

Washington University Law Review

Volume 74

Issue 2 *Path Dependence and Comparative Corporate Governance*

January 1996

Path Dependence in Corporate Contracting: Increasing Returns, Herd Behavior and Cognitive Biases

Marcel Kahan
New York University

Michael Klausner
New York University

Follow this and additional works at: https://openscholarship.wustl.edu/law_lawreview



Part of the [Business Organizations Law Commons](#), and the [Contracts Commons](#)

Recommended Citation

Marcel Kahan and Michael Klausner, *Path Dependence in Corporate Contracting: Increasing Returns, Herd Behavior and Cognitive Biases*, 74 WASH. U. L. Q. 347 (1996).

Available at: https://openscholarship.wustl.edu/law_lawreview/vol74/iss2/3

This F. Hodge O'Neal Corporate and Securities Law Symposium is brought to you for free and open access by the Law School at Washington University Open Scholarship. It has been accepted for inclusion in Washington University Law Review by an authorized administrator of Washington University Open Scholarship. For more information, please contact digital@wumail.wustl.edu.

PATH DEPENDENCE IN CORPORATE CONTRACTING: INCREASING RETURNS, HERD BEHAVIOR AND COGNITIVE BIASES

MARCEL KAHAN*
MICHAEL KLAUSNER**

INTRODUCTION

The starting point for the modern analysis of the firm is the metaphor of a firm as a “nexus of contracts.”¹ From this perspective, the rights and obligations of various stakeholders in a corporate enterprise—shareholders, creditors, employees, and managers—are determined by a set of “corporate contracts.” Some of these “contracts” are explicit, such as credit agreements, bond indentures, employment contracts, and charter provisions. Others are implicit, such as the rules of corporate law and creditor protection law, which consist largely of default rules that can be overridden by contract. In the absence of information imperfections, corporate contracts are expected to maximize the joint wealth of the contracting parties. Consequently, unless externalities are present, they are expected to be socially optimal.

Despite the great conceptual significance of contracting in the “nexus of contracts” metaphor, commentators have paid little attention to the design and production of corporate contracts. Beyond the abstract presumption that contract terms are wealth-maximizing (based on an abstract belief that markets for corporate contract terms work efficiently), the issues of what factors determine the content of explicit contracts and, perhaps most interestingly, the degree to which parties opt out of default rules have been left largely unexplored.

* Professor of Law, New York University School of Law.

** Professor of Law, New York University School of Law; Visiting Professor of Law, Stanford Law School.

We wish to thank Ron Gilson, Ronald Mann, and Jeffery Zwiebel for helpful comments on earlier drafts of this article. We also thank Karen Lloyd for helpful research assistance and the Filomen D’Agostino and Max E. Greenberg Research Fund for generous financial support.

1. See Michael C. Jensen & William H. Meckling, *Theory of the Firm: Managerial Behavior, Agency Costs and Ownership Structure*, 3 J. FIN. ECON. 305, 310-11 (1976) (introducing the term “nexus of contracting relationships”).

In other articles, we have attempted to begin filling this void in the literature.² We have suggested that corporate contract terms can frequently offer “increasing returns” as more firms employ the same contract term. Value arises from the common use of a contract term.³ While an individually customized term offers obvious attractions, a commonly used term offers competing attractions that arise solely as a result of its common use. Moreover, as the use of a term increases, it becomes significantly more attractive (at least up to a critical point), and its attraction becomes self-perpetuating. Consequently, increasing returns can lead to standardization in contract terms over time. Standardization, meaning simply the common use of a term, is thus a form of path dependence in corporate contracts.⁴

The value of standardization in contract terms is evidenced by the prevalence of “boilerplate” provisions found in corporate documents. Bond indentures, for example, contain many standard provisions formulated in fairly standard language. In addition, the extent to which firms incorporate in Delaware, thereby selecting Delaware law to govern the rights and obligations of managers and shareholders,⁵ and the frequency with which firms choose to have New York law govern their bond indentures may be additional evidence of the value of standardization. In this respect, New York and Delaware law serve as standard “contract” terms.

Of course, other explanations for the prevalence of standardization exist. One convenient answer is that standard terms became standard because they were inherently optimal for most parties when they were originally adopted, and that they continue to be used by most parties because they remain inherently optimal. By inherently optimal, we mean that the actual, substantive content of a term maximizes firm value without regard to the fact that the same term has been used or will be used by other parties. This is the answer that economics-oriented corporate law orthodoxy would provide.

2. See Michael Klausner, *Corporations, Corporate Law, and Networks of Contracts*, 81 VA. L. REV. 757 (1995); Marcel Kahan & Michael Klausner, *Corporate Contracting: Standardization, Innovation and the Role of Contracting Agents* (1996) (unpublished manuscript, on file with authors 1996).

3. For an analysis of increasing returns in product markets, see W. Brian Arthur, *Competing Technologies, Increasing Returns, and Lock-In by Historical Events*, 99 ECON. J. 116 (1989).

4. Much of this article applies to contracts generally. Because this symposium is on corporate governance, however, and because our other work in this area addresses corporate contracts more specifically, we focus this discussion on corporate contracts.

5. This includes mandatory Delaware law plus, to the extent that a corporation does not opt out, Delaware default rules. For a discussion of the Delaware charter as a standard contract term, see Klausner, *supra* note 2, at 841-51.

While there is certainly some truth to this explanation—in that most standard terms seem to work reasonably well—we do not believe that this answer tells the whole story. If one looks more closely at actual standard terms, as we have in other articles, one finds disturbing instances of apparent suboptimality: standard terms that do not work in a reasonable manner; and uniformity in terms where one would expect more diversity to be optimal.⁶

A primary conclusion that emerges from our work in this area is that one must look closely at particular contract terms and at their origins before reaching any conclusions about why a standard term exists. With respect to the study of comparative corporate governance, the topic of this symposium, this means that differences among countries' governance systems may be related in part to the "increasing returns" that firms in each country obtain through standardization. At this point, we state this as a hypothesis deserving empirical study.

The presence of increasing returns, however, is not the only explanation for standardization. In this paper, we briefly explore two other potential explanations. First, staying within the confines of conventional economic analysis, we explain how agency problems between the principal to a contract and the lawyer who drafts it may lead to standardization. Second, moving somewhat outside the confines of conventional economic analysis, we suggest that certain behavioral biases that have been shown to exist in other contexts may lead to standardization. We make no claim regarding the extent to which these factors or increasing returns influence standardization. Rather, our aim is merely to suggest that they may be important and therefore warrant future empirical investigation.

Part I of this paper reviews our prior analysis of increasing returns in corporate contract terms. Within the rubric of increasing returns, we discuss learning and network externalities in corporate contracts. Parts II and III examine how agency costs and behavioral biases can lead to standardization.

6. See Kahan & Klausner, *supra* note 2, at 58-60 (concluding that standard terms of event risk covenants are suboptimal); Marcel Kahan, *Anti-Dilution Provisions in Convertible Securities*, 2 STAN. J.L. BUS. & FIN. 139 (1995) (arguing that standard anti-dilution provisions fail to provide adequate protection); William A. Klein et al., *The Call Provision of Corporate Bonds: A Standard Form in Need of Change*, 18 J. CORP. L. 653 (1993) (concluding that bond call provisions are not optimally designed); cf. Joseph Bankman, *The Structure of Silicon Valley Start-ups*, 42 UCLA L. REV. 1737 (1994) (exploring why that start-ups uniformly adopt tax-disadvantaged forms).

I. INCREASING RETURNS: LEARNING, INFORMATIONAL CASCADES, AND NETWORK EXTERNALITIES IN CORPORATE CONTRACTS

The attractiveness of a standard contract term arises at least in part from the fact that it can offer increasing returns to users as more firms adopt it. These increasing returns can be divided into two related, but conceptually distinct, types of benefits: (i) “learning benefits,” which arise because a firm adopts a contract term that has been commonly used in the past; and (ii) “network benefits,” which arise because a firm adopts a term that will be commonly used in the future.⁷

A firm adopting a charter or indenture has the choice of drafting new terms or adopting terms that other firms have used in the past. By developing a new term, the firm can achieve a degree of customization that may not be available with terms that others have used before. On the other hand, the use of a term that has been commonly used in the past can offer alternative attractions. The benefits of such terms include avoidance of formulation errors, ease in drafting, availability of judicial rulings on the validity and interpretation of the term, and familiarity among the investors and securities analysts who, implicitly or explicitly, will put a price on the term.

Consider, for example, a firm with an unusual set of interlocking relationships among partially owned affiliates. The well known case of *Sinclair Oil Corp. v. Levien*⁸ comes to mind. This firm could customize a charter provision, allocating corporate opportunities and perhaps specifying internal procedures for resolving close cases. Alternatively, it could leave its charter silent with respect to the question, as in *Sinclair*, and, by default, adopt the generic corporate opportunity rule provided by state law. Because many firms operate under the default rule, the default rule is, in effect, a standard contract term. On the one hand, the customized charter term could be superior to the default rule because it can be closely tailored to the firm’s precise situation. On the other hand, customization would entail relatively high drafting costs, a risk of formulation error, and uncertainty regarding the validity of the term.⁹ In addition, to the extent that the allocation of corporate opportunities influences the value of the firm’s securities, the market may not price the customized term accurately. In

7. See Kahan & Klausner, *supra* note 2.

8. 280 A.2d 717 (Del. 1971).

9. Legal uncertainty surrounds the question of how much a firm may customize fiduciary duties.

contrast, by using the default rule, the firm minimizes drafting costs, the risk of formulation error, and uncertainty regarding validity.¹⁰ Furthermore, it gains the benefit of judicial precedents that illustrate the application of the rule in a variety of circumstances that may be instructive later. Finally, the term will be familiar to securities investors.¹¹

Learning benefits constitute positive externalities that earlier users of a contract term confer upon later users. We refer to them as “learning externalities.” Up to a point, the more experience there has been with a term, the more valuable the term is. Depending on the particular term involved, the magnitude and rate at which learning externalities accrue presumably vary. For some terms, learning externalities may be trivial, and for others, they may be substantial.

A related set of advantages is available to a firm that adopts a contract term that will be commonly used in the future—that is, a term that the adopting firm and other firms will ultimately have in their charters or indentures contemporaneously, over a significant period of time. At the time a particular firm adopts the term, other firms may have already adopted the term, or firms may be expected to adopt it in the future, or both. We refer to these benefits as “network benefits” to reflect an analogous phenomenon in the context of “network products,” such as VCRs, telephone systems, and computers.¹²

Network products become more valuable as their use becomes more widespread. The source of this added value is typically related to the product’s technical compatibility with complementary products (e.g., VCRs with video tapes, PCs with software). In the case of corporate contract terms, analogous benefits accrue as a large number of firms adopt the same contract term.

Contractual network benefits mirror the learning benefits described above, but they arise in the future—while the firm is operating under a

10. If we were comparing a customized term with an explicit standardized term, as opposed to a default rule, precedents holding that the standard term is valid would be the analogous benefit. Validity is obviously not an issue in the case of a default rule.

11. The choice of Delaware as a state of incorporation and the choice of New York law to govern bond indentures are actual examples of corporate contract terms that carry a great many learning benefits, including judicial precedent, familiarity among lawyers, and familiarity among investors.

12. For a more detailed description of network benefits in the corporate law context, see Klausner, *supra* note 2, at 772-75. For an economic analysis of network externalities in the context of network products see Joseph Farrell & Garth Saloner, *Installed Base and Compatibility: Innovation, Product Preannouncements, and Predation*, 76 AM. ECON. REV. 940 (1986), Michael Katz & Carl Shapiro, *Network Externalities, Competition, and Compatibility*, 75 AM. ECON. REV. 424 (1985).

particular term. They include higher quality, lower cost legal and other professional services in the future, as the firm encounters questions or disputes regarding rights and obligations under a contract term. Network benefits also include the availability of a large number of investors and securities analysts who are able to price the firm's securities at later public offerings and on the secondary market.¹³ Finally, they include judicial interpretations that courts issue during the period in which the term is in use. These interpretations reduce uncertainty that might arise regarding the term's applicability as the business environment changes over time.

Although network benefits accrue in the future—after the firm has adopted a contract term—their present value adds to the value of the term at the time of adoption. The value of network benefits depends on the number of firms that are expected to use a given term in the future.

Like learning benefits, network benefits are externalities from one user to another. But whereas learning externalities run in only one direction, from earlier to later users, network externalities run in two directions, in that all users benefit from each other's use regardless of when they started using the term.¹⁴

The presence of learning and network benefits raises the question of whether market forces can be expected to produce a socially optimal degree of standardization. As we have shown elsewhere, there is no reason to expect that they will. Learning and network externalities create coordination, cross-subsidy, and information cascade problems that market forces cannot be counted on to solve.¹⁵ If learning or network externalities are significant in a particular type of contract term, firms may employ suboptimal terms. Such suboptimality can arise in any of three ways. First, a term that was optimal when it originated may have become obsolete as a result of changes in the business environment and yet remain standard. Within some threshold of adequacy, the existing term may act as a barrier to improvement. Second, it is possible for a suboptimal term to become standardized from the start and remain so. Third, a term may become

13. There is an overlap in learning and network benefits in that common use in the not-too-distant past may be sufficient for purposes of familiarity. Unless the term continues to be widely used, however, familiarity among investors and analysts will fade, and liquidity and pricing accuracy will decline.

14. The present value of network benefits may be lower for early adopters than for later adopters.

15. In particular situations, institutions may arise that respond to these problems. Law firms and investment banks may do so, for example. See Kahan & Klausner, *supra* note 2, at 36-43 (finding that investment banks perform limited coordination but that law firms do not). Law reform organizations, legal form publishers, and continuing legal education organizations may do so as well.

standardized and widely used even if it would be optimal for some firms to adopt an alternative term. This would be a case of suboptimal uniformity.¹⁶

II. AGENCY COSTS AND HERD BEHAVIOR IN DRAFTING CORPORATE CONTRACTS

The analysis of learning and network externalities assumes that the decision to adopt a contract term is based on the value of the term to the adopting firm. One might imagine for purposes of that analysis that loyal managers of the firm are directly involved in drafting the corporate contract. In reality, however, lawyers and other professionals design and draft contract terms.¹⁷ Although they presumably attempt to draft contracts that promote the interest of their clients, the interests of the draftsman may diverge from those of the client firm.¹⁸ This divergence of interest may create a bias on the part of the draftsman to employ a standard term rather than customizing an alternative term, even if customization would be best from the client firm's perspective. The discussion below explores some of the dynamics that can create such a bias. We make no claim regarding the prevalence of the bias or its magnitude in particular circumstances. Like our discussion of increasing returns, our objective is merely to suggest that the issue warrants further attention.

Although a client pays a lawyer directly for his advice and drafting services, the lawyer's future income is heavily dependent on the reputation he builds serving clients. Clients, however, have imperfect information regarding the quality of a lawyer's draftsmanship at the time a contract is drafted. In making judgments about the quality of the contract, they must rely largely on the outcome of the contract—whether it is successful in accomplishing the client's objectives. Moreover, potential clients have little

16. Klausner, *supra* note 2, at 798-815. Individual firms will customize terms if doing so is more attractive to them than adopting the standard term. The third suboptimal scenario is that groups of firms that should adopt the same non-standard term (that is, a secondary standard term) instead adopt the primary standard term.

Another form of suboptimal standardization that we discuss elsewhere, but that is not relevant to this discussion, is the case of excess diversity—too little standardization. Kahan & Klausner, *supra* note 2, at 21-24, 29-30; Klausner, *supra* note 2, at 801-04.

17. For simplicity, we will refer to the lawyer as the draftsman of the contract. Although the analysis might well apply to in-house lawyers, the setting we have in mind is one in which outside lawyers draft contracts for client firms.

18. For purposes of this discussion, when we refer to the firm's interest we mean that of the firm's shareholders.

if any information about the quality of a contract produced for another client at the time it is drafted. They, even more than the actual client, see only the outcome. Consequently, a lawyer's reputation as a draftsman will be substantially influenced by the success or failure of the contracts he has drafted.

At the time a lawyer drafts a contract, he will have imperfect foresight regarding what contingencies will arise, how a court will interpret the contract if it is contested in court, or whether a court will invalidate it if it is challenged under some applicable law. All of these matters are subject to uncertainty. For the reasons cited in the discussion of learning above, however, one would generally expect a standard contract term to offer less uncertainty than a customized term; unless there has been a significant change in the business environment, the variance in possible outcomes will thus be lower for standard contract terms than for customized terms.

The relative certainty that standard terms offer may lead a lawyer to employ such a term even if the expected value of the term to his client is lower than the expected value of a customized term. This attraction to greater certainty could have several sources. First, and most simply, even if the reputational payoff to a lawyer is linearly related to the value of a term to the client, risk aversion on the part of a lawyer would create a bias in favor of a standard term. To the extent that a lawyer cannot diversify career risk, lawyers will frequently be more risk averse than their clients.¹⁹ Depending on the expected value of customizing contract terms in particular cases, there will be some threshold within which a risk averse lawyer will rationally choose a standard term rather than a customized term with a higher expected value for both himself and his client.

In addition, the reputational payoff to the lawyer may not be linearly related to the value of a contract term to the client. In some settings, a contract term that fails—for example, by inadequately responding to a contingency that occurs—may weigh more heavily in a lawyer's reputational payoff than a contract term that succeeds. The lawyer's payoff may thus be asymmetrical. When a contract has been drafted to respond to a particular contingency, success in doing so may be unremarkable. Once the contingency has occurred, the draftsman may not appear particularly prescient in foreseeing it. In contrast, a failure to anticipate a contingency that actually occurs can look especially damning from the harsh perspective

19. In the case of clients that are publicly held corporations, shareholders can be concerned only with undiversifiable risk.

of twenty-twenty hindsight. The same can be true of a contract that a court misinterprets or invalidates.²⁰ Under these circumstances, if a standard term offers a lower variance in potential outcomes for the client than does a customized term, even a risk neutral lawyer will have a bias in favor of employing a standard contract term.²¹

Until now, we have assumed that a standard term offers greater certainty in outcomes than does a customized term—that is, lower variance in responsiveness to future contingencies, judicial interpretations, and judicial rulings on validity. The bias toward standard terms has arisen from either lawyers' risk aversion or from an asymmetrical relationship between the lawyer's reputational payoff and the results he achieves for his client. Even if lawyers are not risk averse and standard contract terms do not offer greater certainty in outcomes for clients, however, there is yet another, more subtle dynamic that can lead to a draftsman's bias in favor of standard terms. The dynamic is that of "herd" behavior, which financial economists have observed among corporate managers and professional money managers.²² Herd behavior loosely refers to a situation in which people imitate the actions of others and in so doing ignore, to some extent, their own information and judgments regarding the merits of their decisions. One explanation of herd behavior focuses on decisions made by agents whose interests do not coincide with those of their principals.²³ The concept is loosely reflected in John Maynard Keynes' observation that "[w]orldly wisdom teaches that it is better for reputation to fail convention-

20. See FRANK EASTERBROOK & DANIEL FISCHEL, *THE ECONOMIC STRUCTURE OF CORPORATE LAW* 98-99 (1992) (courts have difficulty evaluating business decisions from ex ante perspective once bad outcomes occur).

21. Ron Gilson and Bernard Black have similarly speculated that lawyers are judged on the basis of outcomes. They suggest that lawyers advise acquirors to freeze out minority shareholders following a tender offer because the potential outcomes of that advice have lower variance than the potential outcomes of operating an acquired company with minority shareholders. They believe that the mean outcome of a freezeout, after factoring in the cost, is lower than keeping minority shareholders. See RONALD GILSON & BERNARD BLACK, *THE LAW AND FINANCE OF CORPORATE ACQUISITIONS* 1249-52 (2d ed. 1995).

22. MICHAEL DERTOUZO ET AL., *MADE IN AMERICA: REGAINING THE PRODUCTIVE EDGE* 46 (1989) (managers are attached to the old way of doing things); Josef Lakonishok et al., *The Impact of Institutional Trading on Stock Prices*, 32 J. FIN. ECON. 23 (1992) (pension managers herd in small stock selections).

23. Economists have also provided explanations of herd behavior that are not based on agency costs. These explanations, based on the concept of informational cascades, relate to our discussion of learning in Part I. See, e.g., Abhijit Banerjee, *A Simple Model of Herd Behavior*, 107 Q. J. ECON. 797 (1992); Sushil Bikchandani et al., *A Theory of Fads, Fashion, Custom, and Cultural Change as Informational Cascades*, 100 J. POL. ECON. 992 (1992).

ally than to succeed unconventionally.”²⁴ Contract standardization may be a species of herd behavior.

In one model, David Scharfstein and Jeremy Stein show that herd behavior will occur as a consequence of agents’ rational attempts to enhance their reputations or, in their terms, “to manipulate the labor market’s inferences regarding their ability.”²⁵ This occurs in a setting where the outcomes of agents’ decisions (investment decisions in their model) are uncertain and where there is some correlation in the errors (the bad investments) that good agents make.²⁶ Because even a good agent can take an action that leads to a bad outcome, the market looks at both the outcome and the actual action taken before forming a judgment regarding an agent’s ability. If a bad outcome occurs but the action was one that other agents had taken as well, and hence, also suffered bad outcomes as well, the reputational penalty for the agent is not as great as if the agent was alone in taking the action. The result of the model is a “sharing-the-blame” effect in which agents rationally follow one another’s actions, even if they believe that the expected value of deviating from the herd is greater than that of following the herd.

The setting specified for this model of herd behavior seems to fit many contracting situations. Although a contract term, like an investment, is intended to yield a positive outcome, it entails risk. As discussed above, a lawyer will be judged in part on the outcome that occurs. In many situations, however, judgments regarding the lawyer’s ability will be less harsh if the contract term that led to the bad outcome was one that many other lawyers had employed in similar circumstances. Consistent with Scharfstein and Stein’s result, one senses that a lawyer’s reputation suffers more from the failure of a contract that he has customized himself than from the failure of a standard contract that he, along with many others, have used before in similar contexts. The result, as Scharfstein and Stein show, can be herd behavior that takes the form of adopting a standard contract term.²⁷

24. JOHN MAYNARD KEYNES, *THE GENERAL THEORY OF EMPLOYMENT, INTEREST AND MONEY* 158 (1936).

25. David Scharfstein & Jeremy Stein, *Herd Behavior and Investment*, 80 *AMER. ECON. REV.* 465, 466 (1990).

26. In the extreme case that they model, all good managers receive a signal that an investment is a good one, and all bad agents receive random signals. Their result holds, however, so long as there is some correlation in the prediction errors of good agents. *Id.* at 468.

27. A difficulty with Scharfstein and Stein’s model is that the payoff to succeeding with the herd is higher than that of succeeding alone. This is because the market adjusts for the possibility that an

Jeffrey Zwiebel has shown that herd behavior can also occur in a setting in which the market observes outcomes and not the actions that led to those outcomes.²⁸ In Zwiebel's model, agents have a choice of taking one of two actions, each of which leads to randomly distributed outcomes: the industry standard; or an innovation with a higher expected value. The standard action and the innovation are equally risky—that is, the variance in their potential outcomes is the same.²⁹ All agents can take the standard action, but only a few can innovate (perhaps because the flash of insight strikes rarely) in his model. Payoffs to an agent, which take the form of enhanced reputation and higher pay in the future, depend on the market's inference of his ability. In addition, agents that perform sufficiently poorly experience a disproportionately harsh penalty, such as being fired.³⁰

Zwiebel shows that if only outcomes are observed, the market can best make inferences about an agent's actual ability by comparing his outcomes with the those of other agents. Relative performance, rather than absolute performance, thus determines an agent's reputational payoff. He further shows that even though the riskiness of the standard action and the innovation are the same, the riskiness of *relative performance* is greater for innovating than for taking the standard action.³¹ Accordingly, while innovating is attractive because of its higher expected value, the standard action is attractive because relative performance under the standard action provides a more accurate (less risky) measure of actual ability.

Zwiebel shows that under these conditions, unless the expected value of innovating is sufficiently large or the reputational cost to failure is sufficiently small, most agents will take the standard action. In effect, accurate measurement of their abilities—through inferences based on relative performance—will outweigh the effect of a higher likelihood of absolute success. Only agents that have very good or very bad reputations at the start will innovate—the former because they are relatively unlikely

agent that succeeds alone was lucky rather than talented. See Jeffrey Zwiebel, *Corporate Conservatism, Herd Behavior and Relative Compensation*, 103 J. POL. ECON. 1, 15 (1995). It is unclear whether this element of their payoff structure commonly fits contraction situations.

28. *Id.* Zwiebel shows that his results also obtain if both actions and outcomes are observed. *Id.* at 11.

29. The innovation thus stochastically dominates the standard action.

30. Zwiebel models this as a discontinuity in payoffs. *See id.* at 5-6.

31. To illustrate the distinction between risk in absolute performance and risk in relative performance, Zwiebel notes that if a fund manager took money out of the stock market prior to the 1987 crash, he would have reduced the absolute risk of his fund's performance, but he would have increased the risk of its performance relative to other funds. *Id.* at 2.

to suffer from a bad outcome, and the latter because they will benefit from inaccurate evaluation.³²

Although contracting settings vary widely, it seems reasonable to expect that a significant number of them will conform to the setting specified in Zwiebel's model. Clients and potential clients may well observe only outcomes, as assumed in his model (or outcomes may dominate the lawyer's reputational payoff so much that the ex post observation of a contract term employed has no significant effect). In addition, once a standard contract term exists, customization is by definition infrequent, as required by his model. Finally, there are several reasons to expect that the lawyer's penalty for a bad outcome will often be disproportionately severe in comparison to his reward for a good outcome. First, if a contract leads to bad results for a client, the client may fire the lawyer, other clients may learn of the outcome and fire him as well, and potential clients will not hire him.³³ At the extreme, sufficiently poor performance can also result in a malpractice suit, which can entail not only liability but a devastating reputational impact to boot. Second, as we speculate above, when outcomes are observed, a success may weigh less heavily in the lawyer's reputational payoff than a failure. Like a reputation for ethical behavior, a reputation as a contract lawyer may have to be built on many successful contracts, while it may be ruined with only one failure. Third, even if the reputational payoff to the lawyer is linear with respect to his relative performance, risk aversion would create a disproportionality in payoffs measured in utility. Consequently, consistent with Zwiebel's model, we should expect most lawyers to be attracted to standard contract terms when the value of customizing is not substantially greater than the value of the standard term. Lawyers with more secure reputations and those with a high level of confidence that they can customize a much better contract will do so—as will low-quality lawyers that want to roll the dice on a good outcome.

In sum, although the precise dynamic may vary according to context, there are several reasons to suspect that the involvement of lawyers in the contract drafting process can lead to the persistence of standard contract terms that are not value-maximizing for the client.

32. The likelihood of innovating increases in Zwiebel's model as the mean outcome of innovating increases relative to the mean outcome of taking the standard action. It also increases as the number of agents with the option of adopting the innovation increases.

33. This is directly analogous to Zwiebel's assumption that a manager will be fired, and thereby incur disproportionate losses, if he performs poorly. *Id.* at 5-6.

III. COGNITIVE BIAS AND STANDARDIZATION

Research in behavioral psychology has documented several phenomena that may lead to a reluctance to diverge from standard contractual terms. In this Part, we discuss the findings in the behavioral psychology literature and examine the relevance of these findings for the persistence of standard contract terms. In particular, we address three behavioral biases: status quo bias; anchoring bias; and conformity bias.

A. *Status Quo Bias*

“Status quo bias” refers to a psychological preference for the present state and corresponding bias against either “buying” an object that the person does not “own” or “selling” an object that a person does “own.”³⁴ Closely related to status quo bias is the “endowment effect”—the fact that a person will demand more to sell an object that she owns than she would be willing to pay for the same object if she did not own it.³⁵

The existence of status quo bias and the endowment effect has been documented in various laboratory experiments. For example, in one study by Knetsch and Sinden,³⁶ some participants were initially given three dollars in cash and others were given a lottery ticket (the prize was a choice between a \$70 bookstore voucher or \$50 in cash). After this initial “endowment,” each participant was offered the chance to exchange the cash for the ticket or, the ticket for the cash. Of the thirty-eight participants who received the ticket, thirty-one (82%) kept it and seven (18%) exchanged it for cash. Of the thirty-nine participants who received cash, fifteen (38%) exchanged it for the ticket and twenty-four (62%) kept the cash.

According to conventional economic reasoning, whether a participant initially received cash or a ticket should not be a relevant factor in determining whether the participant prefers cash or a ticket. Assume, for example, that individual preferences are distributed such that 60% of the

34. William F. Samuelson & Richard Zeckhauser, *Status Quo Bias in Decision Making*, 1 J. RISK & UNCERTAINTY 7 (1988).

35. See Daniel Kahneman et al., *Experimental Tests of the Endowment Effect and the Coase Theorem*, 98 J. POL. ECON. 1325 (1990) (discussing and reporting tests of endowment effect).

36. See Jack L. Knetsch & J.A. Sinden, *Willingness to Pay and Compensation Demanded: Experimental Evidence of an Unexpected Disparity in Measures of Value*, 99 Q.J. ECON. 507, 512-13 (1984). For other studies of the endowment effect, see Kahneman et al., *supra* note 35; Jack L. Knetsch, *The Endowment Effect and Evidence of Nonreversible Indifference Curves*, 79 AM. ECON. REV. 1277 (1989).

participants prefer the cash and 40% of the participants prefer the lottery ticket. As the initial recipients of cash and lottery tickets are randomly selected, one would expect that, when given the exchange opportunity, 40% of the cash recipients would exchange their cash for lottery tickets and 60% of the ticket recipients would trade their tickets for cash—i.e., that half of the participants would accept the exchange opportunity. Indeed, conventional economic reasoning would predict that half of the participants would accept the exchange opportunity *whatever the preference distribution between cash and lottery tickets* and that the ultimate proportion of ticketholders and cashholders would be equal in both the group that initially received the ticket and the group that initially received the cash.

In the experimental setting described above, however, only 28% of the participants accepted the opportunity to exchange, and the ultimate proportion of ticketholders was 82% in the group of initial ticket recipients but only 38% in the group of initial cash recipients. These percentages, the authors posit, is attributable to the endowment effect.³⁷ Participants value their initial endowment more highly than they would otherwise. Therefore, fewer than half of the participants will engage in a trade.

In another laboratory experiment, Samuelson and Zeckhauser asked participants how they would invest a large amount of money that they had recently inherited.³⁸ Some participants were told that they inherited cash and that they had to choose between different investment options (e.g., stock of moderate risk companies, stock of high risk companies, treasury bills, or municipal bonds). Others were told that the money was presently invested in one form (e.g., in stock of a moderate risk company) and that they had to determine whether to change the investment (with insignificant tax and brokerage costs). Samuelson and Zeckhauser found that participants elected any one investment option significantly more often when it was presented as the status quo than when it was presented in a neutral setting or when a different option was presented as the status quo. The preference for the status quo increased with the number of alternative options that were presented.

Laboratory experiments involve controlled, though artificial, conditions for behavioral studies. The presence of status quo bias, however, is also supported by more realistic (if less controlled) field studies. Hartman, Doane, and Woo surveyed California electric power consumers about their

37. Knetsch & Sinden, *supra* note 36, at 516.

38. See Samuelson & Zeckhauser, *supra* note 34.

preferences regarding service reliability and rates.³⁹ One group of survey participants lived in an area with reliable service and fairly high rates while another group lived in an area with less reliable services offered at thirty percent lower rates. The two groups did not differ significantly in income or electricity consumption. Each participant was offered six service/rate combinations (including the combination presently provided to her group as well as the combination provided to the other group). The study revealed that about 60% of the participants in each group elected to maintain the respective status quo, while only about 6% opted for the status quo of the other group.

To be sure, neither the laboratory nor the field study experiments can conclusively establish the presence of status quo bias. In fact, it would be hard to design a study that could. Perhaps the artificial setting of laboratory experiments or the small amount of money at stake⁴⁰ induces participants to act differently from the way they would act in the real world. Or, perhaps the real world phenomena attributed to status quo bias are due to factors that are difficult to control for statistically. Nonetheless, at this point, evidence of the existence of status quo bias cannot be dismissed out of hand, although its significance requires further study.

To the extent that status quo bias exists, it has important implications for the presence of path dependencies. Status quo bias implies a reluctance to depart from a status quo. Looking forward, this means that a status quo will tend to perpetuate itself. Looking backwards, this means that the present status quo will, to some extent, have been determined by an earlier status quo.

A more ambiguous issue is whether and how status quo bias relates to the use of standard corporate contract terms. This issue relates to the way in which the existing standard terms are perceived by parties about to adopt a corporate contract. We conjecture that such parties view the standard terms as the status quo. Although these parties have no formal property (or other) rights in a standard term, the standard terms form an expectational baseline similar to the service/rate combination in the Hartman study and the present investment in the Samuelson and Zeckhauser study. If this is

39. See Raymond S. Hartman et al., *Consumer Rationality and the Status Quo*, 106 Q.J. ECON. 141 (1991). For other field studies, see Samuelson & Zeckhauser, *supra* note 34, at 26-33 (reporting field study evidence for status quo bias in selection of health care plans and retirement plan investment options).

40. *But see* Kahneman et al., *supra* note 35, at 1338-39 (presenting evidence that reluctance to trade is not due to small stakes).

true, parties will be reluctant to “trade” standard terms for non-standard terms. That is, the terms of a new corporate contract will more closely resemble the standard terms than if the newly formed contract were drafted on a clean, “neutral” slate. This effect would be present even when the transaction costs of writing a new contract are minimal.

B. Anchoring Bias

“Anchoring” refers to the ability of initial “reference points” to influence judgments. Once initial reference points, or “anchors,” are established, adjustments to these initial anchors tend to be too small. Anchoring thus biases final judgments in the direction of the anchor.

The effects of anchoring are dramatically illustrated in a study by Plous.⁴¹ Plous asked more than 2,000 students to estimate the likelihood of a nuclear war between the United States and the Soviet Union. This question was presented in three different formats. First, some participants were initially asked to assess whether that likelihood was greater or less than one percent (i.e., members of the group were exposed to a low anchor). A second group was initially asked whether that likelihood was greater or less than ninety percent (i.e., members of the group were exposed to a high anchor). A third group was asked to estimate the likelihood of a nuclear war without any preceding question (i.e., without exposing the members to an anchor). The results show the effect of anchoring. Of the approximately 1,500 students who responded to the survey, participants who were not exposed to an anchor assessed the probability of a nuclear war at 19.1%. Participants who were exposed to the low anchor assessed the probability at 10.8%. Participants who were exposed to the high anchor assessed the probability at 25.7%. That is, the participants’ responses varied with their initial reference points.

A similar study illustrates the effect of anchoring on economic judgments. Northcraft and Neale⁴² asked two groups of participants—students and actual real estate agents—to assess the fair price of a house. Participants were first quoted an “asking price,” which was either substantially below, slightly below, slightly above, or substantially above the actual asking price for the house. The participants were permitted to visit and

41. See S. Plous, *Thinking the Unthinkable: The Effects of Anchoring on Likelihood Estimates of Nuclear War*, 19 J. APP. SOC. PSYCH. 67 (1989).

42. See Gregory B. Northcraft & Margaret A. Neale, *Experts, Amateurs, and Real Estate: An Anchoring-and-Adjustment Perspective on Property Pricing Decisions*, 39 ORG. BEHAV. & HUM. DECISION PROCESSES 84 (1987).

inspect the house before determining its fair value. The results showed that the higher the anchor—the quoted asking price—the higher the fair value estimated by the participants. For example, students that were quoted \$119,900 as the asking price (a figure substantially below the actual asking price of \$134,900) assessed the house's fair value on average at approximately \$117,000, while students quoted \$149,900 as the asking price assessed the fair value at approximately \$144,000. The same pattern was present, although somewhat less strikingly, for the actual real estate agents. Their assessed fair price increased from approximately \$114,000 when exposed to the low anchor to approximately \$129,000 when exposed to the high one.⁴³

Standard contract terms may have an anchoring effect analogous to those observed in the experiments described above. Standard terms carry an aura of stability and objectivity even more than the anchors used in these studies. Although the presence of learning and network externalities may provide a rational reason for a firm to adopt a standard term, the possibility of anchoring bias suggests that a decision to adopt such a term may not be wholly rational or value-enhancing.

C. *Conformity Bias*

A third behavioral trait that may contribute to contractual path dependence is conformity bias. The classic study on conformity bias was performed by Asch.⁴⁴ Asch asked participants to match the length of a "standard" line with one of three comparison lines. Each participant was placed in a group of six to eight people, with the other group members acting on the instructions of the experimenter, unbeknownst to the participant. The other group members had been instructed in some runs to offer an answer that was clearly wrong, and to do so before the participant presented her own answer. The participant thus faced the dilemma of either conforming to the judgment of the other group members or sticking to her own judgment. Asch found that 74% of the participants gave an incorrect answer in at least some of the twelve runs where they were confronted with the false group answers, and 28% of the participants offered an incorrect answer in more than half of the twelve runs. In contrast, in a control study, only 5% of the participants made any error in comparing the line lengths.

43. Northcraft & Neale, *supra* note 42, at 84 (Table 3).

44. Solomon E. Asch, *Effects of Group Pressure upon the Modification and Distortion of Judgements*, in *GROUPS, LEADERSHIP AND MEN* (H. Guetzkow ed., 1951).

Results similar to those reported by Asch have also been obtained in other experimental settings. These studies have identified a number of factors that affect the willingness of participants to conform to group judgments. From the perspective of this article, the following factors are particularly significant. First, conformity is much greater on difficult items than easy ones.⁴⁵ Second, conformity is greater if the group is cohesive or consists of peers whom the subject regards as competent than if it consists of strangers.⁴⁶ Third, conformity is greater if the subject must state her opinion openly, rather than privately.⁴⁷ And fourth, there are substantial individual differences in the degree of conformity, with less intelligent subjects or subjects with low ego and feelings of personal inadequacy exhibiting more conformity than more intelligent subjects or subjects with high ego and no feelings of inadequacy.⁴⁸

Whether conformity bias leads to standardization of contract terms is difficult to resolve. It is certainly plausible that parties about to enter into a contract view the standard form as a group judgment. Moreover, the relevant group generally is one consisting of peers—usually other lawyers working in the same area—who are respected and whose respect one tries to gain. The issues with respect to which one may consider deviating from the standard terms tend to be complex and involve judgment calls—all factors that would strengthen conformity bias. On the other hand, lawyers who want to deviate from the standard terms express their views in a substantially less public manner than, say, the participants in the Asch study. And, at least in popular perception, the average lawyer does not suffer from a low ego or feelings of inadequacy.

We therefore believe that, based on the present evidence in behavioral psychology, the possibility that conformity bias contributes to standardization of contract terms is ambiguous. Nonetheless, the issue warrants consideration and further study.

45. DAVID KRECH ET AL., *INDIVIDUAL IN SOCIETY: A TEXTBOOK OF SOCIAL PSYCHOLOGY* 509 (1962).

46. *Id.* at 514. See also Christian S. Crandall, *Social Contagion of Binge Eating*, 55 J. PERSONALITY & SOC. PSYCHOL. 588, 595 (1988) (finding that as cohesiveness increased, friends in two sororities became more similar in their tendencies to engage in binge eating).

47. Solomon E. Asch, *An Experimental Investigation of Group Influence*, in WALTER REED ARMY INST. OF RES. & NAT'L RES. COUNCIL, SYMPOSIUM ON PREVENTIVE AND SOCIAL PSYCHIATRY 17, 23 (1957).

48. KRECH ET AL., *supra* note 45, at 526.

D. Interaction Among Influences on Standardization

The results of the studies of cognitive bias are subject to different interpretations, some of which have bearing on our discussion in Part I. In particular, it is difficult to untangle the influence of anchoring and conformity bias from that of actual learning.⁴⁹ In the study of real estate pricing, for example, the asking bids may have provided actual information to the participants. Especially for the students, who presumably had little experience in valuing real estate, the asking bid may have been perceived as useful information regarding the actual value of a house. On the other hand, in the experiment involving nuclear war, it is unlikely that the reference points would have been viewed as providing information regarding the actual probabilities, and the results seem more likely to reflect pure cognitive bias.

Moreover, standardization may be the product of cognitive biases operating in conjunction with the other dynamics discussed in this article. To the extent that lawyers draft contracts, cognitive biases may be present along with more rational judgments regarding the reputational payoff to employing a standard term or customizing a new one. Similarly, cognitive biases may be present along with learning and network benefits. For example, the judgments of lawyers and their clients regarding whether a term will be widely used in the future (and hence accrue network benefits) may be influenced by expectations regarding the operation of cognitive biases on other firm managers and lawyers.

As a general matter, it is not necessary to specify the relative importance of the various influences on standardization. At this point, our aim is simply to identify influences that can lead to excessive standardization—and thus to path dependence in corporate contracting.

IV. CONCLUSION

This article has briefly explored several phenomena that may lead to excessive standardization in corporate contract terms. Although a standard term may well be socially optimal, each of the influences that we have explored creates the possibility that a corporate contract term will become

49. See, e.g., Sushil Bikchandani et al., *A Theory of Fads, Fashion, Custom, and Cultural Change as Informational Cascades*, 100 J. POL. ECON. 992, 1013 (1992) (discussing information-based interpretation of results of conformity bias); Robert Shiller, *Conversation, Information, and Herd Behavior*, 85 AMER. ECON. REV. 181, 182 (1995) (same).

widely adopted even though an alternative term would be superior from a societal perspective. Even if individual firms behave in a value-maximizing manner, learning-related informational cascades and network externalities can lead to standardization that fails to maximize the aggregate value of all firms. Moreover, when the role of the lawyer as drafting agent is introduced, agency costs and herd behavior among lawyers add to the attractive force of standard terms and introduce the possibility that a firm will adopt a term that fails to maximize its value. Finally, moving outside the realm of rational choice, cognitive biases can further enhance the attraction of standard terms over superior customized terms and lead to the adoption of standard terms that do not maximize a firm's value.

At this point, we make no claim regarding the extent of these influences. Nor do we make any claim regarding whether some form of legal intervention might improve corporate contracts.⁵⁰ Our only claim is that a better understanding of these forces, particularly regarding their importance as an empirical matter, would enhance both our understanding of the contractual nature of the corporation and our ability to evaluate particular contract terms that develop.

A better understanding of these forces might also sharpen our insights into corporate governance systems in other countries. Differences across countries in the structure and organization of the corporation are commonly the product of legislation, but they may also be the product of private arrangements that can at least loosely be viewed as contracts. To the extent that firms in different countries have "standardized" around different contract terms or analogous institutions, two explanations are plausible: First, contract terms and institutions may be optimally adapted to the economic environment of each country, with differences across systems reflecting environmental differences; but second, contract terms and institutions may to some extent reflect the forces discussed in this article. One cannot develop an understanding built around the first, more conventional, explanation without investigating whether the second explanation is pertinent as well.

50. One of us has suggested that a corporate law regime built more around menus of alternative terms than default rules would be warranted if network externalities are significant. Klausner, *supra* note 2, at 337-41.