

Is Silence Golden?
An Empirical Analysis of Firms that Stop Giving Quarterly Earnings Guidance

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Abstract:

We investigate a sample of firms who stopped providing earnings guidance between October 2000 and January 2006 – including both firms that publicly announce this decision (“announcers”) and those that do not (“quiet stoppers”). We find that stoppers have poorer prior performance, more uncertain operating environments, and fewer informed investors, consistent with disclosure theory (Dye 1985). Announcers commit to a policy of nondisclosure if they are unlikely to either report good news in the future or have lower incentives to do so due to the presence of long-term investors. The market appears to rationally interpret the stop guidance announcement as the significantly negative three-day return around the announcement is associated with analysts’ downward revisions in expectations of future earnings. Finally, while we find no change in overall stock return volatility or analyst following, we observe increases in analyst forecast dispersion and decreases in forecast accuracy subsequent to firms’ decision to stop guiding.

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1. Introduction

On December 13, 2002, the Coca Cola Company announced that it would stop providing quarterly earnings-per-share guidance to stock analysts, stating that the company hopes the move would focus investor attention on long-run performance. Shortly thereafter, several other prominent firms such as AT&T and McDonalds made similar announcements renouncing quarterly earnings guidance. In addition, recent surveys by the National Investors Relations Institute (NIRI) suggest a trend toward firms discontinuing guidance or moving toward providing annual guidance only.¹ These changes in guidance practices coincide with calls from prominent investors such as Warren Buffett (1996), analysts such as Candace Browning (2006), head of global research at Merrill Lynch, the CFA Institute (Krehmeyer and Orsagh 2006) and academics (Fuller and Jensen 2002, Jensen, Murphy and Wruck 2004) to encourage managers to give up quarterly earnings guidance and hence avoid myopic managerial behavior caused by attempts to meet the guided earnings number. However, critics allege that poor economic conditions and the desire to de-emphasize weak performance drive these recent changes to guidance policies (e.g., Harper 2003). Consistent with this view, disclosure theories would suggest that the decision to stop guiding is due to the presence of unfavorable information (Dye, 1985; Verrecchia 1983).

In this paper, we investigate 1) the factors that prompt firms to give up quarterly guidance, 2) the factors that prompt firms to *publicly announce* their intentions to give up guidance, and 3) the consequences of giving up guidance.

¹ Recent NIRI surveys suggest a continuing downward trend in the use of earnings guidance – from 77% in December 2003, to 71% in March 2005, to 66% in March 2006, to 51% in June 2007. In addition, the percentage of firms giving quarterly guidance has declined from 75% in 2003, to 61% in 2005, to 52% in 2006, and to 27% in 2007, while the percent giving annual guidance only has increased – from 16% in 2003, to 28% in 2005, to 43% in 2006, to 58% in 2007.

To address these research questions, we formulate two samples of firms who stop providing earnings guidance. Both samples are based on a period after the passage of Regulation FD (Reg FD) to ensure that these firms have truly stopped providing guidance (as opposed to replacing public guidance with private guidance). Our first sample, the “announcer” sample, is based on a search of key words in press releases and conference call transcripts from 10/1/2000 (the beginning of the FD regime) to 1/31/2006. From this search, we are able to identify 96 firms that publicly announce their decision to stop providing quarterly guidance, 24 of which switched from providing quarterly earnings guidance to providing annual guidance only.

The second sample, our “quiet” sample, is based on data from First Call’s Company Issued Guidance (CIG) database, which captures firms’ publicly issued guidance (both qualitative and quantitative) since 1993. Specifically, we identify firms with a history of providing earnings guidance as reported on the CIG database who subsequently stop appearing on the database. We search subsequent press releases and conference call transcripts to ensure these firms have indeed stopped providing guidance. This process yields a sample of 158 quiet stoppers. The combination of these two sub-samples represents our sample of firms who stop providing quarterly earnings guidance (“stoppers”). We compare these firms to a control sample of firms who continue to provide guidance based on data from the CIG database.

We find that firms that stop guidance have 1) poor prior performance (based on trailing 12-month stock return performance and the proportion of prior quarters in which they missed analysts’ expectations), 2) more uncertain operating environments (based on either standard deviation of returns or analyst forecast dispersion), and 3) less informed investors (based on analyst following and institutional holdings). These results are consistent with disclosure theory, which predicts that managers will withhold bad news if there is uncertainty about whether the

manager has received information (Dye 1985). The results are also consistent with critics who contend that firms have stopped guidance because they are poor performers despite some companies' claims that the reason for the stoppage is to focus investor attention on the long-term.

We also examine the determinants of the decision to *publicly announce* the decision to stop providing guidance. By publicly announcing the stoppage of guidance, a firm is providing a certain level of commitment to a policy of non-disclosure, which is beneficial to the company in that future non-disclosure events are less likely to be interpreted as bad news by the market (rather, non-disclosure will be attributed to the company's new non-disclosure policy).

Assuming such a commitment is credible (e.g., because of reputational costs to the manager from breaking this commitment), we predict that managers will be more willing to make this commitment if 1) it is unlikely that they will have good news to disclose in the future and/or 2) in the event of good news, there is a lower incentive to disclose this information. Thus, we hypothesize that firms who announce the decision to stop guidance 1) anticipate poorer future performance than firms who do not announce and they are less uncertain about this prospect; and 2) have more long-term investors, assuming that it is less costly for firms with long-term investors to withhold earnings guidance when the news is good. Our evidence supports our predictions. Firms with low uncertainty and poorer past performance (our proxy for anticipated future performance) are more likely to announce their decision to stop guidance as are firms with a higher percentage of long-term investors.

We next investigate the market reaction to the stoppage announcement for our announcer sample. We document a significant negative market reaction to the firm's announcement and it appears this negative reaction is primarily related to revisions in expectations of future cash flows – i.e., firms with more negative revisions in analysts' expectations of one-quarter ahead

earnings suffer a greater market decline when they announce the decision to stop providing guidance. While we also find some evidence that firms giving up guidance experience an increase in systematic risk, we are unable to document an association between this estimated change in systematic risk and the three-day market reaction to the stoppage announcement.

Contrary to the beliefs of many proponents of earnings guidance, we do not find a significant increase in overall volatility, nor do we find a decrease in analyst following after the firm stops providing guidance. We do, however, document a greater increase in analyst forecast dispersion and a greater decrease in forecast accuracy following the decision to stop guiding for our stoppers relative to our control firms. Thus, it appears analysts are unable to generate the same level of accuracy without explicit earnings guidance.

Finally, while we document a significant negative market reaction to a firm's announcement that they will no longer be providing guidance, these firms do not appear worse off from having made this announcement, relative to firms who quietly stop. The market reaction to the stoppage announcement for our announcer group is significantly more negative than the market reaction at the first earnings announcement without the issuance of guidance for our quiet firms. However, if we control for the underlying determinants of the decision to announce using the inverse Mills ratio (Heckman 1979), the difference in returns is insignificant. Thus, the negative market reactions on announcing the stoppage of guidance is attributable to the underlying determinants of the decision to announce (poor trailing performance, less uncertainty, and greater long-term institutional ownership) and not the announcement *per se*. Put differently, announcer firms with the same underlying economic determinants as quiet firms would not have had a lower penalty from staying quiet.

Our paper contributes to the literature on voluntary disclosures along several dimensions. First, our study provides empirical support for disclosure theories that predict managers are less likely to disclose when information is unfavorable (Dye 1985), uncertainty is high (Jung and Kwon 1988), and the likelihood of informed owners in the company is low (Dye 1998). In addition, by identifying a sample of firms who publicly announce their decision to stop providing guidance, we are also able to investigate the conditions under which managers are willing to announce (and thereby commit to) a policy of non-disclosure. While there are no existing theoretical models that directly address the choice to commit to non-disclosure, our results are generally consistent with existing disclosure theories. That is, managers commit when they do not expect to have favorable news to disclose in the future and the market rationally interprets the announcement to stop guiding as bad news. Being able to assess the market response to a change in disclosure policy is yet another advantage of our sample – the fact that our announcer sample has a specific date on which the market learns of its disclosure policy change makes such an assessment possible.

A contemporaneous working paper by Houston et al. (2006) examines the determinants of firms who appear to stop providing guidance using a sample of firms from the CIG database (similar to our quiet sample). Our paper differs from theirs in that we also examine firms who publicly announce the decision to stop providing guidance: we investigate the determinants of the decision to make such an announcement and the market reaction to the announcement.

Second, our study provides further insight into the motivation behind the recent upsurge of firms discontinuing earnings guidance. Although many of these firms argue that guidance

forces a short-term orientation and impedes long-term value creation,² our results suggest that poor prior performance, high uncertainty, and fewer informed investors are the primary drivers behind the decision to give up guidance. Moreover, if guidance were truly a value-decreasing proposition due to the short-term focus imposed on managers, giving up guidance ought to be associated with positive announcement period returns. However, we find an economically and statistically negative stock market reaction around the guidance stoppage announcement.

Finally, our study should also be of interest to CFOs and investor relations' professionals. Recent surveys by the National Investor Relations Institute (NIRI) indicate that a significant number of firms have considered discontinuing earnings guidance – 28% in a survey conducted in February 2003 and 19% in a survey conducted in December 2003 (NIRI 2003). Moreover, 30% of survey respondents believe that if they stopped providing guidance, analyst coverage would fall. Our study provides evidence on the consequences associated with the decision to give up guidance. Contrary to many managers' concerns, we do not find evidence of either a decrease in analyst following or an increase in volatility around earnings announcements. However, we do find increases in analyst forecast dispersion and decreases in forecast accuracy.

The remainder of the paper is organized as follows. In the next section, we discuss our sample and provide descriptive data. Section three presents our predictions and analysis of the determinants of stopping guidance. In section four we examine the determinants of the decision to announce the stoppage of guidance. Section five presents our analysis of the consequences associated with discontinuing guidance, including the market reaction to the stoppage announcement. In section six we examine whether firms who announce suffer greater penalties than those who remain quiet. We conclude the paper in section seven.

² Cheng, Subramanyam and Zhang (2005) examine whether investment policies of regular guiders differ from those of sporadic guiders and find evidence suggesting that regular guiders under-invest in R&D (which they conclude is evidence that guidance forces a short-term orientation).

2. Sample Selection and Descriptive Data

Prior to the passage of Reg FD, firms could provide earnings guidance to the market either indirectly through analysts or directly via publicly announced management forecasts.³ A popular argument made in favor of earnings guidance is to keep expectations at a level that the firm can either meet or exceed and, thereby, avoid any market penalties associated with missing analysts' expectations (Bartov et al., 2002; Skinner and Sloan 2002). Until recently, the practice of providing earnings guidance was relatively widespread – surveys by NIRI have consistently reported that around 79% of respondents provide some form of earnings guidance (Thompson 2003a and 2003b). However, in their most recent survey, the proportion of guiders has declined to 51% (Kelleher 2007). Thus, the practice of providing guidance, while still relatively widespread, appears to be declining.

Because we focus on the period after Reg FD, we define earnings guidance as the practice of providing regular, quantitative forecasts of upcoming earnings either *via press releases or company-sponsored conference calls*. Prior to Reg FD, managers often provided guidance to analysts in private, one-on-one discussions that were empirically unobservable. As a result, it is difficult to identify firms that stopped providing guidance in the pre-Reg FD period.

We formulate two samples of firms that stop providing regular, public, quarterly earnings guidance. First, we identify a sample of firms that publicly announce (the “announcer” sample) their decision to stop providing quarterly earnings guidance in either a press release or a company-sponsored conference call. We conduct a detailed search of press releases and conference call transcripts between October 1, 2000 and January 31, 2006. We search company press releases on PR Newswire and BusinessWire (via Lexis/Nexis) and conference call transcripts on the Voxant

³ One of the most common ways managers provided guidance indirectly through analysts was by “reviewing” analysts' earnings models (Hutton 2005).

database (via Factiva).⁴ Through this process, we identify 72 firms that announce their decision to stop providing quarterly guidance altogether and 24 firms that switch from providing quarterly earnings guidance to providing annual guidance only. For better statistical power, we combine these two groups of firms as both sets of firms have stopped providing regular *quarterly* guidance.⁵

Our second sample of firms is comprised of firms that stop providing guidance but do not publicly announce their intention to do so (the “quiet” sample). We first identify firms with at least three quarters of guidance on the CIG database between 2002:Q1 and 2003:Q4, and with no observations in the next four quarters on CIG. Excluding 21 firms that are in our ‘announcer’ sample, this process yields 239 firms who appear to have stopped providing quarterly guidance. We then examine press releases and conference call transcripts for these firms in the four quarters following their apparent stoppage on CIG to ensure that these firms have in fact stopped providing guidance. We find 81 firms that are misclassified by CIG as not having provided guidance, leaving 158 firms.⁶ Because the quiet sample does not publicly announce their decision to stop guidance, we use the date of the first earnings announcement following their last issuance of guidance as a pseudo-announcement date for the purposes of our analyses.

The process used to construct our second sample is similar to that used in a contemporaneous working paper by Houston, et al. (2006). Our paper differs from theirs in that

⁴ Our main search string was “(earnings or income or loss) and ((guidance or expectation or forecast or outlook) w/5 (no longer or stop or discontinue or will not provide or will not give)).” We then read the press release or conference call transcript to determine whether the statement did indeed refer to a change in the company’s policy regarding the dissemination of earnings guidance. Often the search string identified firms that indicate that previously issued guidance “no longer applies” or that the company has temporarily stopped guidance until “visibility improves.” We do not include the latter group in the sample as we are more interested in firms who have indicated a commitment to a new disclosure policy.

⁵ We find no differences in medians between the two groups on the variables examined in section 3.2. We also examine the 3-day market reaction surrounding the announcement of the policy change and do not find significant differences between the two groups in terms of either raw returns or cumulative abnormal returns. Thus, the two groups do not appear significantly different from another and combining the two groups seems reasonable.

⁶ Without this step, our sample of quiet stoppers would be a combination of both firms who quietly stopped giving guidance and firms who continued guidance but who CIG, for some reason, has stopped covering. This fact could lead to potential bias as it is likely the decision to stop covering firms is related to factors such as past performance and analyst following, two factors which we examine as determinants of the decision to stop guiding.

we also examine firms who publicly announce the decision to stop providing guidance and examine the determinants of the decision to make such an announcement. Further, we examine the market reaction to the stoppage announcement.

We also identify a control group of firms who continue to provide quarterly earnings guidance. We identify all firms available on the CIG database that provided a quarterly forecast within +/- 90 days of each stopper firm's announcement date and who also issued at least one quarterly forecast in the previous and subsequent quarters (quarters q-1 and q+1).⁷ This process results in an initial sample of 958 control firms with available data for our determinant tests.

Table 1 details the sample attrition due to data requirements for our subsequent tests. We conduct tests of: 1) the determinants of the decision to stop providing earnings guidance (section 3); 2) the determinants of announcing the decision to stop providing earnings guidance (section 4); 3) the market reaction to the announcement of the stop guidance decision (section 5), and; 4) other consequences resulting from the decision to stop providing earnings guidance (section 5). The usable samples for each of these three tests vary. In some of our market reaction tests, we control for revisions in analysts' forecasts of future earnings, which further reduces our sample size. In our consequences tests, we examine changes in various factors (e.g., analyst following, volatility, trading volume) before and after the decision to stop providing earnings guidance. Thus, we lose firms who announce the renunciation of quarterly guidance in late 2005 and early 2006 (due to lack of post-decision data at the time of drafting this paper).

⁷ Ideally, our comparison group should be regular guidance givers who continue to give guidance. Requiring our control sample to have forecasts in quarters q-1 and q+1 provides some assurance that these firms have a pattern of giving guidance in the past and continue to give guidance in the future. The mean number of quarterly forecasts made by these firms through quarter q-1 is 17.58 and over 70% of the firms have made more than 10 quarterly forecasts.

Overall, the number of firms that stopped providing quarterly earnings guidance is relatively small.⁸ The small number is, perhaps, indicative of the difficulty associated with changing accepted business practice. Anecdotal evidence suggests that companies can indeed face powerful opposition to stopping guidance, as analysts' compensation and CEOs reputation in recent years all depend to a great extent on the rapid delivery of information from the firms.⁹

Of our announcer firms, approximately 29% do not provide any explanations for their decision to stop giving quarterly guidance. Of those who do, "desire to focus on the long-term" and "difficulty in predicting/uncertainty" are the two most common reasons cited (26% and 25%, respectively), followed by "consistency with practice" (13%).¹⁰

In the next section, we discuss our hypotheses and tests related to the determinants of stopping earnings guidance.

3. Determinants of the Decision to Stop Providing Guidance

3.1 Disclosure Theory and Empirical Predictions

A large body of analytical research has examined the issue of voluntary disclosure using theoretical models. Most of this literature evolved from the basic adverse selection argument – if the manager does not disclose information, the market will infer that the manager has bad news, which eventually leads to an "unraveling" and results in a full disclosure equilibrium (Grossman

⁸ We attempted to benchmark our small sample size with prior NIRI survey results. In an April 2003 survey, 22% of the 609 respondents indicated that they do not provide guidance and, of these, 22% stopped within the last 12 months. This suggests approximately 29 respondent firms stopped giving guidance after April 2002 ($609 \times 22\% \times 22\%$). The response rate on the survey was 20%. Thus, if the rates of stoppage are representative of the overall rates in the NIRI membership, the number of firms stopping guidance from the NIRI membership as a whole would be approximately 145 ($29 \div 20\%$). While many firms are not members of NIRI, it is likely that the rate of stoppage is higher among NIRI members because firms with more active investor relations groups are more likely to have a policy of giving guidance and a firm cannot *stop* giving guidance if it did not initially have a policy of giving guidance. Thus, our initial sample of 254 stopper firms seems reasonable.

⁹ See "The wrong focus? How the race to meet targets can throw corporate America off course," Financial Times (7/24/2006).

¹⁰ We do not devote much space in the paper to an analysis of these self-reported reasons because it is unclear why the market would not disregard such assertions as cheap talk.

1981; Milgrom 1981; Grossman and Hart 1980). However, given that we do not observe full disclosure in the real world, several amendments to these early models have been proposed. The two best-known explanations are proprietary costs (Verrecchia 1983) and uncertainty about the arrival of information (Dye 1985).¹¹ In both these approaches, a partial disclosure equilibrium exists where managers disclose good news and withhold bad news that is below a certain threshold. This result occurs because firms with bad news can pool with firms who have good news but do not disclose such good news either because they have high proprietary costs or because they did not receive information.

In general, the proprietary cost explanation is less compelling in the context of quarterly earnings guidance because the release of an earnings forecast, a few months prior to the actual earnings announcement, would not likely be considered proprietary information. However, the information uncertainty argument is plausible in that the market might be unsure of whether a manager has reliable information about upcoming earnings. In the following sub-sections, we discuss the implication of this theory (as well as extensions of this basic theory) for cross-sectional determinants of the decision to stop guidance.

3.1.1 Firm performance

Under both the Verrecchia (1983) proprietary cost model as well as the Dye (1985) uncertainty of information model, the partial disclosure equilibrium entails disclosing good news above some “threshold” and withholding bad news below the threshold. This result is the general theory behind prior studies that predict and find a positive relation between firm performance and disclosure (Lang and Lundholm, 1993; Miller, 2002). Thus, both disclosure

¹¹ Other reasons for nondisclosure have also been proposed, such as agency issues (Dye 1985) and different managerial objective function (Nagar 1999). See Verrecchia (2001) for further review of the literature.

theory and prior findings would suggest that poorly performing firms are more likely to stop providing quarterly earnings guidance.¹²

Such a prediction would also be consistent with the arguments of some critics of the recent trend in stopping guidance. While many firms cite a desire to focus on long-term performance as the reason behind their decision to stop providing quarterly guidance, some critics have suggested that the true motivation behind these firms' decision to stop providing quarterly guidance is poor performance (Harper 2003). If the primary reason behind giving up guidance is the desire to focus on long-term performance, we would not expect a relation between past performance and the decision to stop guidance. In contrast, if the skeptics are correct in their assessment of the reason behind the decision, firms with poorer prior performance are more likely to give up guidance.

We proxy for poor performance in two ways: 1) stock price performance in the recent past, measured as market-adjusted buy-and-hold returns for the 12 months ending in month -1 (BHRET), where month 0 is the event month; and 2) the percent of quarters in the eight quarters proceeding the event quarter in which the firm meets or exceeds analyst consensus forecasts (PMBAF). See the notes to Table 2 for exact variable definitions.

3.1.2 Information uncertainty

In Dye (1985), firms with bad news can avoid disclosure by pooling with firms with better news who cannot disclose because they did not receive information. Jung and Kwon (1988) extend the Dye model and demonstrate that as the probability that the manager received

¹² Sletten (2007) finds evidence that firms who experience an exogenous decline in their stock price are more likely to increase disclosure. The underlying theory is that when prices fall, the unfavorable news managers were previously withholding (because it was below the disclosure "threshold") is no longer unfavorable (because of the drop in price) and the manager discloses it. This prediction is consistent with theory as long as the firm's price drop is caused by an event that changes the market's assessment of firm value but that does not change the manager's private information about the firm's true value. Sletten (2007) uses the restatement of an industry peer firm's earnings as such a setting. Note that the setting in Sletten (2007) is inherently different from the one in this paper because poor prior performance for our stopper firms is not likely due to an exogenous price shock.

information increases, the disclosure threshold falls. As a result, more bad news will be disclosed if the market is less uncertain about the manager's information endowment. Put differently, the more uncertain the market is about whether the manager received information, the greater the manager's ability to withhold disclosures.

One possible implication of this theory is that in more uncertain environments, managers will disclose less. In more volatile business environments, earnings are harder for the managers to predict. Thus, as predicted by the disclosure models, managers can avoid disclosing bad news by claiming that they do not have a good prediction of future earnings (i.e., that they did not receive an "information signal"). In fact, 26.4% of the firms in our announcer sample give "lack of predictability/uncertainty" as the reason for their decision to stop providing earnings guidance.¹³

We use two measures to proxy for uncertainty: 1) the standard deviation of daily raw returns (STDRET) during the 252 days prior to the event date; and 2) the dispersion in analysts' forecasts in the quarter prior (DISP) measured as the standard deviation of the last analyst forecasts prior to quarter q-1 earnings announcement, scaled by lagged stock price.¹⁴

3.1.3 Informed investors

Dye (1998) extends the Dye (1985) model to incorporate the possibility that not all investors are informed about whether the manager has received value-relevant information. The main thrust of Dye (1998) is that the disclosure threshold is declining in the probability that investors are informed. This result is intuitive because as more investors become informed about

¹³ For example, Bill Slakey, CFO of Handspring, Inc. stated in a company conference call on 1/16//2003: "Given the uncertainties in our business, the dynamics of the transition we are in, and the challenges of the economy generally, we found it difficult to accurately predict some of these measures. Consequently, we have decided to discontinue the practice of providing ranges of numeric guidance."

¹⁴ Note that one of the variables used to measure performance – the percentage of quarters in which the firm met or exceeded analysts' expectations in the past (PMBAF) – also indirectly measures managers' ability to predict earnings as managers generally provide guidance to avoid missing analysts' expectations (Matsumoto 2002). Thus, the more frequently a manager has missed expectations in the past (the lower PMBAF), the more likely the managers are not able to accurately predict earnings.

the managers' information endowment, the manager is less able to pass off non-disclosure as the result of no information, which would result in the market interpreting the non-disclosure unfavorably. As a result, the disclosure threshold falls and more information is disclosed.

One empirical implication of this model is that firms with a greater likelihood of having informed investors in their shareholder base will be less likely to stop providing earnings guidance. For example, firms with greater analyst following are more likely to have informed investors and are therefore less likely to stop providing earnings guidance. In addition, institutional investors are often considered more "sophisticated" investors (Jiambalvo et al. 2002) and, therefore, firms with greater institutional ownership will also be less likely to give up earnings guidance. Moreover, since the primary beneficiaries of a firm's earnings guidance are financial analysts and institutional investors, managers likely face pressure from both buy-side and sell-side analysts to provide guidance. In a recent NIRI survey, 98 percent of respondents believe analysts want earnings guidance and 27 percent of respondents believed analyst coverage would drop if the firm stopped providing guidance. Thus, firms with more analyst coverage and greater institutional investor ownership likely face greater pressure to provide guidance and are less likely to discontinue the practice.

We measure analyst following (AF) as the number of analysts covering the firm at the beginning of the event quarter as per IBES. If a firm is not listed on IBES, we code AF as zero. The percent of institutional ownership (PINST) is measured prior to the announcement date as reported on Compact Disclosure.

3.1.4 Litigation risk

Litigation fears can reduce incentives to provide disclosure, particularly disclosures of forward-looking information (such as earnings guidance). A manager may fear that the legal

system would penalize forecasts (made in good faith) that are not met because it cannot effectively distinguish between unexpected forecast errors due to chance from those due to deliberate management bias (Healy and Palepu 2001). In addition, while managers are not required to provide forecasts under rule 10b-5 of the Securities Act of 1934, they are required to correct or update prior announcements that are no longer appropriate (Trueman 1997). Thus, firms that provide guidance would be required to update this information should events change such that the guidance is no longer appropriate. In highly uncertain environments, this requirement could result in frequent updating, which could be difficult and time-consuming.

In an interview we conducted with a financial executive of a firm that gave up earnings guidance, the executive stated “class action lawyers find it easier to sue the firm if it is unable to meet the EPS numbers promised in earnings guidance.” Thus, practitioners are potentially concerned about being sued for the accuracy of its forecasts under rule 10(b)5. Furthermore, companies are beginning to require audit committees to review any earnings guidance they give. That practice raises the possibility that audit committees could also be sued for providing earnings guidance, thus adding further to the litigation risk (Morgan, 2003). Hence, we expect firms with greater litigation risk to be more likely to give up earnings guidance.

Our proxy for litigation risk is based on the Rogers and Stocken (2005) litigation probability model. We use the reported coefficients from their model to compute predicted values for the observations in our sample (LIT).

3.2 Empirical design and results

3.2.1 Descriptive statistics

Table 2, Panel A presents descriptive statistics for the variables used in our analyses, partitioned into our announcer sample, quiet sample, and control sample. We include four

control variables in our analysis: 1) LNMV, the natural log of the market value of equity as of the fiscal quarter end preceding the event date; 2) MB, the natural log of the market-to-book ratio at the beginning of the quarter; 3) LNCT, the natural log of $(1+CT)$, where CT is the number of management quarterly EPS forecasts made through quarter t-1 (as reported on the CIG database) and; 4) REGFD, an indicator variable equal to 1 if the firm's first appearance on the CIG database occurs after the passage of Reg FD. Prior research has shown both size and growth to be related to disclosure practices. In addition, firms with a longer prior history of providing earnings guidance likely find it more difficult to abandon the practice. Finally, firms who only begin to provide public earnings guidance as a result of the regulation change instituted by Reg FD may be more likely to subsequently stop providing such guidance.

The second-to-last column reports differences in medians between our “stoppers” (announcer + quiet sample) relative to the control group. The last column reports differences between our announcer and quiet samples (a comparison we explore more fully in section four). We report these comparisons here but reserve our discussion of statistical differences between the groups to later when reporting the results based on our multivariate logistic regressions. The mean returns for both the announcer and quiet samples over the prior year are negative (-9.3% and -4.6%, respectively), while the control group reports positive average returns (17.1%). The median firm in all three groups met or exceeded analyst expectations in 7 out of the last 8 quarters (87.5%). All groups are followed by at least one analyst (medians of 5, 3, and 7 for the announcer, quiet and control groups, respectively) and have fairly high institutional ownership (medians of 64%, 61%, and 72% for the announcer, quiet and control groups, respectively).

Panel B of Table 2 presents a correlation matrix of the variables used in our determinants test. Several of our test variables are highly correlated with our control variables, particularly

firm size (LNMV). LNMV is highly correlated with STD_{ret} (Spearman correlation coefficient $\rho=-0.52$) and analyst following ($\rho=0.68$). Thus, a multivariate analysis that considers all factors that we hypothesize to be associated with the likelihood of guidance stoppage is necessary to test our predictions. We discuss these tests next.

3.2.2 Logistic regression

We test our predictions by estimating the coefficients in the following logistic regression:

$$STOP = \beta_0 + \beta_1 BHRET + \beta_2 PMBAF + \beta_3 STD_{ret} + \beta_4 DISP + \beta_5 AF + \beta_6 PINST + \beta_7 LIT + \beta_8 LNMV + \beta_9 MB + \beta_{10} LNCT + \beta_{11} REGFD + \varepsilon \quad (1)$$

STOP is a dummy variable equal to one for stopping firms and zero for control firms.

We estimate our regression in both raw values as well as ranked values for the independent variables, as the univariate comparisons suggest the presence of extreme values for some variables. We also run the analysis both including and excluding DISP, as the inclusion of this variable decreases the size of our stopper sample from 189 to 131 (a 30% decrease).

Table 3 presents the results from estimating equation (1). Consistent with our first prediction, firm performance appears to be a significant determinant of the decision to stop guidance. Firms who stop guiding have lower lagged one-year buy-and-hold returns (all p's < 0.01). These firms also have worse prior earnings performance – stopper firms exhibit a lower percent of prior quarters in which they met or exceeded analysts' expectations (all p's < 0.01).

We also find some evidence that firms who stop guidance have more uncertain operating environments, consistent with our second prediction. Stopper firms have higher analyst forecast dispersion than control firms (p's < 0.02). They also have higher standard deviation of returns, if DISP is not included in the model (p's < 0.05). These results are consistent with disclosure theory, which predicts that firms are able to withhold information more when the market is less certain of the manager's information endowment.

Finally, we find evidence consistent with our third prediction – firms who stop guidance have a lower likelihood of having informed investors. The coefficient on analyst following is significantly negative in all specifications (p 's < 0.03). The coefficient on institutional ownership is significant in the ranked regression when DISP is included ($p= 0.05$) but is only marginally significant otherwise. Firms with high analyst following and greater institutional ownership are more likely to have informed investors, whose presence makes it more difficult for managers to withhold bad news. In addition, since analysts are the primary beneficiaries of earnings guidance, firms with higher analyst following likely feel greater pressure from this user group to provide guidance.

Contrary to our prediction, litigation risk is not associated with the decision to give up guidance. The coefficient on our litigation risk variable is insignificantly different from zero.

Turning to our control variables, it appears that larger firms are more likely to give up guidance while firms with a longer history of providing guidance are less likely to give it up. In addition, contrary to our prediction, firms whose first appearance on the CIG database occurs after the passage of Reg FD are actually *less* likely to subsequently give up guidance.

In the above analysis, our independent variables are primarily measured as levels. One might argue that a more appropriate specification would use *changes* in these variables since the dependent variable is a *change* in the company's disclosure policy.¹⁵ To address this issue, we run the following model:

$$STOP = \beta_0 + \beta_1 BHRET + \beta_2 \Delta PMBAF + \beta_3 \Delta STD_{ret} + \beta_4 \Delta DISP + \beta_5 \Delta AF + \beta_6 \Delta PINST + \beta_7 \Delta LIT + \beta_8 LNMV + \beta_9 MB + \beta_{10} LNCT + \beta_{11} REGFD + \varepsilon \quad (2)$$

¹⁵ It is possible that firms perceived a cost to bucking “accepted business practice” and stopping guidance but when Coke, a well-known, well-respected company renounced guidance, the perceived cost to going against the grain fell. As a result, firms with the least incentive to provide guidance (i.e., those with bad news, greater uncertainty, and fewer informed investors) potentially changed their disclosure policy. This reasoning would support an analysis based on levels.

ΔPMBAF is defined as the percent of quarters that the firm meets/beats analysts' expectations in the most recent four quarters (quarters -1 to -4) less the four quarters prior to that (quarters -5 to -8). $\Delta\text{STD}_{\text{ret}}$ is the standard deviation of returns in days -252 to -1 less days -504 to -253. ΔDISP is DISP in quarter q-1 less DISP in quarter q-8.¹⁶ ΔAF is AF in quarter q-1 less AF in quarter q-8. ΔPINST is PINST in quarter q-1 less PINST in quarter q-4. ΔLIT is LIT in year t-1 less LIT in year t-2. Because returns are inherently changes (in price), we continue to use BHRET as previously defined. Because of the additional data requirements, our stopper sample is reduced from 189 to 124 (131 to 99) when DISP is excluded (included).

Results of this analysis are presented in Panel B of Table 2. In general, our results are similar to those reported previously with the exception that analyst dispersion is only significant using ranks and percent institutional ownership is not significant at conventional levels in any of the specifications. We continue to find that firms with poor recent performance and decreases in analyst following are more likely to give up earnings guidance.

Overall, our results are consistent with our predictions and with disclosure theory. Firms are more likely to stop providing guidance when performance is poor, uncertainty is high, and investors are less informed. Our results are also consistent with critics' claims that while firms often provide virtuous reasons for no longer providing guidance (e.g., desire to focus on the long-term), poor performance is more likely the underlying cause.

In the next section, we explore why some firms publicly announce their decision to stop providing earnings guidance while others do not.

4. Determinants of the Decision to Announce the Stoppage of Guidance

4.1 Theory and Empirical Predictions

¹⁶ To avoid losing too many observations, we use data from quarters -7, if quarter -8 is missing. If quarter -7 is missing, we use quarter -6 – and so on, down to quarter -4. We use a similar procedure for defining ΔAF .

As noted before, theoretical models generally predict that firms will disclose good news above a certain threshold and withhold bad news below this threshold (Dye 1985; Verrecchia 1983). By announcing the decision to stop providing earnings guidance, the managers are indicating that no disclosure will be made for some period of time going forward – i.e., they are committing to a policy of non-disclosure. Managers may want to make such a commitment so that the market will not subsequently interpret non-disclosure as bad news. In other words, in future quarters, when a firm that has committed to a policy of non-disclosure does not provide guidance, the market’s interpretation of this nondisclosure should be less negative than for firms who do not make such a commitment – assuming the market views the original commitment as credible. In most theoretical models, such a commitment would not be viewed as credible because in the future if the manager receives information that would positively impact share price, it would be in his/her best interest to disclose this information. However, practically speaking, such a break in commitment would likely be costly to the managers’ reputation.¹⁷

Assuming that it is costly for a manager to break his/her commitment to non-disclosure, we conjecture that managers will publicly announce the decision to stop guidance only if 1) it is unlikely that they will have good news to disclose in the future; and/or 2) in the event of good news, there is a lower incentive to disclose this information. With respect to the first point, we therefore predict that the announcer firms anticipate poorer future performance and are less

¹⁷ To determine whether our announcer firms live up to their promise to give up guidance, we check whether the announcer firms appear on the CIG database subsequent to their stop announcement. Twenty-three firms appear on the CIG database at least once after their announcement. Upon further investigation we discovered that in 10 cases the observations on CIG were pre-announcements (announcements of forthcoming earnings that generally occur within 2-3 weeks of the actual earnings announcement) not earnings guidance, four cases were “switchers” who provided annual guidance in the 4th quarter which was coded as quarterly guidance by CIG, three cases were firms who made one-time exceptions to their policy, one case was due to a lag in the initiation of their new policy (e.g., they announced the decision to stop at the end of the current year), and one case was an instance of “qualitative” guidance (i.e., “(the company’s) return to profitability will last through the first half of 2004”). The remaining four cases represent firms that appear to have re-started guidance after announcing the decision to stop. Thus, the vast majority of firms do not subsequently break their commitments, at least not in the near-term. No commitment is likely indefinite and, given that the average tenure of a Fortune 500 CFO is only 4.5 years (McCafferty 2007), it is likely that a new CFO could easily change the policy put in place by his/her predecessor.

uncertain about this prediction. That is, if managers anticipate poor future performance and there is low uncertainty around this projection, they are likely to be more willing to commit to a policy of non-disclosure. In contrast, if uncertainty is high, they are less likely to commit since it is possible they will have good news to disclose in the future. We use buy and hold returns over the prior year (BHRET) as our proxy for anticipated poor future performance.¹⁸ We then define a dummy variable (LOW) to capture lower uncertainty – LOW equals one if the firm’s standard deviation of daily raw returns during the 252 days prior to the event date falls into the bottom quartile of the sample. We expect the interaction of these two variables (BHRET \times LOW) to be negative, indicating that the relation between performance and announcing is greater for firms with low uncertainty.

With respect to the second point, we conjecture that if shareholders of the firm have a long-term investment horizon, managers will have fewer incentives to break their commitment of non-disclosure in the future if they have good news. While non-disclosure may temporarily depress the stock price, the good news will eventually be reported when earnings are announced. Long-term investors, by definition, are less affected by short-term depressions in stock price. Thus, we expect firms with long-term investors to be more likely to announce their decision to stop providing earnings guidance. To proxy for long-term shareholder ownership, we measure the percent of the firm’s institutional owners that are classified as long-term investors based on turnover using the methodology in Gasper et al. (2005). Specifically, we classify firms with an average institutional turnover measure in the bottom quartile of the sample distribution as firms with long-term institutional investors, and then define the total institutional ownership of these firms as long-term institutional ownership.

¹⁸ We do not use actual realized future performance because it is possible actual realizations will differ from managers’ expectations at the time the announcement was made.

Finally, we predict that the decision to announce the stoppage of guidance is related to the level of analyst following. Since many analysts rely on earnings guidance in order to issue forecasts of future earnings, they will likely question managers when earnings guidance is lacking – particularly because in recent years many firms have formalized their disclosure policies and give earnings guidance at the same time every quarter (generally with the prior quarter’s earnings release). Because Reg FD prohibits managers from privately communicating material information to analysts, managers who anticipate potential questioning from analysts on their sudden lack of earnings guidance may be more likely to pre-empt such questioning by announcing their decision. Thus, we predict that firms with greater analyst following are more likely to announce their decision to stop guidance.

4.2 *Empirical results*

We estimate the following logistic regression on our announcement and quiet samples:

$$ANNOUNCE = \beta_0 + \beta_1 BHRET + \beta_2 LOW + \beta_3 BHRET \times LOW + \beta_4 LTPINST + \beta_5 AF + \beta_6 LNMV + \beta_7 MB + \beta_8 LNCT + \beta_9 REGFD + \varepsilon \quad (3)$$

ANNOUNCE is a dummy variable equal to 1 if the firm announced their decision to stop providing quarterly earnings guidance and 0 if the firm stopped providing guidance but did so without a public announcement. As with our previous analysis, we run our analysis in both raw values and ranks.

The results of this analysis are presented in Table 4. Consistent with our predictions, we find a negative relation between past performance and the probability of announcing for firms with low uncertainty – the coefficient on the interaction $BHRET \times LOW$ is significantly negative ($p < 0.01$). These results are consistent with managers committing to a policy of non-disclosure when they are fairly certain they will not have good news to disclose in the future.

We also find evidence that firms are more likely to announce their decision to stop guidance if they have more long-term investors (LTPINST).¹⁹ This result is consistent with the conjecture that firms are more likely to commit to a non-disclosure policy if it will be easier for them to keep their commitment in the future, even in the presence of good news. Firms with a higher percent of long-term institutional investors likely face less pressure to disclose good news immediately since the news will be revealed at the earnings announcement and long-term investors do not, by definition, trade frequently.

We find some evidence that firms with greater analyst following are more likely to announce their decision to stop providing guidance – the coefficient on AF is positive in both raw and ranked regressions. Thus, our results suggest that firms are more likely to announce their decision to stop guidance if they are highly followed, perhaps because analysts are likely to question management when the firm fails to provide guidance.

In the next section, we examine consequences associated with stopping guidance.

5. Consequence of Stopping Guidance

5.1 Market reaction to announcement of stoppage

In this section, we investigate the market reaction associated with stopping guidance. We focus our analysis only on firms who announce their decision because the market reaction to the stoppage event is well-defined (i.e., the date of the announcement). For our quiet sample, it is unclear when the market impounds the effect of their non-disclosure decision into their stock prices.

As discussed previously, theory suggests that managers would commit to not providing guidance in the future only if they do not expect to have to break that commitment – that is, if

¹⁹ If we include PINST in equation (2) along with LTPINST, we continue to find a significant coefficient on LTPINST and the coefficient on PINST is insignificant.

they expect future news to be bad. As a result, the market likely interprets the stoppage announcement as a negative signal about future performance. In addition, prior research finds a negative relation between disclosure and the cost of capital (Botosan 1997; Healy, Hutton, and Palepu, 1999), which would also suggest that a firm stopping guidance would experience a negative stock price reaction.²⁰ On the other hand, firms often claim that the reason for giving up guidance is to avoid focusing investor as well as managerial attention on the short-run performance of the company. If the market views the act of providing guidance as a value-destroying activity, announcement period returns should be positive.

One potential complication with examining the three-day market reaction to the stoppage announcement is that many firms (54 out of 73) announce the decision to stop guidance in conjunction with their announcement of quarterly earnings. Thus, the announcement period return captures the effect of both the stoppage announcement as well as the earnings announcement.²¹ To provide some evidence on this issue, Table 5, Panel A provides descriptive statistics on the three-day (centered on the announcement date) cumulative abnormal returns (CAR) as well as cumulative raw returns (RET), for firms that announce the stoppage in conjunction with their quarterly earnings announcement ($D_{ea}=1$) and those that announce the stoppage independently ($D_{ea}=0$). Both sets of firms experience a statistically significant negative three-day abnormal return as well as a three-day raw return. More importantly, the three-day

²⁰ Botosan and Plumlee (2002), however, find a positive relation between cost of capital and disclosure scores related to “other publications,” which include “quarterly and other published information not required.” Assuming guidance falls in this category of disclosure, their findings would suggest that guidance increases cost of capital and firms who stop guiding should experience a positive market reaction (due to a lower cost of capital).

²¹ Some firms’ earnings announcements also include guidance (generally downward) for the upcoming quarter or year (with a statement indicating that the firm will not be providing guidance going forward). In this case, a negative market reaction could be attributed to revised expectations about future earnings. We later examine whether the market reaction is related to revisions in future earnings expectations. In addition, it is possible the market reaction is attributable to other concurrent announcements. We searched press releases related to each company in the [-1 to +1] event window and defined a dummy variable equal to 1 for any firm with a potentially significant event announced during this window. The inclusion of this dummy variable in our regressions does not impact our conclusions.

return is not statistically different between the two groups. Overall, the three-day return is negative for roughly 66% of the sample.

To formally control for the news in the earnings announcement, we run the following specification:

$$CAR_{-1,+1} = \alpha + \beta_1 D_{ea} + \beta_2 (D_{ea} \times UE) + \varepsilon \quad (4)$$

In this model, α captures the average three-day market reaction to the stoppage announcement, D_{ea} captures any differential market reaction for the group announcing earnings in conjunction with the stoppage announcement, and $D_{ea} \times UE$ captures the market response to the earnings surprise.²² The results are reported in Table 5, Panel B. The intercept indicates that the average market reaction, after controlling for the surprise in earnings, is a statistically significant negative return of -4.8% ($p < 0.01$).²³ Thus, the market appears to interpret a firm's announcement that it will no longer be providing guidance as bad news.

The negative market reaction to the stoppage announcement is consistent with either the market revising their expectations about the firm's future cash flows as a result of the announcement, increasing the firm's cost of equity capital, or both. To explore these explanations further, we examine the cross-sectional relation between the market reaction to the stoppage announcement and 1) revisions in expectations about the firm's future cash flows (the numerator effect); and 2) changes in the firm's cost of capital (the denominator effect).

²² Prior research suggests that the earnings response coefficient (ERC), represented by β_2 , are smaller for larger firms (Collins and Kothari 1989). If we allow β_2 to vary with firm size (by interacting UE with LNMV), our results are similar to those reported in Table 5.

²³ To address potential clustering in announcement dates, we also ran firm specific regressions and tested the significance of the average intercept term. Specifically, we ran the following regression: $RET_{it} = \alpha_i + \beta_i MRET_t + \gamma_i EVENT_{it} + \varepsilon_{it}$, where RET_{it} is firm i 's daily stock return; $MRET_t$ is the value-weighted daily market return, including dividends; $EVENT_{it}$ is an indicator variable equal to 1 for firm i 's stoppage announcement, and 0 otherwise, and t denotes each of the 252 trading days in the calendar year of the stoppage announcement. The mean coefficient γ_i across the 73 event firms is -0.012 and is statistically significant at $p < 0.01$. Thus, our results do not appear to be significantly affected by cross-sectional correlation.

To proxy for revisions in expectations of future cash flows, we calculate the revision in analysts' earnings forecasts for quarter q+1 made after the stop guidance announcement (ΔFEARN).²⁴ If the negative market reaction is due to revisions in future expected cash flows, the coefficient on ΔFEARN should be positive – that is, firms with greater declines in expected future performance should have worse market reactions at the time of announcement.

To proxy for changes in the firm's cost of capital, we first estimate the systematic risk of the firm before and after the stop guidance announcement. We estimate the market model using monthly returns including a dummy variable, POST , which is equal to one for months subsequent to the stop guidance announcement. Specifically, we conduct the following regression for each announcer firm:

$$R_{it} - R_{ft} = \alpha + \alpha_{post} \text{POST}_i + \beta_i [R_{mt} - R_{ft}] + \beta_{post} \text{POST}_i \times [R_{mt} - R_{ft}] + \varepsilon_{it} \quad (5)$$

$R_{i,t}$ is the monthly stock return for firm i , $R_{f,t}$ is the monthly risk-free rate, and $R_{m,t}$ is the monthly return on the NYSE-AMEX-NASDAQ value-weighted market portfolio. We include months up to month -60 prior to stopping and all available months after stopping, eliminating firms with less than six months of returns in the post stoppage period.²⁵ Because firms may begin with different levels of systematic risk, we compute the percent change in CAPM beta, CBETA , defined as $\beta_{POST} \div \beta_i$. To abstract away from larger outliers in CBETA , we use the decile value

²⁴ It is possible that the reaction is due to revisions in longer run performance. However, the availability of long-term forecasts in IBES is limited. Given our relatively small sample of event firms, we are unable to examine changes in long-term forecasts.

²⁵ This design is similar to that used to estimate changes in risk surrounding the announcement of dividend changes (Grullon, Michaely, and Swaminathan, 2002) and open market share repurchase programs (Grullon and Michaely 2004). We do not use the Fama and French (1993) three-factor model for two reasons. First, estimating factor loadings on SMB and HML on a firm-specific basis is empirically noisy but there is a long tradition of estimating one factor CAPM models on a firm-specific basis in accounting and finance research. Note that Fama and French (1993) estimate three factor loadings on a portfolio basis. Second, the three factor Fama French model in place of the one factor CAPM model, even on a portfolio basis, runs into an asset spanning problem in that the loading on the CAPM market factor can be potentially distributed over all three factors of the Fama-French model. Hence, the researcher can potentially encounter increases in one or two factor loadings (e.g., loading on the market factor and SMB) and a decrease in another factor loading (say HML), thus rendering interpretation difficult. In contrast, the direction of change in the loading on one of the three factors has a relatively unambiguous interpretation.

of CBETA (RCBETA), to test for the association between changes in beta and the market reaction to the stoppage announcement.²⁶ If the negative reaction is due to expected changes in systematic risk, the coefficient on RCBETA should be negative.

In Table 5, Panel C, we report descriptive data on our estimates of the change in beta (β_{POST}) and the percent change in beta (CBETA). The mean and median values of β_{POST} and CBETA are greater than zero (p's < 0.01, one-tailed) suggesting an increase in systematic risk for announcer firms. However, it is possible that there was a market-wide shift in the cost of capital during our sample period. For comparison purposes, we also estimate equation (5) for our control sample. A comparison of the two groups indicates that announcer firms exhibit a statistically greater increase in beta relative to control firms.

This evidence suggests that firms who announce their decision to stop providing guidance experience an increase in their cost of capital. To examine whether this increase explains the negative three-day market reaction to the stoppage announcement, we run the following cross-sectional regression:

$$CAR_{-1,+1} = \alpha + \beta_1 D_{ea} + \beta_2 (D_{ea} \times UE) + \beta_3 \Delta FEARN + \beta_4 CBETA + \varepsilon \quad (6)$$

Results of this analysis are presented in second column of Panel B, Table 5. The coefficient on $\Delta FEARN$ is positive and statistically significant (t=3.51, p<0.01), indicating that firms with more negative revisions in expected future performance are penalized with a more negative market reaction at the time of the announcement. However, the coefficient on RCBETA is insignificant suggesting that changes in firms' cost of capital do not explain the negative market reaction experienced by firms who announce their decision to stop providing earnings guidance.

²⁶ We use decile values of CBETA to abstract away from large outlier changes in CBETA. Our inferences remain unchanged when we use actual values of CBETA in the analyses.

Overall, our results suggest that the negative reaction is related primarily to revisions in expected future performance. This result is consistent with managers giving up guidance when they expect future news to be bad and the market rationally interpreting these motives. While we find evidence of an increase in systematic risk following the decision to give up guidance, this change is not related to market returns at the time of the announcement. One possibility is that firm-specific measures of changes in systematic risk are too noisy, resulting in a low power test.

5.2 *Other consequences*

Our last set of tests investigates other potential consequences of giving up guidance. We examine two groups of consequences: 1) effects on volatility and trading volume, 2) and effects on analyst-related factors. For these tests, we compare our announcer and quiet samples (combined) to our control group of firms. Quarter q is defined as the quarter in which the company announces its decision to stop guidance (for our announcer sample) or the first quarter when the company does not provide guidance as per CIG (for our quiet sample). We then compare our stopper and control samples on the change between the pre- and post-stoppage quarters (quarters $q-1$ and $q+1$, respectively). Thus, our basic research design is a “control group design with pre-test and post-test,” which has fewer validity threats than a “pre-test only” design (Cook and Campbell, 1979).

5.2.1 *Volatility and trading volume*

One potential benefit of earnings guidance is that the market receives information about upcoming earnings earlier in the quarter. When a firm stops giving guidance, more of the earnings information will be incorporated in price during the earnings announcement period, leading to greater return volatility and trading volume during this window. A counter-argument proposed by some stopper firms is that stopping guidance drives away any transient investors

such as hedge funds who bet against the guided earnings number and thus results in lower stock return volatility (NIRI 2004). We examine the changes in three variables to test these conjectures: Beaver (1968)'s U-statistic, abnormal trading volume, and return volatility within a 90-day window surrounding the even date. Beaver's (1968) U-statistic is the ratio of the average daily stock return volatility for the 3 days surrounding the earnings announcement relative to the average daily stock return volatility in non-earnings announcement periods in the quarter. Also, as per Beaver (1968), we measure abnormal trading volume (TVOL) as the mean 3-day earnings announcement trading volume scaled by non-announcement period mean trading volume. The change in overall return volatility is measured as follows: for the pre-event volatility we measure the standard deviation of returns in the window -90 to -2 days relative to the stoppage announcement and for the post event volatility we measure the standard deviation of returns in the window +2 to +90 days (STD90).

Table 6, Panel A reports univariate statistics for these three measures (as well as other variables examined and discussed in the next sub-section). Panel B reports the results of running the following regression for our stopper and control samples separately:

$$U_{j,q}, TVOL_{j,q}, STD90_{j,q} = \alpha_0 + \alpha_1 POST_j + \alpha_2 IMR_{j,q-1} + \varepsilon_{j,q} \quad (7)$$

IMR is the Inverse Mills Ratio obtained from our analysis of the determinants of stopping guidance (equation (1)). We include this variable to control for any potential self-selection bias inherent in our research setting.²⁷ For a more parsimonious presentation, we report only the coefficient on POST, which represents the change in the statistic after the firm stops providing guidance. We also run a regression on the combined sample with dummy variables for our stopper group along with interactions in order to test the difference in the POST variable

²⁷ We use the model that excludes DISP to increase our sample size.

between the two groups. Contrary to our prediction, we do not find an increase in any of the three variables for our stopper firms (coefficient on POST is insignificant in all regressions). Thus, we do not find any evidence of an unusual change in return volatility or trading volume for firms that announce the decision to stop providing earnings guidance.

5.2.2 *Analyst following, dispersion and accuracy*

Finally, we examine changes in three analyst-related factors: 1) analyst following; 2) dispersion in analyst forecasts; and 3) analyst forecast accuracy. We measure analyst following (AF) as the number of analysts issuing forecasts in the pre- and post-stoppage quarters. If the elimination of guidance increases the analyst's cost of covering a firm, analyst following should fall for our event firms. Analyst dispersion (DISP) is measured as the standard deviation of analysts' forecasts scaled by the absolute value of the corresponding mean forecast. Since earnings guidance likely increases the amount of public information about a firm, the elimination of guidance should lead to an increase in forecast dispersion (Barron, Kim, Lim and Stevens, 1998). Moreover, managers often express concerns over increased dispersion as a reason for maintaining the practice of giving earnings guidance.²⁸ Forecast error (|FE|) is the absolute value of actual earnings per share less the mean analyst forecast (scaled by the mean analyst forecast) in the pre- and post-stoppage quarters. If earnings guidance increases the analysts' information set, we would expect forecast error to increase for our event firms after the elimination of guidance. On the other hand, if analysts replace the lack of guidance with greater private information gathering and therefore, generate additional private information, then the lack of guidance will not result in a decline in forecast accuracy.

²⁸ For example, "Some market observers argue that lack of specific EPS or net income guidance will heighten volatility because a wider range of analyst estimates will result" (Harper 2003). Also a NIRI Update article entitled "The Lighthouse: Earnings Guidance" (NIRI, December 2004) cites one reason behind Tyson Foods decision to provide quarterly guidance as, "...giving guidance...leads to a tighter range of analysts' estimates, which in turn can result in more accurate valuation."

Table 6 presents the results of our analysis. Univariate statistics are presented in Panel A and regression results are presented in Panel B. Contrary to concerns expressed by managers, we do not find a statistically significant decline in analyst following after the stoppage of guidance for our event firms. However, we do find that the increase in dispersion and forecast error in the POST period experienced by event firms is significantly greater than that experienced by control firms ($t=3.89$ and $t= 1.99$ for dispersion and accuracy respectively). Thus, it appears analysts are not able to independently generate similar levels of information in the absence of guidance, resulting in a greater decrease in forecasting accuracy among analysts of our event firms relative to our control firms.

6. Additional Tests – Is there a Penalty to Announcing?

In the prior section, we document a negative market reaction associated with a firm's announcement to renounce earnings guidance. An obvious question then arises: would these firms have been better off staying quiet? Presumably, the downside to staying quiet is that the market will interpret future non-disclosure as indicative of bad news and penalize the company at that point. Thus, one might ask: are quiet firms equally penalized in the future when they fail to provide guidance? One problem with examining this question is that it is difficult to isolate the market reaction to a non-disclosure event. However, because firms often provide guidance for the next quarter when reporting earnings for the current quarter (either in the company's earnings release or during the conference call associated with the earnings release), one possibility is to measure the market reaction for the quiet sample at the first quarterly earnings release date on which the firm does not provide guidance.²⁹ Using this date for the quiet sample, we compare

²⁹ We calculated the percentage of management forecasts that fall within -2 to +2 days of the prior quarter's earnings announcement date for our QUIET sample over the past four quarters. The percentages are 76%, 75%, 74%, and 53% for quarters q-1, q-2, q-3, and q-4, respectively. Thus, it appears that the management forecasts of next

the market reaction for the quiet sample to that of the announcer sample. Specifically, we run the following regression:

$$CAR_{-1,+1} = \alpha + \beta_1 D_{ea} + \beta_2 (D_{ea} \times UE) + \beta_3 QUIET + \beta_4 UE \times QUIET + IMR + \varepsilon \quad (8)$$

QUIET is a dummy variable equal to 1 for firms in our quiet sample and 0 for firms in our announcer sample. IMR is the Inverse Mills Ratio obtained from our tests of the determinants of announcing (equation (3)). We include IMR to control for the underlying determinants of the decision to announce. If quiet firms are equally penalized when they fail to provide guidance with their first earnings announcement, the coefficient on β_3 should be insignificantly different from zero. However, if the penalty for these firms occurs over a different window (e.g., over several subsequent earnings announcements without guidance), the coefficient on β_3 should be positive, indicating a lower penalty for QUIET firms relative to ANNOUCER firms.

We tabulate the results in Table 7. In column (2), the coefficient on β_3 is insignificantly different from zero, suggesting that the market penalty for the quiet sample is similar to the penalty to the announcer sample, after controlling for the underlying determinants of the decision to announce. However, if we exclude IMR from the above regression, as in column (1), the coefficient on β_3 is significantly positive ($p < 0.05$). It appears that the announcer sample experiences a more negative market reaction than the quiet sample but this greater penalty is due to the underlying determinants of the decision to announce (i.e., poor trailing performance, less uncertainty, and greater long-term institutional ownership). Thus, it does not appear that an announcer firm with the same underlying economic determinants would have been better off by not announcing.

quarter's earnings frequently occur at the current quarter's earnings announcement and it is not unreasonable to assume that the market would anticipate such guidance at this date.

7. Conclusions

The well-publicized decision by the Coca-Cola Company to stop providing earnings guidance to the market, followed by a number of other companies issuing similar statements, raises questions about the motives behind these companies' actions as well as the consequences of their decision. We investigate these issues using a sample of firms that stop providing quarterly earnings guidance.

We find that firms that stopped guidance have poor prior performance, more uncertain operating environments, and less informed investors. These results are consistent with disclosure theory that predicts managers will withhold bad news if there is uncertainty about whether the manager has received information (Dye 1985; Jung and Kwon, 1988; Dye 1998). The results are also consistent with critics who contend that firms have stopped providing guidance because they are poor performers despite some companies' claims that the reason for the stoppage is to avoid the short-term focus that the practice of giving guidance fosters.

We also find that firms are more likely to announce their decision to stop guidance, thereby committing to a policy of non-disclosure, if they are likely to have only bad news to report in the future and there is less uncertainty surrounding their prediction. Announcer firms also have a higher percent of long-term investors, perhaps because it is less costly for such firms to withhold the disclosure of any favorable information they might receive.

For firms that announce their decision to stop providing guidance, we find a negative market reaction associated with the announcement. The negative reaction appears to be primarily due to revisions in the market's expectations of future cash flows rather than changes in the firm's cost of capital.

Although firms who announce their decision to stop providing guidance experience a negative market reaction to their announcement, it does not appear that these firms would have been better off staying quiet. The market reaction to the announcement for our announcer firms is more negative than the market reaction surrounding the first non-guidance event for our quiet firms but this difference appears to be due to the economic determinants that drive the decision to announce.

Finally, we do not find evidence that stopping guidance increases return volatility or lowers analyst following, contrary to the concerns often expressed about the costs of foregoing guidance. However, we do find an increase in analyst forecast dispersion and analyst forecast error after the stoppage of guidance, relative to control firms. These findings suggest that explicit guidance is valuable to analysts and that they are not able to independently generate similar levels of information through private information acquisition.

Overall, our results suggest that managers are strategic in their decision to discontinue earnings guidance – doing so when they likely have less favorable news to disclose and when the market is less certain of their information endowment. The market, in turn, is rational in its interpretation of these actions. Thus, despite calls by prominent investors, practitioner groups, and academics to encourage firms to renounce earnings guidance (Buffett 1996; Browning 2006; Krehmeyer and Orsagh 2006; Fuller and Jensen 2002; Jensen, Murphy and Wruck 2004), relatively few firms have done so and only when the decision is beneficial to them.

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Table 1
Sample Attrition for Announcer, Quiet, and Control Firms

		<u>Announcer</u>	<u>Quiet</u>	<u>Control</u>
A	Initial Sample	96	158	1,046
	Less: firms not on CRSP, deleted from CRSP before event date, or merged/acquired	(10)	(19)	(43)
B	Firms available before imposing data restrictions for analysis	86	139	1,003
	From B - Less: firms without CRSP or Compustat data for returns/ return volatility/size/growth	(9)	(27)	(45)
C	Firms available for determinant tests	77	112	958
	From B - Less: firms with no CRSP data or IBES data for abnormal returns/analyst forecast revision/estimated change in Beta	(13~28)		
D	Firms available for market reaction tests	58~73		
	From C – Less: firms without data for return volume/volatility/analyst forecast attributes, or without post event-period data	(2~47)	(2~189)	
E	Firms available for consequence tests	142~187		769~956

Table 2
Descriptive Statistics on Announcer, Quiet, and Control Samples

Panel A: Univariate Statistics

Variables	Mean Values			Median Values			Z-statistics for Median Differences	
	Announcer (N = 77)	Quiet (N = 112)	Control (N = 958)	Announcer (N = 77)	Quiet (N = 112)	Control (N = 958)	Announcer + Quiet vs. Control	Announcer vs. Quiet
BHRET	-0.093	-0.046	0.171	-0.134	-0.170	0.046	-6.79***	0.49
PMBAF	0.805	0.811	0.849	0.875	0.875	0.875	-2.13**	-0.56
STD _{ret}	3.347	4.237	3.241	3.078	3.638	2.961	3.88**	-3.34***
DISP ^a	0.173	0.283	0.086	0.082	0.099	0.044	5.99***	-0.95
AF	7.870	4.375	8.809	5	3	7	-6.93***	3.69***
PINST	57.837	54.219	66.033	63.900	61.280	71.500	-4.84***	0.62
LTPINST	9.007	3.607	4.790	0	0	0	2.97***	1.41
LIT	0.024	0.028	0.051	0.002	0.002	0.002	1.42	1.43
LNMV	6.918	6.093	6.947	6.539	6.278	6.830	-3.49***	2.29**
MB	2.692	2.353	2.548	1.753	1.443	2.283	-5.48***	1.86*
LNCT	2.116	2.357	2.706	2.485	2.398	2.773	-7.61***	0.14
REGFD	0.402	0.321	0.340	0	0	0	0.38	1.14

Table 2
Descriptive Statistics on Announcer, Quiet, and Control Samples
(continued)

Panel B: Correlation Matrix – Pearson Correlation Coefficients above the Diagonal and Spearman Rank Correlation Coefficients below the Diagonal

	STOP	BHRET	PMBAF	STD _{ret}	DISP	AF	PINST	LIT	LNMV	MB	LNCT	REGFD
STOP		-0.14***	-0.08***	0.16***	0.15***	-0.16***	-0.15***	-0.03	-0.11***	-0.00	-0.26***	0.01
BHRET	-0.20***		0.08**	-0.06**	-0.08***	-0.10***	-0.13***	-0.09***	0.00	0.05*	-0.01	-0.01
PMBAF	-0.06**	0.07**		-0.03	-0.23***	0.05	-0.03	0.03	0.06*	0.05*	0.01	0.08***
STD _{ret}	0.11***	-0.20***	0.00		0.32***	-0.17***	-0.26***	0.19***	-0.49***	-0.02	-0.25***	0.06*
DISP	0.19***	-0.19***	-0.21***	0.28***		-0.09***	-0.09***	-0.00	-0.14***	0.02	-0.03	0.06*
AF	-0.20***	-0.03	-0.01	-0.20***	-0.14***		0.33***	0.11***	0.66***	0.05	0.26***	-0.13***
PINST	-0.14***	-0.03	-0.00	-0.20***	-0.08*	0.39***		0.06**	0.31***	-0.02	0.31***	-0.13***
LIT	-0.04	-0.43***	0.03	0.31***	0.06**	0.48***	0.24***		0.03	0.01	-0.03	-0.02
LNMV	-0.10***	0.14***	0.03	-0.52***	-0.27***	0.68***	0.31***	0.35***		0.07**	0.26***	-0.13***
MB	-0.16***	0.31***	0.11***	-0.23***	-0.37***	0.35***	0.13***	0.17***	0.50***		-0.04	-0.04
LNCT	-0.22***	0.02	0.01	-0.25***	-0.11***	0.31***	0.29***	0.07**	0.30***	0.08***		-0.35***
REGFD	0.01	-0.01	0.09***	0.05*	0.02	-0.12***	-0.12***	-0.09***	-0.14***	0.02	-0.33***	

Table 2
Descriptive Statistics on Announcer, Quiet, and Control Samples
(continued)

Notes to Table 2:

*, **, ***: significant at 10%, 5%, 1% (two-sided p-values) for Panel A Wilcoxon Z-statistics for tests of median differences and Panel B correlation matrix.

^a: further restricting the samples to have non-missing DISP leads to samples sizes of 61, 70, and 964 for Announcer, Quiet, and Control firms, respectively.

Definition of variables:

- STOP = 1 if the firm stops guidance and 0 for control firms
- BHRET= Market-adjusted buy-and-hold returns for the 12 months beginning from month -12 ending month -1, with month 0 being the announcement month.
- PMBAF = A firm's percentage of meeting or beating earnings expectations in the 8 quarters preceding the announcement quarter. Expected earnings is measured as consensus analyst forecasts before earnings announcements from IBES. We require at least 4 quarters of non-missing net income on Compustat to compute this variable
- STD_{ret} = standard deviation of daily raw returns during 252 days prior to the stop-guidance announcement date for event observations and the management forecast date for control observations. For presentation we multiply the number by 10².
- DISP = Standard deviation of the last analyst forecasts prior to quarter q-1 earnings announcements, scaled by lagged price, multiplied by 10²
- AF = Number of analysts following the firm, measured as the number of analysts covering the firm at the beginning of the event quarter per IBES. If a firm is not on IBES, we code AF as zero. The window over the 252 days preceding to the stop-guidance (management forecast) date for stop (control) firms.
- PINST = Percentage institutional ownership measured prior to the announcement date as reported on Compact Disclosure.
- LIT = Proxy for litigation risk, calculated using the Rogers and Stocken (2005) litigation probability model coefficients estimates. Larger values indicate greater probability of litigation. Specifically, probability (litigation=1) = $G(-5.378 + 0.141 * \text{SIZE} + 0.284 * \text{TURNOVER} + 0.012 * \text{BETA} - 0.237 * \text{RETURNS} - 1.340 * \text{STDRET} - 0.011 * \text{SKEWNESS} - 3.161 * \text{MINRET} - 0.025 * \text{BIOTECH} + 0.378 * \text{HARDWARE} + 0.075 * \text{ELECTRONICS} - 0.034 * \text{RETAIL} + 0.211 * \text{SOFTWARE})$, where G is the standard normal cumulative distribution function. The estimation of all the independent variables (except for the industry dummies) use the window over 252 days preceding the stop guidance (management forecast) date for stop (control) firms). Note that SIZE = the natural log of the average market value of equity; TURNOVER = average daily share volume divided the average shares outstanding; BETA = the slope coefficient from regressing firm's daily returns on CRSP Value-Weighted Index; RETURNS = the cumulative daily raw stock returns; SKEWNESS = the skewness of daily returns; MINRET = the minimum of daily returns. The high risk industry dummies represent Biotech (SIC 2833 to 2836), Computer Hardware (SIC 3570 to 3577), Electronics (SIC 3600 to 3674), Retailing (SIC 2500 to 5961) and Computer Software (SIC 7371 to 7379). For presentation we multiply the estimated probability by 10².
- LNMV = Natural log of the beginning of event quarter market value of equity (Compustat quarterly #14*#61).
- MB = Natural log of the beginning of event quarter market to book ratio.
- LNCT = Natural log of (1+ CT), where CT is the number of management quarterly EPS forecasts up till quarter t-1.
- REGFD = Indicator variable coded as 1 if a firm initiates quarterly earnings guidance after Regulation FD (October 23, 2000), 0 otherwise.

Table 3
Determinants of the Decision to Stop Quarterly Guidance

Panel A: Levels specification

Model:

$$STOP = \beta_0 + \beta_1 BHRET + \beta_2 PMBAF + \beta_3 STD_{ret} + \beta_4 DISP + \beta_5 AF + \beta_6 PINST + \beta_7 LIT + \beta_8 LNMV + \beta_9 MB + \beta_{10} LNCT + \beta_{11} REGFD + \varepsilon$$

Dependent variable = 1 if the firm stops guidance and 0 for control firms. P-values in parentheses are one-sided for those with directional predictions and two-sided for control variables. We report (1-p) values for coefficients that assume a sign opposite to the one predicted.

	Predicted sign		Model without DISP		Model with DISP	
			NOBS (stop) = 189		NOBS (stop) = 131	
			NOBS (control) = 958		NOBS (control) = 864	
			Raw values	Ranked Values	Raw values	Ranked Values
BHRET	-	Coefficients	-1.10	-1.97	-1.31	-1.79
		P-values	(0.00)	(0.00)	(0.00)	(0.00)
PMBAF	-	Coefficients	-1.10	-0.71	-1.38	-0.99
		P-values	(0.01)	(0.01)	(0.00)	(0.01)
STD _{ret}	+	Coefficients	0.21	0.79	0.09	-0.01
		P-values	(0.00)	(0.05)	(0.15)	(0.49)
DISP	+	Coefficients			0.59	1.42
		P-values			(0.02)	(0.00)
AF	-	Coefficients	-0.09	-2.68	-0.05	-1.51
		P-values	(0.00)	(0.00)	(0.03)	(0.01)
PINST	-	Coefficients	-0.47	-0.50	-0.58	-0.67
		P-values	(0.09)	(0.08)	(0.11)	(0.05)
LIT	+	Coefficients	-1.15	-0.08	-0.94	0.17
		P-values	(0.88)	(0.14)	(0.84)	(0.39)
LNMV	+/-	Coefficients	0.27	2.63	0.20	1.74
		P-values	(0.00)	(0.00)	(0.04)	(0.01)
MB	+/-	Coefficients	-0.00	-0.98	-0.00	-0.57
		P-values	(0.83)	(0.01)	(0.75)	(0.18)
LNCT	+/-	Coefficients	-1.19	-2.17	-1.34	-2.27
		P-values	(0.00)	(0.00)	(0.00)	(0.00)
REGFD	+/-	Coefficients	-0.69	-0.46	-0.96	-0.66
		P-values	(0.00)	(0.02)	(0.00)	(0.01)
Pseudo-R ²			16.16%	16.77%	15.33%	15.37%

Table 3
Determinants of the Decision to Stop Quarterly Guidance
(continued)

Panel B: Changes specification

Model:

$$STOP = \beta_0 + \beta_1 BHRET + \beta_2 \Delta PMBAF + \beta_3 \Delta STD_{ret} + \beta_4 \Delta DISP + \beta_5 \Delta AAF + \beta_6 \Delta PINST + \beta_7 \Delta LIT + \beta_8 LNMV + \beta_9 MB + \beta_{10} LNCT + \beta_{11} REGFD + \varepsilon$$

Dependent variable = 1 if the firm stops guidance and 0 for control firms. P-values in parentheses are one-sided for those with directional predictions and two-sided for control variables. We report (1-p) values for coefficients that assume a sign opposite to the one predicted.

	Predicted sign		Model without DISP		Model with DISP	
			NOBS (stop) = 124		NOBS (stop) = 99	
			NOBS (control) = 836		NOBS (control) = 704	
			Raw values	Ranked Values	Raw values	Ranked Values
BHRET	-	Coefficients	-0.84	-1.38	-0.89	-1.39
		P-values	(0.00)	(0.00)	(0.00)	(0.00)
$\Delta PMBAF$	-	Coefficients	-1.24	-1.19	-1.09	-1.04
		P-values	(0.00)	(0.00)	(0.01)	(0.01)
ΔSTD_{ret}	+	Coefficients	0.17	1.02	0.13	0.52
		P-values	(0.04)	(0.01)	(0.12)	(0.14)
$\Delta DISP$	+	Coefficients			0.38	0.75
		P-values			(0.14)	(0.03)
ΔAAF	-	Coefficients	-0.07	-1.01	-0.06	-0.98
		P-values	(0.01)	(0.00)	(0.02)	(0.01)
$\Delta PINST$	-	Coefficients	-1.28	-0.11	-0.32	0.29
		P-values	(0.11)	(0.38)	(0.39)	(0.24)
ΔLIT	+	Coefficients	0.02	-0.44	0.04	-0.21
		P-values	(0.43)	(0.72)	(0.37)	(0.35)
LNMV	+/-	Coefficients	-0.06	0.24	-0.04	0.58
		P-values	(0.36)	(0.56)	(0.63)	(0.24)
MB	+/-	Coefficients	-0.00	-0.85	-0.00	-1.26
		P-values	(0.79)	(0.06)	(0.54)	(0.02)
LNCT	+/-	Coefficients	-1.38	-2.47	-1.55	-2.86
		P-values	(0.00)	(0.00)	(0.00)	(0.00)
REGFD	+/-	Coefficients	-0.97	-0.73	-1.31	-1.02
		P-values	(0.00)	(0.00)	(0.00)	(0.00)
Pseudo-R ²			14.27%	12.93%	14.95%	14.65%

Table 3
Determinants of the Decision to Stop Quarterly Guidance
(continued)

Notes to Table 3:

Event date (quarter) is the stop guidance date (quarter) for stop firms and matched management forecast date (quarter) for control firms.

For variable definitions for Panel A, please refer to notes to Table 2.

Definition of additional variables:

- $\Delta PMBAF$ = Difference between the percentage of quarters that firm earnings meet or beat consensus analyst forecasts, qtrs -1-4 minus qtrs -5~-8.
- $\Delta STDret$ = Difference in the standard deviation of returns, days -252 ~ -1 minus days -504 ~-253.
- ΔAF = Difference in number of analysts following, qtr -1 minus qtr -8. If qtr -8 data is missing, use data from qtr -7, if qtr -7 data is missing then use qtr -6 data, and so on until qtr -4.
- $\Delta DISP$ = Difference in the standard deviation of analyst forecasts scaled by beginning price, qtr 1 minus qtr 8. If qtr -8 data is missing, use data from qtr -7, if qtr -7 data is missing then use qtr -6 data, and so on until qtr -4.
- $\Delta PINST$ = Difference between institutional ownership in qtr -1 and qtr -4.
- ΔLIT = Difference between the probabilities of litigation, year T-1 minus year T-2.

Table 4
Determinants of the Decisions to Announce Stopping Quarterly Guidance

Model:

$$ANNOUNCE = \beta_0 + \beta_1 BHRET + \beta_2 LOW + \beta_3 BHRET \times LOW + \beta_4 AF + \beta_5 LTPINST + \beta_6 LNMV + \beta_7 MB + \beta_8 LNCT + \beta_9 REGFD + \varepsilon$$

Dependent variable = 1 if the firm announces the decision to stop giving quarterly guidance and 0 for firms who quietly stop giving quarterly guidance. P-values in parentheses are one-sided for those with directional predictions and two-sided for control variables. We report (1-p) values for coefficients that assume a sign opposite to the one predicted.

	Predicted sign		Model without DISP	
			NOBS (announcer) = 77	
			NOBS (quiet) = 112	
			Raw values	Ranked Values
BHRET	+/-	Coefficients	0.08	-0.11
		P-values	(0.83)	(0.87)
LOW	+	Coefficients	1.36	5.69
		P-values	(0.00)	(0.00)
BHRET×LOW	-	Coefficients	-4.53	-6.88
		P-values	(0.00)	(0.00)
AF	+	Coefficients	0.10	2.56
		P-values	(0.00)	(0.00)
LTPINST	+	Coefficients	1.79	2.36
		P-values	(0.04)	(0.03)
LNMV	+/-	Coefficients	-0.06	-1.22
		P-values	(0.59)	(0.09)
MB	+/-	Coefficients	0.01	0.99
		P-values	(0.88)	(0.08)
LNCT	+/-	Coefficients	-0.53	-0.29
		P-values	(0.05)	(0.70)
REGFD	+/-	Coefficients	0.25	0.67
		P-values	(0.56)	(0.12)
Pseudo-R ²			15.89%	16.59%

Notes to Table 4: For variable definitions (except for LTPINST and LOW) refer to notes to Table 2.

LTPINST = Percentage of shares held by long term institutional owners, where long-term institutional owners are defined based on turnover using the methodology in Gasper et al. (2005).

LOW = Low uncertainty indicator, coded as 1 if the firm's standard deviation of daily raw returns during 252 days prior to the event date falls into the bottom quartile of the sample.

Table 5
Market Reaction to the Announcements of Stopping Quarterly Guidance

Panel A: Univariate Statistics

	% negative	Mean		t-stat for mean difference	Median		z-stat for median difference
		D _{ea} = 1 (n=54)	D _{ea} = 0 (n=19)		D _{ea} = 1 (n=54)	D _{ea} = 0 (n=19)	
UE	30.1%	-0.013	N/A	N/A	0.000	N/A	N/A
CAR _{-1,1}	65.8%	-0.027	-0.048	-0.87	-0.020	-0.028	-0.87
RET _{-1,1}	65.8%	-0.028	-0.052	-0.92	-0.017	-0.024	-0.91

Panel B: Test of market reaction controlling for earnings surprise.

Independent variables	(1)	(2)
	Coefficients (t-statistic) (n = 73)	Coefficients (t-statistic) (n = 58)
Intercept	-0.048 (-2.31)	-0.07 (-2.21)
D _{ea}	0.024 (0.97)	0.07 (2.83)
D _{ea} ×UE	0.187 (1.21)	2.52 (1.91)
ΔFEARN		2.31 (3.51)
RCBETA		0.00 (0.40)
Adjusted R ²	3.16%	27.68%

Panel C: Descriptive statistics on change in CAPM beta

$$\text{Model } R_{it} - R_{ft} = \alpha + \alpha_{post} POST_i + \beta_i [R_{mt} - R_{ft}] + \beta_{post} POST_i \times [R_{mt} - R_{ft}] + \varepsilon_{it}$$

	β_{post}		$CBETA = [\beta_{post} POST_i \div \beta_i]$	
	Mean	Median	Mean	Median
Announcer	0.552 (p<0.01)	0.455 (p<0.001)	2.582 (p<0.01)	0.408 (p<0.001)
Control	0.171 (p<0.001)	0.247 (p< 0.001)	-0.512 (p<0.001)	0.157 (p<0.001)
Test of Difference	t = 2.40	z = 2.11	t = 1.85	z = 2.41

Table 5
Market Reaction to the Announcements of Stopping Quarterly Guidance
(continued)

Notes to Table 5:

Definition of variables:

Panel A:

- D_{ea} = indicator variable coded as 1 if an earnings announcement falls in [-1,+1] window centered on the stop-guidance announcement date, 0 otherwise.
- UE = unexpected earnings, defined as actual EPS minus the most recent preceding consensus analyst forecast on IBES, scaled by price two days before the earnings announcement date.
- $CAR_{-1,1}$ = three-day cumulative abnormal returns centered on the stop-guidance announcement date.
- $RET_{-1,1}$ = three-day cumulative raw returns centered on the stop-guidance announcement date.
- R_{it} = monthly stock returns for firm i . Firms with less than 6 months of return data after the event date are dropped.
- R_{ft} = Monthly risk-free rates.
- R_{mt} = monthly return on the NYSE-AMEX-NASDAQ value-weighted market portfolio.
- $POST$ = indicator variable coded as 1 for the months after the stop-guidance announcement date, and 0 otherwise.
- $\Delta FEARN$ = measure of expected future earnings, calculated as analyst forecast revision for quarter Q+1 (analyst EPS forecast for quarter Q+1 made in quarter Q+1, minus analyst EPS forecast for quarter Q+1 made in quarter Q-1, scaled by price at the end of the quarter before stop-guidance announcement (Q-1).
- $RCBETA$ = decile values of CBETA, where $CBETA$ = % change in β estimated as β_{post} / β from firm-specific CAPM model:
 $R_{jt} - R_{ft} = \alpha + \alpha_{post} POST + \beta[R_{mt} - R_{ft}] + \beta_{post} POST \times [R_{mt} - R_{ft}] + \varepsilon_{jt}$, where R_{jt} is firm's daily stock returns, and R_{it} , R_{ft} , R_{mt} , and $POST$ are defined as above.

Table 6
Consequence of Stopping Guidance: Beaver's U, Abnormal Trading Volume, and Return Volatility
For the Pre-Event Quarter (Q-1) and Post-Event Quarter (Q+1)

Panel A Mean and median values for Beaver's U statistics, abnormal trading volume, and return volatility

		QTR	Mean		Median	
			Stop Sample	Control Sample	Stop Sample	Control Sample
Beaver's U-statistic [U]	Stop N=178	Q-1	3.40	4.35	1.51	1.80
	Control N = 769	Q+1	3.82	5.04	1.69	1.95
Abnormal Trading Volume [TVOL]	Stop N=178	Q-1	1.74	1.79	1.33	1.48
	Control N = 769	Q+1	1.79	1.96	1.41	1.56
90-day return volatility [STD90]	Stop N=187	Q-1	0.04	0.03	0.03	0.03
	Control N = 956	Q+1	0.03	0.03	0.03	0.02
Analyst Following [AF]	Stop N = 158	Q-1	7.30	9.29	5	8
	Control N = 908	Q+1	6.81	9.35	4	8
Forecast Dispersion [DISP]	Stop N = 142	Q-1	0.18	0.12	0.07	0.04
	Control N =852	Q+1	0.37	0.11	0.10	0.04
Forecast Error [FE]	Stop N =157	Q-1	0.55	0.28	0.11	0.07
	Control N =896	Q+1	0.68	0.22	0.15	0.07

Table 6
Consequence of Stopping Guidance: Beaver's U, Abnormal Trading Volume, and Return Volatility
For the Pre-Event Quarter (Q-1) and Post-Event Quarter (Q+1)
(continued)

Panel B Regression Results -- Model:

$$U_{j,q} [TVOL_{j,q}, STD90_{j,q}, AF_{j,q}, DISP_{j,q}, |FE|_{j,q}] = \alpha_0 + \alpha_1 POST_j + \alpha_2 IMR_{j,q-1} + \varepsilon_{j,q}$$

Dependent variable		Event Sample		Control Sample		Difference between Event and Control	
		Coeff.	T-stats.	Coeff.	T-stats.	Coeff.	T-stats.
U	POST	0.42	(0.66)	0.69*	(1.64)	-0.27	(0.29)
TVOL	POST	0.14	(0.81)	0.16**	(1.90)	-0.02	(-0.09)
STD90	POST	-0.00	(-1.42)	-0.00***	(-5.42)	0.00	(0.24)
AF	POST	-0.35	(-0.51)	0.10	(0.34)	-0.26	(-0.33)
DISP	POST	0.19**	(1.96)	-0.01	(-0.54)	0.20***	(3.89)
FE	POST	0.17*	(1.79)	-0.06	(-1.18)	0.23**	(1.99)

Table 6
Consequence of Stopping Guidance: Beaver's U, Abnormal Trading Volume, and Return Volatility
For the Pre-Event Quarter (Q-1) and Post-Event Quarter (Q+1)
(continued)

Notes to Table 6:

For parsimony we report the coefficients on POST only and do not present the intercepts and the coefficients on IMR (the Inverse Mills Ratio).

*,**,***: significant at 10%, 5%, and 1%, one-sided.

Definition of variables:

- POST = Indicator variable coded as 1 for the post-event quarter. For stop firms the event quarter is the stop-guidance announcement quarter for announcers and the first quarterly earnings announcement with no guidance after at least 3 consecutive guidance during the past 4 quarters, and for control firms the 'event' quarter is the matched management forecast quarter.
- U = Beaver's U statistics, $\frac{e_{q,t}^2}{\sigma^2(e_q)}$. The numerator of Beaver's U is the mean squared error of the 3-day market-adjusted returns centered on earnings announcement date, and the denominator is the variance of daily market-adjusted returns of the non-announcement period, where the non-announcement period is defined as the window from two days prior to last quarter's earnings announcement to two days before current quarter's earnings announcement date.
- TVOL = Abnormal trading volume, calculated as the mean 3-day earnings announcement window trading volume scaled by non-announcement period mean trading volume, where the non-announcement period is defined as the window from two days prior to last quarter's earnings announcement to two days before current quarter's earnings announcement.
- STD90 = Standard deviation of daily stock returns for the [-90, -2] window pre-event date and for the [+2, +90] window post-event date, where day 0 is the stop guidance announcement date/first earnings announcement date with no guidance for announcer/quiet firms and the matched management forecast date for control firms.
- AF = Analyst following, measured as the number of analysts giving forecasts for the upcoming quarter, in the quarter before and after the event quarter.
- DISP = Dispersion of analyst forecasts in the quarter before and after the event quarter, measured as the standard deviation of analyst forecasts for upcoming quarter divided by the absolute value of the corresponding mean forecast.
- |FE|= Accuracy of analyst forecasts in the quarter before and after the event quarter, measured as the absolute value of [(actual EPS – mean analyst forecast)/mean analyst forecast]. Because larger |FE| indicates greater deviation of forecast from actual, a bigger number means less accurate.
- IMR = Inverse Mills Ratio obtained from the determinant test in Equation (1).

Table 7 Additional Test – Is There a Penalty to Announcing?

$$\text{Model: } _CAR_{-1,+1} = \alpha + \beta_1 D_{ea} + \beta_2 (D_{ea} \times UE) + \beta_3 QUIET + \beta_4 UE \times QUIET + IMR + \varepsilon$$

Independent variables	(1) Coefficients (t-statistic)	(2) Coefficients (t-statistic)
Intercept	-0.05 (-2.08)	-0.04 (-1.54)
D _{ea}	0.03 (1.11)	0.03 (1.14)
D _{ea} ×UE	4.71 (3.18)	4.94 (3.21)
QUIET	0.04 (2.14)	0.02 (0.56)
QUIET×UE	-4.00 (-2.67)	-4.24 (-2.73)
IMR		-0.01 (-0.44)
Adjusted R ²	16.50%	16.90%

Notes to Table 7:

Definition of variables:

- D_{ea}= indicator variable coded as 1 if an earnings announcement falls in [-1,+1] window centered on the stop-guidance announcement date, 0 otherwise. For the quiet stoppers, this variable is coded as zero.
- UE = unexpected earnings, defined as actual EPS minus the most recent preceding consensus analyst forecast on IBES, scaled by price two days before the earnings announcement date. For the announcer sample, UE is unexpected earnings on the stoppage-announcement dates that coincide with earnings announcement dates. For the quiet stoppers, UE is unexpected earnings on the first quarterly earnings announcement dates with no quarterly earnings guidance given.
- CAR_{-1,1} = three-day cumulative abnormal returns centered on the stop-guidance announcement date for announcers and first earnings announcement date with no quarterly earnings guidance given.
- QUIET = Indicator variable for firms that quietly stop giving quarterly earnings guidance
- IMR = Inverse Mills Ratio obtained from equation (3).