

THE USE OF ACCOUNTING INFORMATION BY FINANCIAL ANALYSTS IN EMERGENT MARKETS: THE CASE OF ROMANIA

Mihaela IONAȘCU¹ and Ion IONAȘCU

The Bucharest University of Economic Studies, Romania

ABSTRACT

The purpose of this paper is to investigate the use of accounting information by Romanian financial analysts with a focus on the models used and the factors affecting their forecasts accuracy. We hypothesize that on the emergent market of Romania, analysts rely more on simple valuation models (such as price multiples) and that accounting variables are perceived as less important compared to macroeconomic factors when it comes to forecast accuracy. To collect data we sent out questionnaires to the Research Departments of the brokerage companies authorized to operate on the Bucharest Stock Exchange (BSE) (investment firms, financial investments banks, credit institutions). As IFRSs became mandatory for consolidated accounts of listed companies and as the National Securities and Exchange Committee (CNVM) envisions the application of IFRS in the individual accounts of these companies, the paper also tries to capture the perception of Romanian financial analysts on the role plaid by IFRS adoption in reducing forecasts errors.

Key valuation models, accounting information, financial analysts, forecast accuracy, IFRS adoption in Romania

INTRODUCTION

There is currently a large and increasing body of literature investigating the use of accounting information by financial analysts. The main stream of research in this area follows a statistical market-based methodology for evaluating either the relative usefulness of different valuation models to investors (e.g. Penman & Sougiannis, 1998; Francis *et al.*, 2000; Courteau *et al.*, 2001), or the role plaid by various accounting related variables in increasing analysts' forecasts accuracy (e.g. Peek,

¹ Correspondence address: Mihaela Ionașcu, The Bucharest University of Economic Studies, Piața Romană nr. 6, sector 1, Bucharest, Romania, tel. 004013191901, email: mihaela.ionascu@cig.ase.ro.

2005; Vanstraelen *et al.*, 2003; Hope, 2004, Ernstberger, 2008; Brown *et al.*, 2009; Tan *et al.*, 2009).

For instance, Penman & Sougiannis (1998), Francis *et al.* (2000) or Courteau *et al.* (2001) investigate whether accrual based valuation residual income model (as theorized by Feltham & Ohlson, 1995 or Ohlson, 1995) is superior to DCF (discounted cash flow) models.

Several papers have shown that financial reporting has a significant impact on analysts' forecasts accuracy (e.g. Peek, 2005), and there is an increasing body of research investigating this relationship. Authors such as Vanstraelen *et al.* (2003) or Hope (2002) proved that increased disclosure leads to increased analysts' forecast accuracy. Hope (2002), for instance, relates the CIFAR index of the level of annual report disclosure to forecast accuracy for a sample of 1,553 firm-years from 22 countries, showing that a high volume of information made available to financial analysts enhances their forecast accuracy.

IFRSs are allegedly high-quality financial reporting standards, with extensive disclosure requirements and evolved recognition and valuation procedures, expected to increase transparency, diminish information asymmetry, and, consequently, facilitate predictions in order to support investment decisions on capital markets. Starting with the adoption of IFRS in the EU, several papers tried to investigate the impact of IFRS adoption on the analysts' forecast accuracy. For instance, Brown *et al.* (2009) showed on a sample of 40.123 monthly observations for companies operating within 13 European countries during 2002-2007 that forecast errors were significantly lower after the IFRS mandatory implementation. Ernstberger (2008) has also shown that on the German capital market analysts' forecast accuracy improved after the IFRS adoption. Tan, Wang & Welker (2009) obtained similar results on a sample of 38 countries, several European countries included.

However, such literature has not yet reached common grounds on the role plaid by accounting information in making forecasts or investments recommendations. For instance, the literature has not yet agreed on the role plaid by the *quantity* of financial information in enhancing analysts' forecast accuracy, authors such as Pope (2003) arguing that it is not clear whether financial disclosure (as alleged by Hope, 2002) is a fundamental determinant or just a complement of the *valuation and recognition rules* operating in different accounting regimes.

Furthermore, based on a sample of 391,462 firm-month observations (relating to European and Australian firms that mandatorily adopted IFRS from 2005 and a control sample of US and Canadian firms), Preiato *et al.* (2012) recently acknowledged that many factors other than accounting standards and enforcement may be more important for analyst accuracy, including measures of firm performance and current market conditions.

Accordingly, this kind of statistical market-based research provides a broad perspective on the use of accounting information by financial analysts, lacking an in-depth analysis of the actual practices of the investments professionals to support the causal relationships assumed by the statistical models employed. Such limitations are more evident on emergent markets where the interplay between various variables is more difficult to understand and predict.

In this context, our paper aims at offering a more detailed image of the actual use of accounting information by financial analysts on the emergent market of Romania in order to support further conclusive research. Accordingly, we have surveyed the brokerage companies authorized to operate on the Bucharest Stock Exchange (BSE), as these companies are more likely to use financial analysts for market research to establish price targets or investment recommendations. Our paper focused on identifying the models used and the factors affecting analysts' forecasts accuracy. As IFRSs became mandatory for consolidated accounts of listed companies and as the National Securities and Exchange Committee (CNVM) envisions the application of IFRS in the individual accounts of these companies, the paper also tries to capture the perception of the Romanian financial analysts on the role plaid by IFRS adoption in reducing forecasts errors.

1. METHODOLOGY

The purpose of our paper was threefold:

- i) to identify the models used by financial analysts and the reasons for employing such models;

We followed Imam *et al.* (2008), who observed analysts' valuation model preferences using semi-structured interviews (and associated rating questionnaire) with 37 sell-side analysts in the City of London and complemented by a small number of interviews (7) with buy-side analysts from 3 asset management firms. Their findings showed that UK financial analysts perceive the discounted cash flow (DCF) (and 'sophisticated' models in general) as more important than prior evidence suggested, although they found that analysts continue to rely on 'unsophisticated' valuation multiples, notably the price/earnings ratio. Imam *et al.* (2008) also suggested that cash-flow-based valuation models play a significantly greater role than accrual based models on the UK market, although they found strong evidence that analysts use cash flow and earnings-based models (in particular PE) in combination when valuing shares. They also showed that contextual factors, such as the need for analysts to be credible to clients, determine the use of unsophisticated valuations methods.

We hypothesize that on the emergent market of Romania, analysts rely more on simple accrual-based valuation models (such as price multiples), and that the choice of models may be also driven by the type of clients or the performance of the company in which the analysts operate. At the same time we tried to benchmark our results to the ones obtained by Imam et al. (2008) on a developed market.

- ii) to capture the perception of Romanian financial analysts on possible factors affecting their forecasts accuracy;

Forecasted accounting variables (especially earnings forecasts) are an important source of information for security valuation, most of the valuation models using such forecasts as an input. In consequence, it is import to understand how such forecasts are computed and what drives their accuracy.

As it was discussed in the previous paragraph, although several disclosure related factors were found to be associated with forecasts accuracy, the relationship is not yet entirely clear. Furthermore, it has been suggested that other factors might be more important than disclosure related ones in determining forecasts accuracy (Preiato *et al.*, 2012).

It has also been suggested (Tong, 2007; Chan & Hameed, 2006) that macroeconomic factors became more important than firm-specific information when analysts examine stocks in developing countries, a possible explanation being the low volume of such information available, which makes analysts rely more on economy-wide aggregates. In such cases as these, forecasts errors would be uncorrelated with macroeconomic available information, analysts actually producing market-wide information by incorporating such information into their forecasts (Zwart & Dijk, 2005).

However, in emerging economies, macroeconomic variables could be difficult to predict, as the business environment can be easily upset by sudden changes in the economic or taxation policies, for instance. In such circumstances, forecasts accuracy may be stronger associated with this kind of events, disclosure related factors becoming irrelevant.

Thus, we hypothesize that, on the emergent market of Romania, macroeconomic factors are perceived as more important drivers of forecast accuracy than accounting related variables.

- iii) to capture the perception of the Romanian financial analysts on possible factors that may explain the IFRS adoption-forecasts accuracy relationship.

The vast majority of the literature investigating the role plaid by IFRS in reducing forecasts errors, do not focus on the actual characteristics of the IFRS that could drive such an outcome. Accordingly, it would be useful to explore the perception of financial analysts on such characteristics, in order to support further conclusive research.

We hypothesize that Romanian financial analysts will welcome fair value measurements promoted by IFRS as the most important driver of their forecasts accuracy. However, we believe that their answers will vary based on their already using IFSR for predictive purposes.

In February 2012 we emailed a questionnaire accompanied by a cover letter to the Research Departments of the brokerage companies authorized to operate on the BSE, that is, to 61 investment firms, financial investments banks and credit institutions. The initial response was very low, so we phoned each company and reminded its Research Department of the questionnaire. According to our telephonic discussions, six companies conveyed that they did not have a research department or employ financial analysts and were unable to confirm that they used fundamental analysis to support investment decisions. Twenty questionnaires were returned, achieving a response rate of 33%.

Data were analyzed with the functions of SPSS. The correlation between variables was tested using the Spearman's Rank Coefficient, as there were too few observations to explore the data with OLS or ordinal regression analysis.

2. RESULTS AND FINDINGS

We analyze the research results according to the three objectives stated above.

2.1. The use of valuation models

To investigate the models used by Romanian financial analysts we have defined ordinal variables, asking financial analysts to grant scores from 1 (less important) to 5 (most important) to various valuation models, according to the frequency of their employment. The choice of models was derived from Imam *et al.* (2008) in order to benchmark our results to those obtained on a developed market. Based on Imam *et al.* (2008), we asked financial analysts to grant scores to cash flow based and accrual based models, four sophisticated models being included (see Table 1 bellow).

Table 1. Valuation models used by Romanian financial analysts

Valuation models	Score					Mean score (Observations)	Rank
	1	2	3	4	5		
Cash flow based:							
DCF or FCF [♦] - (<i>discounted cash flow model</i>)	1	0	3	4	12	4.30 (20)	2
DY- (<i>dividend yield</i>)	3	3	7	2	5	3.15 (20)	5
DDM [♦] - (<i>dividend discount model</i>)	3	3	4	9	1	3.10 (20)	6
P/CF- (<i>price to cash flow multiple</i>)	6	7	6	1	0	2.10 (20)	10
CFROI [♦] - (<i>gross cash flow minus economic depreciation divided by gross investment</i>)	16	4	0	0	0	1.20 (20)	12

**The use of accounting information by financial analysts
in emergent markets: the case of Romania**

Accrual based:							
P/E - (<i>price to earnings ratio</i>)	0	0	1	4	15	4.70 (20)	1
EV/EBITDA- (<i>enterprise value to EBITDA multiple</i>)	0	2	0	8	10	4.30 (20)	2
P/B- (<i>price to book value multiple</i>)	2	2	0	7	9	4.05 (20)	3
P/S- (<i>price to sales multiple</i>)	2	1	6	6	5	3.55 (20)	4
PEG- (<i>price to earnings divided by growth rate</i>)	5	5	5	3	2	2.60 (20)	7
EV/BV- (<i>enterprise value to book value multiple</i>)	4	10	2	2	2	2.40 (20)	8
EV/S- (<i>enterprise value to sales multiple</i>)	6	8	4	1	1	2.15 (20)	9
EVA* - (<i>economic value added</i>)	11	6	3	0	0	1.60 (20)	11

* Sophisticated models

We notice that, with the exception of the DCF/FCF model (mean score 4.30/rank 2), Romanian analysts rely mainly on unsophisticated models, the most frequently used being P/E ratio (mean score 4.70/rank 1), EV/EBITDA (4.30/2) and P/B multiple (4.05/3). The results are comparable to those reported by Imam *et al.* (2008), unsophisticated models being highly ranked both by sell-side analysts (P/E ratio - mean score 3.77/rank 1; EV/EBITDA - 3.37/3; P/CF -3.11/4) or buy-side analysts (P/E ratio - mean score 3.71/rank 2; P/CF -3.29/3). The DCF/FCF model also ranked second with an average score of 3.71 for sell-side analysts and first (4) for buy-side analysts.

Performing semi-structured interviews and analyzing research reports, Imam *et al.* (2008) explain the high ranking of the DCF/FCF model (a sophisticated model) by means of its flexibility and credibility, which makes it a natural vehicle for conveying the analyst's research; however, this model is found to be rarely relied upon when determining target prices or investment recommendations. This inference seems to hold also for Romanian analysts, the research reports available on Thomson Reuters I/B/E/S database for Romanian companies featuring the DCF model as the dominant model. However, when asked to explain why they use particular valuation models, Romanian analysts termed DCF/FCF model as "subjective", while price multiples were characterized as easier to compute and easier understood by investors. Romanian analysts also seemed to imply an existing demand for such models on the local market, as well as a mimetic behavior aimed at matching foreign analysts practices:

"Peer group multiples are the most relevant and the most followed by the market, while DCF is very subjective."

"[Price multiples] are more applicable on the local market due to the rather low volume of information comprised within financial reports published periodically by the companies; [and they] are not very complex, so that their values can be easily comprehended by our clients."

“P/E is very simple and that is why it is very frequently used.”

“[DSC and price multiples] are the most frequently employed by analysts on foreign markets and foreign investors are used to them”

Compared to the results obtained for the UK market, Romanian financial analysts rely to a greater extent on *accrual based models* (a mean score of 3.16 for accrual based models in Romania compared to 2.3 and 2.69 for UK buy-side and sell-side analysts, respectively; and a mean score of 2.77 for cash flow based models in Romania compared to 3.2 and 2.93 for UK buy-side and sell-side analysts, respectively). Among the accrual based models, the P/B multiple ranked significantly higher in the Romanian financial analysts’ preferences (mean score 4.05/rank 3) compared to the UK findings (2.57/6 and 2.74/7 for UK buy-side and sell-side analysts, respectively), regardless of the fact that local accounting standards do not promote fair value measurements. A possible explanation for this could be the fact that such a model is easily computed using readily available financial statements information. The low recourse to cash flow based models in Romania might be explained by the fact that these models are based on dividends, which are rarely distributed by listed companies. Some comments of Romanian financial analyst are illustrative in these respects:

„I use DCF as the majority of listed companies either do not offer dividends or do not have a stable [predictable] dividend policy. P/E and EV/EBITDA are the most important [accrual based models] as they rely on the companies’ ability to generate profits and cash flows. Generally based on a book value which is most of the time not marked to market, the P/B multiple is of no great importance for investors, except for credit institutions.”

„Accrual based models are more rapidly computed and need less financial data.”

In addition, Romanian financial analysts appeal more to unsophisticated models: mean score: 3.32 compared to 2.87 for UK buy-side analysts and 2.81 for UK sell-side analysts. And, with the notable exception of the DCF model, Romanian financial professionals use to a lesser extent sophisticated modes (mean score: 1.98 in Romania compared to 2.67 for UK buy-side analysts and 2.58 for UK sell-side analysts), which reflects a lower degree of development of the Romanian market compared to the UK one.

We also investigated whether particular valuation models are associated with brokerage companies’ performance, type of companies followed, type of customers or analysts’ experience. We used the traded value of the brokerage companies for the year 2011, as reported by the BSE website as a proxy for their performance (see Table 2 below).

**The use of accounting information by financial analysts
in emergent markets: the case of Romania**

Table 2. Determinants of valuation models usage

Valuation model	Spearman's rho (sig.)			
	Traded value	Type of companies followed	Type of clients	Analysts' experience
Cash flow based:				
DCF or FCF [♦] - (<i>discounted cash flow model</i>)	0.276 (0.239)	-0.045 (0.850)	0.345 (0.136)	-0.222 (0.348)
DY- (<i>dividend yield</i>)	0.029 (0.904)	0.051 (0.831)	0.176 (0.458)	-0.235 (0.318)
DDM [♦] - (<i>dividend discount model.</i>)	0.155 (0.514)	-0.080 (0.738)	0.307 (0.189)	-0.630 (0.003)***
P/CF- (<i>price to cash flow multiple</i>)	0.017 (0.942)	0.211 (0.371)	-0.120 (0.615)	-0.194 (0.413)
CFROI [♦] - (<i>gross cash flow minus economic depreciation divided by gross investment</i>)	0.217 (0.359)	0.189 (0.424)	0.149 (0.530)	-0.250 (0.288)
Accrual based:				
P/E- (<i>price to earnings ratio</i>)	0.212 (0.370)	-0.146 (0.538)	0.305 (0.191)	-0.057 (0.810)
EV/EBITDA- (<i>enterprise value to EBITDA multiple</i>)	0.471 (0.036)**	0.034 (0.886)	0.456 (0.043)**	-0.409 (0.073)*
P/B- (<i>price to book value multiple</i>)	-0.071 (0.766)	(0.310) (0.183)	0.294 (0.208)	-0.349 (0.131)
P/S- (<i>price to sales multiple</i>)	-0.200 (0.397)	0.217 (0.359)	0.050 (0.834)	-0.202 (0.393)
PEG- (<i>price to earnings divided by growth rate</i>)	-0.079 (0.739)	0.059 (0.806)	-0.338 (0.145)	-0.133 (0.575)
EV/BV- (<i>enterprise value to book value multiple</i>)	-0.023 (0.925)	0.185 (0.434)	-0.106 (0.657)	0.047 (0.845)
EV/S- (<i>enterprise value to sales multiple</i>)	-0.131 (0.581)	0.159 (0.502)	-0.034 (0.888)	0.171 (0.471)
EVA [♦] - (<i>economic value added</i>)	0.290 (0.089)*	0.512 (0.021)**	0.362 (0.117)	-0.229 (0.330)

♦ Sophisticated models

*, **, and *** denote statistical significance at the 10%, 5%, and 1% levels, respectively (two-tailed).

We notice that EV/EBITDA multiple is preferred by analysts operating within more active firms, by those dealing with foreign clients and by less experienced analysts. The latter also seem to prefer DDM to a greater extent than more experienced analysts. We also note that EVA (a sophisticated model) seems to be used more frequently by active brokerage companies and by analysts following foreign companies.

2.2. Factors affecting forecasts accuracy

According to Table 3 below, Romanian financial analysts rely more on fundamental analysis, trying to anticipate companies' future performance, rather than using trends and extrapolating past results. These results are to be expected, taking into account the low level of development of the local capital market, and the documented inefficiency of technical analysis on emerging markets (Heyman *et al.*, 2012).

Table 3. Forecasting methods used by Romanian financial analysts

Forecasting method	Frequencies	Percentages
Mainly extrapolating past trends	3	15%
Mainly anticipating future performance	15	75%
Both methods to the same extent	2	10%
Total	20	100%

In order to identify the main factors affecting analysts' forecasts we have defined ordinal variables, asking financial analysts to grant scores from 1 (less important) to 5 (most important) to disclosure related and macroeconomic factors.

Table 4. Determinants of Romanian analysts' forecasts accuracy

Determinants	Score					Mean score (Observations)	Rank
	1	2	3	4	5		
Disclosure related factors:							
Companies' transparency	0	1	2	2	15	4.55 (20)	1
Quality of the financial reporting standards on which financial statements are based	2	4	4	7	3	3.25 (20)	3
Quality of the financial statements regardless of the financial reporting standards on which they are based	2	5	2	4	7	3.45 (20)	2
Macroeconomic factors:							
Exchange rate volatility	4	2	9	4	1	2.80 (20)	5
Country risk	4	5	6	2	3	2.75 (20)	6
Instability of the business environment	2	4	6	6	2	3.10 (20)	4

Overall, Romanian financial analysts consider disclosure related factors as more important than macroeconomic ones (mean score 3.75 vs. 2.88). However, several other non-related disclosure factors such as "changes in the regulations for the energy sector and other political decisions" or "the effect of global capital markets" were indicated by Romanian analysts in an open-ended question. Macroeconomic factors tend to be considered as more important by companies dealing with foreign investors (Spearman's rho, two sided, $p=0.087$) and by less experienced analysts (Spearman's rho, two sided, $p=0.013$). Accordingly, our initial hypothesis was not confirmed, macroeconomic variables are not perceived by Romanian financial analysts as the most important drivers of their forecasts accuracy.

2.3. The role plaid by IFRS in improving forecasts accuracy

The vast majority of analysts surveyed (70%) consider that IFRS adoption will significantly improve their forecasts accuracy (see Table 5 bellow), this outcome being indicated to a greater extent by analysts already using IFRS in their security valuations (75% of the respondents) (Spearman's rho, two sided, $p=0.056$)

Table 5. The impact of IFRS adoption on forecasts accuracy

IFRS adoption increases forecasts accuracy	Frequencies	Percentages
Yes, to a great extent	14	70%
Yes, to a small extent	1	5
It cannot be assessed	4	20%
No	1	5%
Total	20	100%

To further explore the potential impact of IFRS adoption in Romania, we defined ordinal variables asking financial analysts to grant scores from 1 (less important) to 5 (most important) to several characteristics of the IFRS that can increase forecasts accuracy. At the same time, we asked financial analysts to grant scores to a set of local factors that can diminish/eliminate such an effect. The results are summarized in table 6.

Table 6. Factors explaining the IFRS-forecasts accuracy relationship

Factors	Score					Mean score (Observations)	Rank
	1	2	3	4	5		
IFRS characteristics that can increase forecasts accuracy							
IFRSs have requirements for extensive disclosure	1	2	2	3	12	4.15 (20)	2
Financial reporting complying with IFRS provides predictive information, useful in supporting decision	0	2	2	10	6	4.00 (20)	3
Financial reporting complying with IFRS uses to a greater extent present values (fair values)	1	0	3	7	9	4.15 (20)	2
IFRS adoption allows for greater comparability at an international level	0	0	2	7	11	4.45 (20)	1
Local characteristics that can limit the impact of IFRS adoption:							
The link between accounting and taxation	5	3	7	2	2	2.63 (19)	7
The lack of active markets needed for fair values measurements	3	3	6	2	6	3.25 (20)	4
Managers' attitude towards risk and uncertainty when making accounting estimations	3	2	9	3	3	3.05 (20)	6

Lack of incentives for a full application, as companies' financing needs are mainly satisfied by the banking sector	4	2	5	4	4	3.11 (19)	5
The lack of accounting professionals trained and experienced in IFRS	4	4	2	7	3	3.05 (20)	6
Reporting two sets of financial statements (in compliance with IFRS and local standards) may confuse financial analysts	8	3	5	3	1	2.30 (20)	9
Creative accounting practices stimulated by the IFRS flexibility	3	7	6	3	1	2.60 (20)	8

Overall, factors that can increase forecasts accuracy as a result of IFRS adoption were ranked higher than those that can limit this outcome, which is consistent with their agreement that IFRS will have such a positive effect. The predictive information provided by IFRS reporting seems to be much more appreciated by more active brokerage companies (Spearman's rho, two sided, $p=0.031$), while those following Romanian companies seem to welcome fair value measurements (Spearman's rho, two sided, $p=0.039$). On the other hand, analysts following foreign companies tend to consider the link between accounting and taxation as the major risk (Spearman's rho, two sided, $p=0.015$).

We expected analysts' responses to vary according to their knowledge of IFRS. The results showed that analysts which are not using IFRS fear for an incorrect application of these standards, due to the lack of accounting professionals trained and experienced in IFRS (Spearman's rho, two sided, $p=0.028$).

DISCUSSION AND CONCLUSIONS

This paper tried to provide an inside into the use of accounting information by financial analysts on the emergent market of Romania. As it was expected, Romanian analysts rely more on unsophisticated, accrual-based valuation models (such as P/E multiple) and less on evolved, or cash flow-based models. Sophisticated and cash flow-based models scored lower when compared to the results obtained on the UK market, although sophisticated models (notably EVA) seem to be more frequently used by active brokerage companies. These results can be taken to reflect both the underdevelopment of the Romanian capital market, which offers insufficient information for performing more evolved valuation analysis, but also a certain degree of immaturity of the Romanian financial analyst profession.

In spite of our initial presuppositions, Romanian financial analysts do not consider macroeconomic factors as the most important drivers of their forecast accuracy. These results may be consistent with the findings of Zwart & Dijk (2005) who provided empirical evidence that security analysts do not efficiently use publicly available macroeconomic information in their earnings forecasts for emerging market stocks.

As regards the IFRS adoption, the vast majority of analysts surveyed consider that IFRS adoption will significantly improve their forecasts accuracy, this positive outcome being indicated to a greater extent by analysts already using IFRS in their securities valuations. The paper also tried to identify possible characteristics of IFRS that could be responsible for decreasing forecasts errors, in order to support further conclusive research.

The main limitation of the paper comes from the small number of respondents which prevented us from performing a more complex data analysis and to have a complete perspective on the financial analysts' perceptions. Unfortunately, we cannot generalize the results of our research to all brokerage companies authorized by CNVM, since respondents differ significantly from nonrespondents on at least one important characteristic: their trading activity for the year 2011. The application of t-test shows that respondents and nonrespondents differ on traded value for the year 2011 (t-test: $t=-3.067$, sig. 2-tailed, $p=0.007$). However, the variable Traded Value is not distributed normally (skewness: statistic 4.772, standard error 0.304). Accordingly, we have treated the data as nonparametric and applied Mann-Whitney test. The results of Mann-Whitney test converge with those of t-test: the nonrespondents differ from respondents on traded value (Mann-Whitney $U=190,000$, asymp. sig., 2-tailed, $p=0.001$). Thus, the results could be attributed to the best performers on the market, brokerage companies with the highest traded value in the year 2011 being the ones participating in our research.

Acknowledgements

This work was co-financed from the European Social Fund through Sectorial Operational Programme Human Resources Development 2007-2013, project number POSDRU/89/1.5/S/59184 „Performance and Excellence in Postdoctoral Research in Romanian Economics Science Domain”. The authors would like to thank the participants to the EMO (Economic and Monetary Union) Research Seminar and to the 2nd Conference of the Project no POSDRU/89/1.5/S/59184 (Bucharest, 2012), in particular Prof. Bogdan Dima, for their helpful comments and suggestions.

REFERENCES

- Brown, P.R., Preiato, J.P. & Tarca, A. (2009) “Mandatory IFRS and Properties of Analysts' Forecasts: How Much Does Enforcement Matter?”, *UNSW Australian School of Business Research*, Paper No. 2009 ACCT 01
- Chan, K. & Hameed, A. (2006) “Stock price synchronicity and analyst coverage in emerging markets”, *Journal of Financial Economics*, 80, 115-147
- Courteau, L., Kao, J. & Richardson, G. (2001) “Equity valuation employing the ideal versus ad hoc terminal value expressions”, *Contemporary Accounting Research*, 18, 625–661

- Ernstberger, J., Kroter, S. & Stadler, C. (2008) "Analysts' Forecast Accuracy in Germany: The Effect of Different Accounting Principles and Changes of Accounting Principles", *Business Research*, 1(1): 26-53
- Feltham, G. & Ohlson, J. (1995) "Valuation and clean surplus accounting for operating and financial activities", *Contemporary Accounting Research*, 11(2), 689-731
- Francis, J., Olsson, P. & Oswald, D. (2000) "Comparing the accuracy and explainability of dividend, free cash flow, and abnormal earnings equity value estimates", *Journal of Accounting Research*, 38(1), 45-70
- Heyman, D., Inghelbrecht, K. & Pauwels, S.P. (2012) *Technical Trading Rules in Emerging Stock Markets* (February 2, 2012), available online at SSRN: <http://ssrn.com/abstract=1998036> or <http://dx.doi.org/10.2139/ssrn.1998036>
- Hope, O-K. (2002) "Disclosure Practices, Enforcement of Accounting Standards and Analysts' Forecast Accuracy: An International Study", *Journal of Accounting Research*, 41(2), 235-272
- Imam, S., Barker R. & Clubb, C. (2008) "The Use of Valuation Models by UK Investment Analysts", *European Accounting Review*, 17(3), 503-535
- Ohlson, J. A. (1995) "Earnings, book values and dividends in security valuation", *Contemporary Accounting Research*, 11, 661-687
- Peek, E. (2005) "The Influence of Accounting Changes on Financial Analysts' Forecast Accuracy and Forecasting Superiority: Evidence from the Netherlands", *European Accounting Review*, 14 (2), 261-295
- Penman, S. H. & Sougiannis, T. (1998) "A comparison of dividend, cash flow, and earnings approach to equity valuation", *Contemporary Accounting Research*, 15(3), 343-383
- Pope, P. (2003) "Discussion of Disclosure Practices, Enforcement of Accounting Standards, and Analysts' Forecast Accuracy: An International Study", *Journal of Accounting Research*, 41(2), 273-283
- Preiato, J.P., Brown, P.R. & Tarca, A. (2012) "Mandatory Adoption of IFRS and Analysts' Forecasts: How Much Does Enforcement Matter?" (January 04, 2012). *UNSW Australian School of Business Research Paper No. 2009 ACCT 01*. Available on-line at SSRN: <http://ssrn.com/abstract=1499625> or <http://dx.doi.org/10.2139/ssrn.1499625>
- Tan, H., Wang, S. & Welker, M. (2009) *Foreign Analysts Following and Forecast Accuracy around Mandatory IFRS Adoptions*, available on-line at <http://www.bus.wisc.edu/accounting/faculty/documents/PaperMikeWelker4-17-09.pdf>
- Vanstraelen, A.; Zarzeski, M.T. & Robb, S.W.G. (2003) "Corporate Nonfinancial Disclosure Practices and Financial Analyst Forecast Ability across Three European Countries", *Journal of International Financial Management and Accounting*, 14 (3), 249-278
- De Zwart, G.J. & Van Dijk, D.J.C. (2008) "The Inefficient Use of Macroeconomic Information in Analysts' Earnings Forecasts in Emerging Markets" (March 2008, 03), ERIM Report Series Reference No. ERS-2008-007-F&A. Available on-line at SSRN: <http://ssrn.com/abstract=1117784>