

Transparency Index and Company Valuation: Evidence from Hong Kong

Yan-Leung Cheung

School of Business, Hong Kong Baptist University, Hong Kong

Weiqliang Tan

Department of Economics and Finance, City University of Hong Kong, Hong Kong

Ping Jiang

Department of Finance, University of International Business and Economics, China

Abstract

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Keywords: corporate governance, disclosure; Hong Kong; OECD principles.

JEL Classification: G3, G34

Corresponding Author: Yan-Leung CHEUNG, School of Business, Hong Kong Baptist University, Hong Kong . Tel: (852)3411-7520. Fax: (852)3411-8051. E-mail: scheung@hkbu.edu.hk

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1. Introduction

At the World Bank's Corporate Governance Forum in 2000, Sir Cadbury stated that "the corporate governance framework is there to encourage the efficient use of resources and equally to require accountability for the stewardship of those resources. The aim is to align as nearly as possible the interests of individuals, corporations and society." In other words, corporate governance is concerned with promoting fairness, transparency and accountability among listed companies, allowing them to be more easily monitored by stakeholders. Corporate disclosure is important in protecting the rights of shareholders. Corporate disclosure, has been recognized as one of the most fundamental elements contributing to good corporate governance.¹ Only through adequate and timely corporate disclosure can shareholders feel assured that the firm is being managed in their best interest.

Information disclosure can be divided into two categories: financial and non-financial. Availability of financial information is essential for investors in order to assess company performance, and there are strict listing requirements for financial information disclosure.² Non-financial information, including corporate governance practices, is also informative to investors allowing them to ensure that the company's management is acting on their best behalf.³ This is particularly important in East Asia, because most Asian companies are dominated by a few majority shareholders or families. Most Asian markets recommend the disclosure of these items as best practices but not included as mandatory requirements. The issue that we attempt to examine is how investors reward Asian companies for more disclosure. This study examines the impacts of mandatory and voluntary disclosure on company valuation in one of the most important financial markets- Hong Kong.

Hong Kong is ideal for this study because Hong Kong is an international

¹ A literature survey on the importance corporate disclosure can be found in Healy and Palepu (2001).

² In Hong Kong, the disclosure requirement is administered under the Company Ordinance. Section 121(1) requires every company to keep proper books of accounts, and the books of accounts must give a fair and true view of the company's financial situation (Section 121 (2)).

³ For example, investors may want to know more about a company's non-substantial related-party transactions, such as amounts and rationales that the company is not required to disclose.

financial centre which combines an Asian family-controlled business environment with an Anglo-Saxon legal and corporate governance system. The traditional agency problem is rarely applicable in Hong Kong, because there is seldom a separation of management and ownership. Market disciplining mechanisms, such as hostile takeovers, can not function properly in Hong Kong because of concentrated or family ownership. The key issue is the agency conflict between the majority and minority shareholders. Thus, adequate information disclosure is of particular importance in order to safeguard the interests of minority shareholders.

This study use a comprehensive set of criteria to construct a transparency index (*TI*) to measure the quality of disclosure of corporate governance practice of major Hong Kong listed companies.⁴ The criteria are retrieved from a corporate governance scorecard that use to measure the corporate governance practices of Hong Kong listed companies by Cheung, Connelly, Limpaphayom and Zhou (2007) based on the OECD principles of corporate governance (OECD, 2004).⁵ All criteria related to transparency are used to construct the *TI* in this study. All major Hong Kong listed companies were rated for a period of three years, during 2002-2005.⁶ Using time series data, this study examines the relationship between the quality of disclosure practice and company valuation in Hong Kong.

The *TI* is composed of 56 criteria (appendix 2), based on the five OECD principles. The principles are the rights of shareholders, equitable treatment of shareholders, the role of stakeholders, disclosure and transparency, and board

⁴ Since its introduction in 1999, the OECD's Principles have been widely used and are becoming the most recognized international benchmark for governance practices. Currently, the OECD's Principles are widely used by investors, stakeholders, companies, and policy makers worldwide. One of the reasons is that the OECD's Principles were not created to be prescriptive or to dictate corporate governance practices. Rather, the principles are flexible and adaptable to each nation's unique culture, history, legal system, and level of economic development. The Principles provide a framework guiding the development of corporate governance infrastructure and practices within an economy.

⁵ The Principles give the best practice recommendations in five categories: rights of shareholders, equitable treatment of (minority) shareholders, the role of stakeholders, disclosure and transparency, and board responsibilities and composition.

⁶ Our sample consists of the largest companies (see Appendix I) that are constituent stocks of four major indices in the Hong Kong Exchange and Clearing Limited (HKEx): HSI (Hang Seng Index), HSHKCI (Hang Seng Hong Kong Composite Index), HSCCI (Hang Seng China Affiliated Corporate Index), and HSCEI (Hang Seng China Enterprise Index). The overall sample represents almost 90% of the total capitalization and almost 80% of the Hong Kong market's turnover.

responsibilities and composition.⁷ In 2004, Hong Kong (HKEx) introduced the Code of Corporate Governance Practices to tighten up disclosure requirements of Hong Kong listed companies. The Code has two levels of recommendations, namely the Code Provisions and Recommended Best Practices. Hong Kong companies are expected to comply with the first level of disclosure requirement- the Code Provisions. In their annual reports they must state whether they have complied with the Code Provision and provide explanations for any non-compliance. The second level is the Recommended Best Practices that HKEx recommends Hong Kong's listed companies to compile on a voluntary basis. Based on the two levels of disclosure requirements, the 60 disclosure items of *TI* are classified into two sub-groups: non-voluntary and voluntary disclosure. The first sub-group consists of non-voluntary disclosure items that the company has to disclose according to the Code Provision (non-voluntary) and the second sub-group consists of disclosure items that the company discloses according to the Recommended Best Practices (voluntary basis). We are thus able to assess the impact of these two levels of disclosure requirements on company valuation.

This study has two aims. First, we examine the impact of the two levels of disclosure requirements on company valuation. The second aim is to identify company characteristics that make them more likely to disclose more information on a voluntary basis.

This paper has several contributions to the literature. First, this study develops a comprehensive set of disclosure items recommended by the OECD Principles of Corporate Governance (OECD, 2004) and creates a transparency index (*TI*) to measure the overall quality of disclosure practices of large Hong Kong listed companies. This index differs from those used in other studies. The information that is used to construct the index, includes annual reports, articles of association, memorandums of association, notices to call shareholders' meetings, annual general

⁷ Among 56 criteria, 25 of them are classified as "disclosure and transparency". However, we identify 31 criteria of the other four categories, though not classified as "disclosure and transparency", but are related to transparency. For example, Question B.1 is about the disclosure on related party transaction, but is classified in "equitable treatment of shareholders".

meeting minutes, company websites, analyst reports, and other sources available to the general public.

Second, this study examines the quality of disclosure of China-related companies⁸ listed in Hong Kong. As of the end of 2007, one-third of companies listed in Hong Kong are China-related companies that account for 50% of the total capitalization and 60% of the total market turnover. China has demonstrated huge economic growth potential during the past two decades and recently, there has been a rising interest in investing in China. International fund management houses have been launching various investment products that either invest only in China or have an explicit policy of investing a fixed portion of their portfolio in China. At the moment, China's stock markets are relatively closed to foreign investors.⁹ The international investment community can invest in Chinese enterprises through Hong Kong because almost all major Chinese companies are listed in Hong Kong. An examination of China-related companies listed in Hong Kong enables the international investment community to acquire a better understanding of the disclosure practices of Chinese enterprises.

Third, the disclosure practice of our sample companies is rated three times during 2002-2005¹⁰. The three-year data set and the use of a panel regression model minimizes the endogeneity problem found in cross sectional studies based on a single year's data.

Our empirical results show that disclosure practices of Hong Kong listed companies improved during the sample period. More importantly, the empirical findings offer compelling evidence that good disclosure practices matter in Hong Kong. Specifically, we observe that there is a positive and statistically significant

⁸ The China-related companies listed in Hong Kong include H-share and red-chip companies. The H-share companies are incorporated in mainland China while red-chip companies are incorporated in Hong Kong but are controlled (at least 35%) by state-owned (or provincial or municipal) organizations in China.

⁹ Investment community can only participate in the B-share market in China. However, the B-share market is very inactive. A few institutional investors are allowed to have limited participation in the A-share market through the Qualified Foreign Institutional Investor (QFII) Scheme.

¹⁰ These years (2002, 2004 and 2005) are the years in which the Hong Kong Institute of Directors conducted comprehensive surveys of corporate governance practices among large Hong Kong firms. There are no data available from any other year.

relation between company valuation and the quality of disclosure practice, as measured by the transparency index even after the inclusion of variables to control for firm characteristics, board characteristics, and ownership structure. We further find that company valuation is positively associated with companies that disclose more corporate governance practice on a voluntary basis.¹¹ Finally, Hong Kong listed companies that are larger, more profitable, have a remuneration committee, have more outside directors, and are non-China related tend to be more transparent on a voluntary basis.

The paper is organized as follows. Section 2 presents a literature review on corporate disclosure. Section 3 reviews previous research on the factors that affect voluntary disclosure by companies. Descriptions of the data and empirical methods are presented in Section 4. Section 5 presents and discusses the empirical findings and Section 6 concludes the study.

2. Literature Review

Disclosure is important to mitigate the asymmetric information and agency problem. A detailed literature review on disclosure is provided by Healy and Palepu (2001). Among many other research questions, they give a detailed discussion on the following questions: (i) the role of regulation; (ii) management reporting decisions, i.e., voluntary disclosure; and (iii) the consequences of disclosure. Our paper addresses these three questions.

Regulatory authorities around the world have set up various regulations governing corporate disclosure. Two questions are raised regarding regulations: what is the economic rationale behind regulations and how effective are regulations in solving the information and agency problem. Leftwich (1980), Watts and Zimmerman (1986), and Beaver (1998) propose that regulators should reduce the information gap

¹¹ This study makes no attempts in downplaying the importance of mandatory disclosure requirements. Our findings seem to suggest that companies are *not* rewarded by investors for compiling with the mandatory disclosure requirements because they will be penalized for non compliance. However, investors reward companies for more voluntary disclosure on the corporate governance practice.

in providing a 'level playing field' between sophisticated and unsophisticated investors by creating minimum disclosure requirements. However, whether there is a market failure for disclosure and whether it is corrected through regulations remains unanswered in the empirical research.

Research on management reporting decisions has focused on two areas: positive accounting theory and voluntary disclosure. The positive accounting empirical literature focuses on whether management makes changes to the accounting method or use accrual estimates for private benefit, for example, compensation bonuses. The second area focuses on the motivation of management to voluntarily disclose. Researchers discuss various factors that affect management disclosure decisions. For example, according to Healy and Palepu (1993, 1995), managers who anticipate debt or equity issuing have an incentive to voluntarily disclose. Lang and Lundholm (1993) document that analysts' ratings of disclosures are higher for firms issuing securities in the current or future periods. By voluntarily disclosing, there is a reduction in asymmetric information and a consequent reduction in the firm's cost of external financing.

The threat of shareholder litigation could encourage firms to increase voluntary disclosure. Skinner (1994, 1997) finds that firms with bad earnings news are more than twice as likely to pre-disclose the bad news than are firms with good news. In addition, he finds that firms with negative earnings are more likely to be subject to litigation. Aboody and Kasznik (2000) show that prior to stock option award periods firms often delay disclosure of good news and accelerate the release of bad news, in order to increase management stock-based compensation.

Both the positive accounting theory and voluntary disclosure research have examined the economic consequences of changes in disclosure. The former has focused on the effects of changes in accounting standards or methods while the latter has focused on the capital markets response to changes in corporate disclosure. In the positive accounting theory literature, studies indicate that there is generally no significant relation between stock returns at the announcement of the accounting standard change and contracting or political cost explanations (Holthausen, 1981). In

the voluntary disclosure literature, studies argue that there are three potential scenarios for firms making extensive voluntary disclosure: improved liquidity (Diamond and Verrecchia, 1991; Kim and Verrecchia, 1994; Healy, Hutton, and Palepu, 1999; and Welker, 1995); reduction in cost of capital (Botosan, 1997; and Botosan and Plumlee, 2002); or increased information intermediation (Bhushan, 1989a; 1989b), Lang and Lundholm(2000), Healy Hutton, and Palepu (1999), Francis, Hanna and Philbrick (1998).

The major limitation to studying voluntary disclosure is the difficulty in measuring the extent of voluntary disclosure. Currently, researchers are using several proxies for voluntary disclosure. For example, Lang and Lundholm (1993, 2000) use metrics based on the AIMR database, and Botosan (1997) and Miller (2002) use self-constructed measures. Each approach has its limitations. The accuracy of management forecasts can be easily verified by outsider investors through actual realized earnings, which is not true for most other voluntary disclosure. Therefore, the research using management forecasts as the basis for voluntary disclosure cannot generalize to other forms of voluntary disclosure. The AIMR database is based on an annual survey which produces firm rankings of voluntary disclosure. It provides a more general measure of voluntary disclosure. However, the AIMR rankings rely heavily on analysts' selection and judgment, which may bring bias to the data. Critiques of self-constructed measures argue that these metrics typically rely on annual reports and may ignore other sources of information such as press briefings, analyst meetings, etc.

This study contributes to the literature by constructing a transparency index based on the OECD Principles of Corporate Governance (2004), a comprehensive and widely accepted corporate governance guideline. We further decompose the index into a mandatory disclosure index and a voluntary disclosure index. Most of the prior research focuses on financial disclosure, such as information in financial reports or information related to earnings. Our index is unique in that it includes many corporate governance related disclosure items besides the financial disclosure related items. Our rating also includes other channels of disclosure such as press briefings, analyst

conferences, and company websites. In addition, we use firm fixed effect regressions in our analysis to reduce the possible endogeneity problem in the existing literature.

The key research question of this study is whether there is a relation between disclosure practice and market valuation for Hong Kong listed companies. If a company discloses more information that facilitates the monitoring of management decisions by shareholders, then this should reduce monitoring costs and reduce the company's cost of capital. One would expect company valuation to be positively associated with voluntary disclosure because if transparency is desired by investors, then companies will be given a premium for more disclosure on a voluntary basis which should then be reflected in company valuation.

3. Determinants of voluntary disclosure

The final part of this study attempts to identify what company tends to be more transparent. In particular, what are the company characteristics that associate with more voluntary disclosure on corporate governance practice? Previous studies have considered various firm-specific characteristics that can affect corporate disclosure, using samples from emerging markets in Asia. These studies document a number of determinants of corporate disclosure in Hong Kong (Chen and Jaggi, 2000; Ho and Wong, 2001), Malaysia (Ghazali and Weetman, 2006; Haniffa and Cooke, 2002), and Singapore (Eng and Mak, 2003).

Recent studies using firms in emerging markets in Asia have also identified a set of internal corporate governance characteristics that are related to corporate disclosure and transparency. Good internal corporate governance should lead to better disclosure and transparency. The proportion of independent directors on the board is predicted to be positively related to corporate disclosure (Chen and Jaggi, 2000; Eng and Mak, 2003; Ghazali and Weetman, 2006; Haniffa and Cooke, 2002; Ho and Wong, 2001). In contrast, the proportion of inside directors is found to be negatively related to the levels of corporate disclosure (Ghazali and Weetman, 2006; Haniffa and Cooke, 2002;

Ho and Wong, 2001). Finally, ownership concentration is included as one of the firm-specific governance characteristics in previous studies (Chen and Jaggi, 2000; Eng and Mak, 2003; Ghazali and Weetman, 2006; Haniffa and Cooke, 2002; Ho and Wong, 2001). It is posited that high ownership concentration leads to low corporate disclosure.

Some studies employ board size as a possible determinant of corporate disclosure. When considering the size of the board, there is a trade-off between the benefits of value-added expertise or monitoring and the disadvantages stemming from a coordination problem. Jensen (1993) posits that a larger board leads to less candid discussion of critical issues which, in turn, leads to poor monitoring. Yermack (1996) finds a positive relation between board size and firm value among large firms in the US. Huther (1997) examines a sample of US public utilities and finds that board size negatively affects firm efficiency. Eisenberg, Sundgren, and Wells (1998) find a significant negative correlation between board size and profitability in a sample of small- and medium-sized Finnish and Swedish firms.

4. Data and Methodologies

Our sample consists of the largest companies that are constituent stocks of four major indices in the Hong Kong Exchange and Clearing Limited (HKEx): HSI (Hang Seng Index), HSHKCI (Hang Seng Hong Kong Composite Index), HSCCI (Hang Seng China Affiliated Corporate Index), and HSCEI (Hang Seng China Enterprise Index).¹² The final sample contains 168, 168, and 174 companies in 2002, 2004, and 2005, respectively. The companies in the sample are listed in Appendix 1.

¹² The HSI is the most widely-quoted performance indicator of the Hong Kong stock market. In 2002, the HSI contained 33 constituent stocks, representing about 70% of the market capitalization of all eligible stocks listed on the Main Board of the HKEx. The number of HSI constituent stocks increased to 38 in June 2006. The HSHKCI is composed of the largest Hong Kong companies in addition to the HSI constituent stocks. The HSCCI and HSCEI constituent stocks are China-related companies listed in Hong Kong. HSCCI covers red-chip companies and HSCEI covers H-share companies. Red-chip companies are companies incorporated in Hong Kong but controlled by state-owned organizations in China. The Chinese state, provincial, or municipal organization(s) that are the dominant owners must hold at least 35%. In contrast with red-chips, H-share companies are incorporated in mainland China. China-related firms account for 30% of the total number of listed companies in Hong Kong and more than 60% of the total market turnover in 2006.

Our sample represents almost 90 percent of the total market capitalization and almost 80 percent of Hong Kong's market turnover.

The OECD Principles (OECD, 2004) give the best practice recommendations in five categories: rights of shareholders, equitable treatment of (minority) shareholders, the role of stakeholders, disclosure and transparency, and board responsibilities and composition. A set of criteria is developed to measure the quality of disclosure from these five corporate governance principles. A total of 56 (criteria and sub-criteria) criteria form the scorecard used to assess each firm in our sample. Since assessing the level of disclosure for an individual company can be subjective, the scorecard is designed to minimize this problem. In addition to crosschecking and auditing by different raters, nearly every survey measure has been refined so as to be quantifiable. This is a distinctive feature of this study, as most previous research has only checked for the presence of a specific disclosure measure.

This study contributes to the existing governance literature by adding a quantitative dimension to the disclosure measures. Companies that omit or do not comply with a specific scoring criterion receive a 'poor' score (score=1). Meeting the minimum compliance standard earns a firm a score of 'fair' (score=2), while firms that exceed the minimum requirements and/or meet international standards receive the highest score (score=3). Our data sources include annual reports, articles of association, memorandums of association, notices to call shareholders' meetings, annual general meeting minutes, company websites, analyst reports, and other sources available to the general public. We calculate *TI* as the equally weighted score of all 60 criteria.¹³ *TI* ranges from 0 to 100. Firms with a better quality of disclosure practices have higher scores than those with poor disclosure practices.

Among the 56 criteria, 32 are included in the Code Provision for Hong Kong

¹³ There is substantial variation in the weighting schemes used in the literature. For example, Mitton (2002) assigns a composite score to each emerging market firm based on management discipline, transparency, independence, accountability, responsibility, fairness, and social responsibility. The first six areas have a weight of 15 per cent while social responsibility has a 10 per cent weight. Gompers, Ishii and Metrick (2003) code each of 24 factors as either 1 (yes) or 0 (no). The sum of the points yields a corporate governance index. Brown and Caylor (2006) also use equal weights for their 51 factors. We try different weighting schemes and the results are qualitatively the same.

listed companies by HKEx mandating that companies need to explain their reasons for non-compliance in their annual reports. These criteria are considered to be non-voluntary disclosure requirements. We classify the other criteria (24) that are Recommended Best Practices of the Code of Corporate Governance as voluntary disclosure criteria. This divides the *TI* into two sub-indexes, using criteria that are related to voluntary disclosure (*VDI*) and non-voluntary disclosure (*NDI*). The list of criteria is attached in Appendix 2.

Other data used include accounting information and firm performance data which are obtained from Datastream. All data are matched according to each sample firm's fiscal year. Firm ownership, board compositions, and other firm data are obtained from annual reports. To make sure that the results are not driven by firm heterogeneity, we add control variables that cover firm characteristics (return on assets, firm size, and debt-equity ratio), board characteristics (the numbers of executive directors and outside directors, and the percentage of shares owned by board members), and other corporate governance variables (CEO duality, presence of an audit committee or compensation committee). The list of variables can be found in Table 1.

5. Empirical analysis

5.1. Descriptive Statistics

Table 2 presents descriptive statistics of the Transparency Index and the two sub-indexes during the three-year period. There are 168, 168, and 174 companies included in our sample period, respectively. The result shows that the overall corporate transparency and disclosure of Hong Kong listed companies improved from the year 2002 to 2005. The average *TI* increases from 55.75 in 2002 to 68.11 in 2004 to 76.40 in 2005. This upward trend can also be observed in the median value of the index.

Among the two sub-indexes, the *VDI*, composed of corporate governance-related items recommended by the OECD principles but *not* included in the *Code Provision* required by HKEx, increases from 56.56 in 2002 to 71.12 in 2004 to 82.97 in 2005. The *NDI*, composed of corporate governance related-items that are disclosed by companies on a mandatory basis, increases from 54.55 in 2002 to 63.84 in 2004 to 67.01 in 2005. This shows that the Code of Corporate Governance introduced by the HKEx in 2004 has had a positive impact on both sub-indexes.

This implies that Hong Kong listed companies are improving in their voluntary disclosure more than their non-voluntary disclosure. It should be noted that the average Mandatory Disclosure Index is around 61.86. This implies that the mandatory disclosure of Hong Kong listed companies is above the minimum satisfactory score of 50 (if we assume a passing score of 50). As mentioned in the previous section, a score ranging from 1 to 3 is used to assess the level of disclosure that 2 is assigned to the compliance of mandatory requirement. A score of 3 is assigned for company that discloses more than required. For example, question B.1 states that companies are required to disclose the aggregated amount of related party transactions and the related parties in their annual reports according to the regulatory framework. Some companies, however, receive a score of 3 because they table the dates, amounts, related parties, and the rationales of all related party transaction in their annual reports. This explains the variation of Mandatory Disclosure Index among Chinese listed companies.

Table 3 shows the descriptive statistics of company characteristics. The average market-to-book ratio is 1.758, increasing from 1.376 in 2002 to 1.959 in 2005. The average total assets is HK\$1.8 billion. The return on assets is 6.3%, improving from 3.9% in 2002 to 7.9% in 2005. These statistics show that there is improvement in the financial performance of Hong Kong companies during the sample period. The average debt-to-equity ratio is 0.437. Our sample companies have an average of seven outside directors (including non-executive and independent non-executive). The board members control more than 25 percent of outstanding shares of the company in 36 percent of companies in the sample. Across all company-year samples,

120 company-year observations have the same person serving as both board chairman and CEO while 454 company-year observations have an audit committee and 277 have a compensation committee. There are 215 H-share or Red Chip company-year observations.

5.2. Regression Results on Transparency Index

This subsection addresses the relationship between *TI* and the company valuation. This study uses the Tobin's Q and market-to-book value ratio as proxies for company valuation.¹⁴ We use the panel data regression with fixed effects to address the issue of whether company transparency is related to its valuation. Table 4 reports the results of the regression model using the Tobin's Q and market-to-book value ratio (*M/B*) as the dependent variables. The first column shows the result of regressing *TI* on Tobin's Q. The coefficient of *TI* is positive and significant at the 1% level. Column 2 shows similar result when we progressively add control variables including company characteristics and corporate governance variables into the regression model. The results are shown in column 2. Similar results are obtained between *TI* and *M/B* that are presented in columns 3 and 4. It can also be noted that the coefficient return to assets (*ROA*) are positive and significant at the 1% level. The results also show that companies with an audit committee have a better valuation. Financial institutions, however, have a different capital structure that could affect our analysis. We repeat the analysis in a subsample, excluding all listed companies in the financial industry. The main findings are not produced here, but are consistent with those of the full sample, except that *D/E* becomes nonsignificant in the subsample. We check for multicollinearity and find that it is not a problem in our analyses. Appendix 3 reports the correlation coefficient of all independent variables.

¹⁴ Tobin's Q is the sum of the market value of equity plus short-term debt plus long-term debt divided by total assets and *M/B* is the market value of common equity divided by net assets at the end of fiscal year

The findings support that company valuation is positive and significantly associated with more disclosure, as measured by *TI*. The findings are robust after including the control variables.

5.3 Regression Results on Voluntary Disclosure Index

We further split *TI* into two subindexes, based on the Code of Corporate Governance Practices introduced by the HKEx. The first subindex, *VDI* is composed of 24 items that Hong Kong listed companies disclose on a voluntary basis. The second subindex, *NDI* is composed of 32 items that Hong Kong listed companies have to disclose on a non-voluntary basis. This delineation enables us to measure how company valuation is tied to its voluntary and non-voluntary disclosure levels. Table 5 presents the results of the panel data (fixed effects) regressions. The first column report the regression result both *VDI* and *NDI* as the independent variable and Tobin's *Q* as the dependent variable. The result shows that *VDI* is positive and significantly related to Tobin's *Q*, but not *NDI*. The result of incorporating the control variables as independent variables is presented in the second column, providing further evidence in support of the previous finding. Columns 3 and 4 report the results of the regression result using *M/B* as the dependent variable and the results are consistent with those reported previously. The coefficient of the return to assets (*ROA*) is positive and significant in both models. In addition, listed companies with an audit committee are associated with a higher valuation. A further test examines whether the coefficients of *VDI* and *NDI* are equal. This hypothesis does not hold for both samples. The result seems to support the hypothesis that company valuation is positively associated with the level of voluntary disclosure.

5.4 Which firms are more likely to disclose more?

This last subsection attempts to explore the company characteristics that are associated with more voluntary information disclosure. We compare companies with a

higher level of voluntary disclosure with those with a lower level of voluntary disclosure. The *VDI* is used as a benchmark to measure a company's transparency on a voluntary basis. We define companies with a high level of *VDI* as more transparent and the rest as less transparent. We classify companies with top 15%, 20%, 25%, and 30% *VDI* as transparent companies. We report estimates of the logit models in Table 6. The dependent variable is whether the company has more voluntary information disclosure (high *VDI*) or less voluntary information disclosure (otherwise). The independent variables are the control variables listed in Table 1. The dummy variable for China-related companies (*DUMMY_HR*) is added to the model.¹⁵ Panel A presents the results of the full sample showing that Hong Kong listed companies with large size and high profitability are associated with more voluntary disclosure. In terms of corporate governance variables, we find that companies with a remuneration committee and more outside directors disclose more information on a voluntary basis.

The slope coefficients of the dummy variable for China-related companies are significantly negative for all models in Panel A. This implies that China-related companies are not particularly keen on disclosing information voluntarily. The findings are consistent across the four cutoff points. For the top 15% and 20% *VDI* companies, the number of outside directors does matter, in that companies with more outside directors tend to be more transparent on a voluntary basis. When we extend the cutoff point to include companies of top 30% *VDI*, the duality of CEO and Board Chairman becomes negative and significant. Panel B reports the results of the non-financial subsample that we find to be consistent with the full sample. We find that Hong Kong listed non-financial companies of a larger size, with a remuneration committee, and that are non-China-related are associated with more voluntary disclosure.

6. Concluding Remarks

¹⁵ *DUMMY_HR* is not added to the previous models because of the limitation of panel data regression that a China-related company will always be a China-related company. However, the logit regression is a cross-sectional model into which this dummy variable could be incorporated.

Based on the OECD Principles of Corporate Governance (OECD, 2004), this study uses a comprehensive set of criteria to construct a transparency index to measure the corporate governance disclosure practices of the largest companies in Hong Kong during 2002-2005. A total of 56 disclosure criteria are identified as recommended by the OECD as best practices for good corporate governance. We further classify the disclosure criteria into two categories: voluntary and non-voluntary. We classify those criteria that are included in the Code Provision of the Code of corporate governance practices (HKEx, 2004) as non-voluntary because companies have to state their reasons for non-compliance of these criteria in their annual report. The other criteria are classified as voluntary disclosure items. Two sub-indexes, *VDI* and *NDI*, are created from *TI*.

Using a time series of the transparency index values for Hong Kong listed companies, we show that company valuation is positively related to a company's disclosure practice. Furthermore, this study documents that company valuation is positively associated with companies that have a higher level of voluntary disclosure. Our findings do not imply that mandatory disclosure requirements are not important. The regulatory framework requiring listed companies to adequately disclose information is important for investors to monitor management decisions. There are two possible explanations for this finding. First, it seems to suggest that companies are *not* rewarded by investors for compiling with the mandatory disclosure requirements because they will be penalized for non compliance. Second, there is less variation in the mandatory disclosure items that all companies have to compile with the requirements. Finally, Hong Kong listed companies with a larger size, better profitability (ROA), a remuneration committee, more outside directors, and are non-China related tend to be more transparent on a voluntary basis.

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Table 1: Variable Definitions

This table provides brief descriptions of the variables used in the regression analyses. Accounting data and information on firm performance are drawn from DataStream for sample years 2002, 2004 and 2005. All data are matched according to each sample firm's fiscal year. Firm ownership, board composition, and other data are obtained from annual reports.

| Variable | Description |
|-------------|---|
| Tobin's q | The sum of the market value of equity plus short-term debt plus long-term debt divided by total assets at the end of fiscal year. |
| MB | Market value of common equity t divided by net assets at the end of fiscal year. |
| SIZE | Natural log of total assets in millions of Hong Kong dollars at the end of fiscal year. |
| D/E | Debt divided by equity at the end of fiscal year. |
| ROA | Return divided by total assets at the end of fiscal year. |
| DUMMY_AUDIT | Dummy variable, equals 1 if firm has a board audit committee and 0 otherwise. |
| DUMMY_COMP | Dummy variable, equals 1 if firm has a board compensation committee and 0 otherwise. |
| DUMMY_DUAL | Dummy variable, equals 1 if CEO is also the Chairman of the board, and 0 otherwise. |
| BOUT | Number of outside directors on the board (including independent non-executive directors, non-executive directors, and honorable directors). |
| DUMMY_BOARD | Dummy variable, equals 1 if board members hold more than 25% of the outstanding shares, 0 otherwise. |
| DUMMY_HR | Dummy variable, equals 1 if firm is an H-share or a Red chip company, and 0 otherwise. |

Table 2 Descriptive Statistics for the Corporate Transparency Index

This table presents the descriptive statistics of the corporate transparency index and the two sub-indices. The two sub-sections are: Voluntary Disclosure Index and Non-Voluntary Disclosure Index. The combined sample, containing 410 firms, is an aggregate of the three sample years of 2002, 2004 and 2005. The Transparency Index ranges from a low of 0 to a high of 100. There are 168, 168, and 174 companies in years 2002, 2004, and 2005, respectively. These companies represent roughly 15% of the total number of listed companies in Hong Kong, but 90% of the market capitalization and 80% of the total market turnover.

| | | All | 2002 | 2004 | 2005 |
|---|--------|--------|--------|--------|--------|
| Number of Observation | | 510 | 168 | 168 | 174 |
| Transparency Index (TI) | Mean | 66.867 | 55.745 | 68.114 | 76.401 |
| | Median | 67.106 | 54.382 | 66.639 | 75.979 |
| | Min | 38.400 | 38.400 | 47.260 | 55.759 |
| | Max | 94.398 | 88.350 | 92.775 | 94.398 |
| | S.D. | 11.952 | 8.619 | 8.881 | 7.705 |
| Sub-Transparency Index | | | | | |
| Voluntary Disclosure Index (VDI) | Mean | 70.364 | 56.552 | 71.120 | 82.969 |
| | Median | 70.214 | 55.223 | 69.442 | 83.891 |
| | Min | 43.720 | 43.720 | 46.683 | 55.685 |
| | Max | 99.286 | 83.754 | 94.762 | 99.286 |
| | S.D. | 13.683 | 7.974 | 8.902 | 8.204 |
| Non-Voluntary Disclosure Index (NDI) | Mean | 61.862 | 54.547 | 63.840 | 67.014 |
| | Median | 61.250 | 53.438 | 63.063 | 66.056 |
| | Min | 22.500 | 22.500 | 26.250 | 26.250 |
| | Max | 96.818 | 95.455 | 94.000 | 96.818 |
| | S.D. | 13.372 | 13.827 | 11.766 | 11.201 |

Table 3 Summary Statistics for Key Variables

This table shows descriptive statistics of the listed companies included in our sample. The variables are defined as follows: Tobin's q = The sum of the market value of equity plus short-term debt plus long-term debt divided by total assets at the end of fiscal year; MB = Market value of common equity divided by net assets at the end of fiscal year; SIZE = Natural log of total assets in millions of Hong Kong dollars at the end of fiscal year; D/E = Debt divided by equity at the end of fiscal year; ROA = Return divided by total assets at the end of fiscal year; BOUT = Number of outside directors on the board (including independent non-executive directors, non-executive directors, and honorable directors). The combined sample contains 510 firms-years. There are 168, 168, and 174 companies in years 2002, 2004, and 2005, respectively.

| | | ALL | 2002 | 2004 | 2005 |
|---|--------|-------|-------|-------|-------|
| Tobin's q | Mean | 1.155 | 1.008 | 1.244 | 1.209 |
| | Median | 0.929 | 0.767 | 1.005 | 0.976 |
| | S.D. | 0.880 | 0.854 | 0.856 | 0.915 |
| MB | Mean | 1.758 | 1.376 | 1.930 | 1.959 |
| | Median | 1.377 | 1.002 | 1.595 | 1.517 |
| | S.D. | 1.506 | 1.464 | 1.421 | 1.567 |
| SIZE | Mean | 7.199 | 7.041 | 7.219 | 7.332 |
| | Median | 7.138 | 6.958 | 7.180 | 7.303 |
| | S.D. | 0.700 | 0.716 | 0.682 | 0.675 |
| D/E | Mean | 0.437 | 0.265 | 0.478 | 0.564 |
| | Median | 0.312 | 0.276 | 0.308 | 0.376 |
| | S.D. | 1.140 | 1.636 | 0.763 | 0.801 |
| ROA | Mean | 0.063 | 0.039 | 0.070 | 0.079 |
| | Median | 0.056 | 0.044 | 0.060 | 0.068 |
| | S.D. | 0.078 | 0.095 | 0.060 | 0.069 |
| BOUT | Mean | 7.012 | 8.101 | 6.344 | 6.629 |
| | Median | 6.000 | 7.000 | 5.000 | 6.000 |
| | S.D. | 4.019 | 3.975 | 4.795 | 2.878 |
| Numbers of firms: | | | | | |
| With audit committee | | 454 | 128 | 158 | 168 |
| With compensation committee | | 277 | 37 | 81 | 159 |
| With dual role for CEO and chairman | | 120 | 37 | 43 | 40 |
| Board members hold more than 25% of share outstanding | | 186 | 58 | 64 | 64 |
| H-share or Red Chip | | 215 | 68 | 72 | 75 |

Table 4 Regression Results for Transparency Index and Corporate Performance

This table presents the fixed-effects regression results with Tobin's q and MB as the dependent variable. The variables are defined as follows: Tobin's q = The sum of the market value of equity plus short-term debt plus long-term debt divided by total assets at the end of fiscal year ; MB = Market value of common equity divided by net assets at the end of fiscal year; Transparency Index = Corporate Transparency Index constructed based on OECD principles; SIZE = Natural log of total assets in millions of Hong Kong dollars at the end of fiscal year; D/E = Debt divided by equity at the end of fiscal year; ROA = Return divided by total assets at the end of fiscal year; DUMMY_AUDIT = 1 if firm has a board audit committee, and 0 otherwise; DUMMY_COMP = 1 if firm has a board compensation committee, and 0 otherwise; DUMMY_DUAL = 1 if CEO is also the Chairman of the board, and 0 otherwise; BOUT = Number of outside directors on the board (including independent non-executive directors, non-executive directors, and honorable directors); DUMMY_BOARD = 1 if board members hold more than 25% of the outstanding shares, and 0 otherwise. The sample includes firm-year observations for years 2002, 2004, and 2005. Numbers in parentheses are t-statistics. The first three columns report results based on the full sample. The last column reports results based on the non-financial industry sample. ***, **, and * denote significance at the 1%, 5%, and 10% levels (two-tailed test), respectively.

| | Tobin's q | Tobin's q | MB | MB |
|--------------------|--------------------|--------------------|--------------------|--------------------|
| Intercept | 0.518*** (3.28) | 3.055 (1.45) | 0.281 (0.96) | 0.530 (0.14) |
| Transparency Index | 0.010*** (4.06) | 0.009** (2.34) | 0.022*** (5.07) | 0.011* (1.65) |
| SIZE | | -0.409 (-1.32) | | -0.023 (-0.04) |
| D/E | | -0.006 (-0.28) | | 0.303*** (7.49) |
| ROA | | 2.696*** (5.12) | | 3.802*** (4.14) |
| DUMMY_AUDIT | | 0.204** (2.26) | | 0.343** (2.18) |
| DUMMY_COMP | | -0.051 (-0.78) | | -0.063 (-0.55) |
| DUMMY_DUAL | | -0.019 (-0.27) | | -0.057 (-0.45) |
| BOUT | | 0.006 (0.80) | | -0.012 (-0.91) |
| DUMMY_BOARD | | 0.206 (1.41) | | 0.259 (1.01) |
| Adjusted R-squared | 0.008 | 0.343 | 0.039 | 0.189 |
| Observations | 497 | 487 | 503 | 487 |

Table 5 Regression Results for Sub-Transparency Index and Corporate Performance

This table presents the fixed-effects regression results with Tobin's q and MB as the dependent variable. The variables are defined as follows: Tobin's q = The sum of the market value of equity plus short-term debt plus long-term debt divided by total assets at the end of fiscal year; MB = Market value of common equity divided by net assets at the end of fiscal year; VDI = Voluntary Disclosure Index; NDI = Non-Voluntary Disclosure Index; SIZE = Natural log of total assets in millions of Hong Kong dollars at the end of fiscal year; D/E = Debt divided by equity at the end of fiscal year; ROA = Return divided by total assets at the end of fiscal year; DUMMY_AUDIT = 1 if firm has a board audit committee, and 0 otherwise; DUMMY_COMP = 1 if firm has a board compensation committee, and 0 otherwise; DUMMY_DUAL = 1 if CEO is also the Chairman of the board, and 0 otherwise; BOUT = Number of outside directors on the board (including independent non-executive directors, non-executive directors, and honorable directors); DUMMY_BOARD = 1 if board members hold more than 25% of the outstanding shares, and 0 otherwise. The sample includes firm-year observations for the years 2002, 2004, and 2005. Numbers in parentheses are t-statistics. The first three columns report results based on the full sample. The last column reports results based on the non-financial industry sample. ***, **, and * denote significance at the 1%, 5%, and 10% levels (two-tailed test), respectively.

| | Tobin's q | Tobin's q | MB | MB |
|--------------------|--------------------|--------------------|--------------------|--------------------|
| Intercept | 0.520*** (3.05) | 3.320 (1.51) | 0.332 (1.06) | 0.464 (0.12) |
| VDI | 0.006** (2.54) | 0.006* (1.88) | 0.014*** (3.45) | 0.006** (2.55) |
| NDI | 0.004 (1.24) | 0.003 (0.86) | 0.007 (1.19) | 0.005 (0.91) |
| SIZE | | -0.446 (-1.39) | | -0.014 (-0.02) |
| D/E | | -0.007 (-0.29) | | 0.303*** (7.48) |
| ROA | | 2.696*** (5.12) | | 3.808*** (4.14) |
| DUMMY_AUDIT | | 0.200** (2.20) | | 0.344** (2.17) |
| DUMMY_COMP | | -0.058 (-0.86) | | -0.061 (-0.52) |
| DUMMY_DUAL | | -0.013 (-0.18) | | -0.059 (-0.46) |
| BOUT | | 0.007 (0.83) | | -0.013 (-0.91) |
| DUMMY_BOARD | | 0.209 (1.42) | | 0.259 (1.01) |
| Adjusted R-squared | 0.008 | 0.336 | 0.036 | 0.187 |
| Observations | 497 | 487 | 503 | 487 |

Table 6 Logit Regression Results of High Voluntary Disclosure Index

This table presents the logit regression results with TOP 15%, TOP 20%, TOP 25%, and TOP 30% Voluntary Disclosure Index respectively. The dependent variable is defined as follows: The dummy variable of High Voluntary Disclosure Index equals 1 if the VDI is top 15%, top 20%, top 25% at the year, and zero, otherwise, or top 30%. The independent variables are defined as follows: SIZE = Natural log of total assets in millions of Hong Kong dollars at the end of fiscal year; D/E = Debt divided by equity at the end of fiscal year; ROA = Return divided by total assets at the end of fiscal year; DUMMY_AUDIT = 1 if firm has a board audit committee, and 0 otherwise; DUMMY_COMP = 1 if firm has a board compensation committee, and 0 otherwise; DUMMY_DUAL = 1 if CEO is also the Chairman of the board, and 0 otherwise; BOUT = Number of outside directors on the board (including independent non-executive directors, non-executive directors, and honorable directors); DUMMY_BOARD = 1 if board members hold more than 25% of the outstanding shares, and 0 otherwise; DUMMY_HR = 1 if firm is an H-share or a Red chip company, and 0 otherwise. The sample includes firm-year observations for years 2002, 2004, and 2005. The first three columns report results based on the full sample. The last column reports results based on the non-financial industry sample. Numbers in parentheses are t-statistics. ***, **, and * denote significance at the 1%, 5%, and 10% levels (two-tailed test), respectively.

| | Panel A (Full Sample) | | | | Panel B (Non-financial Industry) | | | |
|------------------|-----------------------|----------------------|----------------------|----------------------|----------------------------------|----------------------|-----------------------|----------------------|
| | Top 15% | Top 20% | Top 25% | Top 30% | Top 15% | Top 20% | Top 25% | Top 30% |
| Intercept | -9.393*** (-5.34) | -8.940*** (-5.79) | -9.064*** (-6.24) | -7.154*** (-5.41) | -10.303*** (-4.86) | -9.781*** (-5.38) | -10.291*** (-5.98) | -8.882*** (-5.53) |
| SIZE | 0.827*** (3.71) | 0.899*** (4.48) | 1.008*** (5.27) | 0.848*** (4.74) | 0.956*** (3.70) | 1.020*** (4.29) | 1.242*** (5.37) | 1.099*** (4.90) |
| D/E | -0.079 (-0.81) | -0.048 (-0.51) | -0.047 (-0.52) | -0.047 (-0.54) | -0.077 (-0.81) | -0.081 (-0.89) | -0.059 (-0.66) | -0.068 (-0.76) |
| ROA | 5.351** (2.40) | 5.073*** (2.56) | 6.097*** (3.28) | 4.276** (2.53) | 1.847 (0.81) | 2.053 (1.01) | 2.587 (1.34) | 1.908 (1.07) |
| DUMMY_AUDIT | 0.818 (1.20) | 0.418 (0.81) | 0.201 (0.44) | -0.116 (-0.29) | 1.091 (1.02) | 0.325 (0.47) | 0.099 (0.16) | -0.231 (-0.42) |
| DUMMY_COMP | 0.624* (1.91) | 0.531* (1.88) | 0.458* (1.79) | 0.554** (2.35) | 0.548 (1.52) | 0.657** (2.01) | 0.482 (1.63) | 0.629** (2.25) |
| DUMMY_DUAL | -0.537 (-1.49) | -0.296 (-0.97) | -0.456 (-1.59) | -0.595** (-2.21) | -0.422 (-1.06) | -0.007 (-0.02) | -0.494 (-1.48) | -0.534* (-1.68) |
| BOUT | 0.079** (2.26) | 0.052* (1.77) | 0.031 (1.14) | 0.029 (1.09) | 0.070* (1.79) | 0.057 (1.61) | 0.027 (0.85) | 0.048 (1.37) |
| DUMMY_BOARD | -0.563 (-1.62) | -0.382 (-1.26) | -0.466 (-1.63) | -0.429 (-1.61) | 0.156 (0.39) | 0.318 (0.89) | 0.137 (0.40) | 0.202 (0.62) |
| DUMMY_HR | -0.701** (-2.07) | -0.738** (-2.44) | -0.555** (-2.00) | -0.587** (-2.24) | -0.606 (-1.55) | -0.592* (-1.67) | -0.725** (-2.19) | -0.703** (-2.20) |
| Pseudo R-squared | 0.136 | 0.120 | 0.121 | 0.101 | 0.119 | 0.123 | 0.129 | 0.124 |

Appendix 1: Company Name List (213 companies)

| Code Company Name | Code Company Name | Code Company Name |
|--|------------------------------|----------------------------------|
| Panel A: Companies with three year data (133 companies) | | |
| 0001 CHEUNG KONG HOLDINGS | 0179 JOHNSON ELECTRIC HDG. | 0669 TECHTRONIC INDS. |
| 0002 CLP HOLDINGS | 0183 CITIC INTL.FINL.HDG. | 0670 CHINA EASTERN AIRL. |
| 0003 HONG KONG AND CHINA GAS | 0203 DENWAY MOTORS | 0683 KERRY PROPERTIES |
| 0004 WHARF HOLDINGS | 0242 SHUN TAK HOLDINGS | 0688 CHINA OS.LD.& INV. |
| 0005 HSBC HOLDINGS | 0267 CITIC PACIFIC | 0694 BEIJING CAP.INTL.ARPT. |
| 0006 HONG KONG ELECTRIC | 0270 GUANGDONG INVESTMENT | 0696 TRAVELSKY TECHNOLOGY |
| 0008 PCCW | 0282 NEXT MEDIA | 0709 GIORDANO INTL. |
| 0010 HANG LUNG GROUP | 0291 CHINA RES.ENTREP. | 0710 VARITRONIX INTL. |
| 0011 HANG SENG BANK | 0293 CATHAY PACIFIC AIRWAYS | 0715 HUTCHISON HARBOUR RING |
| 0012 HENDERSON LD.DEV. | 0302 WING HANG BANK | 0716 SINGAMAS CONTAINER HDG. |
| 0013 HUTCHISON WHAMPOA | 0303 VTECH HOLDINGS | 0728 CHINA TELECOM |
| 0014 HYSAN DEVELOPMENT | 0308 CHINA TRAVEL INTL.INVS. | 0732 TRULY INTL.HDG. |
| 0016 SUN HUNG KAI PROPERTIES | 0315 SMARTONE TELECOM.HDG. | 0762 CHINA UNICOM |
| 0017 NEW WORLD DEV. | 0321 TEXWINCA HOLDINGS | 0857 PETROCHINA |
| 0018 ORIENTAL PRESS GROUP | 0323 MAANSHAN IRON & STL.'H' | 0882 TIANJIN DEVELOPMENT HDG. |
| 0019 SWIRE PACIFIC 'A' | 0330 ESPRIT HOLDINGS | 0883 CNOOC |
| 0020 WHELOCK AND CO. | 0338 SINOPEC SHAI.PETROCHEM. | 0902 HUANENG POWER INTL. |
| 0023 BANK OF EAST ASIA | 0341 CAFE DE CORAL HDG. | 0903 TPV TECHNOLOGY |
| 0041 GREAT EAGLE HDG. | 0345 VITASOY INTL.HDG. | 0914 ANHUI CONCH CEMENT |
| 0044 HONG KONG AIRCRAFT ENGR. | 0347 ANGANG STEEL | 0941 CHINA MOBILE |
| 0045 HONGKONG & SHAI.HTLS. | 0349 ICBC (ASIA) | 0966 CHINA INSURANCE INTL. |
| 0049 WHELOCK PROPERTIES | 0358 JIANGXI COPPER | 0983 SHUI ON CON.AND MATS. |
| 0053 GUOCO GROUP | 0363 SHANGHAI INDL.HDG. | 0991 DATANG INTL.PWR.GNRTN. |
| 0054 HOPEWELL HOLDINGS | 0373 ALLIED GROUP | 0992 LENOVO GROUP |
| 0062 TRANSPORT INTL.HDG. | 0386 SINOPEC | 1033 SINOPEC YIZHENG CHM. |
| 0065 FORTIS ASIA HOLDINGS | 0388 HONG KONG EXS.& CLEAR. | 1038 CHEUNG KONG INFR.HDG. |
| 0066 MTR | 0392 BEIJING ENTERPRISE HDG. | 1052 GZI TRANSPORT |
| 0069 SHANGRI-LA ASIA | 0393 GLORIOUS SUN ENTER. | 1055 CHINA SOUTHERN AIRL. |
| 0083 SINO LAND | 0420 FOUNTAIN SET (HDG.) | 1070 TCL MLTM.TECH.HDG. |
| 0087 SWIRE PACIFIC 'B' | 0440 DAH SING FINANCE HDG. | 1071 HUADIAN POWER INTL. |
| 0096 WING LUNG BANK | 0480 HKR INTERNATIONAL | 1093 CHINA PHARMACEUTICAL |
| 0097 HENDERSON INV. | 0494 LI & FUNG | 1097 I-CABLE COMMS. |
| 0101 HANG LUNG PROPERTIES | 0506 CHINA FOODS | 1109 CHINA RESOURCES LAND |
| 0123 GUANGZHOU INV. | 0511 TELEVISION BROADCASTS | 1110 CHINA NATIONAL AVIATION |
| 0127 CHINESE ESTATES HDG. | 0522 ASM PACIFIC TECH. | 1111 CHONG HING BANK |
| 0135 CNPC HONG KONG | 0525 GUANGSHEN RAILWAY | 1114 BRILLIANCE CHINA AUTV. HDG. |
| 0142 FIRST PACIFIC | 0548 SHENZHEN EXPRESSWAY | 1138 CHINA SHIPPING DEV. |
| 0144 CHINA MRCH.HDG.INTL. | 0551 YUE YUEN INDL.HDG. | 1171 YANZHOU COAL MINING |

| | | |
|-------------------------------|-----------------------------|-----------------------------|
| 0152 SHENZHEN INTL.HDG. | 0576 ZHEJIANG EXPRESSWAY | 1193 CHINA RES.LOGIC |
| 0165 CHINA EVERBRIGHT | 0583 SCMP GROUP | 1199 COSCO PACIFIC |
| 0167 IDT INTERNATIONAL | 0604 SHENZHEN INVESTMENT | 1211 BYD |
| 0168 TSINGTAO BREWERY | 0626 PUBLIC FINANCIAL HDG. | 2388 BOC HONG KONG (HDG.) |
| 0173 K WAH INTERNATIONAL HDG. | 0636 FUBON BANK (HONG KONG) | 2600 ALUMINUM CORP.OF CHINA |
| 0177 JIANGSU EXPRESSWAY | 0641 FONG'S INDUSTRIES | 2883 CHINA OILFIELD SVS. |
| 0178 SASA INTERNATIONAL HDG. | | |

Panel B: Companies with two year data (31 companies)

Panel B.1 year 2002 and 2004 (11 companies)

| | | |
|-----------------------------|-------------------------------|------------------------------|
| 0048 EGANAGOLDPFEIL (HDG.) | 0332 NGAI LIK INDUSTRIAL HDG. | 0915 LINMARK GROUP |
| 0056 ALLIED PROPERTIES (HK) | 0450 HUNG HING PRINT.GP. | 1122 QINGLING MOTORS |
| 0202 INTERCHINA HOLDINGS | 0655 HK CHINESE | 1135 ASIA SATELLITE TELECOM. |
| 0243 QPL INTERNATIONAL HDG. | 0861 DIGITAL CHINA HDG. | |

Panel B.2 year 2004 and 2005 (20 companies)

| | | |
|------------------------------|----------------------------|------------------------------|
| 0034 KOWLOON DEVELOPMENT | 0659 NWS HOLDINGS | 2356 DAH SING BANKING GP. |
| 0050 HONG KONG FERRY HDG. | 0836 CHINA RES.POWER HDG. | 2628 CHINA LIFE INSURANCE |
| 0057 CHEN HSONG HDG. | 1205 CITIC RESOURCES HDG. | 2698 WEIQIAO TEXTILE |
| 0124 KINGWAY BREWERY HDG. | 1212 LIFESTYLE INTL.HDG. | 2866 CHINA SHIP.CTNR.LINES |
| 0194 LIU CHONG HING INV. | 2317 VEDAN INTL.(HDG.) | 2878 SOLOMON SYSTECH (INTL.) |
| 0316 ORIENT OVERSEAS (INTL.) | 2318 PING AN INSURANCE | 2899 ZIJIN MINING GROUP |
| 0598 SINOTRANS | 2328 PICC PROPERTY & CLTY. | |

Panel C: Companies with one year data (49 companies)

Panel C.1 year 2003 (24 companies)

| | | |
|-------------------------------|------------------------------|------------------------------|
| 0031 CHINA AEROSPACE INTL. | 0343 CULTURECOM HOLDINGS | 0934 SINOPEC KANTON HDG. |
| 0033 ELEC & ELTEK INTL.HDG. | 0389 MOULIN GLB.EYECARE HDG. | 0995 ANHUI EXPRESSWAY |
| 0099 WONGS INTL.HDG. | 0418 FOUNDER HOLDINGS | 1126 DREAM INTERNATIONAL |
| 0156 LIPPO CHINA RESOURCES | 0517 COSCO INTL.HDG. | 1128 SINOPEC ZHENHAI REFN. |
| 0171 SILVER GRANT INTL.INDS. | 0588 BEIJING NORTH STAR | 1136 TCC INTERANTIONAL HDG. |
| 0188 SW KINGSWAY CAPITAL HDG. | 0885 FOREFRONT GROUP SUSP | 1170 KINGMAKER FOOTWEAR HDG. |
| 0250 SINO-I TECHNOLOGY | 0888 ROADSHOW HOLDINGS | 1203 GUANGNAN HOLDINGS |
| 0325 SINOPEC BEJ.YANHUA | 0931 ARTEL SOLUTIONS GP.HDG. | 1225 LERADO GROUP (HDG.) |

Panel C.2 year 2004 (4 companies)

| | | |
|-------------------------|---------------------------|---------------------------|
| 0022 MEXAN | 2333 GREAT WALL MOTOR CO. | 2357 AVICHINA IND.& TECH. |
| 0086 SUN HUNG KAI & CO. | | |

Panel C.3 year 2005 (21 companies)

| | | |
|-------------------------------|-----------------------------|------------------------------|
| 0027 GALAXY ENTERTAINMENT GP. | 0753 AIR CHINA | 1919 CHINA COSCO HDG. |
| 0035 FAR EAST CONSORT.INTL. | 0763 ZTE | 2038 FOXCONN INTL.HDG. |
| 0071 MIRAMAR HTL.&INV. | 0828 DYNASTY FINE WINES GP. | 2332 HUTCHISON TELECOM.INTL. |
| 0078 REGAL HOTELS INTL.HDG. | 0906 CHINA NETCOM GP. | 2343 PACIFIC BASIN SHIP. |
| 0200 MELCO INTL.DEV. | 1088 CHINA SHENHUA EN.CO. | 2380 CHINA POWER INTL.DEV. |
| 0311 LUEN THAI HOLDINGS | 1192 TITAN PETROCHEM.GP. | 2727 SHANGHAI ELEC.GP.CO. |
| 0432 PACIFIC CEN.PRUM.DEV. | 1221 SINO HOTELS HDG. | 3328 BANK OF COMMS. |

Appendix 2: Transparency and Disclosure Criteria include 56 questions and sub-questions. The table presents the mandatory requirements for Hong Kong. There are 32 mandatory disclosure items for Hong Kong (* defines the questions related to mandatory disclosure).

| Survey Question | |
|--|---|
| <i>Section A. Rights of Shareholders</i> | |
| A.1 | Is the decision on the remuneration of board members or executives approved by the shareholders annually? |
| A.2 | * How is the remuneration of the board presented? |
| A.3 | Quality of Notice to call a Shareholders Meeting in the past year. |
| | * (i) Appointment of directors, providing their names and background |
| | * (ii) Appointment of auditors, providing their names and fees. |
| | * (iii) Dividend policy, providing the amount and explanation. |
| A.4.1 | * (i) Did the CEO/Managing Director attend at least one AGM in the past two years? |
| A.4.2 | (ii) Is a name list of board attendance available? |
| A.5 | Do AGM minutes record that there was an opportunity for shareholders to ask questions/raise issues in the past year? |
| | (i) Is there a record of answers and questions? |
| | (ii) Is any resolution being solved? |
| <i>Section B. Equitable Treatment of Shareholders</i> | |
| B.1 | * Does the company provide rationales/explanations for related-party transactions affecting the corporation? |
| B.2 | * Have there been any non-compliance cases regarding related-party transactions in the past year? |
| B.3 | Does the company facilitate voting by proxy? |
| B.4.1 | Does the notice to shareholders specify the documents required to give proxy? |
| B.4.2 | Is there any requirement for a proxy appointment to be notarized? |
| B.5 | * How many days in advance does the company send out the notice of general shareholder meetings? |
| <i>Section C. The Role of Stakeholders in Corporate Governance</i> | |
| C.1 | Does the company explicitly mention the safety and welfare of its employees? |
| C.2 | Does the company explicitly mention the role of key stakeholders such as customers or the community at large (or creditors or suppliers)? |
| C.3 | Does the company explicitly mention environmental issues in its public communications? |
| <i>Section D. Disclosure and Transparency</i> | |
| D.1 | Does the company have a transparent ownership structure? |
| | * (i) Breakdown of shareholdings. |
| | * (ii) Is it easy to identify beneficial ownership? |
| | * (iii) Are director shareholdings disclosed? |
| | * (iv) Is management shareholding disclosed? |

Survey Question

- D.2 Assess the quality of the annual report. In particular, the following:
- * (i) Financial performance
 - * (ii) Business operations and competitive position
 - * (iii) Board member background
 - * (iv) Basis of the board remuneration
 - * (v) Operating risks
- D.3 * Is there any statement requesting the directors to report their transactions of company stock?
- D.4 * Does the company have an internal audit operation established as a separate unit in the company?
- D.5 * Does the company perform an annual audit using independent and reputable auditors?
- D.6 * Are there any accounting qualifications in the audited financial statements apart from the qualification of Uncertainty of Situation?
- D.7 Does the company offer multiple channels of access to information?
- (i) Annual report
 - (ii) Company website
 - (iii) Analyst briefing
 - (iv) Press conference/ press briefing
- D.8 Does the company have a website, disclosing up-to-date information?
- (i) Business operation
 - (ii) Financial statement
 - (iii) Press release
 - (iv) Shareholding structure
 - (v) Organizational structure
 - (vi) Corporate group structure
 - (vii) Annual report downloadable
 - (viii) Provided in both Chinese and English
- Section E. Responsibilities of the Board*
- E.1.1 * Does the company have its own written corporate governance rules?
- E.1.2 Does the board of directors provide a code of ethics or statement of business conduct for all directors and employees?
- E.1.3 Does the company have a corporate vision/mission?
- E.2 Assess the quality and content of the Audit Committee Report in the annual report.
- * (i) Attendance
 - * (ii) Internal control
 - * (iii) Management control
 - * (iv) Proposed auditors
 - * (v) Financial report review
 - * (vi) Legal compliance
 - * (vii) Conclusions or opinions
- E.3 * Does the company state in its annual report the definition of 'independence'?
- E.4 * Does the company provide contact details for a specific investor relations person?
- E.5 * Does the company have a board of director's report?
-

Appendix 3: Correlation Matrix for Regression Variables

This table provides correlation coefficients between variables used in the regression analyses. The variables are defined as follows: MB = Market value of common equity plus book value of debt divided by total assets at the end of fiscal year; Transparency Index = Corporate Transparency Index constructed based on OECD principles; SIZE = Natural log of total assets in millions of Hong Kong dollars at the end of fiscal year; D/E = Debt divided by equity at the end of fiscal year; ROA = Return divided by total assets at the end of fiscal year; DUMMY_AUDIT = 1 if firm has a board audit committee, and 0 otherwise; DUMMY_COMP = 1 if firm has a board compensation committee, and 0 otherwise; DUMMY_DUAL = 1 if CEO is also the Chairman of the board, and 0 otherwise; BOUT = Number of outside directors on the board (including independent non-executive directors, non-executive directors, and honorable directors); DUMMY_BOARD = 1 if board members hold more than 25% of the outstanding shares, and 0 otherwise; DUMMY_HR = 1 if firm is an H-share or a Red chip company, and 0 otherwise. The combined sample contains 510 firms-years. There are 168, 168, and 174 companies in year 2002, 2004, and 2005 respectively. The numbers in second line are *p*-values.

| | 1 | 2 | 3 | 4 | 6 | 7 | 8 | 9 | 10 | 10 | 11 |
|----------------|----------------------|---------------------|----------------------|---------------------|---------------------|----------------------|---------------------|----------------------|---------------------|----------------------|-------|
| 1 M/B | 1.000 | | | | | | | | | | |
| 2 TI | 0.203*** (0.000) | 1.000 | | | | | | | | | |
| 3 SIZE | -0.174*** (0.000) | 0.378*** (0.000) | 1.000 | | | | | | | | |
| 4 D/E | 0.162*** (0.000) | 0.086* (0.057) | 0.155*** (0.001) | 1.000 | | | | | | | |
| 5 ROA | 0.396*** (0.000) | 0.194*** (0.000) | -0.087* (0.053) | -0.078* (0.082) | 1.000 | | | | | | |
| 6 Dummy_AUDIT | 0.065 (0.146) | 0.283*** (0.000) | 0.017 (0.712) | 0.005 (0.908) | 0.151*** (0.001) | 1.000 | | | | | |
| 7 Dummy_COMP | 0.104** (0.020) | 0.612*** (0.000) | 0.264*** (0.000) | 0.068 (0.129) | 0.130*** (0.004) | 0.122*** (0.007) | 1.000 | | | | |
| 8 Dummy_DUAL | 0.011 (0.800) | 0.006 (0.896) | 0.073 (0.103) | 0.026 (0.568) | 0.014 (0.751) | -0.138*** (0.002) | 0.257*** (0.000) | 1.000 | | | |
| 9 BOUT | -0.037 (0.419) | 0.069 (0.130) | 0.353*** (0.000) | 0.026 (0.571) | -0.094** (0.037) | 0.095** (0.036) | 0.007 (0.879) | -0.101** (0.026) | | | |
| 10 Dummy_BOARD | 0.115*** (0.010) | -0.089** (0.048) | -0.213*** (0.000) | -0.052 (0.252) | 0.141*** (0.002) | -0.057 (0.203) | -0.054 (0.228) | 0.119*** (0.008) | -0.082* (0.072) | 1.000 | |
| 11 Dummy_HR | -0.117*** (0.009) | 0.020 (0.662) | 0.132*** (0.003) | 0.135*** (0.003) | -0.056 (0.213) | 0.101** (0.025) | -0.048 (0.289) | -0.161*** (0.000) | -0.094** (0.038) | -0.554*** (0.000) | 1.000 |