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EMPIRICAL RESEARCH TOWARDS THE FACTORS INFLUENCING CORPORATE FINANCIAL PERFORMANCE ON THE BUCHAREST STOCK EXCHANGE

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Abstract

This study aims to investigate the potential factors of influence on corporate financial performance, by using the panel data regression analysis. The research was employed for a sample consisting of 40 companies listed on the Bucharest Stock Exchange, over the period 2010-2012. Corporate financial performance considered as the dependent variable was proxied through return on assets, return on equity, and Tobin's Q ratio. There were selected the following factors that could influence corporate financial performance: capital structure, firm size, and corporate social responsibility involvement. Likewise, several control variables have been introduced: structure of the ownership and institutional investors. The results show a strong negative relationship between corporate financial performance and debt to equity ratio. Also, there has been revealed a positive influence of the company size on performance, although weak. Furthermore, the relationship between financial performance and social performance has been statistically validated, both using accounting and market ratios.

Keywords: corporate financial performance, capital structure, firm size, corporate social responsibility

JEL classification: C10, G32, M14

1. INTRODUCTION

Performance is economically reflected by the companies' profitability. Given that business value is important for all the stakeholders involved, the research of factors which affect performance is essential. For maximizing the interest of all agencies, managers have to balance every group interest, in order to minimize the potential negative effects and the consequences of divergent reactions on financial results (Peloza and Papania, 2008). The aim of this paper is to empirically investigate the impact of the capital structure on financial performance, for Romania's emerging economy case and also to analyse the relationship

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between business size and performance. The novelty of current study consists in including corporate social responsibility (CSR) concept among the factors that influence corporate financial performance. By default, it has been analysed the development and implementation of this concept in Romania. By using content analysis, it has been created an indicator that quantify the companies listed on the Bucharest Stock Exchange (BSE) level of social responsibility involvement policies. The importance of researching the capital structure within transition economies was first revealed by Cornelli *et al.* (1998). Moreover, there were developed several cross-country studies for the Eastern European corporations (Nivorozhkin, 2005; De Haas and Peeters, 2006; Decoure, 2007).

Financial structure of capital represents the solution adopted by the companies to fund their assets, combining stocks, debts, and hybrid equities (Espireh *et al.*, 2013). Early modern studies in this field were made by Modigliani and Miller (1958). Their study is based on the following key assumptions: no transaction costs, no taxes, no bankruptcy costs, symmetry of market information, equivalence in borrowing costs for both companies and investors. In spite of the very restrictive conditions, which have led them to conclude that within perfect capital markets conditions, the capital structure is irrelevant, Modigliani and Miller (1958) have primarily the merit of being the pioneers of the impact of capital structure on performance theory. Afterwards, market deficiencies were highlighted by various theories that revealed defining aspects of the financing policy, but so far there is no universally accepted theory in point of the optimal capital structure. Sheikh and Wang (2013) revealed a negative relationship between capital structure and performance, thus emphasizing that agency issues may lead firms to use rather higher than suitable levels of debt within their capital structure. In fact, this overleveraging may enhance the influence of lenders, which in turn narrow the managers' ability to run the operations effectively, consequently, negatively affecting firm performance.

Jensen (1989) argued that top managers tend to invest free cash flow in negative net present value projects instead of paying out dividends to shareholders. In fact, there can be summarized two dominant theories (Ebaid, 2009): the trade-off theory and the pecking order theory (made popular by Myers and Majluf, 1984). According to the trade-off theory, known also as the 'static arbitrage theory' (a situation in which there are only two ways and one must be chosen), the optimal capital structure is determined by the benefits and costs associated with each funding sources. Increasing debt increases the tax benefits and reduces the conflicts between shareholders and managers, but decreases liquidity and has a negative effect on the bankruptcy risk. According to pecking order theory (the theory of ranking the financing sources), profitable companies uses primarily domestic sources (as reinvesting profit), then from debt sources.

Based on these directions, the first hypothesis tested on the companies listed on the BSE is formulated as follows:

H_1: There is a negative relationship between leverage and profitability (Zeitun and Tian, 2007; Ebaid, 2009; Soumadi and Hayajneh, 2012; Salim and Yadav, 2012; Espireh *et al.*, 2013).

Along with capital structure, firm size is another factor with major implications. It is believed that large firms can benefit from economies of scale, more lax financing conditions, and high stability under uncertain market conditions. The bigger the company, the lower is the volatility of cash flows. On the other hand, separation of ownership from management may generate conflicts which have negative effects on performance.

Given the specificity of the Romanian economy, the second hypothesis is expressed as follows:

H_2: There is a positive relationship between company size and corporate financial performance (Symeou, 2010; Pervan and Višić, 2012).

Current study included the social responsibility component because we considered important to be investigated if a new concept, as corporate social responsibility, will be perceived as a factor with major implications on performance, in a context of a short-term vision of the companies listed in Romania. According to the stakeholder theory, the companies that have been involved in social responsible actions have better performance because it attract responsible consumers, are more easily responsive to legislative changes, enhance reputation, and have a better relationship with non-governmental organisations. Besides, without having the necessary funds, it is hard to believe that a company will get involved in social responsibility projects. Previous studies on the signal theory conducted for the Romanian market (Dragotă *et al.*, 2009) showed the absence of interest in using dividend as an indicator of firm performance.

Therefore, we state the third hypothesis of current study as follows:

H_3: Corporate financial performance is influenced by the involvement in corporate social responsibility actions (Van de Velde *et al.*, 2005; Van Beurden and Gössling, 2008).

The remainder of this paper is organised as follows. Section two presents the results of previous studies. Section three describes the database, the employed variables, alongside quantitative methods which will be used. Section four shows the empirical findings. Last section concludes the paper and provides future research directions.

2. LITERATURE REVIEW

By using return on assets as the dependent variable and the total debt to total assets ratio as independent factor, many authors (Zeitun and Tian, 2007; Pervan and Višić, 2012; Espireh *et al.*, 2013) have noticed a negative relationship. Likewise, a positive relationship was observed among size (logarithmic value of total assets) and performance. In terms of the impact on return on equity (Ebaid, 2009), there was no evidence of a significant statistical relationship. Similar results were obtained regarding firm size. Soumadi and Hayajneh (2012), by using market indicators, showed a negative relationship between performance (Tobin's Q ratio) and total debt ratio. Moreover, a positive impact of the company size was observed. The authors have also introduced a control variable, the variation of the total assets which was positively correlated with performance. Akbarpour and Aghabeygzadeh (2011) investigated the relationship between performance (ROA, ROE) and capital structure (short-term and long-term debt to total assets ratio). The study included 101 Iranian companies for 2005-2010. The results showed a positive relationship with ROA. No statistically significant relationship was observed regarding ROE.

Other authors have treated the impact of the financial performance on the leverage (Chakraborty, 2010; Céspedes *et al.*, 2010). The studies showed a positive relation with size (natural logarithm of turnover). Also, Chakraborty (2010) noticed that the empirical studies on capital structure, developed after the 1980s were focused on the developed countries and these countries have significantly different characteristics than the developing economies. According to Myers (1977), if the corporation register risky debt outstanding and managers act in order to maximize equity value rather than total firm value, then managers have an incentive

to defer investment inefficiently. Jensen (1986) stated that leverage may lead to improvements in efficiency through mitigating managerial discretion over free cash flow. Harris and Raviv (1988) and Stulz (1988) ascertained that management can use the capital structure to gain voting power, whereas this will impact on the outcome of takeover contests. Moreover, Israel (1991) evidenced that using debt influences the distribution of cash flows between voting and nonvoting shares, thus influencing the outcome of takeover contests.

Andres (2008) employed panel data on 275 German exchange-listed companies in order to investigate the relationship between founding-family ownership and firm performance. Thus, there was shown that family firms outperform companies with other types of blockholders. Moreover, the performance of family businesses is only better within the companies in which the founding-family is still active either on the executive or the supervisory board. After analysing several factors from the prior literature, Frank and Goyal (2009) had the contribution to examine wich factors are reliably important as regards leverage. The sample was formed of annual observations on nonfinancial publicly traded US companies for the period 1950 to 2003, one of the main concerns being the changes in perspective upon capital structure over the decades. These factors, named the 'core factors' are: industry median leverage (defined as the ratio of total debt to market value of assets), tangibility (the higher tangible assests are, the higher is the leverage), profits (accordingly, profits are inversely proportional to leverage), firm size, market to book ratio (a high market to book ratio tend to be correlated with lower leverage), expected inflation. However, these are the factors which have similar effects across classes of firms.

Margaritis and Psillaki (2010) tested the relationship between capital structure, ownership, and firm performance, by using a sample of French companies from the following industries: chemical, computers and R&D, and textile. The results support the agency cost theory arguing that leverage is associated with higher performance, measured as the ratio between EBIT and total assets. This effect is positive for each industry and it remains positive over the entire sample. Symeou (2010) performed a study including 54 incumbent telecommunications firms from an equal number of economies for the 1990-2007 period. There was flagged the impact given by the type of economy in which the company operates. The companies that act in small economies are exposed to exogenous factors that limit development. The impact of the company size on performance become smaller as benefits from operating in strong economies are growing, on the contrary becoming hardly negligible in large economies. Managers are facing poor attractiveness of firms for private investors and insufficient qualified human capital that limits the growth potential.

Chung *et al.* (2013) stated that the companies are increasing the leverage when attractive growth opportunities emerge, withal when poor operating performance lessen equity value or force borrowing. Jõeveer (2013) investigated the importance of firm-specific, country institutional, and macroeconomic factors for establishing the capital structure, by selecting a sample of companies from nine Eastern European countries (Bulgaria, the Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, and Slovakia) over the period 1995-2002. The firm-specific characteristics were profitability (before-tax profit/total assets), tangibility (tangible fixed assets/total assets), log size (logarithm of total assets), as well age dummies (established 1987-1995 has value one if the firm was established during early transition 1987-1995 and established after 1995 has value one if the firm was established after 1995). In order to measure country-specific economic and institutional factors, there were considered inflation, GDP growth, corporate income tax rate, the share of foreign owned banks assets to total banking sector assets, the share of the three biggest banks assets to total banking

sector assets, country credit rating, the corruption perception index, the shareholder rights protection index, and the minority shareholder rights protection index. Therefore, Jõeveer (2013) stated that country-specific factors are the main determinants of variation in leverage for small unlisted companies, whereas firm-specific factors explain most of the variation in leverage for listed and large unlisted companies.

Ogden and Wu (2013) found that the relationship between optimal leverage and the market-to-book assets ratio as proxy for profitable growth options (GOs) is negative and highly convex. Park and Jang (2013) investigated the relationships among capital structure, free cash flow, and performance. Consistent with the signalling effect, there was found that leverage has a positive influence on firm performance. The relationship is not bivalent, but still indirect effects could appear. Therefore, low-performing firms tend to develop into unrelated sectors which increase debt leverage. By using a comprehensive sample of 317 leveraged buyouts (LBOs) taking place between 1995 and 2007, Cohn et at. (2014) concluded that firms do not reduce leverage after leveraged buyouts, even if they generate excess cash flow.

In terms of corporate social responsibility, the section devoted to previous research will be focused on trials occurring after 1990, because in that period the laws concerning social responsibility has changed fundamentally. The Brundtland Report (1987), also known Our Common Future, from the United Nations World Commission on Environment and Development (WCED), can be considered a turning point that put in a new light the role of the business environment. Commission of the European Communities (2011) stated that 'corporate social responsibility is essentially a concept whereby companies decide voluntarily to contribute to a better society and a cleaner environment'. According to Carroll (1979) 'the social responsibility of business encompasses the economic, legal, ethical, and discretionary expectations that society has of organizations at a given point in time'. CSR is considered as an umbrella concept which comprises corporate citizenship, corporate sustainability, stakeholder management, environmental management, business ethics, and corporate social performance.

The development of the concept has led to contradictory results. Aupperle *et al.* (1985) found no relationship between CSP and profitability, McGuire *et al.* (1988) ascertained that prior performance was more closely related to CSP than was subsequent performance, whereas Waddock and Graves (1997) established significant positive relationships between an index of CSP and performance measures such as ROA in the following year. Furthermore, several authors tried to summarize a meta-analysis of the previous research in order to provide global conclusions (Griffin and Mahon, 1997; Margolis and Walsh, 2003). A more recent synthesis was performed by Van Beurden and Gössling (2008). From thirty-five studies included in the synthesis, the majority showed a positive relationship between corporate social performance (CSP) and corporate financial performance (CFP). Akpinar *et al.* (2008) developed a stakeholder-weighted CSR in order to alleviate the 'stakeholder misalignment' which was considered to be one of the reasons why there are inconclusive results about the relationship between CSR and CFP. Choi *et al.* (2010) measured CSSR by both an equal-weighted CSR index and a stakeholder-weighted CSR index suggested by Akpinar *et al.* (2008) and found a positive and significant relationship between corporate financial performance and the stakeholder-weighted CSR index, but not the equal-weighted CSR index. By using an extensive panel data sample of S&P 500 companies between the years 1992 and 2009, Oikonomou *et al.* (2012) found that most of the individual social strength components (community, diversity, employment, product safety, and quality) are

negatively but insignificantly associated with systematic firm risk, whereas most of the individual social concern components (community, employment, environment) are significantly positively related to measures of systematic risk. Wu and Shen (2013) investigated 162 banks in 22 countries and showed that CSR positively influences firm performance in terms of return on assets, return on equity, net interest income, and non-interest income, whilst CSR negatively associates with non-performing loans.

On the Romanian market, Vintilă and Duca (2013) observed a significant negative impact of the firm size (total assets, turnover) on performance (return on equity). The study was conducted on 100 companies listed on the Bucharest Stock Exchange, for the results of 2010. However, in Romania, the concept of social responsibility is still in the early stages of implementation, tests, and research in this area being hit by a lack of appropriate database. We can consider a model for measuring social responsibility-The Responsible Competitiveness Index 2003: Aligning corporate responsibility and competiveness of nations, performed by The Copenhagen Center. In this framework was created a national corporate responsibility index (NCRI-National Corporate Responsibility Index) applied for fifty-one states. The index includes the following components: corporate governance, ethical business practices, human capital development, civil society, and environmental management cooperation. In 2003, Romania was ranked on the forty-eight of fifty-one countries, being overtaken only by Nigeria, Russia, and Indonesia. It should be noted that on the same top, Romania ranks the 17th place among the states where economic growth might be influenced by the level of corporate responsibility.

3. ESTIMATION METHOD AND DATA

Sample selection

The sample used in this research included 40 listed companies from the first and the second tier at the Bucharest Stock Exchange (hereinafter BSE). The following selection criteria were taken into account for the sample: being listed on the BSE during the entire period, having published the annual reports, having an active webpage, not registering losses for the three years mentioned, publishing The Comply or Explain Statement according to the BSE inquiry. Banks were not included in this investigation because of their different capital structure. Also, the companies for which could not be found all information investigated were excluded. The sample includes companies from eight industries: raw and basic materials, pharmaceutical, energy and utilities, capital goods, services, tourism, transport and financial services, durable and consumer goods.

Variables description

Table no. 1 presents the variables used in the empirical research:

Table no. 1 – The variables used in the empirical research

Variables' Type	Symbol	Calculation Method
Dependent Variables	***Accounting Measures***	
	ROA	Net profit to total assets ratio.
	ROE	Net profit to equity ratio.
	Market Measures	
	Tobin's Q	Market value of equity plus book value of debt to the book value of assets.

Variables' Type	Symbol	Calculation Method
Independent Variables	***Capital Structure Variables***	
	STD	Short-term debt and total asset ratio.
	LTD	Long-term debt and total asset ratio.
	Firm Size Variables	
	LNTA	Natural logarithm of total assets.
	LNCA	Natural logarithm of turnover.
	LNANG	Natural logarithm of the employees number.
	Corporate Social Responsibility Variables	
	CSRI	Corporate social responsibility index.
Control Variables	**SHARE**	Romanian ownership share in the ownership structure.
	INSTIT	Dummy variable. Takes the value 1 if institutional investors are present in the ownership structure, 0 otherwise.

Source: [own work]

The preliminary aim of this research is to create an indicator in order to quantify the level of implementation and transparency regarding social responsibility, using 'content analysis' technique. Currently, in Romania there is no such index, universally accepted and periodically reviewed. To build the index (CSRI), social performance indicators presented in the Sustainability Reporting Guidelines (2000-2011), published by Global Reporting Initiative (GRI) in 2000, have been used: labor practices, human rights, product responsibility, and social involvement. After analysing the social responsibility reports published by the companies listed on the BSE, work practices and human rights components have been aggregated. Further, the environmental component have been added. Environmental component indicators have been selected from the Green Business Index Report (2011) (GBI) powered by Green Revolution Association, under the auspices of the Ministry of Environment and Forests.

Each component includes six subcategories:

- Environmental component includes: environmental standards, environmental management, environmental report, investments for reducing pollution, recycling policies, investments to improve energy efficiency;
- Human rights component consists of: publication of an ethical code, distinct from the operating regulation, training and benefits for employee, employment security investment, management standards, procedures that prevent conflicts of interest, shareholders code available;
- Products component includes: R&D investment, section dedicated to the composition and quality of products, consumer safety, investments that increase productivity, sustainable development strategy, section devoted to the media;
- Society component includes: local community support, education support, arts and culture support, public health support, sports projects sponsorship, unblurred CSR report.

The analysed information was equally weighted whereas these concepts are relatively new for the Romanian market. Their development and implementation are slow, as evidenced the inconsistencies and duplication of reporting. Therefore, it seems that everything happens individually, instinctually, and sometimes even in a haphazard way, without a long-term strategy which would provide a classification of those elements.

$IRSC = \sum_{i=1}^{n} \frac{x_i}{n} \times 100$, where:

CSRI= corporate social responsibility index;
x_i = 1 if the criterion analysed is present, 0 if it is absent or no information was available;
n = the maximum score that a company can obtain.

The models included two control variables: the percentage of Romanian ownership in the capital structure and the institutional investors presence. According to Majumdar and Chhibber (1999) firms that invest abroad possess superior capabilities, evidenced by improved profitability compared to companies owned exclusively by local investors. According to Mahoney and Roberts (2007) 'superior investors' have a better view of the processed information before making any investment decision. However, it is believed that institutional investors are rational shareholder that make decisions based on all available information and therefore they will not disapprove expenditures meant to improve long-term corporate value.

Quantitative method

Factors influence on financial performance was tested by the following multivariate regression equations, by using panel data:

$$Firm\_performance_{i,t} = \alpha_0 + \alpha_1*STD_{i,t} + \alpha_2*LDT_{i,t} + \alpha_3*LNTA_{i,t} + \alpha_4*CSRI + \alpha_5*LNANG_{i,t} + \alpha_6*SHARE_{i,t} + \alpha_7*INSTIT_{i,t} + \varepsilon_{i,t} \quad (1)$$

$$Firm\_performance_{i,t} = \alpha_0 + \alpha_1*STD_{i,t} + \alpha_2*LNTA_{i,t} + \alpha_3*LNANG_{i,t} + \alpha_4*CSRI + \alpha_5*SHARE_{i,t} + \alpha_6*INSTIT_{i,t} + \varepsilon_{i,t} \quad (2)$$

$$Firm\_performance_{i,t} = \alpha_0 + \alpha_1*LDT_{i,t} + \alpha_2*LNTA_{i,t} + \alpha_3*LNANG_{i,t} + \alpha_4*CSRI + \alpha_5*SHARE_{i,t} + \alpha_6*INSTIT_{i,t} + \varepsilon_{i,t} \quad (3)$$

where, Firm_performance = ROA, ROE, Tobin's Q ratio;
α_0 = the constant;
α_1, ..., α_6 = the slope parameters;
ε_j = error term, quantifying the influence of factors with random action;
t = 2010, 2011, 2012;
i = 1, 2,..., 40.

As can be seen in the literature review section, some authors used accounting indicators (Ebaid, 2009; Céspedes *et al.*, 2010; Van der Laan *et al.*, 2008), of which the most common are return on assets and return on equity. The downside is that accounting indicators do not include investors' perception. At the same time, because of the possibility to distort certain results through accounting practices, other studies states that it is preferable for performance to be analysed in market sizes (Wagner, 2010). On this line, Tobin's Q ratio is the most widely used indicator (Zeitun and Tian, 2007; Lioui and Sharma, 2012).

4. EMPIRICAL FINDINGS

Descriptive statistics

Descriptive statistics on the dependent and independent variables used in the study are presented in Table no. 2.

Table no. 1 – Descriptive Statistics

Var	ROE	ROA	Tobin	LDT	SDT	LNTA	LNCA	LNANG	CSRI	SHARE
Mean	8.60	16.12	4.26	0.03	0.20	12.53	11.71	5.80	42.39	85.43
Media	7.07	7.33	2.84	0.003	0.13	12.19	11.74	6.03	41.66	100
St dev	7.82	20.47	4.64	0.06	0.18	1.71	1.49	1.63	19.80	28.97
Kurt	5.82	2.15	7.97	3.74	1.62	2.37	1.88	2.55	0.19	1.80
Skew	1.91	1.75	2.50	2.10	1.44	1.22	0.71	-0.66	0.58	-1.82
Min	0.01	0.02	0.3	0	2.33E-05	9.29	8.38	0	4.16	0.49
Max	48.57	88.01	28.01	0.27	0.79	19.29	16.79	10.13	95.83	100
N	120	120	120	120	120	120	120	120	120	120

Source: [own work]

There could be seen that for the three financial performance variables, skewness is positive. The right tail of the distribution shows a higher frequency of yields below the average.

In order to analyse the relationship between the variables, the research of correlation was employed. The correlation matrix is shown in Table no. 3. As a rule, the correlation coefficients between 0 and 0.30 marks a weak correlation, from 0.30 to 0.70 a moderate correlation, and between 0.70-one an elevated correlation. According to these results, a negative correlation between ROA and short-term debt it is clear. Also, a strong correlation between turnover and total assets was noticed. For this reason, the natural logarithm of turnover was excluded from the dependent variables that quantify firm size class.

Table no. 2 – Correlation matrix

Var	1	2	3	4	5	6	7	8	9	10
1 ROE	1.00									
2 ROA	0.38	1.00								
3 Tobin's Q	0.01	0.15	1.00							
4 SDT	0.02	-0.46	-0.10	1.00						
5 LDT	0.11	-0.09	-0.15	0.04	1.00					
6 LNTA	0.07	0.44	0.12	-0.25	-0.08	1.00				
7 LNCA	0.21	0.16	0.11	0.09	0.05	0.76	1.00			
8 LNANG	0.12	-0.12	0.07	0.16	0.32	0.08	0.24	1.00		
9 SHARE	0.02	-0.11	-0.09	-0.02	0.15	0.01	0.12	-0.14	1.00	
10 CSRI	-0.01	0.05	0.28	0.03	0.12	-0.01	-0.02	0.43	-0.18	1.00

Source: [own work]

Econometric results

Table no. 4 presents the results of the OLS regression equations, using ROA as dependent variable. The results show a negative relationship between ROA and the capital structure defined by the short-term and long-term debt ratio. Similar results were obtained when both ratios were simultaneous used (model 1) and in distinct patterns (model 2 and 3). Results were provided with the information collected from the correlation matrix and they are consistent with the hypothesis established. One reason lies in the fact that, in certain economic sectors, companies are facing the risk of being unable to get larger loans. There is also a positive link between performance and firm size, as measured by total assets. The hypothesis has been validated previously by Zeitun and Tian (2007) for the case of Jordan market. A negative relationship was highlighted as regards the average number of

employees. This relationship can be determined by the costs that involves a larger number of employees. As regards the involvement in social responsibility actions, the results are consistent with some of the previous studies (Van de Velde *et al.*, 2005), but contrary to those obtained on the Romanian case, which did not reveal a statistically significant connection (Moscalu and Vintilă, 2012). The explanation can be given by the large gap between the social responsibility score obtained by the analysed companies. The top five ranked are the companies with high financial performance, among the most profitable in Romania. Although weak, a positive statistically validated relationship was noticed, showing that profitability and corporate social involvement are interdependent. Similar results were obtained regarding the Romanian ownership share in the capital structure. Also, a negative relationship between the variable SHARE and ROA can be observed. A cause can be generated by the fact that institutional investors are represented mainly by state structures, on which there is still some reluctance vis-à-vis the socialist legacy and rhetorical statements. Unclear objectives that do not have associated a time horizon, phrases such as 'common good' or 'sustainable development', ambiguous criteria for assessment shall lead to the continuation of this situation.

Table no. 3 – Results of regression analysis, panel data, dependent variable ROA

Independent var	(1)		(2)		(3)	
	Coef	**t-statistic**	**Coef**	**t-statistic**	**Coef**	**t-statistic**
C	-35.763	-3.070***	-27.075	-2.268**	-43.446	-3.446***
STD	-64.952	-3.503***	-31.454	-4.614***	-	-
LTD	-29.872	-4.585***	-	-	-70.847	-3.530***
LNTA	5.813	8.007***	5.487	7.266***	6.315	8.110***
LNANG	-4.675	-5.217***	-5.391	-5.893***	-6.112	-6.712***
CSRI	0.187	2.988***	0.192	2.930***	0.201	2.963***
SHARE	0.120	2.980***	0.091	2.201**	0.135	3.083***
INSTIT	-11.895	-3.853***	-12.434	-3.845***	-7.104	-2.254**
R^2	0.70		0.66		0.64	
F-statistic	37.411	0.000	37.828	0.000	34.100	0.000
N	120		120		120	

*p-value ***<1%, **<5%, *<10%*
Source: [own work]

In the second model, return on equity has been used as the dependent variable (see Table no. 5). There is a strong negative relation with long term debt ratio, contrary to the results gathered by Ebaid (2009), for the case of Egypt.

Table no. 4 – Results of regression analysis, panel data, dependent variable ROE

Independent var	(4)		(5)		(6)	
	Coef	**t-statistic**	**Coef**	**t-statistic**	**Coef**	**t-statistic**
C	-1.918	-0.265	3.824	0.513	-1.969	-0.276
STD	-0.203	-0.050	-1.249	4.251	-	-
LTD	**-42.937**	**-3.738*** **	-	-	**-42.977**	**-3.767*** **

Independent var	(4)		(5)		(6)	
	Coef	t-statistic	Coef	t-statistic	Coef	t-statistic
LNTA	0.420	0.935	0.204	0.434	0.424	0.958
LNANG	0.3847	0.693	-0.088	-0.155	0.374	0.724
CSRI	**0.110**	**2.849*****	**0.114**	**2.783*****	0.110	2.867*
SHARE	0.010	0.432	-0.008	-0.326	0.010	0.439
INSTIT	**-3.247**	**-1.698***	**-3.603**	**-1.787***	**-3.214**	**-1.794***
R^2	0.21		0.11		0.21	
F-statistic	4.322	0.000	2.434	0.029	5.086	0.000
N	120		120		120	

*p-value ***<1%, **<5%, *<10%*
Source: [own work]

By analysing the value of R^2 from the first and the last model, in contrast to the model that included only short-term debt ratio, it is noticed that the impact of long-term debt is the determining factor in the models. It can be said that, additional risk assumed by the shareholders must be rewarded by a higher performance. According to the signal theory, leverage may represent a reference for identifying companies' performance, but it can also be an artificial method of increasing profitability (equity reduction lead to higher financial return). In relation to ROE, firm size is not statistically significant. In terms of social responsibility and institutional investors similar results to the first model were obtained.

As regarding the impact on performance quantified in market indicators, it is noticed that only long term debt ratio remains significant (see Table no. 6). As mentioned above, market will penalize a higher risk. As regards firm size, results are consistent with previous research (Symeou, 2010). In small economies such as the Romanian case, company size (measured by total assets) has a positive impact on performance.

Table no. 5 – Results of regression analysis, panel data, dependent variable Tobin's Q ratio

Independent var	(7)		(8)		(9)	
	Coef	t-statistic	Coef	t-statistic	Coef	t-statistic
C	**-10.270**	**-2.390****	**-8.127**	**-1.898***	**-10.915**	**-2.563****
STD	-2.608	-1.085	-2.998	-1.226	-	-
LTD	**-16.020**	**-2.342****	-	-	**-16.535**	**-2.421****
LNTA	**0.833**	**-2.342***	**0.752**	**2.779*****	**0.877**	**3.310*****
LNANG	0.522	1.579	0.345	1.052	0.396	1.279
CSRI	**0.047**	**2.037****	**0.048**	**2.052****	**0.048**	**2.090****
SHARE	0.012	0.811	0.004	0.329	0.013	0.897
INSTIT	**-2.561**	**-2.249****	**-2.694**	**-2.323****	**-2.143**	**-1.998****
R^2	0.20		0.16		0.19	
F-statistic	4.158	0.000	3.786	0.001	4.647	0.000
N	120		120		120	

*p-value ***<1%, **<5%, *<10%*
Source: [own work]

It should be remarked that in terms of social responsibility, the correlation is positive. The results are consistent with the referral made in the Responsible Competitiveness Index 2003 Report where Romania ranked the 17th place out of 51 states where involvement in CSR actions can influence performance. However, the results are inconsistent with some previous research that showed that the market negatively perceives involvement in social projects because they are considered cost drivers (Lioui and Sharma, 2012). Although the relationship is statistically validated, the CSRI coefficient is small.

5. CONCLUDING REMARKS

The aim of this research was the examination of the factors that may influence accounting and market performance. Based on the research presented in the first section, the impact of capital structure on performance was analysed. Outcomes are divergent. Some studies argued that this situation is generated by specific features of the companies (Symeou, 2010). More recent investigations (Ebaid, 2009) revealed two major directions, bringing an important contribution to the theories considered already traditional. The first direction started from the signal theory and tried to overcome its shortcomings. The second direction implied a far more detailed analysis of the tax advantages that a company may benefit. The novelty of current study is placing corporate social responsibility among the factors that may influence performance. In this sense it was built an index that quantifies the social performance of companies listed on the Bucharest Stock Exchange. Although weak, a positive statistically correlation has been validated.

The study was conducted by applying multiple regressions on a database consisting of forty companies listed in Romania for which the information was collected for the period 2010-2012. The results showed that leverage is negatively correlated with profitability, both in accounting and market size. The second factor that may influence company performance is the firm size. We started from the assumption that firm size is positively correlated with financial performance. The hypothesis has been validated by obtaining a positive impact of size (total assets) on ROA and Tobin's Q ratio. Also, a significant negative correlation was observed between the number of employees and return on assets.

The main limiting aspects of this investigation are given by the small number of statistical observations included in the sample and the lack of a certified quantification measures of social responsibility. As future research directions, according to available data, a larger number of companies will be included in the sample. Also, in order to verify the issues arising from the current economic environment (the research was conducted for the period 2010-2012, being considered the years of economic depression), further studies over a longer period is recommended.

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