



Policy Brief

Stanford Institute for Economic Policy Research

The Impact of Mandatory Disclosure Laws on Public Companies: New Evidence from OTC Firms

by Michael Greenstone, Paul Oyer, and Annette Vissing-Jorgensen

The number and scope of recent corporate scandals, as well as the resulting bankruptcies and plummeting stock prices, suggest there is an asymmetric information problem in American securities markets. That is, recent events have highlighted the problems that can occur when managers and other company insiders withhold information from shareholders and, in some cases, even misrepresent their company's position and performance.

Believing government intervention was necessary, Congress hastily passed the Sarbanes-Oxley Act of 2002 to increase disclosure by corporations and improve governance within firms. Many business people have balked at the high costs of complying with the new legislation. For example, a recent issue of *The New Yorker* quotes Stephen Moore, the founder of the Club for Growth, describing the law as “a new cancer.”

For decades, some economists (led by the late Nobel Prize winner George Stigler) and business people have consistently argued that additional legislation in the securities market is not nearly as efficient as private contracts combined with the possibility of litigation. In this framework, if firms do not provide information about their inner workings, then the value that shareholders place on the information must not be high enough to offset the costs to the firms of providing that information. Lawsuits are a costly way to obtain information from a company, however, and an unregulated market could suffer from a free rider problem if no individual shareholder has a sufficient stake in the company to pursue litigation on his or her own.

Using the 1964 Securities Act Amendments to Infer the Impacts of Mandatory Disclosure Laws

In order to understand whether shareholders value government intervention in the securities markets, we recently completed an analysis of the effects of the 1964 Securities Acts Amendments. The 1964 Amendments extended the disclosure requirements that have applied to firms traded on the New York and American Stock Exchanges (NYSE and AMEX) since 1934 to large over-the-counter (OTC)

January 2006

firms. The relatively lax disclosure requirements for OTC firms prior to 1964 meant that shareholders of these companies had fewer avenues available to obtain reliable information and penalize management for failures to maximize shareholder value.

The 1964 Amendments dramatically changed the disclosure requirements for OTC firms that exceed asset and shareholder floors. Specifically, covered OTC firms were required to:

- (1) register with the Securities and Exchange Commission (SEC),
- (2) provide regular updates on their financial position, such as audited balance sheets and income statements,
- (3) issue detailed proxy statements to shareholders, and
- (4) report on insider holdings and trades.

Some OTC firms were already fulfilling requirements (1) and (2) and only had to begin complying with (3) and (4), while others had to begin complying with all four provisions.

Our study assesses whether the 1964 Amendments led to improved stock prices and operating performance among affected OTC firms. Throughout the analysis, we compared affected OTC firms to NYSE and AMEX firms that were unaffected by the legislation. For the stock returns analysis, the comparison NYSE and AMEX firms were chosen so that they match the OTC firms on size and book-market equity, both of which have been shown to have an independent influence on returns.

The Impacts of the 1964 Amendments on Stock Returns and Operating Performance

We analyzed whether complying OTC firms had abnormal excess returns in the weeks that news of their compliance first became public. The SEC publicly announced a firm's compliance 60 days after it received the necessary documentation from a company. Due to the potential for the premature release of this information by the company or others, we focus on a period beginning eight weeks before the official announcement through one week after its announcement.

Figure 1 presents graphical results of this analysis. Specifically, it plots complying firm's abnormal excess returns in each week ranging from 20 weeks before registration through 10 weeks after registration, where the week is denoted by its distance from the week of the SEC's announcement (i.e., week zero). The shaded

area denotes the time window of interest. The abnormal excess returns are measured as the difference between the complying firm's stock returns and the returns of similar NYSE/AMEX firms after a "factor adjustment" (market, size, book-to-market, and momentum) that is standard among financial economists.

The graph reveals that, on average, firms complying with all four of the new requirements had cumulative abnormal excess returns of about 3.5 percent during the critical 10-week window. The firms that were newly complying with only provisions (3) and (4) also had abnormal excess returns of about 3.5 percent. The flat lines before and after the SEC's announcements of firms' compliance highlight the fact that the abnormal excess returns are entirely concentrated in the precise period during which firms' compliance became public information.

Due to the forward looking nature of financial markets, OTC firms may also have had excess returns in the period that the legislation was debated and ultimately passed. To estimate the full effect of the amendments on stock returns, we tested for excess returns from the time that the legislation was first proposed through the final date that firms were required to register with the SEC and thereby indicate their compliance.

Estimates indicate that OTC firms that were newly required to begin complying with all four forms of mandatory disclosure had statistically significant positive abnormal excess returns ranging from 11.5 percent to 22.1 percent, relative to similar NYSE/AMEX firms. The estimates come from regression models that adjust for differential sensitivities of the OTC firms' stock returns to other factors driving returns. They imply that the 1964 Amendments created \$3.2 to \$6.2 billion (2005\$) of value for shareholders of the OTC firms in our sample.

Comparisons of the returns among different groups of OTC firms and other periods further support the conclusion that shareholders valued the mandatory disclosure regulations. During the period from when the legislation was first proposed until the final date for registration for complying firms, the OTC firms required to begin complying with all four requirements outperformed OTC firms required to begin complying with (3) and (4). Further, the firms newly required to comply with (3) and (4) outperformed OTC firms that were too small to be covered by the 1964 Amendments. Additionally, the affected OTC firms did not outperform the NYSE/AMEX firms in the period after the legislation went into force, suggesting that the primary results are

unlikely to be due to unobserved differences between the OTC and NYSE/AMEX firms that are unrelated to the law.

We investigated the source of these excess stock returns among affected OTC firms. The leading hypothesis is that the mandatory disclosure laws bound managers to focus more on maximizing shareholder value. To explore this possibility, we tested whether the affected OTC firms exhibited improved financial performance after the legislation was in force. We find that, between the time the law was first suggested through when it had been in force for two years, the most affected OTC firms had greater income and sales growth than unaffected NYSE/AMEX firms. This result suggests that the market's expectation of improved performance was justified and helps to explain these firms' higher stock returns in the period described above.

Conclusions

These results are consistent with the hypothesis that mandatory disclosure laws can cause managers to focus more narrowly on the maximization of shareholder value. The precise benefits to the American economy are unknown, however, because we cannot determine how much of shareholders' gains were a transfer from insiders of these same companies. If diversion of firm resources by managers entails some waste and underutilization of resources (rather than just transferring the resources from one group to another), then our study implies that

mandatory disclosure can lead to net benefits to the economy.

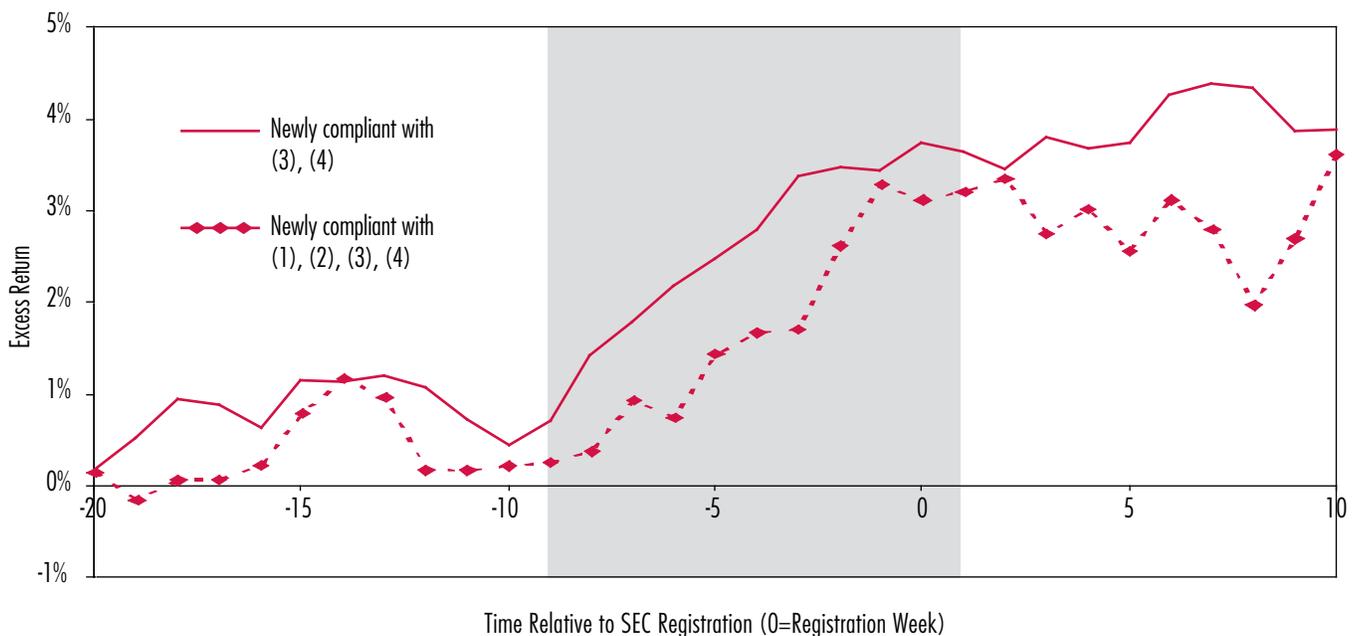
These results have a few policy implications. First, some legal scholars have called for the significant modification or repeal of the mandatory disclosure requirements studied here. Our analysis suggests that such a weakening of Federal oversight is unlikely to be beneficial for U.S. equity markets.

Second, the disclosure requirements studied here are less stringent than those specified in the recent Sarbanes-Oxley Act, so the results are not directly informative about the impacts of that legislation. Thus, our study fails to indicate whether some of the recent corporate scandals would have been averted if Sarbanes-Oxley had been on the books. However, it does suggest that these scandals might have been worse if the 1964 Amendments had not been in place.

Third, the study may be most relevant for the regulators who oversee the numerous developed and developing country equity markets where the disclosures outlined in the 1964 Amendments are not mandatory. Specifically, the results indicate that the introduction of regulations that mandate these disclosures is unlikely to be harmful and, in fact, is likely to be beneficial in these markets.

This article summarizes material in our paper "Mandated Disclosure, Stock Returns, and the 1964 Securities Acts Amendments", which will appear in the May 2006 issue of the *Quarterly Journal of Economics*.

Figure 1. Excess Returns Near SEC Registration



About the Authors

Michael Greenstone is the 3M Associate Professor at the Massachusetts Institute of Technology's Department of Economics, where he teaches classes in Public Finance and Environmental Economics. His research focuses on the consequences of government regulation of markets. Prior to moving to MIT in 2003, Greenstone was on the faculty at the University of Chicago's Department of Economics. He holds a B.A. with High Honors from Swarthmore College and a PhD from Princeton University. He will be visiting the Stanford Department of Economics in the Spring of 2006.



Paul Oyer is Associate Professor of Economics at Stanford University's Graduate School of Business, where he teaches classes in Human Resource Management and Personnel Economics. His research focuses on the economics of employment and agency problems within firms. Prior to moving to Stanford in 2000, Oyer was on the faculty of the Kellogg School of Management at Northwestern University. He holds a B.A. from Middlebury College, an MBA from Yale University, and an MA and PhD (both in economics) from Princeton University.



Annette Vissing-Jorgensen is Assistant Professor of Finance at Northwestern University's Kellogg School of Management, where she teaches introductory MBA finance. Her research focuses on asset pricing and portfolio choice as well as on corporate governance. Before joining Kellogg in 2002, Vissing-Jorgensen was on the faculty of the Department of Economics at the University of Chicago. She holds a BA from University of Aarhus, an MSc from University of Warwick, and a PhD from the Massachusetts Institute of Technology.



The Stanford Institute for Economic Policy Research (SIEPR) conducts research on important economic policy issues facing the United States and other countries. SIEPR's goal is to inform policy makers and to influence their decisions with long-term policy solutions.

With this goal in mind SIEPR policy briefs are meant to inform and summarize important research by SIEPR faculty. Selecting a different economic topic each month, SIEPR will bring you up-to-date information and analysis on the issues involved.

SIEPR Policy Briefs reflect the views of the author. SIEPR is a non-partisan institute and does not take a stand on any issue.

For additional copies, please see SIEPR website at: <http://SIEPR.stanford.edu>

SIEPR Policy Briefs

are underwritten by a generous grant from the Taube Family Foundation.



SIEPR *Policy Brief*

A publication of the
Stanford Institute for Economic Policy Research
Stanford University
579 Serra Mall at Galvez Street
Stanford, CA 94305
MC 6015

NON-PROFIT
ORG.
U.S. POSTAGE
PAID
PALO ALTO, CA
PERMIT NO. 28