PERFORMANCE IN THE ENERGY INDUSTRY. A COMPARATIVE ANALYSIS BETWEEN TRANSELECTRICA S.A AND ENEL SpA

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Abstract
The energy market is an important component of an economy without which development is impossible. The continuous growth performance of energy companies is an ongoing concern of energy markets. That is why we conducted a comparative analysis of results of two big companies, in the European market namely TRANSELECTRICA S.A and ENEL SpA. For this reason, we use a performance correlate indicators system based on EBITA pyramid divided into two groups: return ratios on the one hand and margin ratios on the other hand.

Keywords: equity, assets, earnings, profit

JEL classification: B21, D22, G01

1. Literature Review

An analysis of the economic and financial environment requires a multidimensional approach to a company, on the one hand taking into account the financial position and changes in the financial position and on the other hand its performance. Relevant works in two major segments of this types of this analysis are presented in the following. An analysis of the financial position and how it changes is based on the balance sheet and on the cash flow statement. The balance sheet shows the changes which took place in different items, during the analyzed period (Bătrâncea, et at, 2010). Each change implies that an amount of money entered or exited the company and that cash has been generated or consumed (Bătrâncea, et al, 2008, p.52 – 56; Bătrâncea, 2006).

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In order to respond to global competition challenges, the wood-processing industry in Finland and elsewhere is outsourcing round wood harvesting to harvesting contractors. The weak profitability, liquidity and solvency of harvesting contractors and the consequent difficulty in hiring qualified machine operators make networking and enterprise growth a complicated process (Mikkola, et al, 2011, p.211-219). Cash flow analysis can be found in numerous papers. Thus, Găban (2016) shows that "in the financial reporting system, the balance sheet and profit and loss account are key elements throughout the world as part of periodical financial reporting while the cash flow statement is not mandatory in many countries (e.g. Germany and the Netherlands). In Japan, cash flow reporting is mandatory only for companies listed at the stock exchange market."

Other renowned authors noted that "if cash flow reports are mandatory, their format may differ from country to country. Take the case of the UK, where interest and dividends are grouped into a separate category not included in the cash flows reports from operations or in the financial one. Although this format is considered superior to the SFAS 95 format (US format), cash flow reports are not comparable in terms of financial information sent to users without making some adjustments" (Moscviciov et al, 2010, p.600 – 603). Operating activities affect the net profit through the cash inflows and outflows that it generates (Bătrâncea, et al, 2009, p.92 – 98). Another paper examines the relationship between working capital management and profitability for small and medium-sized enterprises (SMEs) by controlling unobservable heterogeneity and possible endogeneity. The results point to the fact that there is no non-monotonic (concave) relationship between working capital level and firm profitability. This indicates that SMEs have an optimal working capital level that maximizes their profitability (Baños-Caballero, et al, 2012, p.517 – 529).

On the other hand the cash flow analysis is replaced by the funds flow. Therefore, „in some countries, especially in South America, entities draw up reports of funds changes. Funds are defined in this case as *net working capital* (current assets minus current liabilities) and this financial situation focuses more on the changes recorded in the entity's working capital. Funds flows limits were recognized in the late 1970s, and this method of financial reporting was abandoned in the United States since 1973" (Bătrâncea, et al, 2009, p.57 - 62). Another research shows that "the lower base of profitability ratios and the waning financial position of the majority of the companies have left them with little resources to undertake renovation and modernization. It is high time fiscal measures had been imposed by the government, together with a drive to modernization being effective for reconstructing the condition of the Indian cement industry." (Banerjee, 2015, p. 171-179)

Other researchers report that the working capital is a form of liquidity highlighting the resources available after covering short-term liabilities (Bătrâncea, et al, 2008, p.34 – 40). For this reason, the analysis of the working capital ratio is an important target for every manager of Romanian companies (Moscviciov, et at, 2010, p.600 – 603). The liability–asset ratio of China's industrial state-owned enterprises (SOEs) has increased dramatically in the course of the economic reform period. Western observers point out the inherent dangers to enterprise solvency. The research shows that the increase in the liability–asset ratio of industrial SOEs is the inevitable result of systemic changes and a low-profitability SOEs tend to have a high liability–asset ratio. (Holz, 2002, p.1-26)

The purpose of another study is to „identify a function for the profitability of Swedish micro firms in the sectors of health, transport, trade and metal. In order to understand how micro firms relate to key variables such as firm size, growth of sales, productivities, lagged profits, asset turnover and firm's age, OLS (Ordinary Least Squares), and the more robust quartile regression techniques, are used to estimate micro-firm profitability (Khaik, Darush, 2012, p.94-106). Data advances in panel data econometrics are used to investigate the determinants of profitability for manufacturing and service sector firms in Belgium, France, Italy and the UK, for the period 1993–2001. The paper synthesizes empirical models that have been used by researchers in industrial economics, strategic management and accounting and finances (Goddard, et al, 2005, p.1269-1282).

2. Method and Results

The performance of a company is reflected in the income statement, highlighting both its efficiency of operational and financial activities. The income statement is presented as a standard picture of the income and the expenses of a fiscal period, with the net result on two levels, the operating result and financial result. The revenue and expenditure are presented in a list, grouped by nature, with comparative data for the year that ended. With the help of the income statement the managers can analyze the results at the activities level allowing for important conclusions on the company's economic performance in a given reporting period. The income statement identifies two categories of economic flows, namely:

a) Operating flows, including economic transactions more specific regular and repetitive, covering normal and current activity of a company, including the influence of extraordinary factors.

b) Financial flows are the economic transactions which relate the financial activities and having a common purpose, and specifically repetitive. That's why the financial flows determine the financial result.

In our research we used the ratio method which compares the performance rates in time for companies in the same market. We think that financial ratios are useful tools of analysis which summarize a large amount of data in an easier form to understand, interpret and compare the results. When we compare different ratios in different fiscal periods we take into account the impact of certain changes to the financial statements such as: changes in the economic conditions, the production and the markets evolution. The analysis of performance of both energy companies used the data from the balance sheet and income statement during 2005 and 2015, these included the three phases of the financial crisis, namely: the anti - crisis, financial crisis and post-financial crisis. Regarding the issue of the financial crisis that affected the performance of energy companies mention should be made to several works of art in analyzing both the banking crisis and the sovereign debt crisis. Public debt was considered one of the main reasons of concern for many countries. This problem became acute in the early 80s, when the early signs of the crisis occurred in several countries. This manifested itself in the cessation of foreign debt payments. Such problems caused by public debt have come to the attention of both creditor states and of those responsible for payment. In the early 1980s foreign debt crisis was manifested in several countries, particularly those that were especially indebted, e.g. Central and South America (Găban**,** 2016, p.146-152). Many analysts believe that the financial crisis was an unprecedented phenomenon in world economy. From real estate the credit crunch has reached world financial crisis, central banks and governments of developed countries pushing for the release of credit supported economy, which gradually came into recession. A review of world economy found that there have been crises in other countries such as Brazil and Mexico, but that they were due to mismanagement on the part of the government policies based on low taxation and a fixed exchange rate of currencies. The global financial crisis was in turn described "Allah's punishment," "Pearl Harbor's economy" (American billionaire Warren Buffett, one of the most respected investors on Wall Street), "The explosion Financials Bubble," "The new spill", "Vortex" (Alan Greenspan to name but a few of the descriptions of the global financial crises (Bătrâncea, Bătrâncea, 2009, pp.143-155).

From 2010 onwards the sovereign crisis caused by the impossibility of paying the national debt of the Greek State, without the financial support of IMF and the EU was probably the hardest blow for the European Union over the last decade, preceded only by the "crash" - the European Constitution referendums in France and the Netherlands since 2005 (Găban et al, 2016, pp.44-58). The current crisis led to a significant decrease in the confidence level of consumers, investors and businessmen, which in turn affected stability and economic strength. This created a vicious circle of economic growth based on excessive consumption sustained by debts. Deregulation and financial liberalization did not generate an efficient allocation of resources. Recent measures taken by governments numbered assets acquisition, banks recapitalization, injecting liquidity into the banking system. In spite of these measures, many banks have not escaped the subprime lending problem. At least in Europe, counterbalancing the effects of the financial crisis appears to be an extremely difficult mission. France, for example, created a sovereign fund to assist strategic companies (Bătrâncea, et al 2013, p.16-29).

The research focused on seven categories of financial performance rates that we consider relevant and which are presented in the table below.

Table 1. Financial performance indicators

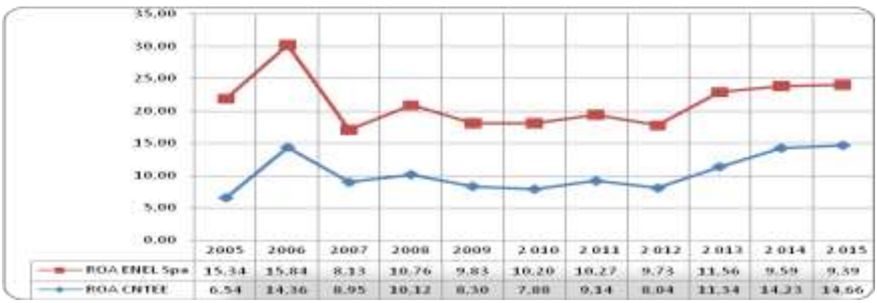
Financial Ratios	**The Model**	**Significance the financial indicators**
Return On Assets (ROA)	EBITDA/TA	EBITDA – Earnings Before Interest, Taxes, Depreciation and Amortization
Return On Expenses (ROEX)	EBIT/OEX	EBIT – Earnings Before Interest and Taxes OEX – Operation

		Expenses
EBITDA Margin	EBITDA/T	T – Turnover
EBIT Margin	EBIT/T	
EBT Margin	EBT/T	EBT – Earnings Before Taxes
EAT Margin or ROS	EAT/T	EAT – Earnings After Taxes ROS – Return On Sales
Return On Equity (ROE) (EAT On Equity)	EAT/EQ	EAT – Earnings After Tax

Source: Own financial performance analysis models

The first component of the system of performance analysis used in the research is the Return on Assets (ROA) calculated as a ratio between Earnings Before Interest Taxes Depreciation and Amortization on the one hand and the Total Assets on the other hand. This rate allows the financial comparisons between selected companies and shows the capability of the company's assets to generate profit from operating activities, without being negatively affected by depreciation, amortization and financial activity. On the other hand the indicator measures the profitability of the capital invested in the company.

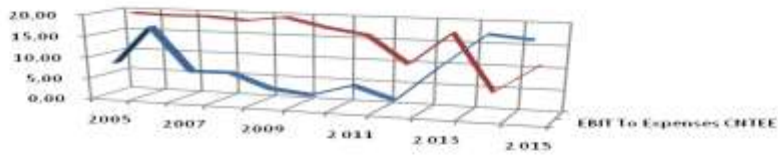
Figure 1. The evolution of ROA



Source: Own calculus

As shown in the graph above the results obtained by the Italian company are higher than the Romanian company's results. The biggest differences were recorded during the anti – crisis by 9 percentage points, then starting with the financial crisis (2007) until now, the gap between both companies maintain at the 1 percentage point in the Italian company case. The final efficiency of power companies can measure and pointer Return on Expenses which are calculated as a percentage ratio between EBIT and Operational Expenses.

Figure 2. The evolution of EBIT to Expenses



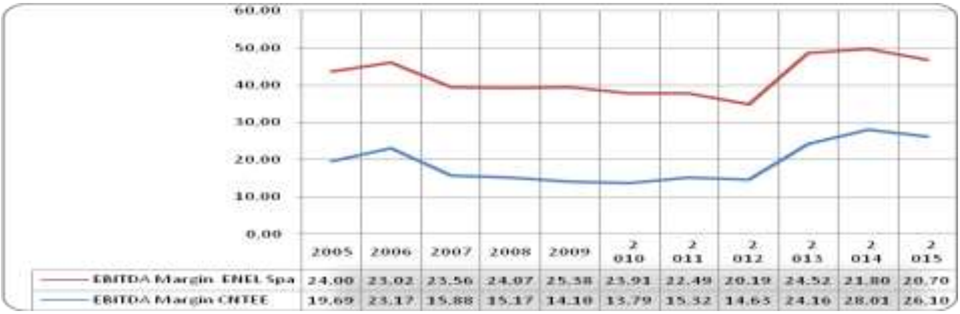
	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015
EBIT To Expenses CNTEE	8.35	17.40	7.25	7.42	4.14	3.18	5.94	3.09	11.20	18.52	17.69
EBIT To Expenses ENEL Spa	19.42	19.08	19.17	18.52	19.59	17.59	16.21	9.97	17.49	4.57	11.03

Source: Own calculus

The analysis undertaken reflects an increase of this ratio in the TRANSELECTRICA S.A. case during anti - crisis from 8.35% to 17.40%, followed by a stabilization at a level of 5%, this trend of the ratio followed by an increase to 17.69% in 2015 when it exceeded the level of 11.03% for the ENEL SpA. This means a better expenses adjustment in the Romanian company during the financial crisis and its consequent increased of the efficiency during the period when the economy was out of recession.

A margin sale is an important indicator of performance analysis that highlights the planned level of profit from the operating activities. This indicator takes in our opinion several forms, namely: EBITDA Margin, EBIT Margin, EBT Margin, all these forms indicate the sales effectiveness at different levels: production, marketing and the cashing.

Figure 3. Evolution of EBITDA Margin

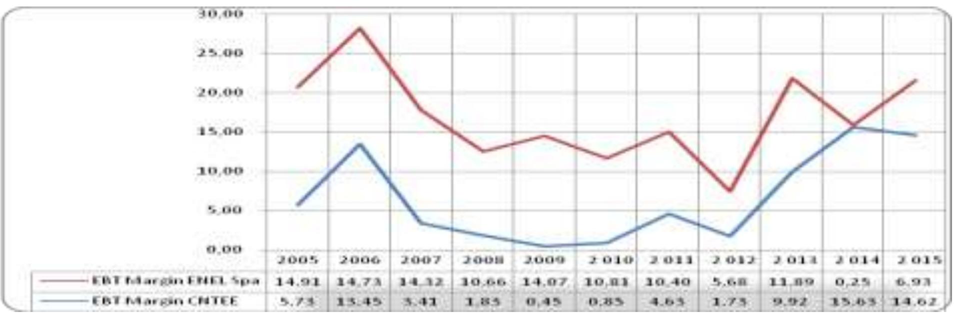


Source: Own calculus

Figure 4. The evolution of EBIT Margin

Source: Own calculus

Figure 5. The evolution of EBT Margin

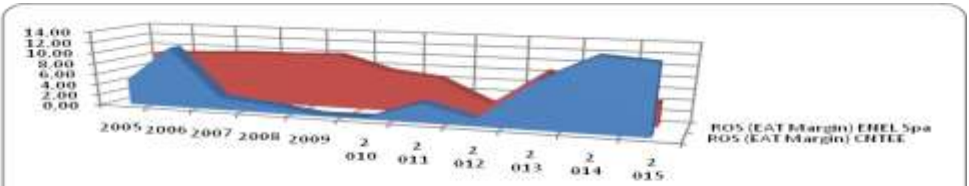


Source: Own calculus

From these graphs we observe that the gap EBITDA Margin remained constant throughout the analyzed period at the level of 5 percentage points, decreases during the financial crisis and increasing in other periods, which means that both companies were equally affected by the financial crisis.

The gap between EBT Margin and EBIT Margin has the same trend throughout the period studied which means that both companies have losses from financial activities. Based on the ROS indicator calculated as a ratio between EAT and turnover and the final sales margin reflects and highlights the toll of the two companies.

Chart 6. The evolution of ROS (EAT Margin)



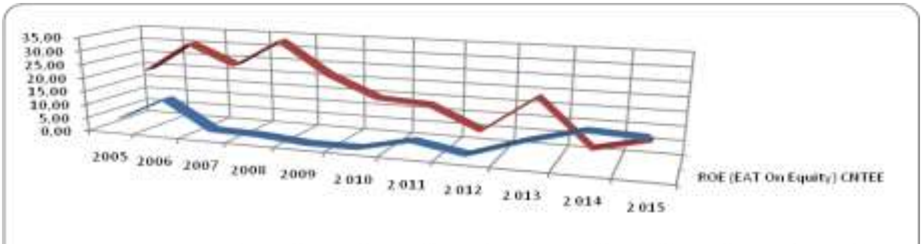
	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015
ROS (EAT Margin) CNTEE	4.82	11.30	2.27	1.43	0.25	0.38	3.56	1.27	8.31	12.94	12.25
ROS (EAT Margin) ENEL Spa	8.92	9.22	9.63	9.68	10.02	7.48	6.50	2.36	8.82	1.41	4.31

Source: Own Calculus

It is noted that the level of taxation in both countries was different in the countries, the highest was in Italy (34.9%) comparing with Romania (16%). The consequences were favorable for the Romanian company which got higher profits both for dividends payments and from the investment.

At the end of the research that we analyzed, the evolution of ROE which is calculated as a percentage ratio between EAT and shareholders' equity and shows the company’s ability to make profits.

Chart 7. The Evolution of ROE



	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015
ROE (EAT On Equity) CNTEE	4.37	12.55	2.21	1.77	0.26	0.41	4.54	1.42	7.69	12.71	11.89
ROE (EAT On Equity) ENEL Spa	19.45	30.61	23.27	33.42	21.77	14.36	13.33	5.41	18.71	2.28	6.79

Source: Own calculus

From the data analysis and from the graphic representation above we note that both companies were affected by the international financial crisis since the ROE has decreased significantly during the crisis in both companies. This negative trend has been followed by an increase in ROE after crisis especially for the Romanian company.

3. Conclusions

The objective of the financial statements is to provide information about the financial position, performance and cash flows of an economic entity useful for a wide range of users to make economic decisions. These financial reports can be regarded as a whole, because the data are interrelated, provide objective, relevant and timely information which is essential for making investment decisions, lending and the like, in accordance with the objectives of financial reporting. The indicators analyzed in this study reflect a similarity between the analyzed companies, both falling to levels of comparable financial performance.

4. References

1. *Baños-Caballero, S., García-Teruel, P., J., Martínez-Solano, P. (2012) How does working capital management affect the profitability of Spanish SMEs?, Small Business Economics, Volume 39, Issue 2, p 517-529*
2. *Bătrâncea M., Bătrâncea L. (2006) Standing financiar- bancar, Editura Risoprint, Cluj-Napoca*
3. *Bătrâncea, I., Bătrâncea, L., Moscviciov, A., Ardelean, V. (2008) Decisions Regarding the Financial Structure of the Company, The Annals of the University of Oradea, Economic*

Sciences, Vol. III, p. 52-56.

4. *Bătrâncea I., Bătrâncea, L., Bătrâncea, M., Borlea, S., Ardelean, V., Trifoi, I.G.(2008) The Role of Cash Flows in the Financial Management of the Entity, Annals of the University of Craiova, Economic Sciences Series, Vol. 36, No. 1, p. 34-40.*
5. *Bătrâncea, I., Bătrâncea, L.M. (2009) The World Financial Crisis – Roots, Evolution &Consequences, The Financial and Economic Crisis, Causes, Effects and Solutions, 26-28 March 2009, FSEGA, Alma Mater Publishing, Cluj-Napoca, pp.143-155, ISBN:978-606-504-072-4*
6. *Bătrâncea, L.M., Bătrâncea, I., Moscviciov, A. (2009) The Roots of the World Financial Crisis, Analele Universității Oradea,Tom XVIII, Vol.III, ISSN: 1582 – 5450, p.58-64*
7. *Bătrâncea L., Bătrâncea I., Moscviciov A.(2009) Treasury Flow Analysis in Romanian Companies, International Journal of Business Research, International Academy of Business and Economics, ISSN:1555-1296 , 2009, p.57-62*
8. *Bătrâncea L., Bătrâncea I., Moscviciov A.(2009) The Analysis of the Entity's Liquidity - A Means of Evaluating Cash Flow, Journal of International Finance and Economics, ISSN:1555-6336 , p.92-98*
9. *Bătrâncea, I., Bătrâncea, L.M., Moscviciov, A., Popa, A., Bătrâncea, M., Nichita, A.(2010) Standing Financiar, Editura Risoprint, Cluj-Napoca.*
10. *Bătrâncea, I., Moscviciov, A., Sabău, C., Bătrâncea, L.M. (2013) Banking Crisis: Causes, Characteristic and Solutions, Proceedings of the DIEM 2013 "Scientific Conference on Innovative Approaches to the Contemporary Economic Problems", ISBN: 978-953-7153-30-4, p.16-29*
11. *Găban L. (2016), Bătrâncea I., Minteuan P. (2016), Greek crisis - causes, consequences and developments, Revista Economică, Lucian Blaga University of Sibiu, The Faculty of Economic Science, Sibiu, vol. 68 issues 4, ISSN:1582-6260, p.44-58*
12. *Găban L.(2016) Financial crisis and its implications in risk and performance of banks in Romania, Analele Universității Târgu Jiu, issue 2, p.146-152, ISSN: 2344-3685*
13. *Găban L.(2016) Cash flows in Romanian small and medium enterprises, Analele Universității Târgu Jiu, issue 4, p.46-52*
14. *Goddard, J., Tavakoli, M., Wilson, J.O.S.(2005) Determinants of profitability in European manufacturing and services: evidence from a dynamic panel model, Applied Financial Economics, Volume 15, Issue 18, p. 1269-1282*
15. *Holz, C.A.(2002) The impact of the liability–asset ratio on profitability in China's industrial state-owned enterprises, China Economic Review, Volume 13, Issue 1, p. 1–26*
16. *Khalik, S.A, Darush, Y.(2012), Profitability in Swedish Micro Firms: A Quantile Regression Approach,International Business Research ,5(8), p. 94-106.*
17. *Mikkola, J., Rummukainen, A., Penttinen, M. (2011) Profitability, Liquidity and Solvency of Wood Harvesting Contractors in Finland, Small-scale Forestry, June 2011, Volume 10, Issue 2, p. 211-229*
18. *Moscviciov A., Bătrâncea I., Bătrâncea M., Bătrâncea L.M. (2010) Financial Ratio Analysis used in the IT Enterprises, Analele Universităţii din Oradea, Ştiinţe Economice, vol.2, ISSN: 1582-5450, p.600-603*