 190. Since the data in the database consists of transactional data, we have to extract data by using select queries. We use only sold quantities. We do not use values of sales.

Table no.2. A part of the result dataset of “Total sales by dates for article number

Date	Total quantity
14.1.2011	19
16.1.2011	27
17.1.2011	29
18.1.2011	20
19.1.2011	32
21.1.2011	18

The SQL code is the following:

```
SELECT Sales_transactions.[date_doc],
Sum(Sales_transactions.[quantity]) AS SumOfquantity
FROM Sales_transactions
WHERE (((Sales_transactions.[code_item])=189))
GROUP BY Sales_transactions.[date_doc];
```

As it is obvious, the last SQL query gives a two dimensional dataset for sales. For those dates with zero sales no rows are added in the resulting dataset. So, some transformations in MS Excel may be made to fix this problem. By changing the string “189” to “190” and “191” we make two more select queries to extract time series for sales for items 190 and 191. But the problem with zero sales on some days exists. The result of the three queries is exported to MS Excel on a single worksheet. In a separate column all dates from 14 Jan 2011 until 5 May 2013 are filled automatically (844 days). By using the VLOOKUP function three new time series are created. They continue zero and non-zero values for sold quantities, for each date

We use three named ranges (SKU_189, SKU_190 and SKU_191). The first and the third data range consist of 819 rows and the second one, 396 rows. The formula for extracting zero and non-zero quantities is the following:

$$=IF(ISERROR(VLOOKUP(A3;SKU_189;2;FALSE));0;VLOOKUP(A3;SKU_189;2;FALSE))$$

Now the three new data series consist of 844 values – one value for each day. Each data series represents one stock keeping unit (SKU)

Table no. 3. A part of the three new data series

dates	SKU 189	SKU 190	SKU 191
14.1.2011	19	0	14
15.1.2011	0	0	0
16.1.2011	27	0	14
17.1.2011	29	0	25
18.1.2011	20	0	19
19.1.2011	32	0	40
20.1.2011	0	0	0
21.1.2011	18	0	28

Analyzing daily datasets in SPSS

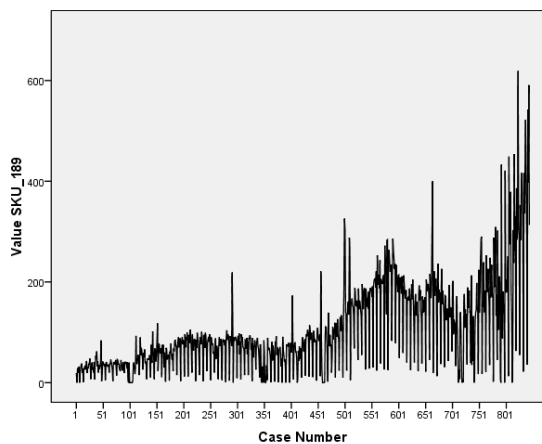
The three data series contain numeric values. They may be exported from MS Excel and imported into SPSS [10]. Three variables are defined in SPSS – SKU_189, SKU_190 and SKU_191. All of them are on an interval scale. A string variable with dates is added in SPSS. It is recommended to use the natural logarithm function (ln) and seasonal decomposition before analyzing data series with time series analysis and building regression models. Our assumption is that a new product affects the sales of common products. The effect may be positive, the sales of two other products may increase or decrease or there may be no influence.

We have enough data to make the analysis. The period from 14.1.2011 until 6.5.2013 may be divided into two sub periods – before 30.3.2012 (the launch of the new product) and after this date. We may use also case number (case numbers 1-441 are before launching the new product) to filter data series. Since we have a time series dataset, we have to define dates (Data/Define dates).

Three line charts may be made (before using the logarithmic function and seasonal decomposition) to see whether there is a trend in each time series.

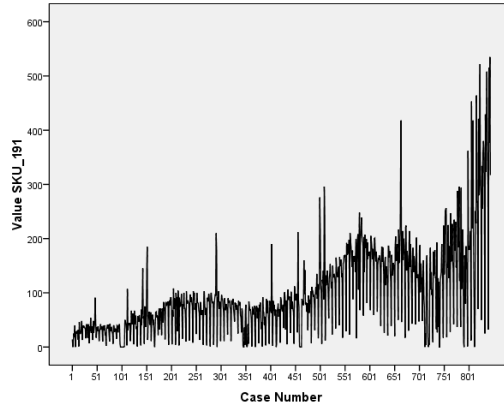
Simple charts and values of individual cases are presented below.

Fig. no. 1. Line chart of SKU_189



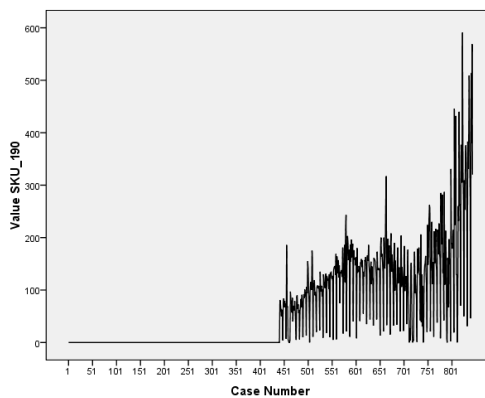
It is obvious that there is a trend and sales of SKU 189 increase after case number 441.

Fig. no. 2. Line chart of SKU_191



It is obvious that there is a trend in SKU 191. Again the sales start to increase after case number 441. The graphs of SKU 181 and SKU 191 are almost the same.

Fig. no. 3. Line chart of SKU_190 (the new product)



The left part of the graph represents the period when the product was not launched. There is a trend for increasing of sales. It is obvious.

As a new product its sales are similar to the logistic function representing the launch of a new product.

The three time series seem to be correlated. It has to be checked for correlation. The check should be made for the two sub periods. First, we start with the first sub period (Data/Select Cases). We use selection of cases based on a satisfied condition ($DAY_{\leq 441}$). Then the existence of correlation is checked (Analyze/Correlate/Bivariate). Since the values in the three time series are in an interval scale, the Pearson correlation coefficient may be used. Two-tailed test of significance is made. The correlation between SKU 189 and SKU 191 is 0.915. The correlation is significant at 0.01 level (2-tailed).

Curve estimation may be made to check if the quantity of sales (of SKU 189 and SKU 191) depends on time (Analyze/Regression/Curve estimation). ANOVA tables are displayed. The constant is included in the equation. SPSS says that 17 cells have zero values so the compound, power, S, growth, exponential and logistic models cannot be calculated. All calculated models have R-square value less than 0.2. It means that it is almost impossible to create an equation which best represents the quantity of sales based on time for the first period.

The check for correlation between the three time series has to be made for the second sub period (cases > 441). Again a check for correlation is made. The correlation between SKU 189 and SKU 191 is 0.965 – even a higher value than the first sub period. The correlation between SKU 190 and SKU 189 is 0.949. The correlation between SKU 190 and SKU 191 is 0.974. The correlation coefficients are significant at 0.01 level (2-tailed). It means that when sold quantities of one of the three products increase, there is a great possibility the sales of the two other products two increase. Again curve estimation may be made for the three time series for the second sub period. ANOVA tables are displayed. The constant is included in the equation. The highest R-square value is for the cubic function (0.331) but it is not very high to make a meaningful equation. By excluding the constant in equation the highest value of R-square has the cubic function (0.812).

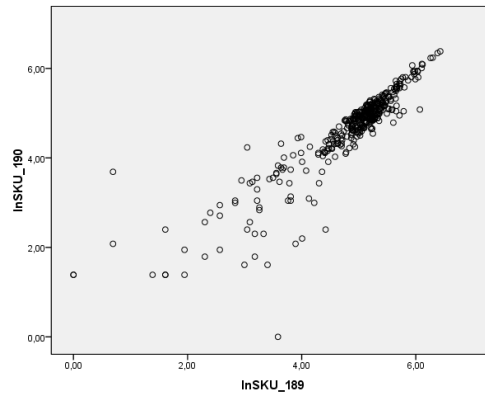
Regression analysis is a common technique for analyzing economic phenomena. Before applying regression analysis the trend has to be removed and seasonal decomposition has to be made. All cases have been selected. A natural logarithm of the three data series is calculated (Transform/Compute variables). Three new data series are

automatically calculated – \ln SKU_189, \ln SKU_190 and \ln SKU_191. Seasonal decomposition is made (Analyze/Forecasting/Seasonal Decomposition). Since we have very detailed data (for daily sales) SPSS says “Seasonal decomposition requires at least one periodic data component to be defined”. If we aggregate data on a monthly basis we will not get this error but we will lose a lot of detailed information. The dispersion in the three initial series is stabilized by calculating the natural logarithm.

A check for autocorrelation has to be made for each time series (Analyze/Forecasting/Autocorrelations). For the three time series (\ln SKU_189, \ln SKU_190 and \ln SKU_191) the partial autocorrelation coefficients (ACF) are outside the upper and the lower confidence limit. It means that there is autocorrelation in the three time series. We have to create a time series by using the first order of the difference function for the three time series \ln SKU_189, \ln SKU_190 and \ln SKU_191 (Transform/Create time series).

Three new time series are created: \ln SKU__189, \ln SKU__190 and \ln SKU__191. Again a check for autocorrelation is made. The partial ACF are again outside the lower and upper confidence limit. So the conclusion is that a mathematical formula for calculating future sales cannot be made. Moreover linear regression for SKU_189 and SKU_191 cannot be done neither for the first, nor for the second sub period. Thus a calculation for the influence of the new product 190 cannot be calculated. Even though sales of the three products are increasing during the second sub period it may not be proved that the increase of sales is caused by launching a new product.

It may be argued that when sales of SKU 189 decrease, we may expect a decrease of sales in SKU 190 (the new product). Since there is a great correlation between these two products the sold quantities may depend on other factors – such as season or location. This dependency may be showed graphically.

Fig. no. 4. Dependency between lnSKU_189 and lnSKU_190

By using curve estimation the linear model may be checked. The independent variable is lnSKU_189 and the dependent variable is lnSKU_190. The R-square value is 0.814. The ANOVA test shows that the model is adequate. The unstandardized coefficient B is 0.903. It is statistically significant. The constant in the equation is 0.274. It is statistically not significant. So the conclusion is that we may do the curve estimation by excluding the constant in equation. Now the R-square value is 0.993. The ANOVA test shows that the model is adequate. The unstandardized coefficient B is 0.957. It is statistically significant. The equation is the following:

$$\text{Ln}(Y) = 0.957 * \text{Ln}(X)$$

Y is the predicted quantity of sales of SKU 190 and X is the quantity of sales of SKU 189. This formula shows that a small change in the sales of SKU 189 affects SKU 190. The coefficient 0.957 is near 1 but less than one. So the items sold by SKU 189 are almost the same as the items sold by SKU 190. The coefficient is below 1 because there is a lag effect or other factors affect sales of the new product.

Table no. 4. Predicted quantities for SKU 190 (variable Y) on the basis of sold quantities for SKU 189 (variable X)

X	ln X	ln Y	Y	Y/X
2	0.693147	0.663342	2	1.0000
4	1.386294	1.326684	4	1.0000
6	1.791759	1.714714	6	1.0000
8	2.079442	1.990026	7	0.8750
10	2.302585	2.203574	9	0.9000
12	2.484907	2.378056	11	0.9167
14	2.639057	2.525578	12	0.8571
16	2.772589	2.653367	14	0.8750
18	2.890372	2.766086	16	0.8889
20	2.995732	2.866916	18	0.9000

The top left corner of the table is situated in C2. The formula for calculating ln X is: “= ln (C3)”. The formula for ln Y is “=D3*0.957”. The formula in Y column is “=ROUND(EXP(1)^E3;0)”. The last column “Y/X” is “=F3/C3”. The last column calculates the slope of the line.

Analyzing monthly datasets in SPSS

Using daily datasets we proved that we could not make regression analysis. By grouping the initial three datasets on a monthly basis, similar calculations may be made. Our prediction is the same. The trend line of sales of SKU 189 changes when launching the new product 190. We will skip the dataset for SKU 191, because we calculated a great correlation between SKU 189 and SKU 191.

Aggregating time series may be done in MS Excel or directly with a SQL query. We will use the first approach. Firstly, we copy the first three columns from table 3 on a separate worksheet. By using the built-in functions “month” and “year”, the month and year of each date is extracted. Data are grouped by a Pivot table. “Year” and “month” are used for row labels. “Sum of SKU 189” and “Sum of SKU 190” are used as summary values.

Now the table in MS Excel consists of 29 rows – starting from January 2011 and ending in May 2013 – one row for each month. Now we use the total sold quantity of each product for each month. We lost a

lot of data but we may make seasonal decomposition and try to make regression analysis for the two periods for SKU 189.

In SPSS we define four variables on an interval scale – year, month, SKU_189 and SKU_190. Dates are defined. Cases are years and months starting from year: 2011 and month: 1. Natural logarithm of both time series is calculated. Seasonal decomposition has to be done. The additive model is used. Seasonal decomposition cannot be done because of missing data for SKU 190 – it is a new product. Seasonal decomposition cannot be done for SKU 189 because at least four full seasons of data must exist.

Now three linear models for SKU 189 have to be tested – for the whole period, before and after launching the new product. The models may be only linear, because we used the logarithmic function.

The first model (for the whole period) including the constant in equation is checked. The R-square value is 0.703. The ANOVA test shows that the model is adequate. The unstandardized coefficient B value is 0.069, the constant is 6.775. Both coefficients are statistically significant. By excluding the constant in equation the R-square value is 0.821. The ANOVA test shows that the model is adequate. The unstandardized coefficient B value is 0.414. It is statistically significant. For the whole period we have increasing sales. The slope of the line is 0.414.

The second model (before launching the new product) including the constant in equation is checked. The R-square value is 0.542. It is comparatively low. The model and the calculated coefficients are significant at Alfa 0.05. Not including the constant in equation the R-square value is 0.813. The model is adequate. The slope of the line is 0.771.

The third model (after launching the product) with constant in equation has a very low value of R-square 0.126. Excluding the constant in equation the R-square value is 0.787. The unstandardized coefficient B (the slope of the line showing the natural logarithm of sales) is 0.813. It is statistically significant.

The local conclusion is the following. Before launching the new product the slope of the line of sales (using the natural logarithm of sold quantities) is 0.771. After launching the product, the slope is 0.813. There is a change in the slope, but we are not sure whether the change is caused by the launching of the new product.

Conclusions

Confectionary factories have a lot of data stored in a transactional database. Transactional databases are mainly used to record sales and organize the logistics activity. In rare cases they may be used for data mining. Launching a new product may cause serious fluctuations in the sales of other products from the same group. In this study three products are monitored. Two of them are sold 844 days. The third one goes out to market on the 441 day. The initial prediction is that the new product affects the sales of the two other products. It is calculated that there is a strong correlation between the three products. As a whole (during the whole period) the sales of the three products increase. The period of 844 days is divided into two parts – before launching the new product and after launching the product. The time series of one of the products is analyzed, because there is a strong correlation between the sales of the three products. Three linear models are estimated – for the whole period, before launching the new product and after launching it. It is proved that the new product does not affect the sales of the two other products. Time series analysis is used. Regression analysis is not applied at its final stage, because of a strong autocorrelation in the three time series. Autocorrelation cannot be removed by standard statistical methods. Future research may focus on extended models where other independent variables are included.

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Determinants of Export Diversification in Nigeria: Any Special Role for Foreign Direct Investment (FDI)?

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Abstract

The importance of export diversification is presently taking a center stage in trade literature. This paper contributed to the evolving literature by examining the extent of export diversification in Nigeria and also analyzed the impact of foreign direct investment on it. Two major methods of export diversification: export count (horizontal) and Herfindahl Index were used. Nigeria's exports flows based on 4-digit SICT product classification were used. The Generalized Moment Methods (GMM) was used to analyze our specified model. Empirical analysis showed that foreign direct investment discourages export diversification in Nigeria, while domestic investment promotes it. Exchange rate and democratic accountability are other factors that discourage export diversification in Nigeria. No evidence was found on the impact of per capita GDP, trade openness and natural resource.

Keywords: Export diversification, Herfindahl Index, Exports Counts

I. Introduction

Before the exploration of Nigeria's crude oil in the 1970s, Nigeria's production and exports of goods were dominated by the agricultural sector. In the three decades following, crude oil did not only become the main source of income, but also account for the highest proportion of exports. The adverse effects of the production and export of crude products has been emphasized in the literature. Export of primary products by the developing countries to the developed nations and import of manufactured products from them makes the developing countries susceptible to cyclical deterioration of terms of trade. The Prebisch-Singer¹ hypothesis states that inter-industry trade widens the income gap between developing and developed nations. This is because the primary products exported by the developing nations experience cyclical deterioration of terms of trade in the international market.

Nigeria, like other developing countries, has been making efforts to diversify her economy to other processing and manufacturing sectors in the recent time. In addition to reducing the dependence on crude products whose prices fluctuates in the international markets, diversification into other sectors, especially those more intensive in technology, is prone to trigger knowledge spillovers from the exposure to international markets, management and marketing practices, and production processes (Bebczuk and Berrettoni, 2005). The role played by foreign direct investment (FDI) in the export performance of developing countries has been analyzed in the literature of international trade. Studies have argued that the impact of FDI on the export performance of host countries varies according to the type (Dunning, 1988) and source of FDI (Kojima, 1973). However, an important aspect of the impact of FDI that has been ignored in the literature is the export-diversifying impact of FDI and export spillovers from FDI. This is part of the gap this paper sought to fill.

FDI may lead to diversification of the host country's exports, both directly and indirectly. It may not enter the traditional export sector, which is defined as the sector consisting of those industries whose share in world exports is high in the host country, but may enter the non-traditional exports sector, which is defined as the sector

¹ Prebisch (1950) and Singer (1950) alleged the long-term deterioration in the (net barter) terms of trade of developing countries.

consisting of those industries whose share in world exports is low. But in the non-traditional export sector, the presence of FDI may lead to higher exports. This is expected, because foreign firms possess certain ownership advantages (e.g., higher levels of technological skills, better marketing skills and international orientation) that make them more capable of exporting than the domestic firms in the same industry.

Indirectly, FDI can lead to diversification of exports through spillover effects, which occur if the presence of FDI in an industry raises the export intensity of the domestic firms in that industry. These spillover effects are expected to be stronger in the non-traditional export sector, because the presence of FDI in this sector may lower the fixed cost of introducing its products in the international market. The domestic firms may also learn from the export behavior of the foreign firms and become aware of foreign markets. Therefore, an increase in the export intensity of the domestic firms in this sector may lead to further diversification of the host country's exports.

This study seeks to examine the impact of foreign direct investment (among other factors) on export diversification drive of Nigeria. Studies are very scanty on export diversification as alluded previously. This paper used two methods of export diversification measures for the purpose of comparison. Section three presents the review of literature, while theoretical framework and methodology are contained in section four. Empirical analysis is made in section five and conclusions are in section six.

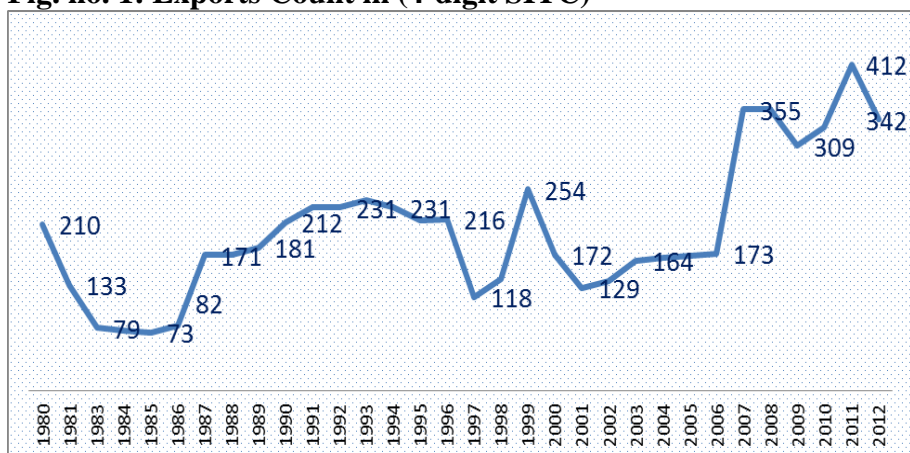
II. Stylized facts on Nigeria's foreign direct income (FDI), exports of goods

A formal definition of export diversification should include both, the broadening of economic export activities and the degree to which each sector contributes to the overall country's export. Two major methods have been employed in the literature for measuring export diversification. They include Horizontal method and the Herfindahl Export Concentration Index method. Taylor (2007) and Matthee and Naudé (2007) define horizontal export diversification as an increase in the number of export sectors. This study used the two methods to measure export diversification for Nigeria.

2.1 Horizontal Method

In order to measure horizontal export diversification, the number of export sectors classified by the Standard International Trade Classification (SITC) at the four-digit level is used. This measure is computed for the period of 1980 to 2012 using the United Nations dataset (COMTRADE). Figure 1 shows the changes in the number of Nigeria export sectors during this period, and it reveals a modest upward trend.

Fig. no. 1: Exports Count in (4-digit SITC)



Between 1965 and the early 1980s there was little change in the number of export sectors, with the number oscillating between 120 and 140. From the mid-1980s onwards, and as a result of the public export promotion policies implemented after the economic crisis in the early 1980s, the number of export sectors increased to a new higher level ranging from 140 to over 160 export sectors. This structural change will be analyzed later in more detail.

2.2 Herfindahl Export Concentration Index Method

We first calculate the Herfindahl index of export shares in the country based on data at SITC 4 digit level. A measure of export concentration, the² Herfindahl Export Concentration Index, is presented

² The Herfindahl index often applied to measure industry concentration. When the index value approaches hundred, it means that a country has a greater reliance on a limited group of exports, while a value closer to zero represents a higher degree of export diversification.

to be contrasted with the two measures of export diversification, and it is computed as follows:

$$H_t = \left\{ \left[\frac{\sqrt{\sum_{i=1}^n \left(\frac{x_{it}}{X_t} \right)^2} - \sqrt{1/n}}{1 - \sqrt{1/n}} \right] * 100 \right\}$$

where:

H_t is the concentration index in year t ,

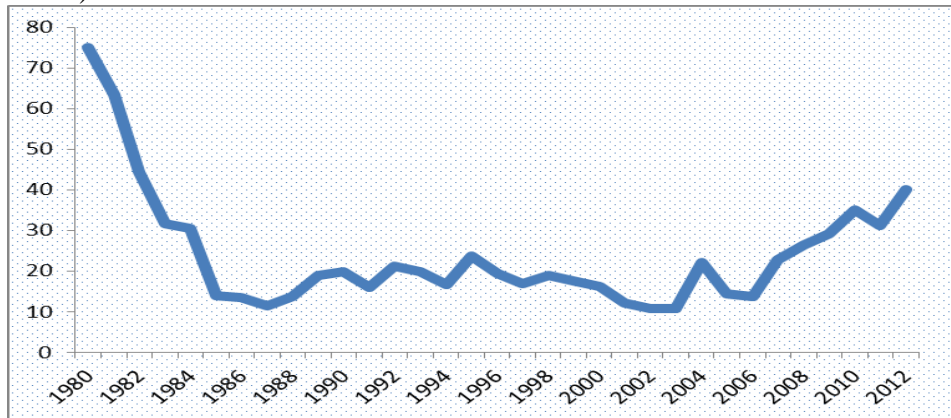
x_{it} is the value of exports from sector i in year t ,

n is number of export sectors, and

$$X_t = \sum_{i=1}^n x_{it}$$

Next, using the index, we calculate the export diversification (ED) index: $ED = (100 - Herfindahl_{it})$. The ED index takes the range 0 to 100. The greater the value of ED index, the more diversify the country's export basket is. In other words, export diversification means no reliance on a particular commodity for export.

Fig. no. 2: Computed Nigeria's Exports Diversification (Herfindahl index)



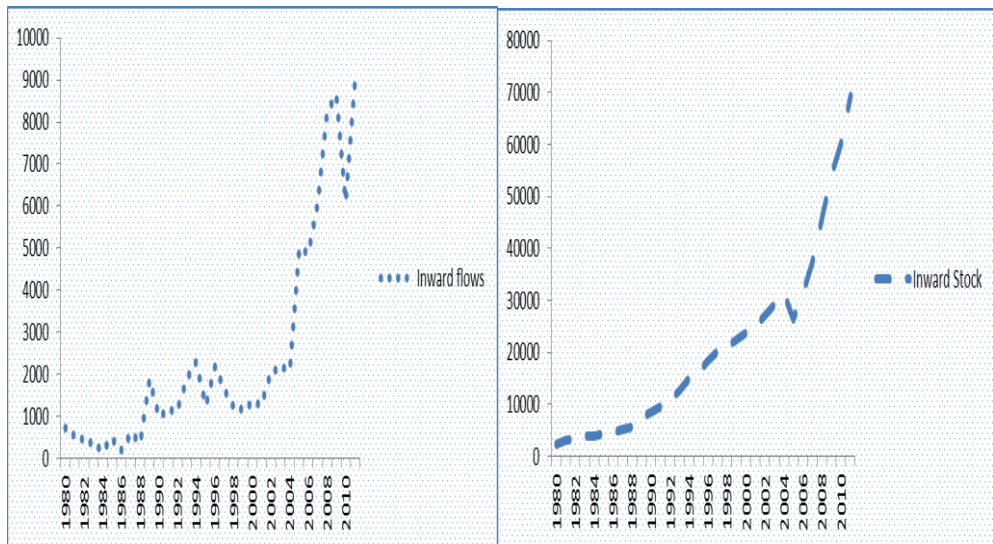
There is consistence in the two methods of export diversification used in this study. The computed Herfindahl index is presented in figure 2. It shows that Nigeria's export diversification was high in the early 1980s, the oil discovery around the period must have accounted for the decline in the extent of export diversification in the

country. Export diversification fluctuated between 20% and 30% between the period 1985 and 2005. It remarkable to stress that the country's export diversification has been improving in the six years as it has increased to about 40%.

2.3 Performance of Foreign Direct Investment in Nigeria

Figure 3 depicts Nigeria's inward flows of foreign direct investment between 1980 and 2011. The FDI flow in Nigeria declined between 1980 and 1984, although it increased thereafter, the increase is not sustained as there was another downward trend between 1996 and 1999. It increased from \$189.2 million in 1984 to \$485.6 million in the following year. There was a persistent increase in the country's FDI between 1990 and 2008. Nigeria recorded a very sharp decline in her FDI in 2009; the reason for this is obvious. The World economic meltdown really affected most of the developed countries, which are usually the sources of Nigeria's FDI. A surge was however noted in the country's FDI after the World financial meltdown.

Fig. no. 3: Nigeria's Inward Flows and Stock Foreign Direct Investment (1980-2011)



This section presents literature review on the role FDI plays in promoting export diversification across the World. To start with, Banga (2006) examined the export-diversifying impact of Japanese and US

foreign direct investments in the Indian manufacturing. The study confirmed that FDI may lead to export diversification in the host country if it affects the export intensity of industries that have a low share in world exports positively. Indirectly, FDI may encourage export diversification through spillover effects: that is, the presence of FDI in an industry may increase the export intensity of domestic firms.

Tadesse and Shukralla (2011) examined the effect of FDI on horizontal export diversification of 131 countries with the number of products exported by each country. They used parametric (quantile) and semi-parametric econometric methods to quantify the effects. The study concluded that an increase in the stock of FDI improve the horizontal export diversification. Furthermore, they specified that the actual magnitude of the effect varies greatly across countries depending on the existing stock of FDI and stage of diversification, giving rise to an almost inverted U-shaped relationship.

Kamuganga (2012) examined the question: what drives Africa`s export diversification? He found that intra-Africa regional trade cooperation enhances the likelihood of an African nation exporting across the new-product, new-market margin. The study also confirmed that infrastructure related trade frictions such as export costs; time to export; procedures to export as well as weak export supporting institutions have a negative effect on African export diversification. Similarly, macroeconomic developments particularly exchange rate volatility, financial underdevelopments and inappropriate foreign direct investments hurt African nation`s chances to diversify its exports. Iwamoto and Nabeshima (2012) investigated the impact of FDI inflow and stock on the level of export diversification and sophistication in host country`s export baskets. They make use of the dynamic panel data model in their study. They found that the five year lagged FDI inflow has positive correlation with both export diversification and sophistication, and FDI stock contribute positively to export sophistication. Prasanna (2010), using India export sector explores the impact of FDI inflows on the export performance. The study found that the impact of FDI inflows on export diversification is significantly positive.

Ferreira (2009) examined the impact of expansion and diversification of the Costa Rican export supply on economic growth. Export diversification in Costa Rica is characterized by weak linkages between multinational corporations, operating in the free trade zones,

and the rest of the economy. Using bounds test for cointegration within a distributed lag (ARDL) framework and a dynamic OLS (DOLS) model, it was gathered that export diversification had no long-run effect on economic growth during the period of study. In a similar study, the export-led growth (ELG) hypothesis was tested using a modified version of the Wald test for three different models for the period of 1960 to 2007 and 1965 to 2006. The ELG hypothesis was confirmed only when imports were included in the estimation. Granger-causality was also found running from imports to exports likely due to large amounts of imported inputs for multinational firms.

Kugler (2006) contributed to the literature about the determinants of exporting behavior of Venezuelan manufacturers. He assessed whether MNC subsidiaries stimulate exports at both, the extensive and intensive margins. The specification allows for export know how diffusion to be both vertical, across sectors via supply chains, and horizontal, within sectors. He also explored the export promotion effect of better input availability induced potentially by both MNC demand and supply. The analysis was conducted using a panel data set constructed for the period 1995 to 2001 from the Annual Venezuelan Manufacturing Survey. The data permitted the estimation of the production function and exploration of the determinants of export behavior in relation to the sectoral distribution of foreign direct investment.

At the regional level, Matthee and Naudé (2007) found that South African regions with more diversified export supplies experienced higher economic growth rates and contributed more to the nation's overall exports. Furthermore, it was horizontal diversification, and not vertical diversification per se, that was associated with higher economic growth. In other words, an increase in the range of products exported had a positive effect on growth.

IV. Theoretical framework and methodology

4.1. Theoretical framework

This paper intends to establish the role of FDI in enhancing export diversification, it is therefore appropriate to start with the underlying theories studying the determinants of exports performance. The theoretical foundations for the empirical studies on exports are among the conventional trade theories based on the Heckscher-Ohlin

(H-O) framework, new trade theories, and endogenous growth theories (Liu and Shu, 2003). Based on the H-O theory, a country should export those products that it has comparative advantages in both, production and exports. The new trade theories consider imperfect competition, economies of scale and trade costs, important factors affecting export performance.

Due to the rapid globalization that had led to high flow of investment especially from developed countries to developing countries, Markusen and Venables (1998) incorporated FDI into their general equilibrium trade models. Furthermore, endogenous growth theories have emphasized the role of innovation, and as a result, technological characteristics of an industry are considered as a key factor to export performance (Liu and Shu, 2003). Given that no single theory could by itself account for export performance for developing countries (Liu and Shu, 2003), we construct an empirical model taking into account a number of factors with special attention on FDI.

FDI is an attractive source of economic growth as it can bring additional capital and create new employment, and it is relatively stable compared to other capital flows. In addition, and perhaps more importantly, multinational corporations (MNCs) bring with them the fruits of their R&D, advanced physical equipment, efficient marketing and management know-how, as well as other assets across national borders.

4.2. Model, estimation techniques and data

Based on the theoretical underpin above, this paper specify the model of export diversification as follows:

$$herfin_t = gdp_{cap_t} + fdi_t + di_t + exr_t + resendow_t + open_t + democa_t + \varepsilon_t \tag{1}$$

$$exportco_t = gdp_{cap_t} + fdi_t + di_t + exr_t + resendow_t + open_t + democa_t + \varepsilon_t \tag{2}$$

where:

The dependent variables are:

herfin: Herfindahl Index (a measure of export concentration).

exportco: the count of exports based on 4-digit SICT product classification

The explanatory variables are:

<i>gdpcap</i> :	is the GDP per capita in current U.S. dollars.
<i>fdi</i> :	foreign direct investment net inflows as % of GDP. Thanks to spillovers effects FDI can be an engine of export diversification. Thus the sign expected of this variable is negative.
<i>di</i>	(domestic investment): approximated by Gross fixed capital formation as % of GDP.
<i>exr</i>	(exchange rate): real exchange rate
<i>resendow</i> :	this variable measures the natural resource endowments of a country. It is approximated by energy production (Kt of oil equivalent).
<i>open</i> :	is the trade openness approximated by the sum of merchandise exports and imports divided by the value of GDP.
<i>democa</i>	(democratic accountability): is a proxy of the quality of governance and institution.

The Generalized Moment Methods (GMM) was used to estimate equation (1) and (2). This is with a view of dealing with the potential endogeneity problem of explanatory variables; hence instrumental variables will be used. Moreover tests of endogeneity and validity of instruments are carried out before regressions. Data for this paper was accessed from World Integrated Trade Solution (WITS) Database and World Development Indicator (WDI) 2013.

Empirical analysis

This section presents the estimated results of equations (1) and (2) to analyze the impact of FDI on the extent of export diversification in Nigeria. Two measures of export diversification were used as dependent variable: Herfindahl index and export counts (horizontal export diversification). GMM estimator was used to examine the impact and the results of which are presented in table 1. The GMM was adopted because of the endogeneity problem that could arise in the estimation of the model (through some of the variables- foreign direct investment and domestic investment).

As regards the test for appropriateness of the instruments used in the estimation for both, the aggregate and sectoral analyses, we considered the J-test and obtained J-Statistics. The null hypothesis for

J-Statistical test is that, the instruments are valid instruments, i.e., uncorrelated with the error term, and that the excluded instruments are correctly excluded from the estimated equation. For the two estimations: Herfindahl index model and export counts model, the results showed that the null hypotheses are accepted.

This implies that our instrument variables are good and valid. In a similar vein, for the goodness of fit, the coefficient of the R-square ranged between 80.4 percent and 78.6 percent, this indicated that the independent variables are adequate to explain the variations in export diversification.

Table no. 1: Estimated Result of the Impact of FDI on Export Diversification (GMM)

Dependent Variable:	Herfin	ExportCo
Variable		
Fdi	-0.188 (1.96)**	-2.830 (-2.96)***
Di	0.525 (2.72)***	1.010 (2.00)**
Gdpcap	1.590 (0.44)	0.016 0.14
Exc	-0.018 (-2.70)***	-0.104 (-2.20)**
Resendow	1.990 (1.43)	0.983 (0.03)
Open	2.2081 (0.19)	3.565 (0.05)
Democa	-0.512 (-3.98)***	-1.061 (-2.89)***
_cons	190.1 (3.11)***	285.0 (3.27)***
Sample	1980-2012	1980-2012
No of observation	32	32
Adj. R²	0.8049	0.7860
F test	101.6***	346.60***
Hansen's J	3.65954 (p = 0.4540)	7.08112 (p = 0.1317)

Source: Authors Analysis

***, **, * represent 1%, 5%, and 10% significance level respectively

Starting with foreign direct investment, it is expected that it promotes export diversification drive of the government of countries. However, this paper found that foreign direct investment has negative but significant impact on export diversification in Nigeria. This result is consistent with Alaya (2012) who obtained negative impact of foreign direct investment on export diversification of MENA countries. For Nigeria, the negative impact of foreign direct investment on export diversification might not be surprising based on the fact that largest proportion of her inward foreign direct investment is in the Oil industry. The expected impact of the foreign direct investment will then worsen the mono-cultural nature of the economy.

Conversely, the impact of domestic investment on Nigeria's export diversification is positive and significant. This implies that domestic investment drives export diversification in Nigeria, while inward foreign direct investment does not. For both models that used different measures of export diversification, the impact of GDP per capita is positive but insignificant. This implies that the level of development in Nigeria does not promote diversification of the country's export. The impact of real exchange rate of Nigeria was found to hurt the export diversification drive of Nigeria. Trade openness has positive but insignificant impact on Nigeria's export diversification. The result is not equally surprising because even if a country opens its trade without increased productive capacity, there will be no effect on export diversification. Finally, the impact of democratic accountability on export diversification is negative but significant. This indicates that despite the democratic experience of the country in the last one and half decade, accountability of the government has not been promoting export diversification.

Summary and conclusion

This paper contributes to the evolving literature by examining the extent of export diversification in Nigeria and to analyze the impact of foreign direct investment on it. Two major methods of export diversification: export count (horizontal) and Herfindahl Index were used. Nigeria's exports flows based on 4-digit SICT product classification were used. Findings showed that Nigeria export diversification declined in the 1980s, remained low till 2000, but has since been improving. The Generalized Moment Methods (GMM) was used to analyze our specified model. Empirical analysis showed that foreign direct

investment discourages export diversification in Nigeria while domestic investment promotes it. Exchange rate and democratic accountability are other factors that discourage export diversification in Nigeria.

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The Construction and Assessment of Forecast Intervals for Monthly Inflation Rate¹

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Abstract

In this research forecast intervals were built for monthly inflation rate during 2014 using an autoregressive model and the historical errors technique. For the first 7 months of 2014 all the actual values of the inflation rate are included in the forecast intervals. However, the historical errors method provided better results, because the intervals' length is smaller. Therefore, there is a high probability for this method to provide the best prediction intervals for the next 5 months of 2014.

Keywords: inflation rate, forecast interval, autoregressive model, historical errors method

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Introduction

Authors like Bachmann, Elstner & Sims and Bloom and Davis showed that the policy uncertainty is the real cause of the decrease in active profit. [1], [2]

The forecast uncertainty is the main cause of actual economic crisis. The common current in literature that explains a world economic crisis registered a major failure. Authors like Novy demonstrated that the prediction uncertainty is the real cause of the commercial collapse from US during 2008-2009. Therefore, the construction of forecast intervals is a better solution, but these intervals should be accompanied by a proper assessment of uncertainty. [6]

Three usual uncertainty measures were the most utilized in literature: standard deviation of individual predictions, disagreement between forecasters and the variance of aggregated histogram. [5] According to Ericsson the most used statistical indicators for forecasts' uncertainty are:

1. The bias of the prediction;
2. The variance of forecast error;
3. Mean Square Error (MSE). [4]

The forecast intervals are based on the point predictions, forecast error and a probability that is associated according to the assumption referring to the errors repartition. In the general case, it is made the assumption that the random shocks have a normal distribution $e_t \rightarrow N(0, \sigma_\varepsilon^2)$ that supposes a normally distributed probability density $x_{t+h} \rightarrow N(\hat{x}_{t+h}, \sigma_h^2)$. It was observed that the actual economic crisis has as important characteristic the higher uncertainty that diminished more the economic activity compared to the previous crisis.

From the very beginning the experts used point predictions for past periods in order to have a proxy as an uncertainty measure. These indicators are compared to ex-ante uncertainty measures.

The consensus is the agreement degree related to the point forecasts made by specialists for a certain variable. The authors defined the uncertainty as variance of probability distributions. [8]

The main aim of this research is to construct and assess the uncertainty of the forecast intervals for inflation rate. Therefore, the research is structured as it follows: after a short introduction, the second section presents the methods for building the prediction intervals. Then,

the tests for assessing the forecast intervals are described and the results of evaluation for registered data are made.

Forecast intervals construction

Prediction intervals work under the assumption that the prediction errors follow a normal repartition of zero mean and a standard deviation represented by the indicator called root mean square error (RMSE) based on historical prediction errors. If the probability is $(1-\alpha)$, the prediction interval is determined as:

$$(X_t(k) - z_{\alpha/2} \cdot RMSE(k), X_t(k) + z_{\alpha/2} \cdot RMSE(k)), k = 1, \dots, K \quad (1)$$

$X_t(k)$ - point prediction of variable X_{t+k} made at the moment t

$z_{\alpha/2}$ - the $\alpha/2$ -th quintile of standardized normal repartition.

The variable at moment t is denoted by x_t and it is actually an observation of a random variable (X_t). A random walk (first-order autoregressive model – AR (1)) is written as:

$$X_t = \alpha X_{t-1} + \varepsilon_t \quad (2)$$

α - constant (for stationary data series $|\alpha| < 1$)

ε_t - error at moment t

A model with additive errors is written as:

$$X_t = \mu_t + \varepsilon_t \quad (3)$$

μ_t - predictable component of the model

$\{\varepsilon_t\}$ - sequence of independent normally distributed random variables (null average and constant dispersion: $NID(0, \sigma_\varepsilon^2)$).

The exponential smoothing calculates a point prediction by creating a weighted average of the latest observation and the most recent point prediction. It is an optimal method (it has the least mean squared error predictions) for the following model (ARIMA (0,1,1):

$$X_t = X_{t-1} + \varepsilon_t + \theta \varepsilon_{t-1} \quad (4)$$

The $100(1-\alpha)\%$ prediction interval (P.I.) for the h steps ahead forecasts are computed as:

$$\hat{x}_n(h) \mp z_{\alpha/2} \sqrt{Var(e_n(h))} \quad (5)$$

$z_{\alpha/2}$ – two-tailed percentage point of the normal distribution of null mean and dispersion equaled to 1.

This PI is symmetric about $\hat{x}_n(h)$, the point prediction being unbiased. The uncertainty in predictions for only one variable is assessed using expected means square prediction error (PMSE). If we

make the comparison between predictions for different variables, it is recommended the use of MAPE (mean absolute prediction error).

Exponential smoothing method can be utilized for data set with no obvious tendency or seasonality. The PMSE in this case is given by:

$$Var(e_n(h)) = [1 + (h - 1)a^2]\sigma_e^2 \quad (6)$$

a - smoothing parameter

$Var(e_n(h))$ - variance of the one-step-ahead prediction errors

For the random walk, the variance of predictions error is computed as:

$$Var(e_n(h)) = h\sigma_e^2 \quad (7)$$

The evaluation of inflation forecast intervals

The data refers to the monthly inflation rate in Romania in the period from January 1991 to July 2014. The forecasts horizon is 2014: January-2014: December. An ex-post assessment was made for the period till July 2014. The data are stationary at 1% level of significance, according to ADF test.

Table no.1. ADF test for inflation rate in Romania (1991: January-2013: December)

Include in the equation	Computed statistic	Critical values	Conclusion
Intercept	-3.486089	1% Critical Value* -3.4561 5% Critical Value -2.8723 10% Critical Value -2.5725	Stationary data series
Trend and intercept	-4.960956	1% Critical Value* -3.9953 5% Critical Value -3.4277 10% Critical Value -3.1369	Stationary data series
none	-2.990155	1% -2.5732	Stationary data

		Critical Value*		series
		5%	-1.9408	
		Critical Value		
		10%	-1.6163	
		Critical Value		

Source: own computations

The models used in making predictions have the following form:

$$\text{inflation}_t = 2.878 + 0.671 \cdot \text{inflation}_{t-1} + \varepsilon_t \quad (8)$$

The results of estimations are in Appendix 1.

Table no. 2. Point forecasts and prediction intervals based on autoregressive model for the next month (2014: January-2014: December)

Month	Point forecast	Lower limit	Upper limit
2014- January	0.806	-1.154	2.766
2014- February	0.776	-1.184	2.736
2014- March	0.654	-1.306	2.614
2014- April	0.558	-1.402	2.518
2014- May	0.455	-1.505	2.415
2014- June	0.422	-1.538	2.382
2014- July	0.332	-1.628	2.292
2014- August	0.206	-1.754	2.166
2014- September	0.200	-1.76	2.16
2014- October	0.178	-1.782	2.138
2014- November	0.167	-1.793	2.127
2014- December	0.012	-1.948	1.972

Source: authors' computations

All the registered values are located in the indicated forecast intervals. Moreover, the historical errors method is applied for the same variables.

Table no. 3. Point forecasts and prediction intervals based on historical errors method for the next month (2014: January-2014: December)

Month	Point forecast	Lower limit	Upper limit	Actual values
2014- January	0.875	-1.085	2.835	0.330000
2014- February	0.776	-1.184	2.736	0.850000
2014- March	0.563	-1.397	2.523	0.330000
2014- April	0.226	-1.734	2.186	0.030000
2014- May	0.286	-1.674	2.246	0.270000
2014- June	0.116	-1.844	2.076	-0.040000
2014- July	0.034	-1.926	1.994	-0.270000
2014- August	0.045	-1.915	2.005	-0.050000
2014- September	0.157	-1.803	2.117	0.330000
2014- October	0.572	-1.388	2.532	0.850000
2014- November	0.357	-1.603	2.317	0.330000
2014- December	0.226	-1.734	2.186	0.030000

Source: authors' computations

All the registered values are located in the indicated forecast intervals, but this method provided narrow intervals, which is an improvement.

Conclusions

For monthly inflation rate some forecast intervals are constructed for 2014 and the results conduct us to the conclusions that all the actual values were located in the forecast intervals in the first 7 months of 2014, but the historical errors method provided narrower intervals.

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Appendix 1

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	2.878234	0.608905	4.726902	0.0000
AR(1)	0.671625	0.043887	15.30364	0.0000
R-squared	0.461752	Mean dependent var		2.985855
Adjusted R-squared	0.459781	S.D. dependent var		4.508494
S.E. of regression	3.313726	Akaike info criterion		5.241270
Sum squared resid	2997.753	Schwarz criterion		5.267574
Log likelihood	-718.6746	F-statistic		234.2013
Durbin-Watson stat	2.350876	Prob(F-statistic)		0.000000
Inverted AR Roots	.67			

Real Options Adoption in Capital Budgeting: A Highlight of Recent Literature

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Abstract

This paper presents a literature review of recent empirical surveys on capital budgeting methods. The focus lies on the investigation of Real Options' adoption for capital budgeting as this is recorded to relevant surveys. The studies include a wide range of questionnaires and examine various aspects of capital budgeting, resulting in findings not always comparable to each other. Although this poses a methodological issue, as surveys results cannot be compared in a quantitative way but only qualitative, however, these studies reveal the adoption trend of real options in various settings among different countries and businesses. A preliminary background is presented initially and next the surveys are presented with focus on the capital budgeting methods utilized.

Keywords: Real options, capital budgeting

Capital Investment Decisions

Capital budgeting decisions are among the most critical for firms' performance and future prospects. As such it has evolved during the years through extensive academic research assisted by technology and has offered a variety of methods and techniques that are extending the traditional methods. However a question arises, as it is not clear whether managers or firms have indeed adopted the novel more

sophisticated methods, such as real options. It is a fact that technology has boosted the academic research and the appearance of more complex models; however firms are not always follow the trend as in general the more complex a method is the less easy can be explained and adopted. As it can be seen traditional appraisal methods are still in use at a great extent ([13], [3], [17], [9], [6]).

Factors that affect the selection of appraisal method are not always deterministic and often reflect manager's education, background and perspective and not firms' formal procedures. The decision is unstructured and involves high risk. So, in many cases it is considered as an art rather than science and a manager may feel overconfident on own experience. Studies on behavioral finance show that the process of investment appraisal is not without behavioral biases as subjective processes are intervening [5].

Capital investments are evaluated by numerous methods as presented in literature. Two core concepts underlie in the evaluation of projects for most of the methods. The first is the utilization of cash flows of the project rather than accounting profit as measure of profitability and the second is the idea of discounting. The usage of cash flows instead of the profits helps to identify additional aspects except of profitability such as the payback period. The discounting of future cash flows reflects the associated risk as well as the time value of money. It is common for companies to use more than one method for the appraisal.

In capital budgeting the traditional method to evaluate investments or projects under uncertainty is based on the discounted cash flow method (DCF) by means of net present value (NPV). The net present value of a project is calculated by subtracting the initial investment amount from the present value of future project cash flows. The present value is the sum of future cash flows discounted by a certain rate which estimates the risk involved. A project is acceptable as investment if the NPV is positive. Although DCF has been criticized for major drawbacks, empirical surveys among managers support that it is still widely used for capital budgeting decisions [6]. Real option is closely related to corporate capital investment decision-making and has been introduced as an alternative approach for investment appraisal under uncertainty. The starting point of real options research was the criticism to traditional strategic investment decision making and capital budgeting methods. In general a real option represents or reflects the option or options that a company has when it comes to deciding whether

to invest in a project, to delay, put it on hold, expand or reduce an investment or any other flexibility it may also have.

Although real options has been introduced more than thirty years ago, and despite its promotion by academy, it seems that there exists a gap between theory and practice, as the theoretical development of investment appraisal techniques followed a must faster path than their acquisition in practice. Several surveys show that despite the criticism of traditional methods, companies are still using them. Several studies have been executed during the past decades in relevance to the practice of capital budgeting in general as well as the valuation approaches that are followed by firms. They try to close the gap between theory and practice and identify whether academic approaches are diffused into firms. This is not surprising as the capital budgeting decisions affect a firm's future position at great extent.

In the following a review is presented summarizing the key facts from several past surveys on capital budgeting practices. Although the literature is vast and spans across four decades we focus on studies from past five years only as they indicate recent and current trends.

Empirical findings on Real Options utilization

Verma et al., presented in 2009 their study on capital budgeting practices in India [18]. The population was all the manufacturing companies in India applying capital budgeting techniques. The size of the sample was 100 manufacturing companies covering various size-groups, industry-groups, age groups, ownerships and various geographical areas. From these 15 companies responded and after a follow up 15 more responded taking total usable responses to 30 or 30% response rate. Payback period, NPV and IRR were three most popular capital budgeting techniques. The firms used often or always NPV at 63%, IRR 76,7%, Payback 77%, ARR 16,6%, and profitability index 40,1%.

Scholleova and Svecova presented in 2010 the results from a survey that took place at Czech companies during 2007 [16]. 252 questionnaires were received and the responses were compared to similar surveys. Coming to the methods that were utilized, NPV was used by 22%, IRR by 22%, Payback Period by 27%, profitability index by 8%, discounted Payback Period by 11% and others by 4%. Although the research setup and results were not presented in a thorough manner, it is presented as indicative.

In 2010 Haddad et al., presented the results of their study conducted for Taiwanese firms' capital budgeting practices [7]. The characteristics of the survey were not presented in details. However, the sample was 25 firms in Taiwan and the questionnaires were sent to CFOs. As can be seen the respondents use always or almost always the NPV at 30,43%, PB at 52,17%, IRR at 47,83%, ARR at 26,09, Discounted PB at 21,74%, Profitability index at 17,39% and modified IRR at 13,04%. They conclude that the payback method is used more often and the NPV technique is always or almost always used by a relatively small percentage of firms.

Building upon previous similar studies, Bennouna et al., [2] executed a survey that was published in 2010 in order to evaluate the capital budgeting techniques in Canada. They reviewed existing literature on the subject and identified gaps that their own study was aiming to cover. Their target was on the one hand to extend the existing body of literature by providing updated results on capital budgeting techniques usage and on the other hand to explore domains that were not included in the past. So they compiled findings of previous studies and included the study of real options adoption as well. The initial sample was 500 firms included in the Financial Post magazine under the assumption that they would accurately reflect the largest Canadian firms and that they would be easily accessed. Survey questionnaires were mailed to CFOs and the response rate was quite low, as 88 firms or 18.4% out of the 478. 22 out of the 500 were not reached. The response rate was considered as sufficient considering similar studies. An overall assumption was that small firms tend to use naïve methods in contrast to larger firms that confront to financial theory, so the initial population of 500 firms was considered as adequate for the study. The results showed that 17 out of the 88 firms did not use DCF and from the rest 71 firms or 80.7% that use DCF, 94.2% uses NPV and 87% IRR. Regarding real options only 8.1% or 4 firms used it. Among others findings 78.5% was found to be using the non-DCF payback period. Authors argued that DCF was found as the most widespread method aligned with relevant past studies and non-DCF methods although declining were still in use. Also they mentioned that adoption of real options was surprisingly low considering the extent of relevant literature. They also mentioned that several areas of DCF analysis were not applied correctly. Limitations of the study were the non-response bias, the small sample size that included only large firms from the specific area that makes

generalizations very risky. Concluding, they emphasized the theory-practice gap on the usage of sophisticated methods and the limited usage of real options despite its extended presence in academic literature.

Shinoda presented in 2010 the results of a survey that took place between 2008 and 2009 in Japan focusing on capital budgeting practices [15]. The sample was 2,224 firms listed on the Tokyo Stock Exchange and the form was questionnaire that was sent to managers by post. 225 usable responses were received, which was considered as comparable to the rates in other similar surveys in Japan and U.S.A. The respondents stated that they use five always or often, net present value at 30,5%, internal rate of return 24,5%, accounting rate of return 30,3%, payback period at 50,2%, discounted payback period at 20,4% and real options at 0,5%. The results of this survey showed according to the author that the difference between academics and managers of firms listed on the Tokyo Stock Exchange in Japan was shrinking and those firms in Japan remained heavily dependent on payback period methods.

Khamees et al., presented a study in 2010 providing empirical evidence about capital budgeting in Jordan an emerging economy [11]. They distributed during 2006 a questionnaire to 81 industrial corporations in Jordan, listed in Amman Stock Exchange. The returned and qualified questionnaires were 53 with a response rate of 65.4%. The respondents stated that they use five well-known capital budgeting methods, net present value at 49,3%, internal rate of return 55,7%, accounting rate of return 50,7%, payback period at 58,6% and profitability index at 61,4% where the scores were calculated using an averaging formula. Authors argued that the results did not reveal that discounted or undiscounted cash flow methods were preferred over the other methods as the JIC gave almost equal importance to the discounted and undiscounted cash flow methods in evaluating capital investments projects. In addition, the profitability index technique was the most frequent used technique followed by the payback period.

El Sady et al., presented in 2011 the findings from their survey which took place in 2009 in Kuwait [14]. The sample was only Kuwaiti firms and the final sample comprised 511 Kuwaiti firms from investment, real estate, industrial, service and food sectors. Listed firms in Kuwaiti Stock Exchange from the five mentioned sectors were 167 and unlisted firms were 344, from the same sectors with comparable size and capital for the validity of the analysis. Questionnaires were sent

in 2009 and 382 questionnaires were returned with 74.76% response rate. The usable questionnaires (133) from Kuwaiti listed firms (70.42%) and 136 from Kuwaiti unlisted firms (39.53%) with a total number of 269 and usable response rate of 70.42%. The usable questionnaire rate as percentage of total questionnaires counts was 52.64%. The common techniques were NPV, ROA, ROE and PI, which accounted for 21.62%, 12.97%, 9.91% and 9.73% of all respondents, respectively. Profitability index was used by 9.73%, Payback period by 8.47% and real options by 0%.

Ekeha presented at 2011 the study results of a comparison of capital budgeting techniques by companies in Europe and West Africa [4]. The survey was between 225 European and 120 West African companies aimed to analyze the use of capital budgeting techniques by companies in both economic blocs. The questionnaires were sent to 225 Europe and 120 West African listed and non-listed companies in the period between August 2006 and January 2007. The questionnaire was sent to CFOs and received 36 responses, 28 from Europe and 8 from West African companies, resulting in a response rate of 12% for the European and 6% for the West African companies. The main findings of the analysis can be summarized as follows. First, European CFOs use the NPV method significantly more often than their West African colleagues do. Second, West African CFOs use the ARR method significantly more than European CFOs do. Third, CFOs of West African companies less often make cost of equity estimations as compared to European CFOs. These results may be explained by the fact that there is still a gap with respect to the level of economic, financial, human and technological development between the two continental blocs. At the same time, however, the study also found that the use of the IRR method does not seem to differ significantly between European and West African companies.

Al-Ajmi et al., presented their study at 2011 for the use of capital budgeting techniques of conventional and Islamic financial institutions [1]. Two hundred questionnaires were distributed to the target population composed of 98 banks of which 26 are Islamic, 37 insurance companies of which 9 are Islamic insurance and 65 investment companies, of which 21 follow Islamic Sharia'a principles. The response rate was 52.5%. The most popular technique used was IRR followed by NPV. Around 92.4% of the respondents indicated they use this method always or almost always. The second most popular

method (NPV) was used by 66.7% of respondents mostly or always. Of the non-DCF methods (PB and ARR), ARR was the third most popular technique with 53.3%. PB was used by 52.4%.

Macquieira et al., presented in 2011 the results from their survey on Latin American firms for capital budgeting decisions [12]. They followed Graham and Harvey approach and expanded it in several topics. The sample was composed of 290 answers from 7 main countries — Argentina, Chile, Colombia, Ecuador, Peru, Uruguay and Venezuela — and some isolated observations from Bolivia, Brazil, Costa Rica, El Salvador and Mexico. According to the results, the most widely used methodologies were the NPV with 72.41% and IRR with 70% of respondents used these techniques either always or almost. The next popular method was the payback period at 62.07% of respondents. Profitability index with 53.79% and sensitivity analysis with 58.97% were also frequently used. Real options were used by 24.48%. Concluding they commented that Latin American firms — similar to US firms — used NPV and IRR as the main tools for analyzing investments but survey suggested that firms in emerging markets tend to make a more extensive use of Payback and the Profitability Index than their US counterparties. The extensive use of these tools seemed to be aligned with the particular instability and market development of Latin American countries and to the specific choices among small and medium firms — even those located in the US market.

Maroyi et al., presented in 2012 their study on capital budgeting techniques for mining companies in South Africa conducted in 2011. The sample was chosen from companies listed in the mining sector of the Johannesburg Securities Exchange (JSE) which was summed to 20 firms. The survey was conducted by questionnaires (17 firms) and interviews (3 firms) and responses were 10 out of 17, a response rate of 37%. Respondents used the NPV technique in evaluating major projects by 69%, IRR by 46%, PB by 23% and 7.7% of the respondents did not use any technique to evaluate their projects.

Jain et al., conducted a survey, published 2013, in Indian companies regarding the capital budgeting practices among others [10]. The sample selected for this study was limited to 166 non-financial Bombay Stock Exchange (BSE) 200 companies engaged in manufacturing and service rendering businesses. The research instrument was questionnaire and the initial response was very poor. There were 31 responses received out of 166 (response rate of 18.67%).

The 31 respondent companies did not respond to all the questions contained in the questionnaire. The results showed that internal rate of return was used by 78.57%, payback period by 64.28%, Net present value by 50.00%, Accounting rate of return on investment by 39.28%, Profitability index/present value index by 21.42%, real options by 50%, abandonment options by 17,64% and any other technique by 7.14%. They argue that it was encouraging to see that half of the sample companies were using real options in making capital budgeting decisions and that all companies using the abandonment option were necessarily using the real option too, in combination, while making their capital budgeting decisions. This was as they comment in sharp contrast to findings of the Bennouna et al. (2010) study of large Canadian firms, where, even in large firms, only 8% use real options.

Hanaeda and Serita presented in 2013 the results of their survey conducted during 2011 about capital budgeting techniques for Japanese firms [8]. The questionnaire was based upon Graham-Harvey survey in order to be feasible to compare to international firms. The sample was 3,618 firms in Japan listed in "Japanese Company Handbook Vol.3 2011" published by Toyo Keizai Inc., which cover all listed firms in Japanese stock exchanges including the JASDAQ markets in June 2011 and the questionnaire was sent by mail to financial divisions. Respondent firms were 225 that comprised to response rate of 6.2%, which was acceptable and was probably due to the Great East Japan Earthquake occurred on March 11th 2011. From the respondents the results indicated that the utilization always and almost always of internal rate of return was used by 26,9%, payback period by 56,9%, discounted payback period by 15,6%, Net present value by 25,7%, profitability index 32,4%, simulation 8,3%, Accounting rate of return on investment by 43,4%, real options 1%, and other technique by 4,1%. Authors concluded that the most popular technique of capital budgeting was payback period method while NPV and IRR were not popular in Japanese firms as only 25.7% of correspondents of survey always or almost always use NTV and IRR. Also international comparisons indicated that capital budgeting practices of Japanese firms were different in some respects from US and other countries firms.

Conclusion and future work

From the previous review, it can be concluded the following:

1. From a methodological point of view every study is unique more or less as it takes place at a specific time and place which means that market conditions are very specific to the study. The sample is also unique and includes firms that are selected based on their size or their presence at an index. Another factor is that the management team or the decision making body changes from time to time making the uniqueness even stronger. Thus it is almost impossible to replicate the same survey at another point of time, as both, market and firms will have changed substantially.

2. Researchers follow a different methodology each time with different objectives and research questions, different questionnaires and different samples. This makes almost impossible to compare survey results without risking being inconsistent. Thus even for studies that were repeated at the same markets at different point of time, results cannot be compared, unless the researchers follow a very strict approach on their methodology. However, even if this can be organized, market and firms are not static, so results on real options adoption may be impacted by market influence or external factors and not by decision.

3. Real options in most of the studies are a kind of byproduct of the research, namely the survey design was not based upon the real options adoption, and it was not included, or included partially. Only few surveys were built around real options adoption and as said before they cannot be replicated to reveal the adoption progress through the years.

4. Although quantitative comparison cannot be done for the aforementioned reasons, some qualitative results can be inferred. One key result is that adoption rates of real options in capital budgeting practice despite their presence for an extended period remain relatively low compared to the so called 'legacy' DCF methods.

5. Although adoption rates are low to what expected, it seems that they tend to follow an increasing trend.

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The Evolution of the Number of Tourists accommodated in Arad

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Abstract

The paper analyses the evolution of the number of tourists accommodated in Arad between January 2006 and September 2009. For this purpose we have used the statistics data from the official sites. As variables we chose: X – independent variable - Total tourist arrival and accommodated in Arad, Y - dependent variable - Tourists staying in hotels.

Keywords: tourism, accommodation

Introduction

Tourism is the fastest growing industry in Europe and contributed greatly to the emergence and development of services economy (Rusu, Cureteanu and Isac, 2013).

Tourism is always evolving under the changes in the contemporary civilization, being an activity involving a complex mixture of material and psychological elements.

In 1936, The Committee of Statistical Experts of the League of Nations defined foreign tourist as “one who visits a country other than that in which he habitually lives for a period of at least twenty-four hours”. Its successor, the United Nations, amended this definition in 1945, by including a maximum stay of six months (Theobald, 2005).

Data are taken from the Monthly Statistical Bulletins - Arad County in the period January 2006 - September 2009.

The analyzed variables

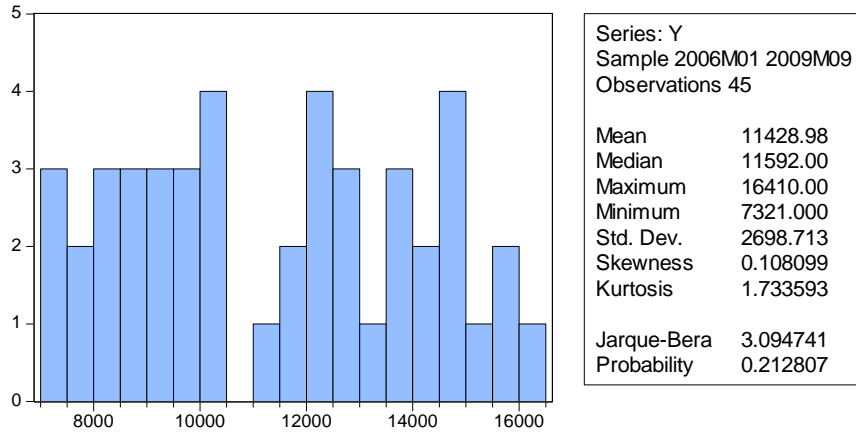
As variables we chose: X – independent variable - Total tourist arrival and accommodated in Arad, Y - dependent variable - Tourists staying in hotels.

No.	Month	X – independent variable	Y - dependent variable
1.	January 2006	11219	8733
2.	February	10113	7455
3.	March	10306	7499
4.	April	11177	8224
5.	May	13043	9508
6.	June	14120	10253
7.	July	17798	13905
8.	August	18861	14801
9.	September	19320	15611
10.	October	17898	13943
11.	November	15566	12373
12.	December	12120	9212
13.	January 2007	10166	7635
14.	February	12666	10042
15.	March	13126	9984
16.	April	14571	11388
17.	May	15437	12161
18.	June	16468	12755
19.	July	19277	14845

20.	August	20562	15798
21.	September	17201	13768
22.	October	15775	12710
23.	November	12675	9478
24.	December	13357	10270
25.	January 2008	11997	8769
26.	February	11881	8885
27.	March	13453	10285
28.	April	12373	9191
29.	May	15659	12164
30.	June	16636	13101
31.	July	18562	14698
32.	August	19157	15169
33.	September	17202	14182
34.	October	18501	14774
35.	November	15518	11705
36.	December	12922	9918
37.	January 2009	11275	8187
38.	February	10248	7321
39.	March	11236	7833
40.	April	11330	8289
41.	May	15281	11592
42.	June	17179	12846
43.	July	18899	14460
44.	August	21790	16410
45.	September	16545	12174

The Calculations

For the size of Y will be calculated using the software Eviews the following:



a. Mean - arithmetic average is determined by dividing the sum of the individual values of the variable to the total number of units in the population and is calculated with:

$$\bar{Y} = \frac{\sum_{i=1}^k Y_i \cdot N_i}{\sum_{i=1}^k N_i}, k=45$$

The value obtained using Eviews software is 11,428 tourists. The average monthly number of tourists accommodated in hotels in Arad is 11,428.

b. Median - The median is the numerical value separating the higher half of a population from the lower half, or that recorded level variable where for the number of units between the minimum and median variable equals the number of units between the median and its maximum value.

The median is calculated (Szenteși, Lile, Rusu, Csorba and Bălan, 2011):

$$Me = Y_{\left[\frac{N}{2}\right]+1}, \text{ if the whole population, } N \text{ is odd,}$$

$$Me = \frac{Y_{\left[\frac{N}{2}\right]} + Y_{\left[\frac{N}{2}\right]+1}}{2}, \text{ if the whole population is an even number.}$$

Using Eviews we obtained 11592 tourists. The median is the value of 11592 tourists staying in hotels in Arad County.

c. Coefficient of variation - is calculated using the ratio of standard deviation and the mean

$$V_Y = \frac{\sigma_Y}{\bar{Y}} \cdot 100(\%) = \frac{2698}{11428} \cdot 100 = 23,6\%$$

d. Skewness:

$$\alpha = \frac{\bar{Y} - Mo}{\sigma_Y}$$

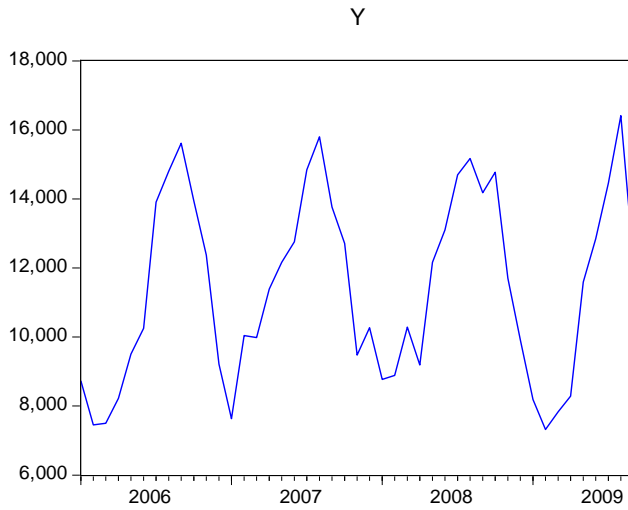
Using Eviews we obtain the value of 0,108099, thus since the skewness has a positive value, results that the series presents an asymmetry to the left

e. Kurtosis is calculated with the following formula:

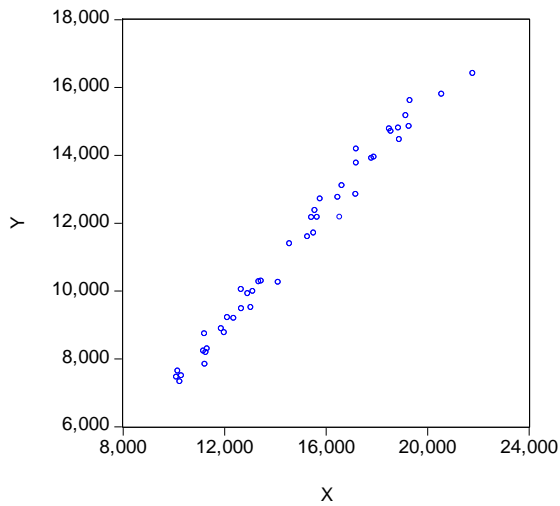
$$\beta_4 = \frac{M(Y - \bar{Y})^4}{\sigma_Y^4} - 3$$

With Eviews software we get the following value: 1.733593. If $\beta_4 > 0$, the series graph is sharper and higher than normal curve chart, thus the series is leptokurtic. Thus in this case series Y is leptokurtic.

Independent variable Y chronogram



Point cloud representation



Following the mathematical form of the links they may be linear or non-linear. In this case the links are linear, so the connection is made after the equation.

It can be seen that the points are grouped diagonally so that we can confirm that between X and Y there is a link. Most points are located on the main diagonal so that the link is direct. The presence of a linear strip suggests a linear relation of the first degree.

The intensity is given by the width of the connection strip - the width of the strip is inversely proportional to the intensity of the points of the link – thus a narrow band indicates a strong intensity.

Dependent Variable: Y				
Method: Least Squares				
Date: 01/08/10 Time: 09:55				
Sample: 2006M01 2009M09				
Included observations: 45				
Variable	Coefficient	Std. Error	t-Statistic	Prob.
X	0.836959	0.015929	52.54171	0
C	-1041.082	242.6284	-4.290848	0.0001
R-squared	0.984663	Mean dependent var	11428.98	
Adjusted R-squared	0.984306	S.D. dependent var	2698.713	
S.E. of regression	338.0825	Akaike info criterion	14.52788	
Sum squared resid	4914889	Schwarz criterion	14.60818	
Log likelihood	-324.8774	Hannan-Quinn criter.	14.55782	
F-statistic	2760.632	Durbin-Watson stat	1.00967	
Prob(F-statistic)	0			

Sample correlation value ratio is R-squared: 0.984663 in this case.

- if $R_{y/x} < 0,5$ connection between X and Y is reduced;
- if $0,5 \leq R_{y/x} < 0,75$ connection between X and Y is moderate;
- if $0,75 \leq R_{y/x} \leq 1$ connection between X and Y is strong.

In conclusion there is a strong link between the two variables.

To generalize these values the Fisher test will be used – its calculated value is *F-statistic* FCALC = 2760.632. Fisher statistics table value for the probability of 95% and a total of 45 observations is Ftab = 4.085.

Presentation of two forms of plausible links between the two variables

It will identify two plausible forms of the relationship between two variables, based on the appearance of the cloud of points. In this particular case, it makes assumptions:

A - between the two variables is a linear relation: $Y = c(1)+c(2)\times X+\epsilon$

B - between the two variables is an exponential relation:
 $Y=c(1).c(2)X+\epsilon$

Dependent Variable: Y				
Method: Least Squares				
Date: 01/08/10 Time: 10:02				
Sample: 2006M01 2009M09				
Included observations: 45				
Y=C(1)+C(2)*X				
	Coefficient	Std. Error	t-Statistic	Prob.
C(1)	-1041.082	242.6284	-4.290848	0.0001
C(2)	0.836959	0.015929	52.54171	0
R-squared	0.984663	Mean dependent var		11428.98
Adjusted R-squared	0.984306	S.D. dependent var		2698.713
S.E. of regression	338.0825	Akaike info criterion		14.52788
Sum squared resid	4914889	Schwarz criterion		14.60818
Log likelihood	-324.8774	Hannan-Quinn criter.		14.55782
F-statistic	2760.632	Durbin-Watson stat		1.00967
Prob(F-statistic)	0			

The values of the estimated coefficients in the used sample are:

$$c(1) = -1041,082$$

$$c(2) = 0,836959$$

To generalize and expand the results related to the two arguments we need to apply the Student test.

For the parameter $c(1)$ the value is *t-Statistic*: $t_{\text{calc}} = -4,290848$. For 95% probability, value is $t_{\text{tab}} = 1,96$. Thus the parameter $c(1)$ significantly differs from 0 to the total population.

We apply Student *t-Statistic* for parameter as well: $c(2)$: $t_{\text{calc}} = 52,54171$, $t_{\text{tab}} = 1,96$. Parameter $c(2)$ significantly differs from 0 to the total population.

Conclusions

Tourism is extremely important for Arad County, being a significant opportunity in economic and social development. The problems arising are related to the number of tourists accommodated during the entire year (season on no season), Arad county having mostly business and transit tourism.

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Tourists' Attitude towards Urban Tourism: Problems and Perspectives of Dhaka City as Tourists' Destination

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Abstract

Like several other sectors, tourism industry in Bangladesh since long past remains unexplored. Bangladesh faces deficit balances of payments every fiscal year. Tourism industry can play a vital role to remedy the deficit. Urban tourism has been a phenomenal growth since 1990 across the globe. Unfortunately Bangladesh is yet to figure prominently in the tourism map. Some of its neighboring countries are earning considerable amount of foreign exchange from tourism industry. The present study could reveal the problems and the prospects of urban (Dhaka City) tourism industry measuring the field opinion done by the researcher. This research was a conclusive research. Here participant observations, case study, interview and survey techniques are followed to collect primary data. It can therefore be said that the tourism industry offers greater scope for the development in the areas of economy, society, culture and religion.

Keywords: urban, tourism, development, economy, culture

Introduction

Increased leisure time and changes in lifestyle and consumption have given renewed importance to tourism, leisure and recreation in both the developed and the developing world; tourism has become one of the fast-growing industries in the world economy. Urban Tourism

focuses in particular on the challenges facing older industrial cities in promoting tourism, and the role of tourism in regenerating city centers and inner city areas. In many cities where the traditional economic activities have declined, city authorities have invested in tourism as a means of boosting the image of their city, revitalizing and physically regenerating it and creating new jobs.

Urban tourism is the fastest growing service-industry nowadays and prospects of it are very bright. Tourism creates employment. According to the World Tourism Organization (WTO), the tourism industry accounts for 11% of total global employment. It is said that every twelve tourists create a new job. There are some countries that have traditionally lived off tourism such as Switzerland in Europe. Other countries in Asia, Latin America and elsewhere have joined this elite group of countries over the years known for their tourism, proving its immense potential worldwide. Bangladesh tourism industry, especially Dhaka has great potentials both as a foreign exchange earner and provider of job-opportunities with resultant multiplier effect on the country's economy as a whole.

Tourist attractions can be termed as the central aspects of tourism which have the ability to draw the attention of the potential tourists to visit them. Mill and Morrison (2002) described attractions are the first and most important and a successful tourists destination have the blend of certain elements. Again they concluded that while the attractions are needed to bring people in, they must have adequate facilities, infrastructure and transportation alternatives to make their stay comfortable.

Dietvorst and Ashworth (1995) and Urry (1994) showed the cultural context in which tourism and recreation occurs has changed nowadays: central to the concept of new modernity is the idea of movement. In relation to tourism, the acceleration of mobility in our era entails a sort of 'time-space compression' that has radical effects on how people actually experience contemporary world changing, both, their forms of subjectivity and sociability and their aesthetic appreciation of nature, landscape, townscapes and other societies.

Featherstone (2007) showed that the forms of social discipline (e.g. custom, ideological codes) into which people used to socialize and entertain themselves do not function as they used to do in the past.

Objective of the Study

The main objective of this study is to explore the present state of Dhaka City as urban tourists' destination. The specific objectives are:

- To identify the specific problems of Dhaka city as a urban tourists' destination;
- To assess developments of the Bangladesh urban tourism sector;
- To identify the prospects and problems facing countries tourism industry through the opinion of tourists visiting in Bangladesh.

Material and Methods

Researcher used both, primary and secondary data. Here participant observations, case study, interview and survey techniques are followed to collect primary data. For the secondary sources of information the present research has largely relied on different published materials (government publications, newspapers, periodicals, research works, journals, online database etc.)

Sampling Procedure

Targeted population was the tourist visiting several urban spots in Dhaka City, including foreign tourists, residents and other inbound tourists. Among them most potential elements was selected in random sampling technique. Sample size was 120.

Case study method

Case study method was particularly important for the present research as it provides with some specific information within a timeframe. In the present endeavor, case study method was adopted along with other methods because the research aims relied on describing, understanding and explaining the consumption preferences of the studied people. It assisted for the in-depth findings of the study and mostly relied on individuals and comparative findings. The case study method was very important for the present study as it aided by providing some narrative forms very specifically within a limited time scale.

Analysis of the data

Data was collected from both the primary and secondary sources. Collected data was mostly qualitative in nature as the study was to understand the present situation of the Dhaka city as urban tourists'

destination. Some quantitative data was also collected to support the qualitative data as all descriptions result from some measurement activity. For the present study, quantitative data has been used with the aim to increase the effectiveness of the qualitative data by increasing reliability and comparability.

Analysis of Interview

In the case of the informal interviews, the data was grouped according to the topic of the information. Cross interview analysis for each question was followed to see the similarities and difference of the data provided by the interviews. Data grouping helped to conceptualise the data. In the case of semi-structured interview, data was in the more precise form. It was grouped according to the questions and the cross analysis of data was done which helped to construct meaningful and useful information.

Analysis of Observation

Analysis of observation was dependent on some points, which were relevant to the fieldwork, field and the people. The important aspects of the observation were noted down and some descriptions were also written according to its significance.

Analysis and construction of case studies

The data of the case study interview was grouped according to the different cases. Then, the data were categorized and analysed to the following steps:

Step 1: All the data of a particular case was categorized and followed a systematic way.

Step 2: The relevant data for case was selected and irrelevant data was reduced.

Step 3: The data was organized and edited for the case study.

Step 4: The case was arranged and represented thematically.

Limitations of the study

The study suffers from a number of limitations that were beyond the control of the researcher.

1. Lack of availability of information of Bangladesh tourism was a major problem founded to conduct the study.
2. Some of the respondents were very reluctant to give their time to respond the researcher.

3. Lack of cooperation of hotel authorities in meeting guests was another problem.
4. Tourists were always found to be in a great hurry. Those hurried tourists who gave their kind consent to give response had failed to answer all the queries properly. May be it was due to their hurriedness or may be intentional which also affected the study findings.

Due to the financial problem it was impossible to go every spot of Dhaka city to collect more exclusive information. There are a large number of tourists who did not travel all the spots, so a comparative analysis by them was not very easy.

Literature review

The researcher has viewed a couple of English literatures, articles, newspapers and various national and international reports from multi-disciplines in order to get an overall insight about the present research subject. In this step, an attempt will be taken for examine and review those specific issues, which help the researcher to understand the problems and perspectives of urban tourism regarding Dhaka city of Bangladesh.

Gospodini (2001) showed the relationships between the physical form of the urban environment and leisure activities. It examines how urban space morphology - i.e. spatial patterns and formal patterns - may have an impact on tourists' attraction and preferences in the contemporary cultural context of urban tourism. It explore that urban design and the physical form of space in them determine anything in urban tourism development.

Law (2002) described urban tourism, its patterns and characteristics, the more basic structure of urban tourism and distinguishes between tourism and urban tourism.

Zafar (1996) mentioned that possessing outstanding tourism resources is not sufficient to lure the optimal number of tourists to a tourist destination. According to the author, tourism promotion plays an important role in enhancing the competitive edge of one tourist destination over another. As a result, the aggressiveness of the promotion campaigns launched by tourist destinations has added a new dimension to competitiveness and has resulted in increasing numbers of image advertisements in travel and tourism literature and in the media

which leads the tourist destinations to spend billions of dollars annually on image building and image correction promotion programs.

European Communities (2000) aims in particular to enhance economic prosperity and employment in towns and cities and to improve the urban environment. It said that quality tourism can contribute to the sustainable development of urban areas by improving business competitiveness, meeting social needs and preserving the cultural and natural environment. Although IQM is a relatively new approach, a certain number of urban tourist destinations are making real efforts in this direction. They have defined strategies with the key partners, are implementing good practice and are continually developing monitoring and evaluation tools for adjusting that approach according to its economic, social and environmental impact. The purpose of this publication is to draw lessons from the experience of these destinations and to make recommendations useful for urban tourist destinations. It also recommends that the Structural Funds support tourism development by pursuing these objectives. The Commission intends to foster the exchange of good practice in the area of tourism, with the help of all the public and industry partners concerned.

Edwards et al. (2010), find out that urban tourist seek out and spend a large proportion of their time in tourism precincts. Because tourists are constrained by time, the precincts must perform a variety of functions if tourists are to have a satisfying and fulfilling experience of the city overall.

According to Ashworth (1989), there are four extant approaches to analyzing urban tourism. They are as follows:

- i)** Facility approach- special analysis the of location of tourism attractions, facilities, infrastructure and zones - including transport routes, hotels, historic and business zones;
- ii)** Ecological approaches- these refers not to the contemporary 'green' environmental use of the term 'ecological' but the idea of studying structure of urban areas, which are seen to evolve and function in identification of functional zones or districts (e.g. CBD, historic core, markets area, industrial area), which links with the contemporary idea of tourism precincts;
- iii)** User approaches - this approach focuses on the characteristics, activities, motivations, purposes and visitors, particularly related to tourism marketing;

- iv) Policy approaches - this approach arises from the concerns of city governments to accommodate and/or promote tourism and focus on a range of policy issue, including infrastructure provisions and marketing.

Urban tourism strategy can be exposing as in the following figure:

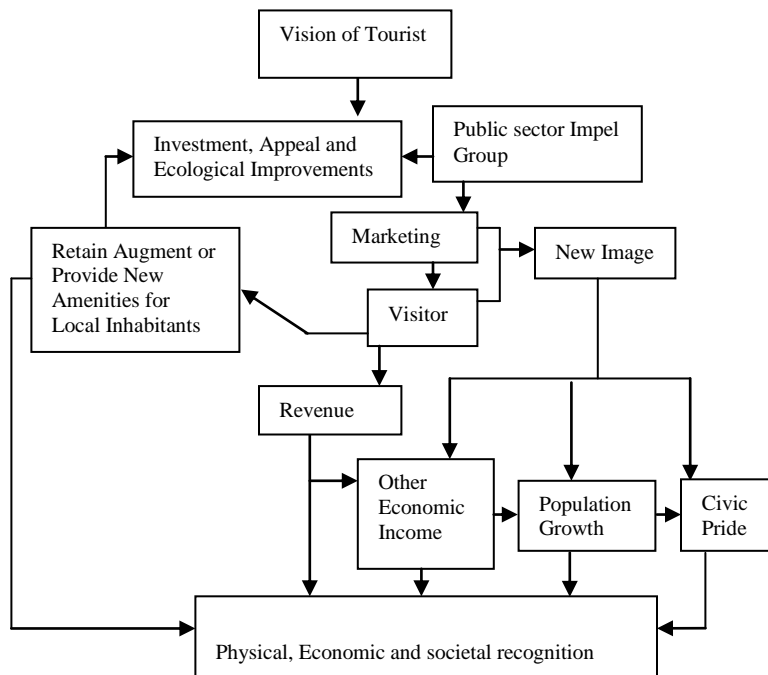


Fig. no.1: Urban Tourism Strategy (This Model made-up by the researcher)

The industrial perspective, as shown in figure 2, sees tourism as an industry with ranges of product to sell, markets to identify and access, investments to be undertaken, managements of products distribution and profits to be made.

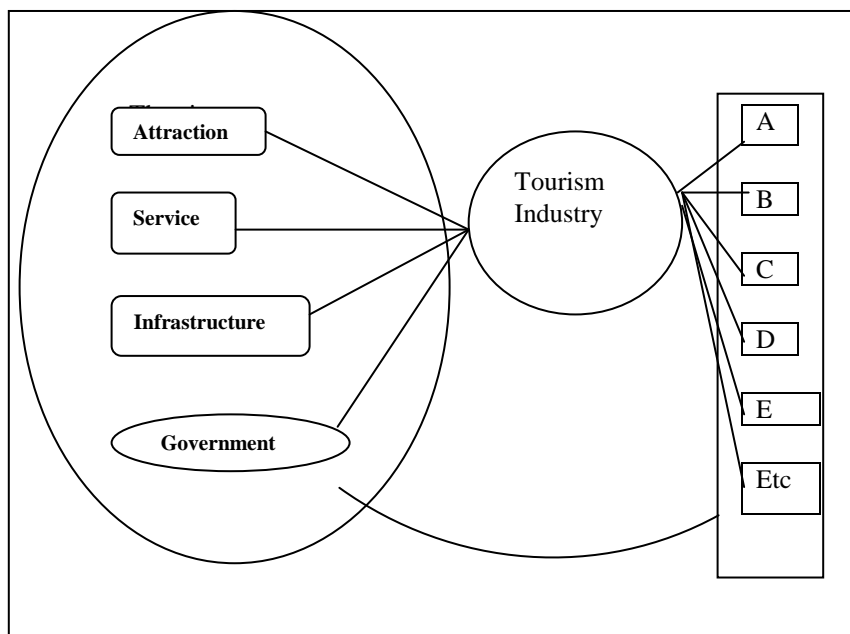


Fig. no. 2: The industrial perspective of urban tourism

Results

Statistic of the sample foreign tourists visited Bangladesh

Regarding the country of origin of the sampled tourist, they were grouped according to the major geographical areas. It is found that majority (58%) came from south Asia. Next important area from which tourists visit Bangladesh is Europe (24%). America stands in third position (10%) in terms of tourist generating region to Bangladesh. One important point to mention here is that 80% of the South Asian tourists are from India.

Table no. 1: The country of origin of foreign respondents (%)

Geographic origin	Percentage of the tourists
South Asia	58%
Europe	24%
America	10%

Others	8%
Total	100%

Source: Primary Data

It means that Bangladesh should focus on SAARC (South Asian Association for Regional Co-operation) countries to attract more tourists, as the distance among SAARC countries is not an impediment to travel to Bangladesh by people of these countries. Moreover, the costs of travel and tourism may be well within the reach of tourists of these countries. Additionally, SAARC countries have similarities in culture, customs, norms, food habits and behavioral patterns.

Table no. 2: The average length of stay (actual/intended) of respondents (%)

Average length of stay (actual /intended)	Percentage of tourists
up to 3 days	12%
4 to 6 days	10%
7 days	72%
more than 7 days	6%
Total	100%

Source: Primary Data

In the research, the researcher founded that 72% tourists come here for more than seven days.

Opinion of foreign tourists

They came in Bangladesh not to visit Dhaka but out sight of Dhaka. Most of them felt Dhaka as a city of people. None can move here smoothly. They are not satisfied. They said they have nothing to do at night. Recreational facility is not sufficient. Security, traffic gridlock,

safety, hospitality is deteriorated. Except the people of old Dhaka are still very much friendly. They are very warm and cordial.

Opinion of the City Resident

City resident has a negative image on Dhaka. They are facing problem on the sector including transportation, accommodation, security and safety, night life, Theme park and other facilities.

Opinion of the visitors from Bangladesh

They feel awkward while in Dhaka, they are happy with Zoo, Theme park, Medical care, historical place, city view, shops and price in general. But incase of security they are in great danger most of the time they face cheating, mugging and sexual abused.

Total Evaluation of Tourists' Attitude:

Tourist attitude and their valuation are given bellow, where **1** is **highly negative** and **5** indicate a **highly positive** attitude.

Museums:	4.32
Historical attraction:	3.58
Recreation:	2.58
Theme park:	2.95
Park:	3.08
Transportation:	1.09
Accommodation:	3.16
F & B Facilities:	3.33
Nightlife:	1.09
Shops:	3.57
Hospitality:	2.85
Feeling of safety:	1.09
Quality of the medical care:	3.05
Price/quality in general:	3.27

Over all satisfaction: An average satisfaction is found about Dhaka. In five scales it is 2.76.

Case Studies

Case study: 1

I came across a woman, by the name Yoko Yawazawa, very shaggy appearance and was in a great hurry. She has hail from a middle

class family in Japan. She came to visit Bangladesh for fifteen days. She had visited Cox's bazaar, Saint Martin, Ranganmati but she did not visit any historical place. She said with a compliance that old Dhaka and outside of the places of Dhaka is not safe. And abduction, back biting has dangerous effect to the foreigners. Yoko added that, the architect of Old Dhaka and National Assembly house are amazing and fascinating. He also added that, the infrastructure of Cox's bazaar is much better than any other place. She liked that places though there were some problems. She said that, she would again visit Cox's bazaar in future and will suggest her well wisher to visit Bangladesh.

From researcher own field work it is found that most of the tourist felt unsecured while in Dhaka. Needless to say, the security system of Dhaka has collapsed. Even most of the city resident never hangs out in a tourist place alone and after evening. The statistical result researcher found that **the rating of tourist evaluation on safety in a five point scale is 1.09.**

Case study: 2

Rabishanker Sinha came from Srilanka. He said that, he had visited some of the places of the country. He liked the archeological places most. Mr. Sinha complained that the history of ancient Mughal Empire is so representative in the world civilization. But Bangladesh is not taking care of it. He is fade up with the bureaucratic red tapism of Bangladesh. He had faced problem also in getting visa. He complained that it had taken more than 9 days through it was a matter of 9 minutes. Mr. Sinha said that, he did not found any representative in Colombo International Biman Desk. He then came to Bangladesh by Thai airways. Mr. Sinha argued that the major problem of Bangladesh tourism is transportation.

From my own research work I found that most of the tourist faces such type of problem in Dhaka. In Old Dhaka all historical monument and relics are in great danger. There is no one to care about it.

Case study: 3

Stephen Bress, a researcher came from England. He is student of London Trinity College. He did a research about Sylheti aborigines Manipuri. He stayed more than six month. He was in the departure lounged of Zia International Airport. He just concluded by saying that

Good bye Bangladesh, I was very unhappy here; I will never be here and will recommend others not to come in Bangladesh.

He was dissatisfied because of lack of information, security, safety, transportation, night life and recreation. There is no night life in Dhaka.

Case Study: 4

Mr. Kazi Golam Mortoza is a director of a software firm. He is a good traveler. Dhaka never attracts him in field but historical heritage. He is totally dissatisfied. He said it took two to three hours to go a place not more than 3 to 6 kilometer. Traffic gridlock makes life as hell. He also recommends improving security system, accommodation and recreational facilities.

From researcher own field work, it is found that most of the tourist faces such problem. And they are not satisfied on Dhaka.

Major problem of Dhaka City as tourists' destination

Since tourism is a multi-sectored and multi-dimensional industrial and its Promotion, Marketing and development largely depend on the composite development of other sectors primarily infrastructure; the development in Bangladesh is primarily confronted in such a situation. To be specific the problems of Dhaka city as tourists' destination facing following problems:

- 1) Lack of the image as an urban tourist destination;
- 2) Lack of park, bar, theatre, night life facility;
- 3) Financial constraints in both, public and private sector for development of tourism;
- 4) Lack of marketing efforts and sales promotion;
- 5) Lack of proper infrastructure development;
- 6) Lack of product development in tourist potential areas;
- 7) Socio-economic impediments to tourist inflow;
- 8) Environmental pollution and unplanned development particularly in tourist resorts;
- 9) Lack of tourism awareness among the domestic people;
- 10) Improper health and unhygienic conditions in the city, particularly in tourist resort areas;
- 11) Lack of proper and suitable transport facilities for tourists;

- 12) Lack of proper and inadequate rules, regulation and enactment etc, for proper development, operation and management of tourist resort and establishments;
- 13) Apart from the above factors, the absence of association of the coordinated agencies, desired to be responsible for tourism development have also affected this sector to a great extent.

Recommendation

This Research outlines through following points, some areas where simple development could bring huge fortune for Bangladesh, especially for Dhaka city:

1. Some exclusive zone may be developed for the tourists, where each facility likes wine, woman, dancing, gambling everything would be available only for the tourist.

2. Exclusive theme park, indore and outdoor sports facility, world class theatre hall should build.

3. For night life need Casino and Bingo, Brothel, special transportation and tour service should introduce.

4. In such spot, especially there are some tourists attractions, some beautiful huts may be constructed for the tourists by private enterprises. In those huts tourists may be lodge and served by villagers with indigenous food and custom. This could give the tourist complete indigenous flavor.

5. Well transportation system may be developed all around Dhaka where sight seeing bus which has no hood or toy trains could be made available to give a clear view of this beautiful nature.

6. Accommodation may be arranged for tourists in the houses of tribal people and there life style.

7. Programs like sight and sound may be made about different places, archaeological sites and monuments. These programs may be presented in respective places about which that program is made of a live commentary about the monument, history.

8. Personnel of Bangladesh missions abroad may be motivated to inform foreign tourists about countries attractive places and facilities.

9. Frequent river cruises in Buriganga, Turag, Shitalakkha, Kirtonkhola, Karnafully, Surma and Padma may be arranged by the BPC with all desired facilities for the tourists.

10. Tight security all around the Dhaka or in old Dhaka may be arranged where tourists could move freely without the fear of being hijacked or looted.

11. Some highly secured and restrictive red-light areas may be established for the tourists.

12. In each of the tourist zones, an extremely good communication system like internet, digital phone, fax, etc. should be made available for the tourists.

Given the premise above, it is the responsibility of both the public and private sectors to come forward in preparing the master plan and the implementation of it for urban tourism development in Bangladesh.

Conclusion

Urban tourism is known to be one of the very prospective sectors of a country's economy, but like others, it is being neglected since long past that's why Dhaka is not prepared as an urban tourism city. Fortunately, it is observed that a number of steps have been taken recently by both public and private sector for accelerating the developments of the tourism sector of Bangladesh. It can therefore be said that the tourism industry offers greater scope for the development in the areas of economy, society, culture and religion. Many countries, therefore, have been priority to this sector in their development programs. In developing countries like ours, tourism can contribute in many areas of which economy is noteworthy. In a country like Bangladesh, which has abundance of manpower, tourism could have a significant impact on our economy by providing employment to employed and disguised employed of millions. Tourism can provide both direct employment in areas like hotels, motels, restaurants, railways, airports and other services directly used or consumed by tourists and indirect employment in entertainment industry. Tourism, through its backward linkage, also provides employment to millions particularly in construction, furnishing and equipment, farming, food and beverage industries. Bangladesh are endowed with most of the high points tourism attractions to offer to foreign tourists and a number of measures like 'Tourism Police' taken by the government from time to time for the development of tourism sector; there is no mention worthy growth and development taken place in this field.

Security nowadays is one of the important determinants of selecting a travel destination. Security for tourists is not cheap, but to be competitive in real terms, host countries must today allocate significant amounts of resources toward it. In an age when tourists include in the price of the trip and implicit estimate of the probability of harm, Bangladesh must include in its economics policy matrix a set of measures to be competitive from the standpoint of visitors safely.

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The Quality of Life and relevant Approaches based on Capabilities and Functionalities

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Abstract

Recent research regarding the quality of life developed different approaches concerning the use of objective and subjective indicators, as well as the relevance of hypotheses, propositions and methods of analysis or of evaluation. Starting from the conceptual difficulties regarding the term of 'quality of life', this article focuses upon the contributions of Amartya Sen on the relationships between resources, liberties, capabilities, functionalities and human development. A separate section attempts to capture the shift of accent from the approaches of a quantitative type towards those of a qualitative type, founded on capabilities, functionalities, and the factors of conversion of resources into elements of quality of subjective life. The following sections are consecrated to the contributions to the development of the model proposed by Amartya Sen and to the reception of this model by a few specialists in the field, as well as to its relevance within scientific research and the foundation of public policies.

Keywords: quality of life, capabilities, functionalities, objective indicators, subjective indicators.

The quality of life and its determining factors

Within the language of social sciences, the quality of life refers to the aspects of welfare of the individuals in society, and the research

of the quality of life regards the resources and opportunities which exist in the society, as well as the conditions of life needed in order to have access to resources and opportunities. The explanations of the factors which contribute to the research of the quality of life reveal multiple perspectives of analysis. Firstly, there is the type of approach, where we can distinguish between: the psychological tradition, which underlines the importance of personality traits; sociological research, which focuses on the influence of social factors in the evaluation of living conditions; economic research, which focuses on comparative analyses of the relationship between the relative and absolute levels of material welfare.

Secondly, one should highlight the set of indicators used in the analyses regarding the quality of life. While the subjective indicators regard personal attitudes, preferences, opinions, values etc., the objective indicators refer to aspects which are easier to observe and measure, especially focusing on the aspects of the social and economical performance of a society.

Thirdly, we should mention the diversity of explicative theories upon the quality of life, from among which the most well-known are: the theory of social comparison (a report with a reference group, with an actual or anticipated situation, as opposed to relative standards or multiple discrepancies); the theories connected to adaptation or adjustment (developed as a model of the relationships between the subjective and objective dimensions of the quality of life); the theory of the macro-social conditions upon subjective welfare; the theory founded on capabilities and functionalities, highlights the importance of life conditions offered to the people by society and the way in which they capitalize them to their own interest.

Another set of problems concern the difficulties of defining the concept of quality of life, such as: the distinction between subjective and objective indicators, the means of using the concepts, the use of indicators and the means of application in empirical research, the different options of measuring the quality of life, the analysis of the relationship between the objective and subjective indicators, the use of research data in the formulation of public policies etc. In discussing these aspects, I. Precupeţu discovers that “the theory which guides the quality of life is fragmented and one cannot talk about a unitary theory of the field, but about a series of theoretical contributions and interferences of sociologists, psychologists, economists or specialists in

the field. However, within the partial approaches, on different fields of the quality of life, as well as within the approach of the quality of life as a whole, we recently notice a theoretical accumulation, either as a consequence of extended empirical research, or as a consequence of interferences or borrowings appeared between different sciences and approaches” (2011, p.40).

In the same context, A. Sen and M. Nussbaum draw attention upon the fact according to which “the search of an approach of the quality of life which can be applied universally stands under the sign of the promise of bigger power, capable of fighting for their life, which have been traditionally oppressed or marginalized. However, this research is confronted with the epistemological difficulty of adequately defining this approach, of indentifying the resources of norms and the way in which can be proved as being the best. This approach is also confronted with the ethical danger of paternalism, because it is obvious that, much too often, these approaches have been insensible to what is valuable in the life of people from different parts of the world, and have thus served as an excuse for not researching sufficiently these lives” (1993, p.4).

A significant moment in the analysis of the difficulties mentioned and the redefinition of founding concepts is represented by the Report of the Commission for Measuring Economical Performance and Social Progress (2009), elaborated under the coordination of J. Stiglitz, A. Sen and J.P. Fitoussi. This highlights the importance of the quality of life and people’s welfare in the measurement of social progress, as well as the legitimation of the shift from measures based on economical production to measures focusing on people’s welfare.

The report includes three conceptual approaches of the quality of life: the traditional approach of objective and subjective indicators, the approach based on capabilities and the approach of the economy of welfare and equitable allocations. Starting from the idea that both, the objective and the subjective dimensions are important in the evaluation of the quality of life, the authors of the report recommend the improvement and the development of indicators in the fields of health, education, personal activities and conditions of environment, social relations, public participation and the factors of individual and collective insecurity. Special attention is given to “subjective welfare”, a distinguished recommendation being that statistics institutions should include within their systems of indicators measures meant to capture

“people’s evaluations of their own lives, their positive experiences and their priorities” (Stiglitz and collab., 2009, p.58-59).

By synthesizing the theoretical accumulations of the studies consecrated to the quality of life, the report recommends a separate approach of social inequalities, highlighting the importance of understanding and measuring them in an integrated way. In this context, the measurement of inequalities in the different fields of the quality of life among individuals, social groups, generations or of those fields which affect marginalized people and of the disadvantages which manifest themselves sometimes cumulatively constitute a part of the recommendations regarding the quality of life.

Taking into consideration the purpose of this article, I will mention that the report systematizes a set of fields of the quality of life, dimensions which are defined in their economical, sociological, psychological and political implications, as well as regarding the individual, group, social and relational levels. In essence, we are talking about: the standard of life (income, fortune, the structure of consumption); health; education; personal activities, including those connected to work; political participation and the governing system; the functioning of social relationships or relationships of association; the present and future conditions of the natural environment; aspects concerning the insecurity of an economical and personal nature (Stiglitz and collab., 2009, p.45-54).

Following this overview, we will now focus upon the contributions of Amartya Sen to the thoroughness of aspects concerning capabilities, functionalities and the factors of conversion of individual welfare, as well as upon the theoretical and practical significances which derive from this approach.

Liberties, capabilities and human development

In the analyses that the initiated, Amartya Sen considers the approach founded on capabilities as a normative framework for the evaluation of the inequality and welfare of the individual in the context of public policies of the quality of life and social progress. His preoccupation lies in going beneath the theory regarding social justice and the transcendence which characterized the theories of social justice in favor of the idea concerning the way in which social injustice can be reduced or the ways by which once can progress in the accomplishment of social justice. His starting idea is that “the value of the standard of

life is determined by the very way of life and not by the possession of goods, whose relevance is derived and variable” (Sen, 2004, p.25).

As opposed to the utilitarian approaches which limit the quality of life to the distribution of resources and the monetary calculus of incomes and expenses, he proposes shifting the accent from “primary goods” to the “effective evaluation of liberties”, while simultaneously going beneath the conception that identifies the real behavior with the rational one, where rationality is defined by much too restrictive terms (Sen, 2004). Sen thus introduces qualitative criteria along the quantitative ones regarding economic growth and welfare, as well as highlighting the fact that development is tightly connected to an extension of liberties on all levels, a liberty being the essential tool for human development.

In his paper *Development as Freedom* (2004) in particular, the author argues the need for an integrated analysis of economic, social and political activities, involving a variety of institutions and interactive representations. He highlights the relationships between certain instrumental liberties (economic opportunities, political liberties, transparency guarantee, ensuring a system of social protection etc.) and the mechanisms of organization and functioning of the institutions (the state, the market, the judicial system, the political parties, mass-media, the opposition groups), as well as the role of individual liberties which he considers both a primary purpose and a means of supporting economical life.

Sen talks about capabilities which he considers “basic capabilities which allow a person to function” (Sen, 2006), with the following coordinates: the social and economical environment to which he or she belongs, living functionalities (long life, adequate nutrition, state of health, self esteem, public participation, access to education etc.) and that person’s capabilities, or what he or she can do to be the given person.

For Sen, resources are not the only defining factors of the standard of life; one should also include the capabilities, which guarantee the satisfaction of needs, “capabilities being the closest to the notion of standard of life”. He thus proposes establishing the standard of living according to the satisfied needs, because they solve the absolute-relative dispute in defining poverty. This aspect clearly transpires from the evaluation of the real income and the difficulties which arise as a

consequence of the diversity of human needs, as well as of the social surroundings which intervene in this process.

Among the sources of variation which intervene between real incomes and the welfare which one can obtain, the author identifies the following aspects:

- The heterogeneity of the physical characteristics of people connected to age, sex, risk factors, illness or certain disabilities which determine different individual needs. Even if by the different mechanisms of social redistribution one ensures a certain compensation of these disadvantages, they cannot be fully corrected by means of redistribution or transfer of such incomes.

- The variety of environmental conditions (from climatic surroundings, to geographical location), which directly influence what a person can obtain from a given level of income, just as pollution and the risk of certain illnesses in one region or the other obviously alter the quality of life which the inhabitants of that given area can benefit from.

- The great diversity of social conditions which intervene directly or indirectly in the practice of conversion of incomes and personal resources in the constitutive elements of the quality of life. In this regard, one can include both aspects connected to the educational system, at the level of public and individual safety, of medical assistance and pollution, as well as those referring to the nature of community relationships or of certain social facilities.

- The differences from the system of interpersonal relationships and the models of social behavior which determine an accentuated variety of systems of values and of the evaluation standards of certain social conventions and practices. These aspects find themselves in the possibility of the individual to use his personal resources in order to obtain self esteem in relation to the other members of the society.

- The distribution within the family, namely the way in which the obtained income is shared among those who earn the incomes and those who don't. "The welfare and liberty of individuals in a family, writes Sen, will depend upon the way in which the family income is used to promote the interests and objectives of different family members (...). The distribution rules followed within the family (for instance rules according to sex, age or perceived needs) can constitute a major difference in the accomplishments and non-accomplishments of individual members" (2004, p.100).

A. Sen brings a series of arguments referring to social equity and the phenomenon of poverty, a phenomenon which cannot be simply regarded as an insufficiency of income, but especially as a privation of capacities that a person must possess. In his opinion, the arguments in favor of approaching poverty from the perspective of individual capacities are: as opposed to the low income which has an instrumental value, focusing upon the privations generated by the lack of income has an intrinsic importance upon capacities; the income is not the only tool of generating capacities, there being an array of factors and influences in this field; the instrumental relationship between a low income and reduced capacities is different not only among individuals, but also among families and communities as a whole.

The third aspect bears a special importance for the evaluation of political action focused on the reduction of inequality and poverty, for at least the following reasons: the relationship between income and capacity will be strongly affected by the age of the person, the sex, the social roles which one individual or the other has, by geographical location, state of health and other variations over which the person has no control; the disadvantages encountered in the process of conversion of income into capacities can be more intense than what appears in the space of the income, especially when we are talking about elderly people or people with certain disabilities; in the conditions where the income obtained by the family is used disproportionately among the members of the family, it is possible that the extent of privation applied to the neglected members cannot be reflected accordingly through the prism of family income; there are economical and social surroundings where the relative privation regarding incomes can determine an absolute privation at the level of capacities and of participation to the life of the community, just like the case of the countries where, in order to obtain the same social functions, a higher level of incomes is necessary.

The idea supported by the American economist and sociologist is that of a distinction between the inequality of income and economical inequality, the relationship between the inequality of income and the inequality existing in other relevant spaces being owed to different economical influences “others than the income which affects inequalities at the level of individuals’ advantages and fundamental liberties” (2004, p.145).

Thus, even if modern societies have consecrated certain principles and norms regarding the access to public facilities, they are deformed due to the asymmetry of information, limited economical resources, the incorrect adjustment of the economical behavior with the principles which are largely accepted by society, the negative effects of self esteem, the emergence of phenomena of marginalization and social stigmatization, the insufficient capacity to negotiate for the maintenance of programs of social assistance and the services they provide, the emergence and extension of corruption and state bureaucracy (Sen, 2005, 2006, 2009).

Recent developments of the capacity-functionality model

Although Sen has not elaborated a list of liberties and capabilities, he states that liberty is a means and an engine of individual and social development. In this respect, he talks about: political freedom; the individuals' chance of using economic resources with the purpose of consumption, production and exchange; social chances, which also include the necessary framework for health and education; guarantees for transparency, which support trust, fighting corruption and limiting the abuses in the system; social security, including emergency situations (unemployment, incapacity to work, restructuring of the workforce market etc.).

The thesis that he supports is that each of these liberties extends the chances of self accomplishment of individuals and the fact that neither of them constitutes a "luxury" of modern societies, but foundation stones for a normal development of individuals and the society. Hence the additions that he brings regarding the distinction between functionalities, capabilities, functionality of an "n" type and set of capabilities.

Generally, these could be structured around the following fundamental ideas:

- The first idea refers to taking into consideration the economical and social conditions in which the individuals transform goods into functionalities, which leads to the conclusion according to which "defining capabilities depends on the way in which their transformation into functionalities takes place. While capability reflects the person's ability to attain a certain functionality, the realization of a functionality depends on a series of social factors (the alteration of the possibilities of transformation or conversion of goods into

functionalities according to social development) and of the person (age, sex, state of health, access to medical services, education level etc.).

- The second idea refers to the fact that the distinction between the actual accomplishments and the freedom of accomplishment involves focusing one's attention upon people's functionalities and their capacity to attain valuable functionalities. If a type "n" functionality describes the combination of actions and activities which constitute a state in a person's life, the set of capabilities describes a set of accessible functionalities and vectors that a person can attain. Consequently, one can talk about the fact that the set of capabilities is obtained by the application of freezable uses to all goods which are accessible to individuals, the notion of capability being used as a synonym for the set of capabilities (Clark, 2006; Huzum, 2011; Kamm, 2011).

The conclusion suggested by Sen consists in the fact that the evaluation of a person's welfare refers not only to his liberties and rights, but also to his capacities of valuing them. For this reason, welfare regards the functionalities attained or accomplished in the individual's activity, as well as the economical and social situations in which the individual finds himself. Moreover, functionalities are seen within a dynamics, which start from basic functionalities (such as the individual's state of health) all the way to more complex ones (such as one's membership to a form of community).

By developing these ideas from the point of view of social sciences, Martha Nussbaum offers a more adequate perspective upon capabilities, including the possibility of processing them in the Human Development Index (HDI) model, or within empirical research. Thus, she proposes a list of ten capabilities, respectively opportunities based on personal and social circumstances, which transcend the geographical, national, cultural and religious spaces.

The personal capabilities which ought to be supported by all democratic societies are connected to the following fundamental aspects (Nussbaum, 2003, 2006, 2011):

- Life – being capable to live decently until the end of a human life of normal length; not dying prematurely or before someone's life was so reduced that it was not worth living.

- Physical health – being capable of having good health, including nutrition and an adequate shelter.

- Physical integrity – being capable of free travel from one place to the other and being protected against physical, sexual, moral and familial violence.

- Senses, imagination, thinking – being capable to use your senses and to develop human activities in an informed and cultivated way by means of an adequate education. Being capable to use your imagination and your thinking regarding your own events and activities (literary, musical, religious etc.). Being capable to use your thinking in ways which can guarantee freedom of speech and of expressing certain civil rights.

- Emotions – being capable to form attachments for people or objects, to love and to pity, to feel longing, thankfulness and justified anger. Being capable of avoiding emotional states dominated by fear, manipulation, persuasion and anxiety.

- Practical motivation – being capable of forming a conception regarding “good” and of engaging in a critical reflection regarding the planning your life (which involves protecting your freedom of conscience and your freedom of motion).

- Affiliation – being capable of living next to others, of manifesting interest for other human beings, of getting involved in different forms of human interaction and of being able to imagine yourself in someone else’s situation. Being capable of treating your peers equally and with dignity, avoiding discriminations of race, gender, sexual orientation, ethnical membership, religion, national origin etc.

- Relationship with other species – being capable to live with a preoccupation and real interest regarding animals, plants and nature in general.

- Recreational activities – being capable of enjoying leisure time and the availability to practice entertaining activities.

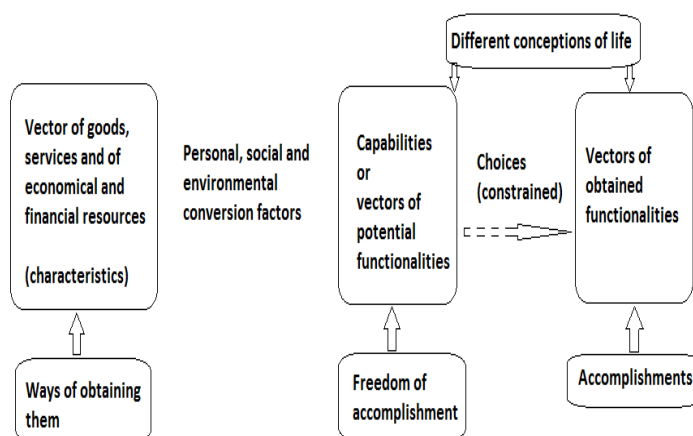
- The control of the social, political and material environment – being capable to participate in the political processes which govern the life of a person or a community based on the rights and freedom of speech and association. Being capable of owning mobile or immobile goods, of having equal rights with others and the right to obtain a working position in conditions which are equal to those of others. In terms of employment, being capable of working as a human being, following your personal interests and interacting in conditions of mutual recognition with other workers.

The reception of the model founded upon capabilities

From the aspects presented before, an essential aspect results: both, Amartya Sen and Martha Nussbaum consider capabilities as an array of possibilities which allow people to exist and to develop certain activities. The capability refers to the set of instruments, to their characteristics and functionalities, as well as to the individuals' capacity to highlight them in order to satisfy their material and spiritual needs.

From the perspective of both authors, material goods serve individuals as instruments which satisfy specific needs in the conditions where the given goods are highlighted by the capabilities of the individual. In other words, supplying certain material or financial resources to the individuals is sufficient to guarantee to them equitable chances for welfare, perhaps also due to the fact that some people have more reduced capabilities of converting resources into elements of welfare.

Fig. no.1. The structure of the resources-capabilities-functionalities relation



Source: Adapted from Robeyns, 2011, p.12

In order to clarify the aspects mentioned above, Ingrid Robeyns (2011) proposes a scheme where one can notice the conversion between goods and functionalities, a conversion influenced by two factors: personal characteristics (physical condition, intelligence, state of health,

age, level of education etc.), social characteristics (public policies, social norms, discriminatory practices, gender roles, social status, power relations etc.) and environmental characteristics (climate, infrastructure, public institutions, public goods etc.).

Starting from the scheme in fig. no.1, we will draw certain conclusions which result from the comments regarding the capability-functionality relationship and their influence in building quantitative and qualitative indicators for the empirical research of the problems discussed.

- Making the distinction between the means and purposes of attaining welfare and human development, from this point of view, only the purposes have an intrinsic value, while the means are tools for attaining the purpose of human development and welfare. Both, welfare and development must be discussed in terms of people's capabilities in order to function, namely to develop actions and activities (attained functionalities) which give significance and value to personal life. At the same time, it is necessary to differentiate between accomplished functionalities and liberties or capabilities of people to lead the way of life which they desire and to become what they want to be. Regarding these aspects, we pose questions such as the following: if the people are healthy, if they have resources for their capabilities, if they have access to medical assistance, if they own information and knowledge, if they have access to different levels of education, if society possesses the necessary institutions, if the people are protected by the law, if they respect the rules of social cohabitation or if they have access to real political participation (Clark, 2006, p.3).

- Taking into consideration the idea according to which the capabilities mentioned above have, as a foundation, economical production and financial resources, as well as political practices, the functioning of social institutions, the existence of public goods, of social norms, traditions and customs. This means that development and welfare must be considered in an integrated form, with a particular focus upon the relationship between the material, mental, spiritual and social coordinate, or on an economical, social, political and cultural dimension, as stated by Robeyns (2011). On the other hand, one must underline the idea that life represents a combination of "actions and states", and the quality of life can be evaluated in terms of capabilities of obtaining valuable functionalities (Nussbaum and Sen, 1993, p.30). The capability-functionality relationship is also established by defining

capabilities as “different combinations of functionalities (actions and states) that a person obtains. Capacity is thus a set of vectors (or n types) of functionalities which reflect the individual’s freedom to follow a certain way of life (Sen, 1992, p.40).

- The fundamental approach upon capabilities and functionalities focuses upon the individual personality thus extending the area of evaluation of the quality of life “far beyond the possession or accumulation of resources” (Șerban-Oprescu, 2011, p.181). This extension of the significance of the term of quality of life poses problems regarding the evaluation and comparison at an interpersonal level of elements which give value to the quality of life, as well as the aspects concerning the level of value attributed to these elements. Hence the idea that the approach founded upon capabilities can be applied differently, according to the purpose of the measurement, the level of analysis, the available data, the institutions which study such situations and the type of analysis at which these evaluations will be used. In other words, the identification of the evaluation space imposes using certain qualitative and quantitative indicators, capabilities being able to be analyzed using qualitative, quantitative, imperative and subjective data supplied by institutions or surveys (Mărginean, 2011).

- Approaching capabilities as a theoretical model for the evaluation of human development and welfare can be applied both at the level of social structure and at an individual and interpersonal level. From this perspective, the social structures signify the public policies for change at the level of society, while capability refers to a person’s chances of living his life taking into consideration the environment in which he lives and his capacities to capitalize these possibilities in his favor. On the other hand, the theoretical model of capabilities allows us to make interpersonal comparisons of welfare, as well as the possibility of measuring welfare, poverty and social inequity (Pogge, 2002, p.169).

One must not forget that the evaluation of capabilities and the use of analysis operators are marked by judgments of value which cannot be forgotten in the field of research of social sciences. As A. Sen admits, “there is no escape from the problem of evaluation when a class of functionalities is selected to describe capabilities (...). The need for selection and discrimination is neither a reason for embarrassment, nor sole difficulty in the conceptualization of functionalities and capabilities” (2009, p.11).

From the aspects discussed above, at least three main ideas result. The first refers to the fact that A. Sen and his followers proposed to identify an approach of the quality of life more adequate to reality, where terms of resources and welfare, typical to traditional economy, are replaced by other two terms – functionality and capability –, whose meaning goes beyond the area of economical research, thus receiving a strong interdisciplinary character. In this framework, the concept of quality of life is subjected to transformations of meaning through approaches centered on a person's abilities to perform valuable deeds or to attain states connected to "subjective welfare".

The second idea, shared by authors like Cohen (2008), Tobler (2009), Veenhoven (2010), Precupeţu (2011), Huzum (2013) and Robeyns (2013) regards the following aspect: personal abilities must be reported to what is called "social quality", namely the degree to which citizens can participate to the economical and social life of communities, in conditions which can enhance their welfare and individual potential. Among the conditions which lie at the base of social quality, one can enumerate: social and economical security (preserving health, occupation, the safety of the standard of living, food safety, chances of life, environmental problems); social cohesion (public safety, solidarity among generations, economical cohesion and cohesion of social status, social capital etc.); equal inclusion and opportunities in institutions (inclusion on the workforce market, in services of health and education, in the field of living, in community services etc.); skills and capabilities (social, cultural, economical, political, social, psychological, of social mobility etc.).

The third idea regards the necessity of a differentiated approach of the elements which make up the concept of quality of life and the institution of a system of indicators which can permit the processing of the terms used. Among the difficulties mentioned thus by Clark (2006), Stiglitz, Sen and Fitoussi (2009), Veenhoven (2010), Pukeliene and Starkauskiene (2011), Mărginean (2011) and others, one should keep in mind the following: the complexity of concepts; the diversity of factors which determine the quality of life; the distinction between social and psychological factors, as well as between subjective and objective evaluations; the combination of economical, sociological and psychological indicators, theories and interpretations; the theoretical generalizations which do not succeed in covering the whole specter of causal conditionings between states, events and situations; the limited

possibilities of validating results; the problem of report between the costs of implementing the programs of optimizing the quality of life and the effective results at a practical level; the different perception of the quality of life in relation with the objective living conditions of a society etc.

Conclusions

The analysis of the liberties-capabilities-functionalities-human development relationship brings to the attention of theoretical and practical research the following more important aspects:

a) The studies consecrated to the quality of life involve a reevaluation of the relationship between economical and social based on reconsidering human values and needs. Thus, the resources and the opportunities existing in society, as well as the living conditions necessary in order to have access to resources and opportunities are regarded. We are talking about both, the individual and collective resources (education, health preservation, living and social services, social inclusion, living standard, social cohesion, social equity, individual satisfaction etc.), as well as the choices made and the results obtained.

b) The quality of life does not only refer to results which are affected by the different options of people, but also to the capacity of obtaining them, of the existing opportunities. The problem raised in this respect consists in the connection of resources with results and reporting them to indicators such as: welfare, human development, social capital, the quality of society etc. For this reason, the approach based on “functionings” (the things that a person succeeds to do or to obtain) and “capabilities” (the alternative combinations of “functionings”) is considered too abstract and too difficult to operate in empirical research.

c) Having its origin in the field of economical science, the approach founded on capabilities and functionalities is tributary to the contextual aspects by which one reveals both characteristics of individual life and elements of social structures, which favor or restrict individual life strategies. The idea of “capability” especially includes the existing chances for a person to have a better life and the social environment which give him the possibility to make personal choices, but also personal characteristics which can lead to a life lived according to its purposes and values. The set of capabilities constitutes the

configuration resulted from the opportunities of social contexts, personal characteristics and individual choices.

d) Used in an interdisciplinary framework, the approach founded on capabilities and functionalities can lead to the development of public and social policies. Starting from the discovery of people's living conditions, from the reference of people to these conditions, from their subjective experiences, from the evaluation of different fields of social life and from the expectations of the population regarding them, the approach of capabilities contributes to the identification of data of an objective, subjective and evaluative type, meant to offer support to public policies oriented towards the improvement of the quality of life.

e) The approach founded upon capabilities must be put in relation with the conditions that society offers to the people so that they can live a better life. In other words, the conditions offered by society (economic affluence, civil rights, the absence of corruption, economic, political and personal liberties, gender equality, social participation, pluralism, the modernization degree of education and urbanization, information etc.) contribute fundamentally to life satisfaction. Although it is difficult to estimate the contribution of each variable, it is obvious that the experiences which offer the individuals better structural conditions are materialized by higher levels of life satisfaction.

f) Recent developments in the theory of capabilities have permitted researchers to modify the theoretical framework by a different application of the set of objective and subjective indicators of the quality of life. On the other hand, the adjustment of the theoretical framework permitted the formulation of ethical norms of social justice, the flexibility of social programs, reference to the criteria of economic efficiency, the analysis of the motivational structures of individuals on the workforce market, the discrepancy which arises between the people who own a set of identical capabilities and which reach different types of functionalities due to their personal choices etc. The discussion of the advantages and the restraints of this approach remains however an open theme for both, theoretical and practical-applicative research of social sciences.

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The role of NIHD¹ in promoting Women Cooperatives in Morocco: a micro econometric Analysis

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Abstract

The objective of this paper is to show the extent to which the implementation of the National Initiative for Human Development (NIHD) contributed to the growth of women cooperatives. This paper has mobilized individual data from 1512 women cooperatives. Based on a probit model, the results show that the NIHD has not only contributed to the growth of cooperatives of women, but also to significantly reduce the rate of inactivity (2). In terms of public policy, public program should cover more territory, and should not be limited to predetermined areas so that the fruits of development can be of benefit to all.

Keywords: NIHD, cooperatives of women, development, morocco.

Introduction

Being conscious of the economic and social role in the development process of the country, Morocco has undertaken a number of reforms to raise the position of woman to be a key pillar in generating

¹ National Initiative for Human Development

²Inactive cooperative: In principle, a cooperative is declared inactive if it has not operated any activity for at least one year. In fact, based either on field visit or on the PV of the cooperative (which indicates that the cooperative has not done any activity), or on the advice of the technical administration to declare a cooperative is inactive.

prosperity. Thus, during the last decade, the status of women has seen a remarkable evolution. Today, women occupy a central position in the development of human resources of the country.

In the 1970s, economists like Boserup (1970) developed the approach of "integration of women in development." This approach shows the fact that the contributions of women in development were overlooked and inadequately assessed. In addition, it advocates rendering the development more efficient, more convenient and more real by directly involving women in its process.

At the beginning of the 1980s, the concept of "women and development" is based on the argument that women participate in the development process but on not very well defined and uneven bases. It appears a marginalization of women who probably is detrimental to a harmonious, efficient and sustainable development; thence are born projects of improving women's access to resources as well as their involvement in the development process and decision making.

The level of economic and social development of a country depends on the stock of human resources available, but also on how this stock is used. Optimal allocation of productive capacity of a country or society is the imperative to create systems where the best competencies, both masculine and feminine can flourish. Practically, women suffer from disparities in all fields compared to men. The indicator on the gender differences of the World Economic Forum (Gender Gap Index, GGI) shows that countries with greater gender equality are more competitive and grow faster.

Hirsch and Peters (2002) state that "*the nature of the activity pursued differs depending on whether the company was created by a man or a woman*". Women tend to create businesses in areas related to services such as retail, public relations, education and advisory services, while men are more inclined to industry, construction and high technology.

In Morocco, the public authorities have implemented the NIHD (National Initiative for Human Development). It is an ambitious program to improve the living conditions of the most vulnerable population, especially women. The most appropriate way for the integration of women in the development process are the cooperatives

(3). This type of entrepreneurship allows women to meet their basic needs and has certain characteristics that suit their statutes. Indeed, women's cooperatives (4) are managed according to the principles of democracy and solidarity. They appeal to more labor force than technology. They do not need just a limited funding in the starting phase. They are essentially based on the manipulation of local raw materials. Thus, it contributes to the preservation of Moroccan cultural heritage, especially in the artisanal domain.

The development of this type of entrepreneurship is made possible by the nature of the Moroccan society which is a society of true solidarity in which collective work and mutual aid are ancestral values.

The balance sheet of the NIHD 2011-2012 is reassuring. The committed funds were amounted to 7.45 billion MAD, including a participation of NIHD estimated at 4.38 billion MAD. 8800 projects and 1700 activities were realized. These projects have benefited to 2.4 million people. In reviewing the projects that benefited most from the funds of the NIHD, the sectorial analysis of these projects shows the predominance of the agricultural sector at 53% followed by commerce and professions with 31% and craftsmanship that comes in third position with 13% of scheduled Income Generating Activities.

The objective of this article is in this direction, where we try to show the extent to which the implementation of this program has contributed to the development of female entrepreneurship and the increase of the activity of feminine cooperatives that already exists. The paper is structured as follows: the second section presents the main objectives and challenges of the NIHD. Section three presents a review of literature on the link between women's entrepreneurship and the emancipation of the woman. Section four will be devoted to the empirical study. The fifth section concludes.

3 Law No. 24.83 determining the general status of cooperatives and the functions of the Office of the Development and Cooperation define the cooperatives as follows : "The cooperative is a grouping of physical persons who agree to unite to create an enterprise charged to provide, for their exclusive satisfaction, the product or service they need and to operate and manage it by applying the fundamental principles defined in Article 2 and seeking to achieve the goals laid in Article 3 of this law". From this, the subject of a cooperative is to meet the common needs of its members, and who do not seek personal gain, to achieve social or societal objectives based on an economic activity.

4 Women Cooperative: Is a cooperative whose members are exclusively women.

NIHD: Goals and challenges

The NIHD is a national program initiated by the public authorities in Morocco and aims to improve the living conditions of the most disadvantaged layers Morocco. Its implementation is essentially dictated by the insufficiency of programs in the fight against poverty. Indeed, more than half of the national budget is allocated to the social sector.

Despite the improvement of certain socio-demographic indicators, the outcomes are below the expectations of the population. Faced with this critical situation, it was decided to launch the NIHD in 2005.

The main thrust of this initiative is based on: 1) the fight against poverty; 2) social exclusion; 3) the precariousness; 4) the establishment of a cross-program (5). It is a program which is conducted especially in the most disadvantaged communities. It's funding ensure around 60% of the state budget. The contributions of local and international cooperation (World Bank, European Union, African Development Bank) represent equal shares up to 20% each. This involvement of the international community reflects the recognition of the importance of this major project in the economic and social development in Morocco.

In terms of initial assessment, we can say that the achievement of the objectives is on the right path. Thus, the Ministry of the Interior, in charge of managing the National Initiative for Human Development (NIHD), can rejoice. The 2011-2012 report is reassuring. Since 2011, the number of beneficiaries reached nearly 2.9 million.

As for the committed funds, they amounted to 7.45 billion MAD, including participation of NIHD estimated at 4.38 billion MAD. As for achievements in 2011-2012, 8800 projects and 1700 activities were realized within the framework of the NIHD.

These projects have benefited to 2.4 million people with a budget of 6 billion MAD. With regard to income generating activities, they were amounted to 1984 in favor of 29760 beneficiaries. The invested amount was of 558.4 million DH, including a contribution of 356 million MAD of the NIHD.

Within the framework of the upgrading program in the territorial level, the Committee noted that the NHRI has allowed the construction

⁵This axis consists in the organization of trainings and technical assistance for local elected representatives, in the social, cultural and sportive animation for the benefit of the local population.

of 423 km of roads and tracks, commissioning of 27 health centers, assuring drinking water for 86 Douars (6) and electrification of 1,425 Douars.

It should be noted that during the year 2012, the number of projects initiated by the NIHD has increased considerably from 4300 in 2011 to 4,986 in 2012, for a global investment of 3.86 billion MAD, including 2.46 billion MDH from the NIHD.

By examining the projects that benefited most from the funds of the NIHD, sectoral analysis of these projects shows the predominance of the agricultural sector at 53%, followed by commerce and crafts with 31% and craftsmanship that comes in third position with 13% of AGR⁷ programmed.

Feminine entrepreneurship and empowerment of women

Cited by Charlier (2006), the concept of empowerment has appeared in the first radical movements of blacks in North America (Falquet, 2003). This concept is also, according to Charlier (2006), inseparable from popular educational practices inspired by Brazilian Paulo Freire in the 1970s. From the 1980s, it was then widely used in feminist discourse (Charlier, 2006).

For DAWN, empowerment is a process of social change that enables disadvantaged individuals (especially women) to claim equal treatment. In this context, the works of Sen and Grown (1987), Moser (1993) and Parpat (2008) emphasize the difficulty of achieving equitable economic and social development without a process of empowerment for women.

The multiplicity of works that have tried to define the concept of women's empowerment illustrates well its complexity. Mahmud (2003) summarizes the essential definitions given to this concept. For him, this concept is strongly related to key concepts such as power, capacity, rights, interests and control. Malhotra et al. (2002) affirms that the concept of empowerment should be conceived as operating at several levels. Thus, public intervention in favor of the empowerment of women in a domain will not necessarily be followed by empowerment in other domains.

Beyond these academic works, the concept of empowerment is

⁶ Douar is a group of people who are generally located in rural area

⁷ Income Generating Activity

officially adopted in the Beijing Conference (1995). Indeed, international organizations and NGO shave generalized the use of this concept.

The indicator on the gender differences of the World Economic Forum (Gender Gap Index, GGI) shows that countries with improved gender equality are more competitive and grow faster. This gender gap indicator is at first calculated by the World Economic Forum in order to capture the extent and trend of gender disparities. It measures the average level of disparities attained in a given country in four key aspects: economic, education, health and politics. The GGI represents the arithmetic average of four sub-indicators: the sub-indicator of participation and economic outlook, the sub-indicator of the level of education, the sub-indicator of health and life expectancy as well as the sub-indicator of political responsibility. The used index attempts to measure gender disparities in access to resources and opportunities in these countries and not their actual levels of resources and opportunities. The indicator penalizes or reward the countries based on the degree of disparities in enrolment rates, and not according to the general level of education in the country. Therefore, this indicator makes it possible to Benchmark whatever is the level of development of the country.

In an exploratory study, Shim and Eastlick (1998) have compared the Hispanic entrepreneur women. The authors found that companies run by women are younger, had fewer employees and lower incomes in comparison to their male counterparts.

In Morocco, to our knowledge, most of the literature focuses on the issue of female entrepreneurship in the capitalist perspective, and no work has attempted to empirically analyze female entrepreneurship in its social sense. This issue will be discussed in the next section.

Empirical analysis

The women's cooperatives in Morocco - an analysis of the sector

Sample description

According to ODCO (Co-operation Development Office), Women's cooperatives in Morocco are about 1512 spread over 74 provinces which are almost 20 cooperatives for each province. The

average age of women’s cooperatives is almost six years which reflects that the development of this type of entrepreneurship is a recent phenomenon.

The average number of participants per cooperative is 18 people (table no.1). The average inactivity rate of cooperatives is 15%. This rate drops to 5% after 2005 (the date of the establishment of NIHD).

Table no. 1. Descriptive statistics

Variable	Mean	Std. Dev.	Min	Max
Effective	20.43689	28.66363	1	192
Average age	6.147541	2.993527	0	15
Members	17.65574	9.068049	7	57
Inactive Cooperative after 2005	5.508197	9.987697	0	50
Inactive Cooperative	15.7541	16.66399	0	67

Source: Author’s achievement

Breakdown per sector

The sectorial distribution of female cooperatives suggests a high concentration of women’s cooperatives in the two traditional sectors of agriculture (537 cooperatives which is 35.5% of creations. It includes farming, beekeeping, rabbit breeding, the poultry) and handicrafts (592 units or 39.2% of co-operatives are regrouped in textiles, embroidery and traditional and modern sewing) followed by Argan sector (210 cooperatives are almost 14% of the cooperatives).

Table no. 2. Distribution of women according to the cooperatives sector

	Effectives	Percentage
Agriculture	537	35,5
Literacy	6	0,4
Argan	210	13,9
Art and culture	1	0,1
Craft	592	39,2
Consumption	1	0,1
Foodstuffs	125	8,3
Printing and stationery	1	0,1
Labor	7	0,5
Fishing	7	0,5
Medicinal and Aromatic Plants	25	1,7
Total	1512	100

Source: Author's achievement

Repair according to the situation of the business line

One of the levers which currently face women's cooperatives is that of its sector of activity. According to this criterion, just over 15% of women's cooperatives are inactive (237 cooperatives).

Table no. 3. Distribution of women cooperatives according to the situation of its activity

	Numbers	Percentage
Active	1275	84,3
Inactive	237	15,7
Total	1512	100

Source: Author's achievement

Distribution according to the date of creation: after NIHD

Concerning the evolution of female workforce cooperatives related to the implementation of NIHD, we can clearly see that the number of cooperatives is almost tripled after NIHD first initiated. For example, the number of cooperatives created before the implementation of NIHD is 405 (26.8%), while more than twice was created after the

NIHD (1107 units). These figures are a first index that allows us to support the crucial role played by this initiative in the development of the women’s cooperative in Morocco.

Table no. 4. Distribution of women’s cooperatives according to their relationship with NIHD

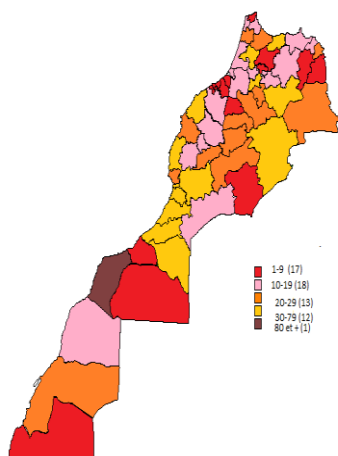
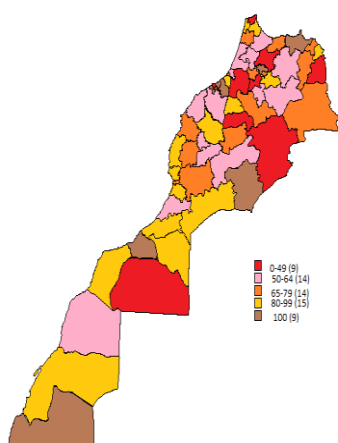
	Numbers	Percentage	Valid Percentage	Cumulative percentage
After NIHD	1107	73,2	73,2	73,2
Before NIHD	405	26,8	26,8	100
Total	1512	100	100	

Source: Author’s achievement

Geographical distribution of women’s cooperatives

In what follows we try to analyse the distribution of cooperatives in a spatial perspective. We show which provinces have a high concentration of women cooperatives and which have higher rates of inactivity? Finally what are the provinces that experience a remarkable growth of cooperatives after 2005?

The province of Layoune, which is located in the Moroccan Sahara, includes the highest number of women’s cooperatives with more than 80 cooperatives. 12 provinces have a number of cooperatives that fall between 30 and 79. They are basically those located in the region of Souss Massa Draa, as well as the provinces of Essaouira, El Jadida, Errachidia and El Houceima. On the other hand, the poorest provinces in terms of women’s cooperatives are essentially urban ones. They are the provinces of Rabat, Sale, Casablanca and Tetouan.

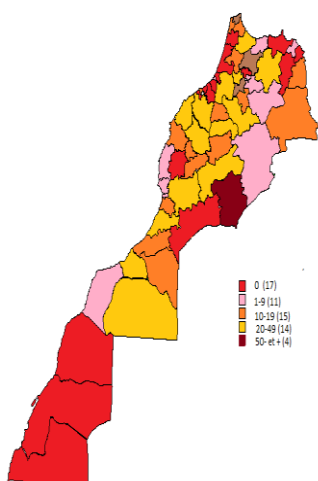
Graph no. 1. Distribution of female cooperatives by province**Graph no. 2.** The percentage of cooperatives created after 2005 by provinces

Source: Author's achievement

Some provinces have seen the creation of women's cooperatives just after the implementation of NIHD. They are mainly the two Sahara provinces of Tan-Tan and Lagouira, as well as the provinces of Nador, Rabat, Sale, Skhirat, Temara, Fez and some provinces of the great Casablanca.

Concerning the geographical distribution of inactive cooperatives, we find that the highest rates of inactivity (over 50%) is observed in the province of Zagora which is located in the extreme south-eastern of Morocco. It is an underprivileged province with higher poverty rates. Other provinces are less inactive (the inactivity rate is between 20% and 49%). We may cite, for example, the provinces of Settat, El Jadida, Kelaa Sghagna, Taroudante, Ouarzazate, Khmissat and Taounate. However, some provinces do not include inactive cooperatives. In particular, this includes the provinces of Chichawa, Tata, Larache-Casablanca axis provinces and some eastern provinces (Nador, Oujda, Taourirt). Thus, we can confirm that the inactivity of women's cooperatives characterizes essentially the rural provinces.

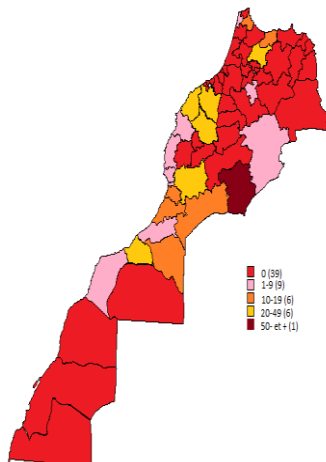
Graph no. 3. The percentage of inactive cooperatives by provinces



Source: Author's achievement

The following graph has clearly shown that the phenomenon of female cooperative inactivity is greatly reduced after 2005, the date of the implementation of NIHD. Although the rate of inactivity has remained high in the province of Zagora, we observe that the number of provinces, in which all the cooperatives are active, is increased to 39 provinces, while it was only 17 provinces. Despite the expanded efforts within the framework of the NIHD, only six provinces still have inactivity rates that range between 20 and 49%.

Graph no. 4. The percentage of inactive cooperatives created after 2005 by the provinces



Source: Author's achievement

An econometric analysis of the role of NIHD in the growth of women cooperatives

Our purpose here is to show to what extent the introduction of NIHD has allowed the development of women cooperatives both in terms of quantity and reduction of inactivity.

Data and methodology

- Data

The conducted empirical work makes use of individual data of 1512 women cooperatives spread over the entire Moroccan territory.

For each cooperative, we have enough information about: the creation date (which determines those created before and after the NIHD), the province in which it belongs, business line, the number of members and the rate of inactivity.

- Methodology

In order to analyse the factors affecting the level of inactivity of women's cooperatives, we rely on a dichotomous econometric model which is written as follows:

$$\begin{aligned} Inact_i = & \alpha_0 + \alpha_1 Age + \alpha_2 Sect + \alpha_3 Provin \\ & + \alpha_4 Adh + \alpha_5 ApresINDH + \mu_i \end{aligned}$$

The dependent variable is the level of inactivity of the cooperatives. The cooperative takes the value 1 if it is inactive but zero if it is not (this variable is named Tau_Inactiv). Several variables may influence the rate of inactivity of women's cooperatives: the age variable (called Age). Among the explanatory variables we find also the business line. This latter is approximated by ten binary variables corresponding to ten possibilities: Literacy, Argan, art and culture, craft, consumption, food, printing and stationary, labour, fishing, medical and aromatic plants. To avoid collinearity problems, the eleventh sector which constitutes the baseline (agriculture) is not included. The size of cooperatives is approached by the number of members. Two methods are introduced by two binary variables (number of adherents is between 7 and 20 and the number of adherents is greater than 20). Third, membership number is less than 7 as the reference category. To take into account the impact of the NIHD, we include a quantitative binary variable that takes the value of 1, otherwise it turns to zero if the cooperative is created after the implementation of NIHD.

Results

The table reports the results of estimating the intrinsic determinants for women cooperatives. Before interpreting the results, it is relevant to highlight the methodology followed during the development of the table. A positive coefficient is linked to an increase of inactivity compared to the reference and vice versa for the case of a negative coefficient. In order to make the table easier, we have postponed only the business sectors and the provinces that are significant.

The business line is a key determinant of women cooperatives inactivity. In comparison to the sector of agriculture, inactivity of cooperatives decreased significantly in food sector. In fact, women are highly active in the harvest of the local raw materials especially food products since this type of activity does not require significant funding start-up or technology.

The coefficient associated to age is positive and significant. Thus the inactivity of cooperatives increases with seniority. In addition, the data presented in the table helps to realize the potential role of the size of cooperatives in their businesses. Indeed, the more the number of members ceased to increase (beyond 7 participants), the more likely to fall in inactivity rises. In as much as women cooperatives do not follow an adequate human resources management system, it is natural that conflicts among members arise. These conflicts become extremely weighty as the cooperative increases in size which could lead to inactivity in turn.

On another issue, the study reveals that when a cooperative is created after the implementation of NIHD, the probability of falling into inactivity is reduced since the associated coefficient is negative and highly significant. This reveals the importance of this initiative in the promotion and growth of women cooperatives.

Table no. 5. The results of estimating the dichotomous model

	Variables	Coefficient	Standard errors
Sector			
	foodstuffs	-1.090*	(0.601)
Provinces	6.prov1	2.907***	(0.789)
	10.prov1	4.116***	(1.576)
	15.prov1	1.683**	(0.837)
	17.prov1	1.351*	(0.741)
	19.prov1	2.253**	(1.092)
	21.prov1	1.780**	(0.822)

	23.prov1	2.384**	(1.184)
	28.prov1	2.137***	(0.811)
	36.prov1	2.096**	(0.864)
	48.prov1	1.899**	(0.956)
	53.prov1	3.337***	(1.136)
	58.prov1	2.530***	(0.822)
	63.prov1	3.371***	(1.103)
	64.prov1	2.002*	(1.140)
	65.prov1	3.048***	(1.052)
	68.prov1	2.668***	(0.640)
	72.prov1	1.560*	(0.930)
	73.prov1	2.748***	(0.669)
	74.prov1	4.349***	(1.685)
Age		0.0642***	(0.0182)
Size	membership number between 7 and 20	0.629**	(0.320)
	Number of members over 20	0.570	(0.367)
NIHD	Cooperatives created after NIHD	-2.018***	(0.275)
Constant		-2.612***	(0.728)

Note: *** p<0.01, ** p<0.05, * p<0.1

The success of NIHD is achieved by the completion of several complementary and not prioritized objectives. It is, in fact, to strengthen support for local associations that are active in human development, governance and local capacity through flux of information and awareness rising events. NIHD has been expected to boost the local economy through income-generating activities such as, offering support to local cooperatives (agricultural productions, livestock and craft), to processing and packaging units of local products as well as local projects in these various areas: aromatics, beekeeping, handicrafts, rural tourism and the preservation of the environment.

Practically nine years after its implementation, this public policy has finally reached its cruising speed. Indeed this Moroccan initiative is recognized as a model in human and social development within the developing countries. Indeed, Morocco hosted in 2007 the first international conference on the subject in collaboration with the United Nations Environment Programme for Development. Its main purpose is to share the experience with more than fifty African countries, large foreign financial institutions and NGOs⁸, in order to create synergies in human development.

Conclusion

NIHD is designed in order to consolidate the political gains by promoting the economic, social and cultural rights of citizens as well as to struggle against social and territorial disparities. The advent of the National Initiative for Human Development (NIHD) has played a key role in the development facing the cooperative sector of women especially during the last three years in its approach to reduce poverty in rural areas through supporting the creation of income-generating activities. This later has benefited several women's cooperatives in the field of farming and crafts.

Like other types of entrepreneurship, the development of cooperatives faces several constraints. Among these obstacles, we can cite the inherent systematic discrimination against the female gender and difficult access to financing and the conditions to benefit from credits are disadvantageous. Also, the credibility of these women is often being tested when dealing with institutions or partners. Women's

⁸ Non-governmental organization

cooperatives suffer from a lack of technical skills and knowledge in management and marketing of their products, which explains the low productivity and competitiveness. Cultural constraints, in the same vein, constitute an additional obstacle hindering the success of women in the conduct of their business. Thus, it is obviously clear that governmental and non-governmental organizations, bilateral cooperation, the UN system, national or local associations, professional bodies and local authorities are required to coordinate and work in partnership to enhance cooperative entrepreneurship to the level that it plays sounds in the socio-economic development of the country.

In addition, the majority of these women is artisans or small-size livestock producers and has not yet the entrepreneurial culture which forms the essential added value to the development and sustainability of any projects. Indeed, the emergence of entrepreneurial culture can be summarized in four main factors: a desire for independence, monetary incentives, and factors related to the family and others related to work or the personality of the entrepreneur. These are the major variables that encourage the initiative towards entrepreneurship events (Carter et al, 2003; De Martino and Barbato, 2003). The investigation of these items can be subject to the future works.

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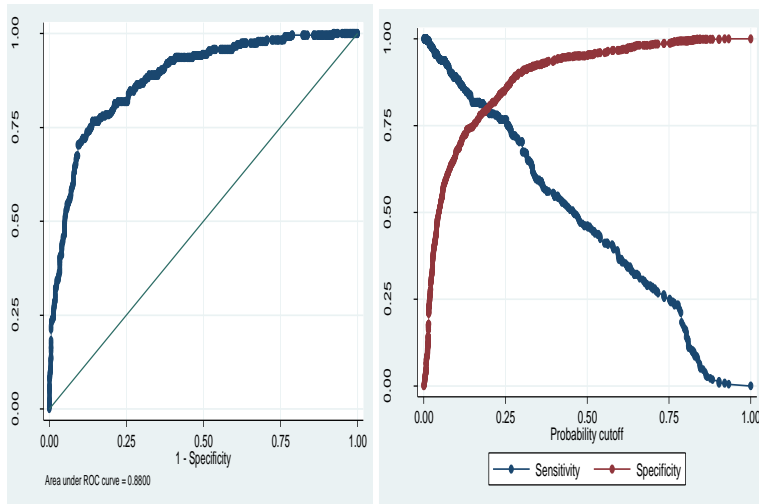
Annex:

Table no. 6. List of province

Code	Province	Code	Province
1	Agadir ida ou tanane	38	Laayoune
2	Al fahs anjra	39	Larache
3	Al hoceima	40	Marrakech
4	Al youssoufia	41	Mediouna
5	Aousserd	42	Meknes
6	Assa zag	43	Midelt
7	Azilal	44	Mohammadia
8	Ben slimane	45	My Yaakoub
9	Benimellal	46	Nador
10	Berchid	47	Nouaceur
11	Berkane	48	Ouarzazate
12	Boujdour	49	Ouazzane
13	Boulmane	50	Oued-eddhab
14	Casablanca	51	Oujda angade
15	Chaouen	52	Rabat
16	Chichaoua	53	Rhamna
17	Chtouka ait baha	54	Safi
18	Driouch	55	Sale
19	El hajeb	56	Sefrou
20	El haouz	57	Settat
21	El jadida	58	Sidi Bennour
22	Errachidia	59	Sidi ifni

23	Es-smara	60	Sidi slimane
24	Essaouira	61	Sidi-kacem
25	Fes	62	Skhirate temara
26	Figuig	63	Tan-tan
27	Fkih ben saleh	64	Tanger assilah
28	Guelmim	65	Taounate
29	Guercif	66	Taourirt
30	Ifrane	67	Tarfaya
31	Inzegane ait melloul	68	Taroudante
32	Jrada	69	Tata
33	Kalaa sraghna	70	Taza
34	Kenitra	71	Tetouan
35	Khemisset	72	Tinghir
36	Khenifra	73	Tiznit
37	Khouribga	74	Zagoura

Graph no. 5. Discriminate power of probit model



Establishing the Financial Rating of the Banking System. A European Perspective

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Abstract

The present paper develops a methodology for determining the financial rating of the banking system using a panel data from the period 2009 - 2013 for the banking systems of the 28 European Union countries. The methodology consists in determining the extremities of the intervals for each of the financial indicators of the banking system using quartiles analysis, setting the scores for each indicator and determining the category of financial rating for the banking system. Finally, it is presented a classification of the banking systems of the European Union countries, for the period 2009 -2013, based on the financial rating methodology obtained.

Keywords: financial rating, banking system, rating category, quartiles, panel data

Introduction

The financial rating of the banking system (the financial score) is a number of points determined based on an analysis of a set of criteria considered. To determine the financial rating, it can be used as a set of

criteria the following financial indicators: solvency, liquidity, loans quality, profitability, various metrics for market banking risks.

Developing a financial rating methodology for banking system is useful both, for the national banking regulatory - supervisory authority and multinational banking authority (European Banking Authority for instance) in a certain economic union: (i) in the first case, it can use the financial rating to assess each bank individually; (ii) in the second case, it can use the financial rating for the evaluation of each national banking system in the economic union. In both situations, depending on the financial indicators values, various scores obtained for them and the financial rating, it may require measures to improve the financial indicators of the banks or banking systems.

A well - known banking rating system is CAMEL. This is a quantitative technique that consists of a set of performance measures based on the following rates: capital adequacy, assets quality, management, earnings and liquidity. CAMEL was implemented firstly in U.S. in 1979, and later globally. In 1995, the Federal Reserve and the O.C.C. replaced CAMEL with CAMELS, adding the "S" which stands for the sensitivity to market risk. Several studies examined the utility of CAMEL ratings for the monitoring of banks. With respect to predicting bank failure, Barker and Holdsworth (1993) found evidence that CAMEL ratings are useful, even after controlling for a wide range of available information about the banks. Cole and Gunther (1998) found that although CAMEL ratings contain useful information, it decays quickly. Hirtle and Lopez (1999) found that, over the period from 1989 to 1995, the supervisory CAMEL information gathered during the last on-site exam remains useful with respect to the current condition of a bank. Nimalathan (2008) used CAMELS rating system to make a comparative study of financial performance of banking sector in Bangladesh. Christopoulos, Mylonakis and Diktapanidis (2011) examined the case of Lehman Brothers by analyzing its financial particulars of the 2003 - 2007 periods using the CAMELS ratios.

Determining the Financial Rating of the Banking System. The Case of the Banking Systems from the European Union

In order to determine a methodology of financial rating for the banking system, we used statistical data for the banking systems of the 28 EU countries: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech

Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Poland, Portugal, Romania, Slovak Republic, Slovenia, Spain, Sweden, United Kingdom. Statistical data source for our analysis is Financial Soundness Indicators from the International Monetary Fund.

We used five financial indicators for determining the financial rating of the banking system: (i) solvency; (ii) loans quality; (iii) assets liquidity; (iv) profitability; (v) foreign exchange risk.

The solvency indicator is calculated as the regulatory capital to risk-weighted assets ratio. It measures the capital adequacy of credit institutions from the banking system.

The loans quality indicator is calculated as the non-performing loans to total gross loans ratio.

The assets liquidity indicator is calculated as the liquid assets to total assets ratio. This ratio provides an indication of the liquidity available to meet demands for cash.

The profitability indicator is return on equity (calculated by dividing net income by the average value of capital over the same period).

The foreign exchange risk indicator is calculated as the mode value of the net open position in foreign exchange to capital ratio. This indicator shows the sensitivity to foreign market risk, compared with capital. It measures the mismatch of foreign currency asset and liability positions to assess the vulnerability to exchange rate movements.

In our analysis, we created a panel annual data sample for the five financial indicators above for the 28 European Union countries banking systems. The sample length is five years (2009, 2010, 2011, 2012 and 2013). The panel data sample is unbalanced because of the lack of the statistical data in some years and for some indicators from some countries (see table no. 4 for some detailed data in median terms for each country during the 2009-2013 period).

We set the intervals extremities of each of the five financial indicators calculating three of the five quartiles of the data sample. The **three quartiles** used in our analysis are: (i) quartile 1 is the first quartile (the 25th percentile) of the data sample; (ii) quartile 2 is the median value of the data sample (the 50th percentile); (iii) quartile 3 is the third quartile (the 75th percentile) of the data sample.

We set the extremities of the intervals as follows: $FI \leq q_1$, $q_1 < FI \leq q_2$, $q_2 < FI \leq q_3$, $FI > q_3$, where: FI is one of the five financial indicators of the banking system (solvency, loans quality, assets liquidity, profitability and foreign exchange risk); q_1 , q_2 , q_3 are quartiles 1, 2 and 3, respectively. For each of the above four intervals we used one of the following scores: 1 point, 2 points, 3 points or 4 points (the best are the 4 points score).

For the sample mentioned above, the three quartiles calculated are presented in table no. 1.

Table no. 1: The quartiles for financial indicators of the European Union banking systems

Financial Indicators (in %)	Quartiles (in %)		
	q1	q2	q3
Solvency	12.7	14.8	17.0
Loans quality	3.7	5.4	11.9
Assets liquidity	19.4	24.5	34.0
Profitability	0	6.8	11.1
Foreign exchange risk	0.6	1.8	5.4

From the economic point of view, it is good to have higher values for the solvency, assets liquidity and profitability and lower values for the non-performing loans and foreign exchange risk. In the table above, higher values than the quartiles 3 for solvency, assets quality and profitability means good scores for the banking system. Lower values than quartiles 1 for loans quality and foreign exchange risk means good scores for banking system.

We used the three quartiles above to determine the five intervals for each financial indicator of the banking system. For each interval of the financial indicator we use one of the following scores: 1 point, 2 points, 3 points or 4 points, where 1 point is the weakest score and 4 points is the strongest score. The correspondence between the financial indicators and the scores is presented in table no. 2.

Table no. 2: The correspondence between the intervals of European Union banking systems financial indicators and scores

Financial indicators (in %)	Scores (in points)	
	1	2
Solvency (SV)	SV≤12.7	12.7<SV≤14.8
Loans quality (LQ)	LQ>11.9	5.4<LQ≤11.9
Assets liquidity (AL)	AL≤19.4	19.4<AL≤24.5
Profitability (P)	P≤0	0<P≤6.8
Foreign exchange risk (FR)	FR>5.4	1.8<FR≤5.4
Financial indicators (in %)	Scores (in points)	
	3	4
Solvency (SV)	14.8<SV≤17.0	SV>17.0
Loans quality (LQ)	3.7<LQ≤5.4	LQ≤3.7
Assets liquidity (AL)	24.5<AL≤34.0	AL>34.0
Profitability (P)	6.8<P≤11.1	P>11.1
Foreign exchange risk (FR)	0.6<FR≤1.8	FR≤0.6

We calculated the financial ratings of the banking systems as a weighted arithmetic average, with equal weights of the scores obtained for the five categories of financial indicators, as follows:

$$R = \sum_{i=1}^5 p_i * w_i$$

where:

R is the financial rating of the banking system;

p_i is the score for the i criterion, $p_i \in \{1,2,3,4\}$;

i is one of the following financial indicators: solvency, loans quality, assets liquidity, profitability, foreign exchange risk. $i = \overline{1...5}$

$$\sum_{i=1}^5 w_i = 100\%$$

In the majority of cases, the statistical data were available at least for one year for each financial indicator. In these cases $w_1 = w_2 = w_3 = w_4 = w_5 = 20\%$.

However, for the banking system from Finland, Netherlands and Portugal, the statistical data for foreign exchange risk were not available. In these cases

$$w_1 = w_2 = w_3 = w_4 = 25\%$$

For the banking system from Spain only data for solvency, loans quality and profitability indicators were available. In this last case

$$w_1 = w_2 = w_4 = 33.33\%$$

We set the rating categories, as follows (Table no. 3):

Table no. 3: The rating category of the banking system

Ratings (R) in points	$1 \leq R \leq 2$	$2 < R < 3$	$3 \leq R \leq 4$
Rating category	Weak	Moderate	Strong

The ratings for the banking system in the European Union are presented in table no. 4.

Table no. 4: Median values of the solvency, loans quality, assets liquidity, foreign exchange risk, profitability over 2009 - 2013 period and the ratings for the European Union banking systems

	SV	LQ	AL	FR	P	R
Austria	15.8	2.8	25.3	0.3	2.7	3.2
Belgium	18.5	3.3	34.3	2.3	3.4	3.2
Bulgaria	17.4	13.5	21.5	0.2	7.05	2.8
Croatia	20.5	12.3	32	2.3	8.3	2.6
Cyprus	10.2	7.6	28	1	-26.8	2.0
Czech Republic	15.3	5.2	29.9	1.1	19.7	3.2
Denmark	17.75	4.45	17.7	25.8	0.65	2.2
Estonia	20	4	16.7	23.6	14.2	2.6
Finland	14.6	2.5	7.5	...	10.1	2.5
France	12.55	4.15	41.9	0	7.75	3.0
Germany	16.4	3.1	41.1	4.4	9.8	3.2
Greece	11.7	27.3	32.3	15.9	0	1.4
Hungary	13.9	13.4	24.7	19.8	0.4	1.8
Ireland	18.9	16.1	25.1	0.4	-10.8	2.6
Italy	12.7	11.7	12.3	1.7	0.7	1.8
Latvia	16.5	14.1	30.9	9.05	5.1	2.0
Lithuania	14.8	18.8	23.4	0.5	4.9	2.2
Luxembourg	19	0.2	58.1	0.6	11.5	4.0
Malta	13.5	7.4	24.9	0	19.1	3.0
Netherlands	14.2	3	24.5	...	8.9	2.8
Poland	13.9	4.9	20.8	0.3	13.3	3.0
Portugal	10.5	5.2	14.8	...	-5.4	1.5
Romania	14.9	14.3	57.9	2.3	-1.7	2.2
Slovak Republic	13.4	5.3	38.3	1.2	9.1	3.0
Slovenia	11.4	11.8	14.2	1.8	-11.8	1.6
Spain	12	6	8	2.0
Sweden	11.9	0.7	21.4	5.4	14.1	2.6
United Kingdom	15.8	3.85	20.8	3.05	5.95	2.4

Solvency (SV), Loans Quality (LQ), Assets Liquidity (AL), Foreign exchange risk (FR) and Profitability (P) are in %. The rating (R) is in points.

In table no. 5, the banking systems for European Union countries from table no. 4 are arranged by rating categories.

Table no. 5: Classification of European Union banking systems by categories of rating during 2009 -2013 period

Rating category of the banking system	EU Countries
Weak	Cyprus, Greece, Hungary, Italy, Latvia, Portugal, Slovenia, Spain
Moderate	Bulgaria, Croatia, Denmark, Estonia, Finland, Ireland, Lithuania, Netherlands, Romania, Sweden, United Kingdom
Strong	Austria, Belgium, Czech Republic, France, Germany, Luxembourg, Malta, Poland, Slovak Republic

It can be said on the basis of the information shown in table no. 5 that the banking systems from Cyprus, Greece, Hungary, Italy, Latvia, Portugal, Slovenia and Spain are in weak rating category. They are less resistant to the adverse conditions and would likely deteriorate if a concerted action is not effective in correcting the areas of weakness. Consequently, these banking systems are vulnerable and require more than normal supervisory attention of the banking authorities. The banking systems from Bulgaria, Croatia, Denmark, Estonia, Finland, Ireland, Lithuania, Netherlands, Romania, Sweden and United Kingdom are in moderate rating category; in general, they are fundamentally sound and the supervisory response of the banking authorities is limited. The banking systems from Austria, Belgium, Czech Republic, France, Germany, Luxembourg, Malta, Poland and Slovak Republic are in strong rating category; they are sound in almost every financial aspect and they can resist to external economic and financial disturbances without the intervention of banking supervisory authorities.

Conclusions

The findings of this paper are multiple. Using a panel data from the period 2009 - 2013 for the banking systems of the 28 European Union countries, we developed a methodology for determining the financial rating of the banking system. The methodology consists in determining the extremities of the intervals for each of the five financial

indicators of the banking system using quartiles analysis, setting the scores for each indicator and determining the category of financial rating for the banking system. This rating model obtained allows a unitary financial evaluation of the banking systems from different countries and is useful to evaluate banks individually too. Finally, we presented a classification of banking systems for the European Union countries based on the financial rating obtained in this paper for the period 2009 -2013 resulting that, in European Union, 8 banking systems are in weak rating category, 11 banking systems are in moderate rating category and 9 banking systems are in strong rating category.

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The Clients of Special Events and specific Marketing Communication

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Abstract

In order for a company to perform well, nothing is to be left to chance. Managers fulfill a great variety of tasks very fast, which determines the necessity for marketing managers to not only be well documented, but also inspired in selecting the appropriate communication strategies that correspond to the special events that are being organized.

Countless studies show that receivers (consumers) prefer certain communication channels, and that those transmitting the messages have their own channel preferences (Rice et. all., 1998). Therefore, the efficiency of marketing communication relies on the transmitter (marketing manager) identifying and choosing the specific communication channels that the receiver (consumer) prefers. Under these terms and conditions, the challenge consists in identifying the correct channels preferred by the clients that are aimed at organizing special events.

Keywords: receivers, consumers, communication channels, organizing special events.

Introduction

Marketing managers from the new millennia have to handle a vast range of alternative media channels by which they send marketing

communications towards the clients. Advertising or marketing communication used by special events organizers represents the full effort of informing the market and stimulating the use of the company's services.

Philip Kotler says that *“marketing communications are the means by which companies try to inform the costumers, to convince them, and to remind them – either directly or indirectly – about the products and brands that they market. In a certain way, marketing communications represent the ‘voice’ of the brand and are a tool by which a dialogue can be formed and client relations can be built.”*

Marketing communications represent the voice by which the companies develop dialogues with clients and other interested parties regarding their products, services or other problems the company may be facing (Keller, 2001).

The importance of marketing communications has grown in recent years due to several reasons. The arrival and growth of IT and the fragmentation of the audience have fundamentally changed the marketing communications environment. The multiplication of ways in which a client can be reached through various types of traditional and nontraditional media have forced organizations to distance themselves from the model of mass communications and to face a growing number of options regarding their marketing communications.

Recently there has been a growth in marketing communications including internet advertising banners, emails and blogs, as well as communications through mobile phones, such as SMS and mobile TV. Internet and email have become part of the work place and family life for millions of people around the world. Text messages are also growing (Barwise and Strong, 2002, p.14).

Special events are unique market offers (“products/services”), having different characteristics from other market offers. For example, special events can be held in one or more locations; they can vary in terms of when they are initiated and when they are finalized, as well as the duration of the event; they can take place in temporary or permanent infrastructures; they can be organized by either private entities or franchised; the entry can be on the basis of tickets or free entry, and they can have commercial or non-profit purposes.

Marketing communications represent a key factor in the success of special events (Getz, 2005). Therefore, the diversity of this market

offer can raise different challenges for event organizers as they develop marketing communication strategies.

Marketing communications are becoming more dynamic, and *the roles of the transmitters and receivers interchange more and more often as they interact* (Vlasic and Kesic, 2007, p. 109). Therefore, the interest has been oriented towards understanding the way in which the Web 1.0 internet is used by the special events organizers as a marketing communication channel. Certain researchers have focused their attention on the special events marketing area and have found that *the organizations in charge of special events adapt the content of the internet marketing communications in response to the knowledge they have about the consumers' motivation for participating in special events.* (Filo and Funk, 2005, p.113).

After a research done by Filo et.all. (2009, p.22), it has been concluded that *consumers have been more satisfied by a social event's website when they have been involved in gathering data than when the data was exploratory.* These conclusions offer perspectives for the organizations in charge of special events in the process of planning internet marketing communication strategies.

Case study regarding the influence of advertising on the clients of the Noblesse Event Hall

Managers and marketing experts need to be preoccupied with the changes in the business environment, adapting to the market changes, knowing the clients' preferences, as well as many other important aspects, which are unknown until a thorough market research is made.

The case study presented in this article is based on making a research among the clients of S.C.VH 11 Gold Wedding S.R.L., by which to gather information that is both valid and valuable, in order to reach relevant conclusions regarding the marketing communication within the community.

In regards to the type of information that results from the research, it is a quantitative research, and in regards to the functional goal of the research, it is mainly an exploratory research due to the improbable sampling, but also a descriptive research, one that has followed the description and evaluation of the degree of influence advertising has on the clients of the Noblesse Event Hall.

The results of this research can be used to implement decisions regarding the marketing strategies which will be adopted by the company.

The defining elements of this research are presented below.

The goal of the research. The main goal of the research is to identify which communication channels the Noblesse Event Hall clients prefer.

The objectives of the research. These have been established starting from the main goal and are the following:

- What clients think of the Noblesse Event Hall services;
- Identifying which factors influence the use of the Noblesse Event Hall services;
- Identifying what are the characteristics of a quality service;
- Identifying which factors to take into account in acquiring the service package offered by the Noblesse Event Hall for the 2014 New Year's Eve;
- Identifying the means by which clients get informed in regards to the events that take place in the Noblesse Event Hall;
- What is the primary means by which the person found out about the existence of the Noblesse Event Hall;
- Identifying the degree of the influence of marketing communication on the clients;
- Measuring the degree of satisfaction or dissatisfaction of the Noblesse Event Hall clients;
- Establishing the profile of the Noblesse Event Hall clients.

The assumptions of the research. The following assumptions have been established:

- The majority of clients are satisfied by the diversity and quality of the services offered by the Noblesse Event Hall, the rest remaining undecided regarding the necessary improvements;
- The main criteria taken in consideration in choosing to organize a special event (wedding, baptism, New Year's Eve) in most cases is the price level;
- Many of the company's clients discover the Noblesse Event Hall through the Facebook page, demonstrating the power of virtual marketing;
- The majority of clients will recommend the Noblesse Event Hall to others.

The researched community. The general collectivity is represented by the majority of the Arad based clients of S.C.VH 11 Gold Wedding S.R.L. The results of this research can be extrapolated at the level of the specified general collectivity.

The observation unit is represented by the companies and individuals that benefit from the services of S.C.VH 11 Gold Wedding S.R.L, and the survey unit is the individual who participated at the New Year's Eve event organized in 2014 by the Noblesse Event Hall.

The data collection method. In order to respond better to the objectives of the research, we have opted for collecting data through email and Facebook by means of a survey with predetermined questions.

The sample size. The sample is comprised of 1000 clients from Arad, which represents a 95% probability of having guaranteed results, with a margin of error of $\pm 5\%$.

An authentic survey needs to fulfill the following conditions:

- to be relevant to the main goal;
- to be exact;
- to be as current as possible;
- to be available in a single center.

All of these are of course rigorous conditions which no survey can fully fulfill. The surveys are comprised of purposes that allow a certain margin of error due to different factors and these can't be avoided in practice.

As a base for our survey we used all the clients of SC VH 11 Gold Wedding S.R.L from the last 12 months (01.04.2013 – 01.04.2014). By client we mean every legal entity (such as companies) or individual that has benefited at least once from the Noblesse Event Hall services.

Determining the sample size and volume

We have taken into consideration the number of clients in the past 12 months (01.04.2013 – 01.04.2014) which means 2500 individuals and 2 companies of different sizes.

The statistical restrictions are found in equation used to determine the sample size:

$$n = \frac{t^2 p(1-p)}{\Delta_o^2} \quad \text{where:}$$

t = the factor relevant to the probability of guaranteed results (it is found in the statistical

tables of the Student repartition). Normally, a probability of 95% is chosen.

p = the ratio of the sample components that have the researched characteristic (because often the value of “ p ” is unknown, it is considered equal to 0.5 in order to considerate the worst case scenario and to maximize the value of the dispersion);

$\Delta\omega$ = the allowed limit of error (the margin of error), equal to $\pm 5\%$.

The following has resulted from the calculations:

$$n = \frac{(1,96)^2 \times 0,5(1 - 0,5)}{(0,057)^2} = \frac{0,9604}{0,003249} = 296 \text{ people}$$

(The minimum limit statistically)

In order to guarantee results with an error of $\pm 5\%$ and a trust probability of 95%, the final survey needs to be applied on a sample of at least 296 respondents, but because we are conducting a research to measure the influence of advertising on the Noblesse Event Hall clients, we have considered a sample of 100 individuals that are clients of SC VH 11 Gold Wedding S.R.L and have participated at the 2014 New Year’s Eve.

The data collection instrument. Corresponding to the data collection method, we have developed the data collection tool, which is a survey comprised of 16 content questions, as well as 4 identification questions, presented in the final cartridge.

After the survey was developed it was uploaded to Google Docs and the link was sent through email and Facebook. 45% of the responses came through email, while 55% came through Facebook. The results were collected in a period of two weeks.

Results and Discussion

The study regarding the influence of advertising on the Noblesse Event Hall clients has been sufficiently conclusive to mention a few relevant conclusions regarding the marketing communication organizing within S.C. VH 11 Gold Wedding S.R.L.

The sample structure is as follows:

- 52% of the respondents are males, while 48% are females;
- 36% have jobs that require higher education, 19% are high-

school and college students, 18% are managers and owners, 16% are employees earning medium wage, 6% are unemployed and 5% are retired;

- 53% of the respondents live in urban areas, while 47% live in rural areas;
- most respondents are between 26 and 35 years old, 31% are between 36 and 45 years old, 16% are between 18 and 25 years old, 11% are between 46 and 55 years old, 5% are under 18 years old and another 5% are over 55 years old.
- 26% earn between 1001 and 2000 RON, 23% earn between 2001 and 3000 RON, 17% earn between 4000 and 5000 RON, 14% earn between 3001-4000 RON, 11% earn over 5000 lei and 9% earn less than 1000 RON.

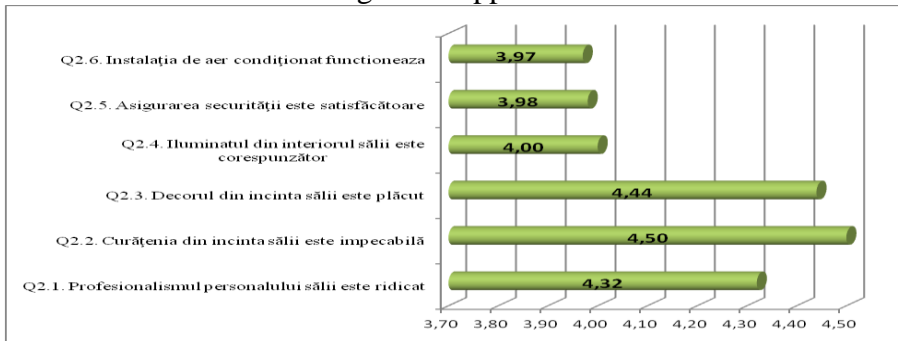
To conclude, we can say that the sample structure according to gender corresponds to a real structure, and the structure according to occupation, wage and where they live is proportionate. The structure according to age shows a higher focus on youth (64% are between 26 and 45 years old), individuals that are both - potential clients for renting the Event Hall and potential participants to certain events (weddings, baptisms, etc.).

- 65% of the respondents appreciate the quality as very good and 35% appreciate it as being good. The weighted average of the answers is 4.64, which shows a very good level of appreciation in regards to the services offered by the Event Hall.

It has been found that there is a significant difference (chi square=11.244, degree of liberty =5, $p=0.47 < 0.05$) between the appreciation of the quality of the services and the occupation. We can observe from the table that all occupation categories have given greater marks except retired individuals.

- The biggest weighted average of the responses is 4.5 (fully agree) for cleanliness, followed by decorations (4.44) and the professionalism (4.32). The other three factors (lighting, security and air conditioning) have all received values close to 4 (agree).
- All the services offered by the Event Hall are appreciated at a very good level because the weighted average of responses is higher than 4.5 and the medians have the value of 5. The most appreciated factor is the decoration (4.67), followed by the table arrangements (4.61), the access to services (4.60), the lighting (4.54), the bar services (4.52) and finally the table decorations (4.51).

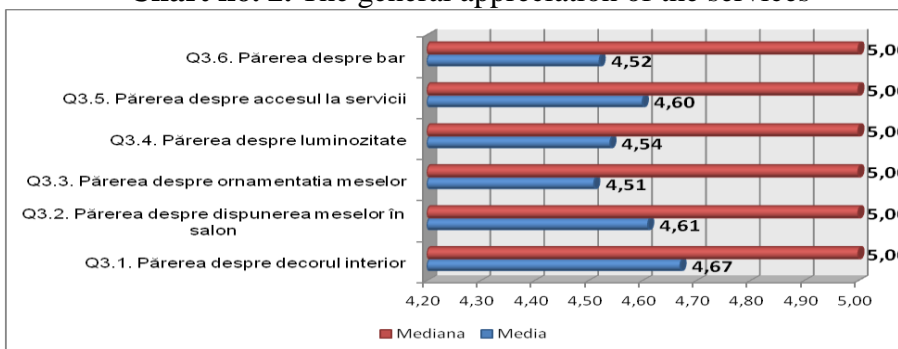
Chart no. 1. The general appreciation of the services



Source: data analisys in SPSS 2.1.

From the chart above we can observe that the biggest weighted average of responses is 4.5 (fully agree) for cleanliness, followed by the decoration (4.44) and the professionalism (4.32). The other three factors (lighting, security and air conditioning) all have values close to 4 (agree).

Chart no. 2. The general appreciation of the services

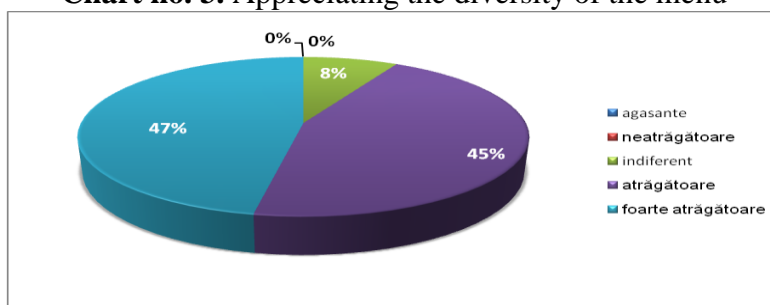


Source: data analisys in SPSS 2.1.

From the result analysis (chart nr.2), we can observe that all the services offered by the Event Hall are appreciated at a very good level because the weighted average of responses is higher than 4.5 and the medians have the value of 5. The most appreciated factor is the decoration (4.67), followed by the table arrangements (4.61), the access to services (4.60), the lighting (4.54), the bar services (4.52) and finally the table decorations (4.51).

- 45% find the menus to be attractive, 47% finds them very attractive and 8% have declared to be indifferent. The weighted average of the results is 4.39 and the median is 4, which shows that the diversity of the menu is considered attractive;
- 48% appreciate the 2014 New Year's Eve organized by Noblesse to be very good, 45% appreciate it as good and 8% as satisfactory. The weighted average of responses is 4.41 and the median is 4, which show that the 2014 New Year's Eve organized by Noblesse was good;
- The most often used means of information about organizing events are social networks (weighted average is 4.43 and the median is 4). The second most preferred means is the radio (weighted average is 4.30 and the median is 4), followed by printed materials (weighted average is 3.98 and the median is 4), the Internet (weighted average is 3.88 and the median is 4). The least preferred means is the printed press (weighted average is 1.09 and the median is 1).
- ▶ Males prefer the printed press more than females;
- ▶ People from rural areas use the radio for information more than people from urban areas;
- ▶ People that prefer television as a means of information don't prefer the radio and printed materials.

Chart no. 3. Appreciating the diversity of the menu

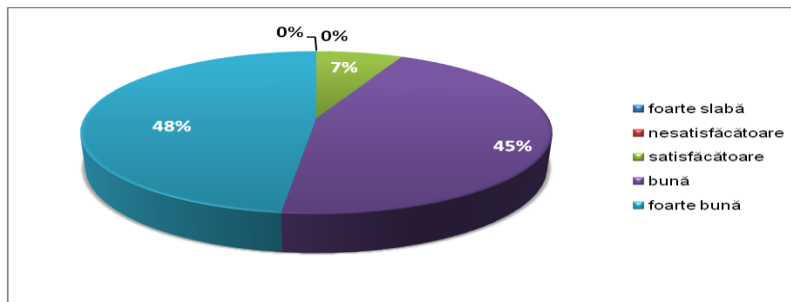


Source: data analysis in SPSS 2.1.

From the above chart we can observe that 45% find the menus to be attractive, 47% finds them very attractive and 8% have declared to be indifferent. The weighted average of the results is 4.39 and the median is 4 which show that the diversity of the menu is considered attractive.

Chart nr. 4 shows that 48% appreciate the 2014 New Year’s Eve organized by Noblesse to be very good, 45% appreciate it as good and 8% as satisfactory. The weighted average of responses is 4.41 and the median is 4, which shows that the 2014 New Year’s Eve organized by Noblesse was good.

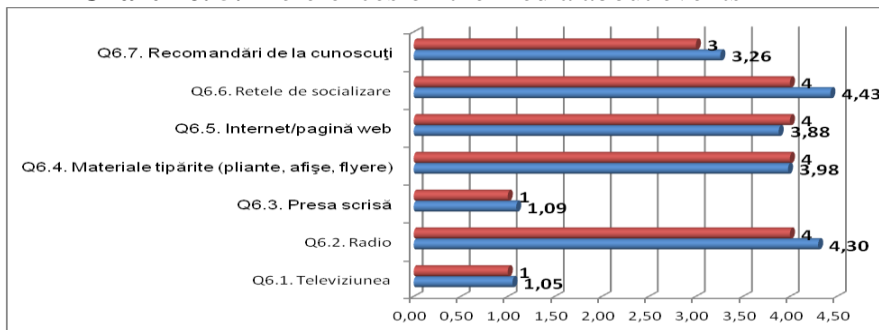
Chart no. 4. Appreciating the 2014 New Year’s Eve organized by Noblesse



Source: data analisys in SPSS 2.1.

From chart nr.5 we can observe that the most often used means of information about organizing events are social networks (weighted average is 4.43 and the median is 4).

Chart no. 5. Preferences on the media about events



Source: data analisys in SPSS 2.1.

The second most preferred means is the radio (weighted average is 4.30 and the median is 4), followed by printed materials (weighted average is 3.98 and the median is 4), the Internet (weighted average is 3.88 and the median is 4). The least preferred means is the printed press (weighted average is 1.09 and the median is 1).

- 48% of the respondents have declared that they are very pleased with the price per value ratio, 42% are pleased and 10% have declared to be indifferent. The weighted average of responses is 3.26 and the median is 3, which shows that the respondents place the price per value ratio of the 2014 New Year's Eve services at an average level;
- Most have decided to participate at the 2014 New Year's Eve event organized by Noblesse because of the package price (27%), 20% for the quality of the services, 17% for the diversity of the menu, 14% for the ambiance, 13% for the music bands and 9% for the convenient site;
- The most important feature of promoting the 2014 New Year's Eve event organized by Noblesse was the capacity to transmit information (4.21 weighted average);
- The credibility has also played an important role (with an average of 3.96), followed by the degree of influence the message had (average of 3.89). The most insignificant features have been: the possibility of memorizing the message (2.46), followed by arousing curiosity (2.67) and the utility (2.7).
- The most attractive means of advertising used by the Noblesse Event Hall to promote the 2014 New Year's Eve event has been online (4.47 average, with a median of 5), which is very attractive, followed by radio, banners, posters and flyers (attractive);
- 96% of respondents consider Facebook advertising as a cheap and beneficial method for promoting the events of the Noblesse Event Hall, while 4% don't consider it to be beneficial. Using the hi square test we have determined that there are significant differences ($p=0,001<0,05$, hi square=100, df=1) between those who think Facebook advertising is cheap and efficient and those who have visited the Facebook profile of the Event Hall;
- Most (69%) have participated at weddings, 53% at baptism and the 2013 New Year's Eve event, 40% to different conferences, 38% at expositions and 31% at private parties;
- 78% of respondents would recommend the Noblesse Event Hall to others and a great percent, namely 22%, wouldn't;
- 59% have declared themselves to be occasional clients, 15% have visited the Event Hall by chance, 14% have declared themselves to be faithful clients and 12% aren't clients.

Most occasional clients would not recommend the Noblesse Event Hall

to others (12%), followed by those who came by chance (7%). The faithful clients, who make up the majority, would recommend the Event Hall to others (92%).

Conclusion

The services provided by the Noblesse Event Hall address younger age segment, more exactly those under 40 years old. The Noblesse Event Hall clients prefer online means regarding information, rather than the classical means.

The Noblesse Event Hall Facebook page seems to be the best means, being a more accessible and cheaper form of advertising, which the clients tend to prefer. Therefore, the company can continue to focus on Internet advertising (through the website, newsletter campaigns sent through email to the clients in the database and through photographs taken at events and posted on Facebook) in order to attract new clients.

S.C. VH 11 Gold Wedding S.R.L., following the research, observes that when clients are well treated and served, they become a long term source of profit for the company. Consequently, the company needs to focus on winning the clients' fidelity and satisfying their desires at a superior level.

Also, the goal of a succesful campaign needs to surpass the simple satisfaction of the clients' needs. The company presented in this case study aims to fully satisfy its clients, because a client that is satisfied with the services represents a means of advertising that is much more efficient than any other advertising means.

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Testing the Relationship between Interest Rates Volatility and Market Capitalization: the case of Mauritius

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Abstract:

This paper tests the relationship between interest rates volatility and market capitalization in Mauritius. Using annual time series data sourced from the Financial Services Commission Annual Statistical Bulletin of Mauritius during the period 2006 through 2010, data of interest rates volatility and market capitalization were estimated in a non-linear model using the Vector Auto-regression technique. The study found that interest rates volatility has significant effect on the level of market capitalization although a negative effect. This implies a negative relationship between interest rates volatility and market capitalization. Thus, if market capitalization is affected by interest rates, then the economy becomes highly susceptible to volatile external distress. This indicates some dangers for the economic survival of Mauritius. It was on this note that we recommended an effective policy aimed at stabilizing macroeconomic variable like interest rates, focusing at the same time on alternative measures of promoting market capitalization if aggregate economic growth must be harnessed. Policymakers should design the optimal policy mix that would help the nation cope efficiently with the economic

and social costs of the external distress accompanying higher and dwindling interest rates in Mauritius.

Keywords: Interest Rates Volatility, Market Capitalization, Mauritius

Introduction

Over the years, the sectoral composition of Mauritius economy has changed profoundly between the period 1976 and 2010 (Ali, 2011). These changes may have been as a result of the movements in concentration in the economy. Such movements in the economy may have resulted into two economic possibilities a “rise” or “decline” in economic growth. In emerging and frontier economies like Mauritius, the national economies are particularly susceptible to a host of variables such as competition, protection of minority investors, overall business productivity, changes in interest, exchange, inflation rates (ACCA, 2012) and a host of other macroeconomics policy. Janke (2003) notes that understanding the behavior of interest rates is crucial for appropriate monetary policy particularly for frontier country like Mauritius that have instituted a number of financial reforms in order to liberalize interest rates. Thus, economic growth can be achieved through an unimpeded interest rates that is neither dwindling in tandem with a stable capital market performance. ACCA (2012) opines that capital market promote economic development and growth by facilitating and diversifying firms’ access to finance. In order to do this, they rely on sound economic policy that assures the market of stable interest rates. Interest rates volatility is the instability, changes, dynamism, rise or decline in lending rates. These lending rates are either rising or declining. The volatility in the rates may positively or negatively affect market capitalization and the aggregate economy. Consequently, this paper considers the relationship between interest rates volatility and market capitalization and how policymakers can build on them in order to ensure economic growth in Mauritius. Towards this end, this paper discusses the issues in four sections: prior literature, model specification, findings and discussion, conclusion and recommendations.

Prior Literature

There are no empirical evidences on the relationship between interest rates volatility and market capitalization in developing economies like Mauritius. Majority of these empirical evidences amongst others have been centered on financial liberalization and interest rates (Jankee, 1999; Honohan, 2000); economic growth performance (Shyam and Yeti, 2003); determinants of interest rates in post-financial liberalization regime (Jankee, 2003); Mauritius experience with Lombard Rate (Vikram, 2004); the level of efficiency of the stock exchange towards economic growth in Mauritius (Fowdar, *et.al*, 2007; Ushad and Raja, 2010, Masafumi, 2012); financial crisis and stock markets (Lemma and Amar, 2009); the equilibrium value of the Mauritian rupee (Patrick and Camelia, 2011) and key determinants of African government securities market and corporate bond market capitalization (Yibin, Phelps and Janet, 2013) without considerable attention on the relationship between interest rates volatility and market capitalization in Mauritius. Thus, this has led to disintegration in literature as regards the issue under consideration.

Elaborating on the above empirical evidences inter-alia, for instance, Jankee (1999) examined the effectiveness of the financial liberalization and monetary control reform in Mauritius. The study found that financial liberalization experience seems to be a puzzle to Mauritian policymakers as a result of a declining trend in savings, investment as well as the growth rate of the financial services sector in the post-liberalization period. Honohan (2000) investigated how interest rates changed under the era of financial liberalization. The study showed that as more and more countries liberalized, the level and dynamic behavior of developing country like Mauritius interest rates converged to industrial country norms. In addition, government Treasury bill rates and bank spreads were evidently the most repressed and they showed the greatest increase as liberalization shifted substantial rents from the public sector and favored borrowers. Shyam and Yeti (2003) while explaining the economic growth performance in Mauritius using an unrestricted VAR approach found that a large part of the increase in wages is explained by higher profits of exports firms due to protected markets for their products in the foreign markets. Also, it was revealed that the incidence of poverty is much greater in rural areas of Mauritius whereas, poverty rates vary substantially across geographical districts and locations due to the ethnic differences.

Jankee (2003) analyses the determinants of interest rates in the post-financial liberalization regime in Mauritius by developing an empirical model to determine the impact of foreign interest rate adjusted for changes in exchange, money supply, real income and expected inflation rates in line with Edwards and Khan (1985) empirical model. The empirical evidence suggests a low degree of financial linkages with external financial markets and greater role of domestic factors in interest rate determination. Also, the interest rate parity theory as well as the Fisher effect did not hold in the Mauritius case. The Ministry of Industry, Financial Services and Corporate Affairs (2004) provides that to increase the confidence of investors in Mauritian capital market, it is essential that Mauritian institutional investors follow the lead given by their counterparts in overseas capital markets and increase their level of activism both at meetings of shareholders and during private meetings with company chairpersons and CEOs. When there is an increase in the level of activism, a robust market capitalization and stock market indicators will be positively harnessed. Vikram (2004) presented an overview of the experience of Mauritius with Lombard Rate. The experience drawn was that there is no ideal monetary management framework that can deal with all the potential problems that a developing economy like Mauritius might possibly be faced with. The signs that the monetary management framework is once again under strain is due to excessive liquidity in the stock market.

Fowdar, *et.al* (2007) used a sample of the daily market returns to assess the level of efficiency of the Stock Exchange of Mauritius during the period 1999 through 2004 and found that the market in Mauritius do not follow a random walk. Also, the study established a serial correlation in the stock prices such that the future predictions on the market are possible. Lemma and Amar (2009) tested the relationship between financial crisis and stock markets in 63 countries including Mauritius. The findings indicated that the global financial crisis has engendered collateral damage to several countries without fault of their own. Also, comparative stock market performance across countries including Mauritius during the pre-crisis and post-crisis period in absolute and risk adjusted terms were affected. The effects were attributed to the institutional investors' ratings, sectoral concentration, market depth and liquidity level in the sampled countries. Ushad and Raja (2010) explored the contribution of the stock market towards economic growth in Mauritius during the period 1976 to 2008. A time

series regression analysis was conducted. The study showed no statistical significant relationship between stock market and economic growth while controlling for several macroeconomics variables. A plausible explanation for this result may be as a result of the structure of the Mauritian financial system which is mainly banking oriented.

Patrick and Camelia (2011) assessed the equilibrium value of the Mauritian rupee in 2006 – 2007 and over the medium run using two structural models. The study revealed that the Mauritian rupee was aligned with its equilibrium value in 2006 – 2007 and little adjustment appeared necessary over the medium run. Masafumi (2012) investigated capital market integration in the East African Community (EAC) Monetary Union where Mauritius belongs to. The study found that capital market integration has not deepened during the past few years. Also, the study observed that countries within the EAC would benefit from the integration of capital market in the area of harmonization of market infrastructure, strengthening of regional surveillance mechanisms, encouraging local currency bond issuance by multilateral financial institutions and building the capacity of the existing regional institutions. Yibin, Phelps and Janet (2013) studied bond market in Africa with an econometric model to analyze the key determinants of African government securities market and corporate bond market capitalization. The study found evidence that market capitalization is directly related to better institutions and interest rate volatility and inversely related to the fiscal balance, higher interest rate spreads, exchange rate volatility, current and capital accounts openness. Also, the results from their study suggests that corporate bond market capitalization is directly linked to economic size, the level of development of the economy and financial markets, better institutions and interest rate volatility, and inversely related to higher interest rate spreads and current accounts openness.

To conclude this section, it is interesting to note that in other countries either developed or developing, there is the possibility that interest rate volatility “do” or may “not” influence market capitalization. The opposite may be the case for Mauritius or not being a developing country. Thus, if this is the case, then there is the likelihood of testing the relationship between interest rates volatility and capital market capitalization in Mauritius, whether such signs exist or not.

Model Specification

This study was carried out to test the relationship between interest rates volatility and the level of market capitalization in Mauritius stock market. An unrestricted Vector Auto-Regression (VAR) Model was used. VAR model provides a multivariate framework where changes in a particular variable are related to changes in its own lags and to changes in other variable as well as their lags. VAR treats all variables as endogenous and does not impose a-priori restriction on structural relationship (Gujarati, 2003). In our analysis, we provided a co-integration and normality test so as to determine whether the error terms of the variables were normally distributed. The econometric model considered in this study takes Market Capitalization (MCAPZ) as dependent variable, Interest Rate (IR) and Interest Rate Volatility (IRV) as the independent variables. Generally a VAR model can be specified as:

$$Y_t = m_0 + A_1 Y_{t-1} + A_2 Y_{t-2} + \dots + A_p Y_{t-p} + \epsilon_t \quad (eq.1)$$

The above equation (1) denotes the general VAR process, where A_i ($i=1,2,\dots,p$) are $K \times K$ matrices of coefficients, m is a $K \times 1$ vector of constant and ϵ_t is a vector of white noise process. In line with equation (1), we expressed market capitalization as a function of interest rate and interest rate volatility:

$$MCAPZ = F(IR, IRV) \quad (eq.2)$$

where:

MCAPZ	=	Market Capitalization
IR	=	Interest Rate
IRV	=	Interest Rate Volatility

To estimate equation (1 & 2) we can translate this into equation 3 as expressed below:

$$MCAPZ = m_0 + A_1 IR_{t-1} + A_2 IRV_{t-1} + \epsilon_t \quad (eq.3)$$

The data for this study were obtained from the Financial Services Commission Annual Statistical Bulletin of Mauritius during the period 2006 through 2010 (a period of 5 years).

Findings and Discussion

This section provides the findings and discussion of results. The tests were done in order of precedence. First, was the Augmented Dickey Fuller (ADF) Unit Root Test, which was closely followed by Co-integration Test, Over-parameterized and Parsimonious Error

Correction Test and Diagnostic Test. The Variance Decomposition Test concludes this part.

a. Augmented Dickey Fuller (ADF) Unit Root Test

Table no. 1: Summary of ADF Unit Root Test

Variables	Level date	1 st diff	1% CV	5% CV	10% CV	Order of Integration
IRV	-4.20*	-6.38	-3.69	-2.97	-2.62	I(0)
IR	0.66	-2.86***	-3.69	-2.97	-2.62	I(1)
MCAPZ	1.37	-5.08*	-3.69	-2.97	-2.62	I(1)

* Statistically Significant @ 1% level

*** Statistically Significant @ 10% level

The Augmented Dickey Fuller (ADF) Unit Root Test was used to test whether the variables are stationery or not and their order of integration. The result of the ADF unit root test is shown in table no.1 above. The result of the ADF unit root test followed expectations. All the variables except interest rate volatility were non-stationery. However it became stationary after taking the first order difference. The interest rate volatility was stationary at the level probably because it is computed in ratio. This set the pace for the next stage of the analysis which is the co-integration test.

b. Co-integration Test

The Johansen co-integration test was used to test for the long run relationship among the variables. The result of the Johansen co-integration test is shown in tables' no. 2a and 2b.

Table no. 2a: Summary of Johansen Co-integration Test Result

Hypothesize No. of CE(s)	Eigenvalue	Trace Statistic	5 Percent Critical Value	1 Percent Critical Value
None **	0.640692	77.78483	68.52	76.07
At most 1	0.431028	21.37075	29.68	35.65
At most 2	0.143147	5.016967	15.41	20.04
At most 3	0.018340	0.536789	3.76	6.65

Table no. 2b: Summary of Johansen Co-integration Test Result

Hypothesize No. of CE(s)	Eigenvalue	Max-Eigen Statistic	5 Percent Critical Value	1 Percent Critical Value
None	0.640692	29.68365	33.46	38.77

At most 1	0.431028	16.35379	20.97	25.52
At most 2	0.143147	4.480178	14.07	18.63
At most 3	0.018340	0.536789	3.76	6.65

The results of the Johansen co-integration test in tables 2a and 2b above showed that a long run relationship exists among interest rate volatility, interest rate and market capitalization. The trace test indicated two co-integrating equation while the max-eigen statistic indicated one co-integrating equation. Once there is co-integrating vector, a long run relationship is concluded (Gujarati, 2003). The existence of at least one co-integrating equation permits us to estimate over-parameterize and parsimonious error correction test.

c. Over-parameterized and Parsimonious Error Correction Test

The over-parameterized and parsimonious error correction test is shown in table no. 3.

Table no. 3: Summary of Over-parameterized ECM
Result Dependent Variable: DLMCAPZ

Variable	Coefficient	Std. Error	t-Statistic	Prob.
DLIR	0.483866	0.105695	4.577960	0.0001
DLIR(-1)	0.300630	0.293394	1.024661	0.3184
DLIR(-2)	0.023727	0.281602	0.084259	0.9337
IRV	-0.889766	0.181262	-4.908717	0.0000
ECM(-1)	-0.454316	0.167069	-2.719327	0.0105
C	0.068255	0.169144	0.403534	0.6911

$$R^2 = 0.73, R^2 = 0.61, AIC = 1.96, SC = 2.38, Dw = 2.07$$

The over-parameterized error correction model (ECM) includes various lags of the variables. The parsimonious ECM model (or preferred model is gotten by deleting the insignificant variables from the over-parameterized ECM model. The Schwarz criterion and the Akaike information criteria were used to select the appropriate lag length.

d. Vector Error Correction (VEC)

The portion of the VEC result that is of most significance is shown in table no. 4.

Table no. 4: Summary of Vector Error Correction Results

Co-integrating Eq:	Co-integrating Eq 2		
LMCAPZ(-1)	1.000000		
LIR(-1)	47.35423 (14.2973) [3.31212]		
IRV(-1)	-848.8212 (91.2922) [-9.29785]		
C	-2128.183		
Error Correction:	D(LMCAPZ)	D(LIR)	D(LIRV)
CointEq1	-0.000966 (0.00086) [-1.12841]	-0.407183 (0.05926) [-6.87080]	-0.173256 (0.05639) [-3.07275]

The result of the VEC showed that IR and IRV equations represent the co-integrating equation. The other is statistically flawed. It has the right sign but not statistically significant.

e. Diagnostic Test

The diagnostic test is used to test whether the errors are normally distributed, whether the variance is constant or not and whether the errors are serially correlated. Table no. 5 presents the result of the diagnostic test.

Table no. 5: Diagnostic Test Result: Jarque-Bera

Jarque-bear	0.59	Probability	0.75
White Heteroskedasticity test			
f-statistic	1.01	Probability	0.30
Breusch Godfrey Serial Correlation LM test			
f-statistic	0.14	Probability	0.87

The result of the Jarque-Bera normality test shows that the errors are normally distributed. The white heteroscedasticity test shows that the errors are homeskedastic and the result of the Breusch Godfrey Serial Correlation LM test indicated no evidence of serial correlation in the residuals.

f. Variance Decomposition Test

The variance decomposition test is the proportion of changes in the dependent variable that has been explained by the volatility in the independent variables. The result of the variance decomposition is shown in table no. 6.

Table no. 6: Summary of Variance Decomposition Result

Period	S.E.	Variance MCAPZ	IR	IRV
1	1780142.	100.0000	0.000000	0.000000
2	3285982.	34.58371	40.52078	7.103264
3	3832300.	45.29962	33.98349	5.222418
4	4242651.	50.02630	31.11930	6.006581
5	9332918.	61.39760	20.41590	3.188355

The result indicated that interest rate volatility did not explain significant percentages of the changes in the level of market capitalization growth during the first period. Volatility to interest rate explained 7 percent of the changes in level of market capitalization in the second period and this reduced to 6 percent in the fourth period and 3 percent in the fifth period, reflecting the problem caused by interest rate volatility to market capitalization. The volatility to interest rates however explained a significant percentage of changes in market capitalization. Volatility to interest rate explained 41 percent of changes in interest rate in the second period and this reduced to 34 and 31 percents in the third and fourth periods and declined further to 20 percent in the fifth period.

Conclusion and Recommendations

To the best of our knowledge, there is no empirical evidence establishing robust results in Mauritius on the connection between interest rates volatility and market capitalization. Our study is one of the first that tested the relationship between interest rates volatility and the level of market capitalization in Mauritius during the period 2006 through 2010, with an unrestricted Vector Auto-regression (VAR) Model. The study found that interest rates volatility has significant effect on the level of market capitalization although a negative effect. This implies a negative relationship between interest rates volatility and market capitalization. If market capitalization is affected by volatility in

interest rates, then the economy becomes highly susceptible to volatile external distress. This therefore indicates some dangers for the economic survival of Mauritius. It was on this note that we recommended an effective policy aimed at stabilizing macroeconomic variable like interest rates while at the same time focusing on alternative measures of promoting market capitalization if aggregate economic growth must be harnessed. Policymakers should design the optimal policy mix that would help the nation cope efficiently with the economic and social costs of the external distress accompanying higher and dwindling interest rates.

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Fair Value or Market Value?

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Abstract

When taking into consideration the issue of defining the “fair value” concept, those less experimented in the area often fall in the “price trap”, which is considered as an equivalent of the fair value of financial structures. This valuation basis appears as a consequence of the trial to provide an “accurate image” by the financial statements and, also, as an opportunity for the premises offered by the activity continuing principle. The specialized literature generates ample controversies regarding the “fair value” concept and the “market value” concept. The paper aims to debate this issue, taking into account various opinions.

Keywords: accurate image, financial structures, valuation, fair value, market value

Introduction

Both terms are defined by IAS 32 „Financial instruments: presentation and description. This IAS sustains that „fair value represents the value for which an asset can be traded or a debt can be paid, voluntarily by both of the partners involved in a situation of a normal competition transaction”.

However, the same standard defines the market value as „the value obtained from selling or paid for buying a financial instrument, on an active market”.

Fair value vs. Market value

According to the above definitions, the fundamental difference between the two types of value could be easily noticed. On one hand, the market value comes out implicitly from the voluntarily negotiated transactions in a well determined context.

On the other hand, the fair value involves a choice, having a high degree of subjectivism. Moreover, the market value in the moment of financial reporting does not take into consideration the asset's residual value and this fact generates a net difference¹ from the fair value, especially in extraordinary economic situations.

In the same time, using a market value in the accounting process, as a main goal for valuers, is not considered efficient as long as compulsory financial statements are prepared with a periodicity of a year. This thing comes out from the utility of market value itself in the context of informing the investors.

Thus, the accounting information reliability would be much higher by using the market value only if the reporting period was much shorter than a year.

A middle solution, comfortable both for investors and internal information users would be the fair value, agreed by both compared accounting systems.

Numerous specialists consider that „the fair value includes the market value and tends to cover all the values revealed by the estimations based on economic calculations” (Breban, 2008). We can notice that the strongest argument against the fair value is generated by its estimated character, based on a large values scale, being taken into consideration different subjective adjustments.

Indeed, the used fair value represents a market value, established by valuation expertises if an active valued market exists. Otherwise, the measure of fair value is replaced by the present value of the future economic flows².

¹ The net difference is given by a part of the goodwill involved by the valued asset.

² It is important to notice that in the USA accounting system the value of future benefits is not submitted to the update process. This could be a consequence of the USA economic stability.

Also, a fair value is determinable as long as there is an active market for the valuated financial structure.

Moreover, the existence of such a market is not enough; it must be efficient, also.

In the same time, the fair value supports the forecast analysis of the future cash flows, being thoroughly based on market indexes, accessible to all the users.

Professor Nicolae Feleagă notes several disadvantages involved by a financial reporting based on fair value (Feleagă, 2010):

- ✓ Fair value is neither reliable, nor free of elements leading to wrong interpretations, as a consequence of internal methods of perception of the value used in case of unrated assets;
- ✓ Fair value is not free of its determining methods permanence, taking into consideration the fact that fair value is an estimation obtained by using different methods dictated by external market factors³;
- ✓ The cost of fair value determining has a significant amount.

Nevertheless, the market value represents a nowadays internationally recommended valuation basis thanks to some grounded arguments (Georgescu, 2010):

- ✓ In contrast to the historical cost, the fair value allows a real comparison of the entity's performances, being a daily value, observed on market;
- ✓ The investors, as main accounting information users need to know about the fair value in order to decide, because fair value expresses most accurately the present value of future cash flows;
- ✓ The active administration or the more and more often placing on market of financial instruments before the term justify the valuation at a value reflecting the best, the economic reality;
- ✓ The market value is more neutral than other values because it is established independent of the entity's or managers' intentions, of the used instruments type or of the operations date.

³ The discount ratios would be an example.

Thus, using the fair value in the financial reporting offers to the investors, to the creditors and to all the other users an accounting information characterized by predictability, comparability, coherence, integrality, pertinence, simplicity in applying, flexibility and neutrality.

The fair value is not well defined in the context imposed by the European Directives, excepting the 7th one regarding the group society's consolidation (Foster and Hall, 1996).

Also, the Romanian legislation and namely OMFP 3055/2009 is much different from the international accounting referential, concerning the fair value. For example, even if the fair value is mentioned as a valuation basis, its using in valuating financial instruments is possible only in the case of consolidated accounts.

This version of using the fair value represents, in fact, a combined mode of valuation which offers comparable pieces of information, which represents accurately the results' obtaining and the management vision on the entity and, finally, which reduces the involved subjectivity level of the value loss estimations.

Such a strategy of financial reporting could lead to a redefinition of the accounting result by a global result defined by the Americans as „an extensive measure of transactions and other entities' events effects, including all the variations of net assets, excepting those coming out from the owners' contributions or the distributions to them” (Foster and Hall, 1996).

Such an approach, taking into consideration the latent profit or loss possible during the financial exercise, would somehow bring together the accounting and the valuation vision on the entity performance concept significance.

Moreover, an accounting expressed in present values ensures an orientation towards financial capital's maintenance.

In order to simplify the things, we won't take into consideration the capitalized costs adjoining the purchase price, such as irrecoverable taxes, transport expenses and other necessary expenses for acquisition or releasing the purchased asset.

Beyond the basic treatment, through which these costs are reported as current expenses and beyond the option for an alternative treatment, through which the companies were allowed to consider these expenses as part of the asset's input value, there are many critic opinions regarding their negative impact on the financial statements.

Basically, the option for the alternative treatment could be justifiable only if these expenses have very high amounts, which should be phased during several years in virtue of the exercise independence accounting principle. A similar treatment could be applied for an asset obtained from own production.

Considering the purchasing, the problem of the chosen valuation basis should be raised, taking into consideration the way in which that purchase is financed.

Two directions can be noticed and namely: the purchase by leasing and the purchase by paying within a year. The two ways of financing the asset involve different modifications in the balance sheet, in the profit and loss account or in the cash flow statement. While the first way of financing modifies the long term debts, the second way affects the amount of the short term debts.

The time impact on the valuation of assets represents an important pawn in settling the chosen valuation basis. IAS 16 defines the cost as “the amount paid in cash or cash equivalents or the fair value of other counter performances made in order to purchase an asset, at the date of its purchasing or construction”.

This definition involves a temporal residual variable to the current input price, represented by the seller interests earning, determined by updating the future payments.

But what happens when we desire to know the entity’s real value? How are we supposed to proceed when we desire to make comparative analysis either within the entity or between distinct entities, in time? The deficiency of the historical cost is obvious from the temporal prospective of the inevitable money devaluation and so from the economic and financial analysis methods lacks’ point of view.

Therefore, similarly to the investment projects valuation methodology⁴, especially focused on a solid set of dynamic indicators, the update method used in the financial reporting process represents a step forward to the improvement of destructive effects of the myth of “historical cost monetary nominal’s”.

Conclusions

The choosing of the valuation basis obliges the specialists to be rational because no valuation basis could be generally satisfactory.

⁴ We could take as an example the BIRD methodology for evaluating the projects.

Therefore, specialists must identify a balance point meant to settle the conflict relationship between prudence and fidelity, as a main feature of the accounting profession. Such an approach is obviously agreed also by the international accounting referential which, even if prefers a historical costs based accounting, takes into consideration the combined alternative methods.

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Social Media Marketing to Increase Brand Awareness

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Abstract

Social networks are becoming more and more widespread and they are literally conquering the World Wide Web. Facebook has managed to arrive even in poor and remote territories which apparently have nothing to do with our always on the move modern world. However, only on the African continent there are more than 100 million active Facebook users who represent 50% of the African population having access to Internet. Thus, it would be huge marketing mistake for businesses not to take into consideration this opportunity to get in touch with prospective customers (Neti, 2011). Social media is hot and has turned into a “must” for businesses looking for brand awareness. Therefore, the techniques used to attract customers by means of social networks have gained quite a high degree of sophistry (Neti, 2011). In an age in which the average internet user accesses his/her social network account at least fourteen times a day, companies cannot afford to be absent from this medium. The aim of the present paper is to present the concept and characteristics of social media and how it can be used in order to increase brand awareness.

Keywords: social media marketing, social networks, social media strategies, brand awareness.

Introduction

Kietzmann J.H. (2001) explains that consumers used the Internet for its content: they read it, they watched it, and they used it in order to purchase various products and services. Nowadays, more and more consumers are utilizing content sharing sites, blogs, social networking and wikis - to create, modify, share and discuss Internet content. This represents the social media phenomenon, which can have an enormous impact on a business' reputation, sales and why not on its survival in an environment getting fiercer and fiercer as days pass by.

The Social Media Marketing is not such a new phenomenon as many might be tempted to believe. It did not begin yesterday or the day before yesterday. It is actually more than ten years old. The entire phenomenon began with the launch of LinkedIn in 2003. But since this is a network targeted mainly to businesses its popularity is much lower than that of the social networks dedicated to the public at large (Pradiptarini, 2011).

LinkedIn was soon followed by MySpace and Facebook in 2004. The hysteria of sharing pictures, videos and thoughts on line was augmented by the launch of YouTube in 2005 and of Twitter in 2006 (Pradiptarini, 2011). These are the main players on the market. They are doubled by some minor ones like LiveJournal (highly popular among Russian speaking internet users), MyLife, MySpace, Reddit, Tumblr, Netlog (popular in Turkey, Europe and the Arab World), Pinterest, SumbleUpon. Google decided to enter the game in 2011 with its social network platform named Google Plus, better known to users as Google+. According to reports revealed in 2013, Google+ had 300 million monthly users; quite far from the 1.32 billion monthly active users reported by Facebook in June 2014.

Companies and businesses did not remain indifferent to the increasing popularity of social media sites. A study conducted by Burson and Marsteller pointed out that 86% of the 100 most important companies present on the Fortune 500 list had an active account on at least one of the most popular social media sites (Pradiptarini, 2011). The study also revealed that companies prefer Twitter over Facebook.

Research issue

The 2014 Manufacturing Content Marketing Report conducted by CMI showed that manufacturing marketers used the social media platforms less than their B2B marketing counterparts. The report also pointed out that the most important goal for manufacturing marketers was brand awareness. Moreover, the marketing divisions of companies expressed their need to connect with customers in a new and engaging way (Grieshammer, 2014).

Thus, it is not an exaggeration to say that social media marketing might soon become a vital part of the 21st century marketing mix. The absence of social profiles on the “Big Three” (Facebook, Twitter and Google+) would definitely be a strategic mistake for businesses which want greater exposure and popularity on the digital market (Angelova, 2013).

Literature review

Heidi Cohen (marketer for Citibank and The Economists) explains that it is quite difficult to define social media marketing since the social media environment continues its expansion and change. Lisa Buyer (employee of The Buyer Group) defines social media as the most interactive, transparent and at the same time the most engaging form of public relations. It is a combination between real time content and authentic communication.

Michelle Chmielewski (working for Sythesio) considers that social media marketing is not about individuals but about what people do in order to communicate by any possible digital means.

For SisiraNeti, social media marketing means engaging with consumers online. The websites which permit users to share opinions, ideas, content and encourage interaction can be ranked within the category of social media sites.

Marjoria Clayman from Clayman Advertising Inc. considers social media as a new marketing tool which permits marketers to understand clients in a way that was not possible previously. Clayman believes that social media marketing marks the beginning of the marketing revolution; it does not represent its end.

Waad Assaad and Jorge Marx Gómez (2011) warn that marketing done by means of social networking sites is not at all a substitute for traditional marketing. Thus, marketers should consider it

an additional channel which has its own unique characteristics and can be used in order to complement other marketing actions.

Lazer and Kelly's (1973) define social marketing as "concerned with the application of marketing knowledge, concepts and techniques to enhance social, as well as economic ends. It is also concerned with the analysis of the social consequences of marketing policies, decisions and activities."

Sisira Neti points out that social media marketing is a strategic and methodical process which can be used in order to increase the company's reputation and brand awareness among consumers.

Social Media Marketing commonly known as SMM refers to a series of techniques which target social networks and their users in order to increase brand awareness or to advertise a certain product. Marketers perceive SMM as a more targeted advertising. For this reason it is considered as being highly effective in the creation of brand awareness.

Burke (2006) defines social networking sites as: "... a loose affiliation of people who interact through websites. The web enables any person to build a vast number of relationships with others, regardless of geographical distance."

Research methodology

Why Social Media? Social media marketing has numerous benefits such as: brand credibility, increase in sales, increased exposure, strong online presence which enhances the company's reliability, reduced market costs, rapid access to consumer feedback and a strong business-client relationship.

Neil Patel (co-founder of Crazy Egg, Hello Bar and KISSmetrics) informs us that 33% of consumers make use of social media networks in order to gather new information on various products, services and brands. He also reveals that 86% of the marketers acknowledge the role and importance of social media marketing for their business. The vast majority of the businesses using a social media platform within their marketing plan have experienced an increase of their exposure. Moreover, 82% of costumers have said that they have more confidence in a business if it is active on a social media platform.

Petty (2008) states that businesses and companies would be naive if they dismissed the amount of site traffic, generated by social networks. At the beginning, online social platforms targeted a young

audience (teenagers and young people in their early and mid-twenties), but now they are attracting other demographic groups as well. As a consequence, the online environment is filled with career-based social networks, shopping based social networks, as well as employee groups (Petty, 2008).

Sachoff (2008) believes that social networks offer companies huge amount of information about its customer base. The social media gives the marketers the possibility to personalize their brand and to spread their message in a more efficient and relaxed manner.

Huge companies like IBM, Dell or Burger King have understood the potential of SMM. Thus, IBM is the owner of about 100 blogs and of various islands in the popular virtual game “Second Life”. The company has several official Twitter accounts and it is highly active on YouTube and Slide Share (Zarrella, 2010).

Social media is not a platform or a recipe for instant success. It is a tool which can be used in order to obtain success if hard work is done.

Effective Social Media Marketing Techniques

Weston (2008) is convinced that brand awareness is extremely important for social network marketing. For him the widgets are the perfect tools to create a visible presence in the online environment. He states that widgets offer businesses the possibility to market themselves and add value to their business ecosystem (Bolotaeva, 2011). According to Weston (2008) brand awareness can be raised only if employers encourage their employees to involve themselves in the network marketing and create an online community. Nonetheless, these activities need to be monitored in order to prevent abuse of any type.

Yu-Kai Chou (a Gamification Consultancy partner) points out that most people wrongly consider Social Media Marketing as being one gigantic technique. It is of utmost importance to understand the fact that different companies and budgets need different social media techniques. A company having a low budget cannot afford to have videos and ads shown all over the place on the display network. Business owners have to understand that SMM requires patience. A blog or a Facebook account cannot attract thousands of visitors per day in just two or three months. It is true that SMM helps you reach your target audience faster than a billboard placed near the highway, but the reach cannot be obtained at the speed of sound.

In order to increase brand awareness by means of social media, it is very important to set clear goals which are easy to control. Such goals include: how many times per day or per week to post on the social media platform, how fast to answer to the customers' questions and inquiries and how much content to produce.

The fact that "content is king" is a well-known fact in the social media environment. Interesting and engaging content is extremely important for the brand reach. If the company blog has new, original and insightful information, there are higher chances for it to be shared by more people.

The branding strategies and tactics have changed a lot in the last years. Marketers over the world had to learn an entire new textbook filled with new rules which change constantly as the new technologies and social media platforms evolve. It is becoming more and more difficult to reach new customers and audiences in the absence of an efficient social media strategy and an engaging and solid content. According to the data obtained by iMedia Connection seventy percent of the marketers acknowledge the importance of content marketing by recognizing that it actually increased their brand awareness.

Richard Reed (founder of Innocent) advises the newbie's in the domain of Social Media Marketing to keep in mind that every business started small and also not to forget to think like a publisher. For example, Innocent has launched on the market recipe books which have managed to influence a lot the growth of their brand. Due to their content, Innocent is not perceived only as a company trying to make money but as one whose purpose is to help people live longer and healthier lives.

But Innocent has not limited its actions to the recipe books. It has a very popular blog which is characterized by extremely valuable content which engages the audience. Furthermore, the Innocent Community Manager, Joe McEwan says that it is very important to find a suitable tone of voice. This voice has to be natural, honest and engaging. Marketers must bear in mind that they address to people, to individuals, not to some robots. Thus, the clients' needs, goals and challenges need to be identified.

Lilach Bullock considers that shareable content is the key to success when it comes to social media marketing. If the audience is given what it wants and needs, the brand awareness increases. There

will be an organic engagement due to people sharing the content with friends and co-workers.

The co-founder of Upworthy, Eli Pariser, believes that a good head line is the one making the difference between 1,000 and 10,000 reading a certain blog post. Eli Pariser explains that at Upworthy the writers have to come with 25 headlines for every piece of content they produce. The curators select four headlines and the editors the last two ones which are used to experiment with.

The content should be shared more than once. The greatest benefit of this action is that the company's or the business's site gets more traffic because the content reaches people living in different time zones. Moreover, new followers can be reached in this way.

Brand awareness can be increased only if the marketer chooses the right social media sites. Thus, Pinterest is perfect for companies which sell products for women. However, it is the worst media site for advertising DIY items such as saws or drills. Wholesale companies should use LinkedIn while retailing companies should forget about it. Popular social media sites like Facebook, Twitter, Google+ or YouTube bring benefits to all companies, whether small, medium or big. A blog is a must in the era of SMM.

According to Business Insider photos represent the most engaging posts on any social network. The audience and the customers should be offered links, texts, audio and video files but the photos and the infographics have a value that should not be underestimated. People remember better what they see and therefore there are higher chances for a visual add to gather more appreciation and be distributed by more people.

Yu-Kai Chou considers that one of the most effective social media marketing techniques is to manage efficiently the social media brand. This management implies creating and keeping up to date a blog, a Twitter Account, a Facebook fan page or a LinkedIn group. It means engaging people that are really interested in the products or services of the company. An efficient brand management has as result followers, visitors to site and most important of all the customers' trust and loyalty. The accounts on social networks allow companies to get in touch with their target audience and create value for them.

The greatest disadvantage of Social Media Brand Management is that it consumes a huge amount of time resources. Companies and marketers opting for this technique need both, persistence and patience.

People need to trust a company or a business before signing-up for a newsletter or purchasing an item online. Trust is difficult to build and it might take months or even years.

Social Media Marketing techniques are more efficient if the marketer creates a social media marketing calendar. This can be used in order to clearly organize ideas and avoid any repetition of them. Content calendars can be used in order to make decisions such as what to post, where to post it and when. Thus, the blog post can be related to various holidays or to a certain theme.

Madhur Chaturvedi advises marketers to establish a two-way communication model. He explains that businesses which make usage of the social media tools just to spread information might not get what they expect from them. Companies that use social media networks to communicate with their client and establish a relationship with them have more to gain. There are various techniques which can be used in order to make the two-way communication more efficient. This can be achieved by posting surveys and various questions which are related to the company, its products or just general interest questions. Customers and employees can share their photos and stories on the company's Facebook or Twitter page. The setting up of dedicated customer service pages has turned out to be highly efficient.

The competition should not be forgotten. Therefore, it is advisable to analyse the opponents' strategies in terms of social media marketing. The analysis should not overlook the content of the competitors' websites, their hyperlinks and the number of their "pals" or "followers".

Clients must be offered a choice. The marketer must understand the communication preferences of his/her audience. There are people who like Facebook, while others prefer Twitter. Customers should have the possibility to choose the social platform they like in order to get more information about a certain business or company. However, the same information has to be posted on all pages. Free tools like HootSuite can be used in order to manage and schedule time on all social media pages.

Pitfalls of Social Media Marketing

Attractive as it might be, social media marketing is nothing without its weak points, such as: lack of e-commerce knowledge,

aggressive advertising, invasion of the users' privacy and various legal issues (Bolotaeva, 2011).

Aggressive advertising might drive costumers away. Pettey (2008) points out that, companies have to calculate their online presence, so as to annoy customers. Add scheduling should be a must while advertising a new product or service. Customers' emails should not be invaded night and day with newsletters reminding them of the latest promotions. Not even the most loyal client is pleased to see his/her Facebook or Twitter wall invaded by the same ads inviting him/her to buy a certain product. Pettey (2008) also clarifies the fact that users will not stay on the platform if the network is perceived as being too commercial.

There are various legal issues related to social networks. Skul (2008) points out that there are some media laws referring to the publishing and sharing of online content. For this reason, companies have to pay attention to a number of different advertising laws so as not to infringe one of them.

Lack of brand control is another weakness of social media marketing. Customers can use the social networks to express their opinions and experiences with a certain product or service. Their comments might be positive or on the contrary totally unfavorable. Companies have very little control on what clients write and share on social networks (Bolotaeva, 2011).

Conclusions

The social media tools can be very powerful and if they are used in an efficient manner they can raise brand awareness in the online environment and not only. The social media phenomenon is growing at an incredible speed. Multinational companies having branches on two or more continents have recognized the importance and the potential of social platforms. We have reached a point in which it is impossible to make a clear distinction between social media and the online environment.

Individuals, startups, small, medium-sized and large companies need to have an online presence if they want to be competitive in today's world, in which real time information and news are not an exception, but a characteristic. The time has come for companies to adapt their marketing strategies for the online word and to take seriously the social media platforms.

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