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#### THE ROLE OF LIFESTYLE CHANGE IN HEALTH PROMOTION

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#### Abstract

We are experiencing a period where we are faced with rising healthcare costs, as well as an increased disease impact on the entire population of the country. Although the slogan "prevention is cheaper than cure" may seem old-fashioned, however, it is more true than ever. It is necessary to offer health education and also to promote health care in Romania, in accordance with the international standards, as adopted by the European Union.

Health Promotion is the art and science of helping people change their lifestyle in order to achieve a state of optimal health, restoring the harmony at all levels of human existence.

Promoting a lifestyle which given certain conditions maximizes health, welfare and human fulfilment represents a goal that does not belong exclusively to the health sector; all fields of activity, all those sectors that define the life of an individual or a community are essential parts of achieving a healthy lifestyle.

Modern men adopt a lifestyle where sedentary life, overeating, smoking, erratic working hours and alcohol use are common behaviours. Therefore, they become vulnerable to a new class of diseases of multi-factorial aetiology where the lifestyle plays a prominent role.

Although the lifestyle may be complex, it is still under personal control and lead by the ability to choose extensively, which can be of benefit to the person's life and health. Choices regarding health involve more than objective information.

Health education should be an ongoing concern for health professionals and health educators, psychologists, sociologists, family, for those who through effective collaboration contribute to ensuring physical and mental health in the community, in the increasingly demanding conditions of the modern life, which raise difficult issues regarding human adaptability.

**Keywords:** health, lifestyle, behaviour, awareness, health promotion.

**JEL Classification:** I<sub>12</sub>

### Motto:

"Health isn't everything, but without it everything else is nothing"

(Schopenhauer)

Health promotion should be the primary objective of the healthcare system. Instead of this, it is located at the bottom of the list in most agendas. In general, health is not valued until the moment it is affected and a disease occurs.

We are experiencing a period where we are faced with rising healthcare costs, as well as an increased disease impact on the entire population of the country. The saying "prevention is cheaper than cure" shouldn't be regarded as old-fashioned, since it is more true than ever. It is necessary to offer health education and also to promote health care in Romania, in accordance with the international standards, as adopted by the European Union.

Health Promotion is the art and science of helping people change their lifestyle, in order to achieve a state of optimal health, restoring the harmony at all levels of human existence:

- a. at physical level: through exercise, a balanced diet, self-care; by avoiding eating in excess (overeating) or avoiding using harmful substances;
- b. at emotional level: through stress management and support during emotional crises;
- c. at social level: by creating and constantly maintaining a support network of family, friends, colleagues, community members;
- d. at intellectual level: through general education, practical training, continuing professional development, along with defining, implementing and achieving an ongoing career development
- e. at spiritual level: through feelings of love, appreciation and hope, along with charitable activities designed to help people around us.

Promoting a lifestyle which maximizes health, welfare and human fulfilment, under certain conditions, represents a goal that does not belong exclusively to the health sector; all fields of activity, all those sectors that define the life of an individual or a community are essential parts of achieving a healthy lifestyle.

In health promotion there are four areas of action:

- 1. Health education.
- 2. Public policy interventions (legal and fiscal).
- 3. Community development and empowerment.
- 4. Clinical interventions (screening).

The socio-economic factors in our country, which mostly affect people's health at present, have imposed a new lifestyle where sedentary life, overeating, smoking, erratic working hours and alcohol use are common behaviours. Thus, the modern man becomes vulnerable to a new class of diseases of multi-factorial aetiology where the lifestyle plays a prominent role.

Although the lifestyle may be complex, it is still under personal control and lead by the ability to choose extensively, which can be of benefit to the person's life and health. Choices regarding health involve more than objective information; they require understanding the overall goals of an individual.

At the moment, some health education programs, which are an integral part of the public education policies, are carried out at national level. These programs have the aim to influence the modern lifestyle, in order to acquire healthy habits, to create generations with a healthy behaviour, as well as the aim to develop the political will of the authorities to grant health the role and importance it really deserves.

The responsibility for actively educating people for health falls upon us, the nurses. We could help the people who benefit from our services to identify the right decision or to set the right objectives that could have a short- or long-term impact on our health.

The health education activities started in the "Fundeni" Post-Secondary Healthcare School many years ago. The importance granted to this activity by the institution is also reflected in the school's motto: "Education can offer health".

The action taken has been aimed at raising a positive attitude towards health care, (balanced nutrition, non-smoking, adequate physical activity, avoiding stress) and at decreasing the rate of self-destructive habits (over-consumption of alcohol, coffee, drugs, and dangerous chemicals).

The current project started in October 2013 and aimed at changing our students' habits, as the future leaders in healthcare education and as models for the people.

The aims of the project were then and still are:

- 1. To inform students and help their self-information about the types of health: somatic, mental, physiological, intellectual, affective, psychological and behavioural
- 2. To develop in students the psychological structures of information processing concerning these types of health, the self-analysis capacity to evaluate their own health state, in order to choose the appropriate physician for their medical conditions or to identify the connection between their medical problem and the information learnt.
- 3. To involve the affective states of the students in health care support and development: self-care, confidence in the healing knowledge and aptitudes of the specialists, etc.
- 4. To engage students in the process of acquiring, maintaining and improving their health and the health of their relatives through skills training, basic care skills and abilities for themselves and their relatives

At the first stage, that of awareness, 89 students attended a course at the beginning of which they filled in a questionnaire whose results are mentioned below.

At the question "Do you think that any of you has a destructive habit?" the answers were as follows:

Table 1. Dividing surveyed persons by unhealthy habits

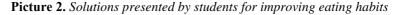
	Over- consumption of alcohol	Over- consumption of coffee	Smoking	Inadequate attitude towards food	Drug consumption	More destructive attitudes
I do. Which?	0	59	35	57	0	11
I am not aware of that. I have a constant habit.		-	1	4	-	1
I am aware of that. I have a constant habit.	1	2	4	14	1	2
I am aware of that. I am thinking about changing	-	57	30	39	-	8
b) I don't	89	30	54	32	89	79

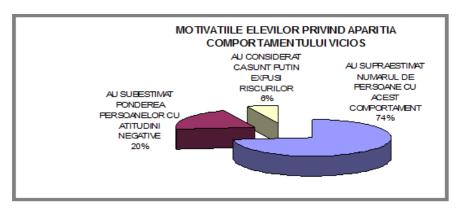
Considering our target group and having examined their answers to this question, we notice that: two habits are missing – over- consumption of alcohol and drug addiction, an alarming rate of people with inadequate food habits and moderate smoking and coffee drinking. We also observe a change disposition for 87.7% of this group of people and 22.3% of them stating a refusal.

Picture 1. Adaptability to change



The second question was "In your opinion, which were the causes that helped in developing this habit?"





It is interesting to notice that a great number of people consider it is reasonable to sustain their destructive habits just because the vast majority does the same. There is also a great number of people who underestimated the rate of those with negative habits.

For the third item the participants considered that they could increase the fruit and vegetable consumption in the following ways:

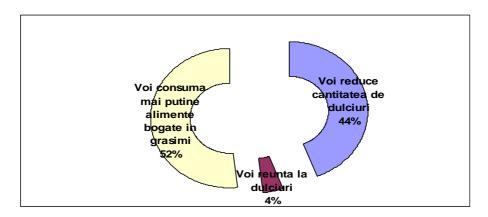
- fruit will replace snacks and desserts;
- knowing the ratio of fruit and its importance for health;
- introducing salads and decreasing the ratio of fats and pork;
- giving up smoking and replacing it with fruit;
- giving up elaborate dishes in favour of simpler ones;
- replacing one of the main meals with a meal of fruit and vegetables.

The answers to the fourth question "What will you change in your habits?" shows the willingness to change but says nothing about sustaining this change.

## *Inadequate attitude towards food:*

inadequale allitude lowards jood:	
How often?	
• daily	19 people
• between 2 and 5 days / week.	38 people
·	
How much?	
• I will reduce the sweets intake	. 15 people
• I will give up sweets	4 people
• I will eat more low-fat food	

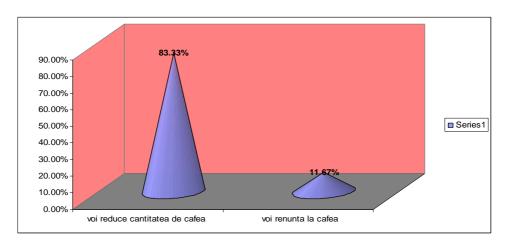
**Picture 3.** Solutions presented by students regarding the change of the nutrition behaviour



## Excessive coffee drinking

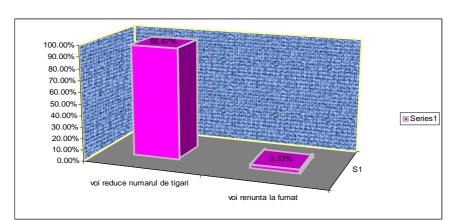
- I will reduce the coffee intake /day......50 people.

Picture 4. Solutions presented by students regarding the use of coffee



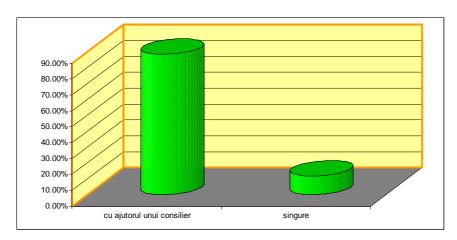
## Smoking;

- I will reduce the number of cigarettes /day.....29 people.



**Picture 5**. Solutions presented by students regarding the use of cigarettes

The answers stressed the fact that in order to change one's habit one needs the help of a professional authority. Only 4 people think they will find the solution to the problem by themselves.



**Picture 6**. What can strengthen and maintain the new behaviour, in students' opinion

For inadequate food habits the blame falls upon:

- a) environmental factors such as:
- pre-cooked industrial food with a high- fat content;
- a wide range of high-calorie food at reasonable prices;
- oils and margarines at a very low price;
- mechanical work, urbanization the home electrical supplies which have reduced the caloric need by 700-800 kcal/day, while the calorie intake remained the same. In most work places, the caloric needs have the tendency to reach the values of the basic metabolism.

- b) *food factors*: poor education-unbalanced diet, rich in carbohydrates (sweets and fats), irrespective of the body caloric needs;
  - c) medication: cortisone, hormones.
- d) *genetic factors:* But let's not forget that "the genes load the weapon while one's lifestyle pulls the trigger".

The most important factors which contribute to smoking and coffee drinking are:

- curiosity,
- problem solving,
- image,
- peer pressure,
- · low self-esteem,
- an answer to loneliness.
- not being well informed about the hidden risks.

Lab tests showed a significant increase of cholesterol and triglycerides at 2 people under 40, which asked for a doctor's help.

During the second stage – of acknowledging information:

- we could make the 6 people aware of their destructive habits and the impact they had on their health;
- we registered an increase in the number of people who wish to change one of their destructive habits.

They are checked for maintaining their positive habits every two weeks. The participants to the program periodically present a summary of their results, worries and questions.

The results of this program are now the following:

- change of eating habits;
- weight loss of 3- 8 kg in 4 months at 7 overweight people;
- weight gain of 2- 5 kilos in 4 months at 4 underweight people;
- a reduction of symptoms caused by inadequate eating less than the body needs (spasmophilia, morning hypoglycaemia);
- we couldn't convince them to quit smoking but, they agreed to reduce the number of cigarettes/day, and the coffee intake.

We have encouraging results and we think we will get better results by the end of their studies.

The means of research used in this survey were: clinical observation, statistics and content analysis, using the following techniques and instruments:

- the questionnaire,
- the observation (direct or collective);
- the interview (semi-structured, direct, in group)
- the conversation (private, "focus group");

During the transmission of active information in the working group, we used the following techniques:

• "brainstorming technique" – challenging technique that seeks to mobilize participants to identify needs and possible solutions;

- "brain writing technique" each person expresses in writing ideas regarding the educational needs for a defined problem, the recorded ideas are then sorted and presented to the group;
- "nominal group technique" each group member expresses opinions about an issue, and the educator groups the shared ideas.

## **CONCLUSIONS**

Health promotion is putting into practice knowledge-based interventions designed to promote health.

Change is a confusing moment which calls for adaptability; if some people take it as a real "war" against themselves and the rest of the world; other people take it as a peaceful transition to a healthy state.

The moment of change may be characterized by:

- a sensation of unforeseeable many take these changes as something happening overnight, something they know nothing about and which they have not thought of before. When getting ready for such changes it is important to share them with family and friends, to be able to live through them together.
- *novelty* it requires an increased effort to be able to accept what is different and give up what has been before. Family and friends support is very important for the one who has taken this decision.

The nurse and mentor at the same time has to face the participants in the program as a combination of force, intuition and technical knowledge, has to act as an authority, as an epitome of ethics, in order to give them unlimited hope and trust.

The nurse is becoming a counsellor for any health related human activity.

The present study is focused on the nowadays youth generation, who is exposed more than ever to risk factors provoked by an unhealthy lifestyle.

Analysing the target group from the age perspective, beginning with the age the healthcare problems began because of an inappropriate behaviour, it is rich to support the implementation of an educational healthcare program from a very early age. The fact that there are people who don't acknowledge the risk of an unhealthy behaviour; it is the most severe issue.

They diminish or neglect the professional aid and expose themselves more and more to this century's diseases.

## **Conclusion, Limitations and Future Research**

Experience has shown that man has not always been a rational being, and has not always accepted to do without his whims and pleasures, even if they threatened his health.

The role of behavioural factors in aetiology, disease evolution and recovery is now more clearly stated understood. Over 50% of mortality cases in developed countries (including Central and Western Europe) are caused by behavioural factors.

An integrated awareness about the positive or negative aspect of each behaviour would produce an important decrease in morbidity and mortality caused by diseases of civilization (lifestyle diseases).

We all know that it is an "investment over time" – how very suggestively is called by WHO- the education for health will show its efficiency in time. However, the investments in this area are extremely cost-effective, because they are incomparably smaller and also more useful than the expenses made for therapeutic purposes.

Health education, one of the important areas of health promotion, should be a permanent concern for health professionals and educators, psychologists, sociologists, family, those who through effective collaboration contribute to ensuring physical and mental health in the community, in the increasingly demanding conditions of the modern life, which raise difficult issues regarding human adaptability.

We should never forget that health is the most precious asset and we should offer our students, in addition to the key that unlocks the mystery of reading and writing, the key which provides them with a healthy lifestyle.

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# HEALTHCARE SERVICES CONSUMER BEHAVIOR IN THE LIGHT OF SOCIAL NORMS INFLUENCE

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#### Abstract

Healthcare services consumers' behavior represents an multidimensional concept, that implies the cumulative effects of different factors. The process of consumption is very different and complex in the case of healthcare services due to the nature of the needs and consumption motivations on one hand and because of the complexity of the services itself on the other hand. Amongst the factors that are influencing the consumer's behaviour, the social ones represent a particular type. In the case of healthcare services this is because the social interactions of the patients can contribute to their own perception regarding the post consumption satisfaction, or can influence the buying decision in the first place. The influence of social factors can be analysed on multiple layers – from the effect of the affiliation and adhesion groups to the effect of social norms and regulations.

**Keywords:** social norms, affiliation groups, healthcare services, consumer behavior

**JEL Classification:** I<sub>12</sub>, M<sub>31</sub>

### Introduction

Social interactions are referring to generative relations that are capable to induce changes at the level of perceptions and through these changes at the level of consumer's actions.

The analysis of consumption behavior or buying behavior can't be done without taking account of the fact that peoples find themselves all the time in a evolutionary, historical and institutional context. From this point of view interactions between individuals become very important.

The consumer behavior is influenced by a variety of factors both endogenous and exogenous. This duality of the endogenous and exogenous influences upon the consumer's behavior create the picture that bring into evidence the evolution of the social structures itself from the dawn of the civilization until present time. The

human being cannot escape from the social framework present into his life from childhood. At his turn, this social framework with all its institutions, social groups etc, represents the effect of human activities, of choices and consumption acts which individuals have usually.

From the healthcare services consumption perspective, these social interactions attain new valences given by the specific of the healthcare services and the needs which are behind consumption motivations.

The choices made by the healthcare services consumers, the behavior that is related with influence groups are changing and contribute in the same time to the evolution of medical system, of institutions that are regulating the provision of these services. Thus, on a long run, the consumption processes will self-regulate and the efficiency of provisions will rise towards a better serving of the social interest. All the spectacular transformations at the level of nowadays medical technology, last minute methods and treatments, are proving that the social needs conjugated with healthcare individual needs have been shaped this field and are continuing to shape it.

# Social norms and their importance in the context of social factors influence

Norms, in the most general sense are presenting as rules, pre-established sets of decisions seeing as responses to the manifestation of social mechanisms. Thus a fist definition of social norms points out that these are representing rules which prescribe behaviors expected by a community or an institution. (Popescu-Neveanu, P., 1978, p. 481)

The normative level presuppose the existence and manifestation of some rules or formal norms, being as juridical nature or having a moral substrate and also a series of informal constrains, developed along the society evolution and of social inter-relations. The norms may have a mandatory character as it is the case for juridical norms, or of social constraint as in the case of moral norms.

The social norms that are general appealing - the social norms that exists in a field or another are credited with a high level of influence over the individuals' behavior. The problem is, in what extent the social norms that are characteristic for a minority of consumers, eventually for a social group are as much as striking referring to the effect that they can determine upon the consumers behavior.

Thus in the social plan, each individual will assume a certain role, that is suited to the status that he has. Thus during its development and maturation, the individual will form a certain attitude regarding the roles and statues that he can have at a social level.

His behavior, his personality will be reported to the social system of norms and values. This system represents a mixture of cultural elements, anthropologic ones, representative for the human civilization. The norms although they have a constraint character, are still permissive in the same time, trying to develop a equilibrium between the needs expressed by the individuals and the social

requirements that are characteristics for a certain level of development of the society in a particular moment in time.

The relations that are establishing between the juridical norms and the social ones are presenting equivalence reports, without any kind of a "subordination". They are representing different aspects from the formal point of view regarding the same reality - rules that are important for the proper functioning of the society.

## The consumer behavior and the pressure of social groups

Individuals may define themselves as being members of a social predestined category. They can learn or elaborate stereotypical norms for this category. Also they receive a confirmation that certain behavior modalities based on these norms are attributes specific to the defined social category (group), such as some learned behaviors are expected or wanted and utilized as such in order to make the differentiation between different social categories or belonging groups (Neculau, A. (coord.), 1996, p. 370)

The individuals will become more and more integrated into the group, and their behavior is becoming more and more similar with the other members.

The group can be defined as being a human ensemble that has members that are having interactions ruled by some pre-established norms.

We can find, in the relevant literature different types of social groups taking into account the type of interactions between the individual member and the whole group.

From a marketing perspective, within social groups it can be outlined the adhesion groups and reference groups (Armstrong, G., & Kotler, P., 2012). The adhesion group is represented by the group that has a direct influence and an individual that can be a part of it, will transform himself from the point of view of all aspects regarding his social development at a particular moment in time – family, the professional team, political unit, local community etc.

The reference group, according to Hyman can be defined as a group of which an individual will report himself as an actual active member or a future one. (Hyman, H.H., 1960, p. 383-396). The reference group will influence or will determine the behaviors and attitudes of those that are identifying with it, in a differentiated way, certain persons can be a reference group in a particular field and other persons in another field.

Thereby, an individual can be part simultaneously from more different reference groups, taking account his interests and the complexity of social life involvement.

Each reference group will be determinative for certain values, attitudes etc, specific elements that will leave their mark upon the behavior of its members.

Taking account of the typology of individuals, the period of time that has passed from the first identification with the group and the relations within the group, we can see a greater or lesser influence of the social norms associated with the group upon the actual buying or consumption behavior.

Thus, scholars have determined that we can have "social" type buyers or "solitary" type buyer.

The social type buyer will have as a tendency a behavior centered on relationship with the other members and as a result they may be able to buy more products. (Anić, I.D., & Radas, S., 2006, p. 733). Starting from the same type of mechanism it can be observed a different type of behavior in case of couples that have babies compared with the ones that doesn't have.

One of the most well-known types of membership group is represented by the family. The family will have a very complex influence upon the consumer's behavior from the point of view of different aspects: the life stage of the family, its cultural type, etc. From the point of view of the life cycle stage, the quality and the dynamic of the interactions between individual and the family it can be very different from stage to stage (Wells, W.D., & Gubar, G., 1966, p. 355-363). The cultural type of the family is a factor that also contributes to the behavior of its members and the relationship between them. The analysis reveals a patriarchal type family on one hand and an egalitarian type family on the other. Each cultural type is developing its own kind of relationship between members, with social roles that have different characteristics and positions. We can enumerate: initiator, influencer, decider, buyer or user (Cant, M.C., Strydom, J.W., Jooste, C.J., & Du Plessis, P.J., 2009, p. 87).

As a conclusion we may state that individuals tend to adopt life styles that are common with their social group and modify them according to some standards, as much as they grew older. Also they will develop a kind of pattern starting from the norms incorporated within their behavior and this will lead to the possibility of consumption optimization (Starr, M.A., 2009, p. 25-49).

## Practical implications for dental healthcare services consumer behavior

The influence of social factors upon the dental healthcare services consumer behavior is undoubtedly obvious, because a healthcare type service has a complex consumption motivation behind and deep emotional involvement of the consumers.

Different research has revealed that there are notable differences between consumption habits of women to men or married people to unmarried or separated people. Thus the people that are engaged in a more fruitful social life (women or married people) have a greater consumption volume than the persons that are single or do not imply themselves in multiple social relationships (Tchicaya, A., & Lorentz, N., 2014, p 1-14).

One of the author's previous qualitative research made on dental medics at the level of Bucharest town has pointed out also information's regarding the perception of doctors upon the influence of social factors.

Thus the doctors have appreciated that the influence of the family as a social group is prevalent, many of the respondents considered that more female patients have a greater impact upon their husbands regarding the dental healthcare services consumption than the opposite. Also doctors believe that apart from the influence of husbands or spouses, there is an influence from an opinion leader from a

particular group or from a person emotionally closer to the patients. Another interesting topic was related to the fact that persons who have had very bad dental diseases or even surgical interventions are exposed to the negative image from the others and have problems with the social integration at the workplace. This shows that the construction of the self-image of individuals is based on a great extent on the perception and image of the others about them, and the social capability of a person to integrate within different groups is depending on the way in which that person is capable to find equilibrium between the two – internal and external perceptions.

Another authors" quantitative web based research suggested that the pressure of social groups upon the consumers behavior is nuanced because respondents have declared in a lesser extent to renounce to a medical dental treatment just in order to be in line with the friends or family members opinions. This shows that, even if the influence from social groups exists, a special situation can be met when the power of self-motivations is very high, and these motivations are related to the health status of the individuals.

It can be pointed out, that also at the level of this quantitative research, even if there was a measurement of the patient's opinions, these are similar with the ones of the doctors related with importance of self-image and the others persons perceptions.

Consumption motivations related to dental healthcare services may have as a basis a complex body of thought related to the self-image perceptions and the social status importance. There are different types of dental provisions that are complementary to the basic interventions that have merely a medical – clinical purpose. We can refer to the dental aesthetic procedures, rhinestones fitting etc., procedures that are intended to fulfill other type of needs than the normal ones. We talk about the self –image construction or reconstruction, and the display of a certain status.

This type of consumption is a Veblevian type, directed to the social status enforcement through a conspicuous consumption.

### **ACKNOWLEDGMENT**

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# CONSTRUCTION OF ECONOMIC INDICATORS USING INTERNET SEARCHES

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#### **Abstract**

The volume of online data searches can be used as indicators of economic analysis and forecasting. This paper reviews some of the applications that use the large data sets provided by the Internet user searches and presents a very specific case for Romanian economy. These data provide some additional information relative to existing surveys and with further development, internet search data could become an important tool for analysis and prediction.

**Keywords:** nowcasting, economic indicators, forecasting, big data

JEL Classification: C15, C40, L48

#### Introduction

The abundance of information in terms of both volume and area of interest is giving a numerous new sources of data which can be used in a various academic, business and government area. The "internet of things" and "big data" are two of the most-talked-about technology topics nowadays. The data about users' web activity is available very quickly and the traces left by users' online activity can be used in the statistics production. For example, when confronted with an illness, users search for information on specialised health care websites and post about their mood in their Facebook page or Twitter. These data is automatically saved in big databases supporting the web services or the log files of the web servers.

There is already some experience in using this web activity data to predict statistics socio-economic indicators, like unemployment, flu incidence, real estate market activity and travel, migration flows and automotive sales.

The present study follows the line of research made by Choi and Varian, based on "Google Trends", a statistical tool designed by Google which allows the Internet users to compare the volume of searches between two or more terms. The data is made available in aggregated form by the Google web service.

This article reports a relatively easy way to combine some data on web search activity of users to improve the accuracy of simple predictive models, in the case of tourist flows.

The paper is organized as follows: Section 2 summarizes the penetration and use of the Internet in Europe; Section 3 describes a model application to the

Romanian economy: forecasting the Italian tourist inflows; Section 4 outlines some conclusions and proposes follow-up projects.

## **European Internet usage**

The use of the Internet offers a large amount of information, benefits and daily activities to everyone. More than 3 Zetabytes of data exist in the digital universe today and this number has increased exponentially in recent years. The Internet has become a tool for avoiding the hassles of the bank and making the transactions quickly and safely. It also offers a powerful source for shopping, socializing and expanded the availabilities of working from home.

A recent study conducted by the European Statistical Office (Eurostat) on Internet access and use by the European households shows that almost four out of five individuals (78%) in the European Union (EU) used the internet at least once in the three months prior to the survey. The Digital Agenda target of 75% of the population using the internet regularly in 2015 was reached in 2014. The proportion of internet users who go online on a daily basis was high in all Member States and in Iceland, Norway and Switzerland. Just under two thirds of all EU citizens (65%) used the internet every day or almost every day.

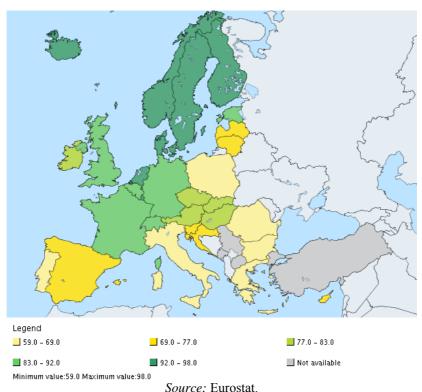


Fig. no. 1. Internet use by individuals (% of individuals aged 16 to 74-2014)

The proportion of individuals living in the EU who have never used the internet dropped to 18% in 2014, and is just three percentage points above the Digital Agenda 2015 target of 15%. A significant "digital divide" remains, with large differences still seen between the rates of non-use in individual countries. The proportion of the population with no experience of using the internet was highest in Romania (39%), Bulgaria (37%) and Greece (33%) and lowest in Denmark (3%), Luxembourg (4%) and the Netherlands (5%).

## An application to the Romanian economy: tourist inflows

The survey on preferences of Europeans towards tourism conducted in 2014 by the European Commission (EC) shows that recommendations from friends, colleagues or relatives are considered the most important source of information when it comes to planning holidays, with the Internet second in importance. However, the Internet is the most common method for organising a holiday; it was used by two-thirds of people when arranging a holiday, an increase from 2013.

Tourism is one of the most online search-intensive activities, both for obtaining detailed information on destinations and planning holidays, and for the online purchase of touristic packages. The use of the Internet to organise holidays varies greatly at a national level, from 27% in the Former Yugoslav Republic of Macedonia to 84% in Ireland.

World Travel and Tourism Council, ranks Romania 4<sup>th</sup> amongst the tourism countries that has grown rapidly, with an annual growth of tourism potential of 8% from 2007 to 2016.

Table no. 1. Arrivals at tourist accommodation establishments in Romania by country of residence of the tourist

	2007	2008	2009	2010	2011	2012	2013
Italy	436005	426624	388163	435616	488244	508132	500790
Bulgaria	157765	193185	243771	260318	333974	336135	354508
Austria	227797	299859	255771	242151	254950	244000	35371
Spain	153199	196592	180764	224675	255990	234254	27504
Hungary	200681	245521	204436	204844	207836	217631	13876

Source: Eurostat.

The main clients of the Romanian tourist industry are Italy, Bulgaria, Austria, Spain and Hungary. According to data published by the Statistical Office of the EU, since the financial crisis has affected tourism in 2007, tourist inflows have fallen by 1.4% compared to 2010 and increased by 1.6% over the period.

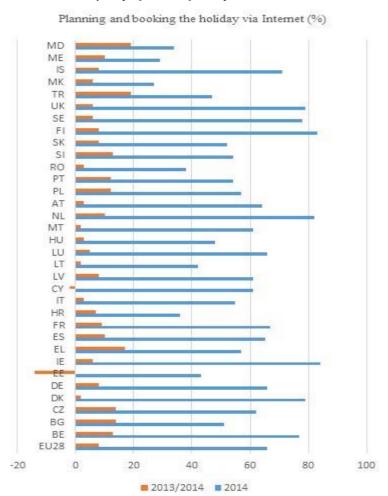
## **Applying Google Trends to tourist flows**

According to the EC survey on preference of European towards tourism, Internet websites are the most important sources of information for respondents in seven countries, led by Finland (65%), the Netherlands (63%) and Luxembourg

(58%). In Denmark, it is equal in importance with personal recommendations (56%). At the other end of the scale, less than a quarter of respondents in the Former Yugoslav Republic of Macedonia (18%), Moldova (19%) and Romania (20%) consider Internet websites an important source.

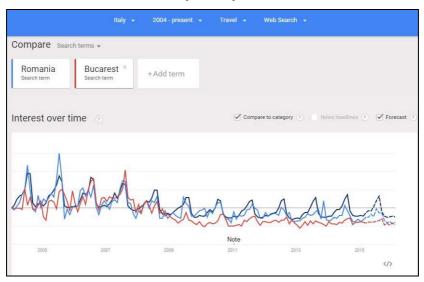
Respondents aged 25-39 (77%) are the most likely to have booked a holiday via online services, while those aged 55 and over (51%) are the least likely to have done so. The Internet (66%) was by far the most common way of organising a holiday and its use is constantly growing (+8% since January 2014). It is particularly popular for booking short holidays.

**Fig. no. 2.** Planning and booking the holiday via Internet (%). *EC survey on preference of European towards tourism* 



Italy is the main customer of the Romanian tourist industry and most of the Italians are using the Internet for organising holiday. Italy is ideal to use as a model in the construction of leading indicators of tourist flows.

The first point is searches made from Italy for the terms "Romania" and "Bucharest". The interest of Italian citizens has fallen after the financial crisis in 2007. From 2009 until January 2015 the series are not very different.



**Fig. no. 3.** Google Trends (index) January 2004 – January 2015 and the forecast for 2015

The correlation between the two series reflects the seasonal component. The biggest inflow of Italian tourists is in July and August and reaches the minimum level in December and February. Next tables outline the results of the estimates made. Table 2 compares an ARIMA model constructed in R, which shows good forecasting properties compared with the Google index series. The mean of the forecasting errors is about 19%.

Table no. 2. MA(1)\*MA(12) model and MA(1)\*MA(12) model augmented using Google Index

Models estimated by maximum likelihood	θ	Θ		Standard error of residuals	AIC	BIC	Out-of-sample MSE
East	-0.11	-0.38		52.3	511.4	9.1	0.5231E+04
SE	0.15	0.20					
	θ	Θ	G	Standard error of residuals	AIC	BIC	Out-of-sample MSE
East	-0.18	-0.31	11.40	49.8	504.8	9.3	0.3991E+04
SE	0.17	0.19	3.98				

By comparing with a second model ARIMA, where the regular component is set to zero, the percentage decreased from 19% to 13%.

Table no. 3. MA(12) model and MA(12) model augmented using Google Index

Models estimated by maximum likelihood	θ	Θ		Standard error of residuals	AIC	BIC	Out-of- sample MSE
East	0.00	-0.35		52.1	510.3	9.0	0.3568E+04
SE		0.12					
	θ	Θ	G	Standard error of residuals	AIC	BIC	Out-of- sample MSE
East	0.00	-0.18	12.40	45.1	496.3	7.9	0.3791E+04
SE		0.13	3.51				

Briefly, the improvement in forecasting compared with conventional models depends on which ARIMA model is used as a benchmark. The information contained in Google searches could be a value for forecasts and the power of the indicators, which provide information in real-time, has to be put in the appropriate context.

## **Conclusions and future developments**

In this paper we have analysed the field that use the big amount of information provided by Internet user searches. This valuable information, rich in volume and obtained in real time, proves to be feasible to analysts by using the statistical tools such as "Google Trends", which allows trends in different areas of interest to be categorized and evaluated. Recent papers have concentrated predominantly on the labour market, the housing market and travel and consumer confidence.

This paper has presented a very specific application for the Romanian economy, specifically Italian tourists (the Romanian tourist industry's main consumers) visiting Romania. The amelioration in forecasting provided by the short-term models which include the Google-indicator depends on the model taken as a point of reference. In spite of that, it allows an adjusted indicator of the flow of Italian tourists to be obtained in advance, with almost one month, as the model examples showed.

Considering that the tourism significance for Romanian economy is very important, future steps to be taken involve the creating of similar analysis for tourists from other countries, in order to be improved the predictive quality of the model.

With time and the continuing growth of Internet usage the results of this procedure can only enhance in the future.

#### Disclaimer

Responsibility for the information and views expressed therein lies entirely with the author.

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## THE IMPACT OF MANAGERIAL COMPETENCIES ON THE MANAGERIAL PERFORMANCE IN THE EDUCATIONAL SYSTEM

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#### Abstract

The concept of competence in science education is in the midst of individual and collective performance. The complexity of the activity of running school has found a certain specific of its management that is materialized in two dimensions of the school activity: the variety of categories of staff and the interpersonal relationship, culture and work climate. All these result in the formation and development of a set of skills specific to the managerial field and necessary to the director of school in performing different roles sprung from this activity.

**Keywords:** management, competence, school manager, performance

**JEL Classification:**  $F_{19}$ ,  $B_{19}$ ,  $M_{12}$ ,  $M_{54}$ 

### Introduction

Over the years 1960 and 1970 studies tried to isolate and identify the factors which increase the efficiency of school and students' achievements. (Normand, 2006, p. 54) This movement generated a great number of instruments aimed at making educational systems. Edmonds (1979) identified the following five factors which, in his opinion, are correlated with effective school performance:

- a strong management and attention paid to the quality of education;
- great expectations concerning the performance of all students;
- emphasis on teaching basic subject (reading, writing, mathematics);
- frequent assessment and monitoring of students' progress;

About the same time, Rutter, Maugham and Mortimore discovered that the staff's attitude, their behaviour and the accent on the academic performance were the factors which influenced learning and that the pedagogical monitoring (effective monitoring practices) improved school results. (Rutter, Maugham, Mortimore & Ouston, 1979, p. 58) Other factors such as class management makes students active in the learning process, a farm discipline and a good system of punishments and rewards improved the students' school final results. (Townsend, 2007, p. 43)

Starting with 1980, a new wave of research on effective schools tried to define their characteristics (Mortimore, Sammons, STOOL, Lewis, Ecob, 1988; Teddlie and Stringfield, 1993). In an analysis of 30 years of research on school

performances, made primarily in Anglo-Saxon countries, and in Europe too, Sackney distinguished the characteristics and the groups of characteristics as factors which contribute positively to the effectiveness of school: (Sackney, 2007, p.170)

- Emphasis on students' learning, organizing time, priority given to basic skills:
- School climate, cohesion between teachers, consultation on the decisions, a pragmatic approach to problems;
- A strong culture of school organization, a clear vision of the mission, emphasis on the improve results;
- A high level of expectations and requests regarding the students and teachers;
  - Intellectual stimulation:
  - Rigorous monitoring of school progress and the results of the institute;
- A continuing concern for the training and professional development of the staff;
- The relations of partnership with parents and their involvement in school life.

An important instrument in ensuring the integration of the competency and performance is represented by the practical results obtained. School must be viewed as an organization that operates in education and formation in an open market of services. Its competitiveness consists in its capacity and speed of adaption to the needs of its social-economic environment.

The products offered by this on the market are the competences. Services provided by a school can be considered quality only if the satisfy the needs, requirements and expectations of their clients (firms, organizations, students) and of their partners (state, community, local public administration, parents). (Puchin, 2011, p. 134)

## Factors which influence managerial performance

An important factor that influences the level of managerial performances is represented by the abilities of those who exercise management processes, of the managers respectively, but also of those who takes the decisions, meaning subalterns (performers).

Obviously, the decisive role has the manager no matter the position he has in the educational organization (director, deputy director, chief account, form-teacher, etc.). They influence fundamentally the managerial behaviour of this educational organization.

Competence can be approached in double aspect – on one hand as right competence attributed (named official authority) and on the other hand, as actual competence (personal authority).

If in terms of official authority, this acts at high levels at the level of management.

In terms of personal authority, knowledge, professional skills and qualities must be find differently both at the level of those who have a management position and of those who have a performer position, while the knowledge, qualities and managerial skills are compulsory only for managers.

The level of quality management is decisive in reaching the objectives, in realizing the performance, or excellence in any type of collective action, no matter the given organization. The neglect of one management implementation of high quality generates a good part of the failure of the organization. What unites them is motivation.

**Motivation** is firstly taken into consideration, by the researchers, when they study the managerial performance predictors in other domains. (Harshman, 2009) The most important predictor of the managerial performance, as seen in many researches, seems to be the general mental ability. (Jackson, 2008)

General mental ability predicts the performance in basic tasks opposed to contextual performance. General mental ability influences the performance through the capacity and speed of accumulation of knowledge needed to perform. Intelligence tests cannot measure the typical variation for specific skills the same way as these specific skills are relevant to touch these goals.

Different **non-cognitive traits** seem to supply successfully the intelligence for different posts. One such trait seem to be general for the intelligence: conscientiousness – integrity but the size effect on the bases performance is considerably less than in the case of intelligence. **Experience** has an effect on performance, but it predicts it weak, while the complexity increases. Emotional intelligence has an influence on the contextual performance.

**Moral intelligence** has influence on company performance on medium and long term and it creates the movable between the individual performance and the organizational one, I mean on the given performance at the highest level, the impact of the organization on the social environment, the prestige of the business. (Kiel & Lennick, 2005)

**For performance prediction the most useful indicator is the competence.** For intervention in order to improve the performance all competences can be used, but the most useful indicator is the learning competence.

The predictors of the managerial success are founded in a constellation in which some managers were better studied and other managers were barely understood and taken into account (moral and emotional intelligence), and others at all (systemic intelligence). All these predictors can be measured indirectly through the managerial competences.

## The managerial performance evaluation in the educational system

New tendencies of the development of education involve promoting on managerial positions of well-prepared staff able to make qualitative changes in this domain. That is why to promote managers an evaluation is needed. In this context, the evaluation must be examined as a set of activities through which the obtained data are collected, organized and interpreted after some methods, techniques and instruments of evaluation were applied and elaborated according to the objectives and the evaluation type, according to the content and the chosen group work for the purpose of issuing a judge of value on which is based a certain decision in the educational plan. (Pâslaru, et al., 2005, p. 7)

Evaluation, in accordance with a quality education must have three distinct stages: measurement of training specialists offered by the university, analysis results and measures for improvement. (Molan, 2005, p. 59) The problem of a qualitative evaluation, in any stage, is of managerial nature obliging the manager of the educational institution to put into action certain mechanisms to ensure him that a certain quality level is reached.

# A delicate issue is that of the leaders of the institutions of education evaluation

If it was less formal, we think many lacks of the managers would be discovered: a **less quality formation** because some of them continue to be self-taught in this domain distil and their own empirical experience, learning by trying and mistakes what is unacceptable when the educational system cannot and should not permit failures. (Cojocaru & Slutu, 2007, p. 9)

Today, there is not any institutional initial and continuing training system for managers which would mean the professionalization of managerial activities and their training for all leadership structures of the educational system with positive repercussions for the changing of the attitudes, capacities and professional behaviour of the managers who lead certain institutions in the spirit of the modern management principles and methods.

The determination of an evaluation methodology of the manager's activity and the shift from appointment by delegation made by the inspectorate to the management contract system, unlimited in time is thought to be more efficient. In this case, his **managerial contract must have clear performance criteria**. Not less important is the using of a varied and gradual set of material-financial and moral rewards to recognize and reward the high managerial performances.

Mention should be made about the necessity of the managers' evaluation because the complexity of the managerial process, mainly its length and the diversity of its implications on the individual evolution, on group or social represent important arguments which require assessment and evaluation as a permanent activity.

Evaluation of managers must represent a measurement and comparison of the results activity, of the physical and intellectual potential, professional and managerial with the objectives and the occupied post requirements. (Nicolescu, et al., 1992, p. 301)

Evaluation of the manager in the context of the contemporary study context is dictated by the necessity related to the expressing and correct sizing of the objectives, both in their assuming and distribution. The orientation of the objectives, of the tasks that drive from these consist in the actions made by the manager to organize the work, to control the activity and evaluate the activity of the employee activity.

Thus, a competent manager together with the managerial team will orient the activity focusing on clear purposes based on scientific principles with a decent expertise. In his activity, besides the function of organizer of the educational process, the manager will be an expert and a promoter of the values, this way improving all the segments of the educational institutions.

It is obvious the fact that the manager can be evaluated from different points of view, resulting a greater global number of criteria. For this reason, the scope of the evaluation needs to be mentioned. Evaluation of the performances is more extensive because it is based on results.

# Standards and ratings in the educational system

Once the evaluation criteria have been chosen, they are compared with the standards.

Professional standards are defines through sets of competences and each competence from a certain level involves a performance criterion. Standards represent the desired level of the performances and, as a reference element in the results appreciation, enable highlighting of the degree the activities took place and the tasks were solved. Standard establish what and how well a person must do. They can be characterised by the following sizes:

- quantity (how much or how many)
- quality (how well or how complete)
- **costs** (related expenses)
- **time** (the moment the objective must be realized)
- use of resources (what equipment/ materials will be used)
- way of achieving (how the activities will be realized).

Standards are established before the activity starts, thus, all the people involved know what is expected from them. At the same time, it is important the meaning of the ratings used to appreciate the staff's performance be known. In general, five ratings are used: very good, good, satisfying, weak and very weak.

Evaluation is made by the direct leaders/managers, being the most useful type of evaluation. The direct leader has, formally, the necessary authority to realize the evaluation and reward the staff according to the obtained results. Moreover, these persons are able to observe the staff's performances and judge how these serve to the group and organisation's objectives.

In the managers' case, the process of their performances evaluation includes an annual report concerning every single performance. In drafting the report, more important is the evaluation of the results and not in the analysis of his behaviour.

# Methods of evaluation of the managerial performances in the educational system

In most European countries, the competent authorities responsible with education are the inspectorates, being responsible with schools' evaluation in the context of the scholar autonomy. The systems of inspection can be central or

delegated. Since the end of 1990, in many countries, the criteria used to evaluate schools have been according to present standards.

To evaluate managerial performances in the Romanian pre-university educational system **the evaluation grid method** is applied which means to elaborate a list of criteria for each of this a scale of assessment being attached.

The stuff subject to the evaluation process is marked on the bases on score which reflects his performance level for each criterion taken separately.

Evaluation date sheet of the director's activity from the Romanian preuniversity education does not permit a relevant assessment of the directors of schools, letting enough room for subjective interpretations, suggesting that this system of evaluation has **disadvantages**:

- It does not offer clear information, detailed on performance criteria
- The assessment general criteria of the performance mentioned in the evaluation date sheet are general, there not being a breakdown in detail, fact which would better catch the director's activity.
- The present evaluation system does not offer clear clues regarding the why the activity takes place and the performances evaluation in time.

Another system of evaluation that can be used to evaluate school managers could be based on two documents:

- the individual evaluation sheet with criteria grouped according to the observed domain in the managerial activity. This sheet will be filled by both the manager and the assessor;
- the interview sheet, which is to be filled during the interview between the assessor and the school manager where to be mentioned the correlations with the individual evaluation sheet of the performances.

In France, the primary school principals evaluation is realized by the National Education Inspector and in secondary schools, the school director evaluation in realized by the Minister's representatives in regional plan (recteurs d'academie) and by the departmental directors from the Ministry (inspecteurs d'academie). The performances are grouped in for fields divided into sub-domains and the reportgrid is the evaluation instrument, where each competence is given a rating from unsatisfying to superior. After the self-evaluation of each competence domain, the director's commentaries or the supervisor's recommendations can be added, because the evaluation has two stages, like in Romania: self-evaluation and the superior authority's evaluation.

In the **United States,** in 2002, National Policy Board for Education Administration (NPBEA) published L'Educational Leadership Constituent Council (LECC) – standard accepted and used to employing, training and evaluation in schools from more than 20 states from the United States of America (Adams-Rodgers and Johnston, 2008). From 1996 Interstate School Leaders Licence Consortium (ISLLC) published Standards for school leaders, guide for school directors' training. Each of the six standards of performance and main criteria (vision, organizational culture, management, community relations, ethics and social context) is described by the performance descriptors to which are associated

examples of activities, attitudes that must operate through standard realization and performances which can be observed at an administrator which touch the standard. The scope of the evaluation process is to improve the performance and not to show incompetence.

### **Conclusions**

In terms of competency – performance relationship there is a management system of the competence based on performance. Application of this system leads to achieving the vision, the mission, the objectives of the organization everything being possible due to the increase of the human resources thorough its distinct and unique skills augmentation. Enriching human capital optimizes other organizational resources, this working as a lever for the actual strengths of the organization (Kandula, 2006, p. 240).

Practice demonstrates undoubtedly that the performance, achieving high quality goals of an action, is possible only at high and corresponding level of competence. When the competence level is low, the performance is low, too.

But there are frequent situations when the level of the competence is high but the practical results are low. This phenomenon is more meaningful in the case of the managers who, through their weak performances, generate important losses of capacities (material, informational and human losses). In such cases something goes wrong, that means something is wrong in the organizational and management system requiring diagnosis by consulting and establishment of corrective measures, through interventions from outside. Other times definition of fasting and the profile manager and the competence evaluation are wrong and irrelevant.

For school, to have performance means:

- 1. Good and very good school results
- 2. Social results (social integration of the alumni, percentage of success at admissions)
  - 3. Curricular material, means of education
  - 4. Social education programs

Managerial function represents a practical professional activity for whose exercising specific, technical and relational knowledge and abilities are needed. In relation to other functions and professions, the managerial function/position has two characteristics:

- It exerts on other people, so, it is not a solitary profession
- It is learned both in school and in professional practice.

The manager self-formation is essential for the organization development. It is the path towards the organization performance. As managers work to become efficient they raise the performance level of all organization. In current conditions, the organization depends on the performance and the managerial results for it to exist and survive. But, the managerial efficiency can be obtained only having a certain level of knowledge.

Obtaining and having a certain level of knowledge is achieved by accumulation of information, by study, by learning and by practical experience. At

present, management has a precise contour and the science and art of management can be leaned by anybody on condition that he has innate inclinations to apply everything he learns.

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# CORRUPTION AND INTERNAL CONTROL WEAKNESSES. CASE STUDY ROMANIA

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#### **Abstract**

Corruption represents one of the major causes of poverty all over the world and European Union is fighting against it. In the last few years, the corruption phenomenon registered a high level in some European countries and became one of the most problematic factors for doing business, due to the evolution of the perceived top five global risks: interstate conflict and regional consequences, extreme weather events, failure of national governance, state collapse or crises, high structural unemployment or underemployment (WEF-Global Risk Report 2015, p. 14).

One of the modalities in combating corruption is implementing the internal control and most of the governments and organizations adopted strong control techniques. Most of the control weaknesses are related to the financial procedures and the number of controllers. Some of the controllers do not have enough financial expertise or do not understand the importance of informatics systems.

**Keywords:** corruption, government, fraud, internal control

**JEL Classification:** D<sub>72</sub>, H<sub>11</sub>, H<sub>26</sub>, M<sub>42</sub>

#### Introduction

In this paper we investigate the relation between economic risks, corruption, and the internal control weaknesses. The global economic risks have changed in the last five years and the companies must implement a strong internal control in order to reduce corruption, fraud and inequality. Fraud could be a cause of growing corruption, but fighting corruption in many countries has proved difficult (Treisman, D., 2000).

There are also more likely to be identified internal control weakness, if the controllers are not independent. Also, it would be important to implement external control in order to prevent the fraud risks.

In Romania, corruption is considered one of the problematic factors for doing business, but the modernization of accounting systems and new European regulations improved the financial system and reduced the inefficient government bureaucracy.

### **Literature Review**

This paper is related to several recent papers on the determinants of internal control, corruption and economic risks:

Global Risks Report 2015 (World Economic Forum) presented how fragile societies are under a lot of pressure. A major driver of social fragility is big socioeconomic inequality within countries, and rising structural unemployment drives both inequality and social pressures. According to this Report, there are some global economic risks of highest concern, such as: unemployment or underemployment, fiscal crises, asset bubble, failure of financial mechanism or institution, energy price shock, deflation, failure of critical infrastructure, unmanageable inflation. European countries are still recovering after the recent economic crises and the global financial system is undergoing massive structural change. In this context, we could observe how banks' regulatory rules have been revised, resulting in stronger capital requirements, the first-ever globally agreed liquidity standards, and new standards for constraining large exposures and improving risk management (Global Risk Report 2015, p. 19).

The international community is finalizing a basic solvency requirement for global insurers who are systemically important, because the bank and the insurer system are affecting the global economy. International accounting standards are being changed, in particular to make loss recognition more forward-looking (such as IFRS9) and COSO Internal Control Framework has been updated.

Zhang, Yan et al (2007) in "Audit committee quality, auditor independence, and internal control weaknesses" explained how the relation between audit committee quality and internal control weaknesses is being developed. They observed how the audit committee not only plays an important monitoring role to assure the quality of financial reporting, but also serves as an important governance mechanism. It was discovered that firms with high-quality audit committees are less likely to have internal control weaknesses than firms with low-quality audit committees. The research presented some firms that are more likely to be identified with an internal control weakness, if their audit committees have less financial expertise or, more specifically, have less accounting financial expertise and non-accounting financial expertise. In this case study, it was identified that internal control is weak, if the auditors are more independent and other firms with recent auditor changes are more likely to have internal control weaknesses.

The Updated COSO Internal Control Framework (2013) continues to emphasize the importance of management's judgment in evaluating the effectiveness of a system of internal control. The Framework explained how external parties, including external auditors and regulators, are not part of the system of internal control and cannot be considered a source of detection and assessment of internal control deficiencies. In this case, the responsibility for identifying and assessing internal control deficiencies rests with the controllers or internal auditors, in the normal course of companies' activities. According to the *Principle 8 of Internal Control*, many companies integrate their evaluation of the

effectiveness of controls mitigating fraud risk with the evaluation of other controls embedded within the organization's processes. It is generally accepted that control activities are an integral part of making business processes work, but control activities are in place within the process to reduce "financial reporting assertion risks" to an acceptable level, including the risk of fraud. In conclusion, the COSO Internal Control – Integrated Framework provides an overall framework for addressing the effectiveness of internal control in providing reasonable assurance that operational, reporting and compliance objectives are achieved.

# The Evolution of Corruption in European Countries

We noticed that corruption is growing in European countries despite the efforts of European governments, public institutions and non-profit organizations. Cross-country data for European countries is used to analyse the role of government bureaucracy, tax regulations and the effect of policy instability. According to the Global Corruption Barometer (2013), every day, all over the world, ordinary people bear the cost of corruption and in many countries corruption affects people from birth until death. It was observed that citizen action can lead to the exposure of corrupt acts and put pressure upon reluctant governments to do more in the fight against corruption. In this global context, The Global Corruption Barometer (2013) underscores the pressing desire of citizens to get involved in stopping corruption.

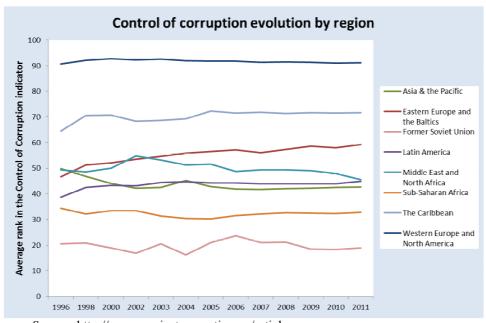


Fig. no. 1. The evolution of corruption by regions

Source: http://www.againstcorruption.eu/articles

Corruption continues to be a challenge for Europe – a phenomenon that costs the European economy around 120 billion euros per year (Anti-Corruption Report 2014). We notice that corruption is increasing in European countries over time, but it is still lower in comparison to developing economies, and the cleanest economies are developed ones. Also mass-media is concentrated on the international dimension of the corruption and how to adopt the effective measures to fight against corruption.

According to the EU treaties (Council of EU – Thematic paper on corruption, Corruption crimes in relation to public procurement, November 2012, p. 5), it is the role of the European Commission to monitor and to verify the correct implementation of EU law into national law. Thus, all the member states are responsible for the correct implementation of EU legislation in order to identify the causes of corruption and the effects over the society.

We could observe in the figure below that corruption is larger in Asian countries and lower in the European countries, as a result of European regulations and enforcement of the internal control and audit for public and economic entities. The red areas are indicated as the corrupted countries and the yellow colour indicates the clean countries. We notice that the North European area is very clean compared to the South-East European area:



Fig. no. 2. Corruption in Europe

Source: http://www.europe-forum.info/index

There are some candidate countries to join EU, where corruption index is significant in the last few years, as a consequence of international crises, growing bureaucracy and political instability. For this reason EU adopted a set of conditions to reduce corruption, which have to be met by the candidate countries in order to join the EU. The EU candidate countries are Iceland, Macedonia, Montenegro, Serbia and Turkey. There have been several years since the accession negotiations were opened with these countries, as follows: Turkey in October 2005, with Iceland in July 2010 and with Montenegro in June 2012. EU supports reforms for the candidate countries with financial help and the Instrument for Pre-accession Assistance (IPA). According to the EU data base, for the period 2007-2013 IPA

had a budget of some  $\in$  11.5 billion; its successor, IPA II, will be built on the results already achieved by dedicating  $\in$  11.7 billion for the period 2014-2020.

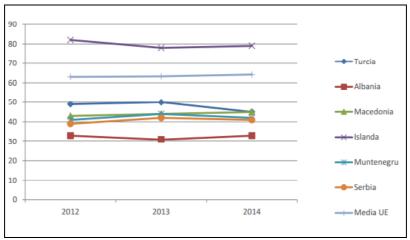


Fig. no. 3. Corruption Perception Index for Candidate Countries

Source: http://www.transparency.org.ro/politici si studii/indici/ipc/2014

The Corruption Perceptions Index presents on a scale from 0 (perceived to be highly corrupt) to 100 (perceived to be very clean) the corruption all over the world and is based on expert opinions of public sector. We observe in the figure no. 3 how scores for Turkey is reduced in Turkey from 50 in 2012 to 45 in 2014. In the same time, Island is a very clean country with a very good score in 2012 (82) and almost the same in 2014 (79). The rest of the candidate countries maintain the same score during 2012-2014.

# The Evolution of Corruption in Romania

Corruption in Romania is one the barriers of the economic development with long term consequences on the Romanian society. Unfortunately, the last economic crisis had a large and lasting impact on the Romanian economy (European Commission – Country Report Romania 2015, p. 4). After a strong economic growth in the period 2003-2008, a large drop follow in 2009 and a potential growth has started with a very timid recovery. According to the European Commission, the economic growth is forecast to reach 2.9 % in 2019, which is 0.5 % lower than the average potential growth in the pre-crisis period.

Post-crisis the tax mix has improved, but tax policy is changing frequently and revenue collection remains weak. This tax rates instability is a major cause for the low level of investment in Romania and remains above EU average. According to EU-Country Report Romania 2015, EU funds' absorption is lagging behind, at only 52.2 % of the available structural and cohesion funds as of end of 2014.

However, corruption is still one of the most problematic factors of doing business in Romania (table no. 1).

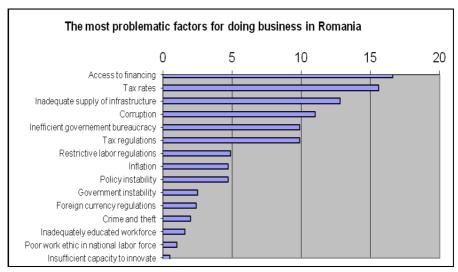


Fig. no. 4. The most problematic factors for doing business in Romania

Source: Global Competitiveness Report 2014-2015, WEF Geneva 2015

Despite these problematic factors, we could observe that corruption has a constant level in Romania, due to the government efforts to maintain a political and economic stability (Ionescu, L., 2012). The corruption perception index in Romania (43) is much lower than the EU average (64.21), but we observe an improvement from 2012 (44) to 2014 (43) and it is estimated to drop in the next few years. The figure no. 4 presents the evolution of corruption perception index for the period 2012-2014:

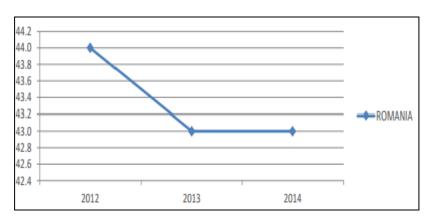


Fig. no. 5. The Evolution of Corruption Perception Index in Romania

There are estimations that the corruption perception in Romania will drop in the next few years due to the strong implementation on internal control, internal audit and effective cooperation, between central and local public authorities, with the involvement of National Agency for Fiscal Administration (ANAF) and National Office for Prevention and Control of Money Laundering (ONPCSB).

#### **Internal Control Weaknesses in Romania**

According to the COSO framework, internal control is defined as a process, effected by an entity's board of directors, management and other personnel, designed to provide reasonable assurance regarding the achievement of objectives. Despite the long history of internal control, the economic crisis from 2008 to 2010 reveals some weaknesses of the internal control in most European countries and especially in Romania.

Internal control consists of five interrelated components, derived from the way management runs a business, and are integrated with the management process. These components are:

- Control Environment
- Risk Assessment
- Control Activities
- Information and Communication
- Monitoring Internal Control

Each entity faces a variety of risks from external and internal sources that must be assessed (COSO framework 2013). According to our experience and business practice, most of the companies did not evaluate the risks in a proper way and registered in their books the non-realistic values for their properties. Also, the overestimated cash-flow and the optimistic figures for their incomes and profits indicated a weakness of internal control. According to some experts, internal control must be evaluated by independent audit (Zhang, Y. and al., 2010).

After the liquidation of many Romanian companies, some weaknesses of internal control were identified:

- poor implementation of internal control;
- lack of sufficient personnel with appropriate qualifications;
- poor implementation of IT systems;
- absence of internal audit;
- no evaluation of internal control by the management.

The quality of internal control is related to the financial indicators of the company and the low level of corruption in the private entities. A good implementation of the internal control is the barrier of spreading corruption and strong premises to develop business in Romania. Firms with stronger internal controls have less corporate corruption (Weili, G. et al., 2014).

Most of the foreign investors are avoiding Romania because corruption is indicated as one of the most problematic factors of doing business. The big companies with greater complexity and scope of operations are more likely to have internal control problems (Domnisoru, S, Vinatoru, S.S., 2011). At the same time,

small companies are controlled by the manager or by the finance director every month. This explains why the small entities have no corruption and the big entities are exposed to corrupted managers or employees.

#### Conclusion

In this paper I presented the evolution of corruption at the European level and national level in the last few years, when most of the countries started a recovery after the economic crisis. In Romania, corruption could be prevented by implementing internal control for big companies, but also to small companies. The weaknesses of internal control are related to poor qualification of accountants and managers, less financial practice of controllers and poor implementation of the IT systems. Most of the transactions nowadays are performed on the internet and employees and management must be very well trained to operate the electronic payments. Corruption affects all segments of society, including businesses, as it affects markets and competition (Magureanu, A.F., 2014), so all governments must implement strong internal control and audit to reduce its effects.

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  - http://www.anaf.ro/ Misiune ANAF
- http://ec.europa.eu/enlargement/instruments/overview/index\_en.htm Overview Instrument for Pre-accession Assistance

#### THE DECISIONAL ENVIRONMENT – THEORETICAL ASPECTS

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#### Abstract

The present paper speaks about the main theoretical aspects connected to the decisional environment. Thus, we defined the decision and its major role in the managerial process. Secondly we followed the stages and perception along time in defining the concept of decision. After that we described, shortly, the factors which diminish the uncertainty: relevance, correctness, accuracy, precision, completion, timing, usage, consistency, conformity and cost. The next treated aspects were several classifications of the decisions, taking into account different variables or implied elements. In the end we jump at the conclusions.

**Keywords:** decision, uncertainty, data characteristics

**JELL Classification**: M<sub>15</sub>

#### Introduction

The decision represents the cornerstone of the managerial process; it is that contributes to the plenary exercise of the leading functions (Popescu, D., 2001). Making decisions is the most complex part in the managerial activity; it is also the central element of the basic activity. To decide means to conceptualize a choosing as a mental image or as an explicit model.

#### Literature Review

The decision defining covered several stages and observed the priority perception of the researchers. Thus:

- ✓ H. Simion, 1960 spoke about the choosing of the action direction;
- ✓ Fishburn, 1964 stressed the choosing of the action direction;
- ✓ Churchman, 1968 uttered that a choosing leads to a certain objective;
- $\checkmark$  A. Radulescu, 1983 the elaboration of a number of alternative strategies and choosing of one of them;
  - ✓ Bonczek, 1984 choosing of an action plan;
  - ✓ Minzberg, 1996 the specific forms of implying the resources in an action;
  - ✓ Power, 2000 the engagement on a specific action direction;
- $\checkmark$  F.G. Filip, 2002 the result of conscious activities when choosing an action direction;

 $\checkmark$  *Hâncu*, 2002 – the decision can be defined as the chosen solution among many alternative variants;

 $\checkmark$  Yates, 2003 – the decision is presented as an implication in action; its intention is to satisfy the requirements of a business.

By analysing the defining manner of the same concept, we can utter that generally it is the result of a value judgement on a certain situation. The processes of making decisions can be classified as decisions at the strategic level, decisions of the medium level management, decisions of the data, information and knowledge operators and decisions of the operational management.

#### The Characteristics of Data

In conformity with Devlin definition in his work *Data Warehouse from Architecture to Implementation* (1997), data are *what the components of the informational systems create, stock and supply.* Data which were processed by adding new significance or useful pieces of knowledge become information. The information purpose is to diminish uncertainty; its quality is given by the following factors: relevance, correctness, accuracy, precision, completion, timing, usage, consistency, conformity and cost.

✓ relevance — a piece of information is relevant when it can be used and offers a significant result. For example, the price of a telephone company shares at the stock exchange is relevant in buying or selling shares, but it is irrelevant in supply commands or when buying raw materials.

✓ **correctness** – a piece of information is correct if it stands against authentic and real data.

✓ accuracy – measures the degree of closing by the real value.

✓ precision – represents the maximum accuracy in representing a piece of information.

✓ completion – refers to gathering all the necessary elements for making decisions.

✓ **timing** – supposes the analysing of the following aspects:

- \* the moment we need the piece of information;
- \* the moment when the piece of information becomes available.
- $\checkmark$  usage reflects the ease in exploiting information for the purpose.

✓ accessibility – refers to the necessary time for obtaining the piece of information, with an acceptable level of effort.

✓ **consistency** – all elements which compound a piece of information base on the same assumptions, periods of time etc.

✓ **conformity** – measures the difference between the characteristics of the obtained information and the forecast ones.

 $\checkmark$  cost – represents the consumed resources by the company in order to obtain the piece of information.

The managerial decision represents a result of the managerial functions exercise (Dragomir, R.G., 2008), leaning on the following elements: the objective or objectives, different ways to achieve the objectives and choosing only one

variant from many possible ones. The managerial decision directly reverberates over the behaviour, actions and results of the implied factors, but also on the economics and technical indicators of the company.

Fig. no. 1. The characteristics of data



The decision is a responsible act, based on several requirements of rationality; it has to be scientifically founded, opportune, efficient, complex and empowered.

Making decision at different levels means:

✓ strategically supposes the establishing of the company objectives, resources and politics on a long term, reported to the economic environment;

✓ tactically assures the management control and mainly refers to the efficiency of the used resources;

✓ operationally establishes the means of fulfilment for the activities planned by medium and strategic management, but also the resources criteria.

The decisions are the result of a dynamic process influenced by many factors. One division grouped them as follows:

✓ *Unstructured decisions* are random order decisions, the decisional factor has to judge, evaluate and understand directly and immediately the problem under discussion. There are not specific procedures when making this type of decisions.

✓ Structured decisions are repetitive, of routine, made under specific procedures. This type of decisions does not have novelty character each time.

The detailed structure of the decisions (Popescu, D., 2001) was made according to: the available information, management level, time component, the level of decision programme, number of decisional criteria, number of persons founding decisions etc.

Depending on the available information as concern the variables which influence the results, the decisions are classified as follows:

- ✓ Decisions under certainty conditions;
- ✓ Decisions under uncertainty conditions;
- ✓ Decisions under risk conditions.

Depending on the management level, we can notice:

- ✓ Decisions taken at superior levels;
- ✓ Decisions taken at medium levels;
- ✓ Decisions taken at low levels.

If we observe the time variable, we distinguish:

- ✓ Strategic decisions;
- ✓ Tactic decisions:
- ✓ Current decisions.

The fundamental element within the decisional process is the human decider. If one takes into account the magnitude of the phenomena that are to be analysed, but also the limits of human being, it is necessary that the decider be informational assisted in making decisions. The step by step decisional process is presented below:

STAGES OF THE DECISIONAL PROCESS situation INFORMATION - problem identification - problem classification Simplification - descomdeviding problem into sub-problems - problem attribution Suppositions Defining the problem CONCEPTION - formulate the model - determination of one set for the evaluation criteria - establish several variants Model - prevision the model results validation - model measure Defining the options CHOOSING Verifying and - final resolving of the model testing the - Sensitivity analysis chosen - select the best variant - establish the implementing plan Choosing solution SUCCESS FAIL IMPLEMENTING AND EVALUATION

Fig. no. 2. The stages of the decisional process

The first stage of the decisional process is *information*. This means a process of collecting, processing, classifying and presentation of data referring to the situation under discussion. If this first stage is fully realized, the next steps will follow smoothly. The problem identification and its classification contain many sub-stages in order to eliminate the perturbing factors.

Among the difficulties appeared during this stage, there are: defining the problem in terms of speciality function, defining the problem in terms of solution, diagnosing the problem in terms of symptoms.

The conception or design proposes to evidence different ways of action in order to solve the problem, each of them implying a set of actions. The data obtained previously are now used for building, testing and validating the models and the foreseen solutions. This stages ends with the options defining.

*Choosing* is the basic stage for decision making. The purpose of this stage is the fulfilment of the general objective, by resolving the problem. The choosing of the optimal solution is not only a temporary option, but it influences the following stages: implementation, control and evaluation.

During the stages of *implementation and evaluation*, the decider brings into practice the chosen variant. It is followed by the observing and measuring the obtained results.

#### **Conclusions**

The establishing of the alternatives probable and possible is a process that can be realized with the help of the concepts and equations, although the choosing of the best solution has a pronounced subjective character, depending on the personality, temperament and experience of the decider, the available information and also the environment.

The decider has a limited control over the environment. This can also be evaluate: it can be favourable or unfavourable, hostile; it can also be certain, uncertain or with risks; stable or flexible and so on. The context is defined depending on the environment, relevancy and information.

Within so many elements involved, with human aspects and subjectivity, with the contribution of the informatics devices, the decisional process is a very complex one; it cannot be comprised in few and simple utterances. It evolves, changes, implying more and deeper aspects and components.

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