

Mandatory IFRS Adoption and Intra-industry Information Transfers

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ABSTRACT: This paper examines the impact of widespread mandatory IFRS adoption in 2005 on intra-industry information transfers from earnings announcements. Using a sample of firms from 50 countries in 1999-2007, we find that, on average, investors of IFRS firms react more strongly to earnings releases of other IFRS firms in the same industry after 2005, consistent with externality gains from mandatory IFRS adoption. We also find that the increase in information transfers is greater when announcers are from countries with lower pre-adoption earnings quality and larger differences between their local standards and IFRS, suggesting that both increased financial reporting quality and improved information comparability contribute to the externality gains. Additional analysis restricting the sample to IFRS announcers provides supportive evidence on the role of quality and comparability. Taken together, our findings suggest that, after switching to IFRS, investors are more likely to use earnings information of industry peers for share valuation, and that both improved reporting quality and information comparability help explain this pattern.

Keywords: *International Financial Reporting Standards (IFRS), Intra-industry information transfer, Externality, Comparability*

Data Availability: *Data are available from sources identified in the paper.*

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I. INTRODUCTION

Financial reporting externalities occur when information about the productive opportunities of one firm conveys information about the productive opportunities of other firms (Beaver 1981). One example of such externalities is “intra-industry information transfers,” which arise when information disclosure made by one firm contemporaneously affects the returns of other firms in the same industry (Schipper 1990). Prior literature finds that earnings announcements provide information about industry peer firms and that stock prices of non-announcing peers reflect such intra-industry information transfers (e.g., Foster 1981; Han et al. 1989; Han and Wild 1990; Freeman and Tse 1992; Ramnath 2002). In this study we examine the impact of widespread mandatory adoption of International Financial Reporting Standards (IFRS) in 2005 on intra-industry information transfers from earnings announcements.

Following the recent movement in global financial reporting harmonization, more than 30 countries around the world switched to IFRS reporting in 2005. While a growing number of studies examine the economic consequences of mandatory IFRS adoption (e.g., Daske et al. 2008; Li 2009), there is little evidence on the effect of IFRS adoption on financial reporting externalities. We add to this line of research by investigating whether the switch to IFRS in 2005 affects how investors react to earnings releases of other firms in the same industry. In particular, given the role of externalities in expanding investors’ available information set, our study of intra-industry information transfers around the mandatory IFRS adoption provides additional insights on the economic benefits of the adoption.

Prior studies suggest that IFRS requires greater financial disclosure than most local accounting standards (e.g., Ashbaugh and Pincus 2001), and that firms applying IFRS generally exhibit better accounting quality (e.g., Barth et al. 2008). Prior literature also argues that one set

of uniform accounting standards is likely to reduce investors' information processing costs and improve information comparability across firms (e.g., DeFond et al. 2009; Li 2009; Armstrong et al. 2010). To the extent that mandatory IFRS adoption leads to improved financial reporting quality and/or enhanced information comparability, we expect investors to find financial information released by other firms more useful, that is, we expect investors to respond more strongly to earnings releases of peer firms in the same industry.

Our sample consists of 31,785 firm-year observations from 33 countries that mandate IFRS adoption in 2005 and from 17 countries that retain their local accounting standards over the 1999 to 2007 period. We measure intra-industry information transfer using non-announcing firms' abnormal return variance around the earnings release of the first announcer in each industry.¹ We focus on the first earnings announcement because prior studies show that earnings surprises of firms in the same industry are positively correlated, and that information contained in early earnings announcements is particularly important in updating earnings expectations of other firms in the industry (Freeman and Tse 1992; Ramnath 2002).

We employ a difference-in-differences design by comparing changes in information transfers in IFRS adoption countries before and after the adoption relative to the corresponding changes in non-IFRS adoption countries as well as between IFRS adoption countries and non-adoption countries. Specifically, we regress non-announcing firms' three-day abnormal stock return variance on an indicator for the post-adoption period (2005-2007), a second indicator that takes the value of one when both announcing and non-announcing firms are from IFRS adoption countries, the interaction of these two indicators, and a set of control variables. The coefficient

¹ We use the non-directional test based on abnormal return variance to increase the power of detecting intra-industry information transfers. Measures used in directional tests such as abnormal stock returns are susceptible to problems arising from positive and negative information transfers from the same information signal offsetting each other and leading to insignificant transfers even though they exist (Foster 1981; Kim et al. 2008).

on the interaction term captures the change in non-announcing firms' stock price response to the first announcer's earnings announcement (i.e., information transfers) between the pre- and post-mandatory IFRS adoption period when both firms are from IFRS adoption countries, relative to the corresponding change in information transfers for the benchmark group in which the announcer, the non-announcing firm, or both are from non-IFRS adoption countries.

To examine information transfers across countries, we also create an additional indicator variable, which takes the value of one when the announcer and non-announcing firm are from *different* IFRS adoption countries. We repeat the multivariate analysis described above by replacing the IFRS adoption country indicator with the cross-country indicator and interacting it with the post-adoption period indicator. The coefficient on this alternative interaction term captures the change in *cross-border* information transfers among IFRS adoption countries around the mandatory adoption, relative to the corresponding change for the benchmark group.

We find that compared to the benchmark group, intra-industry information transfers become stronger among firms from countries that mandate IFRS in 2005. This evidence is consistent with externality gains from mandating a single set of high quality accounting standards. We also find that intra-industry information transfers improve among firms from different IFRS adoption countries after 2005 relative to the benchmark group.

We next investigate the role of increased reporting quality and enhanced information comparability in explaining stronger intra-industry information transfers following mandatory IFRS adoption. We measure the potential improvement in financial reporting quality following IFRS adoption using pre-adoption earnings quality based on the country-level earnings management score from Leuz et al. (2003). We measure the potential improvement in information comparability using the number of pre-adoption inconsistencies between local

accounting standards and IFRS (Nobes 2001). Based on the sample medians, we partition the sample into high versus low pre-adoption earnings quality subsamples and large versus small pre-adoption inconsistency subsamples, and compare the post-adoption improvement in information transfers across the partitions. We find that the improvement in intra-industry information transfers following mandatory IFRS adoption is significant only for IFRS announcers from countries with low pre-adoption earnings quality or with large pre-adoption inconsistencies. Thus, the evidence suggests that both increased financial reporting quality and enhanced information comparability contribute to the improvement in intra-industry information transfers among IFRS firms after the mandatory adoption.

In a third set of tests, we further examine the role of quality and comparability. Specifically, we restrict first announcers to those from countries that mandate IFRS in 2005, and compare information transfers from their earnings announcements to two different groups of non-announcing firms in the same industry: those from IFRS adoption countries and those from countries that do not follow IFRS. If the improvement in intra-industry information transfers after the adoption can be attributed exclusively to increased reporting quality, and not to enhanced comparability, the magnitude of information transfers should be similar across the two types of peers within an industry. We find, however, a relatively stronger increase in information transfers to industry peers from IFRS adoption countries than to those from non-IFRS adoption countries. This result continues to hold for cross-country intra-industry information transfers. Thus, this analysis provides additional evidence on the factors behind the improvement in information transfers after the mandatory switch.

Finally, in a battery of sensitivity tests we find that our main results are robust to: (1) using abnormal stock returns as an alternative proxy for information transfers; (2) excluding U.S.

firms from the sample; (3) controlling for a possible transition effect by excluding 2005 from the analysis; and (4) controlling for first announcers' financial characteristics.

Our study contributes to the literature in several ways. First, it provides insights into the economic consequences of mandatory IFRS adoption. While prior studies recognize the potential effect of positive externalities (e.g., Meeks and Swann 2008; Hail and Leuz 2009), there is little direct evidence on whether and how changes in reporting regulations such as mandatory IFRS adoption create externalities. We add to the literature by documenting an improvement in intra-industry information transfers after the IFRS mandate. Our evidence also complements recent work by Landsman et al. (2009), who document an increase in the information content of earnings announcements in countries after the IFRS mandate.

Second, our study adds to the literature on information transfers. Schipper (1990) calls for a before-the-fact policy motivation for information transfer research. Our finding of an increase in intra-industry information transfers after 2005 should be of interest to regulators making decisions on whether U.S. companies should be allowed or required to follow IFRS. On the one hand, our evidence is consistent with the Securities Exchange Commission's (SEC) position in highlighting comparability as an important benefit of the potential IFRS adoption in the U.S.² On the other hand, we find that the increase in information transfers is present only for announcing firms with low pre-adoption earnings quality and small pre-adoption information comparability. To the extent that U.S. GAAP is of higher quality and has fewer differences from IFRS compared to other local standards, our findings suggest that the externality effect from IFRS adoption might be limited for U.S. firms (Hail et al. 2009).

² The SEC's proposed roadmap to IFRS adoption states that U.S. companies qualify for early IFRS adoption when they are in industries where IFRS is the most frequently used foreign standards (SEC 2008).

Third, we provide evidence consistent with the benefits of enhanced comparability from mandatory IFRS adoption. Prior studies on the effect of mandating IFRS either do not explicitly test for comparability benefits or fail to find statistically significant results. Daske et al. (2008), for example, point to improved comparability as a potential source for the increase in liquidity following IFRS adoption, but are unable to provide statistical support for this explanation. They call for future research on comparability and the existence of positive externalities from mandatory IFRS adoption.³ Our study shows that comparability is one of the possible mechanisms behind the improvement in information transfers, and thus sheds new light on the important role of comparability in achieving the benefits of adopting a uniform set of high quality financial reporting standards.

The paper is organized as follows. Section II discusses our motivation and the related literature. We discuss the research design in Section III. Section IV describes the sample and presents descriptive statistics. Section V presents our empirical results. In Section VI we present the results of two additional analyses and in Section VII we discuss sensitivity tests. We conclude in Section VIII.

II. MOTIVATION AND RELATED LITERATURE

Effects of IFRS Adoption and Externalities of Financial Reporting

Proponents of IFRS adoption argue that IFRS reporting improves information transparency and the quality of financial reporting, thereby lowering information risk and

³ There is growing interest in comparability in recent literature. De Franco et al. (2009) and Bradshaw et al. (2009) examine comparability of financial reporting among U.S. firms and Barth et al. (2009) focus on comparability between non-U.S. IFRS users and U.S. firms. Concurrent work by DeFond et al. (2009) uses changes in foreign mutual fund ownership to measure the potential benefits of enhanced comparability from mandatory IFRS adoption in the EU. Yip and Young (2009) also examine cross-border information comparability based on nine European countries that adopt IFRS in 2005. Their sample includes only a subset of IFRS adopters and lacks a benchmark group, however, making it difficult to interpret their results.

information asymmetry between firms and investors. Consistent with these arguments, prior studies document positive economic benefits associated with voluntary and mandatory adoption of IFRS. For example, studies find that voluntary IFRS adopters experience lower bid-ask spreads and higher turnover (Leuz and Verrecchia 2000), greater analyst following (Cuijpers and Buijink 2005), smaller analyst forecast errors (Ashbaugh and Pincus 2001), better accounting quality (Barth et al. 2008), higher foreign mutual fund ownership (Covrig et al. 2007), and improved internal performance evaluation processes (Wu and Zhang 2009). Studies that focus on the economic consequences of mandatory IFRS adoption find an increase in market liquidity (Daske et al. 2008), a decrease in cost of capital (Li 2009), and an increase in the information content of earnings announcements (Landsman et al. 2009).

Investors in the capital market frequently use financial information of other firms in the same industry in assessing the value of a given firm's shares (Beaver 1981; Foster 1981).⁴ To the extent that IFRS adoption brings about improvements in reporting quality and increases the value relevance of announcing firms' earnings, investors may find these announcements more useful in the valuation of other non-announcing firms in the same industry, thus resulting in stronger information transfers from earnings announcements after the mandatory adoption.

Another argument supporting IFRS adoption focuses on convergence benefits. Even if the quality of financial reporting does not improve, it is possible that financial information becomes more comparable and therefore more useful to investors, reducing information asymmetries and lowering estimation risk. Consistent with this argument, prior literature finds that IFRS reporting reduces investors' information processing costs, helping investors

⁴ Prior literature (e.g., Dye 1990; Admati and Pfleiderer 2000; Leuz and Wysocki 2008) also notes that the effects of reporting and disclosure often extend beyond the firm providing the information. Hail et al. (2009), in particular, contend that the disclosure of operating performance and governance arrangements provides useful benchmarks that help investors evaluate other firms' managerial efficiency or potential agency conflicts.

differentiate high and low quality firms across markets and countries (e.g., Covrig et al. 2007; Armstrong et al. 2010).

Meeks and Swann (2008) argue that comparability can be viewed from a network perspective. Increasing the number of firms with directly comparable financial reports increases the number of two-way communication linkages in the “financial reporting” network, which enhances the value of the overall network to both investors and firms. Consistent with the network perspective, one firm’s adoption of more comparable reporting practices creates externalities on other firms (Hail et al. 2009). If the use of a uniform set of accounting standards enhances information comparability and decreases the cost of comparing information across firms, we expect investors to be more likely to use information from an industry peer’s financial reporting after mandatory IFRS adoption.⁵

On the other hand, it is possible that inconsistent implementation and poor enforcement may lead to greater opportunistic managerial discretion and lower financial reporting quality after applying IFRS. Prior literature (e.g., Ball et al. 2000; Ball and Shivakumar 2005; Daske et al. 2008) points out the limited role of accounting standards in determining reporting quality and suggests that proper implementation and enforcement are necessary to ensure positive economic consequences from IFRS adoption. In addition, skeptics of mandatory IFRS adoption argue that global uniform accounting standards such as IFRS might not adequately reflect regional variations in economies that lead to differences in domestic accounting standards (Sunder 2007). If IFRS does not adequately accommodate political and economic differences across countries,

⁵ Covrig et al. (2007) suggest that more comparable reporting across firms from different countries facilitates cross-border investment and the integration of capital markets. Li (2009) also argues that increased comparability resulting from the IFRS mandate can yield positive information externalities. Because the values of firms are correlated (Dye 1990), the information disclosed by firms in one country becomes more comparable and hence more useful in valuing firms in another country if both countries adopt IFRS.

mandatory IFRS adoption may actually reduce comparability. Therefore, whether intra-industry information transfers increase after mandatory IFRS adoption is an empirical question.

Information Transfers

Beginning with Firth (1976) and Foster (1981), research on information transfers shows that earnings announcements provide information about peer firms in the same industry and that stock prices of non-announcing peers reflect such intra-industry information transfers (e.g., Han and Wild 1990; Freeman and Tse 1992; Ramnath 2002; Thomas and Zhang 2008). Other studies also examine information transfers from voluntary management forecasts (Baginski 1987; Han et al. 1989; Kim et al. 2008), dividend announcements (Laux et al. 1998), bankruptcy announcements (Lang and Stulz 1992), and restatements (Gleason et al. 2008).

Prior literature on information transfers (e.g., Baginski 1987; Han et al. 1989; Pyo and Lustgarten 1990) generally focuses on positive intra-industry information transfers, where good (bad) news from a forecasting firm causes, on average, a positive (negative) stock market reaction among non-announcing firms in the same industry. Kim et al. (2008) suggest that information transfers from an information signal (e.g., management forecast) can be positive or negative based on the degree of competitiveness between the forecaster and the information receiver. They argue that positive and negative intra-industry information transfers offset each other, leading to an overall finding of no information transfers even though they exist. Indeed, prior research (e.g., Han et al. 1989) often fails to find meaningful evidence of information transfers from directional tests, while statistically significant results obtain from non-directional tests.

Overall, prior literature focuses primarily on documenting the existence of information transfers from various information signals. However, the limited contribution of intra-information transfer studies to accounting policy deliberations invites criticism on this line of research (Schipper 1990). By examining changes in information transfers and providing evidence on externality effects of IFRS adoption, this study improves our understanding of the implications of mandating a uniform set of high quality financial reporting standards.

III. RESEARCH DESIGN

We measure intra-industry information transfer using non-announcing firms' abnormal stock return variance around the earnings announcements of first announcers in the same industry. We define industries based on 8-digit Global Industry Classification Standard (GICS) codes.⁶ We focus on first earnings announcements in the industry because prior studies show that information transfers from first announcements have stronger implications for earnings expectations of other firms in the same industry than subsequent announcements (e.g., Freeman and Tse 1992; Ramnath 2002).⁷ We examine the change in intra-industry information transfers among IFRS adoption countries (i.e., when both the announcing firm and non-announcing firm are from IFRS adoption countries) before and after 2005, relative to the corresponding change for a benchmark group of firms (i.e., when either the announcing firm or the non-announcing firm are from non-IFRS adoption countries). This difference-in-differences research design

⁶ Bhojraj et al. (2003) show that GICS classifications perform better in terms of explaining stock return co-movements than Standard Industrial Classification (SIC) codes or Fama and French (1997) industry groups. Prior research on information transfers (e.g., Gleason et al. 2008) also uses GICS classifications.

⁷ For industry-years that have multiple first announcers with the same announcement dates, we choose the announcer with the largest size (sales) because their announcements are expected to have stronger implications for industry peers. The results are qualitatively similar when we eliminate industry-years with multiple first announcers.

allows us to investigate the impact of mandatory IFRS adoption on intra-industry information transfers while ensuring a proper control for possible confounding factors that change around the same period.

Specifically, for each industry-year, we identify the firm that first announces its earnings. We calculate abnormal return variance for non-announcing firms (*AVAR*) as the average squared prediction errors from the market model over the three-day window (-1, 1) scaled by the variance of market model residuals over the estimation window (-220, -21), where day 0 is the first announcer's earnings announcement date (Beaver 1968; Landsman and Maydew 2002).⁸ Higher abnormal return variance indicates greater intra-industry information transfer associated with the first announcer's earnings announcements.

To examine the impact of mandatory IFRS adoption on intra-industry information transfers, we regress non-announcing firms' abnormal return variance on an indicator variable for the time period (pre- versus post-adoption period), an indicator variable for IFRS adopters, the interaction between these two indicators, and a set of control variables. Specifically, the first indicator, *POST*, captures whether the firm-year observation falls in the post-adoption period; it is coded one if it falls in or after 2005, and zero otherwise. The second indicator, *IFRS*, is coded one when both the first announcer and the non-announcing firm are from IFRS adoption countries, and zero otherwise. The interaction term *POST*IFRS* is our primary variable of interest, as its coefficient captures the change in non-announcing firms' reactions to first-announcer earnings announcements after 2005 among IFRS adoption countries, relative to the corresponding change for the benchmark group. To examine information transfers across country

⁸ An alternative approach would be to examine abnormal stock returns of non-announcing firms around first-announcer earnings announcements. As discussed in Section II, however, this approach may not be informative because it reflects both positive and negative information transfers, i.e., contagion and competitive effects (e.g., Lang and Stulz 1992; Kim et al. 2008). Nonetheless, in Section VII we discuss a sensitivity test based on this alternative approach.

borders, we create an alternative indicator, *IFRS_cross*, which is coded one when the first announcer and the non-announcing firm are from *different* IFRS adoption countries, and zero otherwise. The coefficient on *POST*IFRS_cross* represents the relative change in *cross-country* information transfers after the mandatory switch in 2005.

Our regression model also includes several control variables that are likely to be correlated with the abnormal return variance of non-announcing firms. Specifically, we include: (1) the magnitude of the first announcer's unexpected earnings, *Abs_UE_first*, because market reactions to earnings announcements are related to the magnitude of the earnings surprise (Francis et al. 2002); (2) *Neg_UE*, an indicator for the negative unexpected earnings of the first announcing firm, and the interaction term, *Abs_UE_first *Neg_UE*, because non-announcing firms' stock price reaction might be different depending on the type of news; (3) variables controlling for non-announcing firms' financial characteristics and information environment that may be associated with their reactions to first-announcer earnings announcements (e.g., Fama and French 1992, 1993; Hayn 1995; DeFond et al. 2007; Landsman et al. 2009): *Loss*, an indicator capturing whether the non-announcing firm reports a loss; *Size*, measured as the natural logarithm of the market value of equity at the end of the prior year; *BM*, the book-to-market ratio, measured as the book value of equity divided by the market value of equity; *LEV*, financial leverage, computed as the ratio of total liabilities to total assets; and *Numest*, the number of analyst forecasts included in the most recent I/B/E/S consensus forecast prior to the earnings announcement date; (4) the reporting lag of the first announcer, *Lag_first*, measured as the number of days between the fiscal year-end and the annual earnings announcement date (DeFond et al. 2007); and (5) indicator variables to control for country fixed effects.

The formal regression models are as follows:

$$\begin{aligned}
AVAR = & \beta_0 + \beta_1(POST) + \beta_2(IFRS) + \beta_3(POST*IFRS) \\
& + \beta_4(Abs_UE_first) + \beta_5(Neg_UE) + \beta_6(Abs_UE_first*Neg_UE) \\
& + \beta_7(Loss) + \beta_8(Size) + \beta_9(BM) + \beta_{10}(LEV) + \beta_{11}(Numest) \\
& + \beta_{12}(Lag_first) + \beta_n(DCountry) + \varepsilon,
\end{aligned} \tag{1}$$

$$\begin{aligned}
AVAR = & \beta_0 + \beta_1(POST) + \beta_2(IFRS_cross) + \beta_3(POST*IFRS_cross) \\
& + \beta_4(Abs_UE_first) + \beta_5(Neg_UE) + \beta_6(Abs_UE_first*Neg_UE) \\
& + \beta_7(Loss) + \beta_8(Size) + \beta_9(BM) + \beta_{10}(LEV) + \beta_{11}(Numest) \\
& + \beta_{12}(Lag_first) + \beta_n(DCountry) + \varepsilon,
\end{aligned} \tag{2}$$

where:

AVAR: The stock return variance over the three-day window (-1, 1), scaled by the stock return variance over the estimation window (-220, -21) for non-announcing firms. Stock return variance over the three-day window is the average of the squared prediction errors from the market model around the first announcer's earnings announcement date reported in I/B/E/S. Stock return variance over the estimation period is the variance of the residual returns from the market model estimated over day -220 through day -21 relative to the first announcer's earnings announcement date;

POST: Dummy variable equal to one if the fiscal year is 2005 or later, and zero otherwise;

IFRS: Dummy variable equal to one if both the first announcing firm and the non-announcing firm are from IFRS adoption countries, and zero otherwise;

IFRS_cross: Dummy variable equal to one if the first announcing firm and the non-announcing firm are from different IFRS adoption countries, and zero otherwise;

Abs_UE_first: The absolute value of the unexpected earnings for the first announcing firm, computed as the difference between annual earnings and the most recent mean consensus earnings forecast, scaled by the stock price at the end of the prior year. All data are from I/B/E/S;

Neg_UE: Dummy variable equal to one if the unexpected earnings of the first announcing firm is negative, and zero otherwise;

Loss: Dummy variable equal to one if the non-announcing firm experiences a loss (i.e., actual annual earnings as reported in I/B/E/S are less than zero), and zero otherwise;

Size: The natural logarithm of the market value of equity at the end of the prior year for the non-announcing firm;

BM: The book-to-market ratio for the non-announcing firm, calculated as the book value of equity divided by the market value of equity;

LEV: Financial leverage for the non-announcing firm, computed as the ratio of total liabilities to total assets;

Numest: The number of analyst forecasts included in the most recent I/B/E/S consensus forecast of annual earnings prior to the annual earnings announcement date for the non-announcing firm;

Lag_first: The first announcer's reporting lag, computed as the number of days from the fiscal year-end to the annual earnings announcement date reported in I/B/E/S; and
DCountry: Indicator variables for countries.

The coefficient β_3 on the interaction term *POST*IFRS* (*POST*IFRS_cross*) in the first (second) regression model captures the change in the degree of intra-industry information transfer before and after 2005 when both the announcing firm and the non-announcing firm are from (different) IFRS adoption countries, relative to the corresponding change in information transfer when either the announcing firm or the non-announcing firm are from non-IFRS adoption countries. In other words, β_3 in the first regression model captures the impact of mandatory IFRS adoption on information transfers both within and across countries, while β_3 in the second model captures the impact of IFRS adoption on cross-border information transfers.⁹ To the extent that mandating IFRS makes information from announcing firms more useful to investors in updating their expectations for non-announcing firms, we predict β_3 to be positive in both models.

IV. SAMPLE SELECTION AND DESCRIPTIVE STATISTICS

Our sample period ranges from 1999 to 2007. We start with 1999 because this is when the International Accounting Standards Committee (IASC) completed the IAS Core Standards Project, and as a result, the standards applied by IFRS adopters are generally regarded as representative of the core international standards (Hung and Subramanyam 2007). We identify 33 countries that mandated IFRS in 2005 and 17 countries that retain their local accounting standards over our sample period. We further identify firms in IFRS adoption countries as those that follow IFRS in 2005 and afterwards (i.e., the code of accounting standards in Compustat

⁹ Note that in regression model (2), the benchmark group includes information transfers from announcing firms to non-announcing firms from the same IFRS adoption country while the treatment group includes information transfers across different IFRS countries only.

Global is “DI” in and after 2005),¹⁰ and firms in non-IFRS adoption countries as those that follow standards other than IFRS (i.e., the code of accounting standards in Compustat Global is not “DI” over our sample period). We then collect firm-level data for sample firms from these 50 countries.

Specifically, we collect reported annual earnings, analyst forecasted earnings, and annual earnings announcement dates from the I/B/E/S database. Following prior studies such as Bailey et al. (2006) and DeFond et al. (2007), we focus on annual earnings announcements because few international companies report quarterly earnings data on I/B/E/S. We obtain daily stock returns as well as firm-level financial information from Compustat Global, and measure country-specific market returns as the returns on an equal-weighted index for all within-country firms covered by Compustat Global (DeFond et al. 2007).¹¹ Consistent with prior studies (e.g., Freeman and Tse 1992; Thomas and Zhang 2008), we restrict the sample firms to have December fiscal year-ends to ensure that the announcing and non-announcing firms report financial results for the same fiscal periods. We further omit non-announcing firms if their own earnings announcement dates follow the first announcer’s earnings announcement dates by two trading days or less. To be included in the sample, each industry-year must have at least one non-announcing firm besides the first announcer. To mitigate the influence of outliers, we delete observations in the top and bottom 1% of the dependent variable, *AVAR*, and further winsorize all other firm-level

¹⁰ Our sample of IFRS adoption countries also includes firms that voluntarily adopt IFRS before 2005. In total, there are 14 non-announcing firm-year observations with both first announcers and non-announcing firms adopting IFRS voluntarily before 2005. Although including these observations is likely to bias against finding an increase in information transfers after the IFRS mandate, we examine whether our results are robust to excluding these observations. In unreported sensitivity tests we find that our results remain qualitatively unchanged when these observations are removed from the sample.

¹¹ Daily stock return data for Canadian firms are incomplete in Compustat Global, and therefore we supplement this information with data from Datastream.

continuous variables at the top and bottom 1% of their distributions, with the exception of firm size (natural logarithm of market value of equity).¹²

Our final sample consists of 31,785 non-announcing firm-year observations in 161 industries from 50 countries during the period 1999 to 2007.¹³ Of these observations, 1,253 (1,088) are in the treatment group with both announcers and non-announcing firms from (different) IFRS adoption countries, i.e., *IFRS* (*IFRS_cross*) equal to one, and 30,532 (30,697) are in the benchmark group.

Table 1 presents the sample distribution for non-announcing firms by country and by year. Panel A reports the distribution of non-announcing firms from the 33 IFRS adoption countries. The number of observations per year ranges from 867 in 1999 to 1,248 in 2007, and the number of observations per country ranges from one in Cyprus and Latvia to 1,531 in Germany.¹⁴ Panel A also indicates that the majority of IFRS observations (88%) are from the EU countries, consistent with its mandatory switch to IFRS by all public companies in 2005. Similarly, Panel B of Table 1 reports the distribution of non-announcing firms from the 17 non-IFRS adoption countries. The panel shows that the total number of observations per year ranges from 1,957 in 2000 to 3,211 in 2007, and the total number of observations per country ranges from one in Saudi Arabia to 15,566 in the U.S. Because the large number of observations from the U.S. (71% of the non-IFRS adoption sample) may potentially influence our firm-level analysis, we perform and discuss sensitivity tests that exclude U.S. firms in Section VII. Panel C of Table 1 presents the number of announcing firms by year and by country. As can be seen, the sample comprises

¹² In unreported sensitivity tests, we re-perform our analysis after truncating all firm-level continuous variables at the top and bottom 1% of their distributions (except for firm size) and find consistent results.

¹³ We remove U.S. cross-listed firms from our sample because they have two sets of price data (one in the U.S. and the other in the home country) and it is unclear which price should be used in measuring information transfers.

¹⁴ The relatively small number of observations from Australia is due to the fact that most Australian companies have June fiscal year-ends, and therefore are excluded from our final sample.

1,247 firm-year observations of first announcers, ranging from 128 in 1999 to 151 in 2006. Similar to Panel B, first announcers are dominated by U.S. firms (78%).

In Table 2 we report descriptive statistics of firm-level variables. Panel A shows that the mean (median) abnormal return variance, *AVAR*, for non-announcing firms around first-announcer earnings announcements is 1.011 (0.517), with a standard deviation of 1.42. The mean and median absolute values of unexpected earnings (*Abs_UE_first*) for announcing firms are 0.004 and 0.001, respectively, with a standard deviation of 0.01. Over the sample period, on average, 33.6% of first announcers report negative unexpected earnings (*Neg_UE*) and 18.1% of non-announcing firms experience a loss (*Loss*). Further, for non-announcing firms the natural logarithm of their market value of equity (*Size*) is 6.019, their book-to-market ratio (*BM*) is 0.712, their financial leverage (*LEV*) is 54%, and the number of analyst forecasts (*Numest*) is 5.8. In addition, the mean and median reporting lags for first announcers are 21.45 days and 21 days, respectively.

Panel B of Table 2 presents the Pearson correlation coefficients among the test variables. We find a positive but insignificant correlation between the magnitude of first announcers' unexpected earnings (*Abs_UE_first*) and the abnormal return variance of non-announcing firms in the same industry (*AVAR*). In addition, non-announcing firms' abnormal return variance is positively correlated with the first announcer's negative unexpected earnings and the non-announcing firm's size, number of analyst forecasts, and leverage, and is negatively correlated with the non-announcing firm's loss and book-to-market ratio and with the first announcer's reporting lag, all significant at two-tailed $p < 1\%$.

Table 3 presents the results of the univariate analysis of intra-industry information transfers around mandatory IFRS adoption. Specifically, we compare the abnormal return

variance (*AVAR*) between IFRS adopters (i.e., when announcers and non-announcing firms are from IFRS adoption countries) and the benchmark group across the pre- and post-adoption periods. Panel A shows that while the mean *AVAR* increases significantly for both IFRS firms and the benchmark group across the pre- and post-adoption periods (two-tailed $p < 1\%$), the increase for IFRS adopters is significantly larger (0.710 versus 0.382, two-tailed $p < 1\%$). A cross-sectional comparison indicates that, while the average *AVAR* does not differ significantly between the two groups before 2005, IFRS users have a significantly higher *AVAR* than the benchmark group following the mandatory adoption (two-tailed $p < 1\%$). We find similar results for cross-country information transfers (i.e., when announcers and non-announcing firms are from different IFRS adoption countries) in Panel B. In sum, the findings in Table 3 are consistent with mandatory IFRS adoption improving intra-industry information transfers among IFRS adoption countries.

V. EMPIRICAL RESULTS

Table 4 reports the coefficients, firm-cluster adjusted t-statistics, and two-tailed p-values of the multivariate regression analysis. Specifically, in Model 1 we examine changes in intra-industry information transfers among IFRS adoption countries around 2005. We find a significant and positive coefficient on *POST*, indicating an increase in information transfers for the benchmark group after 2005. The coefficient on *IFRS* suggests an insignificant difference in information transfers between IFRS adopters and the benchmark group prior to the mandatory switch. More importantly, the coefficient on the interaction term, *Post*IFRS*, is significantly positive at two-tailed $p = 0.016$. This result suggests that, relative to the benchmark group, the change in abnormal return variance of non-announcing firms around first-announcer earnings

announcements is significantly greater after 2005 when both announcers and non-announcing firms are from countries that mandate IFRS. In Model 2, we examine *cross-country* information transfers when the announcing firms and non-announcing firms are from *different* IFRS adoption countries. We again find a significantly positive coefficient on the interaction term, $Post*IFRS_cross$ (two-tailed $p=0.035$), indicating stronger cross-border information transfers after mandatory IFRS adoption.

Among the control variables, we find that the coefficients on Abs_UE_first in both models are significantly positive at two-tailed $p<1\%$, consistent with the degree of intra-industry information transfers around earnings announcements being associated with the magnitude of unexpected earnings (Foster 1981; Han and Wild 1990). We also find that non-announcing firms with larger size, higher book-to-market ratios, or higher financial leverage show stronger reactions to first-announcer earnings releases, while non-announcing firms with reported losses exhibit weaker reactions (all significant at two-tailed $p<1\%$). In addition, the first announcer's reporting lag is negatively associated with peer firms' abnormal return variance (significant at two-tailed $p<1\%$), consistent with a longer reporting lag increasing the likelihood that investors of peer firms obtain earnings-related information from other sources (DeFond et al. 2007; Landsman et al. 2009).

In summary, the findings in Table 4 suggest that investors perceive information from announcing firms' earnings releases to be more useful in updating their expectations for non-announcing firms in the same industry, when both follow IFRS after 2005. The results are also consistent with mandatory IFRS adoption, on average, improving *cross-border* intra-industry information transfers from earnings announcements.

VI. ADDITIONAL ANALYSIS

The Effects of Increased Reporting Quality and Enhanced Information Comparability

Proponents of IFRS argue that a uniform set of high quality accounting standards may result in improved financial reporting quality and enhanced information comparability, both of which are expected to lead to stronger intra-industry information transfers associated with earnings announcements. In this section, we examine whether these two effects indeed contribute to the improvement in information transfers found in Table 4.

We measure the extent to which IFRS adoption improves financial reporting quality using pre-adoption earnings quality, i.e., the country-level earnings management score from Leuz et al. (2003).¹⁵ This score, based on data over the 1990 to 1999 period, equals the average rank of two earnings smoothing and two earnings discretion measures. A higher score represents weaker earnings quality before 2005, and therefore a potentially greater increase in reporting quality after the mandatory adoption. We measure the extent to which IFRS adoption enhances information comparability using the number of inconsistencies between local accounting standards and IFRS (Nobes 2001). This measure is based on the GAAP 2001 survey among partners in large accountancy firms from more than 60 countries who benchmark their local country accounting standards against IFRS.¹⁶ A higher value of this measure indicates a larger

¹⁵ Potential improvement in earnings quality from IFRS adoption will be greater for firms in countries with relatively lower earnings quality prior to the adoption. We recognize that other studies use this earnings management measure to proxy for reporting incentives (e.g., Daske et al. 2008). If this measure captures reporting incentives instead of potential improvement in earnings quality, we expect less, not more, positive changes in intra-industry information transfers from earnings announcements of firms in countries with low pre-adoption earnings quality.

¹⁶ Prior studies that use the GAAP 2001 survey to measure the difference between local accounting standards and IFRS include Ding et al. (2007), Bae et al. (2008), and Li (2009).

number of inconsistencies between local GAAP and IFRS, and therefore a potentially greater increase in information comparability after the mandatory adoption.¹⁷

We explore the effects of increased quality and enhanced comparability by examining the variation in intra-industry information transfers around the IFRS mandate across countries with a large versus small increase in quality or comparability. Specifically, we partition the sample based on the whether a country-specific value of the two measures for the announcing firm is above or below the sample country median value. We then perform the regression analysis in Table 4 separately for each partition and compare the coefficients on *Post*IFRS* and *Post*IFRS_cross* across the partitions, using a seemingly unrelated regression model (Greene 2002).

Table 5 presents the descriptive statistics on the pre-adoption quality and comparability measures for the sample of announcing firms. The table shows that the sample countries vary significantly in terms of their potential improvement in reporting quality and information comparability. For example, Greece has the highest earnings management score (28.3) and therefore the lowest pre-adoption earnings quality, while the U.S. has the lowest score (two) and therefore the highest pre-adoption quality. Also, Spain has the largest number of inconsistencies between its local standards and IFRS (22) prior to the adoption, while Saudi Arabia and Thailand have the smallest (four).

Table 6 presents the results of the partitioning analysis. For ease of exposition, we report only the coefficients and the two-tailed p-values of the interaction terms. Partitioned based on the announcing firms' country-level pre-adoption earnings quality, Panel A shows that the coefficients on the interaction terms that capture the relative change in (cross-country)

¹⁷ We also use an alternative measure of increased information comparability, namely, the difference between local standards and IFRS based on Bae et al. (2008). We re-perform our partitioning analysis in Panel B of Table 6 and find that our un-tabulated results are qualitatively similar.

information transfers after 2005 are significantly positive only in the partition with low pre-IFRS earnings quality (two-tailed $p < 5\%$). In addition, the differences in the coefficients are statistically significant across the high and low quality partitions (two-tailed $p < 1\%$). Thus, the result in Panel A provides evidence that the improvement in information transfers among IFRS adopters after the mandatory switch is significantly greater when the announcing firms are from countries with a larger increase in reporting quality.

Panel B presents the partitioning result based on the country-level inconsistencies between local GAAP and IFRS for announcing firms. The panel shows that the coefficients on the interaction terms that capture the relative change in (cross-country) information transfers after 2005 are significantly positive only in the partition with large inconsistencies (two-tailed $p < 1\%$). In addition, the differences in the coefficients are statistically significant across the large and small inconsistency partitions (two-tailed $p < 1\%$). Thus, the result in Panel B suggests that the improvement in information transfers among IFRS adopters after 2005 is significantly greater when the announcing firms are from countries with a larger increase in information comparability. Taken together, the findings in Panels A and B are consistent with both increased financial reporting quality and enhanced information comparability contributing to the improvement in (cross-country) intra-industry information transfers after mandatory IFRS adoption.

Restricting the Sample to IFRS Announcers Only

To further examine the role of information comparability, we conduct additional analysis restricting the announcers in the sample to those from IFRS countries only. If the improvement in intra-industry information transfers is attributable exclusively to the increased reporting

quality of first announcers switching to IFRS, then the change in non-announcing firms' stock price responses to first announcers' earnings releases around mandatory IFRS adoption is expected to be similar across two different groups of non-announcing firms: those from IFRS adoption countries and those from countries that do not follow IFRS. That is because the improvements in reporting quality of announcers will increase the value relevance of announcers' earnings regardless of the countries in which non-announcing firms reside. If, on the other hand, not only increased reporting quality but also information comparability between announcing and non-announcing firms accounts for the improvement in information transfers after 2005, we expect the increase in information transfers to be greater when non-announcing firms are from IFRS adoption countries than when they are not. Therefore, by focusing on IFRS announcers and by separating the non-announcing firms in IFRS adoption countries from those in non-IFRS adoption countries, we are able to differentiate the effects of comparability from those of quality.

We re-perform the regression analysis in Table 4 after restricting the first announcers to those from IFRS adoption countries only. This restricted sample includes 2,458 observations of non-announcing firms, of which 1,253 are from IFRS adoption countries and 1,088 are from IFRS adoption countries different from those of the first announcers.

Table 7 reports the results of this additional analysis. In both models, the significant and positive coefficients on *POST* (two-tailed $p < 5\%$) suggest an improvement in information transfers after 2005 when announcers are from IFRS adoption countries but non-announcers are not. This result is consistent with the effects of increased reporting quality from mandating IFRS. In addition, the significant and positive coefficient on *POST*IFRS* in Model 1 (two-tailed $p < 1\%$) suggests a greater improvement in information transfers when both announcers and non-

announcers are from IFRS adoption countries. More importantly, the significant and positive coefficient on $POST*IFRS_cross$ in Model 2 (two-tailed $p<5\%$) indicates a relatively stronger increase in information transfers when both announcers and non-announcers are from *different* IFRS adoption countries, consistent with the effects of enhanced information comparability. Overall, the results in Table 7 support the evidence in Table 6, suggesting that both quality and comparability effects contribute to the improvement in intra-industry information transfers following mandatory IFRS adoption.

VII. SENSITIVITY TESTS

Using an Alternative Proxy for Intra-industry Information Transfers

Prior studies on information transfers from earnings announcements also examine the abnormal stock returns of peer firms around the announcements (e.g., Han and Wild 1990; Ramnath 2002). In this study, to avoid positive and negative information transfers offsetting each other and resulting in no evidence of information transfers even though they exist (Kim et al. 2008), we rely on a non-directional test based on abnormal stock return variance. Nevertheless, in untabulated sensitivity tests we replace our dependent variable ($AVAR$) with non-announcing firms' three-day cumulative abnormal returns around the first announcer's earnings release (CAR), and regress it on announcers' own abnormal returns (CAR_first) along with the indicator variables $POST$ and $IFRS$ plus a set of control variables. The coefficients on the interaction terms, $CAR_first*POST*IFRS$ and $CAR_first*POST*IFRS_cross$, which capture the relative change in (cross-country) information transfers after 2005, are significantly positive (two-tailed $p<5\%$). We also re-perform the partitioning analysis in Table 6 with this CAR measure and find consistent

results. Thus, our conclusions are robust to using abnormal stock returns as an alternative proxy for information transfers.

Excluding Observations from the U.S.

The country-level distribution of announcing firms in Panels B and C of Table 1 indicates that the U.S. has a much larger number of first announcers as well as non-announcing firms than other countries in the sample. While we include country indicators in the regression analysis to control for country fixed effects, in this section we explore whether our results are driven by the observations from the U.S. Specifically, we exclude U.S. firms from the sample (both announcers and non-announcing firms) and re-perform our analysis in Tables 4, 6, and 7. With a much reduced sample of 3,348 observations, our main results continue to hold, with the exception that the coefficient on *POST*IFRS_cross* in Model 2 of Table 7 becomes insignificant at conventional levels (coefficient=0.218, two-tailed p=0.177). Thus, our conclusions are generally robust to excluding U.S. firms.

Excluding 2005

To ensure that our results are not driven by possible transition effects in the first year of mandatory IFRS adoption, we exclude 2005 and re-perform our analysis. We find that our results are consistent with those reported in Tables 4, 6, and 7. Thus, our conclusions are robust to excluding 2005.

Controlling for First Announcers' Financial Characteristics

To ensure that our results are not driven by a possible change in the sample composition of first announcers before and after 2005, we add control variables for announcers' financial characteristics (i.e., an indicator for loss, size, book-to-market ratio, and leverage) and re-perform our analysis. We find that our results reported in Tables 4, 6, and 7 continue to hold. Thus, our conclusions are robust to controlling for first announcers' financial characteristics.

VIII. CONCLUSION

Externalities from financial reporting and disclosure expand the information set that investors use in valuing firms' shares. Financial disclosure of one firm in an industry may alter investors' beliefs about the profitability of other firms in the same industry, thereby changing their share prices. Intra-industry information transfers therefore represent an additional source of information available to investors, a source of information that is distinct from the firm's own information disclosures. This study examines the impact of mandating IFRS on intra-industry information transfers around earnings announcements.

Using a sample of 31,785 firm-year observations from 33 IFRS adoption countries and 17 countries that do not adopt IFRS during our sample period, we provide evidence that, after mandatory IFRS adoption, intra-industry information transfers become stronger among firms from countries that mandate IFRS in 2005, compared to information transfers across firms from countries that do not adopt IFRS or across firms with either the announcer or the non-announcing firm residing in a non-IFRS adoption country. This result is consistent with investors in adoption countries being more likely to use earnings information of industry peers from IFRS adoption countries for share valuation. We also find evidence of improvement in *cross-country* information transfers when announcing firms and non-announcing firms are from *different* IFRS

adoption countries. Further analysis indicates that both increased financial reporting quality and enhanced information comparability contribute to the improvement in information transfers. Taken together, our findings suggest an externality gain from mandatory IFRS adoption, and that this gain can be attributed to improvement in both the quality and the comparability of financial reports after the mandate.

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TABLE 1
Sample Distribution

Panel A: Firm-year Distribution of Non-announcing Firms across IFRS Adoption Countries

	1999	2000	2001	2002	2003	2004	2005	2006	2007	Total
Australia	11	7	10	6	8	5	2	1	1	51
Austria	18	19	13	14	7	7	8	11	15	112
Belgium	24	30	34	35	32	35	41	53	48	332
Cyprus	0	0	0	0	0	0	0	0	1	1
Czech Rep	10	6	5	4	5	3	4	3	2	42
Denmark	23	26	30	32	33	32	33	33	29	271
Estonia	1	2	3	3	2	0	1	1	1	14
Finland	30	43	44	60	53	60	57	69	73	489
France	121	135	161	165	161	153	156	178	171	1401
Germany	91	152	211	215	185	150	162	186	179	1531
Greece	38	39	44	56	55	54	52	55	44	437
Hong Kong	4	3	3	3	1	0	0	3	5	22
Hungary	13	14	12	12	10	7	8	6	5	87
Iceland	0	0	0	0	0	0	0	2	4	6
Ireland	10	10	9	8	11	10	11	11	13	93
Italy	42	55	69	87	77	89	90	100	110	719
Latvia	0	0	1	0	0	0	0	0	0	1
Lithonia	0	0	1	1	1	0	0	0	0	3
Luxembourg	2	2	3	3	3	3	4	5	6	31
Netherlands	54	56	55	49	49	43	46	47	45	444
Norway	36	27	27	36	36	43	58	71	86	420
Philippines	13	6	5	5	1	0	0	0	0	30
Poland	23	21	18	11	11	11	14	19	23	151
Portugal	10	4	6	12	13	15	15	14	12	101
Romania	3	2	1	0	0	0	0	0	1	7
Slovakia	0	0	2	2	0	0	0	0	0	4
Slovenia	0	4	6	2	1	0	2	2	3	20
South Africa	10	6	6	6	4	3	5	6	7	53
Spain	32	39	38	39	36	37	37	39	41	338
Sweden	63	58	78	76	67	65	60	63	80	610
Switzerland	30	41	41	64	63	70	74	77	80	540
UK	155	178	158	157	142	140	145	154	163	1392
Venezuela	0	3	3	0	0	1	1	0	0	8
Total	867	988	1097	1163	1067	1036	1086	1209	1248	9761

TABLE 1, cont'd

Panel B: Firm-year Distribution of Non-announcing Firms across Non-IFRS Adoption Countries

	1999	2000	2001	2002	2003	2004	2005	2006	2007	Total
Argentina	6	5	6	10	10	5	6	3	4	55
Brazil	23	19	16	15	14	16	20	26	35	184
Canada	49	51	62	68	90	142	180	231	300	1173
Chile	27	22	17	23	13	9	8	11	9	139
China	30	24	27	30	7	56	131	182	278	765
Columbia	2	0	1	1	0	1	0	0	2	7
India	0	0	1	4	1	4	5	10	13	38
Indonesia	28	20	29	29	35	33	39	42	40	295
Japan	108	105	72	71	70	71	56	57	64	674
Korea	47	36	43	155	126	61	78	71	81	698
Malaysia	59	47	47	48	74	70	95	110	121	671
Mexico	18	15	14	17	16	14	10	13	17	134
Pakistan	4	3	1	1	1	2	3	2	1	18
Saudi Arabia	0	0	0	0	0	0	0	0	1	1
Taiwan	93	89	91	106	96	138	151	164	199	1127
Thailand	17	14	16	24	34	68	86	106	114	479
USA	1586	1507	1611	1636	1622	1755	1904	2013	1932	15566
Total	2097	1957	2054	2238	2209	2445	2772	3041	3211	22024

TABLE 1, cont'd

Panel C: Firm-year Distribution of Announcing Firms across Countries

	1999	2000	2001	2002	2003	2004	2005	2006	2007	Total
Argentina	0	1	0	0	0	1	0	0	0	2
Australia	1	0	1	1	0	0	0	0	0	3
Belgium	0	0	1	2	1	2	1	0	0	7
Brazil	0	0	0	0	0	1	1	1	0	3
Canada	4	4	2	5	4	7	6	6	3	41
Chile	0	1	0	1	0	2	0	0	0	4
China	1	0	0	0	0	0	2	4	3	10
Denmark	0	0	0	0	0	0	0	0	1	1
Estonia	0	0	0	0	0	0	0	1	1	2
Finland	0	0	1	0	3	1	1	1	5	12
France	3	0	1	1	0	1	0	0	0	6
Germany	0	0	1	1	1	3	0	1	1	8
Greece	1	0	0	0	0	0	0	1	1	3
India	0	0	0	0	1	0	0	1	2	4
Italy	0	0	0	0	0	0	2	1	0	3
Japan	2	4	8	5	1	4	4	6	7	41
Korea	0	0	0	1	0	0	0	0	0	1
Malaysia	3	3	2	2	0	0	0	2	2	14
Mexico	0	0	0	0	0	1	0	0	0	1
Netherlands	1	1	0	1	1	3	1	3	3	14
Norway	0	1	0	0	0	0	1	2	2	6
Pakistan	0	0	0	0	0	0	0	0	1	1
Poland	0	0	0	0	0	0	0	0	1	1
Saudi Arabia	0	0	0	0	0	0	0	0	1	1
Spain	0	2	1	1	1	0	2	1	0	8
Sweden	5	4	1	2	7	5	7	6	6	43
Switzerland	0	0	0	0	1	1	1	1	0	4
Thailand	1	1	2	4	3	2	0	1	2	16
UK	3	4	5	2	2	0	0	1	0	17
USA	103	109	109	108	109	104	114	111	103	970
Total	128	135	135	137	135	138	143	151	145	1247

TABLE 2
Descriptive Statistics

Panel A: Descriptive Statistics

	N	Mean	P1	P25	Median	P75	P99	Stdev
AVAR	31785	1.011	0.010	0.200	0.517	1.195	7.422	1.420
Abs_UE_first	31785	0.004	0.000	0.000	0.001	0.004	0.064	0.010
Neg_UE	31785	0.336	0.000	0.000	0.000	1.000	1.000	0.472
Loss	31785	0.181	0.000	0.000	0.000	0.000	1.000	0.385
Size	31785	6.019	2.387	4.833	5.935	7.097	10.613	1.735
BM	31785	0.712	0.045	0.332	0.537	0.844	4.209	0.658
LEV	31785	0.544	0.068	0.375	0.554	0.710	0.948	0.230
Numest	31785	5.801	1.000	2.000	4.000	8.000	26.000	5.585
Lag_first	31785	21.448	1.000	17.000	21.000	25.000	52.000	8.776

Panel B: Pearson Correlation (Two-tailed *p*-values in Italics)

	AVAR	Abs_UE_first	Neg_UE	Loss	Size	BM	LEV	Numest
Abs_UE_first	0.006 <i>0.247</i>							
Neg_UE	0.019 <i>0.001</i>	0.186 <i><.0001</i>						
Loss	-0.053 <i><.0001</i>	-0.004 <i>0.445</i>	-0.056 <i><.0001</i>					
Size	0.070 <i><.0001</i>	-0.013 <i>0.024</i>	0.008 <i>0.167</i>	-0.254 <i><.0001</i>				
BM	-0.021 <i>0.000</i>	0.064 <i><.0001</i>	0.027 <i><.0001</i>	0.137 <i><.0001</i>	-0.335 <i><.0001</i>			
LEV	0.036 <i><.0001</i>	-0.010 <i>0.086</i>	0.089 <i><.0001</i>	-0.101 <i><.0001</i>	0.109 <i><.0001</i>	-0.012 <i>0.026</i>		
Numest	0.038 <i><.0001</i>	-0.032 <i><.0001</i>	-0.010 <i>0.068</i>	-0.166 <i><.0001</i>	0.653 <i><.0001</i>	-0.212 <i><.0001</i>	0.053 <i><.0001</i>	
Lag_first	-0.019 <i>0.001</i>	0.164 <i><.0001</i>	0.021 <i>0.000</i>	-0.048 <i><.0001</i>	-0.001 <i>0.863</i>	0.058 <i><.0001</i>	-0.155 <i><.0001</i>	0.000 <i>0.972</i>

TABLE 2, cont'd

Variable definitions:

AVAR: The stock return variance over the three-day window (-1, 1), scaled by the stock return variance over the estimation window (-220, -21) for non-announcing firms. Stock return variance over the three-day window is the average of the squared prediction errors from the market model around the first announcer's earnings announcement date reported in I/B/E/S. Stock return variance over the estimation period is the variance of the residual returns from the market model estimated over day -220 through day -21 relative to the first announcer's earnings announcement date.

Abs_UE_first: The absolute value of the unexpected earnings for the first announcing firm, computed as the difference between annual earnings and the most recent mean consensus earnings forecast, scaled by the stock price at the end of the prior year. All data are from I/B/E/S.

Neg_UE: Dummy variable equal to one if the unexpected earnings of the first announcing firm is negative, and zero otherwise.

Loss: Dummy variable equal to one if the non-announcing firm experiences a loss (i.e., the actual annual earnings as reported in I/B/E/S are less than zero), and zero otherwise.

Size: The natural logarithm of the market value of equity at the end of the prior year for the non-announcing firm.

BM: The book-to-market ratio for the non-announcing firm, calculated as the book value of equity divided by the market value of equity.

LEV: Financial leverage for the non-announcing firm, computed as the ratio of total liabilities to total assets.

Numest: The number of analyst forecasts included in the most recent I/B/E/S consensus forecast of annual earnings prior to the annual earnings announcement date for the non-announcing firm.

Lag_first: The first announcer's reporting lag, computed as the number of days from the fiscal year-end to the annual earnings announcement date reported in I/B/E/S.

TABLE 3
Univariate Analysis of Information Transfers around Mandatory IFRS Adoption

Panel A: Abnormal Return Variance (*AVAR*) of Non-announcing Firms in IFRS Adoption Countries Versus Those of Non-announcing Firms in the Control Group in Pre-adoption and Post-adoption Periods

		Pre-adoption period (1999-2004)	Post-adoption period (2005-2007)	Diff.	
		(A)	(B)	(B)-(A)	
IFRS = 1	(a)	0.777 N=505	1.487 N=748	0.710	***
IFRS = 0	(b)	0.855 N=18713	1.237 N=11819	0.382	***
Diff.	(a)-(b)	-0.078	0.250 ***	0.328	***

Panel B: Abnormal Return Variance (*AVAR*) of Non-announcing Firms in *Different* IFRS Adoption Countries Versus Those of Non-announcing Firms in the Control Group in Pre-adoption and Post-adoption Periods

		Pre-adoption period (1999-2004)	Post-adoption period (2005-2007)	Diff.	
		(A)	(B)	(B)-(A)	
IFRS_cross = 1	(a)	0.788 N=414	1.481 N=674	0.692	***
IFRS_cross = 0	(b)	0.854 N=18804	1.239 N=11893	0.384	***
Diff.	(a)-(b)	-0.066	0.242 ***	0.308	***

***, **, * indicates significance at the 1%, 5%, and 10% level, respectively.

Variable definitions:

IFRS: Dummy variable equal to one if both the first announcing firm and the non-announcing firm are from IFRS adoption countries, and zero otherwise.

IFRS_cross: Dummy variable equal to one if the first announcing firm and the non-announcing firm are from different IFRS adoption countries, and zero otherwise.

TABLE 4
Regression Analysis of Information Transfers around Mandatory IFRS Adoption

	Model 1			Model 2		
	Coeff.	t -stat	Pr > t 	Coeff.	t -stat	Pr > t
Intercept	0.690	3.28	0.001	0.690	3.29	0.001
Post	0.394	22.01	<.0001	0.396	22.17	<.0001
IFRS	-0.010	-0.18	0.860			
Post*IFRS	0.222	2.41	0.016			
IFRS_cross				-0.019	-0.30	0.764
Post*IFRS_cross				0.212	2.11	0.035
Abs_UE_first	3.414	2.85	0.004	3.462	2.90	0.004
Neg_UE	0.029	1.60	0.111	0.030	1.65	0.100
ABS_UE_first*Neg_UE	-2.640	-1.71	0.086	-2.655	-1.73	0.084
Loss	-0.103	-5.32	<.0001	-0.104	-5.35	<.0001
Size	0.042	6.06	<.0001	0.042	6.04	<.0001
BM	0.056	4.34	<.0001	0.056	4.32	<.0001
LEV	0.157	4.57	<.0001	0.157	4.58	<.0001
Numest	0.003	1.35	0.177	0.003	1.35	0.178
Lag_first	-0.010	-10.36	<.0001	-0.010	-10.38	<.0001
Country indicators		Included			Included	
N		31785			31785	
Adj R ²		0.030			0.030	

Note: t-statistics are firm-cluster adjusted.

Variable definitions:

POST: Dummy variable equal to one if the fiscal year is in 2005 or later, and zero otherwise. All other variables are defined in Tables 2 and 3.

TABLE 5
Descriptive Statistics of Country-level Variables

Country	Earnings quality	Inconsistencies between local GAAP and IFRS
Argentina	.	18
Australia	4.8	13
Belgium	19.5	15
Brazil	.	16
Canada	5.3	17
Chile	.	18
China	.	10
Denmark	16	13
Estonia	.	8
Finland	12	19
France	13.5	19
Germany	21.5	20
Greece	28.3	20
India	19.1	14
Italy	24.8	19
Japan	20.5	15
Korea	26.8	7
Malaysia	14.8	9
Mexico	.	9
Netherlands	16.5	5
Norway	5.8	5
Pakistan	17.8	9
Poland	.	18
Saudi Arabia	.	4
Spain	18.6	22
Sweden	6.8	11
Switzerland	22	17
Thailand	18.3	4
UK	7	15
USA	2	9
Mean	15.53	13.27
Median	17.15	14.50
Std dev	7.54	5.39

Variable definitions:

Earnings quality: The earnings management index based on Leuz et al. (2003). Higher values indicate more earnings management and lower earnings quality prior to the mandatory adoption.

Inconsistencies between local GAAP and IFRS: The number of inconsistencies between local accounting standards and IFRS based on the GAAP 2001 Survey by Nobes (2001). Higher values indicate larger differences between local standards and IFRS prior to the mandatory adoption.

TABLE 6
The Role of Information Quality and Comparability

Panel A: Information Transfers around Mandatory IFRS Adoption, Partitioned by Country-level Pre-adoption Earnings Quality of Announcing Firms

	Low quality	High quality	Diff.
Post*IFRS	0.823	0.098	0.726
p-value	<i>0.004</i>	<i>0.336</i>	<i>0.002</i>
Other control variables	included	included	
Adj R ²	0.059	0.028	
N	<i>1419</i>	<i>29973</i>	
Post*IFRS_Cross	0.781	0.090	0.691
p-value	<i>0.016</i>	<i>0.418</i>	<i>0.010</i>
Other control variables	included	included	
Adj R ²	0.054	0.028	
N	<i>1419</i>	<i>29973</i>	

Panel B: Information Transfers around Mandatory IFRS Adoption, Partitioned by Country-level Pre-adoption Differences between Local Accounting Standards of Announcing Firms and IFRS

	Large inconsistency	Small inconsistency	Diff.
Post*IFRS	0.531	0.124	0.407
p-value	<i>0.002</i>	<i>0.374</i>	<i>0.002</i>
Other control variables	included	included	
Adj R ²	0.045	0.029	
N	<i>2406</i>	<i>29379</i>	
Post*IFRS_Cross	0.522	0.115	0.407
p-value	<i>0.003</i>	<i>0.447</i>	<i>0.005</i>
Other control variables	included	included	
Adj R ²	0.044	0.029	
N	<i>2406</i>	<i>29379</i>	

Note: t-statistics are firm-cluster adjusted.

TABLE 6 cont'd

In Panel A, each observation is classified into the low (high) earnings quality partition if the country-specific value of earnings quality for the announcing firm is below (above) the sample country median. In Panel B, each observation is classified into the large (small) inconsistency partition if the country-specific value of inconsistency for the announcing firm is above (below) the sample country median.

Variable definitions:

All variables are defined in Tables 2, 3, and 4.

TABLE 7
Additional Analysis with the Restricted Sample of IFRS Announcers Only

	Model 1			Model 2		
	Coeff.	t -stat	Pr > t 	Coeff.	t -stat	Pr > t
Intercept	0.448	2.24	<i>0.025</i>	1.285	1.44	<i>0.150</i>
Post	0.211	2.30	<i>0.022</i>	0.286	3.22	<i>0.001</i>
IFRS	0.624	0.70	<i>0.482</i>			
Post*IFRS	0.408	3.17	0.002			
IFRS_cross				-0.182	-1.31	<i>0.192</i>
Post*IFRS_cross				0.318	2.36	0.018
Abs_UE_first	-2.414	-0.78	<i>0.438</i>	-2.252	-0.72	<i>0.470</i>
Neg_UE	0.087	0.94	<i>0.345</i>	0.083	0.91	<i>0.366</i>
ABS_UE_first*Neg_UE	-6.109	-1.36	<i>0.174</i>	-6.114	-1.36	<i>0.174</i>
Loss	-0.034	-0.35	<i>0.728</i>	-0.043	-0.44	<i>0.659</i>
Size	0.057	1.88	<i>0.060</i>	0.056	1.84	<i>0.066</i>
BM	0.109	1.89	<i>0.059</i>	0.114	1.97	<i>0.049</i>
LEV	0.291	1.74	<i>0.083</i>	0.298	1.77	<i>0.077</i>
Numest	-0.004	-0.48	<i>0.629</i>	-0.004	-0.41	<i>0.680</i>
Lag_first	-0.008	-2.98	<i>0.003</i>	-0.009	-3.17	<i>0.002</i>
Country indicators		Included			Included	
N		2458			2458	
Adj R ²		0.060			0.059	

Note: t-statistics are firm-cluster adjusted.

Variable definitions:

All variables are defined in Tables 2, 3, and 4.