Superstar CEOs[*]

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Abstract

We analyze the impact of winning high-profile tournaments on the subsequent behavior of the tournament winner in the context of chief executive officers of U.S. corporations. We find that the firms of CEOs who achieve "superstar" status via prestigious nationwide awards from the business press subsequently underperform beyond mere mean reversion, both relative to the overall market and relative to a sample of "hypothetical award winners" with matching firm and CEO characteristics. At the same time, award-winning CEOs extract significantly more compensation from their company following the award, both in absolute amounts and relative to other top executives in their firm. They also spend significantly more time and effort on public and private activities outside their company such as assuming board seats or writing books. The incidence of earnings management increases significantly after winning awards. Our results suggest that media-induced superstar culture leads to behavioral distortions beyond mere mean reversion. We also find that the effects are strongest in firms with weak corporate governance, suggesting that firms could prevent the negative consequences.

"The best CEOs love operating their companies and don't prefer going to Business Round Table meetings or playing golf at Augusta National.."

-Warren Buffet, Berkshire Hathaway Inc.[1]

I   Introduction

Tournaments are a prevalent incentive mechanism in numerous markets and organizations. In firms, the prospect of promotion to a more attractive and better compensated position generates incentives for employees to exert effort. A large literature in economics, building on Lazear and Rosen (1981), analyzes the ex-ante incentives induced by compensation schemes that reward individuals based on their ordinal ranking within the organization. However, little attention has been paid to the ex-post behavior of tournament winners. Does their behavior and performance change in ways that destroy value for the principal? And if so, do they merely reduce their effort, reflecting the reduced incentives, or does the behavior of tournament winners change along other dimensions? Finally, is the difference between ex-ante and ex-post behavior the inevitable side product of an optimal incentive contract, or is it more prevalent in firms with poor corporate governance, suggesting that it is at least partly avoidable?

Such questions about the ex-post behavior of tournament winners are particularly pressing if the difference in status or compensation between tournament winners and losers is very large, i.e. in the case of "superstars" in the sense of Rosen (1981). In this paper, we study chief executive officers (CEOs) of U.S. corporations who achieve "superstar" status via high-profile awards from the business press or other prominent organizations. We show that these award-winning CEOs subsequently extract considerably higher compen-

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[1] Quote taken from Lowe (1997).

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sation from their company. They also spend more time and effort on activities outside their company, such as writing their memoirs and other books. These behavioral differences are significant both comparing the behavior of award-winning CEOs before and after the award and comparing award-winning CEOs to a matched sample of non-award winning CEOs with virtually identical personal and firm characteristics and equal past performance. Finally, we show that the companies of superstar CEOs subsequently underperform, both in terms of stock returns and in terms of accounting profits (e.g. return on assets). The underperformance is significant both relative to the overall market and relative to the matched sample of "hypothetical award winners."

The belief that exceptional performers, or tournament winners, subsequently underperform is widely-held in the popular press. In sports, the well-known "Sports Illustrated Jinx" applies to athletes who appear on the cover of *Sports Illustrated* magazine. In the entertainment industry, the term "Sophomore Jinx" refers to successful new performers who do not live up to the quality of their debuts. In academia, Paul Samuelson describes (the vulgar view of) "Nobel Prize Disease" as follows:

> After winners receive the award and adulation, they wither away into vainglorious sterility. More than that, they become pontificating windbags, preaching to the world on ethics and futurology, politics and philosophy. At circular tables, where they sit they believe to be the head of the table.[2]

Most relevant to our context, the business press has coined the term "CEO Disease" to refer to the tendency of CEOs to underperform after achieving the top position in their organization (Byrne, Symonds, and Siler 1991). One interpretation of these purported

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[2]Samuelson, "Is There Life After Nobel Coronation?", http://nobelprize.org/economics/articles/samuelson/index.html.

phenomena is that they are due to mean reversion. Individuals who achieve lofty success likely had extreme positive draws from the process generating their output. Their next few draws are unlikely to meet or exceed their past draws, causing their individual average performance to revert to the population mean. Samuelson's description, however, suggests a deeper phenomenon, caused by changes in behavior after becoming a star. We find that the underperformance of superstar CEOs indeed goes beyond mean reversion and that there is a real effect underlying the observed pattern in performance.

Our sample of superstar CEOs covers all chief executives who received CEO awards from the business press or other prominent organizations. *Business Week* magazine, for example, annually names a list of "Best Managers" in U.S. companies (25 per year since 1996). We compile a data set of CEO awards from ten different sources, covering more than 25 years. To separate underperformance from mean reversion and to have a benchmark for changes in compensation, we employ a first-stage propsenity score and matching estimator following Abadie and Imbens (1994). We construct a matched control sample for the CEO award winners. Using all of the CEOs who appear in Execucomp and their matching firm data from CRSP and Compustat, we run a logit regression to find the determinants of the probability of winning a CEO award. The regression shows that CEO award winners generally are more experienced as CEO, and more likely to be female than their peers. They also preside over larger companies with lower book-to-market ratios and better recent stock price performance. In every month in which one of our awards was conferred, we use the results of this estimation to compute the predicted probability that each CEO in our sample would have won the award. To form the control sample, we match each award-winning firm with the firm that has the predicted value closest to that of the award-winning firm.

We show first that, indeed, there is a decline in performance following CEO awards, measured using stock price performance or accounting profits. Cumulative abnormal returns following a CEO award, for example, are significantly negative over the three year window beginning five days after the publication of the award. Then, in order to distinguish this effect from mean reversion in performance, we compare the performance of the CEO award winners to the performance of our control sample of similar CEOs who did not win awards. We find that CEOs in the control sample do suffer a significant decline in performance after the date they were predicted to win an award. This result holds for both stock and accounting returns. However, this decline, which we can attribute to predictable mean reversion, is significantly smaller than the decline for actual award winners. The stock return results are also robust to alternative specifications of abnormal returns. In particular, we consider the returns to a zero-investment strategy which takes a long position in the stock of CEO award winners and a short position in the predicted winners. We show that the alpha of following this strategy for one, two, or three years (using value or equal weighted returns) is negative in a four factor time-series return regression. It is significant for the three-year horizon.

Returning to the original motivation, we also analyze whether the onset of celebrity status affects the behavior of the CEO in measurable ways. We argue that superstar status increases the CEO's bargaining power within the firm, enabling him to extract significantly higher rents from the company. We observe that the total compensation of award-winning CEOs increases following their awards, despite the decrease in firm performance. Predicted winners do not have a parallel increase, nor do other top executives in the CEO's firm. Further, the increase comes in the form of equity-based compensation, but not additional salary and bonus. And, the increase largely occurs in badly governed firms.

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In addition, superstar status offers many new opportunities to the CEO which may distract him from the business of maximizing shareholder value. The CEO may become increasingly eager and able to extract private benefits from the firm in the form of such perquisites (Jensen and Meckling 1976). We first measure these distraction effects using the tendency of the CEO to author books, typically personal memoirs. Writing books seems unlikely to directly increase firm value.[3] However, the cost to the firm of the time spent composing prose rather than managing firm activities may be substantial. We show that CEOs are more likely to write books after winning an award than they were before winning their award. Second, we show that award-winning CEOs tend to sit on markedly more boards of other corporations. The probability of assuming at least five (or at least four or even at least three) directorships increases significantly. While directorships can have positive side effects for the CEO's company, e.g. networking, more than two or three positions are typically view as distractive and affect negatively corporate governance measures such as the *Corporate Governance Quotient* of *Institutional Shareholder Services*.

Finally, we show that, subsequent to winning an award, the incidence of earnings management increases, maybe, which may reflect heightened pressure to maintain "superstar performance." We show that award-winning CEOs are significantly more likely to exactly meet analyst forecasts than they were before the award and than CEOs who do not win awards. Further the distribution of earnings surprises is less symmetric around zero (and more skewed to the left) for award winning CEOs than other CEOs. Both are typically interpreted as signs of earnings managment (if not earnings manipulations).

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[3]One possible exception would be if, e.g., Charles Schwab wrote a book giving investment advice. However, such examples are rare and typically industry specific. Our estimations will control for industry effects.

Finally, award-winning CEOs are significantly more likely to have negative earnings once five years have passed from their last award than other CEOs.

All of these results suggest a mechanism by which superstar status has real effects on performance. Further, the distortions induced by celebrity status may have important implications for corporate governance. In particular, it may be desirable to design incentive schemes which do not break down ex post, once the CEO has "won the tournament."

II   Data

The core of our data set is a hand-collected list of the winners of CEO awards between 1975 and 2002. A variety of publications and organizations conferred awards on CEOs during our sample period: *Business Week, Financial World, Chief Executive, Forbes, Industry Week,* Morningstar.com*, Time, Time/CNN, Electronic Business Magazine,* and Ernst & Young. Below we briefly describe the key features of each of the awards. The two predominant sources for our CEO awards are *Business Week* and *Financial World.* Figure 1 presents a histogram of the CEO awards by sample year.

Business Week (circulation: 970,000). There are two types of *Business Week* awards: Best Manager and Best Entrepreneur. The winners are chosen annually by the editorial staff of the magazine. The awards were first given in 1988 and continue to the present. The total number of Best Manager winners during our sample period is 230. Between 1992 and 1995, there were roughly 15 winners per year. Beginning in 1996, however, the magazine switched the format to the 25 top managers of the year. The Best Entrepreneur awards were much less consistent over the sample period. There were 58 winners in total. No winners were chosen in 1992 or 2000 and the number of winners in the remaining

years was quite variable, ranging from 3 to 10.

Financial World (circulation: 430,000). Financial World ceased publication in 1997, but published an annual "CEOs of the Year" list, chosen by the magazine's editorial staff, for more than 20 years prior to 1997. The CEOs of the Year were classified into 4 categories: "Gold," "Silver," "Bronze," and "Certificates of Distinction." There was 1 Bronze winner chosen per industry. The magazine's division of industries evolved over the years, however, there were always roughly 60. There were also 2 Certificate of Distinction winners per industry. Since we are interested in "superstars" and there are relatively many recipients of these honors per year, we exclude these two categories of the awards from our analysis. That is, we restrict attention to the Gold and Silver winners. There was 1 Gold winner per year – the CEO of the Year. Up to 1994, there were approximately 10 Silver winners each year. In 1995 and 1996, the magazine awarded 1 Silver award per industry. We check the robustness of our results to excluding these two anomalous years. In 1997, the magazine only awarded 5 Silver awards.

Chief Executive (circulation: 42,000). Chief Executive magazine has chosen a CEO of the Year each year since 1987. The magazine's intended audience is CEOs and the award is chosen by a panel of CEOs.

Forbes (circulation 910,000). Forbes began publishing a list of "Best Performing CEOs," selected by the editorial staff, in 2001. There were 5 winners in 2001 and 10 winners in 2002.

Industry Week (circulation: 250,000). The *Industry Week* awards are chosen based on a CEO survey. Prior to 1993, there was no consistent format for the awards. In 1986 and 1987, winners were chosen in each of 4 categories: "Consumer Goods Companies" (2 per year), "Finance and Other Companies" (3 in 1986; 2 in 1987), "High-Tech Companies"

(3 in 1986; 4 in 1987) and "Heavy Industry Companies" (4 per year). In 1989 and 1991, the awards had only two categories: "Industrial Sector" (6 per year) and "Services Sector" (6 per year). Starting in 1993, the magazine stopped dividing the winners into categories. In 1994, there were 3 winners and in 1995 5 winners, but otherwise there has been a single CEO of the Year named each year.

Morningstar.com. Morningstar.com began naming a CEO of the year, chosen by the editorial staff, in 1999. There have been two winners twice (1999 and 2001) and a single winner in each of the remaining years.

Time (circulation: 4,000,000). Time magazine has awarded a "Person of the Year" each year for more than 50 years. The winners are chosen by the editorial staff and three times since 1975 (in 1991, 1997, and 1999) the honor has gone to a CEO.

Time/CNN. In 2001, *Time* together with CNN compiled a list of the 25 Most Influential Global Executives.

Electronic Business Magazine (circulation: 65,000). Electronic Business Magazine has awarded a CEO of the Year, chosen by the editorial staff, each year since 1997.

Ernst & Young. Ernst & Young has awarded an "Entrepreneur of the Year" each year since 1989. The winners are chosen by a panel of independent judges. Three times there have been multiple winners in a year: 1990 (2), 1994 (3), and 1997 (2).

Our strategy is to relate CEO behavior and company performance to the incidence of CEO awards. Specifically, we argue that winning an award proxies for the onset of "superstar" status. CEO celebrity, in turn, allows the CEO to extract higher rents from the company and to engage in activities which may provide him with private benefits, but distract attention away from the business of the firm. Ultimately, these distortions lead

to decreased firm performance, both in absolute terms and relative to similar companies whose chief executives did not become celebrities.

To test these hypotheses, we match our CEO award data both with additional data on the characteristics of CEOs (both award winners and non-award winners) and with data on firm characteristics and performance. We obtain CEO data from the Compustat Execucomp database. This data set contains demographic and compensation data for all of the CEOs of firms in the S&P 500, S&P MidCap 400 and S&P SmallCap 600 since 1992. It also records this data for the 4 other highest paid executives in each firm. We use this data to construct two measures of CEO power. First, we construct the ratio of CEO total compensation (tdc1), including stock option and restricted stock grants during the fiscal year, to total compensation of the next highest paid executive in the firm. And, second, we construct the ratio of CEO cash compensation (tcc) to cash compensation of the next highest paid executive in the firm. Due to the necessity of CEO data to our analysis, we restrict our attention only to firms in the Execucomp universe.

To measure company characteristics and performance, we merge in data from CRSP and Compustat. When we look at accounting quantities, we define firm size as the natural logarithm of total sales (item 12) taken at the beginning of the fiscal year.[4] Return on assets is calculated as income before extraordinary items (item 18) over assets (item 6). In the returns data, we define firm size as market equity (price * shares outstanding). We define book-to-market as book equity over market equity. Book equity is stockholders' equity (item 216) (if available, else book value of common equity (item 60) + par value of preferred stock (item 130) or assets (item 6) - total liabilities (item 181) [in that order])

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[4]The results are the same using the natural logarithm of assets (item 6) at the beginning of the fiscal year as a proxy for firm size.

+ balance sheet deferred taxes and investment tax credit (item 35), if available, minus the book value of preferred stock (redemption (item 56), liquidation (item 10), or par value (item 130) [in that order] depending on availability). We also merge in the Fama-French return factors. The Fama-French SMB and HML factors are constructed using the six Fama-French value-weighted portfolios formed on size and book-to-market. SMB (Small Minus Big) is the average return on the three small portfolios minus the average return on the three big portfolios. HML (High Minus Low) is the average return on the two value portfolios minus the average return on the two growth portfolios. Rm-Rf, the excess return on the market, is the value-weighted return on all NYSE, AMEX, and NASDAQ stocks (from CRSP) minus the one-month Treasury bill rate (from Ibbotson Associates). UMD (Up Minus Down) is constructed using the six Fama-French value-weighted portfolios formed on size and 2-12 month prior returns. UMD is the average return on the two high prior return portfolios minus the average return on the two low prior return portfolios.

We also merge in additional hand-collected data on books and outside board seats that enables us to measure the CEO's propensity to undertake tasks that distract from maximizing profits. We collect data on books authored by CEOs in our sample using listings on Barnes and Noble.com. The searches use the CEO's name in the author field under the following categories of publications: Management & Leadership, Business Biography, General & Miscellaneous, Careers & Employment, Business History, Economics, Women in Business, International Business, Professional & Corporate Finance, and Human Resources.

Finally, we match earnings announcement data with our awards data set. The earnings data is described in detail in DellaVigna and Pollet (2004). We use the cumulative

abnormal returns on the day of and day following the firms' earnings announcements, an indicator of negative earnings, and a measure of the earnings surprise over the consensus analyst forecast (and, specifically, an indicator for exactly matching the earnings forecast). This data allows us to further analyze the change in performance after CEOs attain superstar status, particularly as it relates to investors' expectations.

Table 1 gives summary statistics of the data for the overall sample and for the subsample of CEO award winners. Panel I shows the summary statistics for variables that we use in monthly return regressions, while Panel II shows the summary statistics for variables we use at the annual frequency. As a first pass in understanding the determinants of CEO award winners, it is interesting to note that in years (or months) in which a CEO wins an award they have, on average, more company ownership, higher compensation, and longer tenure than their peers. They are also more likely to be female. Their companies are typically larger, have lower book-to-market, higher returns over the past year (subdivided into months 2-3, 4-6, and 7-12), higher sales, higher ROA, and more shares outstanding.

III Performance Following CEO Awards

A Stock Returns

Our goal is to understand the effect of superstar status, measured by winning CEO awards, on the subsequent performance of top executives and their companies. As a first step, we measure how investors react when the CEO of a publicly traded company wins an award over the three years following the award date. For the magazine awards, we use

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the cover date of the magazine in which the award recipients were published as the award date. For awards conferred by an organization, we use the date they publicly announced the winners. To measure investor reaction, we compute the cumulative abnormal returns around the award date over several intervals. We calculate the abnormal returns using the standard market model and estimating α and β for the award winning firms using the three years ending 23 trading days prior to the event. As event windows, we consider first the short run investor reaction over the 11 trading days surrounding the award announcement, or days [-5,+5] with day 0 as the event date. We then consider the long run reaction over the next year ([+6,+255]), two years ([+6,+510]), and three years ([+6,+765]) following the award.

In Part I of Table 3, we present the results. There are no significant effects in the short run, i.e. over the [-5,+5] window. The lack of any short run announcement effect may be due to the imprecision of the magazine cover date as a measure of when information about the CEO award becomes public. Even abstracting from the possibility of press releases naming the winners prior to the magazine's release, magazines often mail well in advance of their cover date. Unfortunately, there is no objective way to more precisely measure the true date the winners' identities became public information. However, in the long run, company stock significantly depreciates. We find negative cumulative abnormal performance over a 1, 2, or 3 year interval following the award. Thus, firm performance, measured using stock return data, is lower once a CEO attains celebrity status.

Even though we use three years to compute each firm's alpha and exclude the month prior to the award from the calculation, abnormal performance preceding the award (i.e. unusually high alphas) may lead us to overstate expected returns in the standard market

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model framework. Relatively small positive errors in the estimated alphas could lead to a large downward bias on the long run cumulative abnormal returns since they are multiplied by the length of the event window. As a robustness check of the market model results, then, we recompute cumulative abnormal returns adjusting only for beta times market returns (i.e. assuming $\alpha = 0$ for all firms). Our conclusion is the same. Over three years, we find a negative cumulative abnormal return of 4.2% following an award. Over the window [+256,+765], the magnitude of the negative return effect is slightly over 5%. This more conservative calculation provides a lower bound for the negative effect of CEO awards on stock performance. In the remainder of the paper, we will largely side-step the issue of imprecision in the cumulative abnormal return calculation by benchmarking performance of award-winning CEOs with a matched sample of similar CEOs who did not receive an award.

B Return on Assets

Next we consider whether we can observe a similar decline in performance following awards measured using accounting, rather than stock return, data. Specifically, we consider whether the return on assets also declines in the three years following a CEO award. The returns estimations above may confound two effects, the correction of potential stock price overreaction (if CEO awards typically go to high performers) and the loss in value due to diminished managerial performance. Further, the joint hypothesis problem, as in all long run event studies, may cloud the interpretation of the results. Measuring the effect using accounting returns allows us to circumvent these problems. A decline in return on assets following CEO awards captures only the decline in real performance.

In the left panel of Figure 2, we show that there is a pronounced decline in return on assets even simply comparing mean ROA the year preceding a CEO award to the year after. Mean ROA declines from 7.6% at the end of the fiscal year preceding the award year to 6.2% at the end of the fiscal year following the award year. The mean difference in ROA is statistically significant at the 10% level. The effect also stands up to a more rigorous regression framework. In columns 1, 3, and 5 of Table 4, we look at return on assets over three different windows around a CEO award: (1) the fiscal year preceding the award through the fiscal year following the award, (2) the fiscal year preceding the award through the fiscal year two years after the award, and (3) the fiscal year preceding the award through the fiscal year three years after the award. We regress ROA over each window on firm size, the lagged value of ROA, firm fixed effects, year fixed effects and a dummy variable for the post-award fiscal year(s). This dummy variable allows us to identify the change in ROA following the award year. We find that ROA declines over all three windows. Over the three years following an award year, ROA is roughly two and a quarter percentage points lower than in the year preceding and year of the CEO award. Again, firm performance deteriorates following the CEO award and, here, we can conclude that the deterioration is not simply a correction of market over-reaction.

IV   Isolating Mean Reversion

One issue that complicates the interpretation of our results thus far is mean reversion. Under this alternative explanation, CEOs tend to "win the tournament" due to draws of earnings or returns from the extreme upper tail of the distribution of those variables. Their subsequent draws will tend to be lower, bringing their average closer to the mean of the distribution. Of course, this general argument is not enough to gen-

erate mean reversion in stock returns. This effect requires some market inefficiency, as arbitrageurs should exploit any predictability in future returns based on past price information. Nevertheless, empirically, De Bondt and Thaler (1985) and Fama and French (1988) document mean reversion in portfolios of stocks with extreme performance over the past three to five years. Thus, it is possible that this known pattern in returns is responsible for the long run underperformance we document following CEO awards. To address this issue, we construct a sample of similar firms to our award winners at the time of each award, but in which the CEO did not win the award. We then compare the long run performance in our sample of actual award winners to the long run performance of these predicted winners. If the long run underperformance of award winners were due to mean reversion, then we should find little difference across the two samples.

To construct our matching sample of predicted award winners, we run a logit regression of CEO awards on firm and CEO characteristics. We consider every point in time at which one of our awards was granted (e.g. January of each year for the Business Week awards). We take all firms in our sample in these "award months" and construct the dependent variable to be one for all of the firms whose CEO did win the award granted in that month. We then regress this award indicator on controls for firm and CEO characteristics. We include firm size (market capitalization at the beginning of the month before the award), book-to-market at the end of the last fiscal year which ended at least 6 months prior to the award month, returns two to three months before the award month, returns four to six months before the award month, and returns seven to twelve months before the award month. These regressors are standard in cross-sectional return regressions and have been used, for example, by Brennan, Chordia, and Subrahmanyam (1998) and Gompers, Ishii, and Metrick (2003). We also include the

48 Fama and French industry dummies[5], year dummies, and award type dummies in the regression. The award type dummies control for variation in the number of winners across the various awards, which shifts the baseline probability that a CEO will be named the winner. So, for example, any award month that corresponds to a Business Week award (January of every sample year) will receive a 1 for the Business Week dummy, while all other award months will receive a 0. Finally, we control for the possibility of differential probabilities of winning an award based on CEO tenure and gender. CEO tenure is included to capture experience. Though we would like to include CEO age as an additional control for this effect, missing Execucomp data would require us to drop roughly $\frac{2}{3}$ of our observations. Further, the missing age data in Execucomp is not random.

Table 2 presents the results of this logit regression in the form of odds ratios. The estimates are interesting beyond helping us to construct a matching control sample for the return regressions, as they give us some insight into the type of CEOs who win awards (and attain celebrity status). Not surprisingly, we find that CEOs of larger firms with lower book-to-market ratios and higher past returns are significantly more likely to win awards. More interestingly, we find the CEO characteristics have significant predictive power. CEOs with more experience in their firm are significantly more likely to win awards. And, female CEOs are roughly four times as likely to win awards as their male counterparts, controlling for the other firm and CEO characteristics.[6]

Then, using the coefficient estimates from this regression, we compute the predicted

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[5]See Ken French's website (http://mba.tuck.dartmouth.edu/pages/faculty/ken.french/data_library.html) for definitions.

[6]We should note that there are only 5 female award winners in the sample, so this effect should be interpreted with caution.

probability that each firm would be an award winner in each award month. To form our matching sample, we consider each award month. To each actual award winner, we match as "hypothetical award winner" the firm with the predicted value closest to that of the actual award winner. This procedure ensures that the control sample is as similar as possible along all CEO-specific and firm-specific dimensions that affect whether a CEO wins an award.

Table 1 provides the summary statistics for the sample of predicted award winners, side-by-side with the summary statistics for the actual CEO award winners. The statistics for the predicted award winners closely resemble those of the actual award winners, suggesting that the matching technique captures similarities between the matched companies along a multitude of dimensions, including many not explicitly in the logit model. Since we could never explicitly include every factor that could conceivably impact the probability of winning an award, the congruence of the predicted and award samples after controlling for the most obvious award predictors is reassuring. Notably, we consider two proxies for earning manipulation: net operating assets (or "balance sheet bloat") and accruals. The definitions of both variables follow Hirshleifer, Hou, Teoh, and Zhang (2004). We see no significant differences in these measures of earnings management between award winners and predicted award winners in the last fiscal year that ends prior to the award month.[7]

The next step is to estimate return and ROA regressions, using the same specifications as above, but for our sample of predicted award winners. In Part I of Table 3, we present

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[7]There are still some measurable differences. There is a significant difference between the percentage of CEOs who are also President and Chairman of the Board between the award winner and predicted winner samples. However, we find that the return difference actually gets *stronger* when we include the accumulation of titles as an additional control in the first stage logit regression, including making the return difference in the first year following the award significant.

the short and long run cumulative abnormal returns around the date on which the control firms were predicted to have won an award. For example, a predicted Business Week winner in 1992 would have the event date January 13, 1992, the cover date of the Business Week issue containing the awards in 1992. Like the CEO award winners, our control firms have no significant abnormal performance over the [-5,+5] window. Indeed, their performance is nearly identical to the actual award winners over this interval. They also, like the award winners, exhibit long run underperformance over the next three years. This effect, then, gives us a measure of the effect of mean reversion in stock returns in the *type of firm* in which the CEO wins an award.[8] Our main interest, however, is the difference in performance between the portfolios of CEO award winners and predicted winners. Part II of Table 3 shows this divergence in performance over the three years following the award. In Panel B, we compute the differences in the market model cumulative abnormal returns of the award winners and predicted winners. The amount by which award winning CEOs under-perform predicted winners increases over time and is statistically significant at the 5% level over both the two and three year horizons. In Panel A, we show the average monthly value-weighted portfolio returns to the zero investment strategy that is long award winners and short predicted winners.[9] Over three years, the average monthly return is a statistically significant negative 33 basis points. Thus, cumulatively, the winners underperform predicted winners by roughly 12% over the three years following the award month.[10] Though our first stage logit should choose

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[8] Adjusting only for beta times market returns, we find that the three year cumulative abnormal returns following a predicted award are only -57 basis points. Over only years two and three, the CARs are *positive* 25 basis points.

[9] To eliminate the effects of CEO succession on returns, we drop firms from the portfolio when the (predicted) award-winning CEO leaves the company.

[10] This strategy is not fully implementable due to the fact that we pool all of the award dates into a single logit regression. Thus, the coefficients used to predict the probability of winning an award

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a matched sample with equal exposure to risk factors in stock returns, we nevertheless test whether exposure to the four Fama and French factors (rmrf, smb, hml, and umd) can explain the negative returns to the difference portfolio. Panel C shows the results. Controlling for residual exposure to the return factors has virtually no impact on the portfolio alphas. Award winners still underperform predicted winners by 29 basis points (or roughly10.5%) over the three years following the award month.

Finally, we compare the changes in ROA after a predicted award to the changes in ROA following an actual award that we estimated in Section B. In the right panel of Figure 2, we show the mean ROA for the year before a predicted award and the mean ROA for the year after. The decline in ROA amounts to only 0.4% (rather than 1.4% for the actual award winners). And, the mean difference in ROA is not statistically significant. We also run the ROA regressions from Section B using the year of predicted awards rather than actual awards as the "event year" (Table 4, columns 2, 4, and 6). We find that predicted award winners do not experience the same significant decline in performance over any horizon. Our hypothesis is that the breakdown of tournament incentives after the CEO attains superstar status can explain the additional underperformance of award winners beyond predicted winners, both in stock returns and earnings.

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may incorporate some future information. This approach is still the right one for us to take for two reasons: (1) we are not trying to construct a profitable investment strategy, but instead to separate as precisely as possible the effects of mean reversion from extraction/distraction. Thus, we want to use as much information as possible to construct the best matching sample we can. And, (2), the most natural fully implementable alternative, estimating a separate first stage logit for each "award month" using only data from that month and before, is not feasible. For several awards, e.g. Chief Executive magazine, there is only one winner in any particular award month. Thus, the first stage logit could not be identified. Even in the cases with multiple winners, often the number is not sufficiently large to make the results of such a regression valid.

V Changes in Behavior

Thus far, we have provided evidence that award winning CEOs underperform after becoming celebrities, even beyond the effects of mean reversion. However, the crux of our paper is to understand why these performance results might arise. Specifically, what does the CEO do differently after "winning the tournament" compared to what he did before? And, are the behavioral differences we observe along dimensions that well-governed firms typically try to limit? We subdivide our arguments as follows: First, we consider whether CEOs are able to extract more rents from the company after winning awards than they could before. This extraction could occur in the form of increased compensation, but could also be in more subtle forms like increases in firm contributions to the CEO's favorite charities, increases in the frequency and size of corporate loans to the CEO, or initiation of costly sports stadium sponsorships. Second, we consider whether the CEO becomes distracted by the additional opportunities afforded by celebrity status. The CEO may focus his attention on maintaining this status and taking advantage of the perks it offers rather than maximizing firm value. Possible examples include sitting on numerous outside boards, sitting on the Conference Board (or taking on other prominent consulting positions), and writing his personal memoirs. Third, we consider whether the CEO, due to heightened expectations in the market and among analysts, increases his manipulation of corporate earnings.

A Extraction

The most obvious way for a superstar CEO to extract additional rents from the company is through increased compensation. First, we simply examine the mean of total

CEO compensation (including the value of restricted stock grants and the Black-Scholes value of stock option grants during the fiscal year) and CEO cash compensation (salary and bonus) in the year before and year following the award. We make this calculation both for our CEO award winners and for the predicted award winners defined in Section IV. The results are in Figures 3.a and 3.b. While both actual and hypothetical award winners experience an increase in cash compensation of 12-16%[11], award winners extract significantly more total compensation via stocks and options. The increase in total compensation from the year before to the year following their award is 39% for award winners, while predicted award winners enjoy a much smaller increase of 18%. Award winning CEOs are not able to obtain increased cash compensation beyond what is typical among CEOs with similar performance prior to the award year (controlling for demographics and firm characteristics). However, they do obtain substantial increases in equity-based compensation over similar performing CEOs. These results are consistent with the Bebchuk and Fried (2003) rent extraction theory of executive compensation: celebrity status increases the power of the CEO to extract rents, but rent extraction is most likely to occur in the form of equity-based compensation (and particularly stock option grants) since these less transparent forms of compensation are less likely to violate the shareholders' "outrage constraint."

Next, we more formally measure the effects of CEO awards on compensation. To do so, we follow an approach parallel to the ROA regressions of Section B. Here, the dependent variable in the regressions is the natural logarithm of total CEO compensation or CEO cash compensation (salary and bonus). The control variables are firm size,

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[11]The mean difference for actual award winners is not statistically significant. It is significant at 1% for the predicted winners. However, if we use natural logarithms instead of levels, neither increase is statistically significant.

return on assets (as a performance measure), CEO tenure, CEO gender, and year and firm effects. We examine the difference in the dependent variable in the one, two, or three years following an award year relative to the level of the dependent variable in the year prior to and year of the award. We make this comparison both for actual CEO award winners and for our sample of predicted winners. Table 5 presents the results with total compensation as the dependent variable and Table 6 the results using cash compensation. The pattern is exactly what we saw in the means: Award winners obtain significantly higher total compensation in the year following the award. Predicted award winners, on the other hand, show no significant difference in total compensation following their predicted award year. Moreover, the results become stronger if we include age as an additional control variable, as is standard in compensation regressions. As explained above, including age comes at the cost of reducing our sample by roughly $\frac{2}{3}$. Though the selection is not random, it is the same for both the award winner and predicted winner samples. For cash compensation, only predicted award winners show any evidence of an increase, and, even there, the effect is typically not significant. Further, adding age as a control has only a negligible impact on the results (and kills the one significant result in the predicted sample).

We also consider the ratio of CEO compensation (total or cash) to compensation of the next highest paid executive within the firm (Hayward and Hambrick (1997)). We consider changes in the compensation ratio following actual CEO awards and predicted CEO awards. Here the differences in means the year before and year after an award (real or predicted) do not tell the full story, but nevertheless suggest the regression results to follow. In Figure 4.a, we see that the ratio of CEO cash compensation to cash compensation of the next highest paid executive in the firm. Here, the ratio increases by 9.6% after a CEO award, but only by 3.2% after a predicted award. This apparent

increase for award winners, however, is driven by one extreme outlier observation that is more than 14 standard deviations from the mean. The median ratios before and after the award differ by roughly 0.013 (or 1%). In Figure 4.b, we consider the ratio of CEO total compensation to total compensation of the next highest paid executive in the firm. We find that this ratio increases by approximately 11.3% from the year preceding to the year following a CEO award. For predicted awards, on the other hand, the ratio decreases by roughly 0.5%. CEO compensation, then, appears to increase relative to the next highest paid executive in the firm. Or, viewed differently, other top executives do not share in the windfall of equity-based compensation enjoyed by the award-winning CEO.

To include controls, we estimate the same regressions as for the level of compensation, but substitute the log of the total or cash compensation ratio as the dependent variable. Tables 7 and 8 present the results. Controlling for firm size, return on assets, CEO gender, CEO tenure, and firm and year effects, we see that, like with compensation levels, it is the total compensation ratio that increases the most following CEO awards, and particularly in the year to two years following the award. The size of the coefficient is about halved in regressions comparing the ratio before and after a predicted CEO award. Again, the results become stronger including age as an additional control. For the cash compensation ratio, the predicted winners appear to experience a significant increase (while the actual winners do not); however, adding age as a control completely reverses the result. Therefore, it is difficult to draw any firm conclusions.

The results are again consistent with a rent extraction story. We already saw that CEO total compensation increases following an award, but not a predicted award. Now we see that total compensation of the next highest paid executive within the company

does not keep pace with the CEO's compensation. Though, undoubtedly, the whole team of executives shares responsibility for the past success of the company, it is mostly the CEO who reaps the rewards in total compensation. The increases in equity-based compensation enjoyed by the CEO are not shared by other top executives in the firm.

More generally, our compensation results provide compelling evidence in favor of the rent extraction explanation for the explosion in stock option grants in the 1990s. CEO awards increase the bargaining power of the CEO within the organization, evidenced by the increase in compensation relative to other executives. Though CEOs appear unable to use this new power to increase their salary and bonus, they are able to obtain large increases in equity-based compensation that are not observed in companies with similar performance, but without a shift in CEO power.

To take this argument a step further, we examine whether CEOs who also hold the titles President and Chairman of the Board are able to extract more compensation following an award than other CEOs. That is, do CEOs with a greater degree of autonomy – and less monitoring by other high-ranking company executives – extract more rents from the company given the opportunity afforded by their awards? Table 9 presents the results of re-estimating the compensation regressions of this section including a dummy for holding all three titles and its interaction with the indicator variable for the year following a CEO award. Due to space limitations, we only consider the window from the year before to the year following the CEO award; however, we have already seen in the compensation regressions that the bulk of extra (equity-based) compensation is extracted in the year immediately following the award anyway. We find that both the increase in total compensation and (especially) the increase in the ratio of total compensation to the next highest paid executive are due primarily to CEOs who also hold the titles

of President and Chairman of the Board. This evidence, again, supports the view that the increase in compensation following CEO awards is a case of CEOs opportunistically extracting rents from the company.

Finally, we use the Governance Index (GIM) of Gompers, Ishii, and Metrick (2003) and the institutional blockholder data from Cremers and Nair (2004) to measure the impact of corporate governance on the changes in CEO compensation following awards. The first measure broadly captures shareholder rights, and particularly variation in the likelihood of takeover. We split our sample at the median value of the index (9) and re-estimate the compensation regressions separately on the "good" (low index values) and "bad" (high index values) subsamples. The second measure (the presence of an institutional blockholder with ownership of at least 5% of the company's outstanding shares) captures heterogeneity in the incentives for monitoring. Here the natural split is to consider firms without a blockholder (bad governance) versus firms with a blockholder (good governance). Again, we estimate the compensation regressions separately on each subsample. Table 10 presents the results. Here we show only the window from the year before to the second year following the award, but the results are similar on the other two windows. We find that the increases in total compensation and the ratio of total compensation to total compensation of the next highest paid executive in the firm are concentrated in the firms with bad governance. Statistically, the GIM measure gives more robust results for the ratio and the blockholder measure for the level of total compensation; however, the pattern is the same under both measures. Interestingly, we even begin to see some (weak) evidence of an increase in cash compensation and especially the ratio of cash compensation to the cash compensation of the next highest paid executive when we focus attention on firms with weak corporate governance (particularly under the GIM measure).

Overall, then, the evidence is most consistent with superstar status increasing the ability of CEOs to extract compensation from their firm. Generally, this extraction takes the form of increases in equity-based pay and is greatest among powerful CEOs and in weakly governed firms. Moreover even cash may be extracted in weakly governed firms.

B Distraction

In introducing this section, we highlighted a number of opportunities celebrity status might afford a CEO, but which could distract from his primary responsibility of maximizing firm value. Here, we focus on CEOs writing their memoirs and other books and on the number of directorship on corporate boards a CEO assumes.

An advantage of the first example – CEOs writing their memoirs and other books – is that it is quite challenging to think of a reason it would be value maximizing from the firm's perspective to have their award-winning CEO spending his time authoring books. In addition, writing a book is likely to be quite time-consuming. So, it is plausible that it alone could distract enough attention away from firm business to affect ultimate performance.

In Figure 5a we illustrate how the likelihood of writing a book increases with the number of awards a CEO has won in the past. The baseline probability of a CEO writing a book in any given firm year is (obviously) low (0.0037). However, having won even one award in the past already nearly doubles the likelihood of authoring a book. For the biggest superstars – those CEOs who have won five or more awards in the past – the likelihood of writing a book in a given firm year is nearly ten times higher than the baseline probability in the full sample of CEO years.

Moving to a regression context, we regress an indicator for writing a book on having won at least 1, 2, 3, 4, or 5 awards in the past (respectively) along with firm size, CEO age, CEO tenure, firm or CEO effects, and year effects. The pattern of the coefficients mirrors Figure 5a. We find that having won any number of awards in the past significantly increases the likelihood a CEO will write a book and that the coefficient estimates increase nearly monotonically with the number of awards the CEO is required to have won in the past to be in the treatment group. Table 11a presents the results.

We perform a parallel analysis for the number of board seats a CEO assumes. Having a CEO serve on boards of other companies may certainly benefit the CEO's company to some extent, for example as a networking device. Directorship require, however, also a considerable amount of time. As a director, the CEO has to spend time preparing board meetings, travelling to meetings, and communicating outside the meetings with the CEO and other board members about company issues. Following corporate governance ratings and best practices guidelines from watchdogs such as the *Institutional Shareholder Services* (ISS) we consider five or more (and, alternatively, four or more and three or more) board seats as distractive. In practice these or higher numbers of board seats negatively affect corporate governance measures such as the *Corporate Governance Quotient* of ISS.

Accordingly we code a binary variable equal to one for CEO-years in which a CEO sits on at least five boards (and, alternatively, on at least four boards or on at least three boards). Since the data on board seats is only available from 1994 on, we use the period of 1994 to 2002 for this analysis. For this period, 17.8% of our firm-year observations have CEOs with at least three board seats, 8.0% are CEOs with at least four seats, and 3.4% are CEOs with five or more seats. As Figure 5b demonstrates for the case of

five board seats, the frequency of "excessive directorships" is considerably higher among past award winners. Among CEOs with three awards, the probability goes from 3% to 8%, and for CEOs with five awards it goes up to about 13%. The regression results in Table 11b mirror these findings.

Thus, indeed we have evidence that celebrity CEOs undertake tasks that are likely orthogonal to firm value maximization, but which may very well consume time and resources more efficiently applied to the task of managing the company.

C Meeting Heightened Expectations

One external effect of having an award-winning CEO is that market and analyst expectations for future firm performance likely increase. If CEOs use their celebrity status to extract rents from the firm and allow the perks of success to distract them from effectively running the company, then they may find it increasingly difficult to meet or exceed these expectations. However, repeatedly underperforming expectations is likely a sure-fire way for the CEO to undermine his celebrity status. Thus, we hypothesize that celebrity CEOs may be more likely to manipulate earnings than other CEOs.

One implication of this story is that the average announcement effect around earnings announcements should decline following the onset of celebrity status. To test for this effect, we consider the subsample of CEOs who ever win an award. We then regress cumulative abnormal returns on the day of and day following each earnings announcement on a dummy variable that takes the value 1 for all years after the CEO wins his first award. We also include a variety of controls, including firm size, year and month effects, and industry effects. We find that CEOs indeed have a harder time meeting market

expectations after they become celebrities: the coefficient on the post-award dummy is negative and significant (Table 12). However, the statistical significance of the effect disappears when we introduce firm effects as controls.

Next, we measure the propensity of superstar CEOs to "manage" earnings relative to all other CEOs in our data set. We follow the approach of DeGeorge, Patel, and Zeckhauser (1999) and interpret cases in which the firm exactly meets the consensus analyst earnings forecast as earnings management. Figure 6 illustrates the probability of earnings management (or a zero earnings surprise) conditional on the number of awards a CEO has won in the past. We find that the frequency of earnings management increases quickly with the number of awards a CEO has won in the past. The effect is already substantial after a CEO wins his first award: an increase of roughly 0.03 (or 20%) in the frequency. Once we get to CEOs who have won four or more awards in the past, the frequency is more than double the baseline frequency among CEOs who have never won an award. These results provide confirmation of our negative interpretation of CEO celebrity. The trappings of celebrity status – entrenchment and the opportunity to extract rents and partake in distracting perks – are likely to increase with the number of awards. As an extreme example, a CEO who wins a single *Financial World* Silver award probably falls well below a CEO who wins *Chief Executive* CEO of the Year four times.

In Table 13 we translate the increase in earnings management into a regression framework. In the table we report the results using a dummy that indicates a CEO has won four or more awards in the past. However, the results are similar if we use a dummy for 1, 2, 3, or 5 past awards instead.[12] From the table we conclude that the increase in earnings management among celebrity CEOs is a robust finding: it survives the inclusion of

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[12]In some cases, the coefficient on the dummy is not significant in the fixed effects specification. Otherwise, the results go through.

controls for year and month effects, size effects, industry and firm effects, and number of analysts covering the firm. The firm effects specification is particularly important since it shows that within CEO, earnings management increases as celebrity status increases.

Of course increased frequency of zero earnings surprise by itself is not enough to conclude that celebrity CEOs manage earnings more than other CEOs. One possible alternative explanation for the results so far is that having a celebrity CEO increases the attention paid to the firm and therefore the quality of analysts' earnings forecasts. Figure 7 shows the entire distribution of earnings surprises for CEO years after a CEO has won an award versus CEO years with no history of awards. Not only do CEO winners have an increased frequency of exactly zero earnings surprises, but the entire distribution is also more asymmetric around zero. That is, among celebrity CEOs there is an even larger concentration at 1 penny above zero than at 1 penny below zero than there is for CEOs who have never won awards. This finding suggests that these CEOs are indeed "cooking the books" to ensure that they come in just at or above the consensus analyst forecast.

Given these earnings management results, we ask the question of whether this struggle to meet expectations ever catches up with the superstar CEOs, particularly in light of the increases in destructive behavior explored above. That is, can we find the point at which they can no longer manipulate their situation to keep outside impressions high and the "bubble" bursts? In Table 14, we consider the probability of a CEO reporting negative earnings. Since only 9.5% of earnings announcements are negative in our sample, this test captures extreme turnarounds for the once over-achieving CEOs. We include a series of dummies for whether the CEO won his last award 1, 2, 3, 4, or 5 years ago. We also include a dummy that indicates whether it has been more than 5 years since the CEO's last award. Finally, we include a variety of controls: year and month effects, size effects,

and industry and firm effects. There is little difference between the likelihood of negative earnings in the first five years after a CEO's last award and other CEO years (with the fourth year being the sole possible exception). However, once it has been more than five years since the last award, we see a robust and statistically significant increase in the likelihood of reporting negative earnings. Together with our earnings management results, this finding suggests that celebrity CEOs fight for as long as they can to keep earnings above relevant thresholds and remain in the good graces of the market until eventually things simply collapse. To highlight two extreme examples, both Ken Lay of Enron and Bernard Ebbers of Worldcom were award-winning CEOs at one point in our sample.

VI   Conclusion

Tournaments may be an efficient way to provide ex ante incentives for employees to exert maximal effort. However, there has been little emphasis in the literature on understanding the effects of winning the tournament on ex post performance. In this paper, we provide evidence that this question indeed warrants further study.

We show that CEOs who win awards exhibit drastic changes in behavior and performance:

- Firms with award winning CEOs suffer declining performance. This decline is observed in stock performance for the three years following the award, in return on assets over the same horizon, and in the ability to meet market earnings expectations. The decline is also observed both relative to the firm's own performance prior to the award and to the performance of similar firms in which the CEO did

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not win an award.

- Superstar CEOs extract higher compensation from the firm, largely in the form of stock and stock options. They obtain significant and economically meaningful increases in total compensation in the years following their award despite sub-par firm performance. Further, this increase in compensation seems to occur mostly in badly governed firms.

- Superstar CEOs increase their indulgence in tasks which provide private benefits, but have little (if any) influence on firm value maximization. They are significantly more likely to author books and sit on outside boards in years after they have won an award, relative to years before they won an award.

- Superstar CEOs are more likely to manage earnings, and ultimately to experience negative earnings after several years have elapsed following their last award. The incidence of earnings management increases both relative to years before the CEO won the award and relative to CEOs who never won an award.

Together these results suggest there is distortion in behavior induced by winning the tournament and that it does affect ultimate firm performance. Ex post incentives do not remain strong for the winner of the tournament.

The results open many questions for future research. In the spirit of Yermack (2004), are there other dimensions in which a superstar CEO can inefficiently extract private benefits from the firm, such as the use of corporate jets or memberships in exclusive golf clubs? What is the appropriate incentive structure for tournament winners? What is the relative cost to the firm of reigning in a superstar CEO versus buying him out and replacing him with a less famous peer? Could some incentive structure other than the

tournament be optimal ex ante, given the ex post distortions the tournament creates for the winner?

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Figure 1. CEO Awards By Year
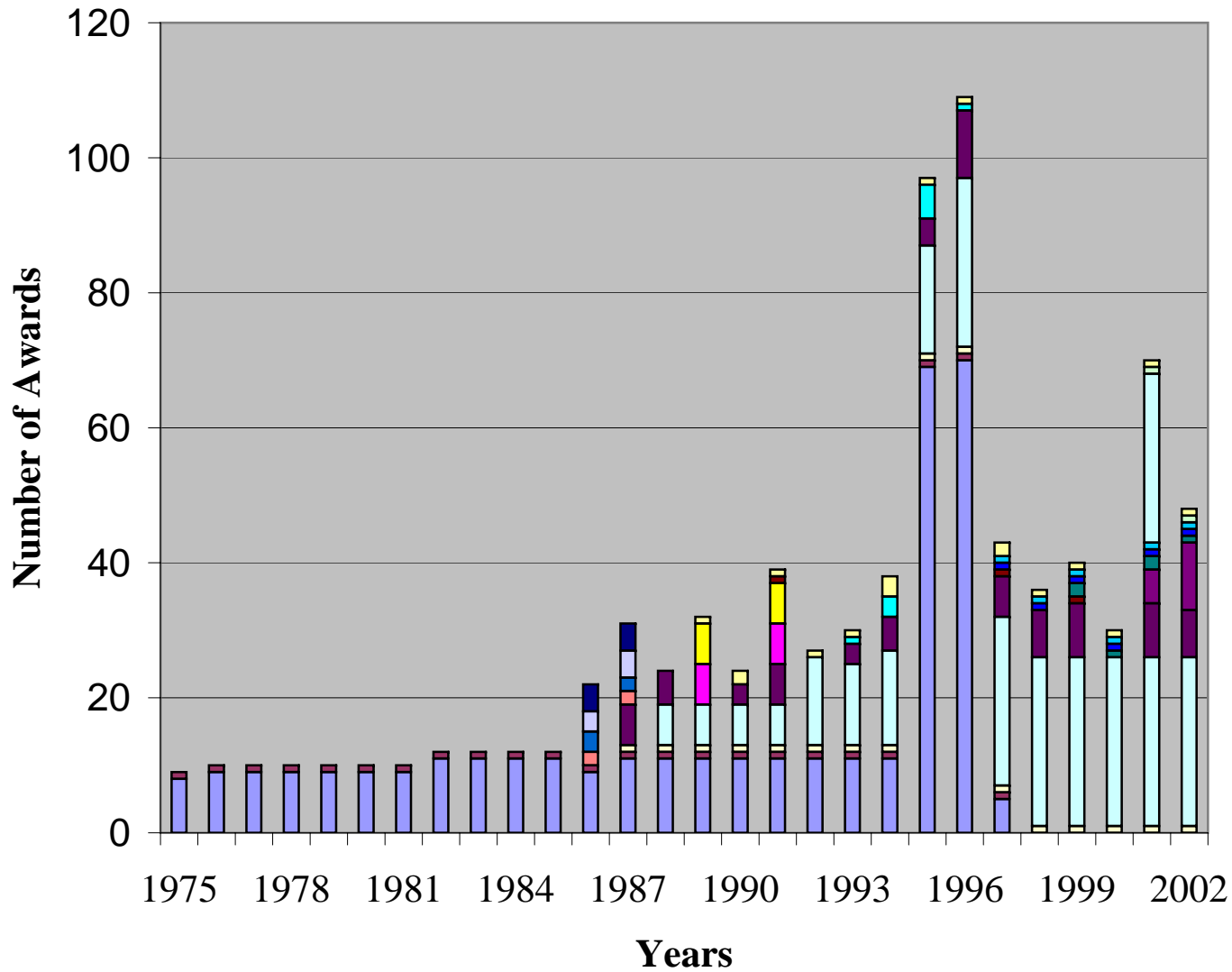
Legend (top to bottom):
- E&Y.E
- E&Y.GE
- TIME.IGE
- EBM
- IW.CEO2
- Morningstar
- TIME.POY
- Forbes
- IW
- IW.SS
- IW.IS
- IW.HI
- IW.HT
- IW.F
- IW.CG
- BW.BE
- BW.BM
- CE
- Golds
- Silvers

X-axis: Years (1975, 1978, 1981, 1984, 1987, 1990, 1993, 1996, 1999, 2002)

Y-axis: Number of Awards (0, 20, 40, 60, 80, 100, 120)

Figure 2. Accounting Performance of Award Winners and Predicted Winners
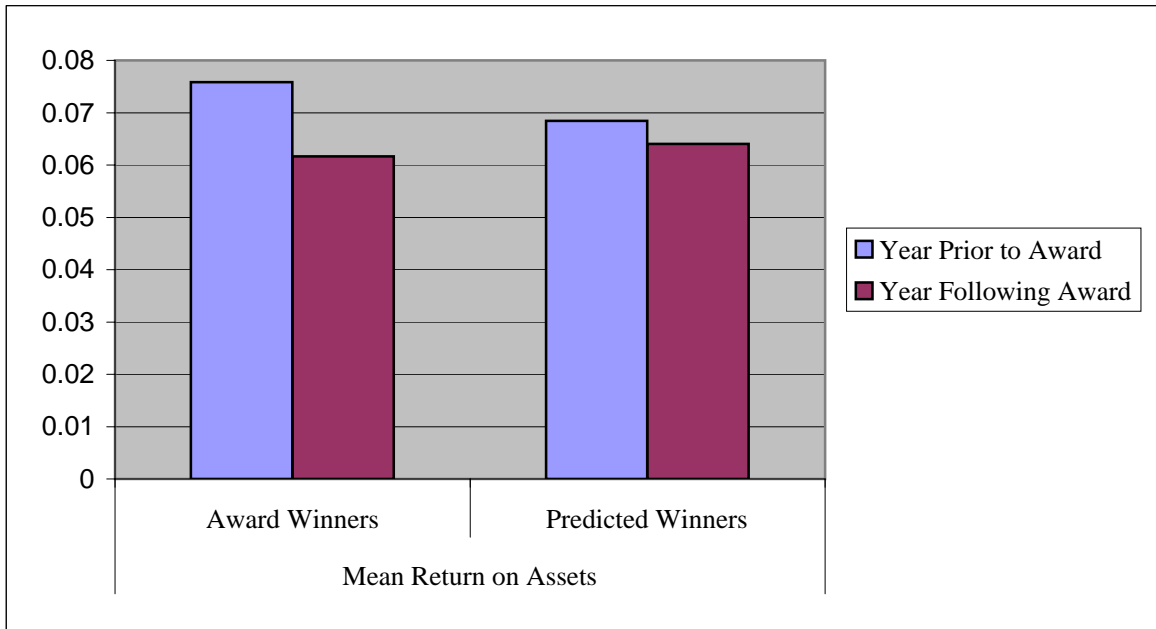
Figure 3a. Mean Total Cash Compensation

Mean Total Cash Compensation

Legend:
- Year Prior to Award
- Year Following Award
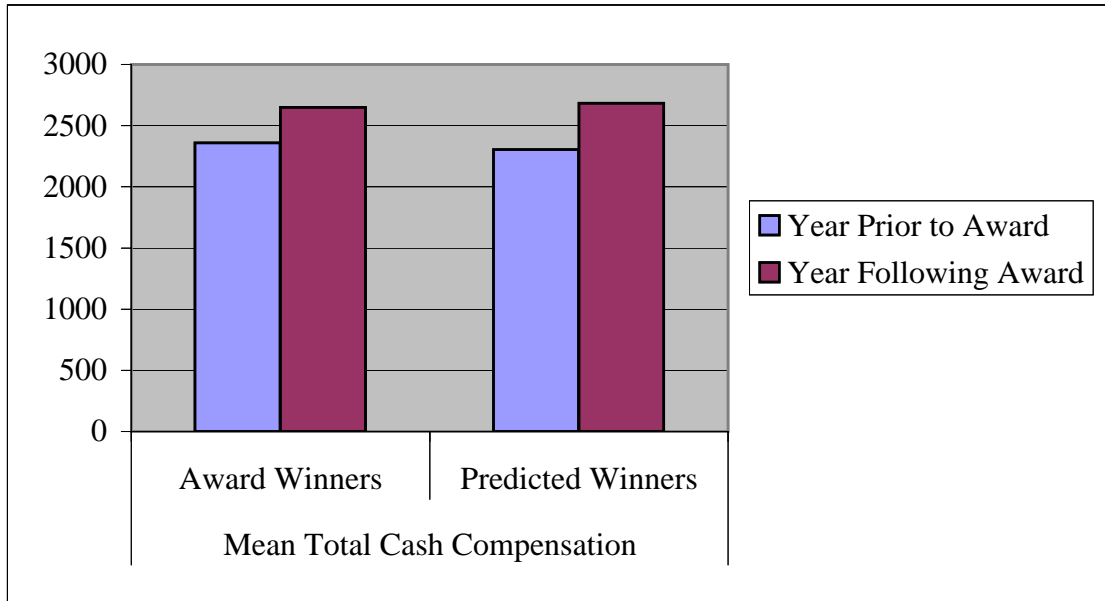
Figure 3b. Mean Total Compensation
Including Restricted Stock and Option Grants

Mean Total Compensation Including Restricted Stock and Option Grants

Legend:
- Year Prior to Award
- Year Following Award
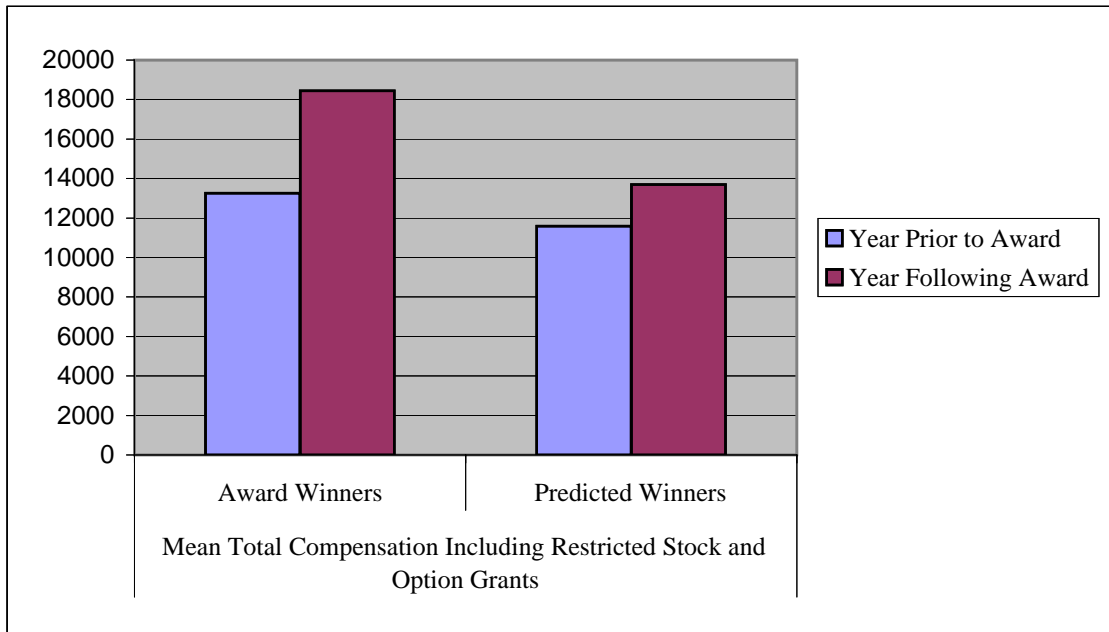
Figure 4a. Compensation to Cash Compensation of Next Highest Paid Executive

Mean Ratio of CEO Cash Compensation to Cash Compensation
of Next Highest Paid Executive
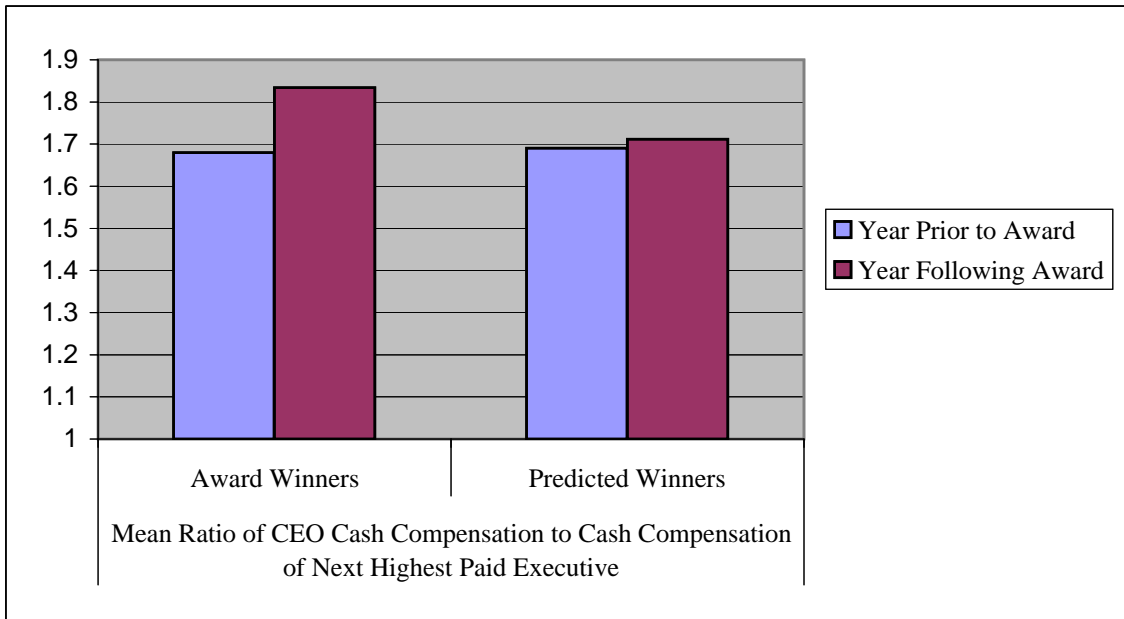
Figure 4b. Compensation to Total Compensation of Next Highest Paid Executive

Mean Ratio of CEO Total Compensation to Total Compensation
of Next Highest Paid Executive
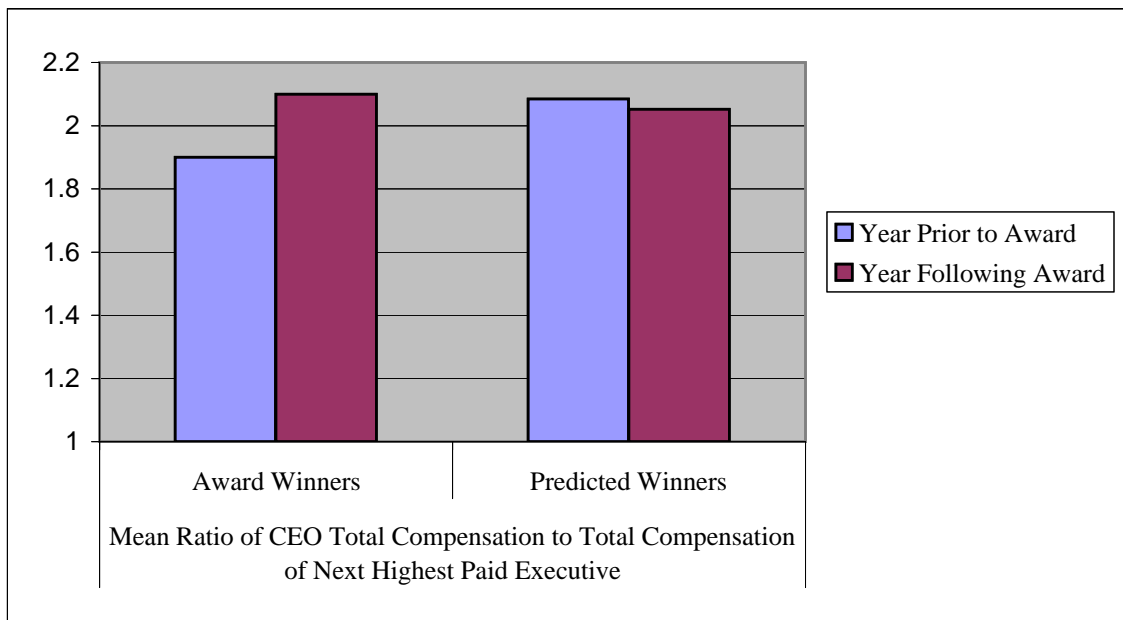
Figure 5a. Distractions: Books
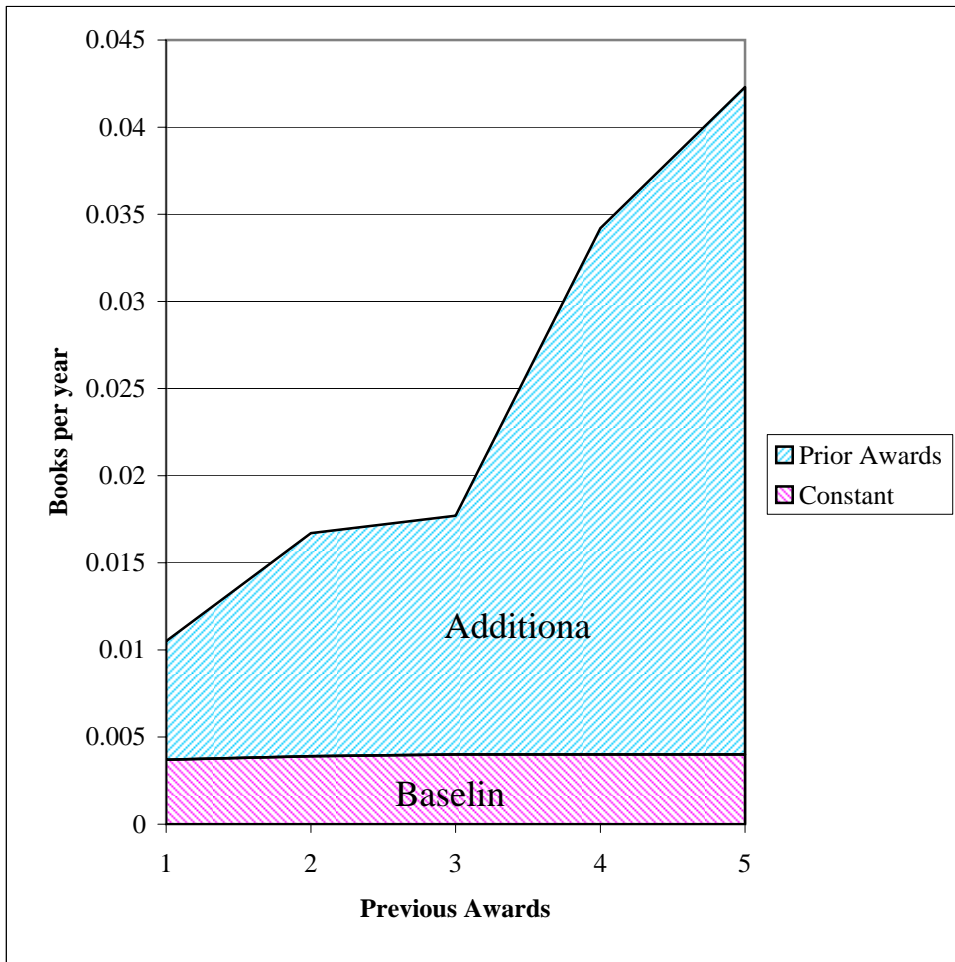
Figure 5b. Distractions: Too Many Board Seats
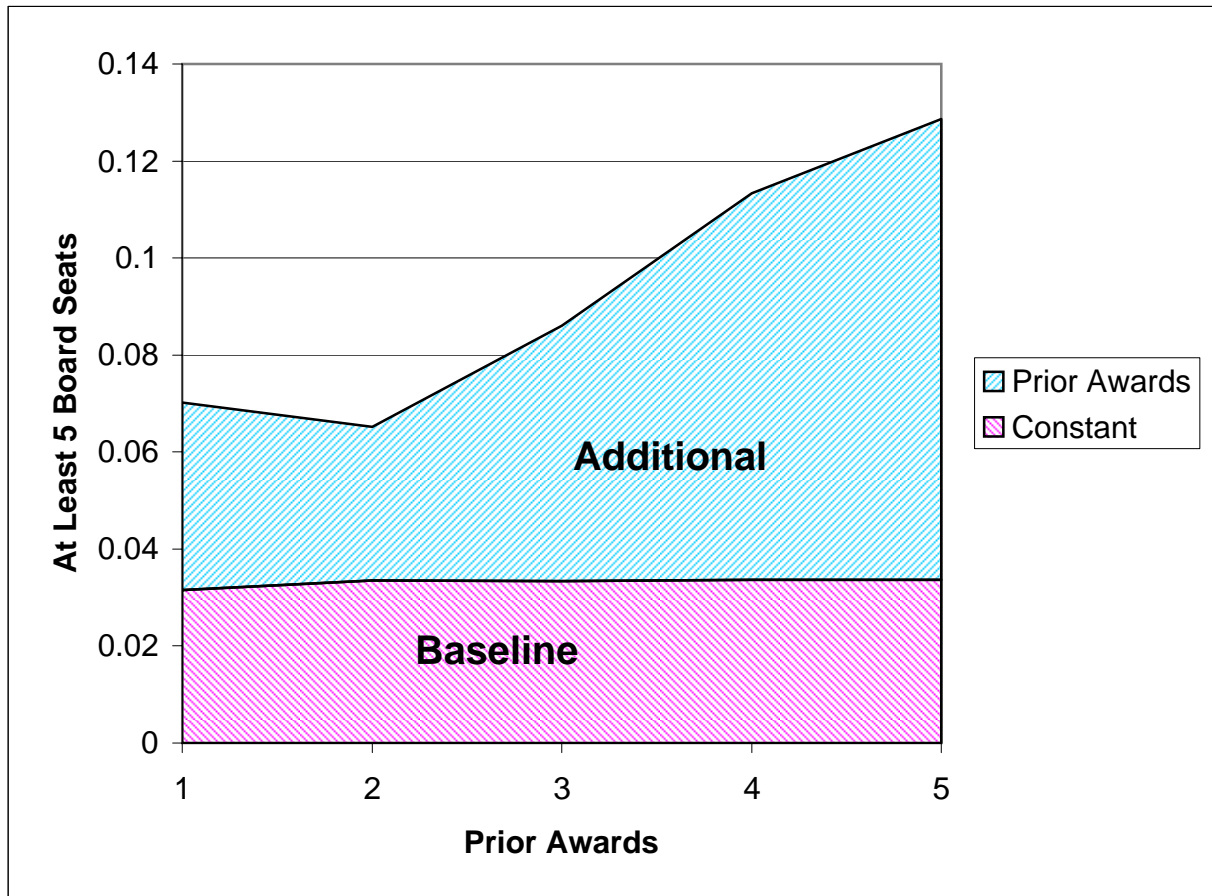
Figure 6. Earnings Manipulation - Zero Earnings Surprise
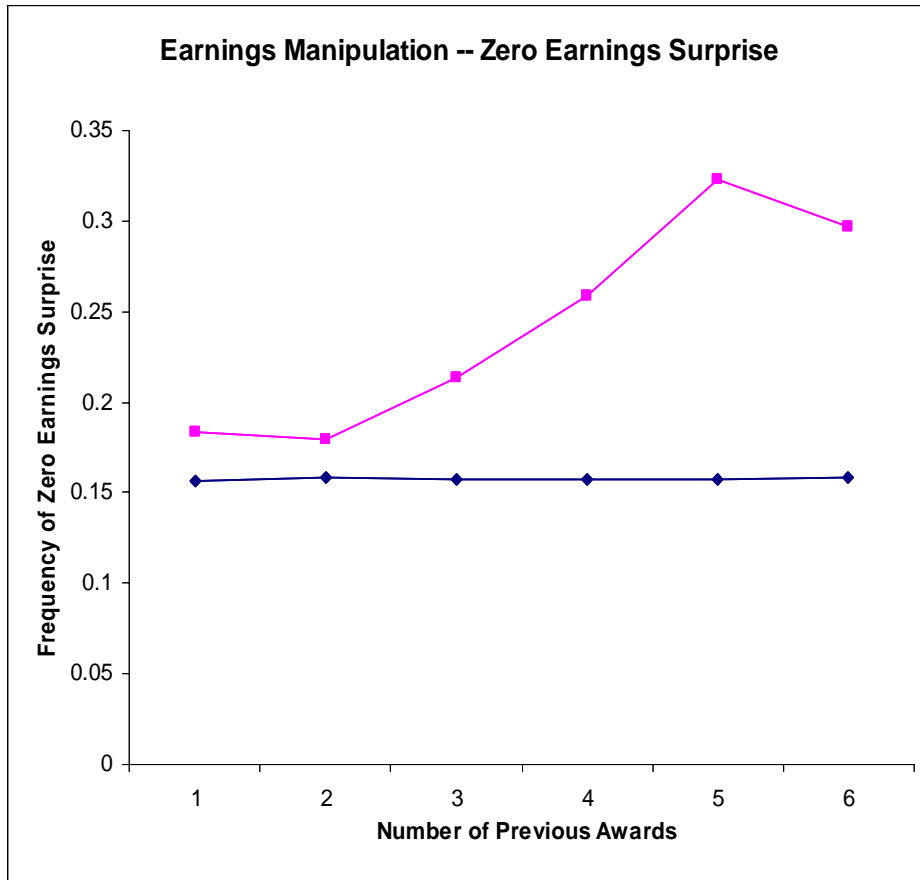
For zero earnings surprise as a measure of earnings manipulation see Degeorge, Patel, Zeckhauser (1999)

Figure 7. Earnings Manipulation-Distributions of Earnings Surprises
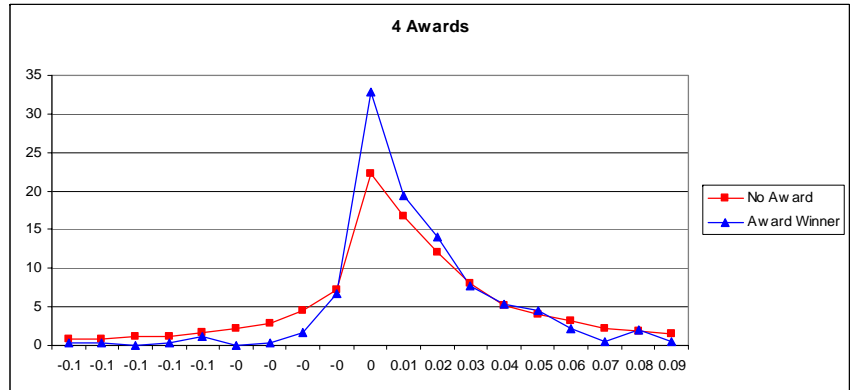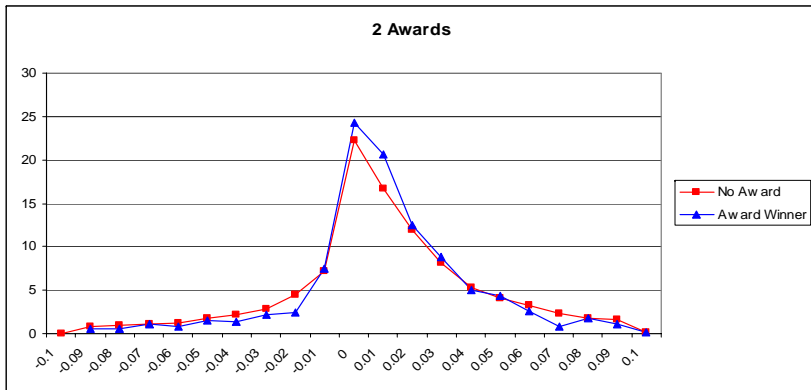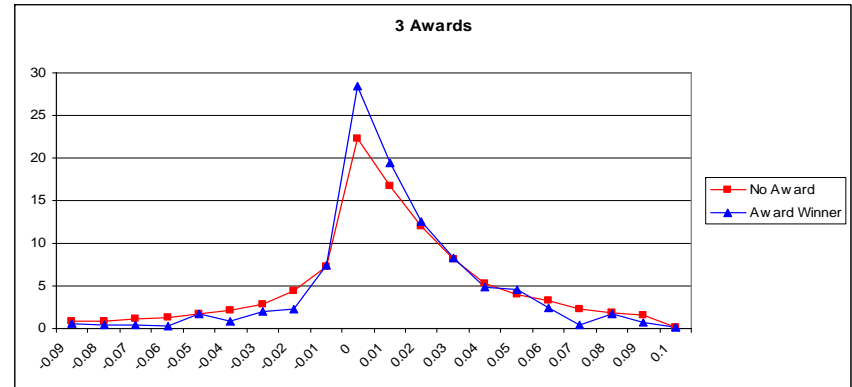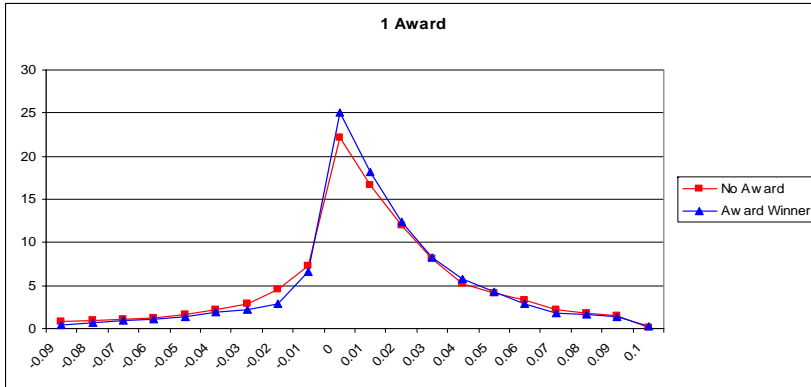
Table 1. Summary Statistics

Market capitalization is taken two months prior to the award month and is in log form. Book-to-market is taken at the end of the most recent fiscal year that ends at least six months prior to the award month. Returns_2_3 are the total compound returns from the third to the second month prior to the award month. Returns_4_6 are the total compound returns from the sixth to the fourth month prior to the award month. Returns_7_12 are the total compound returns from the twelfth to the seventh month prior to the award month. Net Operating Assets and Accruals are defined as in Hirshleifer, Hou, Teoh, and Zhang (2004) and are winsorized at the 1% level in the overall sample.

I. Months with CEO Awards

	All Firms				CEO Award Winners				Predicted Winners			
	Obs.	Mean	Median	Std. Dev.	Obs.	Mean	Median	Std. Dev.	Obs.	Mean	Median	Std. Dev.
Market Capitalization	82,432	7.04	6.89	1.60	283	9.63	9.68	1.59	283	9.59	9.94	1.71
Book-to-Market Ratio	82,432	0.56	0.46	0.65	283	0.37	0.29	0.30	283	0.40	0.31	0.31
Returns_2_3	82,432	0.04	0.03	0.21	283	0.07	0.05	0.19	283	0.07	0.06	0.19
Returns_4_6	82,432	0.02	0.01	0.25	283	0.08	0.08	0.20	283	0.09	0.05	0.41
Returns_7_12	82,432	0.12	0.07	0.40	283	0.28	0.16	0.61	283	0.24	0.14	0.79
CEO female (dummy)	82,432	0.01	0	0.11	283	0.02	0	0.13	283	0.02	0	0.16
CEO age	33,812	53.84	54	7.62	111	53.25	53	10.54	90	53.79	54	8.69
CEO tenure	82,432	8.21	6	7.39	283	9.59	8	7.28	283	8.78	7	7.06

II. Annual Data

|	All Firm Years				CEO Award Years				Predicted Award Years			
	Obs.	Mean	Median	Std. Dev.	Obs.	Mean	Median	Std. Dev.	Obs.	Mean	Median	Std. Dev.
Assets	20,556	8,740.70	1,081.98	39,093.04	255	46,008.45	10,673.00	123,066.80	266	44,905.16	14,831.00	99,195.14
Sales	20,545	3,615.53	907.1	10,296.44	255	18,962.20	8,723.00	29,468.72	266	22,417.97	10,929.45	34,083.66
Return on Assets	20,548	0.03	0.04	0.17	255	0.07	0.06	0.08	266	0.07	0.07	0.08
Shares Outstanding	20,546	130.24	40.70	390.23	254	732.17	312.54	1,230.55	266	907.10	418.30	1,316.28
Net Operating Assets$_{t-1}$	20,015	0.65	0.66	0.35	252	0.64	0.63	0.37	266	0.64	0.61	0.34
Accruals$_{t-1}$	17,163	-0.04	-0.04	0.09	203	-0.05	-0.04	0.09	222	-0.05	-0.04	0.08
Governance Index (GIM)	14,895	9.27	9	2.73	232	9.00	9	2.58	244	8.73	8.50	2.68
Institutional Blockholder (dummy)	17,569	0.69	1	0.46	242	0.53	1	0.50	243	0.53	1	0.50
Total Compensation	19,988	3,952.37	1,705.78	11,217.68	253	17,383.71	5,173.93	48,207.50	263	10,756.70	5,205.27	15,933.06
Cash Compensation	20,568	1,144.73	794.31	1,564.28	255	2,330.47	1,675.00	2,474.58	266	2,335.75	1,765.10	2,204.43
Total Compensation Ratio	19,774	1.89	1.58	2.40	253	2.10	1.64	2.62	263	1.82	1.55	1.31
Cash Compensation Ratio	20,351	1.66	1.54	1.22	255	1.61	1.48	0.83	266	1.68	1.50	0.91
CEO ownership (#)	19,736	2,277.58	216.70	21,130.91	254	12,826.12	773.93	41,979.47	260	20,985.52	360.72	107,923.30
CEO vested options (#)	20,164	492.72	171.28	1,573.28	255	1,547.67	426.00	3,274.33	265	1,423.03	457.50	4,325.17
CEO female (dummy)	20,568	0.01	0	0.10	255	0.02	0	0.14	266	0.03	0	0.16
CEO age	8,649	54.30	54	7.82	97	53.64	53.5	10.48	87	53.94	54	8.65
CEO tenure	18,523	8.08	6	7.32	253	9.87	8	7.21	266	8.84	7	7.15
Chm., Pres. & CEO (dummy)	17,770	0.26	0	0.44	251	0.16	0	0.37	257	0.21	0	0.41

Table 2. Determinants of Award Winners

Logit regressions determining of award winners. The panel data includes all firms for each award. The dependent variable is a dummy variable equal to 1 if the CEO of the company won the award. Coefficients are displayed as odds ratios.

	logit
Size	3.0609
	(23.13)***
Book equity / market equity	0.6025
	(3.23)***
Returns 2 and 3 months ago	1.7921
	(2.04)**
Returns 4 to 6 months ago	3.9608
	(5.97)***
Returns 7 to 12 months ago	2.098
	(8.34)***
Female (dummy)	3.5154
	(2.57)**
Tenure	1.0305
	(3.69)***
Industry dummies	yes
Year dummies	yes
Award type dummies	yes
Pseudo R^2	0.36
Observations	79,097

Absolute value of z statistics in parentheses

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 3. Stock Performance of Award Winners vs. Predicted Winners
I. Cumulative Abnormal Returns Around Awards and Predicted Awards

Cumulative abnormal returns to award winners and predicted award winners. Expected returns are calculated using a market model with the CRSP value-weighted index as market returns and a three year estimation period ending 23 trading days prior to the award date [-778,-23]. Windows are expressed in trading days. Standard errors are calculated using the time series standard deviation method.

	Event Window: [-5,+5]		Event Window: [+6,+255]		Event Window: [+6,+510]		Event Window: [+6,+765]	
	Award	*Predicted Award*	*Award*	*Predicted Award*	*Award*	*Predicted Award*	*Award*	*Predicted Award*
Average CAR	-0.002	-0.003	-0.21	-0.17	-0.45	-0.31	-0.64	-0.44
	(0.34)	(0.54)	(8.51)***	(7.53)***	(13.12)***	(10.05)***	(15.06)***	(11.50)***
Observations	283	283	283	283	283	283	283	283

II. Long Run Returns to Difference Portfolio

Panel A

Average value-weighted monthly returns to the portfolio that is long award winners and short predicted award winners. Firms enter the portfolio at the beginning of the first month after the award date.

	1 Year	2 Years	3 Years
Average Return	0.0012	-0.0035	-0.0033
	(0.41)	(1.76)*	(2.14)**
Observations	138	143	143

Panel B

Difference in average cumulative abnormal returns between award winners and predicted award winners. Expected returns are calculated using a market model with the CRSP value-weighted index as market returns and a three year estimation period ending 23 trading days prior to the award date [-778,-23]. Windows are expressed in trading days.

	Event Window: [+6,+255]	Event Window: [+6,+510]	Event Window: [+6,+765]
CAR Difference	-0.04	-0.14	-0.20
	(1.24)	(2.04)**	(2.06)**
Observations	283	283	283

Panel C

Fama-French Four Factor Model. Dependent variable is the value-weighted monthly return to the portfolio that is long award winners and short predicted winners.

	1 Year	2 Years	3 Years
mktrf	0.1069	-0.0149	0.0009
	(1.26)	(0.28)	(0.02)
smb	0.0655	-0.0627	-0.009
	(0.76)	(1.15)	(0.21)
hml	-0.0142	-0.2106	-0.1494
	(0.13)	(3.15)***	(2.81)***
umd	0.1747	0.0972	0.0384
	(2.98)***	(2.62)***	(1.30)
alpha	-0.0011	-0.0031	-0.0029
	(0.33)	(1.55)	(1.81)*
Observations	138	143	143
R-squared	0.09	0.13	0.11

Absolute value of t statistics in parentheses. * significant at 10%; ** significant at 5%; *** significant at 1%

Table 4. Accounting Perfomance Before and After CEO Awards

Regressions include the year before and year of a CEO or predicted award plus the year following, 2 years following, or 3 years following the award, respectively. The dependent variable is ROA, defined as earnings over assets. Size is the natural logarithm of sales, taken at the beginning of the fiscal year. Year After Award, 2 Years After Award, and 3 Years After Award are set to 1 for the specified period after an award regardless of whether another award occurs during those years.

	1 Year After Award (1)	1 Year After Fake Award (2)	2 Years After Award (3)	2 Years After Fake Award (4)	3 Years After Award (5)	3 Years After Fake Award (6)
Size	-0.0369	-0.0142	-0.0734	-0.0094	-0.0603	-0.0098
	(4.59)***	(1.74)*	(5.43)***	(1.27)	(5.05)***	(1.45)
ROA_{t-1}	0.0241	0.1339	0.1526	0.2941	0.171	0.303
	(0.52)	(2.33)**	(2.12)**	(6.80)***	(2.50)**	(7.32)***
Year After Award	-0.0153	-0.0065				
	(2.72)***	(1.09)				
2 Years After Award			-0.0251	-0.0068		
			(2.46)**	(1.15)		
3 Years After Award					-0.0252	-0.0061
					(2.57)**	(1.05)
Firm Effects	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X
Observations	608	641	709	751	775	814
Firms	167	175	167	175	167	175
R-squared	0.15	0.12	0.15	0.17	0.13	0.16

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 5. Total Compensation Before and After CEO Awards

Regressions include the year before and year of a CEO or predicted award plus the year following, 2 years following, or 3 years following the award, respectively. The dependent variable is the natural logarithm of CEO total compensation (including stock option and resticted stock grants during the fiscal year). Size is the natural logarithm of sales, taken at the beginning of the fiscal year. ROA is defined as earnings over assets. Year After Award, 2 Years After Award, and 3 Years After Award are set to 1 for the specified period after an award regardless of whether another award occurs during those years.

	Without Age						With Age					
	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
Size	-0.1192	0.2171	-0.1726	0.2031	-0.2037	0.146	-0.3255	0.151	-0.5456	0.1254	-0.6171	0.1805
	(0.69)	(2.02)**	(1.24)	(2.06)**	(1.66)*	(1.62)	(0.80)	(0.73)	(1.57)	(0.66)	(2.01)**	(1.03)
ROA	1.0199	0.5962	0.5108	-0.7963	0.5011	-0.4641	3.1255	1.952	2.2419	3.0071	1.7126	3.0682
	(1.06)	(0.97)	(1.24)	(1.50)	(1.28)	(0.92)	(1.90)*	(1.88)*	(1.51)	(3.16)***	(1.30)	(3.47)***
CEO age							0.0841	0.0863	0.077	0.0964	0.0737	0.0927
							(0.83)	(1.16)	(0.83)	(1.47)	(0.82)	(1.56)
CEO gender (female = 1)	N/A	0.2961	N/A	0.3042	N/A	0.1962	N/A	N/A	N/A	N/A	N/A	N/A
		(0.56)		(0.56)		(0.37)						
CEO tenure	0.0159	-0.0268	0.0164	-0.0211	0.0188	-0.0218	-0.0458	0.0334	-0.0247	0.0231	-0.0173	0.026
	(0.77)	(2.04)**	(0.87)	(1.64)	(1.05)	(1.74)*	(0.76)	(1.35)	(0.45)	(1.02)	(0.33)	(1.20)
Year After Award	0.1942	0.0527					0.7504	-0.0027				
	(1.67)*	(0.68)					(2.85)***	(0.02)				
2 Years After Award			0.1228	-0.0146					0.4895	-0.0222		
			(1.16)	(0.18)					(2.13)**	(0.21)		
3 Years After Award					0.0875	-0.0531					0.3958	-0.0632
					(0.83)	(0.67)					(1.76)*	(0.63)
Firm Effects	X	X	X	X	X	X	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X	X	X	X	X	X	X
Observations	594	633	694	743	760	805	231	213	270	253	293	276
Firms	167	175	167	175	167	175	61	61	61	61	61	61
R-squared	0.11	0.22	0.12	0.2	0.12	0.19	0.14	0.35	0.11	0.33	0.11	0.35

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 6. Cash Compensation Before and After CEO Awards

Regressions include the year before and year of a CEO or predicted award plus the year following, 2 years following, or 3 years following the award, respectively. The dependent variable is the natural logarithm of CEO cash compensation (excluding stock option and resticted stock grants during the fiscal year). Size is the natural logarithm of sales, taken at the beginning of the fiscal year. ROA is defined as earnings over assets. Year After Award, 2 Years After Award, and 3 Years After Award are set to 1 for the specified period after an award regardless of whether another award occurs during those years.

	Without Age						With Age					
	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
Size	0.005	0.2873	0.2385	0.2232	0.4011	0.3816	-0.4977	-0.4606	-0.6167	-0.3666	-0.4108	-0.3044
	(0.04)	(2.40)**	(2.14)**	(2.11)**	(3.86)***	(3.91)***	(1.67)*	(2.02)**	(2.24)**	(1.83)*	(1.60)	(1.59)
ROA	0.3732	1.6035	0.1941	1.7531	0.3683	1.8798	-0.1319	5.5815	-0.2577	5.0253	0.3043	4.8116
	(0.53)	(2.33)**	(0.58)	(3.03)***	(1.10)	(3.40)***	(0.11)	(4.76)***	(0.22)	(4.85)***	(0.27)	(4.84)***
CEO age							0.0596	0.157	0.0614	0.1444	0.0556	0.1216
							(0.81)	(2.33)**	(0.83)	(2.49)**	(0.74)	(2.22)**
CEO gender (female = 1)	N/A	0.9951	N/A	0.7546	N/A	0.7315	N/A	N/A	N/A	N/A	N/A	N/A
		(1.66)*		(1.27)		(1.24)						
CEO tenure	0.0303	-0.0263	0.0138	-0.0255	0.0043	-0.0204	-0.0167	-0.056	-0.0221	-0.0581	-0.0396	-0.0526
	(2.01)**	(1.77)*	(0.92)	(1.81)*	(0.28)	(1.48)	(0.38)	(1.97)*	(0.51)	(2.34)**	(0.91)	(2.14)**
Year After Award	-0.084	0.1505					-0.0021	0.1094				
	(0.98)	(1.70)*					(0.01)	(0.82)				
2 Years After Award			-0.0658	0.1271					-0.0821	0.0814		
			(0.77)	(1.47)					(0.45)	(0.70)		
3 Years After Award					-0.005	0.0865					0.0237	0.121
					(0.06)	(1.00)					(0.13)	(1.07)
Firm Effects	X	X	X	X	X	X	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X	X	X	X	X	X	X
Observations	603	641	704	751	770	814	235	218	274	258	297	281
Firms	167	175	167	175	167	175	61	61	61	61	61	61
R-squared	0.04	0.13	0.05	0.1	0.07	0.11	0.06	0.32	0.06	0.29	0.05	0.26

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 7. Total Compensation Relative to the Next Highest Paid Executive Before and After CEO Awards

Regressions include the year before and year of a CEO or predicted award plus the year following, 2 years following, or 3 years following the award, respectively. The dependent variable is the natural logarithm of the ratio of CEO total compensation (including stock option and resticted stock grants during the fiscal year) to total compensation of the next highest paid executive in the company. Size is the natural logarithm of sales, taken at the beginning of the fiscal year. ROA is defined as earnings over assets. Year After Award, 2 Years After Award, and 3 Years After Award are set to 1 for the specified period after an award regardless of whether another award occurs during those years.

	Without Age						With Age					
	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award
	(1)	(2)	(5)	(6)	(9)	(10)	(3)	(4)	(7)	(8)	(11)	(12)
Size	-0.048	-0.0582	-0.1027	-0.0462	-0.1173	-0.0586	-0.0695	-0.0205	-0.2549	-0.0364	-0.2854	-0.0233
	(0.76)	(1.26)	(1.84)*	(1.16)	(2.33)**	(1.60)	(0.56)	(0.19)	(2.15)**	(0.38)	(2.64)***	(0.26)
ROA	0.1352	0.4297	0.2444	0.2185	0.2106	0.2719	0.6453	0.1592	0.3767	0.5313	0.083	0.5539
	(0.39)	(1.65)*	(1.48)	(1.03)	(1.31)	(1.34)	(1.30)	(0.29)	(0.74)	(1.10)	(0.18)	(1.24)
CEO age							0.0463	0.0022	0.045	0.0075	0.0403	0.0043
							(1.51)	(0.06)	(1.41)	(0.23)	(1.27)	(0.15)
CEO gender (female = 1)	N/A	-0.0409	N/A	-0.0312	N/A	-0.0676	N/A	N/A	N/A	N/A	N/A	N/A
		(0.18)		(0.14)		(0.31)						
CEO tenure	0.0061	-0.0206	0.0056	-0.0202	0.0095	-0.022	-0.013	0.0216	-0.0008	0.0186	0.0122	0.0183
	(0.81)	(3.70)***	(0.74)	(3.89)***	(1.30)	(4.37)***	(0.71)	(1.63)	(0.05)	(1.62)	(0.66)	(1.67)*
Year After Award	0.0777	0.0455					0.2021	0.0044				
	(1.84)*	(1.38)					(2.53)**	(0.07)				
2 Years After Award			0.0815	0.0461					0.1773	0.0132		
			(1.92)*	(1.46)					(2.26)**	(0.25)		
3 Years After Award					0.0426	0.0338					0.0888	-0.0265
					(0.98)	(1.06)					(1.12)	(0.53)
Firm Effects	X	X	X	X	X	X	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X	X	X	X	X	X	X
Observations	594	632	694	742	760	804	231	213	270	253	293	276
Firms	167	175	167	175	167	175	61	61	61	61	61	61
R-squared	0.07	0.05	0.07	0.04	0.06	0.04	0.15	0.08	0.12	0.07	0.11	0.07

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 8. Cash Compensation Relative to the Next Highest Paid Executive Before and After CEO Awards

Regressions include the year before and year of a CEO or predicted award plus the year following, 2 years following, or 3 years following the award, respectively. The dependent variable is the natural logarithm of the ratio of CEO cash compensation (excluding stock option and resticted stock grants during the fiscal year) to cash compensation of the next highest paid executive in the company. Size is the natural logarithm of sales, taken at the beginning of the fiscal year. ROA is defined as earnings over assets. Year After Award, 2 Years After Award, and 3 Years After Award are set to 1 for the specified period after an award regardless of whether another award occurs during those years.

	Without Age						With Age					
	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award	1 Year After Award	1 Year After Fake Award	2 Years After Award	2 Years After Fake Award	3 Years After Award	3 Years After Fake Award
	(1)	(2)	(5)	(6)	(9)	(10)	(3)	(4)	(7)	(8)	(11)	(12)
Size	-0.0575	-0.0268	-0.0263	-0.0248	-0.004	-0.0134	-0.1898	-0.1257	-0.1833	-0.1153	-0.1468	-0.1069
	(1.46)	(1.00)	(0.82)	(1.02)	(0.14)	(0.60)	(2.05)**	(1.97)*	(2.37)**	(1.90)*	(2.12)**	(1.92)*
ROA	-0.1724	0.467	-0.0752	0.4018	-0.0493	0.3857	-0.0469	1.498	-0.0826	1.3657	0.0451	1.3193
	(0.79)	(3.02)***	(0.79)	(3.02)***	(0.52)	(3.05)***	(0.12)	(4.57)***	(0.25)	(4.37)***	(0.15)	(4.56)***
CEO age							0.0436	0.0328	0.0406	0.0331	0.0395	0.031
							(1.90)*	(1.74)*	(1.95)*	(1.90)*	(1.95)*	(1.95)*
CEO gender (female = 1)	N/A	0.0688	N/A	0.032	N/A	0.0043	N/A	N/A	N/A	N/A	N/A	N/A
		(0.51)		(0.23)		(0.03)						
CEO tenure	0.0009	-0.0105	-0.0024	-0.0118	-0.0031	-0.0128	-0.021	-0.0148	-0.0208	-0.017	-0.026	-0.016
	(0.20)	(3.14)***	(0.56)	(3.63)***	(0.73)	(4.09)***	(1.56)	(1.86)*	(1.72)*	(2.26)**	(2.20)**	(2.23)**
Year After Award	0.023	0.0403					0.1052	0.0234				
	(0.86)	(2.03)**					(1.74)*	(0.63)				
2 Years After Award			0.0294	0.0329					0.0918	-0.0055		
			(1.20)	(1.66)*					(1.78)*	(0.16)		
3 Years After Award					0.0417	0.0322					0.1263	-0.0137
					(1.64)	(1.62)					(2.47)**	(0.42)
Firm Effects	X	X	X	X	X	X	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X	X	X	X	X	X	X
Observations	603	641	704	751	770	814	235	218	274	258	297	281
Firms	167	175	167	175	167	175	61	61	61	61	61	61
R-squared	0.04	0.12	0.04	0.1	0.04	0.09	0.09	0.26	0.09	0.23	0.1	0.21

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 9. Changes In Compensation and CEO Power

Regressions include the year before and year of a CEO or predicted award plus the year following. The dependent variables are the natural logarithm of CEO total compensation (including stock option and resticted stock grants during the fiscal year), the natural logarithm of the ratio of CEO total compensation (including stock option and resticted stock grants during the fiscal year) to total compensation of the next highest paid executive in the company, the natural logarithm of CEO cash compensation (excluding stock option and resticted stock grants during the fiscal year), and the natural logarithm of the ratio of CEO cash compensation (excluding stock option and resticted stock grants during the fiscal year) to cash compensation of the next highest paid executive in the company respectively. Size is the natural logarithm of sales, taken at the beginning of the fiscal year. ROA is defined as earnings over assets. BOSS is an indicator that takes the value 1 if the CEO is also President and Chairman of the Board.

	Total Compensation		Total Compensation Ratio		Cash Compensation		Cash Compensation Ratio	
	1 Year After Award	1 Year After Fake Award	1 Year After Award	1 Year After Fake Award	1 Year After Award	1 Year After Fake Award	1 Year After Award	1 Year After Fake Award
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Size	-0.1025	0.2765	-0.0015	-0.0122	0.0057	0.3094	-0.0645	-0.0438
	(0.55)	(2.41)**	(0.02)	(0.25)	(0.04)	(2.38)**	(1.52)	(1.55)
ROA	0.573	0.6706	0.3742	0.4846	0.313	1.5761	-0.2038	0.4503
	(0.53)	(1.07)	(0.97)	(1.85)*	(0.40)	(2.21)**	(0.82)	(2.89)***
CEO gender (female = 1)	N/A	0.3743	N/A	0.0751	N/A	1.3512	N/A	0.1449
		(0.68)		(0.33)		(2.16)**		(1.06)
CEO tenure	0.0143	-0.0274	0.0034	-0.0195	0.0306	-0.0208	0.0001	-0.0089
	(0.67)	(2.05)**	(0.44)	(3.47)***	(1.96)*	(1.36)	(0.03)	(2.68)***
BOSS	-0.1144	0.0041	0.0376	0.1223	-0.0358	0.4647	0.0866	0.1265
	(0.41)	(0.02)	(0.37)	(1.78)*	(0.17)	(2.51)**	(1.34)	(3.13)***
Year After Award	0.1393	0.0597	0.0447	0.0595	-0.0613	0.152	0.0338	0.0398
	(1.10)	(0.69)	(0.99)	(1.64)	(0.65)	(1.54)	(1.14)	(1.85)*
Year After Award * BOSS	0.3260	0.0563	0.2033	-0.0098	-0.1031	-0.0045	-0.0509	-0.0100
	(1.21)	(0.32)	(2.12)**	(0.13)	(0.52)	(0.02)	(0.82)	(0.23)
Firm Effects	X	X	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X	X	X
Observations	579	614	579	614	588	618	588	618
Firms	166	174	166	174	166	174	166	174
R-squared	0.12	0.22	0.07	0.06	0.04	0.14	0.05	0.15

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 10. Compensation Effects By Corporate Governance

Regressions include the year before and year of a CEO or predicted award plus the 2 years following the award. The dependent variables are the natural logarithm of the ratio of CEO total compensation (including stock option and restricted stock grants during the fiscal year) to total compensation of the next highest paid executive in the firm, the natural logarithm of CEO total compensation, the natural logarithm of the ratio of CEO cash compensation (excluding stock option and resticted stock grants during the fiscal year) to cash compensation of the next highest paid exetutive in the firm, and the natural logarithm of CEO cash compensation, respectively. Size is the natural logarithm of assets, taken at the beginn the fiscal year. ROA is defined as earnings over assets. 2 Years After Award is set to 1 for the two years after an award regardless of whether another award occurs during those years.

Firm years in which the value of the Gompers, Ishii, Metrick (2003) governance index takes values less than 9 (the median in our sample) are classified as "Good Governance" years in the GIM columns. When the index is larger than or equal to 9, we classify the firm year as a "Bad Governance" year. Firm years in which there is an institutional block holder with more than 5% of shares are classified as "Good Governance" years in the BLOCK columns (Cremers and Nair, 2004). Firm years without a 5% block holder are "Bad Governance" years.

	Total Compensation				Total Compensation Ratio				Cash Compensation				Cash Compensation Ratio			
	GIM		BLOCK		GIM		BLOCK		GIM		BLOCK		GIM		BLOCK	
	Good	Bad	Good	Bad	Good	Bad	Good	Bad	Good	Bad	Good	Bad	Good	Bad	Good	Bad
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Size	0.1364	0.338	-0.1283	-0.0923	-0.0089	0.0628	0.0169	-0.3076	-0.2855	0.614	-0.2282	0.1769	-0.028	0.1518	-0.0606	-0.094
	(0.66)	(1.53)	(0.43)	(0.29)	(0.10)	(0.55)	(0.18)	(1.96)*	(1.15)	(3.57)***	(1.06)	(0.67)	(0.38)	(3.12)***	(1.40)	(1.10)
ROA	1.3515	1.0521	1.6959	-1.7286	0.7231	0.1409	0.8033	-1.6561	0.0537	1.9065	-0.0052	-3.4123	-0.0144	0.2173	-0.039	-2.5435
	(3.29)***	(0.71)	(3.08)***	(0.61)	(4.06)***	(0.18)	(4.64)***	(1.19)	(0.11)	(1.63)	(0.01)	(1.40)	(0.10)	(0.66)	(0.49)	(3.24)***
CEO tenure	-0.0621	0.0279	0.03	-0.0104	-0.0048	-0.0052	0.0004	0.0137	0.0016	0.0056	-0.0058	0.0249	-0.0015	-0.0073	-0.0205	0.0058
	(1.97)*	(1.59)	(0.54)	(0.37)	(0.35)	(0.57)	(0.02)	(1.00)	(0.04)	(0.40)	(0.14)	(1.04)	(0.13)	(1.86)*	(2.53)**	(0.76)
2 Years After Award	0.0186	0.1261	-0.0556	0.3832	-0.0377	0.1292	0.0065	0.0883	-0.0781	0.1224	-0.1068	0.0276	0.0297	0.0648	0.0048	0.0444
	(0.15)	(1.08)	(0.29)	(1.94)*	(0.72)	(2.14)**	(0.11)	(0.91)	(0.54)	(1.32)	(0.78)	(0.16)	(0.69)	(2.48)**	(0.17)	(0.79)
Firm Effects	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Year Effects	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Observations	286	357	337	255	286	357	337	255	292	360	339	260	292	360	339	260
Firms	81	96	125	85	81	96	125	85	83	96	126	85	83	96	126	85
R-squared	0.25	0.10	0.13	0.18	0.15	0.12	0.16	0.13	0.09	0.15	0.15	0.05	0.05	0.22	0.11	0.11

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 11a. Distractions: Books

Sample of all firms.

	(1)	(2)	(3)	(4)	(5)
Award Dummies					
At least 1 award	0.0044				
	(0.0032)				
At least 2 awards		0.0140			
		(0.0055)**			
At least 3 awards			0.0162		
			(0.0068)**		
At least 4 awards				0.0367	
				(0.0096)***	
At least 5 awards					0.0258
					(0.0121)**
Tenure	0.0000	-0.0001	0.0000	-0.0001	0.0000
	(0.0001)	(0.0001)	(0.0001)	(0.0001)	(0.0001)
Size	0.0003	0.0004	0.0004	0.0003	0.0004
	(0.0008)	(0.0008)	(0.0008)	(0.0008)	(0.0008)
Year Fixed Effects	X	X	X	X	X
Firm Fixed Effects	X	X	X	X	X
Observations	18,071	18,071	18,071	18,071	18,071
R-squared	0.0005	0.0008	0.0008	0.0013	0.0007

Constant Included.

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 11b. Distractions: Too Many Board Seats

The dependent variable is binary and equal to 1 if the CEO serves on at least five boards. Sample of all firms for the period 1994 to 2002.

	(1)	(2)	(3)	(4)	(5)
Award Dummies					
At least 1 award	0.0213				
	(0.0092)**				
At least 2 awards		0.0131			
		(0.0155)			
At least 3 awards			0.0292		
			(0.0195)		
At least 4 awards				0.0624	
				(0.0275)**	
At least 5 awards					0.0713
					(0.0357)**
Tenure	0.0025	0.0026	0.0026	0.0025	0.0026
	(0.0003)***	(0.0003)***	(0.0003)***	(0.0003)***	(0.0003)***
Size	0.0024	0.0028	0.0028	0.0027	0.0027
	(0.0023)	(0.0023)	(0.0023)	(0.0023)	(0.0023)
Year Fixed Effects	X	X	X	X	X
Firm Fixed Effects	X	X	X	X	X
Observations	14,354	14,354	14,354	14,354	14,354
R-squared	0.0163	0.0160	0.0161	0.0163	0.0162

Constant Included.

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 12. Returns to Earnings Announcements (day 0 and day 1)

Returns are cumulative abnormal returns. Results for raw returns and returns net of market returns are very similar. Industry Dummies are the 48 FF industries. The sample includes all firms years with CEOs who win at least one award during their tenure in the firm.

	(1)	(2)	(3)	(4)	(5)
Constant	0.0092	-0.0078	0.0217	0.0035	0.0198
	(0.0014)***	(0.0085)	(0.0110)**	(0.0141)	(0.0147)
Won at least one award	-0.0039	-0.0056	-0.0031	-0.0049	-0.0048
in the past (dummy)	(0.0018)**	(0.0020)***	(0.0018)*	(0.0020)**	(0.0021)**
Size Decile Dummies	No.	No.	Yes.	Yes.	Yes.
Year Dummies	No.	Yes.	No.	Yes.	Yes.
Month Dummies	No.	Yes.	No.	Yes.	Yes.
Industry Dummies	No.	No.	No.	No.	Yes.
Observations	6236	6236	6236	6236	6236
R-squared	0.001	0.0081	0.0035	0.0107	0.0169

Robust standard errors, clustered by company, in parentheses.

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 13. Earnings Manipulation - Zero Earnings Surprise

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
Constant	0.1579	0.0422	0.1334	0.009	-0.0699	-0.0706	-0.0079
	(0.0018)***	(0.0165)**	(0.0042)***	(0.017)	(0.064)	(0.0641)	(0.0251)
Award Dummy (4 awards)	0.1005	0.0988	0.0591	0.0588	0.0647	0.0639	0.0449
	(0.0221)***	(0.0220)***	(0.0223)***	(0.0222)***	(0.0225)***	(0.0226)***	(0.0261)*
Year Dummies		X		X	X	X	X
Month Dummies		X		X	X	X	X
Size Decile Dummies			X	X	X	X	X
Industry Dummies					X	X	
Firm Dummies							X
Number of Analysts Control						X	X
Observations	62509	62509	62509	62509	62468	62468	62509
R-squared	0.0007	0.0085	0.0032	0.0111	0.032	0.032	0.0001

Robust standard errors, clustered by company, in parentheses.

Industry Dummies are for the 48 Fama-French industries.

* significant at 10%; ** significant at 5%; *** significant at 1%

Table 14. Negative Earnings

	(1)	(2)	(3)	(4)	(5)
Won award last year	-0.0057	-0.0045	-0.0034	-0.0111	-0.0073
	(0.0061)	(0.0061)	(0.0061)	(0.0062)*	(0.0087)
Won last award 1 year ago	0.0013	0.0047	0.0041	-0.0016	0.0007
	(0.0079)	(0.0078)	(0.0079)	(0.0080)	(0.0099)
Won last award 2 years ago	0.0099	0.0155	0.0184	0.0116	0.0081
	(0.0100)	(0.0101)	(0.0103)*	(0.0102)	(0.0114)
Won last award 3 years ago	-0.0018	0.0039	0.0074	0.003	0.0039
	(0.0103)	(0.0103)	(0.0104)	(0.0104)	(0.0129)
Won last award 4 years ago	-0.0300	-0.0251	-0.0194	-0.0233	-0.0108
	(0.0082)***	(0.0084)***	(0.0089)**	(0.0090)***	(0.0148)
Won last award 5 years ago	-0.0043	-0.0084	-0.0026	-0.0076	0.0082
	(0.0133)	(0.0133)	(0.0140)	(0.0140)	(0.0164)
Won last award more than 5 years ago	0.0208	0.0178	0.033	0.0313	0.0606
	(0.0104)**	(0.0102)*	(0.0104)***	(0.0103)***	(0.0137)***
Size Decile Dummies	X	X	X	X	X
Year Dummies		X	X	X	X
Month Dummies		X	X	X	X
Industry Dummies			X	X	
Firm Dummies					X
Observations	62509	62509	62468	62468	62509
R-squared	0.055	0.065	0.1111	0.114	0.0009

Full sample of firms with Execucomp, Compustat, and CRSP data.

Constant included.

Robust standard errors, clustered by company, in parentheses.

* significant at 10%; ** significant at 5%; *** significant at 1%