VOLUNTARY ADOPTION OF IFRS BY ITALIAN PRIVATE FIRMS: A STUDY OF THE DETERMINANTS[†]

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Abstract: Prior literature states that the voluntary adoption of IFRS by private firms is related to some firms' contracting incentives (for example, the leverage or the firm' size). In Italy, from the 2006 the private firms that meet the criteria of the Legislative Decree 38/2005 may prepare (voluntary choice) the separate financial statements according to the IFRS. In 2009 we find that some private firms have voluntarily adopted the IFRS. The aim of the paper is to analyze the determinants of voluntary adoption of IFRS by those firms in their separate financial statements. According to prior literature, we find those firms are more likely to adopt IFRS when the ownership is dispersed, there are foreign shareholders and firms are more leveraged. We also find that the likelihood of IFRS voluntary adoption by private subsidiaries firms increases when their parent company complies with IFRS.

Keywords: IFRS, Voluntary Adoption, Private Firms, Separate Financial Statements, Determinants of the Choice

1. Introduction

In Italy, article 2, paragraphs "f" and "g", of the Legislative Decree N° 38 of the 28th February 2005 permits some private firms to adopt IFRS voluntarily in separate financial statements. The aim of the law, which became effective in 2006, was to narrow down the gap between Italian accounting standards (and rules) and IFRS. These firms are as follows:

a) Subsidiaries (private firms) of parent companies that must prepare consolidated financial statements according to IFRS;

b) Private parent companies that prepare and consolidate financial statements;

c) Other private firms, except those that can prepare simplified financial statements.

All firms, *sub a)*, *sub b)* and *sub c)*, must prepare full financial statements.

Previous literature finds that public firms accept the cost of IFRS adoption in order to reduce the cost of capital (e.g. Leuz and Verrecchia, 2000; Ashbaugh and Pincus, 2001; Cuijpers and Buijink, 2005). In general, earlier studies, concerning mainly public firms, cite widespread evidence that the voluntary adoption of IFRS has enhanced accounting quality (e.g. Gassen and Sellhorn, 2006; Barth, 2008; Barth *et al.* 2012; Kvaal and Nobes, 2010), stock market efficiency (e.g. Kasznik, 1999; Leuz, 2003) and, in general, mitigated agency conflicts with stakeholders (Jensen and Meckling, 1976).

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Arguably, however, IFRS are less appropriate for private firms (Sellhorn and Gornik-Tomaszewski, 2006, p.200) for three different reasons. The first reason is that private firms, in general, do not have the same agency conflicts as public firms (Van Tendeloo and Vanstraelen, 2008; Nobes, 2010). Furthermore, influential stakeholders such as investors or financial institutions scrutinize their financial statements less (Van Tendeloo and Vanstraelen, 2008). In fact, in code-law countries (such as Italy) capital markets are less active, investor and creditor protection is weak and litigation rates are lower compared to common-law countries. Finally, the main capital providers to private firms are mainly the banks, resulting in less need for public disclosure (Page, 1984).

The second reason, which is related to the first one, is that private firms do not expect to incur net benefits when adopting IFRS (Corno, 2006; Jermakowicz and Gornik-Towaszewski, 2006).

The third reason is related to the relevant country's taxation system, considered a complementary component to the overall institutional system (Ball, 2001). Differences in taxation law between IFRS and non-IFRS adopters may create strong incentives against the voluntary adoption of IFRS (Nobes, 2008 and 2011) by private firms.

In 2009, we find that only 479 Italian private firms (about 1% of potential IFRS adopters) switched voluntarily to IFRS in their separate financial statements. In absolute terms, the overall proportion of Italian private firms that decided to adopt IFRS in their separate financial statements is still small compared to Germany (Bassemir, 2011), which is a surprising finding because in Italy there is a low litigation risk between firms and stakeholders (Giunta and Pisani, 2005; Quagli, 2005). In fact, stakeholders of Italian private firms rely on legal protection (Italy is a civil law country) and on private relationships (e.g. firms and banks). Therefore, we argue that Italian private firms comply with IFRS, but only if they are subsidiaries and their parent company also complies. Consequently, we posit the following research question: Why do Italian private firms comply with IFRS in their separate financial statements?

This paper makes the following contributions to the literature. First, we analyze why Italian private firms comply with IFRS in their separate financial statements. In fact, prior literature (e.g. Bassemir, 2011) on private firms analyzes the adoption of IFRS in consolidated financial statements.

Second, we update studies on the voluntary adoption of IFRS (in particular, Bassemir, 2011) by using the positive accounting theory hypothesis (Watts and Zimmermann, 1986), and then we provide a small contribution to corporate governance in Italian firms following our analysis of relevant topics (e.g. ownership concentration).

The remainder of the paper is organized as follows. In section one we analyze the literature on the voluntary adoption of IFRS by private firms (§ 1). In section two we develop the hypothesis. In the third section we provide the research design and methodology, while in the fourth section we provide the research results. Finally, in section five, we conclude by summarizing the main findings and discussing the implications for future

research.

2. Theoretical Background and Hypothesis Development
2.1. Literature Review on the Determinants of IFRS Adoption by Private Firms

Prior research (e.g. Watts and Zimmermann, 1986, 1990; Bushman and Smith, 2001; Khanna *et al.* 2004) states that financial statements are an important mechanism for mitigating and controlling market imperfections. From this perspective, when the firm prepares financial statements under IFRS, they are improving the relationship between the firm and outside stakeholders, who may rely on high quality accounting information. As such, firms that adopt IFRS are supposed to show some kind of features (firm characteristics) that may categorize them in a certain way. For instance, firms that adopt IFRS "are larger, more internationally diversified, less capital intensive and have a more diffuse ownership" (Dumontier and Raffournier, 1998, p.240), European firms with a lower debt to equity ratio mainly adopt IFRS (El-Gazzar *et al.* 1999) and Swiss firms that adopt IFRS have a higher percentage of foreign sales and a higher number of foreign exchange listings (Murphy, 1999); moreover, these firms have a higher rate of foreign sales, are bigger in size, are more profitable and have been audited by a large audit firm (Benau and Grima, 2002). In addition, Street and Gray (2000) find that firms complying with IFRS disclosure requirements tend to have a US or foreign listing and need to be audited by a large audit firm. Al-Basteki (1995), researching Bahraini firms, indicates that only the external auditor influences the choice of IFRS.

While the literature has focused attention mainly on public firms (e.g. Dumontier and Raffournier, 1998; Ortiz, 2005), prior literature on the determinants of the voluntary adoption of IFRS by private firms is scarce. In fact, we found only three studies.

Francis *et al.* (2008) investigate the reasons why small and medium-sized private firms in 56 countries in the world adopt IFRS. They build their study on prior researches, which posit that the higher quality of financial statements may reduce information asymmetry and facilitate contracting with external parties (agency theory). The authors, according to the agency theory, argue that firms are more likely to adopt IFRS voluntarily if they have stronger contracting incentives (measured by expected future growth opportunities, current external financing, foreign owners, export sales, corporate ownership structure and firm size) and/or influential country-level institutional factors. However, the study of Francis *et al.* (2008) is subject to a number of limitations. First, the survey data employed is questionable because the answers of the respondents are likely to be biased. Second, as Nobes (2010) explained, the research sample includes countries where private firms are required to comply with IFRS or their use is not permitted at all. Additionally, the dependent variable of the model (the probability of adopting IFRS) used in the study may be subject to a measurement error. Finally, Francis *et al.* (2008) do not specify whether or not they analyze the

adoption of IFRS in consolidated or separate financial statements – or both.

Cameran and Campa's (2009) study explores the reasons why Italian private firms voluntarily adopt IFRS in their separate financial statements. The authors build their study on prior researches and hypothesize that agency conflict may influence the adoption of high quality accounting standards. Using archival data they select a two-paired sample of firms that voluntarily adopt or do not adopt IFRS. To analyze the two samples they adopt the descriptive analysis methodology as the "two sample paired t-test" and the "two proportions t-test". In their analysis, they consider firm (size, foreign activity and leverage) and corporate governance (independence of the manager or directors, ownership concentration and manager ownership) incentives that could influence the voluntary adoption of IFRS.

Finally, Bassemir (2011) investigates the reasons why German firms adopt IFRS in their consolidated financial statements, positing that they do this if, in expectation, the benefits related to IFRS outweigh the costs. The benefits of IFRS adoption can be expected to vary across private firms and countries, so they are more likely to materialize in an environment where financial statements play a stronger role in reducing information asymmetries between managers and outsiders, such as shareholders, creditors, bankers, suppliers and customers. Bassemir (2011) argues that the benefits of IFRS adoption can be expected to increase in line with the strength of a firm's reporting incentives, which the author deduces based on literature concerning public firms (e.g. Dumontier and Raffournier, 1998; Gassen and Sellhorn, 2006; Christensen *et al.* 2008). Unfortunately, though, Bassemir (2011) refers to consolidated financial statements. Unlike prior literature, our paper analyzes the determinants of the voluntary adoption of IFRS in the separate financial statements of private firms. As a theoretical framework we use the positive accounting theory (Watts and Zimmermann, 1986).

2.2. Hypothesis Development

In this paper we retain the positive accounting theory (PAT) as an explanatory background because one of its main objectives is the explanation of firms' accounting choices related to the agency relationship and political costs (Watts and Zimmermann, 1990). The PAT has been considered one of the most innovative and controversial (Watts and Zimmerman, 1990) theories in accounting since the mid-1970s. Watts and Zimmermann (1990, p.148) point out that the reason for using the word "positive" was to "emphasize that accounting theory's role is to provide explanations and predictions for accounting practice". With regard to financial statements, Watts (1977, p.54) points out that "the financial accounting literature concentrates on prescriptions: on what should be the content of financial statements. Very little attention is given to developing a theory to explain many interesting observed phenomena; in particular to explain why financial statements take their current form". Jensen (1976,

p.7) argues that the development of the PAT is linked to "explain[ing] why accounting is what it is, why accountants do want they do and what effects these phenomena have on people and resources utilization". In other words, the PAT attempts to explain observed phenomena by indicating how things should be, without indicating how they should be done (Schroeder *et al.* 2005, p.113). Finally, Watts and Zimmerman (1978, p.113) assert that a "… precondition of a positive theory of standard setting is understanding management's incentives" in choosing from accounting alternatives. As Watts and Zimmerman (1986, p.7) further state, the PAT "... is concerned with explaining accounting practice. It is designed to explain and predict which firms will and which firms will not use a particular method... but it says nothing as to which method a firm should use". Hence, the PAT could be employed to produce prescriptions for government accounting policy and/or for the international standard setter, for example, for accounting standards (Watts and Zimmerman, 1986), but the normative aspect is based on positive (i.e. empirical) evidence.

The basic assumption regarding the positive accounting theory, never applied to private firms, is that the firm is a "nexus" of contracts, and accounting methods and choices constitute an integral part of this set of contracts (Sunder, 1997). As such, accounting numbers and choices are used to write, monitor and enforce these contracts (Sunder, 1997). This "information perspective" (Watts and Zimmermann, 1990, p.132) has been used to explain the market's use of accounting numbers, but it has not provided a hypothesis to predict and explain accounting choices (Watts and Zimmermann, 1990).

Italian accounting standards and regulation are much less stringent (e.g. art. 2423 and following the Italian Civil Code and Italian domestic accounting standards adopt the concept of realized income) than international standards as far as valuation rules and disclosure requirements are concerned. In Italy, creditor protection law formally permits income smoothing, while hidden reserves can be created and cancelled without limitation. Consequently, compliance with IFRS implies additional disclosure and renunciation through to considerable discretion in accounting choices, which make the decision to adopt IFRS probably more burdensome for Italian private firms than for firms from countries with a higher degree of accounting regulation.

In our study we retain the classical variables issued from the PAT as firm size and the leverage because they are compatible with the aim of our work. However, to these explanatory variables we also add other variables, namely the nationality of shareholders, ownership structure (family control or not), the presence of independent managers, the legal form of the firm, subsidiary status, auditor body and, finally, industry sector. All of these indicators are proxies for firms' incentives that may drive the decision to adopt IFRS voluntarily. Finally, in this paper we do not analyze the influence of the taxation law effect on the decision not to adopt IFRS because the recent Italian reform of company law (Legislative Decree n. 6/2003) has reduced the strong interdependence between accounting and

tax law. The above-cited Decree, in fact, eliminated the commercial rule allowing fiscal items in financial statements, with related disclosures in the notes. Besides, Decree Legislative n. 344/2003 eliminated the fiscal rule that made it compulsory to include certain expenses in firms' profit and loss accounts that made them eligible for deduction from tax accounts (Delvaille *et al.* 2005). The interdependence between net income and tax income was enhanced by other Decrees (e.g. Legislative Decree n. 38/2005, articles 11-13; article 83 of the Consolidated Income Tax Law – in Italian the "Testo Unico delle Imposte sui Redditi"; D.P.R. (Decree issued by the President of the Italian Republic) 916/86; Minister Decree n. 48 of 1st April, 2009; Legislative Decree 6th July 2011, N° 98). In Italian civil law, the legislator inserted a clause limiting the distribution of reserves and unrealized gains derived from fair value criteria also showing an orientation towards prudence (Sottoriva, 2005, p.591). The Italian legislator is working to reach substantial fiscal neutrality in order to avoid a scenario whereby taxable income is computed differently in firms adopting IFRS compared to those firms adopting Italian accounting standards (Del Fabbro, 2005; Giornetti, 2005). However, we argue that the reconciliation between IFRS and taxation law (after the reform) requires highly professional skills.

2.2.1. Size

Studies on voluntary disclosure find that larger firms provide stakeholders with more disclosure (e.g. Watts and Zimmermann, 1986; Chow and Wong-Boren, 1987; Cooke, 1992; Ashbaugh, 2001) than smaller firms, since their higher visibility can easily lead to more litigation (Watts and Zimmerman, 1978; Bujaki and Richardson, 1997; Daske *et al.* 2008). Higher political costs, caused by higher public exposure, and agency costs, caused by more widely diluted ownership, may also drive larger firms to make more disclosures voluntarily (Meek *et al.* 1995) by adopting IFRS and increasing the transparency and comparability of their financial information (e.g. Meek *et al.* 1995; Dumontier and Raffournier, 1998). Moreover, there should be a relationship between the decision to adopt IFRS voluntarily and the cost of additional disclosure. Therefore, the costs of disclosure appear to be decreasing according to firm size. Actually, it seems reasonable that the adoption of IFRS represents a commitment to make more disclosures than would be required under national accounting standards (Cuijpers and Buijink, 2005). However, disclosing detailed information is less costly for larger firms because they also produce accounting information for internal purposes (Singhvi and Desai, 1971). Finally, Kvaal and Nobes (2010) find that size is a determinant of accounting choice when it comes to deviation from domestic accounting standards to IFRS. Consequently, we expect that larger private firms gain net benefits by switching to IFRS. Based on these arguments, we state the following hypothesis:

H$_1$: The voluntary adoption of IFRS is associated positively with firm size.

2.2.2. Corporate Governance

Firm ownership structure and manager independence can be expected to reflect the need for high quality accounting information. Private firms are, in general, characterized by high ownership concentration (e.g. Ball and Shivakumar, 2005; Cuijpers and Buijink, 2005; Burgstahler *et al.* 2006; Francis *et al.* 2008; Cole *et al.* 2011). Trial evidence suggests that majority shareholders in closely held firms are knowledgeable about firm operations and, in general, are involved in management (Nagar *et al.* 2011). In this case, corporate governance strength is associated positively with conservative and prudent accounting choices (Verriest *et al.* 2012). Prior researches on corporate governance find that having multiple large owners is effective in mitigating the expropriation problem (Pagano and Roell, 1998; Bennedsen and Wolfenzon, 2000; Gomes and Novaes, 2005) because no individual shareholder has sufficient votes to control the firm unilaterally (Pagano and Roell, 1998). Therefore, if shareholders hold a large stake in the firm, dependence on high quality public disclosure is likely to be less because the block holder can directly monitor the individual shareholder and management (Cuijpers and Buijink, 2005, pp.497-498). Cascino *et al.* (2010) state that family firms are those in which 50% of the voting rights or outstanding shares (either direct or indirect) are held by a family block holder. Based on these arguments, and considering that the Italian literature (e.g. Vigano, 2006 and 2007; Mussolino, 2006; Ricciardi, 2009; Vinciguerra and Cipullo, 2009) finds that Italian private firms are wholly or partially family-owned, we state the following hypothesis for our sample:

H$_{2a}$: The probability of the voluntary adoption of IFRS decreases with increases in the firm's ownership concentration.

The separation between ownership and control creates agency conflicts between management and shareholders (Jensen and Meckling, 1976; Watts and Zimmermann, 1986) and increases the need for management monitoring (Ang *et al.* 2000; Vander Bauwhede and Willekens, 2008). To reduce agency problems and incur in net benefits, firms with strong ownership separation are likely to adopt IFRS as a signal of financial transparency (Francis *et al.* 2008).

Wu *et al.* (2007) find that managers play a key role in supervising public firms' financial reporting processes and the quality of financial reporting. The authors also find that strengthening managers, such as by enhancing board independence, improving aptitudes to detecting problems in financial statements and clarifying directors' responsibilities, is regarded as an efficient way to improve the quality of financial reporting. Since independent managers in Anglo-Saxon countries have personal motives to perform their supervision duties, in order to maintain and develop their own reputations in the market, the introduction of independent directors will improve the board's supervision efficiency over managerial personnel

(Fama and Jensen, 1983). However, the corporate governance literature (e.g. Nagar *et al.* 2011) states that a fundamental feature of closely held firm ownership is that shareholders are typically few in number, knowledgeable about firm operations and are often involved in day-to-day management. The Italian literature (e.g. Ricciardi, 2009; Vinciguerra and Cipullo, 2009) finds that in Italian private firms there is often no separation between ownership and management, in which case we argue that Italian private firms do not have particularly high incentives to adopt IFRS when the owners represent at least 50% of the board of director. Based on these arguments, and in contrast with prior literature on private firms (e.g. Bassemir, 2011), we state the following hypothesis for our sample:

H$_{2b}$: Firms with weak separation between ownership and management are less likely to adopt IFRS voluntarily.

2.2.3. Foreign Owners

Previous studies indicate that foreign investments facilitate growth (e.g. Alfaro *et al.* 2004). However, foreign shareholders must rely on credible accounting information because they find it more costly to be knowledgeable about a firm that complies with domestic accounting standards. Hence, the voluntary adoption of IFRS is one way of signaling accounting credibility and financial transparency to potential foreign investors (Francis *et al.* 2008). Moreover, IFRS allow foreign shareholders to better monitor the performance and the financial position of the firm (Khanna *et al.* 2004). Hence, according to Francis *et al.* (2008), we expect that the firm is more likely to adopt voluntarily IFRS if the nationality of one or more owners is different than the domicile of the firm. Based on these arguments, we state the following hypothesis:

H$_3$: The probability of voluntarily adopting IFRS increases when the firm has one or more foreign owners.

2.2.4. Leverage and Profitability

A firm's corporate governance structure is also related to leverage because it is a proxy of the insider orientation of the firm (Cuijpers and Buijink, 2005, p. 497). In fact, the literature on public firms (e.g. Meek *et al.* 1995; Wallace and Naser, 1995) argues that voluntary disclosures can be expected to increase with leverage. In fact, in firms with more debt, are larger the potential wealth transfers from debt holders to stockholders and managers (Cuijpers and Buijink, 2005). However, Zarzeski (1996) expects to find a negative relationship between voluntary disclosures and leverage because he assumes that firms with high leverage are often located in countries with strong banking relationships. Private firms establish close ties and communicate more on a private basis with their lending bank, which in turn should reduce their incentives to provide higher quality public reporting

(e.g. Peek *et al.* 2010) because the banks may rely on private relationships with firms. Thus, the relationship between leverage and IFRS adoption is not clear a priori (Bassemir, 2011). In addition, Dumontier and Raffournier (1998) and Gassen and Sellhorn (2006) find no association between leverage and IFRS adoption for Swiss and German public firms. As Italian private firms are traditionally financed by bank loans (e.g. Ricciardi, 2009; Vinciguerra and Cipullo, 2009), according to prior literature on private firms (Bassemir, 2011), we argue that a firm with a strong bank relationship has less incentive to adopt IFRS.

Based on these arguments, we state the following hypothesis:

H$_{4a}$: Firms with a strong bank relationship are less likely to adopt IFRS voluntarily.

Prior literature on public firms (Dumontier and Raffournier, 1998) hypothesizes that IFRS compliance by profitable firms should increase because IFRS makes earnings management more difficult and these firms could reduce earnings volatility perceived by the market. Meek *et al.* (1995) state that more profitable public firms have high incentives to adopt IFRS voluntarily in the hope of raising cheaper capital. Therefore, the relationship between profitability and IFRS adoption is related to the relationship between firms and capital providers (e.g. the stock market). Conversely, Leuz (2000) finds that the propensity to adopt IFRS decreases with profitability because associated costs are substantial compared to the benefits of communicating high profitability. Instead, Bassemir (2011) formulates a non-directional hypothesis because the findings of previous studies are conflicting. As such, and considering that Italian firms are mainly bank-based and have a strong one-to-one relationship with their main capital provider (Ricciardi, 2009; Vinciguerra and Cipullo, 2009), we hypothesize that private firms do not have strong incentives to adopt IFRS because they do not expect to incur net benefits from doing so.

Based on these arguments, we state the following hypothesis:

H$_{4b}$: The voluntary adoption of IFRS decreases with the firm's profitability.

2.2.5. Subsidiary Status

As Legislative Decree n. 38/2005 also permits the voluntary adoption of IFRS by firms other than subsidiaries, we aim to analyze whether or not subsidiary status significantly influences the decision to adopt IFRS voluntary by private firms. To prepare consolidated financial statements, the parent company has to consolidate financial information within the group and, hence, this could facilitate the adoption of high quality accounting standards that limit managerial discretion in evaluation. In fact, reconciled Italian accounting numbers presented by subsidiaries are less informative than IFRS numbers (Hail *et al.* 2010). Prior literature does not

provide findings on this argument, but based on these arguments we state the following hypothesis:

H$_{5a}$: The voluntary adoption of IFRS increases if the private firm is a subsidiary.

Moreover, to enhance within group reporting comparability, subsidiaries may be required by the parent company to follow the same financial reporting and disclosures model of the parent company. Therefore, it is arguable that if the parent company prepares separate and consolidated financial statements according to IFRS, any subsidiaries may also follow this method. Past researches do not provide findings on this relationship; however, based on these arguments we state the following hypothesis:

H$_{5b}$: The voluntary adoption of IFRS increases if the parent company complies with IFRS.

2.2.6. Legal Form

Italian civil law distinguishes between incorporated and non-incorporated entities, which differ in several major respects that may reduce the probability of switching from domestic accounting standards to IFRS. For instance, incorporated firms have a separate legal personality (non-incorporated firms do not). In addition, the liability of the owners of incorporated firms is limited, while the owners of a non-incorporated firm are fully liable in line with their entire personal asset holding. Furthermore, owners of incorporated firms may not be involved actively in day-to-day management, which may create agency conflicts that enhance the need for monitoring (Ang *et al.* 2000). Instead, in non-incorporated firms the partners are not only the owners, but also the managers of the firm (Bassemir, 2011). Moreover, incorporated firms are divided into two groups. The first group is made up of stock corporations (nowadays, in Italy, stock corporations may have only one shareholder) in which equity capital is represented by shares. The second group consists of limited liability companies in which equity capital is not represented by shares. The number of owners and the distance between ownership and management are likely to be greater for stock corporations, which in turn increases the demand for high quality accounting information for monitoring management. Hence, according to the previous literature (Francis *et al.* 2008; Bassemir, 2011), we argue that private firms are more likely to adopt IFRS when they are incorporated as stock corporations (in Italian, "Società per Azioni").

Based on these arguments, we state the following hypothesis:

H$_6$: Firms are more likely to adopt IFRS if they are incorporated as stock corporations.

2.2.7. Auditing Expertise

Several authors suggest that private firms may prefer to hire auditors of superior reputation in order to signal higher financial reporting quality (e.g. Chaney *et al.* 2004; van Tendeloo and Vanstraelen, 2008) regarding their efforts to reduce agency conflicts (Watts and Zimmermann, 1986). The 'Big Four' audit firms are considered to provide higher quality audits (e.g. DeAngelo, 1981; Piot and Janin, 2007). Therefore, incumbent Big Four auditors may indicate that firms attach a higher value to financial reporting quality than non-Big Four audited accounts.

However, there are also reasons to believe that the adoption of IFRS is a consequence of a Big Four audit firm appointment, as hiring a Big Four audit company is more advantageous than employing other auditors (in Italy firms may be audited by the Board of Statutory Auditors, in Italian the "Collegio Sindacale") when it comes to implementing IFRS in private firms. Besides, given their prior experience with IFRS transition in public firms they have a strong specialisation in the switch to IFRS and can rely on an international network (e.g. Hail *et al.* 2010). However, we rely a great deal on this second effect.

Based on these arguments, and according to the previous literature (Bassemir, 2011), we hypothesize that a firm audited by a Big Four audit company is more likely to adopt IFRS voluntarily than a non-Big Four audited firm:

H₇: The probability of adopting IFRS voluntarily increases when the firm is audited by a Big Four audit company.

2.2.8. Industry

As a control variable, we also test for industry effects in the choice between local accounting standards and IFRS. The level of voluntary disclosure may differ between industries because of industry-specific accounting regulation, competitive pressures (Cooke, 1992) or proprietary costs (Meek *et al.* 1995), and these factors may also cause industry differences in the costs and benefits of adopting IFRS. The industry analysis reveals that manufacturing firms (SIC codes 2 and 3) are more likely to use non-local GAAP, whereas firms in agriculture, forestry, fishing, mining and construction (SIC codes 0 and 1) and retail and wholesale trade (SIC code 5) are less likely to adopt IFRS or the US's GAAP. There are no significant differences for firms in transportation, communications, electric, gas and sanitary services (SIC code 4) and "general" services (SIC codes 7 and 8). Concerning EU public firms, Cuijpers and Buijink (2005) find that firms in transportation, communications, electric, gas and sanitary services (SIC code 4; two-digit codes 40-49) are more likely to use IFRS. Ortiz (2005) states the same results. However, while Ortiz (2005) finds that firms in service operations (SIC code 7; two-digit codes 70–89) are more likely to adopt IFRS, Cuijpers and Buijink (2005) establish that these firms are less

likely to use IFRS.

As such, and consistent with Cook (1992) and Meek *et al.* (1995), we expect that manufacturing firms are more likely to use IFRS than non-manufacturing firms because they are more capital intensive than other firms. Based on these arguments, we state the following hypothesis:

H$_8$: The voluntary adoption of IFRS increases when the firm is a manufacturer.

3. Research Design and Methodology
3.1. Sample Selection and Collection of Data

Our sample period starts in 2009. We do not examine an earlier period because, firstly, Legislative Decree 38/2005 permits the voluntary adoption of IFRS in the separate financial statements of private firms starting from 2006. The second reason is that from 2006 to 2009 we find a low IFRS adoption rate (about 0.60% of potential IFRS adopters).

Accounting, financial and corporate governance structure data were collected from the AIDA Database on 24th April 2011, when the number of Italian private firms meeting the legal requirements necessary to adopt IFRS voluntary in their separate financial statements (the potential IFRS adopters) stood at 46,184. IFRS adopters, instead, constitute only 479 (479/46.184 = 1.04%) of the population.

We find that the AIDA Database provides full and clear accounting, financial and corporate governance firm information only for 103 IFRS adopters (out of 479). Next, to control the significance of the determinants of IFRS adoption, we choose a sub sample of 103 non-IFRS adopters comparable with IFRS adopters. We select the non-IFRS adopters based on three criteria (Cameran and Campa, 2009): total assets, e net equity and ROE for 2009. Then, for each criterion we calculate a range of +/- 3%. Finally, we select the sub sample of 103 non-IFRS adopters whose total assets, net equity and ROE for 2009 are included in the above range. Before selecting the final sub sample of non-IFRS adopters, we remove the firms for which the AIDA Database does not provide full and clear information.

The selection criteria of the sub sample of non-IFRS adopters are not included in the regression analysis. Moreover, we classify IFRS and non-IFRS consistent with Legislative Decree (L.D.) 38/2005, which permits to Italian private firms the voluntary adoption of IFRS in their separate financial statements. These results are shown in Table 1.

Table 1. Sample of IFRS and non-IFRS adopters (L.D. 38/2005)

Italian private firms that meet the law criteria	*Total*	*Italian Gaap*	*IFRS*
a) Subsidiaries (private firms) of parent companies that must prepare the consolidated financial statements according to the IFRS	198	96	102
b) Private parent companies that prepare the consolidate financial statements	0	0	0
c) Other private firms (excepted those that could prepare the abridged financial statements, article 2435-*bis* of Italian Civil Code)	8	7	1
Total Sample	206	103	103

Table 1 indicates that 198 firms out of 206 (about 96%) are subsidiaries of a parent company and only eight firms (about 4%) are not. Moreover, within the subsidiaries (*sub a*) only 102 firms (about 52%) are IFRS adopters, while 96 firms (about 48%) are non-IFRS adopters. Within the non-subsidiaries firms (*sub c*) only one firm (about 12%) out of eight has adopted IFRS voluntarily. These first findings reveal that the status of subsidiaries seems to influence the decision to adopt IFRS voluntarily.

3.2. Model Specification and Variables Measurement

To answer the research question (what firm characteristics predict voluntary IFRS adoption?) we use a logistic model regression because the dependent variable (IFRS) is dichotomous. This variable assumes the value 1 if the firm adopts IFRS and the value zero otherwise. The regression model (1) takes the following general form:

$$Prob(IFRS = 1) = \alpha_i + \beta_{1i,t}SIZE + \beta_{2i,t}OWN + \beta_{3i,t}INDMAN + \beta_{4i,t}FOWN + \beta_{5i,t}LEV + \beta_{6i,t}PROF + \beta_{7i,t}GROUP + \beta_{8i,t}GROUPIRFS + \beta_{9i,t}STOCK + \beta_{10i,t}AUDIT + \beta_{11i,t}IND + \varepsilon_{ni} \quad (1)$$

In table 2 we show the measurement of the independent variables used in the paper.

Table 2. Measurement of Explanatory Variables

Independent variable	Expected Sign		Variable description
i, t		=	Firm i, Year 2009
$SIZE_{i,t}$	+	=	Firm size, proxied by the net sales of the year. The natural logarithm of this proxy is used for the logistic regression.
$OWN_{i,t}$	-	=	Ownership concentration, proxied by family control and closely held ownership. The AIDA database provides information about the family control of the firms. OWN is a dummy variable taking the value one if at least the 50% of the voting rights or outstanding shares (either direct or indirect) are held from a family block holder. Otherwise the dummy variable is zero.
$INDMAN_{i,t}$	-	=	Independent managers, proxied by the presence of one ore more independent managers in the board of directors. The AIDA Databases provides information about the independence of the managers. INDMAN is a dummy variable that measure whether the manager is an owner. The variable takes the value one if one or more managers are not also owners. To capture this information, for each owner and manager we checked for the name, the surname and the birthday. Otherwise the dummy variable is zero.
$FOWN_{i,t}$	+	=	Foreign owners, proxied by the number of foreign shareholders in the year. FOWN is a dummy variable taking the value one if firm has one or more foreign owner. Otherwise the dummy variable is zero.
$LEV_{i,t}$	-	=	Leverage, proxied by the rate: financial debt /Total Assets (in the year 2009).
$PROF_{i,t}$	-	=	Return on Asset proxied by the firm' profitability.
$GROUP_{i,t}$	+	=	Subsidiaries status proxied by a dummy variable taking the value one if the firm is a subsidiary of a parent company. Otherwise the dummy variable is zero.
$GROUPIFRS_{i,t}$	+	=	GROUPIFRS is a dummy variable taking the value one if parent firm prepare the consolidated financial statements according to IFRS. Otherwise the dummy variable is zero.
$STOCK_{i,t}$	+	=	Legal form, proxied by incorporated status. STOCK is a dummy variable taking the value one if firm is incorporated as a stock corporation (in Italian, "Società per Azioni"). Otherwise the dummy variable is zero.
$AUDIT_{i,t}$	+	=	Auditor type, proxied by a dummy variable taking the value one if a firm is audited by a Big 4 audit firm. Otherwise the dummy variable is zero.
$IND_{i,t}$	+	=	Industry type, proxied by a dummy variable taking value one if a firm is a manufacturing firms (SIC codes 2 and 3) and the value zero otherwise.

4. Research Results
4.1. Descriptive Statistics

Tables 3 and 4 present the sample distribution (the descriptive statistic) of IFRS and non-IFRS adopters, respectively. In Panels A and B of Table 3 we show the descriptive statistics of the continuous and dichotomous variables, respectively, for IFRS adopters. In Panels C and D of Table 4 we show the descriptive statistics of the continuous and dichotomous variables, respectively, for non-IFRS adopters.

To provide the basis for analysis and comparison with prior studies, we note that both IFRS and non-IFRS adopters are greater because they exceed two of the three thresholds provided by the Regulation of European Parliament and the Council CE N° 364/2004 of 25th February 2004 (the size of European firms) necessary to be considered a small or medium-sized firm. In fact, IFRS adopters have, on average, total assets (not tabulated) of about 402 million euros (threshold 43 million) and a total revenue of about 357 million euros (threshold 50 million). Conversely, non-IFRS adopters have, on average, total assets (not tabulated) of about 93 million and total revenue of about 127 million euros.

Table 3. Descriptive statistics of variables (IFRS adopters)

Panel A: Continuous variables							
Variable	Obs.	Mean	S.E.	Median	SD	Variance	Min	Max
SIZE	103	10.742	0.167	10.570	1.695	2.874	7.10	16.51
PROF	103	0.036	0.013	0.026	0.135	0.018	-0.51	0.48
LEV	103	0.155	0.019	0.050	0.197	0.039	0.00	0.76
Panel B: Dichotomous variables							
Variables	Obs.	Mean	S.E.	Median	SD	Variance	Min	Max
IFRS	103	1	0.000	1	0.000	0.000	1	1
FOWN	103	0.19	0.039	0	0.397	0.158	0	1
OWN	103	0.44	0.049	0	0.498	0.248	0	1
INDMAN	103	0.86	0.034	1	0.344	0.119	0	1
GROUP	103	0.99	0.010	1	0.099	0.010	0	1
GROUPIFRS	103	0.79	0.041	1	0.412	0.170	0	1
STOCK	103	0.63	0.048	1	0.485	0.235	0	1
AUDIT	103	0.62	0.048	1	0.487	0.238	0	1
IND	103	0.50	0.050	0	0.502	0.252	0	1

Notes: This table presents descriptive statistics on the dependent variable and the explanatory variables for the full sample of IFRS adopters. Continuous variables and dichotomous variables are reported in Panel A and B, respectively. For variable definitions, see Table 2. In the main regression analysis, we use the logistic model that considers the IFRS and non-IFRS sample to be drawn from an identical population.

Table 4. Descriptive statistics of variables (non-IFRS adopters)

Panel C: Continuous variables

Variable	Obs.	Mean	S.E.	Median	SD	Variance	Min	Max
SIZE	103	10.350	0.147	10.210	1.495	2.235	6.87	15.50
PROF	103	0.037	0.143	0.028	0.145	0.021	-0.42	0.55
LEV	103	0.097	0.017	0.000	0.177	0.031	0.00	0.85

Panel D: Dichotomous variables

Variables	Obs.	Mean	S.E.	Median	SD	Variance	Min	Max
IFRS	103	0.00	0.000	0	0.000	0.000	0	0
FOWN	103	0.65	0.047	1	0.479	0.230	0	1
OWN	103	0.38	0.048	0	0.487	0.238	0	1
INDMAN	103	0.86	0.034	1	0.344	0.119	0	1
GROUP	103	0.93	0.025	1	0.253	0.064	0	1
GROUPIFRS	103	0.21	0.041	0	0.412	0.170	0	1
STOCK	103	0.48	0.049	0	0.502	0.252	0	1
AUDIT	103	0.56	0.049	1	0.498	0.248	0	1
IND	103	0.55	0.049	1	0.500	0.250	0	1

Notes: This table presents descriptive statistics on the dependent variable and the explanatory variables for the full sample of non-IFRS adopters. Continuous variables and dichotomous variables are reported in Panel C and D, respectively. For variable definitions, see Table 2. In the main regression analysis, we use the logistic model that considers the IFRS and non-IFRS sample to be drawn from an identical population.

IFRS adopters, on average, are more leveraged (mean = 15.5%) than non-IFRS adopters (mean = 9.7%). Finally, profitability value, on average, is similar in IFRS and non-IFRS adopters.

In order to help in the interpretation and comparison processes, dummy variables used in the analysis are reported on a per-firm level (frequency and percentage) in Table 5 and Table 6 for both IFRS and non-IFRS adopters, respectively.

Table 5. Frequency of dichotomous variables (IFRS adopters)

Variables	FOWN		OWN		INDMAN		STOCK		GROUP		GROUPIFRS		AUDIT		IND	
	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1
Frequency	83	20	58	45	14	89	38	65	1	102	22	81	39	64	52	51
Percentage	80.6	19.4	56.3	43.7	13.6	86.4	36.9	63.1	1.0	99.0	21.4	78.6	37.9	62.1	50.5	49.5

Notes: This table presents the frequencies of dichotomous variables of IFRS adopters. The total of the observations (the sum of the value one and value zero) of each variable is 103 (total of the sample). The percentage is computed by each variable on the total of observations (103).

Table 6. Frequency dichotomous variables (non-IFRS adopters)

Variables	FOWN		OWN		INDMAN		STOCK		GROUP		GROUPIFRS		AUDIT		IND	
	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1
Frequency	36	67	64	39	14	89	54	49	7	96	81	22	45	58	46	57
Percentage	35.0	65.0	62.1	37.9	13.6	86.4	52.4	47.6	6.8	93.2	78.6	21.4	43.7	56.3	44.7	55.3

Notes: This table presents the frequencies of dichotomous variables of non-IFRS adopters. The total of the observations (the sum of the value one and value zero) of each variable is 103 (total of the sample). The percentage is computed by each variable on the total of observations (103).

The analysis reveals that, on average, 19.4% of IFRS adopters have at least one foreign owner, while this percentage rises to 65% in non-IFRS adopters. In addition, IFRS adopters have a higher ownership concentration (43.7%) compared to non-IFRS adopters (37.9), and 86.4% of IFRS and non-IFRS adopters have at least one independent manager. Within IFRS adopters, stock corporations represent 63.1% of the sample, while within the non-IFRS sample they make up 47.6%. A total of 99% of IFRS adopters are subsidiaries; moreover, 78.6% of their parent companies comply with IFRS when preparing consolidated financial statements. In comparison, 93.2% of non-IFRS adopters are subsidiaries. Unlike IFRS adopters, only 21.4% of parent companies comply with IFRS when preparing consolidated financial statements, which suggests that the adoption of IFRS by the parent company seems to influence the adoption of IFRS private subsidiaries. Furthermore, the 62.1% of IFRS adopters are audited by a Big Four audit firm (PwC, Ernst & Young, Kpmg or Deloitte Touche Tohmatsu), while for non-IFRS adopters this figure is 56.3%.

A Pearson correlation coefficient test for the variables is summarized in Table 7. Almost all of the explanatory variables have a positive correlation with the dependent variable IFRS, except FOWN (-0.462), PROF (-0.005) and IND (-0.058). The lowest positive correlation is with INDMAN (0.000), while the highest is with GROUPIFRS (0.573). Among the independent variables, the strongest correlations are between INDMAN and GROUP (0.433), STOCK and SIZE (0.314), OWN and FOWN (-0.449) and OWN and INDMAN, with a correlation coefficient of -0.449. Otherwise, correlations between the independent variables are rather moderate, indicating that each variable captures different information about the likelihood of adopting IFRS voluntarily.

Table 7. Correlation Matrix

	IFRS	SIZE	FOWN	OWN	INDMAN	INC	GROUP	GROUPIFRS	AUDIT	LEV	PROF	IND
SIZE	0.123	1.000										
	(0.040)											
FOWN	-0.462	0.081	1.000									
	(0.000)	(0.125)										
OWN	0.059	-0.096	-0.449	1.000								
	(0.199)	(0.084)	(0.000)									
INDMAN	0.000	0.196	0.253	-0.449	1.000							
	(0.500)	(0.002)	(0.000)	(0.000)								
INC	0.156	0.314	-0.003	-0.188	0.100	1.000						
	(0.012)	(0.000)	(0.484)	(0.003)	(0.077)							
GROUP	0.151	0.188	0.121	-0.191	0.433	0.072	1.000					
	(0.015)	(0.003)	(0.042)	(0.003)	(0.000)	(0.151)						
GROUPIFRS	0.573	0.098	-0.147	-0.020	0.028	0.059	0.151	1.000				
	(0.000)	(0.080)	(0.017)	(0.389)	(0.343)	(0.201)	(0.015)					
AUDIT	0.059	0.289	-0.070	0.045	0.161	0.089	0.089	0.000	1.000			
	(0.199)	(0.000)	(0.157)	(0.259)	(0.010)	(0.101)	(0.102)	(0.500)				
LEV	0.155	0.054	-0.086	0.082	-0.061	0.144	-0.076	-0.056	0.029	1.000		
	(0.013)	(0.220)	(0.109)	(0.120)	(0.194)	(0.019)	(0.139)	(0.211)	(0.341)			
PROF	-0.005	0.145	0.007	-0.028	0.026	-0.018	-0.036	0.071	-0.097	-0.122	1.000	
	(0.471)	(0.019)	(0.461)	(0.343)	(0.357)	(0.399)	(0.302)	(0.154)	(0.082)	(0.040)		
IND	-0.058	0.049	0.027	-0.001	-0.066	0.024	0.110	0.000	0.060	0.020	0.119	1.000
	(0.203)	(0.243)	(0.348)	(0.496)	(0.174)	(0.365)	(0.057)	(0.500)	(0.195)	(0.389)	(0.045)	

Note: This table reports the Pearson correlation based on 206 firm-observations of the full sample in the year 2009. For variable definitions, see Table 2. P-values are presented in parentheses.

To determine the extent of multicollinearity in our regression analysis, we compute the variance inflation factor (VIF) for each variable in equation (1). In general, there is not a high correlation among the variables, and since these values do not exceed 2 for any independent variable, we conclude that multicollinearity does not present a severe problem in our analysis (Table 8).

Table 8. Collinearity Statistics

Variables	Tolerance	VIF
SIZE	0.762	1.313
PROF	0.748	1.337
LEV	0.639	1.566
FOWN	0.631	1.586
OWN	0.842	1.188
INDMAN	0.759	1.318
GROUP	0.928	1.078
GROUPIFRS	0.858	1.165
STOCK	0.941	1.063
AUDIT	0.918	1.089
IND	0.951	1.051

Notes: This table reports the collinearity statistics on 206 firm-observations of the full sample in the year 2009. For variable definitions, see Table 2.

Table 9 presents the classification table of the observations (SPSS®). The results show that the model well fits data (85.4%).

Table 9. Classification table of the logistic regression model

			Predicted		
	Observed		IFRS		Percentage Correct
			0	1	
Step 1	IFRS	0	88	15	85.4
		1	15	88	85.4
	Overall Percentage				85.4

Note: the cut value is 0.500.

4.2. Main Results of the Logistic Analysis

Table 10 reports for the full sample the results of the logistic regression that identify the factors associated with private firms allowed by law (Legislative Decree N° 38/2005) to adopt IFRS for their separate financial statements. In the regression model we include a set of explanatory variables commonly used in the positive accounting theory and which are coherent with our study (firm size and leverage) (Watts and Zimmermann, 1986). To these determinants of IFRS adoption we add other explanatory variables related to the governance structure of the firms. The purpose of this model

is to analyze the effect of all these explanatory variables on the decision to adopt IFRS voluntarily. The regression table in the paper includes coefficient estimates, the p-value (in parenthesis), the odds ratio, the Cox & Snell (50%), closely aligned with the pseudo r-square, and the Nagelkerke (66.7%) r-square as a measure for the overall fit of the model. The pseudo r-square (50%) value confirms the overall percentage of the classification table (Table 9).

With the exceptions reported below, the descriptive findings are confirmed by the logistic regression analysis. Here, we provide the main significant findings for the statistically significant variables, following which we address relatively insignificant variables.

Table 10. Logistic Regression analysis

Variables	Expected Sign	Coefficient	S.E.	z-statistic	Wald	Sig.	Odds ratio
SIZE	+	0.218	0.157	1.39	1.919	0.166	1.243
FOWN	+	-3.416	0.596	-5.73	32.876	0.000***	0.033
OWN	-	-0.893	0.536	-1.67	2.776	0.096*	0.409
INDMAN	-	-0.085	0.803	-0.11	0.011	0.916	0.919
STOCK	+	0.524	0.474	1.11	1.222	0.269	1.688
GROUP	+	1.775	1.323	1.34	1.798	0.180	5.897
GROUPIFRS	+	3.509	0.535	6.56	43.081	0.000***	33.405
AUDIT	+	-0.023	0.479	-0.05	0.002	0.961	0.977
LEV	-	3.026	1.193	2.54	6.435	0.011**	20.608
PROF	-	-1.111	1.476	-0.75	0.566	0.452	0.329
IND	+	-0.541	0.437	-1.24	1.535	0.215	0.582
Constant		-4.230	1.893	-2.24	4.996	0.025	0.015

Notes: This table reports estimates of logistic regression. The model includes all observation of year 2009. For variable definitions, see Table 2. Stars indicate statistical significance: * $p < 0.1$; ** $p < 0.05$; *** $p < 0.01$.

The results of estimating equation (1), displayed in Table 10, show that the decision to switch voluntarily from local accounting standards to IFRS is significantly negatively related to the ownership concentration (OWN) of the firm and significantly positively related to the adoption of IFRS by the parent company (GROUPIFRS). These findings support the hypotheses H_{2a} and H_{5b}, respectively. Surprisingly, the results show that IFRS adoption is significantly negatively related to the presence of one or more foreign owners (FOWN), which does not support hypothesis H_3. It is remarkable that our finding on FOWN is consistent with the descriptive analysis (Tables 3 and 4) because it results in a higher average number of non-IFRS adopters (mean=0.65) having at least one foreign owner, compared to IFRS adopters (mean=0.19).

Moreover, we find that the voluntary adoption of IFRS is significantly positively related to leverage (LEV). This finding, however, does not support hypothesis H_{4a}. The result of our analysis shows that private firms have a greater propensity to adopt IFRS if they are more leveraged. It is remarkable that our finding is consistent with the descriptive analysis

(Tables 3 and 4) because it establishes that IFRS adopters have a leverage rate (mean=15.50%) higher than the non-IFRS adopters (mean = 9.70%) on average.

Below, we provide some considerations about statistically insignificant variables.

Firm size (SIZE) and incorporated status (STOCK) are not significantly positively related to IFRS adoption (the sign of the coefficient, however, is consistent with the expected sign of hypotheses H_1 and H_6, respectively). In all probability, the coefficient of SIZE is not significant because Legislative Decree N° 38/2005 requires that the Italian private firms that can comply voluntary with IFRS should also be big firms because they must prepare the full separate financial statements.

The independence of managers (INDMAN) is not significantly negatively related to IFRS adoption, which is consistent with hypothesis H_4. Our finding, even if the coefficient is not statistically significant, is consistent with our hypothesis that when owners are also involved in management, firms have fewer incentives to adopt IFRS voluntarily.

Even if IFRS adoption is positively related to the status of subsidiaries (consistent with hypothesis H_{5a}), the coefficient of GROUP is not statistically significant. Prior literature on the voluntary adoption of IFRS does not analyze this topic. However, it is noteworthy that this finding is consistent with the descriptive analysis (Tables 3 and 4) because it establishes that the mean of the subsidiary status of IFRS adopters (99%) is higher compared to non-IFRS adopters (93.2%). This finding shows that potential voluntary IFRS adopters are mainly subsidiaries.

The roles of auditor expertise (AUDIT) and industry sector (IND) are not significantly negatively related to IFRS adoption (the sign of the coefficient, moreover, is not consistent with hypotheses H_7 and H_8, respectively).

Finally, profitability (PROF) is not significantly negatively related to IFRS adoption, which is consistent with hypothesis H_{4b}.

In summary, the evidence provided in this section suggests that Italian private firms that are more leveraged, and where their parent company (it is arguable that they are subsidiaries, even if the coefficient of the variable GROUP is statistically not significant) complies with IFRS, are more likely to adopt IFRS.

5. Conclusion

In this paper we study the determinants of voluntary IFRS adoption by Italian private firms in separate full financial statements. In fact, Legislative Decree N. 38/2005 permits private firms that meet certain legal criteria (Table 1) to switch from Italian accounting standards to IFRS. The adoption of IFRS, instead, is forbidden for other Italian private firms.

In the empirical analysis, we focus on 206 Italian private firms, all potential IFRS adopters: 103 of them comply fully with IFRS and 103 (control sample) do not switch to IFRS. The descriptive analysis (Table 2)

shows that 198 firms out of 206 (about the 96%) are subsidiaries of parent company, while only eight (about the 4%) do not belong to this group. Moreover, within the subsidiaries group of firms (198), 102 (about the 52%) switched to IFRS, while 96 firms (about the 48%) are non-IFRS adopters. This means that the subsidiaries' status (even if the variable GROUP is not statistically significant) could influence the decision to adopt IFRS voluntarily, although this appears a necessary but not sufficient condition. Actually, we find that the probability of a subsidiary adopting IFRS in separate financial statements increases when the parent company complies with IFRS.

In the sample we find only eight firms that are not subsidiaries, and only one (about 12%) adopts IFRS voluntarily.

In absolute terms, the number of IFRS adopters identified in this paper (103) is higher (IFRS adopters in the population of the potentially IFRS adopters amount to 479), even if we cannot compare this result with prior literature (Francis *et al.* 2008; Bassemir, 2011) that considers the adoption of IFRS in consolidated and not separate financial statements.

The regression model shows that Italian private firms, in general, do not have strong firm incentives to switch voluntarily to IFRS because they do not expect to incur net benefits from following such a course of action. Furthermore, we find that Italian private firms are more likely to adopt IFRS voluntarily if they are more leveraged and their parent company prepares consolidated financial statements according to IFRS (the coefficient is statistically significant). The latter is probably the stronger determinant of IFRS adoption by Italian private firms. Our results concerning the variables OWN, FOWN, LEV, INDMAN are in line with the findings from the literature (Cuijpers and Buijink, 2005; Francis *et al.* 2008; Cameran and Campa, 2009; Bassemir, 2011). Our findings on leverage (LEV), however, are not consistent with Cuijpers and Buijink (2005), while SIZE, STOCK, AUDIT and IND are not in line with the findings from the wider literature (Cook, 1992; Meek *et al.* 1995; Cuijpers and Buijink, 2005; Bassemir, 2011). Finally, the findings on PROF are also not in line with the findings from the literature (Dumontier and Raffournier, 1998; Cuijpers and Buijnik, 2005; Bassemir, 2011).

Nevertheless, these outcomes do not suggest that IFRS adopters have strong asymmetry information compared to non-IFRS adopters. It seems reasonable instead that IFRS adopters are required to enhance the international comparability and transparency of their (separate) financial statements because their parent company follows the same procedure (Al-Basteki, 1995).

The results of this paper may be particularly relevant to regulators and the Italian Parliament, which introduced the chance to adopt IFRS voluntarily in the separate financial statements of private firms. In fact, the financial reporting of private firms has been the focus of both the IASB (e.g. IFRS for SMEs) and European institutions (e.g. harmonization of IV and VII EU Directives), whose purpose is to harmonize the financial statements of these firms across countries. Academic research, however, has so far

provided little input towards understanding private financial reporting, especially related to separate financial statements and in civil law countries.

References

Al-Basteki, H., 1995. The voluntary adoption of international accounting standards by Bahraini corporations. *Advances in International Accounting*, 8, pp.47-64.

Alfaro, L., Chanda, A., Kalemli-Ozcan, S., and Sayek, S., 2004. FDI and economic growth: The role of local financial markets. *Journal of International Economics*, 64(1), pp.395-407.

Ang, J.S., Cole, R.A., and Lin, J.W., 2000. Agency costs and ownership structure. *Journal of Finance*, 55(1), pp.81-106.

Ashbaugh, H., 2001. Non-U.S. firms' accounting standards choices. *Journal of Accounting and Public Policy*, 20(2), pp.129-153.

Ashbaugh, H. and Pincus, M., 2001. Domestic accounting standards, international accounting standards, and the predictability of earnings. *Journal of Accounting Research*, 39(3), pp.417-434.

Ball, R., 2001. Infrastructure requirements for an economically efficient system of public financial reporting and disclosure. *Brookings-Wharton Papers on Financial Services*, 1, pp.127-169.

Ball, R. and Shivakumar, L., 2005. Earnings quality in private UK firms: comparative loss recognition timeliness. *Journal of Accounting and Economics*, 39(1), pp.83-128.

Barth, M., 2008. Global financial reporting: Implications for U.S. academics. *The Accounting Review*, 83(5), pp.1159-1180.

Barth, M.E., Landsman, W.R, Lang, M.H., and Williams, C.D., 2010. Are IFRS-based and US GAAP-based accounting amounts comparable? *Journal of Accounting & Economics*, 54(1), pp.68-93.

Bassemir, M., 2011. Why do private firms adopt IFRS? [online] Available at <http://ssrn.com/abstract=1896283> [Accessed 3 October 2011].

Benau, M.A.G. and Grima, A.Z., 2002. Características de las empresas europeas que aplican las normas del IASC: Evidencia empírica de cara al debate regulador en la nueva fase de armonización contable [Features of European companies that apply IAS: empirical evidence for the discussion process of the accounting harmonization new age]. *Revista Espanola de Financiación y Contabilidad*, 31(3), pp.75-110.

Bennedsen, M. and Wolfenzon, D., 2000. The balance of power in closely held corporations. *Journal of Financial Economics*, 58(1-2), pp.113-139.

Bujaki, M.L. and Richardson, A.J., 1997. A citation trail review of the uses of firm size in accounting research. *Journal of Accounting Literature*, 16, pp.1-27.

Burgstahler, D., Hail, L., and Leuz, C., 2006. The Importance of reporting incentives: Earnings management in European private and public

firms. *The Accounting Review*, 81(5), pp.983-1016.

Bushman, R. and Smith, A., 2001. Financial accounting information and corporate governance. *Journal of Accounting and Economics*, 32(1-3), pp.237-333.

Cameran, M. and Campa, D., 2009. La scelta operata dalle società italiane con riferimento ai principi contabili da utilizzare per la redazione del bilancio di esercizio (IAS/IFRS versus standard nazionali): Un'indagine empirica [The Adoption of IAS/IFRS by Italian private firms in their Separate Financial Statements (IAS/IFRS versus national GAAP): Empirical Evidences]. *Rivista dei Dottori Commercialisti*, 3, pp.483-505.

Cascino, S., Pugliese, A., Mussolino, D., and Sansone, C., 2010. The influence of family ownership on the quality of accounting information. *Family Business Review*, 23(3), pp.246-265.

Chaney, P., Jeter, D., and Shivakumar, L., 2004. Self-selection of auditors and audit pricing in private firms. *The Accounting Review*, 79(1), pp.51-72.

Chow, C. and Wong-Boren, A., 1987. Voluntary financial disclosure by Mexican corporations. *The Accounting Review*, 62(3), pp.533-541.

Cole, V., Branson, J., and Breesch, D., 2011. Determinants influencing the de facto comparability of European IFRS financial statements. [online] Available at <http://ssrn.com/abstract=1967001> [Accessed 26 February 2012].

Cooke, T., 1992. The impact of size, stock market listing and industry type on disclosure in the annual reports of Japanese listed corporations. *Accounting and Business Research*, 22(87), pp.229-237.

Corno, F., 2006. IAS-IFRS: Evoluzione e inquadramento generale [IAS-IFRS: Evolution and general framework]. In M. Comoli, F. Corno, and A. Vigano, eds. *Il bilancio secondo gli IAS.* Milan: Giuffrè, pp.1-28.

Christensen, H.B., Lee, E., and Walker, M., 2008. Incentives or standards: What determines accounting quality changes around IFRS adoption? [online] Available at <http://ssrn.com/abstract=1013054> [Accessed 20 January 2012].

Cuijpers, R. and Buijink, W.F.J., 2005. Voluntary adoption of non-local GAAP in the European Union: A study of determinants and consequences. *European Accounting Review*, 14(3), pp.487-524.

Daske, H., Hail, L., Leuz., C. and Verdi, R., 2008. Mandatory IFRS reporting around the World: Early evidence on the economic consequences. *Journal of Accounting Research*, 46(5), pp.1085-1142.

DeAngelo, L.E., 1981. Auditor independence, "Low balling, and disclosure regulation. *Journal of Accounting and Economics*, 3(2), pp.113-127.

Del Fabbro, M., 2005. IAS e fisco: Applicazione dei principi contabili e conseguenze ai fini IRES [IAS and Taxation: Adoption of Accounting Standards and the effect on the Corporate Income Taxes]. *Contabilità, Finanza e Controllo*, 5, pp.401-417.

Delvaille, P., Ebbers, G., and Saccon, C., 2005. International financial reporting convergence: Evidence from three continental European countries. *Accounting in Europe*, 2(1), pp.137-164.

Dumontier, P. and Raffournier, B., 1998. Why firms comply voluntarily with IAS: an empirical analysis with Swiss data. *Journal of International Financial Management and Accounting,* 9(3), pp.216-245.

El-Gazzar, S.M., Finn, P.M. and Jacob, R., 1999. An empirical investigation of multinational firm's compliance with International Accounting Standards. *The International Journal of Accounting*, 34(2), pp.239-248.

Fama, E.F. and Jensen, M.C., 1983. Separation of ownership and control. *Journal of Law and Economics,* 26(2), pp.301-325.

Francis, J., Khurana, I., Martin, X., and Pereira, R., 2008. The role of firm-specific incentives and country factors in explaining voluntary IAS adoptions: Evidence from private firms. *European Accounting Review*, 17(2), pp.331-360.

Gassen, J. and Sellhorn, T., 2006. Applying IFRS in Germany-determinants and consequences. *Betriebswirtschaftliche Forschung und Praxis*, 58(4), pp.365-386.

Giornetti, A., 2005. *I principi IAS/IFRS in Italia* [The IAS/IFRS in Italy]. Milan: Giuffrè Editore.

Giunta, F. and Pisani, M., 2005. *Il bilancio* [The Financial Statements]. Milan, Italy: Apogeo.

Gomes, A. and Novaes W, 2005. Sharing of control as a corporate governance mechanism. *PIER Working Paper*, 01-029.

Hail, L., Leuz, C., and Wysocki, P., 2010. Global accounting convergence and the potential adoption of IFRS by the U.S. (Part I): Conceptual underpinnings and economic analysis. *Accounting Horizons*, 24(3), pp.355-394.

Jensen, M. and Meckling, W., 1976. Theory of the firm: managerial behavior, agency costs and ownership structure. *Journal of Financial Economics*, 3(4), pp.305-360.

Jensen, M.C., 1976. Reflections on the state of accounting research and the regulation of accounting. *Stanford Lectures in Accounting.*

Jermakowicz, E.K., and Gornik-Tomaszewski, S., 2006. Implementing IFRS from the perspective of EU publicly traded companies. *Journal of International Accounting, Auditing and Taxation*, 15(2), pp.170-196.

Kasznik, R., 1999. On the association between voluntary disclosure and earnings management. *Journal of Accounting Research*, 37(1), pp.57-81.

Khanna, T., Palepu, K., and Srinivasan, S., 2004. Disclosure practices of foreign companies interacting with U.S. markets. *Journal of Accounting Research*, 42(2), pp.475-508.

Kvaal, E. and Nobes, C., 2010. International differences in IFRS policy choice: a research note. *Accounting and Business Research*, 40(2), pp.173-187.

Leuz, C., 2000. The development of voluntary cash flow statements in

Germany and the influence of International Reporting Standards. *Schmalenbach Business Review*, 52(2), pp.182-207.

Leuz, C., 2003. IAS versus U.S. GAAP: Information asymmetry-based evidence from Germany's new market. *Journal of Accounting Research*, 41(3), pp.445-472.

Leuz, C. and Verrecchia, R.E., 2000. The economic consequences of increased disclosure. *Journal of Accounting Research*, 38, pp.91-124.

Meek, G., Roberts, C., and Gray, S., 1995. Factors influencing voluntary annual report disclosures by US, UK, and continental European multinational corporations. *Journal of International Business Studies*, 26(3), pp.555-572.

Murphy, A.B., 1999. Firm characteristics of Swiss companies that utilize International Accounting Standards. *The International Journal of Accounting*, 34(1), pp.121-131.

Mussolino, D., 2006. L'orientamento al valore dell'impresa familiare. Commento ai dati della ricerca sul campo [The Orientation to Value of Family Firms. Empirical Evidence from Italian data.]. In: E. Viganò, ed. *La sensibilità al valore nell'impresa familiare*. Padova, Italy: Cedam, pp. 1-63.

Nagar, V., Petroni, K., and Wolfenzon, D., 2011. Governance problems in closely held corporations. *Journal of Financial and Quantitative Analysis*, 46(4), pp.943-966.

Nobes, C., 2008. Accounting classification in the IFRS era. *Australian Accounting Review*, 18(3), pp.191-198.

Nobes, C., 2010. On researching into the use of IFRS by private entities in Europe. *Accounting in Europe*, 7(2), pp.213-226.

Nobes, C., 2011. IFRS practices and the persistence of accounting system classification. *Abacus*, 47(3), pp.267-283.

Ortiz, E., 2005. GAAP choice by European companies. *European Business Review*, 17(1), pp.36-51.

Pagano, M. and Roell, A., 1998. The choice of stock ownership structure: Agency costs, monitoring, and the decision to go public. *Quarterly Journal of Economics*, 113(1), pp.187-225.

Page, M.J., 1984. Corporate financial reporting and the small independent company. *Accounting and Business Research*, 14(15), pp.271-282.

Peek, E., Cuijpers, R., and Buijink, W., 2010. Creditors' and shareholders' reporting demands in public versus private firms: Evidence from Europe. *Contemporary Accounting Research*, 27(1), pp.49-91.

Piot, C. and Janin, R., 2007. External auditors, audit committees and earnings management in France. *European Accounting Review*, 16(2), pp.429-454.

Quagli, A., 2005. *Il bilancio di esercizio e principi contabili* [Financial Statements and Accounting Standards].Turin, Italy: Giappichelli.

Ricciardi, A., 2009. La gestione finanziaria delle Pmi: Criticità e possibili soluzioni [The Financial management of SMEs: Problems and Possible Solutions]. *Amministrazione & Finanza*, 1, pp.43-48.

Schroeder, R.G., Clark, M.W., and Cathey, J.M., 2005. *Financial accounting theory and analysis*. USA: Wiley.

Sellhorn, T. and Gornik-Tomaszewski, S., 2006. Implications of the "IAS Regulation" for research into the international differences in accounting systems. *Accounting in Europe*, 3(1), pp.187-217.

Singhvi, S. and Desai, H., 1971. An empirical analysis of the quality of the corporate financial disclosure. *The Accounting Review*, 46(1), pp.129-138.

Sottoriva, C., 2005. Principi contabili internazionali e cordinamento con il TUIR [International Accounting Standards and the Income Tax Law]. *Le Società*, 5, pp.590-594.

Street, D.L. and Gray, S.J., 2000. IAS adopters respond to the cherry-picking ban. *Accounting and Business*, April, pp.40-41.

Sunder, S., 1997. *Theory of accounting and control*. Cincinatti, South-Western Publishing.

Van Tendeloo, B. and Vanstraelen, A., 2008. Earnings management and audit quality in Europe: Evidence from the private client segment market. *European Accounting Review,* 17(3), pp.447-469.

Vander Bauwhede, H. and Willekens, M., 2008. Disclosure on corporate governance in the European Union. *Corporate Governance*, 16(2), pp.101-115.

Verriest, A., Gaeremynck, A. and Thornton, D.B., 2012. The impact of corporate governance on IFRS adoption choices. *European Accounting Review*, forthcoming.

Viganò, E., 2006. *Il valore dell'impresa nella successione familiare* [Firm Value in Family Inheritance]. In: E. Viganò, ed. *La sensibilità al valore nell'impresa familiare*. Padova, Italy: Cedam, pp. 381-436.

Viganò, E., 2007. *Impresa caratteristica e bilancio* [Firm and Its Financial Statements].Padua, Italy: Cedam.

Vinciguerra, R. and Cipullo, N., 2009. La comunicazione economico-finanziaria delle P.M.I. secondo i professionisti contabili: Un'indagine empirica [The Financial Statements of SMEs according to the Accountants Perspective: Empirical evidence]. *Financial Reporting*, 1, pp.39-78.

Wallace, R.S.O. and Naser, K., 1995. Firm-specific determinants of the comprehensiveness of mandatory disclosure in the corporate annual reports of firms listed on the stock exchange of Hong Kong. *Journal of Accounting and Public Policy*, 14(4), pp.311-368.

Watts, R.L. and Zimmermann, J.L., 1978. Towards a Positive Theory of the determination of accounting standards. *The Accounting Review*, 53(1), pp.112-134.

Watts, R.L. and Zimmermann, J.L., 1986. *Positive Accounting Theory*. NJ: Prentice-Hall.

Watts, R.L. and Zimmermann, J.L., 1990. Positive Accounting Theory: A ten year perspective. *The Accounting Review*, 65(1), pp.131-156.

Watts, R L., 1977. Corporate financial statements, a product of the market and political processes. *Australian Journal of Management*, 2(1),

pp.53-75.

Wu, Q., Wang, P., and Yin, J., 2007. Audit committee, board characteristics and quality of financial reporting: An empirical research on Chinese securities market. *Frontiers of Business Research in China*, 1(3), pp.385-400.

Zarzeski, M.T., 1996. Spontaneous harmonization effects of culture and market forces on accounting disclosure practices. *Accounting Horizons*, 10(1), pp.18-37.

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