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THE TOP PRIORITY OF SEC
ENFORCEMENT? EVIDENCE FROM
ACTIONS AGAINST BROKER-DEALERS

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IS INVESTOR PROTECTION THE TOP PRIORITY OF SEC ENFORCEMENT? EVIDENCE FROM ACTIONS AGAINST BROKER-DEALERS

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ABSTRACT: Recent financial collapses have focused policymakers' attention on the financial industry. To date, empirical studies have concentrated on corporate issuer activity, such as securities offerings and class actions. This paper makes a first step in studying SEC enforcement against investment banks and brokerage houses. This study suggests that the SEC favors defendants associated with big (listed) firms compared to defendants associated with smaller firms through two channels. First, the SEC is more likely to choose administrative rather than court proceedings for big-firm defendants, controlling for types of violation and levels of harm to investors. Second, within administrative proceedings, big-firm employees are likely to receive lower sanctions, notably temporary or permanent bars from the industry. To explain this gap, the paper first investigates whether big-firm violations are qualitatively different from small firms' violations, but finds no support for this. This paper instead finds tentative support for the hypothesis that SEC officials favor prospective employers, as big firms headquartered in desirable locations receive lower sanctions.

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1 INTRODUCTION

The U.S. financial sector is in tatters. Investment banks and brokerage houses that dominated the market for decades have collapsed under the weight of risky and poorly understood investments. Financial regulators have come under fire for failing to understand and rein in banks' and brokerages' excessive bets. Attacks have focused particularly on the Securities and Exchange Commission (SEC), the independent federal agency that regulates financial intermediaries and public offers of securities. The SEC's failures to mandate adequate safeguards and to identify large-scale financial fraud have led its Chairman to publicly apologize for the agency's shortcomings and call for internal review. For an agency previously admired for its rigorous enforcement program (Pitt and Shapiro 1990), such admissions are disconcerting. Speculation in the popular press has attributed the SEC's failures to the career aspirations of its officials, who often seek better-paid jobs in the financial industry after a brief SEC tenure (Lewis and Einhorn 2009).

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While concerns about the SEC's treatment of the financial sector have long occupied theoretical debates, this paper makes a first step towards providing an empirical account of SEC enforcement practices towards the industry it regulates. To date, empirical studies evaluating the efficacy of the U.S. securities regime have examined questions related to corporations issuing stock, such as public offerings and securities class actions, in great detail (Cox, Thomas and Kiku 2003, Thompson and Thomas 2004, La Porta, Lopez-de-Silanes and Shleifer 2006, Choi 2006, Cox, Thomas and Kiku 2006, Ferrell 2007). Exploring whether theoretical claims regarding the SEC's conduct find support in the agency's enforcement record is key to assessing its effectiveness, given the critical role of enforcement quality for a financial regulator (Jackson 2007). This paper presents systematic data on the types of violations the SEC pursues, the typical sanctions it imposes, and the enforcement venues (courts and administrative proceedings) and settlement patterns in its actions. In addition, this paper investigates differential enforcement patterns towards large and small firms and their employees, and tentatively explores links between enforcement outcomes and post-SEC career prospects of agency officials.

Proponents of SEC regulation argue that it acts in the interest of the public, protecting U.S. investors from potentially fraudulent schemes of conspiring professionals (Seligman 1983, Coffee 2002, Prentice 2006). Critics of SEC policies raise arguments about agency capture, claiming that broker-dealers form a powerful and well-resourced interest group that can sway regulation to its advantage (Macey and Haddock 1985, Macey 1988, Pritchard 2005). Both groups are concerned that SEC's decisions may be biased by the constant stream of SEC bureaucrats leaving the agency for more lucrative

positions in the financial industry after only a few years of public service (Coates 2001, Langevoort 2006).

To explore these claims empirically, this paper uses a new dataset of all SEC actions against broker-dealers in 1998, 2005, 2006, and the first four months of 2007 to investigate whether the SEC treats large and well-known investment houses more favorably than small broker-dealers. Because the SEC may choose to pursue a broker-dealer by either filing a civil lawsuit or by initiating administrative proceedings before an administrative law judge, the paper first explores the factors that determine the agency's choice of venue. Courts are a worse forum for finance professionals, since, conditional on a finding of violation, a court is more likely than an administrative law judge to ban defendants from the securities industry. The paper finds that, for the same violation and comparable levels of harm to investors, big firms and their employees are more likely to avoid courts and face administrative proceedings instead.

The paper then turns to administrative cases, which the SEC controls more directly than court cases. Again, the paper finds that, for the same violation and comparable levels of harm to investors, big firms and their employees are less likely to receive a ban from the securities industry, compared to small firms and their employees. Some theories could justify the differential treatment of large and small firms, on the basis of systemic risk considerations or concerns about unduly penalizing entire firms because of limited violations. However, no public policy justification exists for the preferential treatment of individual employees in large firms.

Despite extensive controls concerning violation types and levels of harm, it is possible that big firms' conduct is systematically less reproachable than small firms'

conduct, because of better compliance systems, higher quality personnel and sophisticated clients. To alleviate these concerns, the paper presents qualitative evidence on a subset of cases where these concerns would be greatest: cases involving a failure to supervise subordinates. It finds that small- and big-firm violations are so similar in terms of fact-patterns, types of supervisory failures, and specific omissions, that they are virtually indistinguishable from a law enforcement perspective.

Finally, the paper tentatively links the above results with concerns about the post-SEC career trajectories of agency officials, who find employment in big firms' compliance departments or in premier law firms. The paper shows that big firms headquartered in favorable locations receive lower sanctions than big firms around the country, indicating that SEC officials may respond to future employment prospects. The paper also provides some evidence that variation in the quality of legal representation between big and small firms cannot account for the observed differences in sanctions, because these differences persist even for cases where both big and small firms are likely to hire outside counsel.

Section 2 of the paper provides background on the SEC enforcement process. Section 3 examines data and summary statistics regarding court and administrative cases and illustrates what the sanctions are for typical broker-dealer violations. Section 4 presents the main regression results indicating that the SEC is more likely to treat big firm defendants favorably, and discusses robustness checks and limitations of the analysis. Section 5 explores the impact of "revolving doors" between the SEC and the industry. Section 6 includes the case study investigating qualitatively differences in big- and small-firm misconduct within violation type and Section 7 concludes.

2 OVERVIEW OF THE SEC ENFORCEMENT PROCESS

2.1 SEC Monitoring of Broker-Dealer Compliance

The SEC oversees broker-dealers' compliance with its requirements through its inspection program. The Securities Exchange Act of 1934² authorizes the SEC to conduct inspections of broker-dealers' books and records, which in practice also include informal interviews with the broker-dealers' employees. Inspections are not part of SEC's enforcement activities and are conducted by specially designated staff that is separate from SEC's enforcement officers. In addition, broker-dealers are subject to regular inspections by self-regulatory organizations ("SROs"), such as the NASD (now FINRA) or the NYSE. Neither SEC nor SRO inspections are public.

Following the oversight failures in the mutual fund industry in 2003-2004, the SEC established a risk-based approach in targeting regulated firms for inspection. Under this approach, the SEC relies on broker-dealer inspections by self-regulatory bodies, reviewing each year a sample of firms already inspected by these organizations to ensure high inspection quality. In addition to sample reviews, the SEC inspects itself the 20 largest broker-dealers on an annual basis (GAO 2007). Apart from these routine inspections, the SEC also conducts "cause" examinations, prompted by specific suspicions about certain firms (e.g. following a tip), and "sweep" examinations, which explore industry-wide phenomena (e.g. the quality of advice provided to senior citizens). According to the SEC's Performance and Accountability Reports, inspections identify deficiencies in more than 80% of examinations on broker-dealers, investment companies,

² Section 17(b) of the Securities Exchange Act of 1934, 15 U.S.C. 78o (2006).

and other regulated entities, but less than 10% of these instances result in a referral to enforcement staff for further investigation (GAO 2007).

2.2 Investigations

While inspections generally serve monitoring purposes, investigations seek to collect information about specific violations of federal securities laws and are typically the first stage of the enforcement process. The SEC staff may initiate investigations without approval from the Commission, unless it seeks a subpoena. If, at the close of the investigation, the staff finds evidence of potential securities laws violations, it must obtain the approval of the Commission in order to initiate formal enforcement proceedings. The Commission, convening in a non-public meeting that excludes potential defendants, considers the staff's recommendations, seeks input from its General Counsel³ and the heads of other Commission divisions besides Enforcement, and decides whether to move against the defendants and which type of proceedings to pursue.

2.3 Proceedings

Once the SEC decides to formally initiate an enforcement action against a defendant, it can either seek a civil injunction in federal district court or bring administrative proceedings, which culminate in a hearing before an Administrative Law Judge (ALJ). In either case, the Commission can also refer cases to the attorney general for criminal prosecution. Federal securities laws grant the Commission ample authority to bring either court⁴ or administrative proceedings⁵ against regulated entities, such as

³ The General Counsel is appointed directly by the SEC Chairman.

⁴ Section 21(d) of the Exchange Act, 15 U.S.C. §78u(d).

broker-dealer firms, and their employees, thus allowing the agency wide discretion in choosing between these two alternatives. Similarly, the Commission may effectively obtain identical sanctions against regulated entities in both venues.

Yet, administrative proceedings offer to defendants some key advantages in relation to civil courts. Administrative proceedings provide defendants with an opportunity to close the matter swiftly, by negotiating a settlement with the SEC before the formal initiation of proceedings. In practice, the Commission often considers the staff's recommendations for initiating an administrative action and its suggestions for the defendants' offer of settlement at the same meeting. Then, the SEC typically announces its decision in a single order, thus minimizing negative publicity for defendants. This lack of a public announcement about the factual background of the case until a settlement is reached grants both parties substantial leeway in fashioning the settlement terms. Because of their informal character, administrative proceedings are less costly and time-consuming, particularly since they involve sophisticated staff within a specialized agency, rather than generalist federal judges. Thus, current SEC practice in settling administrative proceedings has counterbalanced traditional concerns with the SEC's double role as legislator and prosecutor in these proceedings (Redmond 1938), although ALJs align themselves more closely with the SEC than district court judges (ABA 1992).

Court proceedings may curtail the defendants' negotiating power with regard to settlement terms in an additional way. A court injunction allows the SEC to permanently bar the defendants from the securities industry, if it finds such sanction in the public interest.⁶ Defendants cannot avoid court injunctions when seeking to settle an SEC civil

⁵ Section 15(b) of the Exchange Act, 15 U.S.C. §78o.

⁶ Section 15(b)(4)(C) of the Exchange Act, 15 U.S.C. §78o.

lawsuit, since they must agree – at least in part – with the SEC’s view that their conduct suggests a potential violation of securities laws, likely to be repeated in the future. Following the issue of the court injunction, the SEC typically initiates administrative proceedings to determine whether to order an industry bar. Therefore, even when defendants in a civil lawsuit decide to settle, they have limited bargaining power to avoid a bar from the industry. In contrast, defendants in administrative proceedings face no legal barrier in negotiating a settlement that does not include a bar from the industry. As a result, defendants should prefer administrative proceedings to courts, because of their lower profile, reduced costs, and increased flexibility in setting settlement terms.

2.4 Sanctions

In both courts and administrative proceedings, the SEC can obtain three types of sanctions against broker-dealers: orders prohibiting similar conduct in the future, monetary penalties, and orders expelling defendants from the securities industry. All sanctions are available against both broker-dealer firms and individuals.

As already discussed, SEC civil actions in court seek to obtain an injunction prohibiting the defendant from violating securities laws in the future. Similarly, the Commission can issue cease-and-desist orders in administrative proceedings. Contrary to court injunctions, which allow the SEC to expel defendants from the industry, cease-and-desist orders are only a public reprimand of the defendants’ conduct, often coupled with an undertaking by the defendants to introduce reforms in their compliance process.

Monetary penalties can take two forms. First, the SEC may obtain from the court or impose a fine against the defendant. In addition to fines, courts or the SEC may order

the defendants to disgorge any profits illicitly acquired, including interest. Disgorgement orders seek to deprive violators of their unjust enrichment rather than compensate their victims, although the SEC typically distributes these funds to harmed investors.

Finally, the court or the SEC may prohibit defendants from offering financial services, either on a temporary or on a permanent basis. Firms' licenses may be temporarily suspended or permanently revoked, while individuals may be barred from the industry for a limited time or indefinitely. Expulsion from the industry is the harshest penalty available to the Commission in both venues, because it forces defendants to quit their current business activities and seek a new professional course.

3 VIOLATIONS, SANCTIONS AND SETTLEMENT: DATA AND SUMMARY STATISTICS

3.1 Data

The paper uses data on SEC enforcement actions newly collected and coded from the agency's administrative and litigation releases, available on its website. The dataset includes all SEC enforcement actions against broker-dealers, for any violation of the securities laws, finalized in 1998, 2005, 2006, and the first four months of 2007. 1998 was chosen to allow for variation in SEC enforcement policies under Democrat and Republican administrations. Administrative releases contain in full the ALJ's decision or the order issued by the agency following a settlement. Litigation releases summarize the court's orders and findings.⁷

⁷ The SEC issues releases in various stages during the enforcement process, starting from the initiation of proceedings or the filing of a lawsuit and extending to distribution of retrieved funds to investors. I focus

The SEC's releases provide information only for cases that have resulted in some finding of violation, i.e. cases where the SEC has prevailed, even if the final order is narrower in scope than the initial claims of the agency. Thus, the findings of the paper, especially with regard to choice of venue between courts and administrative proceedings, should be viewed in light of the inability to observe cases where the SEC did not proceed with initiating an action or did not manage to prevail at any of its initial claims.

When an enforcement action concerns multiple defendants, each defendant is treated as a separate observation because defendants may differ in the severity of their violations or the type of their misconduct. The dataset includes observations for both corporate and individual defendants. Data on firms' listing, size, headquarter location, and participation in a corporate group are from the OneSource database. The paper considers as big firms the firms listed on a stock exchange, either within the U.S. or abroad. Affiliates of listed firms are also considered big, regardless of whether the parent company is active in broker-dealer services or in another segment of the financial industry. Information on stock exchange listings was available for all companies in the dataset, while information on other measures of firm size, such as revenue and number of employees, was available only for a subset of companies. To the extent available, data on revenue and employees confirm that listed firms are bigger than non-listed firms. The dataset includes 302 cases involving small broker-dealer firms and their employees, 114

on releases that include an order by the SEC against defendants or referrals to criminal authorities. I record the date of the release announcing the initiation of proceedings and the date and the terms of the settlement or the court ruling as included in the final release. Because SEC practices as to issuance of litigation releases seem less strict in comparison to administrative ones, I have sometimes complemented litigation data with information from administrative releases issued by agency when considering imposing an industry bar following a court-issued injunction.

cases involving big broker-dealer firms and their employees, and 93 cases where the defendants had not been registered with the SEC in any capacity at the time of violation.⁸

3.2 Summary Statistics

There were 509 enforcement actions for violation of broker-dealer registration provisions in the period covered in the sample, including 219 administrative proceedings and 290 court proceedings. 86 court proceedings involved exclusively criminal liability and 21 court proceedings combined criminal and civil liability, while the remaining 183 proceedings involved exclusively civil liability.

3.2.1 Violations in Administrative and Court Proceedings

Table 1 shows the types of violations considered in administrative proceedings and courts. It suggests that most violations, including the most sophisticated ones, may get assigned either to administrative or to court proceedings. However, violations that may give rise to criminal liability are assigned mostly to courts. Indeed, very few (and relatively rare) violations are assigned exclusively to one venue or another.⁹ Some violations are roughly equally represented in both administrative and court proceedings.¹⁰ Violations assigned mostly to administrative proceedings often relate to a failure in

⁸ These 93 cases are excluded from the analysis when exploring differences between big and small firms.

⁹ These are: violation of best execution duties, false net capital computation, fraud in auction-rate securities, violation of MSRB rules and obstruction of justice.

¹⁰ These are: aiding and abetting fraud, bribery, failure as an underwriter, failure to disclose material information, market timing, and unauthorized churning.

supervisory requirements.¹¹ Violations with potentially criminal law implications are usually fraud-based.¹²

[TABLE 1 ABOUT HERE]

This distribution of violations in administrative proceedings and courts runs contrary to a widely held conviction in the legal literature, that the SEC would assign sophisticated violations to administrative proceedings rather than courts. Not only would the SEC be more likely to win these cases in a more favorable venue; it could also utilize administrative enforcement actions to provide regulated entities with guidance about potential misconduct not yet clearly regulated, while not necessarily engaging in the all-encompassing and highly political process of rulemaking (Pitt and Shapiro 1990). Thus, the SEC would engage in “rulemaking by adjudication,” developing rules of conduct on a case-by-case basis through its enforcement orders. As Table 1 demonstrates, the SEC distributes equally between courts and administrative proceedings various sophisticated violations, such as market timing and unauthorized churning, which ranked highly on the SEC’s agenda during the sample period. Other highly sophisticated violations are mostly sent to courts, such as insider trading based on firms’ clients’ orders, which requires a detailed understanding of trading systems unlikely to find in judges.

Since court proceedings offer higher safeguards of objectivity and allow for greater investor involvement, the SEC may prefer them when investors were harmed more severely or more directly, as the higher percentage of fraud-based violations sent to

¹¹ These are: failure to maintain appropriate books and records, violating best execution duties, failure to supervise employees, false net capital computation, fraudulent practices in auction-rate securities, internal control failures, late trading and violation of MSRB rules.

¹² These are: acted as a broker-dealer while unregistered, conspiracy to commit securities fraud, investor fraud, insider trading, insider trading based on firms’ clients’ orders, market manipulation, misappropriating investor funds, obstruction of justice, running a Ponzi scheme.

courts indicates. Disgorgement orders offer an additional way to assess the severity of cases assigned to court or to administrative proceedings. Disgorgement orders aim to recover profits from illicit activities, and thus they are based on the harm actually caused by each violator. Since disgorgement orders are not issued in every case, data were available for 73 administrative proceedings and 127 court cases. As Table 2 demonstrates, disgorgement amounts tend to be slightly higher in court proceedings, suggesting that the cases assigned to courts tend to be cases involving greater and more readily identifiable investor losses. Overall, Table 1 and Table 2 suggest that courts handle more severe violations than ALJs, since they are the venue of choice for fraud-based violations and/or violations that have inflicted somewhat higher harm upon investors.

[TABLE 2 ABOUT HERE]

3.2.2 Settlement in Administrative and Court Proceedings

No administrative proceedings in the sample were fully litigated before an ALJ. Defendants settled with the SEC in 97% of all cases assigned to administrative proceedings; in 87% of cases the settlement is pre-negotiated with the SEC, which issues a single release announcing the initiation and the conclusion of the enforcement action, along with the terms of the settlement. In the remaining 3% of administrative proceedings, an ALJ held a hearing and issued an order with the defendant in default. In courts, defendants settle at 77% of the cases in the sample, are in default in 3% of cases, and litigate the case fully in 9% of cases.

Calculating how quickly defendants settle in each venue is impossible because the SEC does not release information about when it opened settlement negotiations or when it became aware of the defendants' misconduct. However, the SEC provides information about the date on which each violation occurred, which could offer some indication – clearly imperfect – of the duration of efforts to resolve the cases and the impact of settlement negotiations. On average, administrative proceedings lead to resolution of the case 2.9 years after the violation, while courts lead to resolution 3.3 years after the violation.¹³ The 0.4 years differential between the two venues seems small, and it could be due either to speedier resolution in the administrative venue, or to SEC directing to administrative proceedings defendants more willing to settle.

3.2.3 Penalties in Administrative and Court Proceedings

The most severe aspect of SEC and court penalties is the length of time for which defendants are banned from the financial industry. This paper divides administrative penalties in four categories: “0” (no ban), “1” (limited time bar), “2” (somewhat longer bar), and “3” (permanent bar).

[TABLE 3 ABOUT HERE]

[TABLE 4 ABOUT HERE]

Table 3 presents the distribution of industry bars in court and administrative proceedings. It highlights a key finding of the paper: following a court injunction against the defendant, the SEC will almost always exercise its discretion and prohibit defendants from continuing their professional activity as broker-dealers, considering a permanent

¹³ I consider administrative proceedings resolved upon the issue of the SEC order imposing the settlement terms and court proceedings resolved upon the issue of the court injunction, although there often are additional procedural actions implementing these initial decisions.

industry bar to be in the public interest. Provided that there has been a violation of the securities laws, 90% of all cases that go to court result in a permanent prohibition from the securities industry. In contrast, only 17% of the administrative cases results in a permanent prohibition from the industry, while more than half of these cases result in very low administrative sanctions. Table 1 compares the average bar ordered in administrative proceedings and courts for the same type of violation. It finds that, on average, industry bans following a court injunction are at least as lengthy, and in most cases lengthier, than industry bans imposed in administrative proceedings. If indeed the SEC directs to administrative proceedings defendants willing to settle early, it rewards them with terms that are notably more relaxed in comparison to expected court settlement outcomes.

On the other hand, Table 4 shows that fines are slightly higher in SEC proceedings, although they remain below \$100,000 in 70% of SEC proceedings and 84% of court proceedings.

4 ASSIGNMENT TO COURT AND SANCTIONS: MAIN REGRESSION RESULTS

This section presents regression results addressing two key questions. It first considers whether big firms, and the employees associated with big firms, are more likely to be assigned to court or administrative proceedings. Having thus explored the composition of the two defendant pools, the paper then focuses exclusively on administrative defendants. It examines whether the SEC is likely to impose lower

sanctions, i.e. shorter industry bars and lower fines, to big firms and their employees in comparison to small firms and their staff.

4.1 Likelihood of Going to Court

As Table 5 shows, 62% of cases against small firms or their employees ended up in court, compared to 25% of big firm cases. Since sending a firm to court might lead it to close down business, the SEC would be more reluctant to bring lawsuits against firms, particularly big ones: indeed, the likelihood of going to court is 4% for a big firm and 17% for a small firm. More surprisingly, however, the SEC seems willing to avoid courts even for individuals associated with big firms: the likelihood of going to court is 44% for a big firm employee, compared to 73% for small firm employees.

[TABLE 5 ABOUT HERE]

The analysis below uses logistic regression models to predict whether cases concerning big and small firms are likely to be assigned to administrative or court proceedings, taking into account the type of violation and the harm caused to investors. The dependent variable takes a value of “0” if the case is assigned to administrative proceedings, and a value of “1” if the case is handled by a court.¹⁴

Since the SEC has full discretion to direct an enforcement action against specific individuals, the firm associated with these individuals, or both, pooling observations for firms and individuals is appropriate for many analytical purposes. SEC’s flexibility allows regulated entities to negotiate the defendant choice as part of their settlement, particularly in administrative proceedings where the SEC initiates the action formally

¹⁴ As already mentioned, the sample excludes the 93 cases in the dataset where the defendants acted as broker-dealers without being registered with the SEC or without being associated with a firm registered with the SEC in any capacity.

only after agreeing on settlement terms (Philips and Ochs 2007). In many circumstances, firms prefer to shield their personnel from direct accusations, because they may view their violations as firm-wide culture failures or because management may be implicated, thus opting to bargain for an action directed only against the firm. Instead, where firms can release themselves of the accusations' stigma by pointing to specific perpetrators, they are likely to consent to naming individual defendants. The discussion below thus contains both results based on pooled data, and results based on separate analysis of firm and individual data. There are no substantial differences.

To account for the level of harm caused by each violator, Model I includes the logarithm of disgorgement amounts as a control.¹⁵ In Model II, control for level of harm is dropped and controls for type of violation are introduced, while Model III includes controls both for type of violation and level of harm. Year dummies are also included to account for any year-specific effects (e.g., a new type of violation being identified and rigorously pursued in a given year). Results are clustered by SEC release, since a finding of violation against one of the targeted individuals or firms in a case is likely to be correlated with the outcome of the case for the remaining persons involved in the same factual background.

Models I, II, and III also include a dummy variable for corporate and individual defendants, since firms are less likely than individuals to end up in court. Moreover, the dataset in these models includes cases where criminal authorities were involved, which always result in court proceedings. As a robustness check, Model IV repeats the analysis

¹⁵ The logarithm takes a value of "0" in cases where the court or the SEC has not ordered the payment of disgorgement. When limiting the analysis to the 200 cases where disgorgement was ordered, results remain in the same direction but are not statistically significant in all models, due to the reduction in sample size.

on a subset of the data that excludes all cases where the defendant is a firm, as well as all cases with criminal elements.

[TABLE 6 ABOUT HERE]

These regressions indicate that, after controlling for all the factors mentioned above, cases involving big firms and their employees are more likely to end up in administrative proceedings, while cases about small firms and their employees are more likely to end up in court. According to the odds ratios for Model I, the expected probability of a big firm going to court is on average 65% lower than the expected probability of a small firm going to court, ranging between 56% and 74%. In Model III, the same probability is 75% lower on average, ranging between 54% and 86%.¹⁶ Even when firms and criminal cases are excluded from the dataset, the size of an individual's employer continues to be an important predictor of the case's venue.

The results also confirm that, controlling for type of violation and harm to investors, the SEC is more reluctant to send firms to court, as the difference between firms and individuals is highly statistically significant. Finally, results suggest that the SEC tends to assign to courts cases where the harm to investors was larger.

4.2 Industry Bans

The sample for the analysis below consists exclusively of administrative proceedings, handled by SEC staff, that involve defendants previously registered with the SEC as broker-dealers (200 cases). The analysis explores whether the SEC is likely to impose shorter industry bans and lower fines on big firm defendants compared to small firm defendants.

¹⁶ Results are interpreted using CLARIFY software. See King, Tomz and Wittenberg (2000).

Table 7 presents the distribution of industry bans among big and small firm defendants. Big firm defendants are more likely to receive no industry ban: 69% of them receive only a censure or cease and desist order, compared with 45% of small firm ones. On the other end of the spectrum, more than ¼ of small firm defendants are permanently banned from the industry, compared to just 5% for big firm defendants.

[TABLE 7 ABOUT HERE]

Table 8 presents the results of ordered logistic regression analysis predicting the industry ban imposed in the sample cases for big and small firm defendants. The dependent variable in these models, the type of industry ban, takes a value of “0” for no ban, “1” for a ban up to one year, “2” for a ban between one and five years, and “3” for a permanent ban. The sample for Models I, II and III includes cases brought either against firms or against individuals, while Model IV limits the analysis on individuals.

Model I accounts for the level of harm caused by each defendant by including the logarithm of disgorgement awards as a control. However, the SEC might agree to impose shorter industry bans in exchange for higher fines. To account for this possibility, Model II introduces the logarithm of fines imposed by the agency as a control in predicting the severity of the industry ban.

Model III explores whether the severity of industry bans depends on the type of violation committed. To assist the analysis, violations are grouped in four general categories: investor fraud, which refers to fraud committed directly against investors (such as failure as an underwriter or failure to disclose material information); regulatory violations, which refers to failure to comply with supervisory rules (such as books and records violations or false net capital computation); market fraud, which involves some

form of misbehavior in the market that ultimately affects investors (such as market manipulation); and sophisticated violations, which includes novel types of violations (such as market timing). In all four models, results are clustered by SEC release and year dummies are included.

[TABLE 8 ABOUT HERE]

All models confirm that industry bans for big firm defendants are likely to be disproportionately less severe in comparison to small firm cases. Based on Model I, with all variables held at their mean, the probability that a big firm defendant will receive no industry ban is almost 80%, versus 50% for a small firm one, representing a 60% increase in favor of big firm defendants.¹⁷ Similarly, the probability of a small firm defendant receiving any particular sanction (1, 2, 3) is commensurately higher. Moreover, even when limiting the analysis on cases against individuals employed by broker-dealers, excluding the firms themselves, big firm employees are likely to receive less severe bans than small firm employees, as Model IV shows.

Models II and III suggest that only very large increases in fines could bring about a reduction in administrative sanctions. According to Model III, the odds of a permanent ban from the industry are 0.84 times lower when the logarithm of fines increases by one unit, which reflects potentially large absolute fine amounts.

4.3 Fines

To assess the level of fines in connection with the harm caused in each case, the discussion below examines the ratio of fines to disgorgement awards, which seek to retrieve profits illicitly acquired. In the dataset, fines/disgorgement ratios for

¹⁷ Results are interpreted using CLARIFY software.

administrative proceedings range from 0 to about 10,¹⁸ with the average ratio set at 0.9 and the median ratio at 0.26. Table 9 below presents average fines/disgorgement ratios for big and small firms in administrative proceedings as well as courts.

In administrative proceedings, the SEC imposes roughly equivalent fines on small and big firms. Although big firms receive slightly higher fines/disgorgement ratios than small firms, this difference is not statistically significant, as confirmed by regression analysis not reported here. In the light of the gap in severity of industry bans reported above, the similarity in fine levels seems even more noteworthy, especially since they refer to the same subset of cases.

In courts, small firms are likely to receive lower fines than big firms. The difference in fines/disgorgement ratios for big and small firms is statistically significant at the 0.05% level; this result persists despite diverse robustness checks (not shown here). Why courts give lower fines to small firms is not clear. A plausible explanation, that courts adjust fines to defendants' ability to pay, cannot fully account for the discrepancy in these data. Courts report separately on fines reflecting the defendants' misconduct and fines waived because of defendants' inability to pay. Table 9 data are based on pre-waiver amounts.

[TABLE 9 ABOUT HERE]

4.4 Robustness Checks

The difference in severity of industry bans between big and small-firm defendants might reflect a selection bias resulting from SEC's inspection strategy, which focuses

¹⁸ Excluded are certain extreme cases where a disgorgement of \$1 was imposed, thus raising the ratio of fines to disgorgement abnormally high.

predominantly on big firms. While intensively supervising the activities of big firms, SEC officials may become aware not only of egregious behavior but also of less significant misconduct, which nevertheless they have the duty to pursue. In contrast, cases involving small firms and their employees, who are not subject to similar levels of oversight, are more likely to arise from gross misconduct that becomes evident to investors. As noted above, only 10% of inspections result in referrals to enforcement staff that may initiate action either in courts or administrative proceedings. To address concerns about selection bias due to inspection practices, the regressions on Table 8 are repeated, but with a sample excluding all cases involving the 20 largest firms,¹⁹ who are inspected on an annual basis (GAO 2007). As Table 10 demonstrates, the difference in industry bans between big and small-firm defendants persists and remains statistically significant.

The SEC may impose lower penalties on listed firms because it takes into account the setbacks these firms face as a result of the public announcement of SEC enforcement orders in comparison to non-listed firms. Because information on listed firms is widely publicized on various stock exchange-related media, potential clients are more likely to be informed of a firm's past misbehavior and the firm's stock price is likely to suffer. However, Table 11 demonstrates that, on average, the SEC imposes identical industry bans on listed and non-listed firms of similar size. Although results are not statistically significant because of the small number of observations in the dataset, they are consistent for two groups of firms with different cut-off points.

[TABLE 10 ABOUT HERE]

¹⁹ Since the SEC does not identify the 20 largest firms it inspects each year, 2007 revenue data from OneSource database were used to identify the firms.

[TABLE 11 ABOUT HERE]

4.5 Overview of Main Regression Results

To sum up, the following pattern arises from the above regression results. Big-firm defendants are less likely to be assigned to courts than small-firm defendants, thus avoiding the harsh consequences of a court-issued injunction. Among defendants assigned to administrative proceedings, big-firm defendants are less likely to receive an industry ban from the SEC, although they pay only slightly higher fines than small-firm defendants. Most notably, the individuals associated with a big firm are more likely to end up in administrative proceedings rather than courts and to avoid an industry ban in these proceedings, compared to individuals in small firms. The differential in individuals' industry bans is particularly troubling from a public policy perspective. Even when big firms are evidently engaged in grave misconduct, suspending or revoking their license may penalize stakeholders far removed from the individual violators and may have wider consequences for the financial system. Yet, the SEC cannot be similarly reluctant to impose industry bans on employees of big firms whose fortunes are separate from their employers and whose individual behavior is as reproachable as the behavior of small firm employees.

5 REVOLVING DOORS BETWEEN THE SEC AND THE FINANCIAL INDUSTRY

Although a large literature examines how judges' backgrounds and motivations shape their judicial opinions,²⁰ empirical studies focusing on how these factors affect adjudication by administrative officials have so far been limited. Yet, concerns that "revolving doors" between industry and government may hurt regulators' independence have strong theoretical foundations. More specifically, theory suggests multiple channels through which agency employees' past career trajectories and future goals may affect regulatory performance.

In regulatory capture models predicting that the industry will attract regulators' favor through monetary incentives (Tirole 1986), post-agency employment at higher salaries may operate as a *quid pro quo* in return for favorable regulatory treatment. Even in the absence of a direct promise for future employment, agency officials have incentives to utilize their discretion so as to avoid displeasing investigated firms and their counsel. For officials leaving the agency, the personal connections developed during their time at public service are valuable, either as direct links to prospective employers, or as a credible source of information for other employers. Even officials who have no interest in industry employment, however, will prefer a conciliatory outcome in investigations where the persons representing the defendants may soon occupy a position within the agency, either as their colleagues or, more likely, as their superiors. Thus, the prospect of career advancement or material rewards may lead agency officials to compromise their regulatory rigor.

The "revolving doors" between an agency and the industry it supervises may also affect regulatory performance through socialization mechanisms. Theorists have long

²⁰ See, e.g., Ashenfelter, Eisenberg and Schwab (1995); Farhang and Wawro (2004); Gulati and Choi (2008). For a review, see Sisk and Heise (2005).

argued that regulators with industry origins have become “socialized” into that industry’s concerns and aspirations, carrying this perspective into their regulatory tasks. Scholars have identified such influence in the policymaking decisions of FCC Commissioners (Gormley 1979, Eckert 1984, Cohen 1986), central bankers (Adolph 2004), and state insurance commissioners (Grace and Philips 2008). Moreover, industry representatives who formerly occupied high positions within the agency can convincingly rely on their reputation to secure a more lenient treatment for their clients’ misconduct.

While “revolving doors” are typically associated with favoritism in regulatory policymaking and adjudication, some theorists have argued that personnel flows between the industry and its regulators may be mutually beneficial. For Salant (1995), personnel flows ensure a stable regulatory environment that allows investment to flourish. According to Che (1995), agency officials will take advantage of their public service term to master their command of regulatory requirements, improve their understanding of the industry’s particularities, and build up their monitoring skills. Once these well-trained officials enter private practice, they can better assist their employers or clients to organize their business in a law-abiding manner and can represent them more effectively against the supervising agency.

Sympathetic accounts of the “revolving doors” phenomenon have different predictions as to the conduct of regulators who, while still in office, are looking for a lucrative position in the industry. According to this view, agency officials seeking to communicate their improved abilities to prospective employers will perform their regulatory functions more aggressively (Che 1995), and not more leniently, as traditional collusion models would predict. However, this prediction assumes that regulatory

officials cannot send distinct signals concerning their superior skill-set and their use of discretion (Dal Bó 2006). One might instead imagine that shrewd regulators favorably disposed to the industry's viewpoint can offer more assistance to targeted firms than staunch persecutors, and represent a better fit for the industry.

Determining the impact of the “revolving doors” phenomenon in SEC enforcement practices is particularly important, due to the high frequency of personnel movements between the SEC on the one hand, and the financial industry and its specialized consultants, such as law firms and accounting firms, on the other. Of all regulatory officials in the SEC in the beginning of 2007, 8.6% had left the agency by that year's end (SEC 2007). Approximately 1/3 of SEC staff left the agency between 1998 and 2000 (GAO 2001). Almost half of total SEC officials intend to stay with the agency for less than 5 years in aggregate; only 36% would consider spending their entire career at the SEC (GAO 2001). More than half of total SEC employees were employed in the private sector before joining the agency; on average, SEC officials earn 50% less than employees in comparable positions in the industry. Since industry employment is central to SEC officials' professional origins and future moves, it could affect their conduct in the enforcement proceedings through the mechanisms described above.

The following paragraphs examine the impact of potential “revolving doors” between the SEC and the industry on the administrative sanctions imposed by the agency, distinguishing between hypotheses emphasizing future employment prospects, socialization processes and former SEC officials' superior training. Direct tests of these hypotheses would require detailed data about how particular SEC officials handled individual enforcement actions and what these officials' post-SEC career moves entailed.

As such data are not publicly available, the evidence presented here is indirect and limited to identifying empirical regularities suggestive of the validity of the hypotheses above. Additional research and information will be necessary to address these questions conclusively.

5.1 Employer Favoritism and Socialization

While employer favoritism, socialization and personnel superiority commonly predict lower sanctions for the preferred employers of SEC officials, i.e. the big firms, they could apply differentially to separate subparts of the big-firm population. In particular, employer favoritism should be directed primarily towards firms headquartered in areas where SEC officials would prefer to work after they leave the agency. Urban areas with high levels of financial activity should be more appealing to SEC officials, because they provide access to a wider set of future employers. In addition, these areas offer ample employment opportunities for the employee's spouse and are more attractive to other people in the employee's social circle. In contrast, if SEC officials impose lower sanctions on big firms because they have come to share the industry's perspective through socialization processes, they should not distinguish between firms located within financial hubs and other firms.

Table 12 examines whether big firms located in financial centers, and individuals associated with these firms, receive less severe industry bans than other big firm defendants. Depending on headquarters' location, firms are divided using three criteria: firms located in the greater New York area ("NY-NJ") versus other firms, firms located

in the greater New York area and Massachusetts²¹ (“Desirable Location”) versus other firms, and firms located in cities where there is a stock exchange (“Exchange Location”: New York, Chicago, Boston, and Los Angeles) versus other firms. Since the type of industry ban is an ordinal variable, Wilcoxon-Mann-Whitney tests are performed to compare mean sanctions for each group.

In all three groups, listed firms located in the target area receive lower industry bans compared to listed firms located outside that area. Results are statistically significant at the 5% level in all three groups. Thus, the geographical divide in enforcement bias is generally supportive of the employer favoritism hypothesis and rather inconsistent with the socialization hypothesis, whose impact should be uniform across the country. Of course, the difference in means is an initial indication of favorable treatment; a larger number of observations would permit regression analysis taking into account factors such as the type of violations and the fine/disgorgement ratios.

5.2 Superior Skills of Former SEC Employees Now in Private Practice

Firms attractive because of their location may pick those former SEC officials that have demonstrated superior qualities during their term, to serve either as general counsels or compliance officers within the firm, or as their close external advisors from law firms or accounting firms. More generally, SEC-trained professionals may be more readily available to big broker-dealers and their employees, who can devote superior resources to high quality legal representation.

²¹ Massachusetts was chosen because it attracts large institutional investors, such as mutual funds. The dataset does not include any broker-dealer firms headquartered in Connecticut.

Data on the lawyers or law firms that represented each defendant would help clarify the impact of legal representation on fines and industry bans in administrative proceedings, but such data are not publicly available. To gauge the role of counsel in explaining the difference in sanctions between big and small firm defendants, this paper seeks to exploit potential variation in the quality of legal teams that defendants are likely to hire for different violations. According to the superior legal representation hypothesis, big-firm defendants are more likely than small-firm ones to have regular access to well-established legal teams. However, when accused of severe violations likely to result in a ban from the industry or a license revocation, small-firm defendants are also likely to hire outside high-quality litigators. While big-firm defendants may still possess an advantage over small-firm ones in high- and low-stakes violations, the difference should be smaller for high-stakes violations because of the large improvement in quality of legal representation of small-firm defendants. Therefore, when the difference in the quality of counselors between big- and small-firm defendants diminishes, the difference in the severity of industry bans between the two groups should also shrink.

The analysis below concentrates on violations that concern fraudulent behavior by broker-dealers or their employees that the SEC assigned to administrative proceedings. As Table 13 demonstrates, these fraud-based violations attract industry bans or license revocations more often than other violations (coded “3” following the ranking on Table 7 above).

The ordered logistic regression analysis in Table 14 explores whether big- and small-firm defendants receive comparable sanctions in fraud-based violations. Similar to Tables 7 and 8 above, the dependent variable consists in the type of industry ban, ranked

from 0 to 3 depending on severity. The results indicate that the difference in bans between big- and small-firm defendants persists, and even widens a little, despite comparably sophisticated legal teams for each type of defendant. Models I and II focus on the subset of fraud-based violations and include controls similar to Table 8 above. Models III and IV repeat the analysis for all remaining violations, to dispel concerns that the fraud-based violations drive results in Table 8. All four Models show that the likelihood of a big firm receiving a particular sanction (1, 2, or 3) remains consistently lower compared to the likelihood of a small firm receiving that sanction, although the quality of legal representation is likely to vary. These results suggest that differences in legal counsel between big and small firm defendants cannot fully explain the observed differences in industry bans. Further analysis would be necessary to fully disconfirm this hypothesis.

6 SYSTEMATIC DIFFERENCES BETWEEN BIG AND SMALL FIRMS' CONDUCT

6.1 Case Study Choice

The difference in severity of industry bans between big and small firm defendants could reflect a systematic difference in the egregiousness of their misconduct not captured by regression controls in the models above. Sanctions' severity could reflect various parameters of the violators' behavior, such as levels of negligence, techniques used to deceive investors, or egregiousness of the violators' fraudulent practices. If big firm defendants commit acts that are systematically less reproachable than those of small

firm violators, even though they otherwise contravene the same prohibition of the securities laws, they should receive lower penalties.

Such systematically dissimilar misconduct by big and small firms could result from differences in their operation, their workforce and their client base. Big firms operate sophisticated supervision systems to monitor their employees' performance and to ensure quality of service to clients, committing capital and staff in ensuring compliance with securities laws. Moreover, big and small firms may differ also in the quality and training of their personnel, as skillful and well-paid traders might be less likely to resort to fraud. Finally, big firms' sophisticated clients are unlikely fraud victims, especially compared to retail investors, who make up small firms' client base. Thus, differences in sanctions between small and big firms could simply reflect their differences in sophistication.

The distribution of violations between big and small firm perpetrators in the dataset (Table 15) suggests that, while some fraud-based violations are more common among small firms, sophisticated and compliance-related violations are evenly distributed in this data. Although the dataset includes a small number of cases for each type of violation, thus preventing conclusive results, small firm perpetrators are predominant in certain fraud-based violations such as general fraud or unauthorized churning. Yet, in a number of sophisticated violations, such as late trading, market timing, or front-running, big and small firm violators are equally represented. Moreover, violations relating to in-firm compliance systems, such as supervisory failures or internal control failures, are common among big and small firms alike. Overall, although small firms commit some fraud-based violations more frequently than big firms, systematic differences between

small and big firms do not necessarily translate into differences in the types of violations they commit.

To further explore whether differences between big and small firms systematically shape individual conduct even when violating the same prohibition, the following paragraphs examine qualitatively all violations for a single securities law breach: failure to supervise. This violation presents several advantages for a case study. From a theoretical standpoint, failure to supervise represents the hardest test case. If differences in big and small firms' sanctions reflected differences in firm sophistication not captured by violation types and costs, one would expect these differences to be more pronounced in violations involving failure to supervise. Big and small firms have very different compliance systems; the case study investigates whether these compliance systems lead to diverse failures to supervise. Moreover, the number of supervisory failures in the dataset – 37 defendants in 26 releases – allows for a rich case study with meaningful conclusions. Finally, the SEC routes the vast majority of supervisory failures to administrative proceedings regardless of whether the perpetrator is associated with a big or a small firm, alleviating concerns that court assignment could systematically bias the violations' pool. After a brief doctrinal overview, the paragraphs below present summary statistics and discuss patterns of conduct by big and small firms, showing surprising similarities between them.

Either persons or firms can be liable for a failure to supervise, if they fail to prevent a violation of the securities laws by another person who is subject to their supervision.²² However, this provision also establishes a safe harbor, which allows supervisors to escape liability if they fulfill three conditions: they have established

²² Securities Exchange Act of 1934, §15(b)(4)(E), 15 U.S.C. §78o(b)(4)(E).

procedures that could reasonably detect and prevent such a violation, they have established systems to implement these procedures, and they have fully discharged their obligations under these procedures and systems.

The Commission has devoted its jurisprudence in clarifying the substantive requirements of each safe harbor condition. In determining whether a firm has established the necessary oversight procedures, the Commission examines the firm's rules and principles, often included in compliance manuals or other communications to staff. Since almost no firm today suffers from a complete absence of procedures, the Commission will find a firm's procedures lacking or inadequate when there is a gap, i.e. when they fail to cover certain activities of that firm.

Systems implementing procedures refer to specific measures that supervisory personnel must take in order to ensure that procedures have been complied with. A system generally consists in an effectively organized supervisory structure that clearly assigns specific tasks to each supervisor, such as periodic review requirements, mandated inspections, or reports to superiors.

Finally, a supervisor will be deemed to discharge her supervisory obligations when she has diligently performed the tasks assigned to her by the firm's systems, and she has reasonably concluded that her staff does not violate the firm's procedures. The Commission examines whether the supervisor received, either through the firm's systems or otherwise, clear signals of employee misbehavior ("red flags"), and yet failed to respond adequately by strengthening employee oversight.

As Table 16 shows, all the above types of supervisory failure include an equal number of big and small firm perpetrators. This picture is somewhat surprising, because

big firms put significant efforts in organizing their ongoing compliance and therefore should not suffer as much from inadequate procedures or systems. Table 16 also confirms that, with regard to supervisory failures, big firms and their employees received lower administrative sanctions and lower fines than small firms and their employees. The following paragraphs discuss violations in big and small firms in each type of supervisory failure, demonstrating that deficiencies in oversight are very similar in big and small firms.

[TABLE 16 ABOUT HERE]

6.2 Inadequate Procedures

All firms in the sample, however small, had established some compliance infrastructure at the time of the violation, thus alleviating concerns that smaller firms have no supervisory mechanisms. The single case where the failure to adopt supervisory procedures extended over a whole department involved the CEO of a big firm, Stockwalk Group, who had made no effort to oversee the firm's stock lending unit, resulting in the liquidation of the firm.²³

Big and small firms were equally deficient in establishing procedures to prevent market timing and late trading in mutual fund stocks. In *Kaplan & Co.*, the Commission found that, as a result of lack of procedures, a small firm failed to detect the strategies traders used to deceive mutual funds, such as multiple account numbers, multiple registered representative numbers, and multiple office branch codes.²⁴ The Commission also found that traders in *Southwest Securities*, the brokerage arm of the publicly held

²³ See Release 55024, Todd W. Miller, December 29, 2006.

²⁴ See Release 54954, Kaplan & Co. Securities, Inc. and Jed P. Kaplan, December 18, 2006, p.3

SWS Group, used identical deceptive tactics with the Kaplan traders: multiple account numbers, with multiple customer-affiliated entities as account holders.²⁵ The Commission concluded that the firm lacked procedures to detect late trading.

Another common failure for big and small firms relates to supervision of remote or specialized traders. In *H. Beck, Inc.*, the Commission found that a non-listed firm failed to supervise one of its registered representatives who operated independently the firm's Ohio office, because it did not require any inspections of independently operated offices.²⁶ A publicly held broker-dealer, FSC, had exhibited the same deficiencies. The Commission found that it failed to subject to any supervision registered representatives who operated as FSC's independent contractors.²⁷ Similarly, in *O'Brien*, the SEC found that a big brokerage house, Credit Suisse First Boston, failed to supervise a trader located in New York who handled all arbitrage trades with Australia, because it had established no back office review of trades in Australian stocks and ADRs.²⁸

6.3 Inadequate Systems

Brokerage firms and their managers have been relatively successful in adopting procedures that consist in a basic set of operating rules ensuring compliance with securities laws; however, they have been less effective in establishing adequate implementation systems (i.e., a clearly identified set of tasks and responsibilities).

In both big and small firms, lack or inadequacy of review processes often permits "rogue traders" to emerge: a broker-dealer employee organizes fraudulent activities either

²⁵ See Release 51002, Southwest Securities, Inc., Daniel R. Leland, Kerry M. Rigdon, and Kevin J. Marsh, January 10, 2005

²⁶ See Release 39943, H. Beck, Inc, and Gary S. Hurvitz, May 1 1998.

²⁷ See Release 40765, FSC Securities Corporation, December 9, 1998.

²⁸ See Release 51764, Charles J. O'Brien, Jr. and CSFB, May 31, 2005.

on her own, or in cooperation with a customer. On the small firm side, the firm and the CEO in *Archer Alexander*²⁹ did not review whether a trader was abiding by the firm's prohibition to deal in risky inverse floating collateralized mortgage obligations, despite explicit procedures requiring the CEO's prior approval for such trades. In another small firm case, *Helbock and Figliolini*, the president of the firm failed to review all daily order tickets, thus permitting a registered representative to execute market manipulation trades on behalf of some hedge funds.

Rogue traders and related review defects in big firms are strikingly similar. A big broker-dealer, First Montauk, prohibited registered representatives from holding long-term positions in mortgage-backed securities without authorization by a supervisor; yet they were able to evade this process because their supervisor failed to review the accuracy of the information he was given.³⁰ Big firms are not traditionally associated with Ponzi schemes; yet, in a case involving the brokerage arm of Fidelity, the mutual fund giant, the SEC sanctioned the president and chief supervisory officer for not establishing a review system for incoming customer correspondence, and third-party deposit checks.³¹ Had this system been in place, supervisors would know that a customer, with support from a registered representative, was constantly writing checks from the account to third parties that had previously deposited checks to that same account. In another case involving the securities subsidiary of a large insurance group, New York Life, two registered representatives in an off-site branch misappropriated investors'

²⁹ See Release 34-54937, John M. Repine and Archer Alexander Securities Corp, December 14, 2006, p. 6-7.

³⁰ See Release 40450, Brian M. Cohen, September 18 1998.

³¹ See Release 51266, Norman R. Hess, February 25, 2005.

funds.³² The SEC found that the firm's supervisory systems were deficient because they provide for daily review of the representatives' activities, and did not include review of the customers' files.

Another characteristic case of system deficiency, common in big and small firms, relates to problems in task delegation to supervisors and lack of instructions. In *Kaplan*, the Commission found that, although this small firm's compliance manual required review of customer accounts and firm correspondence, the firm and its chairman never provided such instructions or training to supervisors, or examined whether the supervisors are conducting any monitoring.³³ Similarly, the Commission penalized the president of *Vfinance Investments*, the subsidiary of a listed firm, for not implementing Vfinance's supervisory procedures. The Commission found that Vfinance's system did not identify the persons responsible for supervising traders or the steps to be taken to prevent market manipulation, and that the president of Vfinance never communicated these procedures to supervisory staff.³⁴

6.4 Failure to Discharge Supervisory Duties

In more than half of all supervisory failures in the dataset, the broker's management did not respond adequately to indications of wrongdoing by the firm's employees that should raise suspicions to managers. In an alarming subset of cases, managers received explicit letters of complaint and other documentary evidence from customers, other employees and even self-regulatory organizations. Time and again,

³² See Release 40459, NYLife Securities Inc., September 23, 1998

³³ See Release 54954, Kaplan & Co. Securities, Inc. and Jed P. Kaplan, December 18, 2006, p.4-5.

³⁴ See Release 51531, Marc N. Siegel, April 12, 2005, p. 3.

managers in big and small firms alike failed to take any serious measures against the wrongdoer.

Small firms and their managers were often deficient in responding to signals of potential violations by their staff. For example, a registered representative in a small firm concealed trades in high-risk bonds for retail investors by falsifying order tickets to present sales and purchases as occurring in the same day, where in fact he held the bonds in the customer accounts for months. The SEC sanctioned the firm's chief executive officer for failing to inquire why, although the sales and purchases always coincided, the representative was earning significant mark-ups.³⁵ The circumstances surrounding a manipulative trading scheme in another small firm case were similar: a representative traded heavily at the last thirty minutes at month-end in otherwise thinly-traded small-cap stocks, so as to affect the price of the stock.³⁶ Again, the Commission found that the president and the head of trading of the firm, as well as the direct supervisor of the trader, ought to have launched an inquiry into the trader's conduct.

Cases involving big firms follow similar patterns of supervisory failures. In the case discussed above regarding a customer operating a Ponzi scheme through a Fidelity brokerage account, the SEC also identified a failure to respond to red flags.³⁷ According to the Commission, the president and supervisor of the account, who became aware of third parties depositing checks and receiving payments from the account, and who saw the huge losses on the account, should have taken follow-up actions. In another case involving a publicly held firm, Suncoast, the trading desk supervisor failed to inquire

³⁵ See Release 34-54937, John M. Repine and Archer Alexander Securities Corp., December 14, 2006.

³⁶ See Release 34-54536, John P. Figliolini, Jr., September 28, 2006; Release No. 54512, John F. Helbock, September 26, 2006; Release 53906, Robert W. Oakes, Jr., May 31, 2006.

³⁷ See Release 51266, Norman R. Hess, February 25, 2005.

why the prices charged by a trader to his largest client were significantly marked down and not reasonably related to prevailing market prices, and why the commissions paid to Suncoast were unusually high; in fact, the trader was bribing the client's staff.³⁸ Similarly, in a landmark case involving Jefferies & Co, another publicly held broker-dealer, the Commission sanctioned the director of equities for not inquiring why his top-earning registered representative's business originated from just seven traders from Fidelity, given that he was allowed a \$1.5 million entertainment budget.³⁹ Hiring private planes and arranging for golf courses amounted to illicit compensation, according to the SEC. Finally, a branch manager from Raymond James, a publicly held broker-dealer, after realizing that an employee sent false information to investors to attract them in a customer's potentially fraudulent project, did not terminate relationships with them, made no further inquiry into the employee's conduct, and did not take any steps to restrict the employee's activities.⁴⁰

The final set of supervisory failures illustrates that, even when securities violations are explicit, managers in either big or small firms can fail to take disciplinary measures. For example, a managing director and head of financial services at CIBC, a publicly held Canadian company, received over 1,000 letters and emails from mutual funds complaining that specific traders engaged in market timing. In addition, he was aware of actions by these traders that could be used to deceive the funds, such as using multiple accounts. Yet, he took no action against these traders.⁴¹ Another publicly held broker-dealer, Southwest, received letters, emails and account blocking notices from 35

³⁸ See Release 54108, Todd J. Cohen, July 6, 2006.

³⁹ See Release 34-54861, Jefferies & Co., Inc., and Scott Jones, December 1, 2006.

⁴⁰ See Release 51109, David Lee Ullom, January 28, 2005.

⁴¹ See Release 34-55209, Marshall Dornfeld, January 31, 2007.

mutual fund families, representing hundreds of funds, complaining of some traders' market timing strategies. Again, no disciplinary action followed.⁴² In the Raymond James case discussed above, compliance officers and management also received a letter of complaint by investors, exposing the trader's misrepresentations. Moreover, a director of mutual funds sales at the brokerage subsidiary of Credit Suisse First Boston, a publicly held financial group, ignored the compliance department's warnings that a trader did not hold the proper series registration for the type of activities he pursued.⁴³

Explicit indications of securities violations can also arise from reports by other departments within the broker-dealer, or from self-regulatory organizations in the securities industry. In a characteristic example, a Salomon Smith Barney analyst assigned unusually favorable "buy" recommendations to stocks issued by clients of the investment banking division of his firm. Although retail brokers criticized him harshly, other supervisors highlighted the problem in their reports, and he himself mentioned pressure from the investment banking division to his direct supervisors, they did not respond to these concerns.⁴⁴ Moreover, the SEC found that disciplinary action by self-regulatory bodies ought to alert managers to their employees' misconduct. The NASD had sanctioned a trader at a small brokerage firm for not adhering by the terms of the offering memorandum regarding unregistered partnership interests. Yet, the managers failed to launch a full inquiry regarding the information in the memorandum, which would have revealed the trader's misrepresentations.⁴⁵ In a similar small firm case, the SEC

⁴² See Release 51002, Southwest Securities, Inc., Daniel R. Leland, Kerry M. Rigdon, and Kevin J. Marsh, January 10, 2005.

⁴³ See Release 40467, Nicholas C. Bogard, September 23, 1998.

⁴⁴ See Release No. 51713, John B. Hoffman and Kevin J. McCaffrey, May 19, 2005.

⁴⁵ See Release 39943, H. Beck, Inc, and Gary S. Hurvitz, May 1 1998.

sanctioned the broker-dealer's manager for not placing under tight supervision a registered representative with a serious disciplinary past.⁴⁶

7 CONCLUSION

This paper examines SEC enforcement against broker-dealers, focusing on whether big (listed) firms receive preferential treatment compared to small firms. It uses a new dataset of SEC enforcement actions against broker-dealers in courts and administrative proceedings during 1998, 2005, 2006, and the first four months of 2007. The analysis shows that, for the same violation and comparable levels of harm to investors, a big-firm defendant is on average 75% less likely than a small-firm defendant to end up in court rather than in an administrative proceeding, facing a higher likelihood of being banned from the industry as a result. More importantly, among cases that the SEC assigns to administrative proceedings, big-firm defendants are 60% more likely than small-firm defendants to receive no industry ban, controlling for violation type and harm to investors. The gap between big and small firms persists when limiting the analysis to the individual employees of such firms, who should not be shielded by public policy considerations potentially prevalent when the SEC considers enforcement against a large broker-dealer firm.

To address concerns that the conduct of big firms and their employees is systematically less egregious than small firms' conduct, even when otherwise violating the same provision under the securities laws, the paper presents case study evidence. Since such a systematic bias would likely result from big firms' sophisticated compliance

⁴⁶ See Release 40855, Cesar A. Montilla, December 29, 1998.

mechanisms, the paper examines in detail cases in the dataset involving failures to supervise subordinates. It shows that, even for big firms with rigorous internal compliance systems, violation patterns bear a striking resemblance to small firms' misconduct.

The paper offers a tentative explanation for the preferential treatment of big and small firms by the SEC by linking differences in sanction severity with predictions from the literature on “revolving doors” between government agencies and regulated industries. In particular, the low level of sanctions for big firms headquartered in financial centers compared to big firms headquartered elsewhere suggests that SEC officials treat favorably their preferred future employers, but is inconsistent with the impact of socialization mechanisms. Differences in sanction levels between big and small firms persist even in cases where defendants are likely to hire outside counsel, thus suggesting that varying quality in legal representation does not fully account for the differential either.

The paper offers the first comprehensive empirical account of SEC supervision of broker-dealers, providing information not only about the SEC's positive actions, but also about its omissions and overall enforcement orientation. 290 out of 509 cases in the dataset involved small firms that only play a limited role in the financial system. The paper's key finding, the favorable treatment of big firms' individual employees by the SEC staff, suggests that recent failures in high-profile cases may extend beyond isolated instances to critical shortcomings of its enforcement program.

This account of SEC's enforcement strategy is timely as the U.S. financial sector is heading for reform and could assist the Commission in better understanding the

dynamics of staff conduct in enforcement actions. The paper also provides information for international comparisons, since the differences in enforcement intensity between U.S. and overseas regulators are much less pronounced in financial industry supervision, compared to oversight of corporate issuers' disclosure.

REFERENCES

- ABA Committee on Federal Regulation of Securities. 1992. Report of Task Force on the SEC Administrative Law Judge Process. *Business Lawyer* 47:1731-1738.
- Adolph, Christopher Alan. 2004. The Dilemma of Discretion: Career Ambitions and the Politics of Central Banking. Unpublished Manuscript. Harvard University, Department of Government, December.
- Ashenfelter, Orley, Theodore Eisenberg and Stewart J. Schwab. 1995. Politics and the Judiciary: The Influence of Judicial Background on Case Outcomes. *Journal of Legal Studies* 24:257-281.
- Che, Yeon-Koo. 1995. Revolving Doors and the Optimal Tolerance for Agency Collusion. *Rand Journal of Economics* 26:378-397.
- Choi, Stephen J. 2006. Do the Merits Matter Less After the Private Securities Litigation Reform Act? *Journal of Law, Economics and Organization* 23:598-626
- Choi, Stephen J. and G. Mitu Gulati. Bias in Judicial Citations: A Window in the Behavior of Judges? *Journal of Legal Studies* 37:87-129.
- Coates, John C., IV. 2001. Private vs. Political Choice of Securities Regulation: A Political Cost/Benefit Analysis. *Virginia Journal of International Law* 41:531-582
- Coffee, John C., Jr. 2002. Racing Towards the Top?: The Impact of Cross-Listings and Stock Market Competition on International Corporate Governance. *Columbia Law Review* 102:1757-1831.
- Cohen, Jeffrey E. 1986. The Dynamics of the “Revolving Door” on the FCC. *American Journal of Political Science* 30:689-708.
- Cox, James D., Randall S. Thomas and Dana Kiku. 2003. SEC Enforcement Heuristics: An Empirical Inquiry. *Duke Law Journal* 53:737-779.
- Cox, James D., Randall S. Thomas and Dana Kiku. 2006. Does The Plaintiff Matter? An Empirical Analysis of Lead Plaintiffs in Securities Class Actions. *Columbia Law Review* 106:1587-1640.
- Dal Bó, Ernesto. 2006. Regulatory Capture: A Review. *Oxford Review of Economic Policy* 22:203-225.
- Eckert, Ross D. 1984. The Life Cycle of Regulatory Commissioners. *Journal of Law and Economics* 24:113-120.

- Farhang, Sean and Gregory Wawro. 2004. Institutional Dynamics on the U.S. Court of Appeals: Minority Representation under Panel Decision Making. *Journal of Law, Economics and Organization* 20:299-330.
- Ferrell, Allen. 2007. Mandatory Disclosure and Stock Returns: Evidence from the Over-the-Counter Market. *Journal of Legal Studies* 36:213-251.
- GAO (Government Accountability Office). 2007. Securities and Exchange Commission: Steps Being Taken to Make Examination Program More Risk-Based and Transparent (August 2007).
- GAO (Government Accountability Office). 2001. Securities and Exchange Commission: Human Capital Challenges Require Management Attention (September 2001).
- Gormley, William T., Jr. 1979. A Test of the Revolving Door Hypothesis at the FCC. *American Journal of Political Science* 23:665-683.
- Grace, Martin F., and Richard D. Phillips. 2008. Regulator Performance, Regulatory Environment, and Outcomes: An Examination of Insurance Regulator Career Incentives on State Insurance Markets. *Journal of Banking and Finance* 32:116-133.
- Jackson, Howell E. 2007. Variation in the Intensity of Financial Regulation: Preliminary Evidence and Potential Implications. *Yale Journal on Regulation* 24:253-292.
- King, Gary, Michael Tomz and Jason Wittenberg. 2000. Making the Most of Statistical Analyses: Improving Interpretation and Presentation. *American Journal of Political Science* 44:347-361.
- La Porta, Rafael, Florencio Lopez-de-Silanes, and Andrei Shleifer. 2006. What Works in Securities Laws. *Journal of Finance* 61:1-32.
- Langevoort, Donald C. 2006. The SEC as a Lawmaker: Choices about Investor Protection in the Face of Uncertainty. *Washington University Law Review* 84:1591-1626.
- Lewis, Michael and David Einhorn. 2009. The End of the Financial World as We Know It. *New York Times*, January 4.
- Macey, Jonathan R. 1988. The Myth of “Reregulation”: The Interest Group Dynamics of Regulatory Changes in the Financial Services Industry. *Washington & Lee Law Review* 45:1275-1296.
- Macey, Jonathan R., and David A. Haddock. 1985. Shirking at the SEC: The Failure of the National Market System. *University of Illinois Law Review* 1985:315-362.

- Phillips, Richard M. and Brian Ochs. 2007. Settlements: Minimizing the Adverse Effects of an SEC Enforcement Action. Pp. 255-279 in *The Securities Enforcement Manual*, edited by Michael J. Missal and Richard M. Phillips. Chicago: American Bar Association.
- Pitt, Harvey L. and Karen L. Shapiro. 1990. Securities Regulation By Enforcement: A Look Ahead at the Next Decade. *Yale Journal on Regulation* 7:149-304.
- Prentice, Robert A. 2006. The Inevitability of a Strong SEC. *Cornell Law Review* 91:775-839.
- Pritchard, A.C. 2005. The SEC at 70: Time for Retirement? *Notre Dame Law Review* 80:1075-1102.
- Redmond, Roland L. 1938. The Securities Exchange Act of 1934: An Experiment in Administrative Law. *Yale Law Journal*, 47:622-646.
- Salant, David J. 1995. Behind the Revolving Door: A New View of Public Utility Regulation. *Rand Journal of Economics* 26:362-377.
- Securities and Exchange Commission. 2007. 2007 Performance and Accountability Report. <http://www.sec.gov/about/secpar2007.shtml> (last updated January 4, 2009).
- Seligman, Joel. 1983. The Historical Need for a Mandatory Corporate Disclosure System. *Journal of Corporation Law* 9:1-61.
- Sisk, Gregory C. and Michael Heise. 2005. Judges and Ideology: Public and Academic Debates about Statistical Measures. *Northwestern University Law Review* 99:743-804.
- Thompson, Robert B. and Randall S. Thomas. 2004. The New Look of Shareholder Litigation: Acquisitions Oriented Class Actions. *Vanderbilt Law Review* 57:133-209.
- Tirole, Jean. 1986. Hierarchies and Bureaucracies: On the Role of Collusion in Organizations. *Journal of Law, Economics and Organization* 2:181-214.

Table 1. Distribution of Violations and Average Injunctions per Violation in Administrative and Court Proceedings

VIOLATION TYPE	ADMIN. PROCEEDINGS			COURT PROCEEDINGS		
	(%)	Cases	Length of Bar	(%)	Cases	Length of Bar
Acted as BD while unregistered	16	10	1.1	84	51	2.84
Aided and abetted fraud	55	6	1	45	5	2.6
Books and Records	90	28	0.07	10	3	1
Bribery	50	1	3	50	1	3
Conspiracy to commit securities fraud	6	2	3	94	32	3
Defrauded Investors	24	16	2	76	52	2.82
Failed Best Execution duties	100	6	0	0	0	---
Failed to disclose material information	65	26	1.1	35	14	2.5
Failed to supervise	95	37	0.92	5	2	2.5
Failure as underwriter	50	8	0.5	50	8	3
False Net Capital Computation	100	1	0	0	0	---
Fraudulent Practices in Auction Rate Securities	100	14	0	0	0	---
Insider Trading	10	1	1	90	9	2.9
Insider trading based on firms' clients' orders	11	1	3	89	8	3
Internal Control Failure	89	8	0	11	1	2
Late Trading	80	4	0.75	20	1	3
Market Manipulation	27	10	2.6	73	27	2.92
Market Timing	57	17	0.89	43	13	2.69
Misappropriated investor funds	18	9	1.44	82	40	3
Obstruction of justice against SEC members	0	0	---	100	2	3
Ponzi Scheme	9	1	3	91	10	3
Unauthorized Churning	42	8	1.25	58	11	2.82
Violation of Municipal Securities Rules	100	5	0	0	0	---
Total	43	219	0.92	57	290	2.85

Table 2. Distribution of Disgorgement Awards in Administrative and Court Proceedings

Award Amount	Admin. %	Court %
0	67	42
1 – 100,000	18	13
100,001 – 500,000	6	18
500,001 – 1,000,000	1	5
1,000,001 – 3,000,000	1	10
3,000,001 and above	7	12

Key to Table 3. Ranking of Industry Bars according to Length

LENGTH OF INDUSTRY BAR	RANK ORDER
No Bar – Only Censure or Cease-and-Desist Order	0
Bar or Suspension up to (and including) 1 year	1
Bar or Suspension from 1 year and up to (and including) 5 years	2
Permanent Bar or Registration Revoked	3

Table 3. Industry Bars in Administrative Proceedings and Courts

LENGTH OF INDUSTRY BARS					
	(%)				
	0	1	2	3	NUMBER OF CASES
Admin. Proc.	53	19	11	17	219
Court	1	2	7	90	290
Total	24	9	9	59	509

Table 4. Distribution of Fines in Administrative Proceedings and Courts

FINE AMOUNT	ADMIN. PROC. (%)	COURT (%)
0	25	63
1 – 100,000	45	21
100,001 – 500,000	14	8
500,001 – 1,000,000	4	1
1,000,001 – 3,000,000	5	3
3,000,001 and above	7	3

Table 5. Likelihood of Going to Court for Firms and Individuals

	FIRMS		INDIVIDUALS		TOTAL	
	(%)	Cases	(%)	Cases	(%)	Cases
Small Firms	17	10	73	177	62	187
Big Firms	4	2	44	27	25	29
Total	10	12	68	204	52	216

Table 6: Models Predicting Assignment of Big and Small Firms to Administrative and Court Proceedings

	Model I	Model II	Model III	Model IV
	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)
Listed Firm	0.20*** (0.08)	0.40** (0.18)	0.40* (0.20)	0.27** (0.18)
Firm/Individual	0.05*** (0.02)	0.09*** (0.04)	0.05*** (0.03)	---
Level of Disgorgement	1.11*** (0.03)	---	1.11*** (0.03)	1.25*** (0.06)
Acted as BD while unregistered; defrauded investors	---	7.23 (19.20)	5.98 (7.57)	1.99 (4.28)
Aided and abetted fraud	---	0.41 (1.06)	0.48 (0.57)	0.22 (0.47)
Books and Records	---	0.92 (2.51)	3.70 (5.21)	---
Bribery	---	---	1.45 (6.46)	---
Conspiracy to commit securities fraud	---	5.73 (15.20)	11.65 (14.15)	---
Defrauded Investors	---	3.74 (9.62)	2.36 (2.54)	0.71 (1.43)
Failed Best Execution duties	---	---	---	---
Failed to disclose material information	---	0.80 (2.06)	0.81 (0.89)	0.19 (0.40)
Failed to supervise	---	0.04 (0.10)	0.04 (0.07)	0.02 (0.06)
Failure as underwriter	---	3.49 (9.35)	5.18 (7.44)	2.28 (4.67)
False Net Capital Computation	---	---	---	---
Fraudulent Practices in Auction Rate Securities	---	---	---	---
Insider Trading	---	4.60 (13.14)	4.44 (6.86)	1.82 (3.79)
Insider trading based on firms' clients' orders	---	13.31 (39.77)	15.89 (27.93)	---
Internal Control Failure	---	0.28 (0.82)	0.72 (1.22)	---
Late Trading	---	0.44 (1.17)	---	---

	---	2.86	5.17	0.52
Market Manipulation		(7.37)	(5.77)	(1.04)
	---	0.72	0.73	0.38
Market Timing		(1.84)	(0.78)	(0.88)
	---	8.10	7.25	0.30
Misappropriated investor funds		(21.28)	(8.50)	(0.64)
Obstruction of justice against SEC members	---	---	---	---
	---	3.99	2.02	---
Ponzi Scheme		(11.14)	(3.15)	
	---	0.70	0.64	0.22
Unauthorized Churning		(1.80)	(0.75)	(0.47)
Violation of MSRB rules	---	---	---	---
Year Dummies	Yes	Yes	Yes	Yes
N	368	389	341	156

*** significant at the 0.01 level, ** significant at the 0.05 level, * significant at the 0.10 level

LENGTH OF INDUSTRY BAR					
	(%)				
	0	1	2	3	CASES
Small Firms	45	17	12	26	115
Big Firms	69	21	5	5	85
Total	56	19	9	17	200

Table 8: Models Predicting Length of Industry Bars for Big and Small Firms in Administrative Proceedings

	Model I	Model II	Model III	Model IV
	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)
Listed Firm	0.26*** (0.10)	0.32*** (0.13)	0.33** (0.15)	0.38* (0.20)
Firm or Individual	0.03*** (0.02)	0.03*** (0.02)	0.03*** (0.02)	---
Level of Disgorgement	1.07* (0.04)	1.04 (0.05)	1.04 (0.05)	1.12** (0.06)
Level of Fines	---	0.83*** (0.05)	0.84*** (0.05)	---
Investor Fraud	---	---	1.06 (0.69)	0.07*** (0.07)
Regulatory Violation	---	---	0.63 (0.30)	0.04*** (0.04)
Market Fraud	---	---	5.28** (4.03)	---
Sophisticated Violation	---	---	---	0.05*** (0.05)
Year Dummies	Yes	Yes	Yes	Yes
N	200	200	200	98

*** significant at the 0.01 level, ** significant at the 0.05 level, * significant at the 0.10 level

Table 9. Fines/Disgorgement Ratios

	ADMINISTRATIVE PROCEEDINGS			COURTS		
	Mean	Std. Dev.	Cases	Mean	Std. Dev.	Cases
Small Firms	0.87	1.83	32	0.28	.97	77
Big Firms	1.10	2.07	25	0.85	1.54	14
Total	.97	1.93	57	.37	1.08	91

Table 10: Models Predicting Length of Industry Bars for Big and Small Firms in Administrative Proceedings (Excluding Top 20 Firms)

	Model I	Model II	Model III	Model IV
	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)
Listed Firm	0.28*** (0.11)	0.35** (0.15)	0.40** (0.18)	0.35* (0.22)
Firm or Individual	0.04*** (0.03)	0.04*** (0.03)	0.04*** (0.03)	---
Level of Disgorgement	1.08* (0.05)	1.05 (0.06)	1.04 (0.05)	1.14** (0.06)
Level of Fines	---	0.81*** (0.05)	0.80*** (0.06)	---
Investor Fraud	---	---	0.54 (0.39)	0.84 (0.51)
Regulatory Violation	---	---	0.27* (0.13)	0.41** (0.18)
Market Fraud	---	---	3.82* (2.94)	13.8** (14.4)
Sophisticated Violation	---	---	---	---
Year Dummies	Yes	Yes	Yes	Yes
N	161	161	161	88

*** significant at the 0.01 level, ** significant at the 0.05 level, * significant at the 0.10 level

Table 11. Average Length of Industry Bars for Listed and Non-listed Firms of Similar Size in Administrative Proceedings

	2007 REVENUE IN US\$ MIL. 38<FIRM>2,000		2007 REVENUE IN US\$ MIL. 38<FIRM>10,000	
	Industry Bar	Cases	Industry Bar	Cases
Non-listed Firms	0.67	6	0.71	7
Listed Firms	0.68	16	0.72	29
Total	0.68	22	0.72	36

Table 12. Length of Industry Bars per Location

	NY-NJ LOCATION		DESIRABLE LOCATION		EXCHANGE LOCATION	
	Out	In	Out	In	Out	In
Small Firms	0.67	1.43	0.89	1.18	1.23	1
Big Firms	0.63	0.29	0.65	0.29	0.60	0.30
Total	0.64	0.63	0.70	0.58	0.74	0.54

Table 13. Length of Industry Bars per Type of Violation in Administrative Proceedings

VIOLATION TYPE	LENGTH OF INDUSTRY BARS (%)				TOTAL CASES (NUMBER)	CASES SETTLED (%)
	0	1	2	3		
Investor Fraud	39	17	17	28	78	96
Regulatory Violation	65	28	5	3	80	99
Market Fraud	56	4	4	37	27	93
Sophisticated Violation	56	18	15	12	34	100

Table 14: Models Predicting Length of Industry Bars for Big and Small Firms for Fraud-Based violations in Administrative Proceedings

	Model I	Model II	Model III	Model IV
	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)	Odds Ratio (std. error)
Listed Firm	0.22** (0.06)	0.23** (0.06)	0.27* (0.20)	0.26** (0.18)
Firm or Individual	0.11*** (0.03)	0.11*** (0.02)	0.01*** (0.01)	0.01*** (0.01)
Level of Disgorgement	---	1.05 (0.94)	---	1.01 (0.90)
Investor Fraud	0.37 (0.11)	0.28** (0.07)	Not included	Not included
Regulatory Violation	Not included	Not included	---	---
Market Fraud	---	---	Not included	Not included
Sophisticated Violation	Not included	Not included	1.75 (1.10)	1.38 (0.91)
Year Dummies	Yes	Yes	Yes	Yes
N	89	89	111	111

*** significant at the 0.01 level, ** significant at the 0.05 level, * significant at the 0.10 level

Table 15. Violation Types by Small and Big Firms

VIOLATION TYPE	ADMIN. PROC.			COURTS		
	Small (%)	Big (%)	Cases	Small (%)	Big (%)	Cases
Acted as BD while unregistered	67	33	3	94	6	16
Aided and abetted fraud	20	80	5	80	20	5
Books and Records	78	22	27	100	0	3
Bribery	0	100	1	100	0	1
Conspiracy to commit securities fraud	100	0	2	100	0	26
Defrauded Investors	100	0	15	90	10	42
Failed Best Execution duties	17	83	6	---	---	---
Failed to disclose material information	65	35	23	70	30	10
Failed to supervise	46	54	35	100	0	2
Failure as underwriter	43	57	7	100	0	6
False Net Capital Computation	100	0	1	---	---	---
Fraudulent Practices in Auction Rate Securities	0	100	14	---	---	---
Insider Trading	100	0	1	75	25	8
Insider trading based on firms' clients' orders	100	0	1	17	83	6
Internal Control Failure	75	25	8	0	100	1
Late Trading	25	75	4	100	0	1
Market Manipulation	78	22	9	96	4	24
Market Timing	35	65	17	54	46	13
Misappropriated investor funds	86	14	7	85	15	33
Obstruction of justice against SEC members	---	---	---	100	0	1
Ponzi Scheme	100	0	1	100	0	9
Unauthorized Churning	100	0	8	100	0	9
Violation of Municipal Securities Rules	20	80	5	---	---	---
Total	58	42	200	87	13	216

Table 16. Supervisory Failures For Big and Small Firms

	BIG FIRMS	SMALL FIRMS	TOTAL
Inadequate Procedures Cases	5	3	8
Inadequate Systems Cases	4	5	9
Failure to Discharge Supervisory Duties Cases	9	8	17
Length of Industry Bars	0.74	1.17	---
Fines/Disgorgement Ratio	0.68	1.08	---