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**Economic Value Added and the Balanced Scorecard: An agency theory
perspective**

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Abstract

The discussion in this paper suggests that the costs and benefits of the use of Economic Value Added and the Balanced Scorecard as performance measurement tools is dependent on the organization's information system capabilities. Subjective control inherent in the Balanced Scorecard, requires superiors to have clear information about subordinates' options and actions. In contrast, since Economic Value Added rewards results and leaves the means to accomplish the results to the manager, little information is needed about managers' decisions and efforts. Implications of this trade-off are discussed.

Key Words: EVA, Balanced Scorecard, Performance Measurement

Introduction

The Balanced Scorecard (BSC) and Economic Value Added (EVA) represent significantly different performance evaluation tools. EVA is focused on measurement of shareholder value, which is the outcome from managers' actions. The BSC, in contrast, is focused on the decisions and actions needed by managers to reach preferred outcomes. Thus, EVA is a measure of results while the BSC measures the mechanism used to reach those results. Given these fundamental differences, it is reasonable to expect that firms using either the BSC or EVA for evaluation of managers' performance should exhibit noticeably different management control and information systems.

The focus of this paper is not on the relative merits of the BSC and EVA as tools for evaluating the performance of managers but on the organizational characteristics required for effective use of these performance metrics. From an agency theory perspective, the key difference lies in the information needs within the organization to maintain the BSC or EVA as viable performance metrics.

I. Measuring Dimensions of Performance

EVA is calculated as after-tax earnings less the cost of capital. A risk-adjusted rate times investment determines the capital cost (Griffith 2004). Thus, EVA motivates managers to maximize earnings and to reject investments that don't earn a required return. EVA originated from the traditional residual income measure, but Stern-Steward Consulting, the developers of EVA, proposed a series of adjustments to accounting earnings that they claim provides a better measure of value (Stewart 1991). EVA has many supporters (Drucker 1991; Rice 1996), although the claim that EVA is a superior value measure has been disputed in the empirical literature (Biddle et al 1997).

The BSC, in contrast, as proposed by Kaplan and Norton (1992), uses a basket of goals and metrics to measure managers' efforts along several dimensions. Typically, these dimensions include financial, customer, internal business process, and learning and innovation. Appropriate objectives, measures, targets, and initiatives needed along each dimension of performance are then designed (Ahn 2005). For example, Exhibit 1 summarizes the objectives, measures, targets, and initiatives needed to implement an airline's internal perspective objective for fast flight turnaround. A strategy map is often used to complete the link between performance dimensions to the company's ultimate goals (Kaplan and Norton 2004).

II. Control system design

Performance expectations for managers are difficult to specify and to measure because superiors can never be certain if optimal choices were made. For example, superiors cannot explicitly determine whether cost center managers have minimized the cost of inputs or division managers have maximized the present value of cash flows. Thus, measurable proxies must be used for

performance expectations. Of course, incentives must be based on factors that are jointly observable or either party could falsely claim that a result favorable to their own objectives has occurred (Agrawal and Mandelker 1987). As the information experts in organizations, it falls to accountants to provide performance measurements.

In designing a control system, organizations face two fundamental information problems. First is the goal congruence problem (Kren and Kerr 1993). Lack of goal congruence arises among managers, their superiors, and other stakeholders because managers value self-interested goals, such as pay, leisure, promotion, and career opportunities, while owners of for-profit organizations value increases in firm value. Stakeholders in not-for-profit organizations may have more altruistic goals, but the lack of goal congruence with managers persists. Second is the private information problem. Managers obtain private information about their area of responsibility that is unavailable to their superiors (Kren 1992). In fact, obtaining and using private, decision-relevant, information is precisely the value-added provided by a subordinate manager. It defines the need for management-level subordinates and it is this policy-setting responsibility that distinguishes managers from clerical/hourly employees.

III. The Role of Information

As applied, EVA specifies an *objective outcome*. Performance evaluation under EVA is focused on the *results* of managers actions, not the quality of those actions. As noted by Fletcher and Smith (2004), EVA can do nothing to articulate the processes needed to achieve financial results because it does not identify value drivers or 'drill down' into the operations of a firm. Similarly, Dodd and Johns (1999) find that EVA adopters used fewer operational measures compared to non-EVA adopters. Thus, the "means" by which managers achieve expected EVA results is not part of the evaluation process. When reward follows from achievement of objective outcomes such as EVA, it may affect managers' behavior in ways that are not always beneficial to the organization, as discussed in the following section.

In contrast, the BSC requires superiors to focus on the quality of managers' actions and more readily provides rewards for managers' effort and skill. To use the BSC as a performance measure, superiors must evaluate managers' efforts for each BSC objective, measure, target, and initiative. As managers develop a BSC, it is critical to the success of the BSC that appropriate "means" to reach organizational goals are specified, measured, and assessed (Sim and Koh 2001). Thus, as the BSC operates, superiors are able to observe the effort and skill of managers across the dimensions of performance as they carry out the actions needed to reach expected results.

As proposed by Baiman (1982), among others, agency theory suggests that a control system that monitors and rewards a manager's effort and skill provides the most efficient way to overcome the goal congruence and private information problems. Since control is based on the quality of a manager's decision making, subordinate's options and actions are monitored to avoid non-congruent decisions. Overseeing subordinates' decisions and actions ensures that private information is revealed and the superior's objectives are paramount. The BSC provides the mechanism for that monitoring as managers proceed with the initiatives needed to meet the measures and targets specified by their BSC.

However, monitoring subordinates' actions in reaching BSC goals is costly. It requires a great deal of information and, thus, a very costly information system. This is the fundamental cost to the organization of subjective control through the BSC. Information system costs arise in two ways. First, superiors must familiarize themselves with their subordinates' areas of responsibility both during establishment of BSC goals and as goal achievement is monitored. Given cognitive

constraints, this requires a flatter organization structure, with superiors responsible for fewer subordinates. The second information system cost relates to the information technology infrastructure. As described by Silk (1998), a complex and costly information system is needed to generate and distribute decision-relevant information to superiors about subordinates' options and actions. Transaction and environmental monitoring and reporting must be more sophisticated to ensure that superiors are able to gather and assimilate early-warning and real-time information about subordinates' options and actions as they work toward BSC goals. Such information system capabilities take various forms, such as a 'management dashboard' providing data across an array of measures for continuous monitoring (Naro and Travaille 2001).

Agency theory also suggests that subjective control systems that monitor the quality of managers' actions can have political costs because it can be difficult to defend subjective evaluations to internal or external observers (Gibbs et al 2004). Some subordinate managers may object to perceived favoritism shown their peers. More importantly, subjective evaluation may be difficult to justify to external stakeholders when an unexpected environment confounds the best efforts of hard-working and talented managers. In fact, the political climate has lately made subjective evaluation even more difficult, particularly for C-level managers. For example, Sherk (2007) reports that the proportion of pay-for-performance schemes has grown substantially over the past years (see also Reus 2007; Zeller 2004). The BSC has proven useful in dealing with the political costs typically associated with subjective evaluation. In fact, some observers hailed the BSC as finally providing a politically defensible performance metric for subjective evaluation of C-level managers because rewards based on monitored BSC objectives can be more easily justified. Thus, the political costs of subjective control can be mitigated with a BSC, although not entirely avoided (Ittner et al 2002). But the information costs remain.

IV. Performance risk in control systems

An objective control system like EVA, in contrast, avoids the information costs of subjective systems. Little information is needed beyond a measure of the expected results. Thus, either the expected EVA results are achieved and incentives are provided, or they are not achieved and incentives are withheld. While installation of EVA requires extensive training, once in operation, EVA systems can function with even a rudimentary information system infrastructure. Bahri et al (2011), for example, conclude that EVA provides an effective control tool for small and medium businesses precisely because it requires limited information technology infrastructure. Moreover, since superiors are only required to observe EVA results and not required to evaluate the quality of subordinates' actions, a steeper reporting hierarchy is feasible. In fact, it would be irrational to use an objective, results-based, control tool, like EVA, and also invest in information system infrastructure and maintain a flat organization structure. In all, substantial savings in information system cost can result (Creed et al 2002).

Moreover, EVA can more readily avoid the political cost of subjective control. Objective "pay-for-performance" schemes are easier to justify, particularly for C-level managers, because objective control relies on the credible argument that rewards follow strictly from the achievement of EVA results.

However, objective performance evaluation comes with its own costs because it ignores the effect of uncontrollable environmental factors on managers' performance. This so-called *moral hazard* problem makes it difficult for a superior to distinguish between a skilled, hard-working subordinate who overcame a difficult environment from a less skilled, but lucky, subordinate who met objective EVA goals. Reputation effects, over time, can mitigate the moral hazard problem, but job rotation and job changes can exacerbate it (Kerr and Kren 1992).

A more important problem with objective performance measures is that objective criteria may affect managers' behavior in ways that are not always beneficial to the superior or owners. For example, since earnings are an important component of EVA, it may cause managers to make decisions that increase earnings, but not cash flow. For example, a manager may decide to reject an investment in newer, more efficient, equipment to avoid an accounting loss on existing equipment that would decrease his or her EVA-based incentive, even if the replacement would increase cash flow and thus firm value (Brewer et al 1999). Of course, this example also illustrates the essence of private information in an organization. Under an objective control system, where information system investment has not been made, the availability and efficiency of new equipment is likely to be private information available only to the subordinate. The superior is unlikely to be aware of replacement opportunities because an objective control system provides little information on subordinates' options or actions. In a subjective BSC-based control system, such information is more likely to be available as managers' work toward improvement of the internal process dimension of the BSC.

The most pervasive and potentially destructive problem with objective control, however, is caused by the performance risk that is inherently transferred to managers. Since outcomes are jointly determined by managers' actions and the environment, focusing strictly on results imposes the risk of an uncertain environment on managers. An adverse environment can overcome the best efforts of a capable manager.

The problem with imposing performance risk on managers is that risk-averse managers can become overly cautious in their decision making. They will avoid risky opportunities with large potential payoffs, even if the opportunities would be preferred by their superiors or the firm's owners. Managers perception of firm-level risk differs from the risk attitude of owners because managers are unable to diversify their human capital. In contrast, owners can diversify investment risk across their portfolio and are concerned only about market risk, not firm-level risk. The opportunity to diversify risk increases for managers higher in the corporate hierarchy because superior managers can diversify risk across subordinate managers. Thus, superiors are less subject to performance risk than their subordinates, compounding the goal congruence problem. However, even executive managers are unable to completely diversify firm-level risk to their human capital.

Thus, while objective, 'pay-for-performance' schemes, such as EVA, are intuitively appealing, the cost to the organization may be the loss of risky, but high expected-value, opportunities. Managers will be unwilling to undertake risky projects, even for big (expected-value) payoffs. In addition, at the executive level, where managers are able to mitigate compensation risk by diversifying firm holdings, evidence indicates that executives undertake costly subsidiary acquisitions and dispositions in an apparent attempt to diversify firm-specific risk (Berger and Ofek 1995). Non-synergistic diversification holds little value for owners, since they can independently diversify their investment portfolio.

V. Conclusion

As managers attempt to implement effective control, the often-cited principle of 'pay-for-performance' is a vague and insufficient prescription. The principle provides little guidance about the appropriate meaning of performance or whether performance criteria should be based on results or on the quality of subordinates' decisions and actions.

The discussion in this paper suggests that the costs and benefits of control system choices are determined by an organization's information system capabilities. Superiors must have clear information about subordinates' options and actions to use subjective control inherent in the

BSC. Otherwise, they are in the awkward position of having to rely on subordinates' post-hoc claims (often self-interested) about decision quality.

In contrast, objective control with EVA has lower political costs since the quality of managers' decisions need not be evaluated. Managers seeking to avoid such costs may prefer objective control, but they should consider that objective control imposes on subordinates the risk of an uncertain environment, potentially motivating overly cautious behavior. Superiors and owners must bear an unknown opportunity cost because information asymmetry prevents them from being informed about risky opportunities with high expected-value payoffs. As noted Dodd and Johns (1999), a strict focus on financial control puts superiors at risk of returning to the "dark ages" of "remote control management" described in Johnson and Kaplan (1987).

Subjective control with the BSC is less feasible for managers who operate in a rapidly-changing environment or who are responsible for complex, difficult-to-understand technology because information is less reliable and often unobtainable about their options and actions. Superiors will have difficulty developing sufficient information about many of the factors that influence decisions in complex environments. As proposed by (Othman 2008), objectives, measures, targets, and initiatives needed to implement an effective BSC become more difficult to specify and monitor in volatile environments.

Objective control through EVA may be most suitable for subordinate managers who have more control over their environment, and thus more control over outcomes, because the costs of risk transfer are reduced. Also, since a capital charge based on investment must be calculated under an EVA control system, it is inappropriate for service industries, such as accounting or consulting firms, since unmeasured human capital, not physical assets, have the greatest relation to firm outcomes.

Economic agency theory suggests that the tradeoffs in control system design discussed above cannot be avoided. As information system capabilities increase and organizational structure becomes flatter, increased use of subjective control through the BSC is feasible. Increased use of subjective performance criteria will mitigate some costs associated with objective control, but impose other costs associated with subjective control. Decisions about control system design require an understanding of these inherent tradeoffs.

Exhibit 1 - Objectives, measures, targets, and initiatives for an airline's internal perspective.

	Objective	Measure	Target	Initiative(s)
Internal perspective	fast turnaround	rate of on-time departures	less than 30 minutes for 90% of departures	- on-ground cycle time optimization - quality management
Definitions	What the strategy is intended to accomplish.	How the objective will be quantified.	Level of performance to be achieved.	Projects or programs needed to achieve the targeted performance.

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Financial Reporting Transparency and Audit Fees

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Abstract

We investigate the relationship between corporate reporting transparency and audit fees. We predict that higher quality of information disclosure and better corporate reporting transparency can decrease the information asymmetry between the firms and outsiders, reducing the amount of audit risk, resulting in less audit work and lower audit fees. We find evidence of a negative relationship between financial reporting transparency and audit fees. Our results are relevant to public firms, regulators, and the public at large as they demonstrate another possible benefit to greater corporate reporting transparency.

Introduction

Corporate reporting transparency is important to investors, regulators, firms, and auditors. For investors, their main source of information about a firm and its activities is typically the firm itself. Greater corporate transparency may improve asset allocation as investors make more informed investment decisions based on more transparent information. Firm regulators (such as the SEC and stock exchanges) benefit from enhanced transparency because greater transparency makes it easier for regulators to detect illegal behavior and to protect investors' interests. Auditor regulators (such as the PCAOB and State Boards of Accountancy) can also benefit as more transparent information makes it easier to evaluate the auditor's work. For a firm, greater transparency may reduce information asymmetry between investors and the firm, reducing its cost of capital. For auditors, greater transparency may make a client easier to audit, resulting in lower audit risk. Consequently, investors, regulators, firms, and auditors all have incentives to encourage greater corporate reporting transparency.

Financial reporting transparency measures "the extent to which financial reports reveal an entity's underlying economics in a way that is readily understandable by those using the financial reports (Barth and Schipper, 2008)". A substantial literature argues that transparency reduces information asymmetry and information risk, and thus is a desirable characteristic of financial reports (Diamond and Verrecchia, 1991; Bushman *et al.*, 2004).

Prior literature has extensively examined the capital market and macro-economic benefits related to corporate reporting transparency. For example, Easley and O'Hara (2004) and Barth *et al.* (2011) provide empirical evidence of a negative relationship between corporate reporting transparency and cost of capital. Lang *et al.* (2011) suggest that reporting transparency is associated with lower transaction costs and greater liquidity, less earnings management, and more analyst following. Francis *et al.* (2009) indicate that higher financial reporting transparency can improve the efficiency of resource allocation in capital market. In this study, we extend this line of inquiry to examine if external auditors respond to different levels of corporate transparency by lowering audit fees for clients exhibiting greater transparency.

Auditors may respond favorably by lowering audit fees to high level of financial reporting transparency for at least two reasons. First, prior studies (Easley and O'Hara, 2004; Lambert *et al.*, 2007) suggest that more transparent and more understandable financial reports can reduce the information asymmetry between firms and investors by decreasing the nondiversifiable risk. To the extent that the reduced information asymmetry may reduce the amount and the scope of audit work, and auditors charge a less fee for reduced amount of work (Francis and Wang, 2005), higher level of reporting transparency may result in a lower audit fee. Second, both archival and behavior studies indicate that better financial reporting transparency facilitates the detection of earnings management (Collins *et al.*, 1995; Hunton *et al.*, 2006). The reduction in risk of earnings management and the resultant reduction in audit risk will trigger favorable response

from auditors in the form of a reduced audit fee premium (Gul and Tsui, 1998). Therefore, we posit a negative relationship between levels of financial reporting transparency and audit fees.

Our sample consists of 294 firms included in a study of financial reporting transparency conducted by Standard & Poor in 2002, which analyzes the transparency and disclosure practices concerning financial reporting, ownership structure and investor rights, and board and management structure and processes of the S&P 500 firms (Patel and Dallas, 2002). The empirical proxy for corporate reporting transparency is the overall transparency scores and the three individual index scores in the S&P study.

Our results confirm our prediction that there is a negative relationship between financial reporting transparency (one aspect of corporate reporting transparency) and audit fees. Auditors are sensitive to the financial reporting transparency of the information contained in annual report, 10-K, and proxy statement. However, our results indicate that auditors pay special attention to disclosure transparency of financial information only, ignoring disclosure transparency of other non-financial information such as board structure and ownership structure that auditors have no direct auditing responsibility for.

Our study makes several important contributions. First, our study is related to the research on the benefits of corporate reporting transparency. Prior literature has examined the capital market and macro-economic benefits related to corporate reporting transparency. For example, Easley and O'Hara (2004) and Barth *et al.* (2011) provide empirical evidence of a negative relationship between financial reporting transparency and cost of capital. Lang *et al.* (2011) suggest that financial reporting transparency is associated with lower transaction costs and greater liquidity, less earnings management, and more analyst following. Francis *et al.* (2009) indicate that higher financial reporting transparency can improve the efficiency of resource allocation in capital market. We complement this line of research by documenting an additional benefit of lower audit fees associated with high level of financial reporting transparency.

Second, our study also adds to the literature of audit fees by identifying an important determinant to audit fees. Prior literature on audit fees recognizes a few factors that impact auditor fee assessment, such as earnings quality, business risk, and business complexity. Our study indicates that information disclosure transparency may significantly impact auditor fee assessment.

Finally, our study has significant policy implication. Recently, regulators have started to pay attention to the importance of transparent financial reporting¹. Our evidence of the benefit of lowered audit risk and audit fees arising from higher transparency supports the regulator's recent effort, such as mandatory XBRL reporting system, to promote higher corporate reporting transparency.

The remainder of the paper is organized as follows. Section 2 reviews the related literature. Section 3 expands on the empirical methodology and the data used for the study. Section 4 presents the results and section 5 concludes the paper.

Endnotes

¹ For example, when testifying before the House Financial Services Subcommittee, Scott A. Taub, the acting Chief Accountant of SEC, stated that "Transparent financial reporting is essential to informed investment decisions by investors and lending decisions by creditors, and to other users of financial statements (SEC, 2006)."

Literature Review

Corporate Reporting Transparency

Financial reporting transparency is defined as the measurement of “the extent to which financial reports reveal an entity’s underlying economics in a way that is readily understandable by those using the financial reports (Barth and Schipper, 2008)”. A substantial literature argues that transparency reduces information asymmetry and information risk, and thus is a desirable characteristic of financial reports (Diamond and Verrecchia, 1991; Bushman *et al.*, 2004). For example Easley and O’Hara (2004) argue that transparency financial reporting can reduce information asymmetry and the reduced information asymmetry can lead to lower cost of capital. Similarly, Amihud and Mendelson (1986) develop an asset pricing model demonstrating that adverse selection cost, a major liquidity cost, is reduced if managers provide information in a more transparent way. Lambert *et al.* (2007) indicate that in addition to its ability to reduce information asymmetry, more readable and more understandable information due to higher level of financial reporting transparency may be able to enhance the accuracy of investors’ assessment of future cash flows. That increased precision may lower the cost of capital.

Empirical evidence generally confirms the above theoretical argument that higher level of transparency leads to lower cost of capital. For example, Botosan and Plumlee (2002) use analyst perceptions as empirical proxy for financial reporting transparency and provide evidence of a negative relationship between transparency and cost of capital. Francis *et al.* (2005) measure financial reporting transparency by measure of accruals quality and show that accruals quality is negatively associated with both cost of equity capital and cost of debt capital.

Apart from the benefits related to capital market, prior literature also identifies other benefits associated with higher level of financial reporting transparency. Lang *et al.* (2011) suggest that better financial reporting transparency is associated with lower transaction costs and greater liquidity, less earnings management, and more analyst following. Francis *et al.* (2009) consider not only the quality of the public information disclosure but also the intensity of private information acquisition and the effectiveness of private information disclosure. These results indicate that better financial reporting transparency can improve the efficiency of resource allocation in capital market at the macro level.

Audit Fees

Bell *et al.* (2001) identify two major determinants of auditors’ consideration of fee premium: risk-related factors and engagement-specific factors. Risk-related factors include risk characteristics of a client that affect auditors’ assessment of a client’s specific audit risk, such as litigation risk, and/or loss of reputation arising from financial misreporting. Engagement-related factors include the intensity of audit work and the scope of audit work demanded by the client to obtain assurance about the integrity of the financial reports.

Consistent with the above argument of risk-related factors and engagement-specific factors, prior studies of determinants of audit fees have provided fruitful empirical evidence. Simunic and Stein (1996) show that audit firms make upward fee adjustments for clients with higher liability exposure, reflecting higher levels of engagement efforts demanded by the higher liability exposure. Bedard and Johnstone (2004) suggest that auditors increase their audit efforts and billing rates for clients with weak corporate governance and higher earnings management risk. Gul *et al.* (2003) find that auditors assess a higher fee premium for firms with higher amount of discretionary accruals, which is a measure of earnings management, due to the heightened earnings management risk and resultant litigation risk. Likewise, Abbott *et al.* (2006) also

document a positive relationship between audit fees and a client's risk of earnings management risk.

Auditors may respond favorably by lowering audit fees to higher level of financial reporting transparency for at least two reasons. First, prior studies (Easley and O'Hara, 2004; Lambert *et al.*, 2007) suggest that more transparent and more understandable financial reports reduce the information asymmetry between firms and investors by decreasing the nondiversifiable risk. To the extent that the reduced information asymmetry may reduce the amount and the scope of audit work, and auditors charge a less fee for reduced amount of work (Francis and Wang, 2005), high level of reporting transparency may result in a lower audit fee. Second, both archival and behavior studies indicate that better financial reporting transparency facilitates the detection of earnings management (Collins *et al.*, 1995; Hunton *et al.*, 2006). The reduced earnings management risk and the resultant reduced audit risk will trigger favorable response from auditors in the form of a reduced audit fee premium (Gul and Tsui, 1998). Therefore, we posit a negative relationship between levels of corporate reporting transparency and audit fees:

H₁: there is a negative relationship between the level of corporate reporting transparency and audit fees.

Method

Sample Selection

We begin with the 460 firms included in the S&P 2002 transparency study. We exclude 166 firms without complete accounting data from Compustat database or audit fee information from AuditAnalytics database for the year of 2002. The final sample consists of 294 firms.

Refer Table 1

Table 1 shows the distribution of industry sample firms by 2-digit SIC codes. There is no discernible pattern of industry concentration other than 9.9% in the industry of Chemicals and Allied Products (SIC code of 28) and 10.9% in the industry of Electrical and Electronic Equipment (SIC code of 36). Nonetheless, we include industry dummies in the empirical analysis to control any potential industry effect².

Corporate Reporting Transparency Measures

In 2002, Standard & Poor's conducted an analysis of the transparency and disclosure practices of the S&P 500 firms (Patel and Dallas 2002). The S&P study uses a comprehensive set of 98 disclosure items to measure information disclosure quality of "financial transparency and information disclosure," "ownership structure and investor rights," and "board and management structure and process." Items in the first category assess directly the transparency of financial reporting while the latter two categories are used to evaluate disclosure quality of non-financial information, particularly corporate governance. Standard & Poor's assigns one point for each one of the 98 items to a firm if that item is reported in its annual report, 10K, or proxy statement. Raw scores are then converted into deciles and subsequently a measure of the relative amount of disclosure for each category is generated from those deciles. Finally, an overall transparency ranking is calculated for each firm on the basis of the evaluations of all three categories. Both the overall ranking and ranking of individual measures of financial reporting transparency are used in our empirical tests.³

Note that the transparency and disclosure index in 2002 S&P study are not intended to assess the accuracy of corporate information disclosure, but to evaluate the transparency of it. In addition,

² In robustness tests, we also delete firms in regulated industries (SIC 40-50; SIC 60-70). Results are unchanged.

³ See Appendix A for a list of the 98 items included in the S&P 2002 transparency study.

some of the items have to be disclosed in the US while others are voluntary. Therefore, firms that strategically disclose misleading information may score relatively high on the index. However, extant empirical evidence concerning voluntary disclosures related to earnings announcements (Skinner 1994), secondary equity offerings (Marquardt and Wiedman 1998), and internal audit effectiveness (Archambeault *et al.*, 2008; Holt and DeZoort 2009) seems to suggest that firms use voluntarily disclosures to enhance transparency, not to decrease, transparency. In addition, Patel and Dallas (2002) indicate that overall S&P composite scores are significantly negatively correlated with market risk. Also, Khanna *et al.* (2004) document a positive association between the S&P transparency scores and market interaction measures, such as listing status and investment flows. Chen *et al.* (2007) find that there is a positive association between the S&P 500 transparency scores and equity liquidity and a negative relationship with equity spreads, indicating that greater transparency reduces information asymmetry. Therefore, the S&P scores transparency rankings seem to possess reasonably high construct validity and are used as empirical proxy for corporate reporting transparency in prior academic studies (Khanna *et al.*, 2004; Chen *et al.*, 2007; Felo, forthcoming).

Regression Model and Variable Definitions

Following prior research on audit fees, our regression model is as follows:

$$LFEE = a_0 + a_1TESTVARIABLE + a_2LNTA + a_3INVREC + a_4FOREIGN + a_5EXORD + a_6LOSS + a_7ROA + a_8LEVE + a_9LIQUID + a_{10}BIG5 + a_{11}EFYR.$$

Variable definitions are summarized in Table 2.

Refer Table 2

Consistent with prior studies of audit fees, our dependent variable (*LFEE*) is the natural log of audit fees (in 000s). Our primary test variables (*TESTVARIABLE* in the model above) include individual firm's S&P rating of its overall information disclosure transparency (*FRI*), as well as ratings of three sub-categories: ownership structure and investor rights (*SR1*), financial transparency and information disclosure (*SR2*), and board and management structure and process (*SR3*).

The set of control variables are developed from the conventional research of determinants of audit fees. Following prior studies of audit fees (Craswell *et al.*, 1995; Francis and Simon 1987; Abbott *et al.*, 2006), the following control variables are included in the multiple regression analysis in this study: firm size, business complexity, financial health, and auditor type. Firm size is measured as the natural log of total assets (*LNTA*). We control for business complexity by including the percentage in assets of accounts receivables and inventories (*INVREC*) and an indicator variable of whether the firm pays foreign tax (*FOREIGN*). We use an indicator variable of whether the firm reports any extraordinary item, an indicator variable of whether the firm reports a loss and the ratio of return on assets (*ROA*) to control financial health. *LEVE* (the sample firm's debt/asset ratio) and *LIQUID* (the sample firm's current ratio) are used to measure the firm's business risk. Finally, we include two indicator variables (*BIG5* and *EFYR*) to control the effect of auditor type and the effect of December fiscal year ending month.

Results

Descriptive Statistics

Table 3 demonstrates the descriptive statistics of the 294 sample firms in our study. The mean natural log of audit fees is 14.22, which is equal to approximately \$1.494 million and the mean natural log of total assets is 8.82, which is equal to approximately \$6.765 billion. The large mean

firm size is not surprising as the sample firms are components of S&P 500 firms. The mean *INVREC* score was 0.23. Seventy-one percent of firms had multi-national operations as evidenced by payment of foreign tax (*FOREIGN*). Approximately twenty one percent of the firms reported both an extraordinary item (*EXORD*) and a net loss for the current year (*LOSS*). The mean return on assets (*ROA*) is 0.02 while the mean debt-to-asset ratio (*LEVE*) is fifty-six percent and mean current ratio (*LIQUID*) is 1.84. Finally, ninety-nine percent of the sample firms were audited by one of the big five national auditors (*BIG5*) and sixty-seven percent of them had a fiscal year ending month of December (*EFYR*).

Refer Table 3

Regression Results

Multivariate regression results are presented in Table 4. The adjusted R^2 s are generally in the range of high 0.60s, suggesting a good model fit⁴. The coefficient for sub-ranking of financial information disclosure transparency (*SR2*) is significantly negative at the conventional 0.05 level (p -value=0.03), indicating a negative relationship between financial reporting transparency and audit fees. However, rankings of the other two categories are not statistically significant in the regression models (*SR1* and *SR3*): ownership structure and investor rights, and Board and management structure and processes. The overall ranking of the information transparency (*FRI*), which includes disclosure of both nonfinancial and financial information, is not statistically significant either. Overall, our results indicate that auditors charge a less fee premium for reduced information asymmetry and reduced audit risk from more transparent financial reporting, but ignore the disclosure transparency of other non-financial information. The results are not surprising as auditors have direct audit responsibility for financial reporting, but not for information disclosure of non-financial information.

Refer Table 4

Most of the coefficient estimates on all of our control variables are statistically significant, confirming results of prior studies of audit fees. Consistent with prior research, the coefficient estimates on *LNTA*, *INVREC*, *FOREIGN*, *EXORD*, *LEVE*, and *EFYR* are positive and significant while the coefficient of *LIQUID* is significantly negative in the regressions.

Conclusion

In this study, we use 2002 Standard and Poor's analysis of information disclosure transparency to explore the relationship between corporate reporting transparency and audit fees. Our results indicate that auditors charge a lower fee premium when more transparent financial reporting reduces information asymmetry and audit risk. Our result lends support to recent regulator's efforts to promote more transparent financial reporting. They also provide more evidence to firms that greater transparency can provide benefits to them in the form of lower audit fees. Last, our results provide insight into the determination of audit fees. However, our results are subject to some limitations. The raw data of 2002 Standard and Poor's transparency study is limited to

⁴ Our regression diagnostics show that our highest pairwise correlation was 0.24. VIF scores do not indicate any problem (all scores <2). Thus multicollinearity does not seem a problem in our study. Our Breuch-Pagan statistic was 10.37, suggesting that heteroscedasticity is not a concern. Nonetheless, we control the potential heteroscedasticity issue by calculating heteroscedasticity-consistent t-values. The results remain qualitatively unchanged.

S&P 500 firms and to the year of 2002 only. The limited sample size and sample year may restrict the generalization of the study results.

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Table 1: Industry Distribution

SIC	Frequency	%	Cumulative Frequency	Cumulative %
10	1	0.34%	1	0.34%
13	11	3.74%	12	4.08%
16	1	0.34%	13	4.42%
20	12	4.08%	25	8.50%
23	4	1.36%	29	9.86%
24	2	0.68%	31	10.54%
25	2	0.68%	33	11.22%
26	7	2.38%	40	13.61%
27	8	2.72%	48	16.33%
28	29	9.86%	77	26.19%
29	4	1.36%	81	27.55%
30	5	1.70%	86	29.25%
33	7	2.38%	93	31.63%
34	7	2.38%	100	34.01%
35	19	6.46%	119	40.48%
36	32	10.88%	151	51.36%
37	11	3.74%	162	55.10%
38	19	6.46%	181	61.56%
39	2	0.68%	183	62.24%
40	4	1.36%	187	63.61%
44	1	0.34%	188	63.95%
45	4	1.36%	192	65.31%
48	7	2.38%	199	67.69%
49	23	7.82%	222	75.51%
50	2	0.68%	224	76.19%
51	4	1.36%	228	77.55%
52	2	0.68%	230	78.23%
53	10	3.40%	240	81.63%
54	5	1.70%	245	83.33%
55	1	0.34%	246	83.67%
56	4	1.36%	250	85.03%
57	3	1.02%	253	86.05%
58	3	1.02%	256	87.07%
59	6	2.04%	262	89.12%
60	1	0.34%	263	89.46%
63	3	1.02%	266	90.48%
64	1	0.34%	267	90.82%
70	3	1.02%	270	91.84%
72	1	0.34%	271	92.18%
73	22	7.48%	293	99.66%
75	1	0.34%	294	100.00%

Table 2: Variable Definitions

Variable Name	Description
Dependent Variable	
<i>LFEE</i>	The natural log of audit fees (000s)
Test Variables	
<i>FR1</i>	Overall ranking of disclosure transparency based on annual report, 10-K, and proxy statement
<i>SR1</i>	Sub-ranking of Ownership Structure and Investor Rights based on annual report, 10-K, and proxy statement
<i>SR2</i>	Sub-ranking Financial Transparency and Information Disclosure based on annual report, 10-K, and proxy statement
<i>SR3</i>	Sub-ranking of Board and Management Structure and Processes based on annual report, 10-K, and proxy statement
Control Variables	
<i>LNTA</i>	The natural log of total assets
<i>INVREC</i>	Percentage in assets of receivables and inventories
<i>FOREIGN</i>	An indicator variable equal to “1” if a firm pays foreign income tax
<i>EXORD</i>	An indicator variable equal to “1” if a firm reports any extraordinary items
<i>LOSS</i>	An indicator variable equal to “1” if net income is negative
<i>ROA</i>	Return on assets (net income / total assets)
<i>LEVE</i>	Debt / assets
<i>LIQUID</i>	Current ratio (current assets / current liabilities)
<i>BIG5</i>	An indicator variable equal to “1” if the firm’s auditor is one of the big five national auditors
<i>EFYR</i>	An indicator variable equal to “1” if the firm’s fiscal year end is December

Table 3: Descriptive Statistics

Variable	N	Mean	Std Dev	Minimum	Maximum
<i>LFEE</i>	294	14.22	0.93	11.74	16.69
<i>FRI</i>	294	7.48	0.53	6.00	9.00
<i>SR1</i>	294	5.65	0.91	4.00	9.00
<i>SR2</i>	294	8.09	0.63	6.00	10.00
<i>SR3</i>	294	8.18	0.52	6.00	9.00
<i>LNTA</i>	294	8.82	1.10	6.29	12.05
<i>INVREC</i>	294	0.23	0.14	0.01	0.76
<i>FOREIGN</i>	294	0.71	0.46	0.00	1.00
<i>EXORD</i>	294	0.21	0.41	0.00	1.00
<i>LOSS</i>	294	0.21	0.41	0.00	1.00
<i>ROA</i>	294	0.02	0.29	-4.58	0.35
<i>LEVE</i>	294	0.56	0.19	0.04	0.96
<i>LIQUID</i>	294	1.84	1.49	0.23	14.01
<i>BIG5</i>	294	0.99	0.12	0.00	1.00
<i>EFYR</i>	294	0.67	0.47	0.00	1.00

Variables are defined in Table 2

Table 4: Regression Results

$$LFEE = a_0 + a_1*TESTVARIABLE + a_2*LNTA + a_3*INVREC + a_4*FOREIGN + a_5*EXORD + a_6*LOSS + a_7*ROA + a_8*LEVE + a_9*LIQUID + a_{10}*BIG5 + a_{11}*EFYR$$

Variable	Expected Sign	Parameter Estimate	t-statistic	Parameter Estimate	t-statistic	Parameter Estimate	t-statistic	Parameter Estimate	t-statistic
<i>Intercept</i>	?	8.78	13.99***	8.62	18.40***	9.21	15.92***	7.77	11.86***
<i>FR1</i>	-	-0.07	-1.01						
<i>SR1</i>	-			-0.05	-1.45				
<i>SR2</i>	-					-0.12	-2.23**		
<i>SR3</i>	-							0.07	1.06
<i>LNTA</i>	+	0.54	16.57***	0.53	16.34***	0.55	16.76***	0.54	16.46***
<i>INVREC</i>	+	0.83	3.39***	0.85	3.49***	0.78	3.17***	0.84	3.43***
<i>FOREIGN</i>	+	0.63	8.70***	0.63	8.73***	0.61	8.51***	0.62	8.63***
<i>EXORD</i>	+	0.14	1.69*	0.14	1.73*	0.13	1.65*	0.11	1.43
<i>LOSS</i>	+	0.05	0.64	0.05	0.53	0.04	0.50	0.05	0.56
<i>ROA</i>	-	-0.02	-0.14	-0.03	-0.27	-0.01	-0.07	-0.01	-0.07
<i>LEVE</i>	+	0.65	2.77***	0.67	2.86***	0.62	2.68***	0.59	2.54***
<i>LIQUID</i>	-	-0.04	-1.40	-0.04	-1.24	-0.04	-1.50	-0.03	-1.21
<i>BIG5</i>	-	-0.04	-0.14	-0.03	-0.12	-0.04	-0.15	-0.01	-0.03
<i>EFYR</i>	+	0.35	4.61***	0.35	4.60***	0.36	4.72***	0.34	4.38***

Variables are defined in Table 2

*, **, *** Indicate 2-tailed significance at the ten-percent, five-percent and one-percent levels, respectively.

Appendix A

Questions Used to Assess Transparency & Disclosure From Patel and Dallas (2002)

Financial Transparency & Information Disclosure

Business focus

- Is there a discussion of corporate strategy?
- Report details of the kind of business it is in?
- Does the company give an overview of trends in its industry?
- Report details of the products or services produced/provided?
- Provide a segment analysis, broken down by business line?
- Does the company disclose its market share for any or all of its businesses?
- Does the company report basic earnings forecast of any kind? In detail? (2)
- Disclose output in physical terms?
- Does the company give an output forecast of any kind?
- Does the company give characteristics of assets employed?
- Does the company provide efficiency indicators (ROA, ROE, etc.)?
- Does the company provide any industry-specific ratios?
- Does the company disclose its plans for investment in the coming year?
- Does the company disclose details of its investment plans in the coming years?

Accounting policy review

- Provide financial information on a quarterly basis?
- Does the company discuss its accounting policy?
- Does the company disclose accounting standards it uses for its accounts?
- Does the company provide accounts according to the local accounting standards?
- Does the company provide accounts in alternate internationally recognized accounting method? Does the company provide each of the balance sheet, income statement, and cash-flow statement by internationally recognized methods? (4)
- Does the company provide a reconciliation of its domestic accounts to internationally recognized methods?

Accounting policy details

- Does the company disclose methods of asset valuation?
- Does the company disclose information on method of fixed assets depreciation?
- Does the company produce consolidated financial statements?

Related party structure and transactions

- Provide a list of affiliates in which it holds a minority stake?
- Does the company disclose the ownership structure of affiliates?
- Is there a list/register of related party transactions?
- Is there a list/register of group transactions?

Information on auditors

- Does the company disclose the name of its auditing firm?
- Does the company reproduce the auditors' report?
- Disclose how much it pays in audit fees to the auditor?
- Disclose any non-audit fees paid to auditor?

Ownership Structure & Investor Rights*Transparency of ownership*

- Provide a description of share classes?
- Provide a review of shareholders by type?
- Provide the number of issued and authorized but non-issued ordinary shares? (2)
- Provide the par value of issued and authorized but non-issued ordinary shares? (2)
- Provide the number of issued and authorized but non-issued shares of preferred, non-voting, and other classes? (2)
- Provide the par value of issued and authorized but non-issued shares of preferred, non-voting, and other classes? (2)
- Does the company disclose the voting rights for each class of shares?

Concentration of ownership

- Top 1, 3, 5, or 10 shareholders disclosed? (4)
- Shareholders owning more than 10, 5, or 3 percent is disclosed? (3)
- Does the company disclose percentage of cross-ownership?

Voting & shareholder meeting procedures

- Is there a calendar of important shareholder dates?
- Review of shareholder meetings (could be minutes)?
- Describe procedures for proposals at shareholder meetings?
- How shareholders convene an extraordinary general meeting?
- How shareholders nominate directors to the board?
- Describe the process of putting inquiry to board?
- Does the annual report refer to or publish Corporate Governance Charter or Code of Best Practice? (2)
- Are the Articles of Association or Charter Articles of Incorporation published?

Board & Management Structure & Process

Board structure & composition

- Is there a chairman listed?
- Detail about the chairman (other than name/title)?
- Is there a list of board members (names)?
- Are there details about directors (other than name/title)?
- Details about current employment/position of directors provided?
- Are details about previous employment/positions provided?
- Disclose when each of the directors joined the board?
- Classifies directors as an executive or an outside director?

Role of the Board

- Details about role of the board of directors at the company?
- Is there disclosed a list of matters reserved for the board?
- Is there a list of board committees?
- Review last board meeting (could be minutes)?
- Is there an audit committee?
- Disclose of names on audit committee?
- Is there a remuneration/compensation committee?
- Names on remuneration/compensation committee?
- Is there a nomination committee?
- Disclosure of names on nomination committee?
- Other internal audit function besides audit committee?
- Is there a strategy/investment/finance committee?

Director training & compensation

- Disclose whether they provide director training?
- Disclose the number of shares in the company held by directors?
- Discuss decision-making process of directors' pay?
- Are specifics of directors' salaries disclosed (numbers)?
- Form of directors' salaries disclosed (cash, shares, etc.)?
- Specifics disclosed on performance-related pay for directors?

Executive compensation & evaluation

- List of the senior managers (not on the board of directors)?
- Backgrounds of senior managers disclosed?
- Number of shares held by the senior managers disclosed?

- Disclose the number of shares held in other affiliated companies by managers?
- Discuss the decision-making of managers/ (not board) pay?
- Numbers of managers' (not board) salaries disclosed?
- Form of managers' (not board) salaries disclosed?
- Specifics disclosed on performance-related pay for managers?
- Details of the CEO's contract disclosed?

Corporate Governance and Earnings Management in Taiwan

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Abstract

There is an information asymmetry between corporate information preparers and information users that can be manipulated for financial gain. This article empirically explores corporate governance as possible mechanisms to mitigate earnings management, a category of information manipulation, of Taiwanese firms. The corporate governance mechanisms investigated are ownership concentration, number of directors, proportion of independent directors, and CEO duality. A two-stage regression model is employed to detect the effect of each mechanism. Family-control is an influential determinant in the Taiwanese economy. Therefore, this study examines corporate governance attributes of family-owned as opposed to non-family-owned firms.

Significant relationships were found among the governance mechanisms, some affecting family/ non-family controlled firms differently. Regulators and investors should be aware that regulatory mechanisms might generate disparate earnings manipulations depending upon family or non-family firm control. This information is expected to help improve oversight effectiveness by regulators, decision making by investors, and auditors assessment of risks.

Keywords: Earnings Management, Corporate Governance, Independent Directors, Taiwan stock market.

In the United States, a number of high-profile corporations committed financial fraud during the last decade of the twentieth century (Hwang et al., 2008; Hwang and Staley, 2005). Fraudulent activities were detected in such large corporations as Enron, WorldCom, Tyco, Global Crossing and others. In 2002, the U.S. Congress enacted the Sarbanes-Oxley (SOX) Act in response to these corporate financial frauds. This ushered in a new era of corporate governance which includes requirements for auditor independence, audit committee independence, CEO and CFO financial report responsibilities, and whistleblower protection. Corporate governance has become a more widely employed government mechanism to control both corporate and capital market operations following the enactment of SOX.

When corporate shares are widely spread over a large number of small shareholders, there is increased separation between the ownership and the power of operational management, which acts as the agent for the shareholders (Berle and Means, 1932). However, when the managers do not own a large number of shares, they may pursue self-interest at the expense of the shareholders' interest while making managerial decisions (Fama, 1976; Jensen and Meckling, 1976). Therefore, potential conflicts of interest may arise between stockholders and managers, which are referred to as traditional agency theory or equity agency problem. Additional conflicts may surface between controlling and non-controlling shareholders when managers also own significant percentages of shares through stock options, pyramidal ownership structure, or crossing holdings (Claessens et al., 2002; La Porta et al., 1999). This transforms the equity agency problem into a central agency problem.

The central agency problem in large corporations around the world leads to the expropriation of minority shareholders by controlling shareholders (La Porta et al., 1998). The expropriation of minority shareholders by controlling shareholders can appear in a variety of forms, such as excessive executive compensation, loan guarantees for selves and/or favored individuals/groups, transfer pricing between related parties, manipulations of reported earnings, and etc. To achieve their objectives, informed parties in these information asymmetries manipulate earnings information. The behavior of manipulating earnings

information, referred to as earnings management, usually provides misleading information to statement users or possibly extends to committing financial statement fraud. Some examples involving earnings management in Taiwan during recent years include the financial frauds of China Rebar Group, Procomp Informatics, Wellphone Securities, Pacific Electric Wire and Cable, and BenQ Corporation (see Table I for their company titles in Chinese), while the debacles of Enron, WorldCom, and Global Crossing were some typical examples in America.

Refer Table I

Corporate governance can be structured to help investors by aligning the interests of managers with the interests of shareholders and by enhancing the reliability of financial information and the integrity of reporting processes (Watts and Zimmerman, 1986). Earnings management can occur when managers use their judgment to alter financial reports which either mislead some stakeholders about underlying economic performance of the company or influence contractual outcomes that depend on reported accounting numbers (Healy and Wahlen, 1999). The mechanisms of corporate governance can help restrict managers' behaviors of earnings management (Chang et al., 2007; Cornett et al., 2009; Garcia-Meca and Sanchez-Ballesta, 2009).

Family-controlled firms have played a very important role in the history of economic development of Taiwan (Tang, 2009). In Taiwan, after a family has successfully established a business, the founder of the family-owned business usually would increase his/her business networks and economic power through marital connections with another powerful family/families in business or/and politics (Zhang and Huang, 2010). Zhang and Huang (2010) also reported that in late 2010, there were ten extremely powerful families which have controlled thirteen business groups or conglomerates with seventy-seven listed firms (5% of the total) in the Taiwanese capital market. These firms have made up a total of two trillion US dollars in equity market value, 25.7% of the total market value. In addition, the stock market in Taiwan is dominated by individual investors (67% of the total market) and is characterized by relatively low institutional ownership (30%) (Liu et al. 2011). Therefore, the firms in the Taiwan stock market are classified into the groups of "family-owned" and "non-family-owned" in this study.

The Taiwan Economic Journal (2011), the major data compiler and supplier in Taiwan, defines a family-controlled enterprise as a firm which has met one of the following conditions:

1. The positions of the board chairperson and/or CEO have been filled by the members of the so-called "family".
2. The family has controlled greater than 50% of the board of directors.
3. The family has controlled greater than 33% of the board of directors, but at least three family members become the members of the board of directors, and/or supervision/oversight committee, and/or key managers.
4. The family's control of the ownership of the firm is not less than the "critical control level" as established by Cubbin and Leech (1983).

The critical control level is computed as:

$$P^* = Z_{\alpha} * \sqrt{\pi H / (1 + Z_{\alpha}^2 \pi)}$$

Where

P^* = critical control level;

Z_{α} = z-value when $P(z < Z) = \alpha$;

α = Probability of winning a seat on the board (when $\alpha = 1$, Z -value = 3.32);

π = Probability that stockholders will vote (π is assumed to be 0.999); and

$$H = \sum_{i=1}^k \left[\frac{S_i}{N_i} \right]^2 * N_i$$

Where

H = Herfindahl Hirschman Index for measuring the ownership concentration;

S_i = the percentage of the ownership of the i th group of the shareholders;

N_i = the total number of the shareholders of the i th group of the shareholders.

The “family members” discussed above include the founder, his/her relatives of the first and second degrees of kinship, and/or the spouses of the aforementioned members.

This article will identify some mechanisms of corporate governance used by the firms listed in the Taiwanese capital market and explore the effect of each mechanism on earnings management behavior. Since the family-controlled firms have played such an important role in the economic development of Taiwan and in the capital market of Taiwan, this research will also explore the extent to which management of these family-controlled firms exhibit different behaviors in earnings management.

The results of this research will help users better analyze and understand the financial statements prepared by the listed firms in Taiwan. In turn, this enhanced understanding will further help the users better assess the reliability of the financial statements and hence, improve the quality of decisions. In addition, an improved understanding will help legislators and regulators enact laws, create policies/regulations, and enforce these laws/regulations.

The remainder of this paper is organized into five sections: Theoretical Framework and Hypotheses, Methodology, Statistical Results and Discussions, Implications of the Research Results, and finally the Conclusion.

I. Theoretical Framework and Hypotheses

Corporate governance is defined as “...the set of mechanisms that maintain an appropriate balance between the rights of shareholders... and the needs of the board and management to direct and manage the corporation’s affairs” (Denis and McConnell, 2003). Corporate governance mechanisms can be classified into two categories: boards of directors and ownership structure (Denis and McConnell, 2003; Garcia-Meca and Sanchez-Ballesta 2009). A few particular characteristics in the dimension of boards of directors that may affect the magnitude of earnings management include board independence, board size, CEO duality, executive compensation, and audit committee independence. Insider ownership, ownership concentration, and institutional ownership are included in the dimension of ownership structure. Research in this article explores the effects of ownership concentration, number of board directors, proportion of independent directors, and CEO duality (hereafter referred as the primary variables of the corporate governance mechanisms in Taiwan) on the earnings management in the capital market of Taiwan. Additionally, the effects of four control variables—return on assets, debt ratio, cash flows and firm size—will be analyzed.

The following subsections discuss the nature of each primary independent variable and control independent variable in the Taiwanese economy and formulate the hypotheses.

A. Primary Variables

Ownership Concentration

Structuring the ownership influence of a firm’s shares is a most effective method through which a firm is able to maximize its value. The controlling owners usually occupy the critical positions on the board and supervision/oversight committee and have strong opportunistic incentives to extract wealth from the minority shareholders, and thus, will not report high quality accounting information (; Fan and Wong, 2002; Jensen and Ruback 1983; Morck et al., 1988). This behavior is referred to as the entrenchment effect because the controlling owners are entrenched by their effective control of the firm allowing them to

deprive the rights of minority shareholders. An equity structure with a higher ownership concentration may adversely affect the accounting quality and accentuate earnings management due to this “entrenchment effect”.

However, Jensen and Meckling (1976) and La Porta et al. (1999) argued that the increase of ownership with the controlling owners would relax the agency problem resulting in a higher level of congruence of interest between the controlling and non-controlling shareholders. The controlling shareholders usually occupy the key positions of the company’s administration and have better motivation for maximizing the interest of the whole company due to the alignment of interest (referred as alignment effect). Thus, contrary to the “entrenchment effect”, an equity structure with a higher ownership concentration may positively affect the accounting quality and alleviate earnings management due to this “alignment effect”.

The Herfindahl index has often been adopted to measure a company’s degree of ownership concentration and market share (Cottarelli, et al. 1995; Davis 1980; Girma et al. 2008). The Taiwan Economic Journal (TEJ), the provider of the data sources used in this research, has supplied the data of critical control level rather than the Herfindahl index. Therefore, the critical control level (critical-c) as supplied by TEJ has been employed as a proxy measure for a firm’s ownership concentration level in this study. Based on the aforementioned studies, Hypothesis 1 is formulated as:

H 1: A firm’s ownership concentration will affect its earnings management. The final outcome of the effect is uncertain, depending on the relative magnitudes of alignment and entrenchment effects.

- a. (alignment effect) As a firm’s equity structure increases in owners’ concentration, its earnings management decreases.
- b. (entrenchment effect) As a firm’s equity structure increases in owners’ concentration, its earnings management increases.

Number of Board of Directors and Supervisors

The board of directors in a company should play an important role in monitoring the performance of the management. According to Taiwan Corporate Law, corporations must have a minimum of three directors. In addition, the corporate governance structure in Taiwan consists of two–tiers, namely, a board of directors and a board of supervisors. The members of both boards are elected by shareholders during an open shareholders’ meeting. The board of directors is responsible for monitoring the decisions of management and for ensuring the company’s compliance with regulations. The board of directors is also responsible for making decisions on the appointment, dismissal, and compensation of the managers in key positions. Under the Corporate Law and the Securities and Exchanges Act in Taiwan, Taiwanese firms are not required to establish an audit committee as required in the U.S. Instead, the board of supervisors is responsible for monitoring directors and management and resolving disputes between shareholders and directors (Young et al., 2008). This supervisory board is also responsible for auditing the company’s financial statements. Therefore, when the effect of the board size on earnings management is examined, the board size is measured with the total of the members of these two boards of directors and supervisors.

Larger boards provide better environmental links and more expertise and are able to make monitoring more effective (Dalton et al., 1999). Therefore, a larger board leads to a lower level of earnings management. In their study on the relationship between corporate governance and earnings management, Chtourou et al. (2001, P. 24) concluded, “A larger board is associated with less earnings management.” Using American companies’ data to study the impact of the board size on earnings management, Xie et al. (2003) drew the same conclusion. A larger board is more

likely to draw some independent directors with corporate or financial experience (Xie et al., 2003). In this regard, a larger board might function better at preventing earnings management. Hypothesis 2 is, thus, formulated as:

H 2: As a firm's number of board directors and supervisors increases, the firm's earnings management decreases.

Proportion of Independent Directors/Supervisors

A corporation's board of directors should be truly independent of any financial interests to ensure unbiased representation. To qualify as independent, a director must not be a corporate executive nor have any material pecuniary relationships or transactions with the company, its promoters, senior management or holding company, subsidiaries and associated companies or must not be related to any party with such an attribute. The level of independence of the board is determined by the proportion of independent directors. A higher proportion of independent directors denotes a more independent board. Firms with higher proportions of independent directors, have less management fraud and a lower level of errors on the financial statements (Abbott, 2000; Beasley, 1996). Further support was presented by Dechow et al. (1995) and Peasnell et al. (2005) who found that a higher proportion of independent directors correlated with a lower level of earnings management.

In order to strengthen the corporate governance, the SEC of Taiwan requires, starting in 2006, the appointment of at least two independent directors and one independent supervisor for all public firms with capital greater than fifty billion New Taiwan Dollars (equivalent US \$1.67 billion). The spirit of this requirement is to increase the monitoring capability of both the boards of directors and supervisors, and thus improve the integrity of financial information. However, the family-owned companies in Taiwan eventually appoint a number of family members to positions on both the boards of directors/supervisors and administration (Liao et al., 2006). These appointments tend to weaken the monitoring function of the boards of directors/supervisors. Liao et al. (2006) further found a positive relationship between the proportion of independent directors/supervisors and financial performance for the family-controlled firms in Taiwan. Yeh and Lee (2001) pointed out that when the controlling family appoints any independent board members, a candidate's personal relationship (Guanxi in Chinese) with the family and his/her willingness to cooperate with the family's policies and decisions on corporate affairs would first be examined as the conditions for appointment. Ching (2002) further emphasized that a controlling family in Taiwan is practically able to dictate both the operational decisions and the boards' agendas; therefore, both the boards of directors and supervisors have lost their independence. The combined effects of these two boards on earnings management are tested in this study. Based on the aforementioned discussions, Hypothesis 3 is formulated as:

H3: A firm's proportion of independent directors and supervisors will affect its earnings management. The final outcome of the effect is uncertain, depending on whether a firm is controlled by a family.

- a. (family-owned firms) As a firm's proportion of independent directors and supervisors increases, its earnings management increases.
- b. (non-family-owned firms) As a firm's proportion of independent directors and supervisors increases, its earnings management decreases.

CEO Duality

CEO duality is a term used when a firm's CEO also serves as the Chairperson of the Board of Directors, not independent of the board as defined above. This person would be in a position of significant influence as both CEO and Chairperson. The duality of a CEO would generally reduce the independence of the board. When CEO duality exists in a firm, the monitoring function of the board will be weaker, likely leading to more earnings management (Fama and

Jensen, 1983). CEO duality concentrates too much power in the CEO's position, potentially allowing for more management discretion (Cornett, 2008). The problem is exacerbated by the dual office structure permitting the CEO to effectively control information available to other board members and thus impede effective monitoring (Jensen, 1993). Therefore, if CEO duality does impede effective monitoring, it would also be associated with greater use of discretionary accruals. Hypothesis 4 is developed as:

H 4: When CEO duality exists, the firm has a higher level of earnings management.

B. Control Variables

To better detect the effects of the above primary independent variables on earnings management, the control variables of return on assets (ROA), financial leverage (Debt), cash flows (Cash-flow), and firm size (Size) are brought into the regression process. The potential impacts of each control variable will be discussed, but no particular hypotheses are formulated for these control variables.

ROA

Most countries have enacted laws and/or set regulations for their security markets to protect investors. These laws and regulations have authorized the regulatory agents to monitor the operations and financial results of the listed firms. In Taiwan, the Taiwan Securities and Futures Exchange Commission (TSFEC) has issued regulations requiring the IPO firms to include both historical earnings and earnings forecasts in the IPO prospectuses for two years (Jaggi et. al. 2006). A listed firm will be delisted by the Taiwan Stock Exchange (TSE) if the firm's total equities have become negative. ROA can be regarded as a proxy index for a company's profit policy, and/or the measurement for actual operational performance. It can be also regarded as a contractual/regulatory variable if a certain level of ROA is required by contracts or regulations. With the earnings performance criteria by TSFEC and TSE, it is expected that managers have an incentive to manage earnings. Lee et. al. (2006) used ROA as the proxy for firm performance and found that performance is positively related to earnings management.

Debt Leverage

Financial leverage is expressed by dividing total liabilities by total assets. Both financial leverage and absolute discretionary accruals are affected by both the capital structure and debt covenants of a company. Profits and losses are not treated equally in debt covenants, and such covenant restrictions may explain why firms are reluctant to report losses or lower income (Begley and Freedman, 2004). The Debt Covenant Hypothesis, proposed by Watts and Zimmerman (1986, 1990), predicts that the higher a firm's debt ratio, the more likely managers will use accounting methods that increase income. Scott (2006) tested this hypothesis and found that managers would transform the future earnings into earnings of the current period if the true earnings are approaching the point leading to a breach of contract. Firms closer to violating debt covenants manage earnings more aggressively (Press and Weintrop, 1990; Sweeney, 1994). Becker et al. (1998), Lin and Wang (2010), and Richardson (2002) confirmed that the managers who are more concerned about the breach of debt contracts are more motivated to engage in earnings management.

Cash Flows

Managers manipulate the cash flows from operations and transform small losses into small positive earnings (Burgstahler and Dichev, 1997). Insiders can use their accounting discretion to conceal economic shocks through the manipulations of both reported income and operating cash flows (Leuz et al., 2003). For example, they may accelerate the reporting of future revenues or delay the reporting of current costs to

hide poor current period performance. Conversely, insiders underreport strong current-period performance to create reserves for the future. In either case, accounting accruals buffer cash flow shocks and result in a negative correlation between changes in accruals and operating cash flows. Dechow (1994) asserted that the negative correlation is a natural result of accrual accounting. In summary, if a firm has lower cash flows from operating activities, the managers are more motivated to manage earnings upward.

Firm Size

Firm size can be measured as the natural log of a firm's total assets at the beginning of the year. This measurement can be a surrogate of the political cost of doing business for a firm. Watts and Zimmerman (1986, 1990) proposed the Political Cost Hypothesis, predicting that large firms rather than small firms are more likely to use accounting methods that reduce reported profits. Warfield et al. (1995) and Becker et al. (1998) confirmed the hypothesis by asserting that firms that are growing larger are more likely to manipulate earnings to avoid the government's attention due to regulation and/or taxation reasons.

II. Methods and Data

A. Methods

The following regression equation is established to investigate the relationships of the four primary variables of the corporate governance mechanisms and the four control variables with earnings management discussed above:

$$ABDAC = \alpha + \beta_1 \text{Critical-c} + \beta_2 \text{Num_d} + \beta_3 \text{Prop_ind} + \beta_4 \text{CEO_dua} + \beta_5 \text{ROA} + \beta_6 \text{DEBT} + \beta_7 \text{Cash-flow} + \beta_8 \text{SIZE} + \epsilon \quad (1)$$

Where:

ABDAC = absolute_discretionary accruals of the firm, as an indicator for earnings management;

Critical-c = critical control level as established by Cubbin and Leech (1983) to measure the family-ownership concentration;

Num_d = number of the directors;

Prop_ind = the proportion of independent directors and supervisors;

CEO_dua = a dummy variable that equals 1 if the CEO is the chairman or a vice chairman of the board of directors and 0 otherwise;

ROA = return of assets calculated by dividing net income by the average book value of assets;

DEBT = debt ratio calculated by dividing liabilities by assets.

Cash-flow = operating cash flows deflated by total assets.

SIZE = natural log of total assets.

Earnings management can be achieved by various means such as the use of accruals, changes in accounting methods, or changes in capital structure—e.g., debt defeasance and debt-equity swaps (Jones, 1991). The analyses are dependent upon an accurate measure of the absolute discretionary accruals (ABDAC). The absolute value of discretionary accruals can be used as a proxy for accruals-based earnings management (Becker et al., 1998; Krishnan, 2003). Total accruals (TA) are the total source of earnings management which includes both discretionary

accruals (DA) and non-discretionary accruals (NDA). The discretionary accruals (DA) are calculated by using the two-stage regression procedure from Teoh et al. (1998). These measures are calculated as follows:

$$TA_{it} / A_{it-1} = \alpha_1 (1 / A_{it-1}) + \alpha_2 (\Delta REV_{it} / A_{it-1}) + \alpha_3 (PPE_{it} / A_{it-1}) + \varepsilon_{it} \quad \text{----- (2)}$$

$$NDA_{it} = \widehat{\alpha 1} (1 / A_{it-1}) + \widehat{\alpha 2} (\Delta REV_{it} / A_{it-1}) + \widehat{\alpha 3} (PPE_{it} / A_{it-1}) \quad \text{----- (3)}$$

$$DA_{it} = TA_{it} - NDA_{it} \quad \text{----- (4)}$$

Where:

- DA_{it} = discretionary accruals in year t for firm i;
- NDA_{it} = non- discretionary accruals in year t for firm i;
- TA_{it} = total accruals in year t for firm i;
- ΔREV_i = revenues in year t less revenues in year 1-t for firm i;
- PPE_i = gross property, plant, and equipment in year t for firm i;
- A_{it-1} = total assets in year 1- t for firm i;
- ε_{it} = error term in year t for firm i; This is the same as DA in statistics.

Once the discretionary accruals (DA) have been constructed, the absolute discretionary accruals (ABDAC) are structured as follows:

$$ABDAC_{it} = |DA_{it}| \quad \text{----- (5)}$$

Where: ABDAC = The absolute value of discretionary accruals in year t for firm i.

When discretion is exercised over revenues, measure error can be introduced in discretionary accruals. To eliminate this conjectured measure error, Dechow et al. (1995) proposed a modified Jones Model. In Dechow’s Modified Jones Model, the above equation 2 was changed into: $NDA_{it} = \widehat{\alpha 1} (1 / A_{it-1}) + \widehat{\alpha 2} (\Delta REV_{it} - \Delta REC_{it}) + \widehat{\alpha 3} (PPE_{it})$ as a measure of non-discretionary accruals. Teoh et al. (1998:66) believed that “Although investors can observe accruals, they cannot infer perfectly what portion is discretionary, i.e., ‘managed’.” Given industry-related and firm-specific business conditions, some accrual adjustments are necessary.” Thus, Teoh et al. (1998) replaced Dechow’s Modified Jones Model by introducing an industry cross-sectional, two-stage regression model, as presented in the above equations 1 through 3, to extract the nondiscretionary accruals. More specifically, equation 2 is actually run first, and the error terms (ε) can then be estimated through the results of those coefficients in conjunction with the firm-year data. It is noted that the error terms are the estimates for the discretionary accruals (DA), a proxy for measuring earnings management. The second stage of these two-stage regression procedures is to run equation 1.

B. Data Sources

Data for the analyses were acquired from the Taiwan Economic Journal (TEJ), a prestigious data bank in Taiwan. The sample consisted of a set of relevant companies listed in the Taiwan Stock Market during the period of 1998-2009. A total of 11,196 firm-year observations were selected.

III. Statistical Results and Discussions

A. Statistical significance of family-controlled firms

As discussed for H1 above, the family-controlled firms have played a very crucial role in Taiwan’s stock market and economy. These firms have made up 25.7% of the total equity market (approximately two trillion US dollars). Data from the family-controlled firms were contrasted with data from the non-family-controlled firms to examine if they exhibit significantly different earnings management behaviors. The analysis used a regression equation which replaced the independent variable of critical control level (critical-c) in equation 1 with an indicator variable of “FAMILY” in which one is assigned for a family-controlled firm and zero for a non-family-controlled firm. This modified equation and its regression results are presented below:

$$\begin{aligned}
 \text{ABDAC} = & 0.034 + 0.013 \text{ FAMILY} - 0.003 \text{ Num_D} + 0.016 \text{ Prop_ind} \\
 & (0.000) \quad (0.002) \quad (0.000) \quad (0.012) \\
 & + 0.003 \text{ CEO_dua} + 0.13 \text{ ROA} + 0.041 \text{ DEBT} - 0.156 \text{ Cash-flow} \\
 & (0.429) \quad (0.000) \quad (0.000) \quad (0.000) \\
 & + 0.503 \text{ SIZE} \quad \text{-----} \quad (6) \\
 & (0.000)
 \end{aligned}$$

(level of significance, probability, in parentheses)

As indicated in equation 6, the coefficient for FAMILY is -0.012 which has a significant level at near zero. The results reveal that both family-controlled and non-family-controlled firms are significantly different groups as to the levels of earnings management of their firms in Taiwan.

B. Descriptive Statistics

Maximum values, minimum values, means, and standard deviations for each variable in equation 1 are provided in Table II. These summary statistics are calculated using a sample of 11,196 firm-year observations. The absolute discretionary accruals (ABSDA), the dependent variable, has a mean for of 0.082.

The average of the critical control level, the measure of the family control power, is 0.147 with a range from 0.008 to 0.958 and a standard deviation of 0.083. These indicate that the listed firms have a very wide span of family control capacity and ownership concentration. The mean of the indicator variable for the family-controlled companies (Family) is 0.641, reflecting that 64% of the listed firms are owned or controlled by particular families.

The mean of the number of board directors (Num_d) is 6.84, with the number of board directors ranging from 2 to 27. The mean of the proportion of independent directors (Prop_ind) is 11.1% suggesting a lack of independence of board directors. The mean of the duality of CEO (CEO_dua) is 0.913, which reflects that about 91% of the listed firms in this sample have CEO duality in their management structure. Therefore, the CEO duality is a very common practice for the listed firms in Taiwan.

Insert Table II

The mean of return on assets (ROA) is 0.055 with a range of -0.259 to 0.4321, demonstrating on average, positive profits through the financially difficult last decade. The mean of the debt ratio is 0.075 with a range of 0.025 to 0.859, displaying a wide range of financing strategies. The mean of the cash flows from operating activities is 0.071 with a range of -8.883 and 3.771, which reflects that some listed firms have very large negative operating cash flows, while other firms have a fair amount of positive operating cash flows. Finally, the mean of firm size is 1.154 with a range of 0.165 and 44.364, which indicates that some listed firms have very large total assets, while some other firms have relatively much smaller amounts of total assets.

C. Pearson correlation

Pearson correlation coefficients were calculated to disclose the relationships among the variables (see Table III). The critical control level (Critical_c) has a significant negative correlation with the number of directors (Num_d) and has a significant positive correlation with the proportion of independent directors. The CEO duality and the number of board directors have a significant positive correlation, implying that CEO duality exists in the firms with larger numbers of board directors. The CEO duality and the critical control level have a

significant negative correlation. Apparently, CEO duality is less common in family-owned firms.

Insert Table III

Return on assets (ROA) has significant positive correlations with the critical control level, proportion of independent directors, and CEO duality, implying that return on assets increases when the latter three variables increase. The debt leverage ratio (DEBT) has significant negative correlations with the critical control level, number of directors, the proportion of independent directors, CEO duality, and ROA. Cash flows from operating activities has significant positive correlations with number of directors, the proportion of independent directors, CEO duality, and ROA; it has significant negative correlations with the critical control level and debt ratio. Finally, the firm size is found to have significant positive correlations with the critical control level and ROA and has significant negative correlations with the number of directors and the operating cash flows. According to Horngren (2009), when the absolute value of a Pearson correlation coefficient is greater than 0.7, it indicates the problem of multicollinearity. The highest coefficient in the table is 0.35, which occurs between ROA and the cash flows from operating activities (CFO). The rest of the coefficients are relatively small, and therefore, the regressions in the study are considered to not be affected by the multicollinearity issues.

D. Regression Results and Discussions

Family-controlled companies have made up a very prominent segment of the Taiwanese economy. Ostensibly, the types of ownership in Taiwan differentially impact managements' earnings management behavior. Table IV presents the regression results for three data groups: family-controlled, non-family-controlled, and all (combined) firms.

Insert Table IV

The coefficient of the critical control level (*critical_c*) has a significant positive effect on earnings management in all three data groups. The critical control level measures the degree of ownership concentration or market share. Firms with a higher level of family-ownership control power, or a higher ownership concentration, will have higher earnings management. Therefore, Hypothesis 1 is confirmed indicating that ownership concentration affects a firm's earnings management in a way that the entrenchment effect overrides the alignment effect for firms in Taiwan. Tang (2010) and Young (2008) found the presence of entrenchment effect for the family-controlled firms in Taiwan. This research confirms their findings, but this study also reveals a positive correlation between ownership concentration and earnings management for the non-family-controlled firms in Taiwan.

Board size (*Num_d*, the total of the board of directors and the board of supervisors) shows a significant negative effect on earnings management for all three data groups. This implies that larger board size produces lower earnings management, which illustrates that board size is an effective mechanism for corporate governance in Taiwan. Therefore, Hypothesis 2 is confirmed with all three data groups.

The proportion of independent directors/supervisors (*Prop_ind*) has a significant positive influence on earnings management in the groups of all firms and family-controlled firms. Thus, Hypothesis 3-(a) is confirmed suggesting the appointment of independent directors/supervisors would not help reduce earnings management for the family-owned firms in Taiwan. This result agrees with the argument by Yeh and Lee (2001), Ching et al. (2002), and Liao et al. (2006) that the independent directors and supervisors in the family-owned firms in Taiwan are likely to lose their independence and would not perform their monitoring duty as effectively as expected. Liao et al. (2006) suggested that the family-controlled firms with better financial performance would have higher motivation to appoint more independent directors/supervisors in order to relax the public suspicion on their earnings management. The coefficients of critical control level (*critical-c*) for Equation 1 and the coefficient of

Family for Equation 6 reveal all positive signs for the family-owned firms in Taiwan, indicating that both family controlling power and ownership concentration motivate earnings management. Therefore, the aforementioned suggestion by Liao et al. (2006) is accordingly confirmed in this study.

The proportion of independent directors/supervisor is a negative factor on earnings management for the non-family-controlled firms in Taiwan, but it is not significant so as to support Hypothesis 3-(b) that a higher proportion of the independent directors/supervisors would help reduce earnings management as asserted by Dechow et al. (1995) and Peasnell et al. (2005). The effect of the proportion of independent directors/supervisors for the overall group of all firms reveals a positive impact on earnings management at the 5% significant level which is undoubtedly driven by the dominant effect for the family firms (significant at 1%) over that for the non-family-owned firms.

The CEO duality is not found to be a significant factor affecting earnings management for any of the three groups of firms. Therefore, Hypothesis 4 is not confirmed in this study. This shows that the CEO duality does not impose a serious impact on earnings management and does not need special consideration for corporate governance at the present time in Taiwan.

The control variables demonstrate some interesting effects. ROA provides a significant negative effect to earnings management in the non-family-controlled group but has a significant positive effect on the groups of all firms and family-controlled. The positive relationship between ROA and earnings management for the family-controlled firms is consistent with the results found for the entrenchment effect of the controlling families in Taiwan. Most of the key managers of the family-controlled firms are members of the controlling families, and they pursue higher ROA for family interests and are more motivated for upward earnings management. Conversely, the managers of the non-family-controlled firms are not motivated by the family-interest issue and do not manipulate earnings.

Debt ratio (DEBT) has a significant positive relationship on earnings management for all three data groups, implying managers of the listed firms in Taiwan are very concerned about the restrictions imposed by the debt covenants and therefore, a higher debt ratio motivates managers to manipulate earnings management. This finding agrees with those by Watts and Zimmerman (1986, 1990), Scott (2006), Backer et al. (1998) and Lin and Wang (2010). The firm size also presents a significant positive influence on earnings management among all three data groups, implying that the political cost, such complying with government's regulations or paying higher taxes, does not motivate managers to defer current profit to the future as found by Watts and Zimmerman (1986, 1990), Warfield et al. (1995), and Becker et al. (1998). Finally, the cash flows from operating activities present a significant negative impact on earnings management in the groups of all firms and family-controlled firms, but they become a non-significant factor for the non-family-controlled firms, implying that the operating cash flows exert a much stronger effect on earnings management for family-controlled firms than for the non-family-controlled firms. This also indicates that if the family-controlled firms have higher operating cash flows, they have less motivation for earnings management.

IV. Implications

According to Garcia-Meca and Sanchez-Ballesta (2009) and Holthausen et al.(1995), if the percentage of ownership of a few largest shareholders is very substantial, earnings management would usually be inefficient for the firm as a whole because this ownership structure will develop a high degree of congruence between their personal interest and the firm's interest, and thus, the largest shareholders may have very little incentive to engage in earnings management. This study found that the effect of ownership on earnings management in Taiwan does not agree with that of Garcia-Meca and Sanchez-Ballesta (2009) and Holthausen et al.(1995) because the

results reveal that when the ownership is more concentrated, there is a higher level of earnings management for all three groups of data in Taiwan. This evidence reveals that the entrenchment effect overrides the alignment effect regarding the impact of the controlling shareholders on earnings management. This finding implies that the regulations on the Taiwanese capital market should discourage ownership concentration to reduce earnings management if it is believed that the practice of earnings management would generate more harm than good.

Earnings management behavior is much different between the groups of family-controlled and non-family-controlled firms. The variables of the proportion of independent directors/supervisors (Prop-ind) and return on assets (ROA) are significant positive factors affecting earnings management for family-controlled firms, while both of them are negative factors for the non-family-controlled firms in Taiwan. In addition, the variable of the cash flows is a significant negative factor on earnings management for the family-controlled firms, while it is a non-significant factor for the non-family-controlled firms. These findings suggest that security regulators should be aware that the same regulatory mechanisms would generate different effects on firms depending on the types of ownership. This information is expected to help improve the oversight efficiency by regulators. It will also help both internal and external auditors' better access where the audit risks may exist.

V. Conclusion

Investors, basing stock values on estimated future earnings, rely heavily on reported earnings. Knowing that earnings reports can be manipulated by earnings management allows investors to make better informed decisions. Therefore, identifying attributes that indicate where earnings management may be more prevalent can help investors make more prudent decisions or control for possible reporting biases. Additional benefits would come from the government identifying potential earnings management and creating regulations to achieve higher quality earnings reports. This article presents an empirical analysis of several corporate governance attributes' impacts on earnings management for the firms listed in the Taiwanese Capital Market. If a company implements and practices a higher level of corporate governance, there would be a lower level of earnings management.

Ownership concentration had significant positive influence on earnings management and board size had significant negative effects on earnings management in all data groups. For the listed firms, knowing which firms have more concentrated ownership and/or smaller board sizes signals expectations of greater earnings management. Attending to this attribute can benefit investors with more informed purchases/sales and allow government agencies to regulate more effectively.

Family-ownership of businesses affects earnings management differentially with some corporate governance mechanisms. The proportion of independent directors/supervisors significantly, positively affects earnings management for family-controlled firms, while negatively affecting earnings management for the non-family-controlled firms in Taiwan. Users of earnings reports must identify a firm's family-ownership level to understand the impact of the proportion of independent directors/supervisors as a corporate governance mechanism.

The CEO duality had no significant effects on earnings management for any group of firms. CEO duality would not be useful as a corporate governance mechanism in Taiwan.

As in many capital markets in the world, the Taiwanese Capital Market security market encounters some problems, such as financial fraud, less accounting transparency, lack of fair presentations of financial statements, market instability, and higher government interference. This study provides useful information to help government regulators improve their oversight efficiency, and in particular, help them design and enact more realistic corporate governance practice codes tailored to the Taiwanese institutional/cultural background and current

environment in its capital market. In addition, the findings provide useful guidance for firms to implement appropriate corporate governance practices with the goal to decrease earnings manipulation and to enhance the effectiveness of internal control. Some corporate governance mechanisms and policy variables may pose differential effects on earnings management, depending on whether the firm is family-owned or non-family-owned.

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Table I: The Titles of Companies in Chinese and English

Chinese Title	English Title
力霸集团	China Rebar Group
博达科技	Procomp Informatics LTD.
汇丰证券	Wellphone Securities Co., LTD.
太平洋电线电缆	Pacific Electric Wire and Cable Co., LTD
明基电子	BenQ Corporation

Table II: Summary of the Statistics of the Variables

	min	max	average	sd
ABDAC	0.000	3.202	0.082	0.117
Critical-c	0.008	0.958	0.147	0.083
Family	0.000	1.000	0.641	0.480
Num_d	3.000	32.000	9.410	2.844
Prop_ind	0.000	0.750	0.110	0.153
CEO_dua	0.000	1.000	0.913	0.282
ROA	-0.259	0.321	0.055	0.083
DEBT	0.075	0.859	0.430	0.164
Cash-flow	-8.883	3.711	0.071	0.175
SIZE	0.165	44.364	1.154	0.666

Variable definition :

ABDAC = absolute discretionary accruals of the firm, as an indicator for earnings management.

Critical-c = critical control level (lowest required ownership percentage) for a family or a group to

Family secure the control over the company.

Num_d = a dummy variable, 1 for family –owned firms, and 0 for non_ Family _owned firms.

Prop_ind = number of the directors.

CEO_dua = the proportion of independent directors.

ROA = a dummy variable that equals 1 if the CEO is the chairman or a vice chairman of the board of directors and 0 otherwise.

DEBT = return of assets calculated by dividing net income by the average book value of Cash-flow assets.

SIZE = Debt ratio calculated by dividing total liabilities by total assets.

= operating cash flow deflated by total assets.

= firm size; natural log of total assets.

Table III: Pearson correlation of the Variables

	Critical-c	Num_d	Por_d	CEO_dua	ROA	DEBT	Cash-flow	SIZE
Critical-c								
Num_d	-0.176** 0.000							
Prop_ind	0.120** 0.000	0.000 0.971						
CEO_dua	-0.025** 0.009	0.022* 0.022	-0.015 0.112					
ROA	0.142** 0.000	0.004 0.662	0.178** 0.000	0.034** 0.000				
DEBT	-0.053** 0.000	-0.035** 0.000	-0.071** 0.000	-0.034** 0.000	-0.290** 0.000			
Cash-flow	-0.021** 0.025	0.049** 0.000	0.087** 0.000	0.020* 0.034	0.350** 0.000	-0.195** 0.000		
SIZE	0.079** 0.000	-0.039** 0.000	0.010 0.298	-0.015 0.120	0.167** 0.000	0.005 0.577	-0.315** 0.000	
Variable definition : Please refer to Table II.								
Note: * and ** indicate significance at 5% and 1% levels, respectively.								

Table IV: Regression Results on Earnings Management

	Expected sign	All			Non_Family_Own			Family_Own		
		Coeff	T-Value	Sig	Coeff	T-Value	Sig	Coeff	T-Value	Sig
constant		0.010	1.67	0.095	-0.027	-2.50	0.012**	0.034	4.39	0.000**
Critical-c	?	0.103	8.38	0.000**	0.107	5.15	0.000**	0.103	6.99	0.000**
Num_d	-	-0.002	-6.94	0.000**	-0.003	-4.41	0.000**	-0.002	-5.48	0.000**
Prop_ind	?	0.017	2.53	0.012*	-0.008	-0.70	0.487	0.029	3.55	0.000**
CEO_dua	+	0.003	0.85	0.394	0.000	0.07	0.941	0.003	0.75	0.451
ROA	-	0.120	8.63	0.000**	-0.045	-2.00	0.045*	0.203	11.86	0.000**
DEBT	+	0.041	6.56	0.000**	0.034	3.24	0.001**	0.035	4.60	0.000**
Cash-flow	-	-0.152	-23.03	0.000**	-0.015	-1.38	0.167	-0.254	-31.88	0.000**
SIZE	+	0.053	32.20	0.000**	0.102	29.15	0.000**	0.030	16.42	0.000**
R ²		0.212			0.209			0.274		
ADJ R ²		0.211			0.207			0.273		
F-VALUE		376.02**			132.39**			337.33**		
Variable definition : Please refer to Table II.										
Note: * and ** indicate significance at 5% and 1% levels, respectively.										

**Avoiding The Passive Activity Loss “Rental” Classification For Real Estate In
Order To Deduct Losses For Federal Income Tax**

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Abstract

This paper examines the deterrent to a taxpayer when its real estate is treated as a “rental” under the federal income tax passive activity loss rules. It then discusses the various regulatory exceptions which enable the taxpayer to structure its real estate investments to avoid the automatic passive status assigned to rental real estate. If the taxpayer is successful in avoiding the “rental” classification, it can materially participate in the real estate activity which allows the net loss to be currently deductible.

Overview - Passive Activity Loss Rules and Rental Real Estate

Review of Passive Loss Rules - The federal income tax passive loss rules prohibit a taxpayer from using losses from passive activities to offset income from non-passive (“active”) activities. The passive loss rules require the taxpayer to group its business endeavors into business activities.⁵ Every year, the taxpayer must determine whether each business activity is active or passive by satisfying one of seven “material participation” tests.⁶ If the taxpayer materially participates in the activity, it is active. If the taxpayer does not materially participate, the activity is passive.

After the taxpayer determines the active or passive status of each of its activities, the active activities have a current effect on the taxpayer’s tax return. The passive activities, however, are treated differently. Generally, the net income and losses from taxpayer’s *passive* activities are netted against each other, and any *net* passive activity loss is *disallowed* as a current deduction on taxpayer’s tax return. A taxpayer would prefer to be able to currently deduct any net passive loss.

Rental Real Estate Automatically Passive - In determining its different activities, a taxpayer is allowed some discretion in “grouping” certain business endeavors into one business activity. Although a taxpayer has some grouping discretion in determining its activities, it generally⁷ cannot group its *rental* real estate activities with other real estate activities or with non-real estate activities.⁸

Example: Assume taxpayer has significant ownership in an appliance sales business, a real estate remodel business, and also personally owns several rental homes. The tax rules may allow taxpayer to treat the appliance sales business and the real estate remodel business as one activity for purposes of satisfying one of the seven material participation tests. However, taxpayer cannot combine the real estate rentals with either the real estate remodel business or the appliance business.⁹

⁵ Grouping endeavors into activities is based on a facts and circumstances test using factors specified in the regulations. See 1.469-4 et seq.

⁶ 469(c)(1); 1.469-5T(a)

⁷ A rental can be combined with a trade or business activity if one is insubstantial to the other or under the “same proportionate interest” rule. See 1.469-4(d)(1)(A)-(C)

⁸ 1.469-4(d)(1)&(d)(2)

⁹ See 1.469-4(c)(3)Ex 1-3 for examples using “grouping” factors to combine businesses into an activity.

The reason that rental real estate activities are kept separate is that they are automatically passive regardless of the taxpayer's material participation.¹⁰ In other words, for a taxpayer who is not a real estate professional,¹¹ if a taxpayer's real estate activity is classified as a "rental,"¹² it is automatically passive (regardless of taxpayer's material participation under the seven tests).

Potential Current Deduction for *Passive* Rental Real Estate Loss (The "Free Up Rule") - Since rental real estate usually creates a net loss,¹³ its classification as automatic passive is not favorable to the taxpayer because the taxpayer usually cannot currently deduct the loss. The passive loss rules contain a limited exception which allows the current deduction of a net passive activity loss from rental real estate (the "free up rule"). If an individual's¹⁴ adjusted gross income ("AGI") is less than \$150,000 and other requirements are satisfied,¹⁵ then up to \$25,000 of net passive activity loss from rental real estate is currently allowed even though it is passive. Consequently, a taxpayer who can deduct its entire rental real estate loss using the "free up" rule, usually does not care whether its real estate is classified as automatically passive because it can deduct the loss regardless of classification.¹⁶

Example: Assume taxpayer has AGI of \$200,000 before considering taxpayer's <\$7,000> net loss from a vacation condominium. If the vacation condominium is classified as a "rental," it is automatically passive, and the free up rule does not apply because taxpayer's AGI exceeds \$150,000. Consequently, taxpayer cannot currently offset/deduct the <\$7,000> passive rental loss against the \$200,000 active income. As illustrated above, a taxpayer who cannot utilize the free up rule¹⁷ has incentive to avoid the "rental" classification for its real estate activities that produce a net loss.

Effect on Taxpayer if a Real Estate Activity is *Not a Rental* - As stated earlier, if the taxpayer's real estate activity is not treated as a rental, the loss from that activity is not automatically

¹⁰ 469(c)(2)&(4); The automatic passive rule also applies to the rental of equipment ("tangible property") See 1.469-1T(e)(3)

¹¹ A taxpayer qualifying as a "real estate professional" can prove material participation in its real estate even if they are "rentals." This paper discusses the ability of a non-real estate professional to avoid rental status for its real estate which is a necessary precondition to prove material participation related to their real estate activity. See 469(c)(7) for the definition of a real estate professional.

¹² 1.469-9(b)(3) Certain buildings such as a hotel, vacation condo, assisted living apartment, hospital, surgery recovery center, etc., may be treated as a *business* real estate and *not* a rental. A *rental* real estate activity is where payments are principally for the use of tangible property (469(j)(8)), rather than for services. See 1.469-1T(e)(3) (referenced by 1.469-9(b)(3)) which provides seven tests where tangible property (such as a building) is *not* treated as a rental due to short rental periods and/or the primary purpose was to receive services.

¹³ Expenses such as depreciation, interest, property taxes, maintenance costs, etc. exceed rent income.

¹⁴ The "free up" rule is generally limited to individuals (not entities) (469(i)(1)), and does not apply to an interest in a publicly traded partnership (with some exceptions) 469(k)(1).

¹⁵ In addition to the AGI phase out, the individual taxpayer must also "actively participate" (which requires satisfying certain service and ownership rules) in order to qualify for the "free up" rule. See 469(i)(6)

¹⁶ See 1.469-9(j) where a taxpayer can use the rental real estate passive loss "free up" rule regardless if taxpayer is (or is not) classified as a real estate professional.

¹⁷ A taxpayer may not get a complete deduction of its loss from the free up rule even if its AGI is below \$150,000. The \$25,000 maximum deduction allowed by the free up rule begins to phase out when taxpayer's AGI exceeds \$100,000.

passive. Rather, the non-rental real estate activity is active or passive depending on taxpayer satisfying one of the seven material participation tests. If taxpayer can “prove” material participation related to the activity, it can currently deduct the loss.

Note that avoiding “rental” status for real estate does *not* make the real estate activity active. Rather, it allows the taxpayer to prove its material participation in the activity as it would with other business activities: by satisfying one of the seven material participation tests.

Example: Assume taxpayer has a loss from an apartment building that is used for housing and caring for the elderly. If the apartment building is not considered a rental, it is not automatically passive. The taxpayer has the opportunity to make the apartment building loss “active” by proving its material participation using one of the seven tests. The non-rental apartment building loss may be still considered passive if taxpayer cannot satisfy one of the seven material participation tests.

Avoiding “Rental” Status for a Real Estate Activity

In many cases a real estate activity creates a net loss. That is, expenses related to the real estate (such as depreciation, interest, property taxes, maintenance costs, etc.) usually exceed the rent received. Therefore, the taxpayer is usually trying to prove that the real estate is active in order to currently deduct the loss. In order for taxpayer to treat its real estate as active, it must prove the real estate is not a rental (not automatically passive) and then prove that taxpayer materially participates in the real estate activity using one of the seven material participation tests.

Real estate is treated as rental where (1) the taxpayer’s principal purpose in holding the real estate is for use by customers (rather than appreciation or expense sharing) *and* (2) payments received by customers are primarily for the use of the real estate rather than taxpayer provided services.¹⁸

If the taxpayer receives rent or makes reasonable efforts to rent out the real estate, it usually cannot argue that its principal purpose in holding the real estate is appreciation rather than for use by customers.¹⁹

However, the second part of the definition excludes real estate from being a rental if the “rent” payments received by customers are not primarily for the use of property, but rather for services. Focusing on the principal reason for a customer’s payments (use of property or services) is subjective. However, the regulations provide specific exceptions which exclude real estate activities from being classified as rental activities. Usually, if the property is “rented” and one of the following exceptions do not apply to exclude the real estate from “rental” status, the real estate is likely to be treated as rental real estate.²⁰

A real estate activity is not a rental activity if the average customer use is seven days or less.²¹ A taxpayer could probably use this exception to exclude a vacation condominium, a time share, a

¹⁸ 469(j)(8); 1.469-1T(e)(3)(i)

¹⁹ See Seits, Kevin (1994) TC Memo 1994-522 where a co-op apartment was not a rental because taxpayer did not make efforts to rent. See also 1.469-4(d)(1) for a rare exception where rental real estate is not treated as a separate rental activity by “grouping” it with a non-rental business where the rental real estate is insubstantial but an integral part of the larger business.

²⁰ Benson, Eric B., (2004) TC Memo 2004-272, pg. 1695

²¹ 1.469-1T(e)(3)(ii)(A)

condo hotel/apartment, or hotel from the definition of a rental. If the taxpayer's real estate has an average customer use of 7 days or less, then it is not a rental property and the taxpayer determines active or passive using the seven material participation tests.²² Under this rule, the amount and nature of services provided to the tenant does not matter.

Special rules are used to calculate the average period of customer use. The average use does not compare the number of 7 day (or less) leases to the number of leases greater than 7 days. Rather it compares the total number of rented days to the total number of leases during the year. Therefore one lease of long duration could make the real estate a rental property even though many of the leases during the year were 7 days or less.²³

Example: Taxpayer owns a vacation condominium apartment which it rents to customers for weekends and weekly rentals. The tax court held that the vacation condo was not a rental because the average period of customer use (total rented days/number of times rented) was 7 days or less.²⁴

A real estate activity is not a rental activity if the average customer use is 30 days or less *and* significant personal services are provided by or on behalf of the taxpayer/owner.²⁵ If the taxpayer could not exclude its real estate from the categorization as a rental under the 7 day rule above, it appears promising that it could exclude such real estate from the definition of a rental using this rule. However, it is extremely difficult to extend this rule's application beyond equipment and apply it to a vacation condominium, time share, or apartment. Although the average customer use of vacation or "long stay" residential real estate is likely to be 30 days or less, it is unlikely that the taxpayer and individuals paid by taxpayer provide the tenant with "significant" personal services as *defined by the regulations*.

Personal services provided by individuals to the tenant/customer are deemed "significant" depending upon: their frequency, their type and amount, and their value compared to the value of the rent charged for the use of the property.²⁶ Although many services are provided to the tenant in connection with high-grade residential real property, the services related to *common* areas (e.g., cleaning and maintenance of the complex, repairs, trash collection, elevator service, security, pool/spa areas) do not count.²⁷ Services related to permanent improvement (or repairs that extend the life) of the property also do not count. As a consequence, the services that count are those provided to the *tenant* that are *unit-specific*, such as unit cleaning, linen, repair, and maintenance services, and they do not rise to the level of substantial.²⁸ Therefore, most

²² The average use does not compare the number of 7 day or less leases to the number of leases greater than 7 days. Rather it compares the total number of rented days to the total number of leases during the year. See 1.469-1(e)(3)(iii). Therefore one lease of long duration could make the condo a rental property even though many of the leases during the year were 7 days or less.

²³ 1.469-1T(e)(3)(iii).

²⁴ See Chapin, Theodore (1996), TC Memo 1996-56

²⁵ 1.469-1T(e)(3)(ii)(B)

²⁶ 1.469-1T(e)(3)(iv)(A)

²⁷ 1.469-1T(e)(3)(iv)(B).

²⁸ See 1.469-1T(e)(3)(viii), Ex. 4 where the services provided to customers of a residential apartment/hotel were not significant and therefore the property was treated as rental real estate.

residential real estate properties will not be excluded from the definition as a rental using this test.

Example: Taxpayer owns a vacation condominium which it rents to customers/tenants for an average of greater than 7 days but no more than 30 days. Taxpayer (or its agent) performs all the marketing, guest booking and access, unit repair and cleaning, and banking and bookkeeping services related to the unit. The vacation condo was treated as rental because some of the services didn't count (services as an owner rather than services provided to the tenant), and the value of services which counted were not significant when compared to the value of the rent charged for the property.²⁹

A real estate activity is not a rental activity if extraordinary personal services are provided to the tenant regardless of the period of customer use.³⁰ Basically, this test provides that a real estate activity is not a rental if the overwhelming purpose for the tenant/customers payment is to receive personal services and the use of the real estate is incidental to the receipt of the services. For this rule, the average period of customer use doesn't matter. Consequently, this rule could apply to exclude real estate from the definition of a rental where average customer use is longer than 30 days.

This rule is based on tenant's motivation and does not expressly mention a comparison of value of services provided to the value of the use of the real estate. However it is hard to imagine a situation where the value of the services was minimal compared to the rental value of real estate and tenant's motivation was services.

For most residential real estate, it is unlikely that the overwhelming motivation of the tenant is the receipt of services, not the use of taxpayer's property. However, this rule can apply to medically oriented real estate such as a hospital (recovery or treatment center),³¹ a senior living community, a student dorm³², or an office space where the landlord provides significant staff services.

Example: Landlord/taxpayer provided office space and significant related legal/office support activities to its attorney/tenants. The court found that the office/commercial building was not a rental since the attorney/tenant's primary motivation in entering into the lease was the value of the landlord services related to legal and office support.³³

A real estate activity is not a rental activity if the rental is incidental to a non-rental activity.³⁴ This exception applies a mechanical test to determine whether taxpayer's primary purpose in owning the real estate is not for the rent, but rather for either investment/gain appreciation or taxpayer use in its non-rental business.³⁵ Basically, if the rent is a very small amount, it is

²⁹ Sweet, Robert P., (2004) TC Summary Opinion 2004-125. Although a "Summary" opinion cannot be cited as authority, the decision does provide an example of how "rental" status is determined using the 30-day rule.

³⁰ 1.469-1T(e)(3)(ii)(C)

³¹ 1.469-1T(e)(3)(v).

³² Id

³³ See Assaf F. Al. (2005) TC Memo 2005-14

³⁴ 1.469-1T(e)(3)(ii)(D)

³⁵ 1.469-1T(e)(3)(vi)

assumed that the taxpayer must be holding the property for some other reason than rental income.

The mechanical test provides that real estate is not a rental activity if the gross rental income for the year is less than 2% of the unadjusted basis of taxpayer's property (or fair market value if lower).³⁶ For example, a taxpayer who leases unimproved land for minor farming or cattle grazing may avoid rental status.³⁷ Similarly, residential real estate provided to an employee is not treated as a rental activity if the lodging is furnished by the taxpayer/employer to an employee for the convenience of the employer within the meaning of code section 119.³⁸

A real estate activity is not a rental activity if the taxpayer customarily makes the property available during defined business hours for nonexclusive use by various customers.³⁹ Basically, this rule requires that the real estate is available to multiple customers at the same time.

Example: Assume taxpayer charges a fee for customers/users and allows them all to use the property at the same time such as the use of a golf course, health club, or parking lot. Generally, since no client has pre-determined exclusive rights to a specific part of the property, the real estate is not a rental. However, if the real estate, such as a parking lot, has predetermined reserved space for specific tenant/user's exclusive use, it may not be excluded from the definition of a rental under this exception.⁴⁰

A real estate activity is not a rental activity if the taxpayer allows its real estate to be used by its non-rental business (passthrough entity or joint venture) in its *capacity as an owner* rather than as a 3rd party landlord.⁴¹ A taxpayer is considered as using its real estate in its capacity as an owner if the money received for the use of the property is not rent from a lease but rather an amount dependent on the operational success of the taxpayer's underlying business that uses it.⁴²

Example: Assume taxpayer is the sole owner of farmland which it leases (for fair market value rent) to a farming partnership which is jointly owned by taxpayer and another person. The farmland is a rental activity because the taxpayer's "return/rent" on the farmland is not dependent on the operational success of the farming business. The taxpayer is not using the real estate in its capacity as a part owner of the partnership, but rather treated like a 3rd party landlord.⁴³

Example: Assume the same facts except taxpayer "leases" the farmland to the partnership under a crop share lease where the partnership is required to use its best efforts to farm the land, pay operational costs, and produce marketable crops. For the use of the land, the taxpayer is entitled to 50% of the partnership profits generated from the farming business. The farmland is not a rental activity because the taxpayer's "return/rent" on the

³⁶ 1.469-1T(e)(3)(vi)(B)(2)

³⁷ 1.469-1T(e)(3)(viii)Ex. 5. Note a taxpayer which has net income from its investment land may want it to be treated as a rental so the income is passive and can be offset with other passive losses.

³⁸ 1.469-1(e)(3)(vi)(D)

³⁹ 1.469-1T(e)(3)(ii)(E)

⁴⁰ See Kenville, Thomas, (1997, DC ND) 80 AFTR 2d 97-7905.

⁴¹ 1.469-1T(e)(3)(ii)(F)

⁴² See IRS Letter Ruling 200014010

⁴³ See IRS Letter Ruling 9722007; Sciabica, Vincent S., (2002) TC Summary Opinion 2002-146

farmland is dependent on the operational success (profits) of the underlying farming business. The taxpayer is using the real estate in its capacity as a part owner of the partnership, rather than as a 3rd party landlord.⁴⁴

As these examples illustrate, the taxpayer which uses its real estate in a non-rental business that it owns, should not charge fixed rent (or charge a fixed amount significantly less than fair market value rent). Rather the “return/rent” on the property should be based upon the overall operation success/profits of the underlying non-rental business using the property.

Conclusion

When a taxpayer has a net loss from a real estate activity (rent is less than expenses), it does not want the real estate to be treated as a rental. If the real estate is treated as a rental, the net loss is automatically passive which usually means the loss is not currently deductible. A free up rule allows for the current deductibility of a net passive loss from rental real estate. However, the free up rule does not help taxpayers with high AGI or rental real estate losses greater than the free up amount. For these taxpayers (who are not real estate professionals), the primary way to currently deduct losses related to their real estate is to avoid categorizing their real estate as a “rental” by using one of the exceptions provided in the income tax regulations. The exceptions describe various instances where a taxpayer can receive payments/rent for the use of its real estate without treating the real estate as a rental activity. If the taxpayer is successful in avoiding the “rental” classification, it can materially participate in the real estate activity which allows the net loss to be currently deductible.

⁴⁴ See 1.469-1T(e)(3)(viii) Ex 8. Note the taxpayer’s real estate in the example may be treated as a rental if the “rent/profit sharing” amount to be paid by the partnership is based on *gross sales* rather than on the *overall profits* of the farming partnership. See IRS Letter Ruling 200014010

**Characteristics Of Islamic Banking And Financing: Can It Succeed In The
United States Market Place**

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Abstract

The purpose of this article is to evaluate the potential future of Islamic banking in the United States by comparing conventional western and Islamic financial practices. This article determines that differences in banking principles, as well as the social climate, must be addressed by both sides if Islamic banking is to succeed in the American marketplace. Furthermore, the article does not attempt to debate over whether or not allowing Islamic financial services in the U.S. is right or wrong. It will, however, briefly discuss the recent changes in how the U.S. views Islamic banking in order to illustrate the role Federal and state governments play regarding the success of Sharia based banking.

Introduction

Until the mid-to-late 1960's commercial, interest-free banking was long considered by many to be infeasible. The perceived incompatibility of Sharia compliant services with the world's conventional banking systems prevented many financial institutions from addressing the possibility of offering such services. However, in 1963 Dr. Ahmed al-Najjar created a bank which operated on the principles of Sharia. The bank operated interest-free, earning profits by engaging directly in trade and industry as well as through profit-loss sharing by financing businesses (Warde, 2000). The bank, which was located in Mit Ghamr, Egypt, operated successfully until its closure in 1967 for reasons which are still up for debate. However, the most important lesson which Dr. al-Najjar's experiment taught the financial world was that Sharia compliant commercial banking was indeed possible. Taking note of this, Dubai Islamic Bank (DIB) was established in 1975 as the world's first private interest-free bank. The introduction of DIB marked the general beginning of Islamic banking's rapid world-wide growth (Olson & Zoubi, 2008).

Today, Islamic banking in the United States is still in the early-market stages with the introduction of the University Islamic Financial Corporation (UIFC) taking place on December 29, 2005 (University Islamic Financial Corporation, 2011). UFC was the first Islamic banking subsidiary run entirely on Sharia principles to enter the U.S. market. Although the U.S. Islamic finance industry has experienced positive growth since UFC began offering Sharia compliant services, there remains two major issues that must be addressed if the industry is to continue to grow in the long-run.

The first and most significant issue is the difference between how the American and Islamic financial systems operate. This encompasses everything from the legal systems governing large financial organizations all the way down to the everyday banking services offered to the end customer. The second major issue facing Islamic banking's success is the animosity exhibited towards middle easterners and others of the Islamic faith by many in the United States. The culture of post-9/11 America has seen individuals in all levels of society attempt to prevent the expansion of Islamic banking within the U.S. Political leaders and average citizens each have their own belief regarding the issue of accommodating Sharia-compliant financing and many express that opinion passionately. This article does not attempt to debate over whether or not allowing Islamic financial services in the U.S. is right or wrong. The article will, however, briefly discuss the recent changes in how the U.S. views Islamic banking in order to illustrate the role Federal and state governments play regarding the success of Sharia based banking.

I. Two Systems

In order to fully address how Islamic financing can be integrated into the American banking system, the principles that each is built upon must be fully understood. The most basic of these principles involves the payment and receipt of interest. Interest or Riba, as it is called in Arabic, is prohibited under Islamic principles because it violates Islamic law, known as Sharia. Contrary to the interest free Islamic system of banking, the traditional American banks utilize interest in some form or another for almost every financial transaction. One of the main reasons for this is to create profits for the banks and encourage customers to deposit money into the banking system to help support the economy. Although banks operating under the principles of Sharia law do not use interest for their transactions, the Islamic system is able to create profits through other tools which are discussed below. Also, Islamic banks are able to still attract customers based both on the fact that their religion requires them to use the banks for investment and loan transactions as well as the knowledge that Sharia compliant banks will act more responsibly with their money than a western bank likely would.

The second principle which differentiates US and Islamic banks is the idea of profit-loss sharing. Sharia principles forbid “unearned profit,” which interest is considered; Islamic banks have therefor developed a system here each party splits the risk involved with a transaction. This method allows the banks to justify their profits with the risk they assume. Many proponents of the Islamic method believe that the sharing of risk creates financial institutions which are more responsible with their funds than those of their western counterparts. Regardless of whether this is true or not, a properly operated Islamic bank will be required to consider its transaction more closely than traditional banks will.

In addition to the principles forbidding interest, Sharia compliant financial institutions do not invest in businesses involved with certain items and activities, such as alcohol, pork and pornography. In the same manner that Riba is forbidden, these too are prohibited, based on the teachings of the Quran. Several other basic examples of the difference between Islamic and conventional banking can be found in the table at the end of this article.

II. Islamic Financing

In order to successfully integrate the Islamic banks in the American system, the banks will have to offer similar services to its customers while still maintaining compliance with Sharia principles. In fact, Islamic banks have been offer similar services as western banks, the only difference being the absence of interest as a method of creating profit. For example, Murabaha which is a major tool allow Islamic financial institutions to comply with Sharia principles when using their funds for investment purposes. Murabaha is most closely related to a sale contract in US banking systems (Taylor, 2003). A Murabaha transaction occurs when a financial institution purchases a good which its customer has requested and then sells the good to the customer for the original purchase price plus a profit. A key factor here is that the customer will pay for the good over a specific period of time and in the event of a default, the customer is only liable for the original contracted sale price (Taylor, 2003). No additional penalty is placed on the customer in the form of interest, as would happen in traditional western banking. A Murabaha is most commonly used as a form of financing.

The risk for the bank in a Murabaha transaction is that a customer may refuse to accept the good once the bank purchases it, resulting in costs associated with finding another buyer and storing the good. An expected profit could become a loss for the bank if the investment was not properly thought out (Taylor, 2003). Islamic financial

institutions in the Middle East are stepping up to the next level and challenging regional and global banks in sukuk underwriting and wholesale banking services (Platt, 2013). Sukuk is the Islamic equivalent of bonds. Unlike conventional bonds, which are a promise to repay a loan, sukuk represents partial ownership in a debt, asset, project, business, or investment (Khan, 2010).

III. Complying with United States Regulations

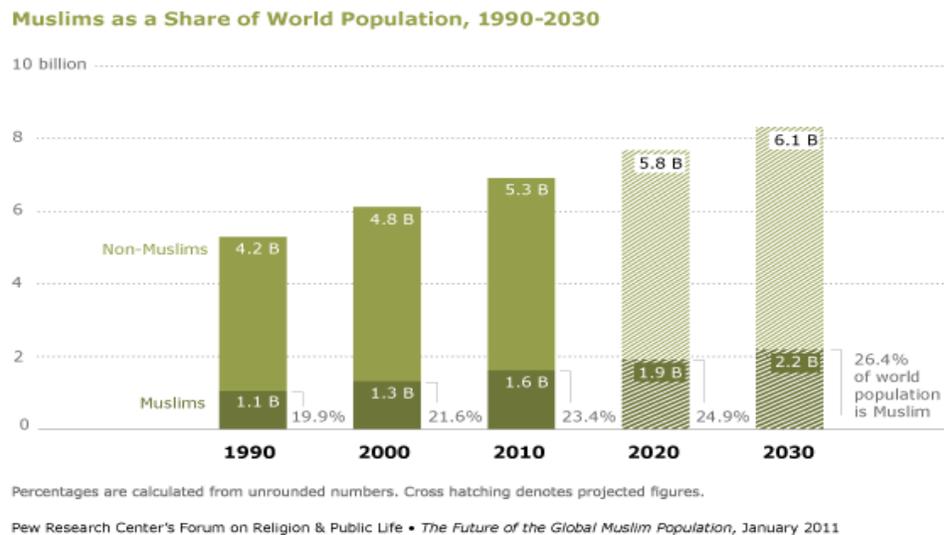
Although many of the tools used by Islamic banks are similar to those used by US banks, some of the tools would be restricted under the US regulatory system governing the institutions. Several transactions that would be permissible under current regulations would include ijara agreements, which encompass equipment leases, as well as musharaka and mudaraba, which involve sharing in earnings as consideration for a loan (Taylor, 2003). However, there are some tools which would not be allowed based on current banking law. The most notable of these is the restriction of Murabaha. Murabaha would not be allowed because the traditional banking laws forbid commercial banks from using property for investment purposes. As a result of the housing mortgage crisis in the United States, many have considered alternate means of financing that could prevent such gross negligence on behalf of the financial institutions in the future. Whether or not agreements such as a Murabaha would be successful in the US is not known due to the restrictions preventing its use.

The United States has expressed some interest in allowing new forms of banking to enter the market and in fact some banks operate successfully in areas such as Minneapolis, although in a somewhat limited fashion (Tyndall, 2001). A majority of the Islamic banking transactions taking place there involve businesses and the financing of durable goods.

IV. Potential for Future Growth

On a global scale, Islamic banking has continued to grow despite the world financial markets experiencing significant problems. Although the total of the Islamic banking assets in 2008, \$900 billion, is small when compared to the top 1000 conventional banks assets of \$90,256 billion the growth rate percentage has been 15% - 20% from 1990-2008, increasing in 2008 (MobeenAlam, Noreen, Karamat, & Ilyas, 2011). The most interesting statistic was that during this time America, Europe and Australia contributed \$35.1 billion to the total Islamic banking assets with an impressive 60.6% growth rate (MobeenAlam, Noreen, Karamat, & Ilyas, 2011). These numbers are significant to potential investors and banking entrepreneurs in the US because they signify that with a sufficient customer base, Islamic banks can be very successful outside of the GCC, MENA, and Asian markets. As with any business venture in the US, the potential market must exhibit a need and be able to support growth and profit if it is to be considered feasible. When looking at the US financial market, the potential for future growth of Islamic banking is going to depend largely on the Islamic population within the country.

A recent study conducted by the Pew Research Center has developed predictions for the future of the global Muslim population. The world's Muslim population is expected to increase by almost 35% in the next 20 years (Pew Research Center, 2011). More specifically, the Muslim population is expected to grow at twice the rate of the non-Muslim population making up 26.4% of the world's total population by 2030 (Pew Research Center, 2011).



These numbers will interest the US market because the population of Muslims is projected to more than double in this time period, making the Muslim population roughly equal to that of the Jewish population in the US today (Pew Research Center, 2011). The United Kingdom has already taken steps to accommodate Islamic banking and the system has experienced relative success. This example, coupled with the fact that the US is predicted to have a larger Muslim population than any European country other than Russia and France, shows how successful Islamic banking could prove for early market entrants today. However, the presence of a large Muslim population does not alone ensure that Islamic banking will find a foothold in the US market.

The terrorist attacks of September 11, 2001 changed the way Americans view anyone and anything related to the Middle East. Prior to the events in New York City, Islamic banking may have experienced a much different environment in the United States, one that may have been much more open to new ideas.

Today, the reality of how Islamic banking is viewed by the US can be seen in several states which have met attempts to establish Islamic financial institutions with hostility. Political figures have attempted to pass laws limiting or preventing the Islamic banks from operating. Many such actions are the result of quick, irrational thinking based on fear of the unknown and misinformation about Islamic culture. If Islamic banking is going to gain a foothold in the US market, the state governments will need to work with the financial institutions to develop state-level regulations which support Sharia-compliant banking (Barth, Nolle, Root, & Yago, 2000). If the federal government allows for accommodations to be made which foster Islamic banking and the states do not do the same, Sharia-compliant banking will not succeed in the US market. In the future, the largest hurdles for Islamic banking to overcome will not come from the federal level, but rather from state legislatures which maintain the notion that Islamic banking is an evil which must be kept out of the United States.

V. Conclusion

Although Islamic banking is still in its beginning stages in terms of the world marketplace, it has experienced some of the fastest growth of any financial sector. The European market, as well as localized areas within the United States, has demonstrated that Islamic banks can and do succeed in markets that have long been controlled by traditional banking. As the global marketplace

shrinks, countries' financial markets will continue to become more affected by each other. This will result in growing markets like the Islamic banking industry gaining greater international recognition and a better understanding of what Islamic banking has to offer will be developed. The current feelings toward Islamic banking in the United States will benefit greatly from this in the coming years as investors and governments are forced to reevaluate their stance on the Middle East and its culture. However, changed attitudes will not be the only hurdle Islamic banking in the US must overcome. Current regulations and the laws of the financial market will require accommodations from both sides (Barth, Nolle, Root, & Yago, 2000). The Islamic financial institutions must develop methods of banking that comply with the long existing US system and the US must allow for the religious tenets of Islamic banking to be maintained. When and where the Islamic banks will succeed on a larger scale within the US marketplace will depend on proper research and analysis by potential start-up branches. An important issue to consider will be the size of the potential non-Muslim consumer base and what financial instruments the Islamic banks will be able to offer those customers.

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