

IFRS Introduction, Corporate Governance and Firm Performance: Evidence from Portugal

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Abstract

This paper assesses the relationship between the application of the International Financial Reporting Standards (IFRS), corporate governance and firm performance in Portugal. The sample consists of 240 observations, in 80 firms, over the period of 2003-2005.

A corporate governance index is created to measure the compliance with the CMVM (Portuguese Securities Market Commission) recommendations.

Results reveal that Portuguese companies that follow CMVM recommendations have a higher level of firm performance, which indicates an important link between financial and managerial accounting. Nevertheless, the level of compliance with the recommendations is still low. Finally, the study establishes that IFRS adoption, per se, is not associated with a higher level of corporate governance.

Keywords:

**IFRS
Corporate Governance
Portugal
Financial Performance
Portuguese Securities Market
Commission (CMVM)**

Introduction

In the current climate of financial turmoil, corporate governance is more important than ever before. However, the need to give more emphasis to sound corporate practices in Europe is not recent. According to a Global Institutional Investor study from 2006, 78% of the European institutional investors surveyed believed that corporate governance would become more important over the next few years in Europe. The literature on this topic has also been flourishing. Bauer *et al.* (2004), for example, use Deminor Corporate Governance Ratings for companies included in the FTSE Eurotop 300 index and find that higher ratings are associated with higher common stock returns and enhanced firm value. However, studies undertaken until now have focused on listed firms only.

In Portugal, the CMVM (*Comissão do Mercado de Valores Mobiliários* - Portuguese Securities Market Commission) first elaborated a package of recommendations regarding corporate governance in 1999. These have been revised and the latest set of recommendations was released in September of 2007. In the introduction to the new code's recommendations an interesting comment is made. It is stated that the recommendations "can, naturally, be followed by firms that do not have their stock listed". Our paper follows this line of thought and studies not only public firms but also the largest private firms of Portugal.

In Europe all listed firms have been required since 2005 to report consolidated financial statements prepared according to IFRS (International Financial Reporting Standards). Recent research seems to support that IFRS adoption has improved financial reporting (e.g.: Barth *et al.*, 2008). In Portugal, the abandonment of the Portuguese POC (Plano

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Oficial de Contas, which together with the Diretrizes Contabilísticas forms the generally accepted accounting principles of the country) is under way. In April 2007 the Portuguese Commission of Accounting Normalization (*Comissão de Normalização Contabilística*) has approved a new accounting system which, was recently approved and is detailed in decree-law 158/2009, published on July 13, 2009. This will be applied to the Portuguese non-listed firms beginning in 2010. The new system creates a set of standards (very similar to the IFRS) and a reduced set of norms for small firms. Given that Portugal is a country dominated by small and medium firms, it is urgent to study the results of the first wave of IFRS adoption, in order to be better prepared for an extended application of international accounting standards.

This paper assesses the relationships between the adoption of IFRS, corporate governance practices and firms' performance, an area of interest to management accountants. Annual reports are collected for a sample of 80 companies that operate in Portugal (half of them listed in the *Euronext PSI-General Index*) for the years of 2003 to 2005. Then, the information on corporate governance contained in these reports is coded in order to evaluate the firms' level of compliance to the CMVM recommendations. Based on this data, we construct a firm-specific Corporate Governance Index (CGI).

We test two hypotheses. The first is that the application of IFRS is positively associated with our CGI. We expect firms that adopt IFRS to have better corporate governance practices, as these are the ones that are listed and have more exposure to financial markets (where good corporate governance practices can lead to better returns). However, results indicate that the adoption of IFRS is not statistically associated with corporate governance practices. This is consistent with the findings of Daske et al. (2008), who state that "liquidity, valuation and cost of capital effects around mandatory IFRS adoption are present only in countries with relatively strict enforcement regimes".

The second hypothesis is that the CGI is positively associated with an improvement in firm performance, which demonstrates that managerial accounting practices that are aimed

at increasing firm performance appear to be linked to good governance and financial reporting requirements (see Subramaniam, Hodge and Ratnatunga, 2006). Results support the hypothesis, as a statistically significant relation is found between profitability and the variable of interest. Thus, an increase in the level of compliance with the CMVM recommendations is associated with a higher return on assets, suggesting that the performance of firms increases when they follow these recommendations. As our robustness check shows, this finding persists if performance is measured by return on equity.

This study makes several contributions to the literature. First, it reveals how the association between good corporate practices and performance, which has been identified for public firms, persists in private firms. Although recently some research has emerged focused on family firms (e.g. Enriques and Volpin, 2007) the corporate governance literature on private firms is scarce, unlike what is found in other areas (e.g. Ball and Shivakumar, 2005). Second, to our knowledge, this is the first study that documents the association of better corporate practices and firm performance in Portugal. It does so using a sample that, albeit small by conventional terms (80 firms, over 3 years), is the largest one ever analysed in an empirical corporate governance empirical study in Portugal. Earlier papers have used samples of between 30 and 44 firms (Lopes and Viana, 2007; Curto and Morais, 2008 and 2009).

Finally, our findings help to clarify conflicting results reported earlier, as two working papers that study value relevance (Curto and Morais, 2008; 2009) present contradictory results. The first paper (Curto and Morais, 2008) finds an improvement in earnings quality but a decrease in the value relevance of accounting information in Portugal, after IFRS adoption. The second paper (Curto and Morais, 2009) analyses value relevance in European listed firms and finds that firms from Portugal (among others) experienced a greater increase in the value relevance of accounting information with the adoption of IASB (International Accounting Standards Board) standards.

The remainder of this paper is organised as follows. The next section describes the

Portuguese setting. Section three focuses on previous literature and develops the research questions. Section four describes the sample data and their collection. Section five outlines the research design and presents the results of the paper. Section six concludes.

The Portuguese Setting

In Portugal firms' official structure of governance can follow only one of the alternatives described in the corporate law (*Código das Sociedades Comerciais*). The recommendations about good governance practices are made public by the CMVM. In 1999 the CMVM elaborated its first package of recommendations regarding corporate governance. Two years later, it issued regulation nº 7/2001, which brought significant changes to the national corporate governance settings, as it required the transparency of ownership structures and determined that listed firms, from then on, had to disclose their degree of compliance with the recommendations, in a "comply or explain" mode. Thus, firms either make the suggested disclosures in their annual reports (comply) or they need to justify their deviation from the recommendation (explain). The original regulation has undergone amendments, via regulation 11 of 2003, regulation 10 of 2005 and regulation 3 of 2006. In September of 2007, a new list of recommendations was made public by the CMVM. In this new list, recommendations are organised under three topics: (i) general shareholders' meetings, (ii) boards and committees and (iii) information and auditing. Overall, there are 16 recommendations and many of them have several points. An interesting issue is that in the introduction to the new code's recommendations it is stated that the recommendations can be followed by non-listed firms.

As mentioned above, the CMVM creates reports on firms' observations of its recommendations. These only cover the Portuguese listed firms and are merely descriptive reports of firms' compliance with the recommendations issued. The last report was released in the Fall of 2007 and analyses 45 reports of year 2006. When comparing the compliance level of firms to the recommendations, there is an overall increase

from 2005 to 2006. The only exception is the recommendation that suggests the disclosure of board members' remuneration: in the 2005 reports the compliance level was 6.8% and in the 2006 report the compliance level is 6.7%. The compliance levels of the new report range from 6.7% to 100% (on the recommendation that suggests the disclosure of the composition of the board).

In the accounting arena, great changes have also taken place in Portugal recently. In the *Memorandum of Understanding* issued by IASB and FASB both entities "acknowledged their commitment to the development of high quality, compatible accounting standards that could be used for both domestic and cross-border financial reporting". With the introduction of rule 1606/2002 of the European Commission, Portuguese listed companies were required to adopt IASB standards in the preparation and presentation of their consolidated accounts from the 1st of January 2005 onwards.

The Portuguese stock market is very small. On the 1st of January 2005, it included only 45 non-financial firms. This is a country where firms in need of financing use banking much more than capital markets. Thus, the introduction of the IFRS in Portugal in 2005 did not affect most of the firms. With that in mind the Portuguese Commission of Accounting Normalisation started elaborating a new set of accounting rules, which has been officially approved and will be applied to the Portuguese non-listed firms from 2010 on.

Prior Research and Hypotheses Development

Ratnatunga and Ariff (2005) provide three definitions of corporate governance; those derive from (1) economic (2) legal and (3) societal expectations of companies.

Compliance with IFRS would fall within the legal definition, but we will demonstrate that such compliance would have an economic impact as well. Most literature on IFRS examines the advantages of their application. Ball (2005), for example, points out some of the immediate advantages of the uniformity of the accounting standards: scale economies (once consensus is obtained, these rules are like a public good with a null marginal cost of

an additional adopter), the protection given to the auditors against “managers playing opinion shopping” and the elimination of informational externalities that arise from lack of comparability. Furthermore, Armstrong *et al.* (2007), mentions that it is believed that IFRS adoption would benefit European investors by improving information quality, by eliminating the costs associated with the comparison of firms from different countries, and finally, by making European firms more liquid due to an increase in capital flows from outside of Europe. The improvement of the quality of the accounting information, through the reduction of the earnings smoothing and the increase of the value relevance is also studied by Barth *et al.* (2008). One recent paper (Daske, et al., 2008) studied the economic consequences of the mandatory introduction of IFRS in 26 countries. The results indicated that “capital-market benefits exist only in countries with strict enforcement regimes, and institutional environments that provide strong reporting incentives”.

Other papers have analysed the developments in specific countries. Daske and Gebhardt (2006), for example, found evidence to support that disclosure quality increased significantly with the adoption of IFRS for Austria, Germany and Switzerland. Aksu (2006) found an incremental value of its ‘transparency and disclosure scores’ with IFRS adoption for a sample of Turkish listed companies.

However, the brief literature about Portugal has not reached a consensus on whether or not there has been a significant increase in the quality of accounting information disclosed by firms. In fact, Curto and Morais (2008) found an improvement in earnings quality but a decrease in the value relevance of accounting information with the adoption of IFRS. Lopes and Viana (2007) present results showing that the objective of comparability, relevance and understandability stated in CESR’s (Committee of European Securities Regulator) recommendation were not achieved and that “the majority of the companies do not disclose complete information of the impacts of the transition to IFRS”. However, Curto and Morais (2009) find that firms from Portugal (among others) experienced a “greater increase in the value relevance of accounting information with the adoption of IASB standards”.

We expect firms that adopt IFRS to have better corporate governance practices, as these are the ones that are listed and so have more exposure to financial markets (where good corporate governance practices can lead to better returns). A relationship between corporate governance practices and the quality of financial accounting disclosures is also assumed by the Australian Stock Exchange statement of principles and confirmed by Beekes and Brown (2006). As such, we define our first hypothesis in the alternative form, as follows:

H1: *The application of IFRS is positively associated with good corporate practices.*

Several authors have constructed variables that evaluate corporate governance practices and found that higher corporate governance scores are associated with higher stock returns and better firm performance. The study of Brown and Caylor (2006), which relates Gov-Score to five measures of performance, reveals that better-governed firms have higher profits, greater value, higher payout ratios and present lower levels of risk and volatility. Bai, *et al.* (2004), found that Chinese listed companies received a premium for good corporate governance, concluding that their corporate governance index has a statistically and economically significant effect on market valuation. Drobotz *et al.* (2004), constructed a broad corporate governance rating related to the German Corporate Governance Code and documented a positive relationship between governance practices and firm valuation for German public firms. Based on these findings, which link good corporate governance practices to firm performance, we advance our second hypothesis, in the alternative form, as follows:

H2: *Good corporate practices are positively associated with firm performance.*

Sample

We begin the sample selection process with the 250 top non-financial Portuguese firms, identified via the 2006 ranking of Exame, plus the Euronext PSI-Geral listed companies that were not in the Exame ranking and were listed at least in 2005.¹ Financial institutions were

excluded, as these tend to operate under different regulations and have specific practices. We then eliminate companies that do not have their annual reports publicly available on their websites for the three years of our sample period (2003, 2004 and 2005). Some firms operate in Portugal but are subsidiaries of international companies.

In these cases, if we could not find information disclosed by the Portuguese unit, we excluded them from the sample. This led to a final sample of 80 firms (see Table 1). Given that the period covered is from 2003 to 2005, our final sample consists of 240 firm-year observations. Given the time period analysed,

observations include data in two different accounting regimes: before the mandatory adoption of IFRS by listed firms, in their consolidated accounts (2003 and 2004), and the period immediately thereafter (2005). Another advantage of the sample is that it includes both listed and non-listed firms.

Although the CMVM corporate governance recommendations were created having only the listed firms in mind, our sample composition allows us to assess whether the largest Portuguese firms (even if not listed) follow these recommendations of best practices.

Table 1: Sample Data

	<i>N</i>
Initial sample, from Exame	250
Listed firms, not included above	35
Financial institutions	(6)
International firms without information on the local unit	(10)
Firms without the 3 annual reports available	(189)
Final sample	80

Research Design

We estimate two different parsimonious models in order to test our hypotheses. Both models utilise a panel data structure, the one most appropriate to the sample data: first, due to the small size of the sample described in the previous section in terms of companies, and second, due to the short time data available (only three years). This, according to Wooldridge (2002), helps us solve the omitted variables problem while obtaining consistent estimators.

The first hypothesis predicts that the application of IFRS is positively associated with good corporate practices. In order to test it, we estimate the following equation:

$$CGI_{i,t} = \beta_0 + \beta_1 Y_{2004} + \beta_2 Y_{2005} + \beta_3 PRIV_{i,t} + \beta_4 GROWTH_{i,t} + \beta_5 SIZE_{i,t} + \beta_6 CAP_ST_{i,t} + \beta_7 BIG_4_{i,t} + \beta_8 LISTED_{i,t} + \beta_9 IFRS_{i,t} + \sum_{j=1}^{17} \beta_{9+j} SECTOR_{i,t} + \eta_i + \varepsilon_{i,t}$$

(1)

CGI is the result of the coded data about the firm’s compliance with the CMVM

recommendations, hand-collected from the annual reports. The 13 recommendations applicable to our time period are in Appendix 1. The coding of the compliance level follows exactly the same criteria as CMVM uses in its creation of descriptive statistics on the Portuguese listed firms.² CGI is computed as the arithmetic mean of the compliance to each of the CMVM recommendations.³

The main variable of interest in equation 1 is IFRS. This is an indicator variable, coded as one if the company adopted IFRS in that fiscal year, and zero otherwise. We recognise that the way in which this is coded could create a problem, by including both voluntary and compulsory adoptions. However, in our sample only three firms adopted IFRS before 2005. We also create indicator variables for the years of 2004 and 2005 to capture the specific effects of each year, given the continuous improvement and amendments to the recommendations. Thus, *Y_2004* is an indicator variable coded as 1 when the annual report is from 2004 and 0 otherwise; and *Y_2005* is an indicator variable coded as 1 when the annual report is from 2005 and 0 otherwise.

PRIV is an indicator variable coded as 1 if the firm has a private shareholder control and 0 otherwise.⁴ We expect this variable to capture any effects related to the fact that we have a mix of private and public firms in our sample. *GROWTH* is a control variable that represents sales variation, when compared to the previous fiscal year. To control for possible firm size effects we include *SIZE*, which is computed as the natural logarithm of the firm's total assets measured in Euros at the end of the fiscal year.

Based on the work of Brick *et al.* (2005), who included a leverage ratio as one of the explanatory variables for board independence, we include *CAP_ST*. This is calculated as the ratio of total debt to total assets. The *BIG_4* indicator variable was included to control for the quality of accounting earnings, because Francis and Wang (2008) and Kent and Stewart (2007) find that when companies are audited by Big 4 auditors the quality of earnings is higher.⁵ As do Beiner *et al.* (2006), we include the variable *LISTED*, coded as one if the firm is listed and zero otherwise. The *SECTOR* indicator variables are coded as one if the firm operates in that specific sector and zero otherwise. Finally, η_i is an unobservable variable that captures idiosyncratic features of each company that are constant over time, and $\varepsilon_{i,t}$ is a random shock.

Our second hypothesis predicts that good corporate governance practices are positively associated with firm performance. There are currently two views on this association, in terms of correlation with the error term. The first defends that better corporate governance enhances firm performance, as it is related to, among other things, unobservable firm characteristics, supporting the endogeneity of this variable (e.g. Himmelberg *et al.*, 1999). The other view supports a positive relationship between governance and firm performance and assumes that governance is exogenously determined (e.g. Brown and Caylor, 2006).

The use of instrumental variables is seen as the solution to the problem of endogeneity of the variables (e.g. Brick *et al.*, 2005). Larcker and Rusticus (2005) study the suitability of using instrumental variables in accounting research. They provide evidence that most of the “commonly used instruments are unlikely to

provide estimates that are preferable to OLS”, maintaining that the use of instrumental variables in accounting research is often not the most appropriate practice, due to the difficulty of specifying really exogenous instruments. Thus, we do not use instrumental variables in our study.

We measure firm performance via ROA (return on assets) given that half of the observations are from non-listed firms, and thus have no associated market returns. In order to test our second hypothesis we estimate the following equation:

$$\begin{aligned} ROA_{i,t} = & \beta_0 + \beta_1 Y_{2004} + \beta_2 Y_{2005} + \\ & \beta_3 PRIV_{i,t} + \beta_4 GROWTH_{i,t} + \\ & \beta_5 EQUITY_{i,t} + \beta_6 CAP_ST_{i,t} + \\ & \beta_7 CGI_{i,t} + \beta_8 BIG_4_{i,t} + \beta_9 \\ & LISTED_{i,t} + \beta_{10} IFRS_{i,t} + \\ & \sum_{j=1}^{17} \beta_{10+j} SECTOR_{i,t} + \eta_i + \varepsilon_{i,t} \end{aligned} \quad (2)$$

The dependent variable, *ROA*, is calculated as the ratio between net income and total assets, at the end of the fiscal year. A new explanatory control variable is included in this equation: *EQUITY*. This is computed as the natural logarithm of total equity and its inclusion is aimed at controlling possible size effects. *EQUITY* is included as a replacement for *SIZE*, as this variable had to be removed (because of the high correlation that would exist between it and *ROA*). All other variables are as defined above.

Data Analysis

Descriptive Statistics

Table 2 presents the distribution of the sample by sectors. The sectors listed by Exame were used for this classification.⁶ The weights of the several sectors in the total sample range from 1.3% (in fuel distribution) to 15% (in services). Untabulated results indicate that although Portugal, as whole, did not embrace the IFRS until 2005 (as documented in Hope *et al.* (2006)) three of the Portuguese firms were already disclosing IFRS results before that year. More specifically, in our sample three firms had been using IFRS since 2003:

Novabase, Jerónimo Martins and Sonae. Descriptive statistics about the compliance with the CMVM recommendations are reported in Table 3. For most recommendations, the number of observations is 240, as we can assess the level of compliance to these recommendations through

the three years of our sample. However, for some recommendations (5-A, 8-A and 10-A) there are only 80 observations, because these were only included by the CMVM in the beginning of 2005.

Table 2: Distribution of the Sample by Sectors

	<i>N</i>	<i>%</i>
Agro-industry	4	5.0%
Water, Electricity and Gas	8	10.0%
Cellulose and paper	3	3.8%
Commerce	2	2.5%
Automobile commerce	2	2.5%
Construction	10	12.5%
Sports clubs	2	2.5%
Food distribution	9	11.3%
Fuel distribution	1	1.3%
Edition, information and graphic arts	3	3.8%
Hotels and restaurants	5	6.3%
Wood and cork	2	2.5%
Metal mechanics and metallurgy	2	2.5%
Metallic minerals and non-minerals	6	7.5%
Chemistry	2	2.5%
Services	12	15.0%
Telecommunications	7	8.8%
TOTAL	80	100.0%

Table 3: Descriptive Statistics on the CMVM Recommendations

<i>Recommendations</i>	<i>N</i>	<i>Mean</i>	<i>Std. Dev.</i>
1	240	0.546	0.499
2	240	0.246	0.431
3	240	0.550	0.499
4	240	0.529	0.500
5	240	0.683	0.466
5-A	80	0.613	0.490
6	240	0.479	0.501
7	240	0.408	0.493
8	240	0.058	0.235
8-A	80	0.175	0.382
9	240	0.308	0.463
10	240	0.467	0.500
10-A	80	0.263	0.443

Note: Recommendations are in Appendix I.

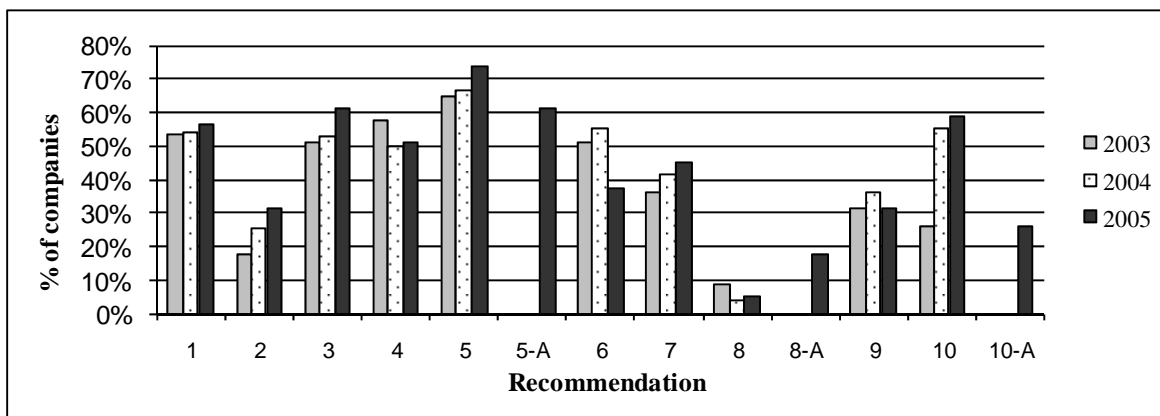
It is worth noting that the compliance levels vary greatly from recommendation to recommendation. Recommendations 8 and 8-A, which regard the disclosure of administrators' individual remuneration and the submission of a declaration about the firms' remuneration policy, both have a very low compliance level (5.8% and 17.5%, respectively). The majority of the companies consider these recommendations as inappropriate, and so firms disclose only the aggregate remuneration (of the entire board of directors). The existence of a sufficient number of independent board members, measured by recommendation 6, was not followed by almost half of the companies. Recommendation 5, concerning the equilibrium between executives and non-executives on the board, is the most-followed one, and has a compliance level of 68.3%. This leads us to the low average value of our

CGI. Overall, the mean of CGI is 41.971 (out of 100).

Figure 1 shows the compliance with the CMVM recommendations by year. Overall, there is a small increase of the compliance level over the years of our sample. However, as the graph shows, this is inconsistent across the several recommendations.

Recommendation 6 (concerned with the level of independent members on the board), for example, had a compliance level decrease from 2004 to 2005. Given the importance of this type of board member (established in papers such as Ajinkya, et al., 2005) this is worrisome. Moreover, during our analysis of the annual reports, we observed that the "comply or explain" principle, imposed by the CMVM, is not being respected by many companies included in our sample.

Figure 1: Compliance with the CMVM Recommendations



Another curious fact is that four out of the five state-owned companies included in the sample data have a CGI of zero. Thus, they do not comply with any of the CMVM recommendations. However, with the recent resolution n°49/2007, state-owned companies will also have to consider governance issues. These results are consistent with the overall weaknesses of the Portuguese corporate governance practices, pointed out by António Borges, the President of the European Corporate Governance Institute, in a recent conference.⁷ In his presentation, António Borges highlighted as problems the lack of transparency, the excessive obsession with stability and control and the limited protection of minorities' interests.

included in the two equations, before the removal of outliers, are reported in Table 4. Results indicate that half of the companies are listed, and most (94%) have private control. Also, these firms are, on average, financially sound, as the average sales growth is 8.6% and the average ROA is 4.6%. CAP_ST ranges from 1% to a maximum of 166% and presents a mean of 67%, revealing a high level of debt among the majority of Portuguese companies.

Table 5 presents the Pearson correlation matrix between the studied variables. Results show that the correlation between IFRS and CGI is 0.161. The untabulated p-value of this correlation is 0.0125. Thus, there is a positive and statistically significant association between the adoption of the IFRS and good corporate governance practices. This is

Descriptive statistics on all the variables

consistent with our first hypothesis. The correlation found between ROA and IFRS is -0.002 (with an untabulated p-value of 0.9756) and the correlation between ROA and CGI is 0.034 (with an untabulated p-value of 0.599). These results do not support our second hypothesis. In order to better evaluate the association that exists between our variables of interest, we next estimate the two models described above.

Estimation Results

In order to determine what the most adequate way is of analysing our data we first run both models with fixed effects, and then with random effects. This allows us to perform Hausman tests, whose null hypothesis is that

the differences in coefficients estimated (via both methods) are not systematic. Under random effects the coefficients are inconsistent under the alternative hypothesis, while under fixed effects the coefficients are consistent under both hypotheses (null and alternative).

For both models the Hausman test's null hypothesis is rejected, when considering a 5% significance level. This confirms that the fixed-effects model is the more appropriate econometric treatment, and so we next report only the fixed-effects estimation results. Because of this, in the estimation of both equations the variables that did not vary over time in this sample (*PRIV*, *LISTED* and *SECTORS*) have to be removed.

Table 4: Descriptive Statistics on other Variables

	<i>Mean</i>	<i>Std dev</i>	<i>Median</i>
IFRS	0.192	0.394	0.000
CGI	41.971	31.238	46.154
PRIV	0.938	0.243	1.000
GROWTH	0.086	0.351	0.030
SIZE	19.341	1.485	19.146
CAP_ST	0.670	0.217	0.668
BIG_4	0.633	0.483	1.000
LISTED	0.500	0.501	0.500
EQUITY	17.986	2.061	17.938
ROA	0.046	0.086	0.030

Where:

IFRS = indicator variable, coded as 1 if the company has adopted IFRS in that fiscal year, and 0 otherwise;

CGI = arithmetic mean of the compliance with the CMVM recommendations;

PRIV = indicator variable coded as 1 if the firm has a private shareholder control and 0 otherwise;

GROWTH = sales variation, when compared to the previous fiscal year;

SIZE = natural logarithm of the firm's total assets;

CAP_ST = ratio of total debt to total assets;

BIG_4 = indicator variable for Big 4 auditor firm;

LISTED = indicator variable, coded as 1 if the firm is listed and 0 otherwise;

EQUITY = natural logarithm of total equity;

ROA = ratio between net income and total assets.

Table 5: Matrix of Pearson Pairwise Correlations

	Priv.	Growth	Size	Cap_st	CGI	Big_4	IFRS	Equity	Listed	ROA
Priv.	1									
Growth	-0.005	1								
Size	-0.192	0.033	1							
Cap_st	-0.010	-0.041	-0.062	1						
CGI	0.324	0.050	0.082	-0.013	1					
Big_4	0.089	0.070	0.238	-0.097	0.285	1				
IFRS	0.082	0.038	0.129	-0.134	0.161	0.129	1			
Equity	-0.131	0.043	0.632	-0.568	0.048	0.170	0.094	1		
Listed	0.258	0.038	0.189	-0.228	0.290	0.104	0.445	0.077	1	
ROA	0.069	0.159	0.070	-0.443	0.034	0.106	-0.002	0.306	-0.141	1

Table 6 presents the estimation results for the first equation. The results obtained provide no support for our first hypothesis, which predicted a positive association between the adoption of IFRS and good corporate governance practices, as the coefficient estimated for IFRS is not statistically significant. Thus, although there is a statistically significant correlation between these two variables when other factors are considered, in a multiple regression with fixed effects, that relationship is no longer present.

Ball, *et al.* (2003) argue that adopting high quality standards might be a necessary condition for high quality information, but not necessarily a sufficient one. Ding, *et al.* (2007) presented results suggesting that “simply adopting IAS may not necessarily improve national accounting systems”. Also, in order to contribute to the “debate on whether high quality standards are sufficient and effective in countries with weak investor protection rights”, Tendeloo and Vanstraelen (2005) present results of no significant difference in earnings management between companies that adopted IFRS and others using German GAAP. Finally, Daske, *et al.* (2008) find that mandatory IFRS reporting has no impact in countries without strict legal and enforcement regimes, such as Portugal (see Table 2 for classification of the 26 countries in their sample). Therefore, our results are consistent with these findings and indicate that in a country with weak enforcement, IFRS adoption is an insufficient condition for enhancing corporate governance.

Results also reveal that the indicator variable BIG_4 is not statistically significant. In fact, auditors do not give an opinion concerning the veracity of the corporate governance recommendations. One of the weaknesses pointed out by Borges in corporate governance practices in Portugal was exactly the lack of transparency and veracity. This is a good argument in favour of one of the CMVM proposals in its new set of recommendations, which are now under public discussion: they propose that auditors should express a professional and independent opinion about the recommendations realisation.⁸

The statistically significant independent variables are GROWTH and the year dummies (Y_2004 and Y_2005). This suggests that when growing, Portuguese firms give more importance to sound corporate governance practices. This may be due to the increased visibility (in the press) firms have during phases of expansion.

Table 7 presents the estimation results for the second equation. Results provide strong statistical evidence in support of the argument that sounder corporate governance practices are associated with an increase in firm performance (our second hypothesis). The coefficient of CGI is positive, as expected, and it is significant at a 5% level. Therefore, Portuguese firms that follow the CMVM’s recommendations have better returns.

Table 6: Estimation of Equation 1 - Fixed Effects Approach

	FE Coef.	White t-stats
Constant	73.832	0.83
Y_2004	4.738	2.72 ***
Y_2005	4.043	1.79 *
GROWTH	7.128	3.46 ***
SIZE	-1.984	-0.45
CAP_ST	7.814	0.72
BIG_4	-3.619	-1.18
IFRS	0.075	0.03
F-test for model	3.230	(p-value =0.003)
R²	0.92%	
Statistical significance at the 1% (***), 5% (**) and 10% (*) confidence level, respectively, in a two-tailed t-test, are shown above (see Equation 1).		
<i>Note: PRIV, LISTED and SECTORS were dropped because they are not time-varying.</i>		

Table 7: Estimation of Equation 2 - Fixed Effects Approach

	FE Coef.	White t-stats
Constant	0.160	1.11
Y_2004	0.028	3.11 ***
Y_2005	0.026	2.26 **
GROWTH	0.006	0.29
EQUITY	-0.002	-0.24
CAP_ST	-0.216	-2.98 ***
CGI	0.001	2.21 **
BIG_4	-0.017	-1.62
IFRS	0.006	0.43
F-test for model	3.14	(p-value =0.001)
R²	13.17%	
Statistical significance at the 1% (***), 5% (**) and 10% (*) confidence level, respectively, in a two-tailed t-test, are shown above (see Equation 2)		
<i>Note: PRIV, LISTED and SECTORS were dropped because they are not time-varying.</i>		

This result is consistent with Beiner, *et al.* (2006), who found a statistical association (although only marginally significant) between their corporate governance index and performance, for a sample of Swiss companies. Once again, the estimated coefficient for IFRS is not statistically significant. Other significant independent variables are EQUITY (revealing size effects) and the calendar years' indicator variables.

As a robustness check, we also run equation 2 with an alternative dependent variable: return on equity. As in the return on assets specification, the Hausman test indicates that a fixed effects design is more appropriate than a random effects one ($P=0.0005$). The coefficients estimated for this equation under fixed effects are all consistent with those

presented in Table 7. Specifically, the coefficient for CGI is 0.004, with a p-value of 0.022. The coefficient for IFRS remains positive and not statistically significant.

Conclusion

This paper studies the association between the adoption of IFRS and corporate governance, and also the relationship between corporate governance and firm performance, an important link between financial and managerial accounting. This is accomplished via the hand collection and coding of the fulfilment of the CMVM's recommendations, for a sample of 80 Portuguese firms (40 listed in Euronext) from 2003 to 2005. These data show that the level of compliance with the recommendations is still low. For example,

only 5.8% of the annual reports analysed disclose administrators' individual remuneration. Overall, the mean of CGI is 41.971 (out of 100). Hausman tests reveal that a fixed effects model is the best approach to running our equations. Results from these models reveal

the importance of corporate governance to firm performance, and also present statistical evidence that IASB standards are not, *per se*, associated with enhanced corporate governance for this sample of Portuguese companies.

End Notes

¹ - Exame is a national business publication. Every year it creates a ranking of the largest 500 firms in Portugal. This ranking is based on the value of sales in the previous fiscal year. Thus, the 2006 rankings used are based on the sales of 2005. At the time of this analysis, the 2006 annual reports were not yet available.

² - For example, recommendation 5A states that "the board of directors should include a sufficient number of non-executive directors". The CMVM report considers that one third of non-executive directors is enough. We use the same cut-off, in our data coding procedure.

³ - For each recommendation (13 in total), an indicator variables is coded as either one (if the firm follows the recommendation) or zero (otherwise). In the first two years of our sample there were only 10 recommendations. Given that CGI is a percentage of recommendations followed, this does not affect the way we calculate CGI for each firm.

⁴ - The data used for the coding of this variable were available in the Exame issue that published the list of the 500 largest Portuguese firms.

⁵ - Big 4 audit companies: PriceWaterhouseCoopers, Deloitte, Ernst&Young and KPMG.

⁶ - This business publication, together with the ranking of the 500 largest national firms, also elects the best firm of every industry.

⁷ - Address at the CMVM Conference/Public Consultation: "Corporate Governance Code – New Proposed Rules and Recommendations", of 7th of May 2007.

⁸ - Modification of Art. ° 451 of the "Código das Sociedades Comerciais".

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Appendix 1

CMVM recommendations

Recommendation 1 - *The company must ensure that it has permanent contact with the market, that the principle of equality among shareholders is upheld and that uneven access of investors to information is prevented. To these ends, companies should set up an investor support office;*

Recommendation 2 - *The active exercising of voting rights, whether directly, by post or by proxy, should not be restricted. To this end, the following examples are considered to restrict the active exercise of voting rights: a) The imposition of a period of more than 5 working days between the deposit or blocking of shares and permission to participate in the general meeting; b) any statutory restriction on postal voting; c) the imposition of a requirement that postal votes be received more than 5 days in advance; d) the non-availability of voting slips for shareholders wishing to submit their vote by post;*

Recommendation 3 - *It is recommended that companies establish an internal control system, for the efficient detection of risks linked to their activity, as a means of safeguarding their assets and enhancing the transparency of their corporate governance practices;*

Recommendation 4 - *Measures adopted to prevent the success of takeover bids should respect the interests of the company and its shareholders. Measures considered contrary to these interests include defensive clauses intended to cause an automatic erosion of company assets in the event of the transfer of control, or of changes to the composition of the board which prove detrimental to the free transferability of shares and the free assessment by shareholders of the performance of members of the board;*

Recommendation 5 - *The board should be composed of a number of members who provide effective guidance for the management of the company and the persons responsible for said management;*

Recommendation 5A - *The board of directors should include a sufficient number of non-executive directors, whose role it is to continuously monitor and assess the management of the company by the executive members of the board. Members of other corporate bodies may exercise ancillary roles or, at the very most, replace board members, if the supervisory powers involved are equivalent and exercised in fact;*

Recommendation 6 - *The non-executive members of the board of directors must include a sufficient number of independent members. When there is only one non-executive director, he/she must also be independent. Independent members of other corporate bodies may exercise ancillary roles or, at the very most, replace board members, if the supervisory powers involved are equivalent and exercised in fact;*

Recommendation 7 - *The board of directors should create internal audit committees, with the power to assess the corporate structure and its governance;*

Recommendation 8 - *The remuneration of members of the board of directors should be structured in such a way as to permit the interests of board members to be in line with those of the company, and should be disclosed annually in individual terms;*

Recommendation 8A - *A declaration on the policy for remunerating members of a company's corporate bodies should be submitted to the attention of shareholders at the annual general meeting;*

Recommendation 9 - *Members of the remuneration committee or equivalent should be independent as regards the members of the board of directors;*

Recommendation10 - *A proposal should be submitted to the general meeting with regard to the approval of plans for the allotment of shares, and/or options to purchase shares or based on variations in share prices, to members of the board of directors and/or employees. Said proposal should contain all information necessary to ensure that the plan is correctly assessed. The proposal should be accompanied by the rules of procedure for the plan, or, if these have not yet been drafted, by the general conditions for the plan;*

Recommendation 10A - *The company should adopt a policy whereby alleged irregularities occurring within the company are reported, containing the following information: The method through which the irregular practices are reported internally, including the persons permitted to receive such information, the manner in which such reports are to be dealt with, including confidential treatment of the information, if such is the wish of the person making the declaration. The general direction of this policy should be disclosed in the corporate governance report.*