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# Disentangling mandatory IFRS reporting and changes in enforcement☆

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ABSTRACT

We discuss "Mandatory IFRS Reporting and Changes in Enforcement" by Christensen, Hail, and Leuz (CHL, in this issue). We begin by discussing CHL in the context of prior literature, and subsequently discuss the research design, results, and inferences. CHL seeks to contribute to the literature by disentangling the liquidity benefits of changes in accounting standards from those of changes in enforcement. Taken at face value, we believe that the evidence in CHL suggests that both change in enforcement and adoption of International Financial Reporting Standards (IFRS) confer liquidity benefits. The largest benefits obtain when the change to IFRS reporting is combined with change in enforcement. This is not to say that enforcement conveys capital market benefits but IFRS reporting does not, or that IFRS reporting conveys capital market benefits but enforcement does not; both are necessary to confer capital market benefits.



## 1. Introduction

Widespread adoption of International Financial Reporting Standards (IFRS) is perhaps the largest financial reporting change in history. Consistent with the potential importance of this change to the capital markets, there is an extensive literature studying it. Although several studies point to positive capital market benefits associated with the adoption of IFRS, the sources of the benefits are not established, in large part because of concurrent events. Christensen, Hail, and Leuz (in this issue, hereafter CHL) seeks to determine these sources, in particular whether observed liquidity benefits following mandatory IFRS adoption are attributable to the change in accounting standards, changes in enforcement made concurrent with IFRS adoption, or a combination of the two.

Prior research generally has not sought to disentangle the effect of changes in accounting standards from the effect of concurrent changes in enforcement. Disentangling these effects is inherently difficult because of the very nature of the

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effects. The benefits of enforcement depend on the quality of the standards being enforced, and the benefits of accounting standards depend on the strength of the enforcement of the standards. Moreover, because of the unique regulatory and legal features of each country, it is not clear that inferences from a particular change in enforcement in one country can be generalized to a different change in enforcement in a different country. Nevertheless, we commend CHL for tackling a difficult but important question.

In structuring our discussion, we do not attempt to explain, comment on, or evaluate all of the details, arguments, and findings in CHL; we refer the reader to CHL. Rather, our discussion first takes the results in CHL at face value and discusses how these results relate to prior research, highlighting similarities and differences. The contribution of CHL largely hinges on credibly disentangling the effect on liquidity of changes in accounting standards from the effect of changes in enforcement, which places greater importance on the rigor of the research design than would be the case if CHL were the first study in this literature. Thus, we next discuss CHL's research design. We discuss the design in the context of a difference-in-differences design, and focus our discussion on the inferences that CHL's design permits.

We end by discussing the tabulated results in CHL and the inferences they support. We highlight some of the more interesting results in each table, which in some cases differ from those CHL highlights. Taken at face value, the evidence seems to support the inference that "…*changes in reporting enforcement*…*play a critical role for the observed liquidity benefits after mandatory IFRS adoption*…" However, it is not clear the evidence supports the inference that "… *the change in accounting standards seems to have had little effect on market liquidity*…." Instead, we believe the evidence in CHL supports the following inferences. In some cases, change in enforcement confers liquidity benefits. In some cases, the change in accounting standards to IFRS confers liquidity benefits. The largest benefits obtain when the change to IFRS reporting is combined with change in enforcement. In sum, we believe CHL's evidence suggests that IFRS reporting confers liquidity benefits, but that to fully realize these benefits one also needs enforcement of the standards.

## 2. Relation to prior literature

We discuss CHL's results in the context of prior literature to clarify CHL's contribution and to consider whether CHL's design is able to replicate empirical regularities documented previously. Relevant to the research question CHL addresses, a large literature finds evidence of capital market benefits to IFRS adoption (see CHL Section 2). Many studies in this literature attribute the effects they document to adoption of IFRS.[1] In doing so however, these studies implicitly assume that IFRS application is being enforced. Thus, we believe that this literature should not be interpreted as saying that standards by themselves, i.e., as words written on a piece of paper, matter, but rather that standards that are enforced matter. To the extent that studies examining the capital market effects of IFRS adoption do not explicitly state the assumption that the standards are enforced is perhaps a weakness of this literature.

Two prior studies stand out because of their similarities to CHL in research question, research design, and data. The first is Daske, Hail, Leuz, and Verdi (hereafter, DHLV, 2008), which examines the relation between mandatory IFRS adoption and liquidity, and finds that the relation is strongest in countries where firms have incentives to be transparent and where legal enforcement is strong. The second study is Daske, Hail, Leuz, and Verdi (DHLV, 2013), which also examines the relation between mandatory IFRS adoption and liquidity, and finds that the relation varies according to the firm's reporting incentives, reporting behavior, and reporting environment.[2] CHL also examines the relation between mandatory IFRS adoption and liquidity, and finds benefits are strongest in countries that make concurrent changes in enforcement. Given the similarities in the message of these studies, it seems important to be sure that the literature is not just documenting the same effect repeatedly and giving it a different label, e.g., "strong legal enforcement" as in DHLV (2008), "serious adopter" as in DHLV (2013), and "concurrent change in enforcement" as in CHL. When documenting that the benefits to IFRS adoption vary based on some partitioning variable, it is important to demonstrate that this variation is incremental to previously documented effects.[3]

Regardless of how one interprets the statistical associations between IFRS adoption and liquidity documented in prior research, if CHL seeks to offer new explanations for these results, it is important to document that these relations exist in the study's sample. Failure to replicate significant results in prior research can mean either (i) the results in prior research or their stated significance is (systematically) flawed in some manner, or (ii) the tests in the subsequent study have low power or are biased.

To this end, it is natural to compare the results of DHLV (2008) with those of CHL. DHLV (2008) finds a *significant* positive relation between liquidity and IFRS adoption pooling across European Union (EU) and non-EU countries (see DHLV, 2008,

[1] This is not always the case. Perhaps foreshadowing CHL, Daske et al. (2008) emphasizes that the effects that study documents regarding IFRS adoption, although significant, might not be attributable to the change in standards per se.

[2] DHLV (2013) is primarily about voluntary adopters, but that study's Table 7, Panel B, suggests the inferences also apply to mandatory adopters.

[3] Because country-level and firm-level variables can be correlated, differences from prior research in the unit of measurement of the variables of interest, e.g., country level or firm level, does not necessarily imply distinct explanatory power or statistical effects. It is unclear whether the variation in liquidity benefits of IFRS documented in CHL is incremental to the variation in liquidity benefits of IFRS documented in DHLV (2008), namely variation in legal enforcement and incentives for transparency, or incremental to that documented in DHLV (2013), namely variation relating to reporting incentives, reporting behavior, and reporting environment. For example, CHL finds that all countries with concurrent changes in enforcement already had relatively strong legal systems and, thus, CHL is unable to disentangle the level of legal enforcement from the change in enforcement for these countries.