Posttrial Adjustments to Jury Awards

Michael G. Shanley, Mark A. Peterson
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1987

RAND
This research is supported by The Institute for Civil Justice.

ISBN: 0-8330-0874-9

The RAND Publication Series: The Report is the principal publication documenting and transmitting the Institute's major research findings and final research results. The Note reports other outputs of sponsored research for general distribution. Publications of The RAND Corporation do not necessarily reflect the opinions or policies of RAND's and the Institute's research sponsors.

Published by The RAND Corporation
1700 Main Street, P.O. Box 2138, Santa Monica, CA 90406-2138
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Foreword

Headlines announcing large jury awards to plaintiffs in personal injury and business disputes have become commonplace in local newspapers. But few readers of those headlines realize that those jury awards may be changed by a variety of posttrial activities. Practitioners familiar with the workings of the civil justice system have, of course, long known that large awards in civil damage suits are often modified before the final disposition of the dispute by court action or negotiation among the parties. Until recently, however, observers have had to rely on anecdote and speculation to assess how frequently such modifications occur, how large the changes in awards are, and how the likelihood and size of reductions vary with the type of lawsuit. In this report, the Institute for Civil Justice provides systematic evidence on the effects of posttrial activities on a broad range of civil jury verdicts.

To find out what happens to jury verdicts after trial, ICJ researchers surveyed plaintiff and defense attorneys in a sample of recently concluded civil jury trials in a diverse set of California counties and in Cook County, Illinois. Their results indicate that posttrial processes altered the jury’s verdict in about 20 percent of all cases and, since virtually all of those changes reduced the size of the award, the average amount actually paid out was 71 percent of the amount the jury awarded at trial. Of particular note were the average reductions at the high end of the award distribution: one-third for awards of $1 million or more and over 40 percent for awards of $10 million or more.

Reductions in award size were not universal, however. On average, defendants paid over 90 percent of awards up to $100,000 and about 80 percent of awards between $100,000 and $1 million. The likelihood and amount of reductions also differed depending upon how the dispute was ultimately resolved—court action or settlement, the type of case and the characteristics of the parties. Clearly, these patterns of posttrial activities and their effects on jury awards need to be considered by policymakers debating restrictions on awards.
These research findings complete another part of the picture of civil jury outcomes that the ICJ began to describe several years ago with the first of our studies on trends in verdicts in San Francisco and Cook Counties. But many parts of that picture remain obscure. What factors explain whether and how much jury verdicts are reduced? Do posttrial adjustments “correct” awards that are excessive in relation to the monetary and nonmonetary losses or are awards reduced for other reasons? Does the threat of extended and expensive posttrial appeals induce litigants to agree to negotiate settlements that they believe are unfair? What is the cost of the posttrial process to plaintiffs, defendants, and the courts? Future ICJ research will address such questions in our continuing research on the civil justice system.

Gustave H. Shubert
Director, The Institute for Civil Justice
Executive Summary

CONTEXT

This report examines how jury awards change after trial. The study was motivated, in part, by that aspect of the recent national debate on tort reform that focused on the size of jury awards. Statistical studies, including those from the Institute for Civil Justice (ICJ) (Peterson, 1987), indicate that average jury awards have increased significantly in recent years, mainly because of sharp increases in the size of the largest jury awards. The size of current jury awards has been termed “excessive” by some critics of the tort liability system and has led to proposals for legal change.

The most frequently proposed change would place a “cap” on total or general damages, directly limiting what juries can award in the largest cases. Other policies would not limit the size of jury awards directly, but would subject them to increased judicial review or—within that review—place a greater burden on the plaintiff to justify large awards. Still another group of alternatives would seek to avoid exorbitant awards by providing juries more direction as to what an appropriate amount might be. For example, the use of “special verdicts” would involve more court instruction of jurors on award size and would require juries to specify in their decision the various components of the total award (e.g., past economic losses, future economic losses, pain and suffering awards).

However, most criticism of large jury awards has ignored the fact that the current liability system already has mechanisms for reducing excessive awards. Through posttrial actions, trial courts can reduce awards, completely overturn juries’ decisions, or grant a new trial. Similarly, courts of appeal can change the final compensation paid or
order a new trial. In addition, parties may settle for an amount less than the award to avoid litigation of appeals. In ignoring the effects of posttrial processes already in place, critics are passing judgment on the current system before fully evaluating it.

The outcomes of posttrial processes are largely undocumented. The general absence of empirical research has led to polarized viewpoints. It appears that some critics of the current system assume posttrial processes make almost no difference, since they fail to even mention their potential importance. Others tend toward the other extreme, arguing that few large verdicts are ever paid under the current system, and that, as a result, data on jury awards are highly misleading. This study shows that neither of these extreme positions is justified.

The objective of this research was to describe how posttrial processes change outcomes of jury trials. Cases included not just tort actions but all civil suits for money damages. For all types of cases, the study asked three questions. First, how do jury awards compare to final payments? By “payments,” we mean the amount of the check that eventually transfers from the defendant to plaintiff side of the dispute.1 Second, how do results vary by award size? Most of the current debate has been concerned with the largest awards—million dollar verdicts—but there is also the question of what happens to the more numerous, smaller awards.

Third, how do the results differ by case characteristics? For example, do the results in personal injury cases differ from those in business or contract cases? How do payments in high-stakes litigation, such as product liability and medical malpractice, compare to payments in other cases? Does the outcome change when punitive damages were awarded? How about when “deep pocket” defendants are involved? Such questions are important to understanding the type of cases most affected by posttrial processes. In addition, proposals for legal change often focus on particular types of cases.

The study found that, in the locales studied, defendants paid out an average proportion of .71 of the amount the jury originally awarded. Further, reductions were generally greater among cases with the largest awards. However, some sizable awards were not lowered, and results differed significantly depending on the characteristics of the case. Below, we describe the study design and provide details on the results.

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1In tort cases, plaintiffs usually pay their attorneys a percentage of this amount and may pay other litigation expenses as well. We do not address these issues in this report.
RESEARCH DESIGN AND SURVEY RESULTS

The design of the research called for sampling cases from the ICJ database of jury verdicts in three locations: Cook County, Illinois; San Francisco County, California, and the ring of counties surrounding it; and a group of smaller California counties outside major metropolitan areas.\(^2\) A random sample of 880 recent (1982–1984) tried cases were chosen from the study jurisdictions. The full range of trial outcomes was included in the sample—from those with million dollar awards to defense verdicts. However, the sample was stratified to ensure all large cases were included. Final resolutions for the sampled cases were obtained from a mail survey of lawyers. Both plaintiff and defendant lawyers were contacted for each case; thus, more than 2000 questionnaires were mailed.

The response rate to the survey was excellent. For 71 percent of the sampled cases, we were able to determine the final payment. For the remaining 29 percent of the cases—where the final payment was missing—about half were known to be still open at the time of the survey, while the other half lacked a usable survey response. Analysis results incorporate statistical adjustments to account for the missing cases (see App. C), but none of those adjustments altered the study’s major conclusions.

The cases used in the analysis were of three types: those in which only the plaintiff lawyer(s) responded, those in which only the defendant lawyer(s) responded, and those in which both sides responded. Returns show that both plaintiff and defendant lawyers participated at about the same rate and that there was a significant overlap where both sides provided the requested information. A comparison of the cases where both sides answered showed only random, statistically insignificant differences between plaintiff and defendant lawyer responses.

THE EFFECT OF POSTTRIAL PROCESSES ON FINAL OUTCOMES

Overall Results

Posttrial processes altered the final outcome in only a small percentage of cases; 80 percent of jury verdicts remained unchanged after trial. A few cases of both defense and plaintiff verdicts ended with

\(^2\)This last group includes all California counties greater than 150,000 in population but outside major metropolitan areas. See Sec. III for exact definition.
increased payments, representing 2 and 3 percent of all cases, respectively. However, most of the changes were reductions. Posttrial processes resulted in lower payments to plaintiffs in 15 percent of all cases, which represented about 25 percent of the plaintiff verdicts.

Despite the small fraction of cases affected, posttrial processes made significant reductions to total jury awards. Combining cases that changed with those that did not, the average jury award was $161,000 while the average payment was $114,000. Thus, the average payout rate\(^3\) for all cases was \(.71\) of the amount awarded at trial.\(^4\)

The overall result is highly influenced by the small number of the reduced cases involving much larger-than-average awards and substantial reductions. The mean verdict in cases in which the defendant paid the full jury award was $135,000. In contrast, the mean jury award in cases that were later reduced was $635,000, an amount almost five times greater. Posttrial processes reduced that average to $335,000, representing a payout rate of \(.53\) for cases with reductions.

Table S.1 examines results by award size, showing that the larger the jury award the smaller the proportion paid. The bottom row of that table repeats the report's overall result—that for all cases, averag-

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Average Jury Award ($1000)</th>
<th>Ratio Paid/Award</th>
</tr>
</thead>
<tbody>
<tr>
<td>1-99 thousand</td>
<td>23</td>
<td>.93</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>314</td>
<td>.82</td>
</tr>
<tr>
<td>1-10 million</td>
<td>2,673</td>
<td>.68</td>
</tr>
<tr>
<td>10+ million</td>
<td>27,220</td>
<td>.57</td>
</tr>
<tr>
<td>All cases(^a)</td>
<td>161</td>
<td>.71</td>
</tr>
</tbody>
</table>

\(^a\)Including defense verdicts.

\(^3\)The "payout rate" or "proportion paid" for a group of cases is computed by dividing average payments by average awards. The terms never refer to the average of ratios for individual cases.

\(^4\)The average proportion paid is somewhat smaller than \(.71\) if the definition of the jury award includes posttrial interest, a plaintiff entitlement in each of the study jurisdictions. The ratio is reduced because awards, the denominator in the calculation, must be increased to take into account the statutorily determined time value of money. For example, in California, a $100,000 award is worth $110,000 a year after trial. If $80,000 is paid at that time, the amount represents .90 of the jury award, but only .82 of the full plaintiff entitlement. Though collecting precise information about the amounts of posttrial interest due and paid was beyond the scope of this report, in an appendix we estimate that defendants paid from between .64 and .67 of the full plaintiff entitlement.
ing $161,000, the proportion of .71 was paid. However, for the smaller cases in the study, those with less than a $100,000 award, the average proportion paid was .93, representing a reduction of only .07. For larger cases, those up to $1 million, the payout was .82. For million dollar awards, payments were even less. If the award was over $1 million but less than $10 million, an average of .68 was paid; and if the award was over $10 million, the estimated proportion paid was an estimated .57.\textsuperscript{5}

Even though the largest cases received the greatest reductions, total payments were still concentrated in the biggest cases. For both awards and payments, million dollar cases accounted for the majority of total dollars. Among awards, million dollar cases represented 68 percent of the total dollar volume; among payments, they represented 58 percent of the total volume.

**Variation in Results by Type of Case**

Results for different types of cases varied significantly from the overall result. This section examines that variation by case location, the subject matter of the litigation, type of damages, type of defendant, and by method of disposition. For this analysis, we exclude defense verdicts because payments are rare in such cases. In addition, we exclude the five cases in the sample with verdicts exceeding $10 million, because they can mask underlying patterns in the rest of the data.

**Location of Case.** Results appear to vary little across the three locations in the study. These include Cook County, the San Francisco Metropolitan area, and the group of smaller California jurisdictions described earlier. In Cook County, the average payout was .75 of the award; in the San Francisco area, .81. The smaller California jurisdictions had the smallest proportion paid, .66 of the award. However, that difference disappears when cases with awards above a million dollars are excluded. For cases with awards smaller than a million dollars, the proportion paid in nonmetropolitan California and in the San Francisco area was nearly identical.

**Personal Injury, Business/Contract, and Intentional Tort Cases.** Personal injury cases and business/contract cases had similar payout rates; .79 and .77, respectively. The analysis suggests, however, that the factors that influence payouts are different for the two different case types. Intentional tort cases\textsuperscript{6} have a smaller payout than either per-

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\textsuperscript{5}Because there were fewer cases at higher dollar levels, estimates of payouts in larger cases are less reliable than estimates of payouts in smaller cases.

\textsuperscript{6}Under intentional torts, we include assault, discrimination, and defamation (libel or slander) cases.
sonal injury or business/contract cases; on average less than half (.48) of the amounts awarded in those cases are paid by defendants.\(^7\)

**Cases Involving Punitive Damages.** When punitive damages constitute a part of the total award, final payments are much smaller, .57 of the total, than in the more numerous cases where those damages are not involved. For cases involving only compensatory damages, the payout averages .82. This result is not only a function of the larger award size of punitive damage cases but also holds in each award size category. This finding is consistent with the results of an earlier ICJ study of posttrial processes in punitive damage cases (Peterson, Sarma, and Shanley, 1987). That study, involving somewhat different jurisdictions and an earlier time period, concluded that a proportion of .50 of awards in punitive damage cases are finally paid, a payout quite close to the proportion .57 cited above.\(^8\)

**Cases Involving Deep Pocket Defendants.** Cases involving only individuals pay out at a much smaller rate than when one or more deep pockets are involved. By deep pockets we mean businesses, governmental agencies, hospitals, and doctors. When deep pockets are held responsible, the average proportion paid is .77, whereas when only individuals pay, the proportion is .58. The finding goes against the grain of the award size results; it occurs despite the fact that cases with deep pockets involve awards averaging six times larger than those with only individuals. The result suggests that when cases involve only individual defendants, collection problems are more likely.

**Product Liability and Medical Malpractice Cases.** Large jury awards in high-stakes personal injury litigation do not always end with relatively small payments. Medical malpractice and product liability cases produce large awards (averaging $528,000 and $539,000, respectively) compared to other types of personal injury cases (which have an average award of $104,000). Since we have found that, over all cases, the larger the award the smaller the proportion paid, we might expect that high-stakes litigation would uniformly produce relatively smaller payouts. This turns out to be true for medical malpractice cases; the overall payout rate in those cases is .67 compared to a rate of .78 in other personal injury cases. However, in product liability cases, the payout is unusually high; a proportion of .91 of all awards are paid by defendants. Further, though our sample size is not large enough to produce reliable estimates for very large cases (over $1 million),

\(^7\)Much of the difference, however, can be explained by the greater likelihood of punitive damage awards in such cases. For further explanation, see the discussion of cases with punitive damages, immediately following.

\(^8\)The proportions would be even closer if the calculations in the present study included cases with $10 million-plus awards.
another study of posttrial outcomes suggests the finding regarding product liability cases holds for million dollar cases as well (Broder, 1986). Additional research would be required for further explanation of these results.

*Posttrial Settlements Versus Court Decisions.* In most cases, plaintiffs and defendants negotiated the smaller payment. Of the 25 percent of the cases in which defendants paid smaller amounts, nearly two-thirds (62 percent) terminated with a settlement between the parties. In an additional 13 percent, plaintiffs accepted reduced payments due to problems with collection; that is, defendants had insufficient insurance and assets to pay the total judgment. In slightly less than one-fourth of the reduced cases, 23 percent, the courts made the final decision; these resulted more from motions to the trial court than from the appeals process.

Though courts decided a relatively small proportion of the cases, they tended to rule on the larger cases and to make substantial reductions. Courts reduced payments on cases that averaged nearly $800,000 in awards, while the parties reached the final agreement in cases averaging a little more than $500,000 in awards. In addition, the proportion paid was less than half (.46) when the courts decided, but fully two-thirds (.67) when the parties decided. Collection problems bring the largest reductions (more than two-thirds), but involve relatively small cases, averaging about $150,000 for the award.

**CONCLUSIONS**

**Implications of Results**

Posttrial processes are an important component of the current tort liability system. They result in substantial changes to amounts awarded by juries, reducing total awards in the jurisdictions studied here by a factor of nearly .30. Further, posttrial outcomes are significantly different depending on the characteristics of cases. For example, the biggest cases—especially million dollar verdicts—and cases that involve punitive damage awards concluded with relatively small proportions of the jury award paid. In contrast, product liability cases appeared to pay out at relatively high amounts. Before changing rules that govern jury awards, policymakers should carefully consider the outcomes of current posttrial processes.

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9Broder also found a relatively large payout in medical malpractice cases with awards exceeding $1 million. This report does not support that result, but includes only a few cases upon which to base a calculation. In addition, the finding in this report for medical malpractice cases may have been affected by the California law that places a cap of $250,000 on general damages in such cases.
Given the results of this study, what can be said about posttrial processes in the current tort liability system? The answer depends partially on how one assesses the outcomes. Consider, for example, the overall size of the change to jury awards: One could focus on the .29 of the award not paid—a significant reduction from the amounts juries decided; or, one could focus on the relatively large proportion, .71, that is paid. Here, whether the change is large or small is partially a question of whether one sees the glass as about 30 percent empty or 70 percent full. Consider also the type of cases reduced under current posttrial rules: One could focus on the finding that the current system subjects the largest awards to the greatest scrutiny and the largest reductions. From this viewpoint, the system appears to work already in much the same way that the current proposals for legal change are intended to work, namely by affecting “excessive” awards. However, one could also note that not all large awards are reduced and that total payments, like total awards, are highly concentrated in a few large cases.

Future Research

By providing a basic description of posttrial outcomes, this report provides some valuable insights into understanding the effects of posttrial processes. However, the findings suggest a series of unanswered questions for future research. One of those questions is, are the “right awards” reduced? If the policy goal of the current posttrial system is to reduce “excessive awards” then, other things equal, we should find that awards are most likely to be reduced—and by the largest amounts—when awards substantially exceeded monetary damages or when injuries were least serious. Do posttrial processes “correct” other perceived errors in jury award patterns, such as unequal outcomes for plaintiffs with similar injuries and losses? Multivariate analysis of the present data set, adding a few new variables, could address these questions.

Another question concerns time trends in compensation. Much of the concern over awards has focused on the sharp rise in average verdicts over the last 25 years, rather than simply the latest year’s value. Has the average payout increased over time? We have shown what happened to payments in 1982–1984 but have not reported on how that compares with earlier periods. The trend line for payments could simply parallel that for awards, showing the same sharp rise over time, or could prove considerably flatter or even sharper. Additional data on earlier cases would be required to answer this question.
Finally, how do alternative posttrial policies compare? One might compare various strategies that place caps on awards with others that provide for more stringent judicial review, then ask a series of questions: What is the effect of the various alternatives on the final payment? Are the “right” awards changed? What are the transaction costs of the various processes? Costs are an issue not addressed at all in this report. Opportunities for such analyses might come from comparing states with different laws or, within a single state, from comparing outcomes before and after a change in law. The projects could take the form of in-depth case studies involving a small number of disputes, or multivariate analysis of a larger number of cases. Such additional research could go a long way toward filling the informational gap that exists regarding the final outcomes of posttrial processes.
Acknowledgments

We offer our sincere thanks to the nearly 1300 plaintiff and defense lawyers who responded to our survey of posttrial outcomes, and to the attorneys in each jurisdiction who helped us to obtain their cooperation.

Special supplementary funding for this study was provided by the Association of Trial Lawyers of America. This support is gratefully acknowledged.

David Trubek and Linda Waite served as technical reviewers and offered many helpful suggestions for improving and clarifying the report.

We also would like to thank our RAND colleagues for their assistance. Steve Carroll assisted in the sample design and Pat Ebener designed the survey instrument. Nora Fitzgerald coordinated the survey effort with assistance from Jennifer Duncan, Rebecca Mazel, and Eric Nilson. Thanks also to Susan Allen for her skillful editing and to Rosalyn Dennis for her excellent secretarial services.
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I. INTRODUCTION

This report examines how jury awards change after trial. The study was motivated, in part, by that aspect of the recent national debate on tort reform that focused on the size of jury awards. Statistical studies,\(^1\) including those from the Institute for Civil Justice (ICJ), have shown that average jury awards are increasing, due especially to increases in the largest jury awards.\(^2\) The size of current jury awards has been termed “excessive,” and juries themselves “out of control,” by some critics of the tort liability system.\(^3\) In addition, these beliefs have led to proposals for legal change.

The most frequently cited change would place a “cap” on total or general damages, directly limiting what juries can award in the largest cases.\(^4\) Other policies would not limit the size of jury awards directly, but would subject them to increased judicial review\(^5\) or—with that review—place a greater burden on the plaintiff for justifying large awards.\(^6\) Still other alternatives would seek to avoid excessive awards by providing juries more direction as to what might be appropriate.

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1 For example, see Daniels (1986) and Jury Verdict Research, Inc. (1986).

2 The ICJ’s research on jury verdicts shows two distinct and contrasting trends in the size of jury awards. On the one hand, most jury awards are relatively modest and have remained remarkably stable over time. On the other hand, the size of the largest awards, especially those over a million dollars, has increased sharply and continuously, driving up both the size of the average award and the total amount of money awarded by juries. While the equivalent of million dollar verdicts (after adjusting for inflation) was almost unheard of in the early 1960s, such awards have come to account for the vast bulk of money awarded by juries in the 1980s. See Peterson and Priest (1982), Shanley and Peterson (1983), Peterson (1987).


5 For example, the Report of the Action Commission to Improve the Tort Liability System, American Bar Association (February 1987) recommends greater use of remittitur and additur by trial and appellate courts.

6 The State of Florida has made such a law in regard to punitive damage awards. See Peterson, Sarma, and Shanley (1987, p. 56) for further details.
amounts. For example, the use of "special verdicts" would involve more court instruction of jurors on award size and would require them to specify in their decision the various components of the total award (e.g., past economic losses, future economic losses, pain and suffering awards).

However, most criticism of large jury awards has ignored the fact that the current liability system already has mechanisms for reducing excessive awards. Through rulings on posttrial motions (e.g., remittiturs), trial courts can reduce awards or completely overturn juries' decisions, or grant a new trial. Similarly, courts of appeal can change the final compensation paid or order a new trial. In addition, the parties can decide to settle for a reduced amount rather than continue litigation after trial. Ignoring the effects of posttrial processes in proposing change passes judgment on the current system before fully evaluating it.

Until this report, the outcomes of posttrial processes have gone largely undocumented. However, the scant data that have been available on posttrial outcomes lend support to the argument that payments to plaintiffs are smaller than the amounts awarded by juries. For some of the largest awards, final outcomes are public knowledge. For example, the AT&T antitrust case in Cook County, with an original trial verdict of over $2 billion, was reduced eventually to a $100 million verdict in a second trial, less than 5 percent of the original award. A newly published study on million dollar jury awards (Broder, 1986) suggests average reductions of from 20 to more than 50 percent. An Institute for Civil Justice study of punitive damage awards found that in half the cases where punitive damages were awarded, defendants eventually paid less than the full amount of the verdict; and, on average, defendants paid only half of what juries awarded (Peterson, 1988).

Footnotes:

7 For example, the Report of the Action Commission to Improve the Tort Liability System, American Bar Association (February 1987) recommends that one or more tort award commissions be established that would suggest guidelines for award size for future trial court reference.

8 The use of special verdicts as a way to contain excess awards was suggested in Massachusetts. See Report of the Governor's Task Force on Liability Issues (1986, p. 124).

9 This has been true of some of the task force reports on the tort system. For one who has discussed the importance of posttrial processes, see Galanter (1986).

10 Research on posttrial processes has been largely absent because comprehensive data on jury verdicts has, until recently, been lacking. Analysts could not use the more readily available closed claim files to study posttrial outcomes because they normally contain too few trials. On the other hand, data describing appeals miss the largest component of posttrial outcomes—settlements between the parties.

11 That study was based on a sample of 198 verdicts in personal injury cases of one million or more. The cases were provided by Jury Verdict Research, Inc., and were all tried in 1984 and 1985.
Sarma, and Shanley, 1987). However, these studies all focus on a subset of jury verdicts. There has been no systematic information for jury trials as a whole available to decisionmakers.

The absence of systematic research has led to polarized viewpoints. It appears that some critics of the civil justice system assume that posttrial processes make almost no difference, since they fail to even mention the potential importance of the processes. Others tend toward the other extreme, arguing that because large verdicts are likely to result in the greatest reductions, the data on jury awards are highly misleading.

The purpose of this research is to measure how posttrial processes change awards. Specifically, the study asks three questions. First, how do jury awards compare to final payments? “Payment” in this context refers to the amount of the check that eventually transfers from the defendant to plaintiff side of the dispute. Second, how do results vary by award size? Most of the current debate has been concerned with the largest awards—million dollar verdicts—but there is also the question of what happens to the many more numerous smaller awards.

Third, how do the results differ by case characteristics? For example, do the results in personal injury cases differ from those in business or contract cases? How do payments in high-stakes litigation, like product liability and medical malpractice, compare to payments in other cases? Does the outcome change when punitive damages were awarded? How about when deep pocket defendants are involved? Such questions are important to understanding the types of cases most affected by posttrial processes. In addition, proposals for legal change often focus on particular types of trials, such as punitive damages, product liability, or medical malpractice.

The design of the research called for sampling the ICJ database of jury verdicts in three locations: Cook County, Illinois; San Francisco County, California, and the ring of counties surrounding it; and a group of smaller California Counties outside the largest metropolitan areas.

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12This is true in, for example, Report of the Tort Policy Working Group on the Causes, Extent and Policy Implication of the Current Crisis in Insurance Availability and Affordability (February 1986), and Commission on California State Government Organization and Economy (July 1986).

13For example, see Cooper (1986).

14To study jury behavior, The Institute for Civil Justice (ICJ) has constructed a database of information about 25,000 jury trials that took place in California and Cook County, Illinois (the Chicago metropolitan area), through 1985. For San Francisco and Cook counties, the files date back to 1960.

15This last group includes all California counties greater than 150,000 in population but outside the largest metropolitan areas. That region includes places as large as Sacramento and Bakersfield, but also many smaller urban, suburban, and rural communities.
A random sample of 880 recent (1982–1984) trials were chosen from the study jurisdictions. The full range of trial outcomes were included in the sample—from those with million dollar awards to defense verdicts. Final outcomes for the sampled cases were obtained from a mail survey of both the plaintiff and defendant lawyers in those trials.

Section II describes more fully the posttrial processes that are available to litigants and the bargaining arena in which these processes take place. Section III presents the study’s methodology, including sample design and survey procedures. Section IV describes the results of the analysis, and Section V discusses their significance.
II. POSTTRIAL PROCESSES IN CIVIL LITIGATION

Litigation is most often a process that begins with a lawsuit or a claim and ends either with an acceptable payment by defendants or with the plaintiff dropping the claim. Few lawsuits go all the way to a decision by a jury,¹ and for those that do the jury verdict is only one step in this process. Posttrial legal proceedings can change the amount of money owed by defendants, or the parties can agree that the obligation will be an amount different from that determined by the jury. Even when the verdict is not changed, defendants might pay more or less than the verdict because of awards of costs, attorneys’ fees or interest, credits for settlements by other defendants, or because the defendant is unable or unwilling to pay the amount of the jury verdict.

This report does not attempt to look empirically at each of the procedures, adjustments, or litigation strategies that can cause payments to differ from verdicts. Systematic consideration of all these factors would require a much larger effort than the present modest analysis of the relationship between jury verdicts and ultimate outcomes. But brief consideration of this posttrial process helps clarify the reasons for differences between payments and jury verdicts.

¹Between filing and trial, lawyers must undertake a number of formal and informal activities. Defendants must answer the complaint, and both parties might challenge the other’s pleadings (i.e., the plaintiffs’ complaint and the defendant’s answer) or amend their own pleadings. Usually parties will undertake formal discovery by submitting written questions (interrogatories) to another party or to others with knowledge about potential issues in the suit or else by examining parties or witnesses under oath (depositions). Discovery by one party will place some, occasionally substantial, burdens on other parties. Parties might also submit motions attempting to get judges to clarify trial issues or procedures or resolve specific questions before trial. In most jurisdictions, parties must also participate in settlement conferences with judges.

There are great differences among trials and parties in the extent of this formal pretrial activity and informal actions, such as investigation of claims and defense, preparation of potential evidence, and settlement discussions among the parties.

Parties usually settle prior to trial in order to hedge against uncertain trial results and avoid trial and pretrial expenses (Waterman and Peterson, 1981). But settlements usually occur later rather than earlier in this pretrial process in part because each party needs to learn about issues in the case and in part because defendants will typically require plaintiffs to prove their willingness and ability to prepare for and try the case.
THE DETERMINANTS OF POSTTRIAL ACTIVITY

Unless the jury verdict is modified by a posttrial procedure, the jury verdict becomes the judgment of the trial court and the defendants are obligated to pay the amount of the verdict. In many cases, the verdict becomes the judgment and that judgment is paid in due course.

But many other lawsuits are not finished so simply on the basis of the jury verdict. Any litigant can attempt to prevent entry of judgment on the verdict by filing an appeal with a higher court or by requesting the trial court either to grant a new trial or to enter a judgment different from the jury verdict (known as a JNOV, a judgment notwithstanding the verdict). Trial courts can grant a new trial, overturn a jury verdict (by entering a JNOV), decrease the amount of the verdict by ordering a remittitur, or increase the amount of the verdict by ordering an additum. Similarly, appellate courts can overturn verdicts, order new trials or even recalculate the amount of the judgment.

Even if judgment is entered on the verdict, a defendant might resist payment of the judgment forcing the plaintiff into a new set of legal procedures to levy execution on the judgment. Furthermore, the

2Cal. Civ. Code Proc. section 657(b) (West’s 1986); Ill. Rev. Stat 1986, chapter 110, para 2-1202(b). In ruling on a motion for a new trial where damages had been awarded by a jury, a California trial court can reweigh the evidence, judge credibility of the witness, and draw reasonable inferences contrary to those drawn by jurors. (Brooks vs. Metropolitan Life Ins. Co. 27 C. 2d 305, 307, 163 P. 2d 689 (1945); see, Johns (1985), section 20.1.)


4The court enters an order reducing the amount of the verdict, usually giving the plaintiff the option of accepting the reduced verdict or else facing a new trial. Cal. Civ. Code Proc. section 662.5(a) (West’s 1986); Ill. Rev. Stat 1986, chapter 110, para 2-1202(b).

5Similar to remittitur, but now the defendant must either accept an increased award or face a new trial. Cal. Civ. Code Proc. section 662.5(b) (West’s 1986); Ill. Rev. Stat 1986, chapter 110, para 2-1202(b).

6In California, an appellate court will consider issues of damages only if the issue was first raised by a motion for new trial to the trial court. (Schroeder vs. Auto Driveaway Co., 11 C. 3d 908, 919, 114 Cal. Rptr 622, 523 P. 2d 662 (1974). California appellate courts cannot reweigh the evidence or judge the credibility of witnesses and must consider evidence in the light most favorable to support the judgment (Seiffert vs. Los Angeles Transit Lines 56 c.2d 499, 507 (1961)).

7Neal vs. Farmer’s Ins. Exchange, 21 Cal. 3d 910, 933 (1978); Cunningham vs. Simpson 1 C.3d 301, 310, 81 cal. Rptr. 855, 461 P2d 39 (1969).

8A trial verdict that is reduced to judgment (i.e., the judge orders a defendant to pay the verdict) only creates an obligation on the defendant to pay that verdict. If a defendant does not pay the obligation, the judgment must be enforced by additional legal procedures, which require the plaintiff to identify the defendant’s assets and then attempt use of legal procedures to seize or garnish those assets. These procedures can be expensive particularly where defendants do not have assets within the jurisdiction or attempt to hide their assets.
amount of the verdict might be irrelevant to "judgment-proof" defendants who have insufficient assets and insurance to pay the full amount of the verdict.

The availability of these procedures creates a new bargaining situation that frequently leads to posttrial settlements in lieu of appeals and obviates the need to levy execution on the judgment. Important determinants of posttrial negotiations are similar to those that obtained before trial, since both phases are part of the litigation process. Litigants and their lawyers usually treat litigation as if it were an investment process in which parties allocate scarce resources—time and money—to affect a possible result—the transfer of money (Trubek et al., 1983). Presumably, both lawyers and litigants consider outcomes that they expect from these posttrial procedures, the costs of pursuing such procedures, and their need to expedite or delay the transfer.

The rate of posttrial activity should be high in cases where it is likely that a verdict would be changed by a posttrial motion or appeal. This does not necessarily mean that the verdicts will be appealed or that appeals will be pursued to a decision. If the likely effect of an appeal is fairly clear, parties would usually settle on some amount different from the verdict in order to avoid the expense of pursuing the appeal.

More often the effect of posttrial motions or appeals is uncertain. A verdict may or may not be changed on appeal, and the amount to which it would be changed is also uncertain. The likelihood of posttrial activity will then depend upon the parties' expectations of the outcomes and costs of such actions. A party will undertake posttrial activities if it expects to improve its position by such activity; that is if the expected gain from an appeal or motion exceeds the costs of pursuing it. As a simple example, a defendant assessed a verdict of $100,000 and facing costs of $70,000 to appeal that verdict will undertake the appeal if it foresees that the probability that the verdict will be completely overturned is greater than .3.9

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9This example oversimplifies the considerations. Rather than facing only two outcomes (that the judgment stands at $100,000 or $0 after appeal), there will be a probability distribution, i.e., a probability for each possible dollar outcome from $0 up to $100,000 and, even beyond, if a new trial has the potential of a verdict even greater than the present verdict. This probability distribution can be given a single value, the expected outcome, representing the sum of product of each possible outcome multiplied by the probability of that outcome. Here we assume that the expected outcome is less than $70,000. This consideration is even more complex because costs and outcomes are interdependent. Presumably the probability of a successful outcome increases with expenditure of greater amounts to obtain that outcome. In turn, costs will increase greatly if the appeal or motion results in a new trial or continuing appeals. Since most parties have limited ability to estimate the probabilities and costs associated with alternative outcomes, their decisions about posttrial activity will depart from optimality or "efficiency."
This analysis suggests that posttrial activity will increase with the likelihood that the verdict would be changed on appeal or motion. The data examined in this study include relatively little about matters that will affect the likelihood of such change, other than size of verdict. We assume that judges would be more likely to change large verdicts, particularly large verdicts that have a poorly defined basis. Courts more closely scrutinize the amount of very large verdicts to see if they are unjust or the product of jury passion. We expect further that scrutiny and reductions will be particularly likely where the bases for large damage awards are imprecise. If the bases of awards are imprecise, large verdicts are more likely to be challenged and perhaps reduced as being excessive or the result of passion or prejudice by the jury. Challenges seem less threatening to large verdicts that are supported by specified economic losses (e.g., the cost of medical care for expected life span of a quadriplegic).

Large punitive damage awards, which by their nature have no precise basis, are frequently challenged and reduced (Peterson, Sarma, and Shanley, 1987). Large personal injury general damage awards (i.e., awards for pain and suffering, disfigurement, and the part of damage awards that is not supported by claims of specific dollar losses) are also subject to challenge because matters such as pain, lost enjoyment, and the like, are hard to monetize and jurors’ judgments might be overwhelmed by sympathy.

Large awards in intentional tort cases such as discrimination or defamation are also likely to be challenged for similar reasons—that the awards for such intangible injuries have no precise basis and can reflect juror passion. All of these types of awards—large punitive damages, large general damages, large awards for intangible injuries—are more likely to be challenged than large awards in personal injuries or business and contracts cases that are supported by evidence of substantial economic loss.\(^\text{10}\)

There is a second reason that posttrial activity should be greater for large verdicts. Generally the costs of pursuing an appeal do not increase as rapidly as the stakes of the appeal (i.e., the size of the verdict or the size of the plaintiff’s claimed loss). This means that, given the same probability of a change in the verdict, the posttrial costs of high-stakes cases will be smaller in ratio to the amount of such

\(^{10}\)Of course, a portion of the claims of economic loss in business and contract cases might also be questionable, particularly projections of future lost personal income or business profit. Business claims might also include large, poorly quantified claims of lost good will. However, the proportion of damages that are difficult to quantify in business and contract cases is almost certainly smaller than in the typical personal injury case, where general damages typically represent 70 to 80 percent of verdicts (Peterson, 1984).
changes. As stakes increase, parties will have a greater incentive for pursuing increasingly remote chances of a favorable change.

Posttrial processes are affected by characteristics of litigants and their lawyers, such as their risk preference and their financial situation. Defendants might pursue appeals because they do not have sufficient cash flow to satisfy the judgment or because they can earn more than the costs of the appeal plus posttrial interest on the judgment by investing the judgment while the appeals take place. Plaintiffs who need cash might accept modest posttrial settlements to avoid the further delay and cost of appeals or collection efforts.

It is important to recognize that parties undertake posttrial activities not only to seek judicial redress but also to accomplish strategic advantages such as forcing adversaries into advantageous posttrial settlements or delaying payments of verdicts. Statutes granting posttrial interest attempt to lessen these strategic incentives, but might not be sufficient if the level of interest is not sufficient to reflect the real time-value of money (Carroll, 1983), particularly for plaintiffs with great financial need.

Characteristics of the involved parties and their involvement in other litigation will also determine whether they take into account external effects of appeals. Defendant and plaintiff lawyers who are "repeat players" (Galanter, 1974) may have greater interest in the issue of precedence in appeals than plaintiffs who will likely never again be involved in litigation. Defendants faced with multiple suits might avoid an appeal even in a high-stakes case to avoid a potentially unfavorable precedent or publicity that might foster further litigation. Such defendants might expend considerable resources to avoid an adverse trial verdict, but then try to contain the adverse verdicts handed down by not appealing. In turn, parties might wish to pursue an appeal to establish a favorable legal precedent, even if the stakes of the appeal are slight for that particular case.

These considerations suggest that posttrial reductions will be less frequent in product liability cases. Product liability defendants are often faced with the threat of multiple litigation from defects in mass-produced products. The design defect, inadequate warning, or other cause of the initial plaintiff's injuries might have caused injuries in others who may be more likely to sue if an appeal vindicates and publicizes the basis of liability in the initial suit. In contrast, plaintiff lawyers in such product liability suits might welcome the opportunity to obtain favorable precedents to facilitate future litigation and public-
ity from appeals that may produce more clients.\textsuperscript{11} Because of this, they may be unwilling to accept posttrial reductions that might be acceptable in other types of litigation. Product liability defendants will have less credibility in threatening plaintiffs with appeals because they have less incentive to pursue such appeals and because plaintiffs and lawyers, at least, will be less fearful of those appeals. Posttrial activity may be less in product liability cases for another reason. Because negligence is not typically an issue in those trials (given the doctrine of strict liability) there may be fewer grounds for an appeal, and thus fewer instances of compromise settlements.

In addition to changes in awards, jury verdicts are subject to a number of adjustments that might influence the posttrial process or at least produce differences between jury verdicts and amounts paid by defendants.\textsuperscript{12} Plaintiffs are generally entitled to interest on judgments running from the date of judgment to the time of payment. Although posttrial interest is intended to promote timely payment of judgments, the strength of this effect depends upon the prevailing return on money. Our discussions with trial lawyers in California and Cook County suggest that posttrial interest becomes a factor only when the judgment is large or payment on the judgment is delayed beyond a reasonable payment period of several months. Lawyers indicate that posttrial interest is often ignored if a judgment is paid relatively promptly.

Jury verdicts are sometimes subject to other adjustments including prejudgment interest, and awards of costs and attorney's fees. These adjustments might be significant in a particular case, but both our survey and our discussions with lawyers suggest that none of these adjustments are common, in part because the conditions necessary for their imposition are infrequently met. For example, prejudgment interest is only possible if damages and the date of liability are "certain." Further, no such interest is available in Illinois for tort claims. Collection of litigation costs and attorney fees is possible only in the few cases where specific legislation permits.

Statutory caps limit the amount of payments for two types of cases in the jurisdictions studied. In Illinois, awards in dramshop cases cannot exceed $15,000 per plaintiff; verdicts greater than that are reduced

\textsuperscript{11}This does not imply that in product liability cases plaintiffs are more likely than defendants to appeal. Rather, it means that product liability plaintiffs are more likely to appeal than plaintiffs in other types of cases.

\textsuperscript{12}The most significant adjustment arises from the settlements of codefendants. Defendants are generally entitled to a credit for settlements by other defendants, and such settlements are frequent in multidefendant cases. However, since adjustments for prior settlements do not change the total amount of the plaintiff recovery, we do not count these as reductions in the jury verdict.
to $15,000. In California, medical malpractice awards are subject to several limitations: There is a $250,000 limit on awards for general damages (i.e., pain and suffering, disfigurement, and other losses by plaintiffs that are not specific economic losses, such as medical expenses or lost income); a defendant can elect to pay verdicts exceeding $50,000 over time rather than as a single lump sum. All of these provisions tend to reduce the amount of payments for cases subject to the statutes. However, dramshop actions in Illinois and medical malpractice judgments in the California jurisdictions studied are both relatively rare, so the statutes are unlikely to have broad effects.

Beyond these statutes, Illinois and California laws that affect posttrial processes appear similar. Though we did not attempt a comprehensive comparison of the laws, we investigated several important issues. For example, courts in both states appear to be governed by similar principles when granting remittiturs and additurs or ruling on punitive damage awards. Thus, we see no reason posttrial outcomes should differ in the two states because of the bargaining environment created by state laws.

WORKING HYPOTHESES ON POSTTRIAL OUTCOMES

Clearly, we lack the data to test all the ideas presented in this section. Further, except for the little prior research generated on posttrial outcomes, we have no basis to predict the size of the posttrial effect. However, the above discussion does allow us to produce a series of "working hypotheses" about posttrial effects that we can begin to test using the data from this study.

First, our analysis leads us to expect larger awards to pay out at a lower rate than smaller awards, as Broder (1986) found in other research. Second, because punitive damage awards have a less precise basis than compensatory awards and thus are more open to challenge and reduction, we expect that a smaller proportion of punitive damage awards will be paid than compensatory damage awards. Further, our previous research has shown that such awards are often decreased during posttrial activity (Peterson, Sarma, and Shanley, 1987).

Third, the less precise calculability of damages in personal injury and intentional tort cases also leads us to expect that awards in such cases will more frequently be reduced than those in business and contract actions. However, we are more tentative on this hypothesis because other factors could have equally strong effects on final outcomes in those cases. Contract and business cases tend more often to involve punitive damages and deep pocket defendants. We expect the
former characteristic will push the proportion paid down while the latter will have an uncertain (though perhaps strong) effect. A multivariate analysis would be required to examine outcomes for business and contract cases while holding other variables constant.

Fourth, we are uncertain about how findings should vary by state, but based on our partial analysis of the state laws, we see no reason outcomes should differ greatly by jurisdiction.

Fifth, our analysis of prior research suggests that payouts in high-stakes litigation may be greater. Broder (1986) found that the payout in products liability and medical malpractice cases was relatively high. Our analysis suggests that the risks and benefits of appeals may influence parties’ bargaining position in product liability cases so that defendants will pay a higher proportion of the jury award.

Finally, we have mixed expectations as to how posttrial processes might affect deep pocket defendants, as compared with individual defendants. On the one hand, because they have greater assets, deep pocket defendants can more often afford to use posttrial processes to reduce judgments or as a strategic device to force plaintiffs to accept relatively modest settlements. On the other hand, because of their greater assets and insurance coverage, deep pocket defendants will be far less likely to have insufficient assets to satisfy a judgment than individual defendants.
III. RESEARCH METHODOLOGY

The objective of our research was to determine the outcomes of civil jury trials after adjustments by the posttrial processes of the civil justice system. This section details the basic research design and the methods used in the analysis. It includes a description of the sample design, survey procedures and response rates, and analytic methods.

BASIC STUDY DESIGN

Scope of Study

Our objective was to represent the full range of cases decided by juries. The sample of 880 jury trials, therefore, covers all types of cases that juries decide in both state and federal jurisdictions. Cases resulting in defense verdicts were also included, since defendants who win at trial may eventually end up making payments if trial verdicts are set aside or reversed, or if the parties bargain.

Trials in the sample generally took place between 1982 and 1984.\(^1\) This choice of sample reflects a compromise between the objective of obtaining recent information and the objective of minimizing the number of sampled trials that had not reached a conclusion. A sample of recent trials makes the study more relevant to the current debate on tort reform. A sample with only a few open cases minimizes uncertain estimations of outcomes.

To select the sample, we drew on the existing ICJ database of jury verdicts. We selected trials in a large number of counties, which we have grouped into three categories, for the purposes of this report. To represent major metropolitan areas, we selected Cook County, Illinois (the core county of the Chicago metropolitan area), and the San Francisco metropolitan area, including San Francisco County and selected surrounding suburban counties (Alameda, Contra Costa, Marin, and San Mateo).\(^2\) In contrast to the two core metro areas, we have selected a variety of other California Counties, some containing medium or small metropolitan areas, and others comprising a large proportion of suburban or rural populations. With the exceptions of San Jose and

\(^1\)Section on sample design describes the use of a small number of cases prior to 1982.

\(^2\)The area comprises the San Francisco and Oakland PMSA's (Primary Metropolitan Statistical Areas) as defined by the census.
Santa Cruz, the counties include all those in California with populations greater than 150,000 in 1984 that are north of the Los Angeles metro area. That nearly contiguous area, outlined in Fig. 3.1, includes Sacramento and Fresno as its largest urban centers, and a group of smaller counties, some of which have a large proportion of rural population.

Data Sources

The sample of 880 trials in the study came from ICJ’s database of some 25,000 jury trials. This file has two jury verdict reporters as its sources: the Cook County Jury Verdict Reporter, and California’s Jury Verdicts Weekly. These are private weekly subscription newsletters for lawyers, insurance companies, and others interested in jury verdicts in their respective areas. The detailed descriptions of trials there formed the basis for selecting a sample for this study. In particular, the publications provided us with the names of the trial lawyers, details about the litigants, and comprehensive information about trial outcomes. Previous analysis by the Institute for Civil Justice has shown the reporters to be highly accurate and complete.

The information on posttrial outcomes came from a mail survey of plaintiff and defense lawyers conducted by the Institute for Civil Justice in the summer and fall of 1986. In all, we mailed over 2,000 lawyer surveys. Our strategy gave us two or more chances to obtain the final outcome of each trial, and, when both sides responded, an internal check on the validity of the reported results.

Sampling Plan

The sampling plan for the study used a stratified random design that recognizes the relative importance of certain types of trials. In particular, larger jury verdicts were oversampled relative to smaller ones. This strategy reflected the general belief that larger verdicts are more likely to be adjusted after trial than smaller ones, and was designed to guarantee the most information possible on the relatively

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3That is, north of the Los Angeles-Anaheim-Riverside CNSA (Consolidated Metropolitan Statistical Area) as defined by the census.
4Yolo County is also included, despite a population of less than 150,000, because it is part of the Sacramento metropolitan area.
5For further description of the jury verdict reporters, as well as reviews of their accuracy and completeness, see two previous Institute for Civil Justice publications: The Cook County Jury Verdict Reporter was described in Peterson and Priest (1982), and Jury Verdicts Weekly was described in Shanley and Peterson (1983).
Fig. 3.1—California counties in study area
few large verdicts that dominated total monies awarded. At the same time, we can accurately portray the experience of the sample universe in the analysis by weighting the sample cases in proportion to their actual size and frequency.

The basic sampling procedure called for dividing trial verdicts in the Institute for Civil Justice database into three award size categories and six sampling “jurisdictions,” making 18 categories in all. The sampling jurisdictions divide the sample into four locations and distinguish federal from state courts. Table 3.1 shows the total number of trials in each jurisdiction from 1982 to 1984.

Table 3.1

SAMPLE RATES OF 1982-1984 TRIALS BY SAMPLING JURISDICTION

<table>
<thead>
<tr>
<th>Sample Jurisdiction</th>
<th>Total</th>
<th>Sampled</th>
<th>Percentage Sampled</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cook County Superior</td>
<td>1564</td>
<td>328</td>
<td>21</td>
</tr>
<tr>
<td>Federal District Court</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Northern Dist. of IL</td>
<td>199</td>
<td>64</td>
<td>32</td>
</tr>
<tr>
<td>San Francisco Superior</td>
<td>349</td>
<td>148</td>
<td>42</td>
</tr>
<tr>
<td>Federal District Court</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Northern Dist. of CA</td>
<td>58</td>
<td>18</td>
<td>31</td>
</tr>
<tr>
<td>San Francisco “Ring”</td>
<td>428</td>
<td>141</td>
<td>33</td>
</tr>
<tr>
<td>Other California</td>
<td>616</td>
<td>182</td>
<td>30</td>
</tr>
<tr>
<td>Total</td>
<td>3214</td>
<td>880</td>
<td>27</td>
</tr>
</tbody>
</table>

SOURCE: ICJ Jury Verdict Database.
NOTE: Sample represents, for every jurisdiction, 100 percent of the trials in the highest quarter of awards in the database, a random 33 percent of the remaining plaintiff verdicts, and a random 10 percent of the defense verdicts.

aLocation and court of trial. The jurisdiction “San Francisco ‘Ring’” includes Superior Courts in Alameda, Contra Costa, Marin, and San Mateo counties.

bNumber of trials in each jurisdiction in 1982-1984. The Cook County numbers are weighted to reflect the fact that the database contains only 1 in 4 trials concerned with auto accidents and common carriers’ trials.

Awards are separated into defense verdicts, smaller plaintiff verdicts (the bottom three-quarters of the distribution of verdicts), and large verdicts (the upper quartile of the plaintiff verdicts). From each of the award and size categories, the following proportion of cases were selected:
• 100 percent of trials in the upper quartile of jury awards
• 33 percent of the remaining plaintiff verdicts
• 10 percent of the defense verdicts

The definition of the upper 25 percent of awards was specific to each of six sampling jurisdictions. The “upper quartile” boundary ranged from $87,000 in Cook County Superior Court to over half a million in the Federal District Court for the Northern County District of California. This strategy of selecting individual cutoff points for different sample groups, rather than choosing a set dollar cutoff overall, increases the explanatory power of the sample.

Table 3.1 shows the resulting sample size and sampling rate for each of the sample jurisdictions. The 880 trials selected constitute 27 percent of the approximately 3,200 trials that took place. However, the rate varies by jurisdiction, for two reasons. First, though we have selected half of all plaintiff verdicts (all of the upper quarter plus one-third of the remaining three-quarters) and 10 percent of the defense verdicts, the relative proportion of plaintiff wins varies by jurisdiction; thus so does the resulting sampling rate. Second, the sampling rate in Cook County courts is smaller than in other areas, because the ICJ database (from which the sample was chosen) was itself a sample of trials.

Table 3.2 shows the distribution of the trials sampled by the size of award and the corresponding percentage of all trials in each category the sample represents. While 27 percent of all trials were chosen, the sample contained 35 percent of the plaintiff verdicts under $1 million and all million dollar verdicts. The third column in the table shows the percentages of total monies in each of the categories captured by the sampling plan. Because we oversampled the largest cases, we captured a larger percentage of total awards than of total trials. Overall, the sample accounts for over 90 percent of all the monies awarded by juries in the sample jurisdictions.

In addition to the sample described above, we sought information about a small number of other trials to help answer two specific questions. First, we surveyed 13 more trials with verdicts exceeding $10 million to learn more about posttrial outcomes in extremely large

---

6The upper quartile of the award distribution is that award for which one quarter of the trial awards are greater, and three-quarters less (not including defense verdicts or zero awards).
7One in four auto accident and common carrier cases were randomly chosen in Cook County. One hundred percent of all other case types were included.
8In the original database, there were only five such trials, too small a group for separate discussion. However, because those five trials (ranging from $12 million to $50 million verdicts) represented 25 percent of monies awarded by juries in our sample areas between 1982 and 1984, we decided to expand the sample. The 13 additional cases represent all remaining $10 million trials in the ICJ database. They occurred either
Table 3.2
DISTRIBUTION OF TRIAL SAMPLE BY AWARD SIZE

<table>
<thead>
<tr>
<th>Size of Awards ($)</th>
<th>Sample Size</th>
<th>All Trials</th>
<th>Total Dollars Awarded</th>
</tr>
</thead>
<tbody>
<tr>
<td>Zero—defense verdict</td>
<td>133</td>
<td>10</td>
<td>0</td>
</tr>
<tr>
<td>1-999 thousand</td>
<td>661</td>
<td>35</td>
<td>70</td>
</tr>
<tr>
<td>1 Million–10 million</td>
<td>81</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>Over 10 million</td>
<td>5</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>Entire Sample</td>
<td>880</td>
<td>27</td>
<td>91</td>
</tr>
</tbody>
</table>

NOTE: Table compares the 880 trials in the sample with the 3,214 total that took place in the sample areas between 1982 and 1984.

cases. Second, we surveyed 33 older $1-10 million dollar cases in our sample area; in this case, the objective was to determine whether cases that remain open a long time after trial have different outcomes than those that close quickly after trial. The use of these supplemental data in the analysis is fully described in App. C.

SURVEY PROCEDURES AND RESULTS

Questionnaire and Data Collection Procedures

The survey began by obtaining attorneys’ mailing addresses from available legal and telephone directories. Surveys were mailed in early July, 1986. The mail package included the survey questionnaire, a photocopy of the case description from the jury verdict reporter for lawyers’ reference, and a letter from a prominent local plaintiff or defendant attorney endorsing the objectives of the study.

The questionnaire was brief and easy to complete. It asked attorneys to verify trial outcomes published in the jury verdict reporters. If the case was closed, the survey then asked for the date of closing and, if the payment amount differed from the original verdict, how the amount was determined, e.g., adjusted by the trial court or appellate within the sample jurisdictions but before 1982 (in 1980 or 1981), or elsewhere in California, between 1980 and 1984.

\footnote{The added cases were tried between 1980 and 1981.}
courts, determined by new trial or posttrial negotiations. If the case was still open, the questionnaire asked its current status. Appendix A contains a copy of the questionnaire and a more detailed discussion of its contents.

To ensure a high response rate, we made repeated attempts to contact those who did not respond to the first mailing. After one week a reminder letter was sent to all attorneys, and after three weeks a complete, new package was mailed to those who had not responded. We then made calls to nonrespondents, seeking either a completed questionnaire by phone or an agreement to mail in the questionnaire.

Survey Completion Rates

The response rate to the survey was excellent. Over 60 percent of the lawyers returned the survey forms with usable responses.\textsuperscript{10} Table 3.3 shows the final responses (after mailing and telephone follow-up) from the 2,038 lawyers targeted for the study. Though defendant

<table>
<thead>
<tr>
<th>Survey Disposition</th>
<th>Plaintiff Lawyers</th>
<th>Defendant Lawyers</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete\textsuperscript{a}</td>
<td>64</td>
<td>61</td>
<td>62</td>
</tr>
<tr>
<td>Nonresponse\textsuperscript{b}</td>
<td>30</td>
<td>33</td>
<td>32</td>
</tr>
<tr>
<td>Refused\textsuperscript{c}</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>Ineligible\textsuperscript{d}</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Total</td>
<td>100</td>
<td>100</td>
<td>100</td>
</tr>
</tbody>
</table>

Sample Size 916 1122 2038

\textsuperscript{a}Defined as surveys with usable data on the award, case status (open or closed), and, if closed, on final payment.

\textsuperscript{b}Includes returned surveys with unusable responses.

\textsuperscript{c}Includes returned surveys with refusal to disclose final payment amount.

\textsuperscript{d}Court decided award or damages not an issue.

\textsuperscript{10}Some cases in the sample were included in previous ICJ surveys on punitive damages and joint and several liability that obtained similar information. For these cases, we used responses from those surveys.
lawyers outnumbered plaintiff lawyers (reflecting the fact that the sample included more defendants than plaintiffs per trial), both responded at about the same rate: completing the instrument over three-fifths of the time, refusing 5 percent of the time, and not responding about one-third of the time. For 1 percent of the surveys, the respondents verified that the case did not belong in our study, either because the court directed the award or because the jury was not asked to decide damages. These cases were deleted from all remaining analyses.

Lawyer responses to surveys were aggregated by case, the study’s unit of analysis. Case completion rates differ from lawyer completion rates for two reasons. On the one hand, case completion rates can be lower because the lawyers responding provided only partial information about a case. On the other hand, case completion rates can be higher because we had at least two chances to learn about each case—one from the plaintiff and one from the defendant side of the dispute. We decided to use lawyer responses from both sides of the dispute interchangeably only after an analysis of the 256 trials with complete information indicated a high comparability of plaintiff and defendant lawyer responses. App. B contains the details of that comparison.

Table 3.4 displays the final disposition of the sample at the case level. On the plaintiff side, the completion rate for cases is identical to

![Table 3.4](image)

<table>
<thead>
<tr>
<th>Survey Disposition</th>
<th>Plaintiff Lawyers</th>
<th>Defendant Lawyers</th>
<th>At Least One Side</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete</td>
<td>64</td>
<td>56</td>
<td>83</td>
</tr>
<tr>
<td>Nonresponse</td>
<td>30</td>
<td>37</td>
<td>11</td>
</tr>
<tr>
<td>Refused</td>
<td>5</td>
<td>6</td>
<td>5</td>
</tr>
<tr>
<td>Ineligible</td>
<td>1</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Total</td>
<td>100</td>
<td>100</td>
<td>100</td>
</tr>
</tbody>
</table>

Sample Size 880 880 880

NOTE: See Table 3.3 for further explanation of dispositions.

1) For a few of the missing cases, contacts were never attempted because the lawyers could not be located from available sources.
that for lawyers, reflecting the fact that only a handful of trials involved more than one plaintiff lawyer. On the defendant side, the case completion rate is somewhat lower, 56 percent, than was the lawyer completion rate. The decrease reflects the fact that in cases with multiple defendant lawyers, we could not use individual lawyer responses unless all lawyers in a case responded.

Combining information from the plaintiff and defendant sides of disputes leads to a case completion rate of over 80 percent (Table 3.4). However, for analysis purposes, we could not use all completed cases because in some instances they had not yet reached a final outcome. We determined final payments in 621 cases, representing 71 percent of the sample. The remaining 29 percent of the cases were of two types. In 16 percent we obtained no response or a refusal, and in 13 percent the response indicated that final payments were not yet determined because the cases were still open (see Fig. 3.2).

Cases with information on the final payment were of three types: those in which only the plaintiff lawyers responded, those in which only the defendant lawyers responded, and those in which both responded. Each of these categories is indicated by a different shading in Fig. 3.2. Note that the response rate on closed cases from plaintiff lawyers (54 percent) was about the same as from defendant lawyers (46

![Pie chart showing survey response rate](image-url)

**Fig. 3.2—Survey response rate**
percent). Also note the large number of cases where we obtained information from both sides of the dispute. A comparison of those responses showed only random, statistically insignificant differences between plaintiff and defendant lawyer responses. (See App. B for the details.) Consequently, we were able to pool all the data for analysis.

ANALYSIS METHODS

This study provides a descriptive analysis of posttrial outcomes based on 621 of the original sample of 880 trials. In presenting the results, the report uses straightforward methodological techniques. Basic summary measures are used to describe posttrial outcomes: the counts of the number of trial awards that decreased, stayed the same, and increased in the posttrial interval; the average dollar amounts of awards and payments, both in absolute terms and expressed as a ratio of total payments to total awards; simple crosstabs to answer the questions about how results vary by case characteristic.

In contrast, considerably more sophisticated statistical techniques are used to estimate missing payment amounts and to measure the effect of time to close on final payments. Though the high survey-response rate makes missing data a secondary issue, the use of multivariate modeling to derive appropriate adjustments ensures the information analyzed is as complete as possible. A detailed description of the methodology appears in App. C.

In this section, we briefly describe the methods for dealing with cases where the amount of the final payment is unknown. First, we define "payment" and "award" and describe what difference those definitions make in the final results.

Calculating Award and Payment

This study defines an "award" as the jury verdict plus any additions of prejudgment interest, court costs, or attorney fees awarded at trial.\textsuperscript{12} The amounts used are those quoted at trial, without adjustment for any posttrial interest that might have been due when payment was made.\textsuperscript{13} In addition, the award includes reductions for comparative

\textsuperscript{12}The reporters indicated awards of prejudgment interest, attorney fees, or costs in 27 of the 621 closed cases in the analysis file.

\textsuperscript{13}Posttrial interest on the total judgment is the right of prevailing plaintiffs in both states, at the rate of 10 percent in California and 9 percent in Illinois. However, we cannot precisely calculate the amount of posttrial interest because we lack full information. First, for 15 percent of the closed cases, survey respondents did not indicate the date the case terminated, and, therefore, the amount of the interest is unclear. Second, while we
negligence, since the extent of reduction is determined by juries and is part of the verdict.

"Payment" in this report means all monies passed from the defendant to the plaintiff side of disputes,\(^{14}\) except those specifically designated as posttrial interest payments.\(^{15}\) Offsets to payments from liens or pretrial settlements are ignored, as they only determine who makes the final payments and not whether the plaintiff receives them. When survey respondents subtracted such amounts from the total payment, we have added them back into the total.

The "proportion paid," an important summary measure used in this report, is the ratio of payments to awards. In summarized outcomes of a group of cases, proportion paid always refers to the ratio of total payments and total awards for the group. It never indicates the average of individual ratios.

As discussed in this report, the proportion paid is higher than would be the case if adjustments for posttrial interest were a part of the calculations. When posttrial interest is due, specifically accounting for it would always increase awards, the denominator of the ratio. However, payments, the numerator in the ratio, would often remain unchanged because interest is assumed to be included. For example, a $100,000 award is worth about $110,000 a year after trial. If $90,000 is accepted as payment at that time, it is assumed to include payments for posttrial interest. Thus, the payment would represent the proportion of .90 (90/100) of the award, but a smaller share (.82 (90/110)) of the full plaintiff entitlement. Though collecting precise information about the amounts of posttrial interest due and paid was beyond the scope of the survey, we estimate the downward effect it would have on the summary measure, proportion paid, in App. D.

**Adjusting for Missing Cases**

To ensure that results fairly represent the entire population of trials in the study areas, our data on closed cases must be adjusted to account for missing cases. One part of this calculation, adjusting the sampled cases to depict all trials, is straightforward. Within stratum the sample was randomly drawn; and, therefore, simple statistical weighting of outcomes can effectively recover the original trial mix.

Know how long open cases have been pending, we do not know how long they will take to close; again, the amount of posttrial interest due is uncertain. When referring to the award including posttrial interest, we use the term "full plaintiff entitlement."

\(^{14}\)How much of the payment goes to compensate plaintiffs and how much goes to pay their litigation expenses is not an issue in this report.

\(^{15}\)When plaintiffs are paid in full, an amount of posttrial interest is sometimes listed separately. Those amounts are omitted when calculating "payments."
However, another part of the calculation, adjusting for sampled cases for which we do not know the final payment, requires more sophisticated methods. We elaborate on the procedure used below.

Cases from the sample with missing outcomes were of two types. First, some respondents, as we have discussed, were unwilling or simply failed to respond to the survey. Second, among those who did respond, some were involved in cases that had not yet closed. If these missing cases represent a random subset of the entire sample, then no adjustments would be necessary. However, our analysis suggests that missing cases are not random.

To consider one example, Table 3.5 shows that usable responses to the survey are not randomly distributed across award sizes; rather, the percentage of closed cases decreased with increasing award size.

We obtained data for more than three-quarters of the sample of defense and plaintiff verdicts for less than $100,000; but we obtained only two-thirds of verdicts for between $100,000 and a million dollars, and less than half of the million dollar verdicts. This difference had

### Table 3.5

<table>
<thead>
<tr>
<th>Disposition</th>
<th>1- 99K</th>
<th>99K-999K</th>
<th>1 Million or More</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Responded-closed</td>
<td>80</td>
<td>78</td>
<td>68</td>
<td>44</td>
</tr>
<tr>
<td>Responded-open</td>
<td>8</td>
<td>6</td>
<td>17</td>
<td>35</td>
</tr>
<tr>
<td>Nonresponse or refusal</td>
<td>12</td>
<td>16</td>
<td>15</td>
<td>21</td>
</tr>
<tr>
<td>Total</td>
<td>100</td>
<td>100</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>Sample Size</td>
<td>130</td>
<td>344</td>
<td>312</td>
<td>86</td>
</tr>
</tbody>
</table>

NOTE: Excludes 8 sample cases determined ineligible for study.

---

Further evidence of the nonrandomness of missing cases is presented in App. C.
little to do with respondents' willingness to participate, as refusals and other nonresponses occur at about the same rate in each award category (Table 3.5). Rather, the table suggests that larger cases take longer to conclude, as the percentage of open cases increases sharply in the larger award categories.

Simple weighting of the data could account for the unequal response rate in award categories; the larger cases would receive greater weight to balance the effect of the lower response. However, to be complete, the weighting would also have to account for nonresponse by jurisdiction, defendant type, subject matter of case, type of damages, and length of posttrial interval.

Simultaneously accounting for a large number of variables is ideally suited to a statistical technique called "multiple regression." Appendix C uses this technique to estimate the final payments in cases where those outcomes are missing. The calculations assume that defendants in missing cases pay the same amounts as those in closed cases with similar characteristics. For example, the analysis found that final payments were relatively lower when a case stayed open longer than a year. Thus, we estimated that open cases in the sample, all of which had already taken longer than a year to conclude, would eventually end with relatively lower payments to plaintiffs.

Adjusting for missing cases did not affect the report's conclusions. Appendix C shows that an analysis based only on completed cases from the survey leads to the same qualitative results as an analysis based on the full data set, including estimates for missing cases. This consistency is largely due to the high response rate we obtained from our survey.
IV. ANALYSIS RESULTS

This section describes the effects of posttrial processes on jury awards. We first present data on the frequency and typical size of posttrial adjustments to jury awards and then discuss how the results vary for different types of cases. We find that posttrial actions result in significant overall reductions in the amount of money awarded at trial, but that those reductions are highly concentrated in cases with particular characteristics. In general, results support hypotheses developed from examining the economic incentives and legal environment of posttrial bargaining (see Sec. II).

FREQUENCY AND SIZE OF POSTTRIAL CHANGES TO JURY AWARDS

Posttrial processes changed only a small percentage of awards. Figure 4.1 divides all cases into plaintiff and defense verdicts and further distinguishes how final payments differed from the amount awarded at

![Pie chart showing distribution of posttrial changes to jury awards](image)

Fig. 4.1—How posttrial actions changed jury awards
trial. The chart shows that, including both plaintiff and defendant verdicts, 80 percent of jury verdicts remained unchanged after trial. A few cases of verdicts for both the defense and the plaintiff paid more than that awarded at trial, representing 2 and 3 percent of all cases, respectively. However, most of the changes were reductions. Posttrial processes resulted in lower payments to plaintiffs in 15 percent of all cases, or in about 25 percent of the plaintiff verdicts.

Posttrial processes made significant reductions to total jury awards (Table 4.1). Combining cases that changed with those that did not, the average payout for all cases was .71 of what was awarded at trial. Thus, our first major finding is that the net effect of posttrial actions was to reduce what defendants paid by a proportion of nearly .30. Though specific to the Illinois and California jurisdictions, this estimate is the first produced that applies to the entire range of cases that go to trial.

The average proportion paid is somewhat smaller than .71 if the definition of the jury award includes posttrial interest, a plaintiff entitlement in each of the study jurisdictions. The ratio is reduced because awards, the denominator in the calculation, must be increased to take into account the statutorily determined time-value of money. For example, in California, a $100,000 award is worth $110,000 a year after trial. If $90,000 is paid at that time, the amount represents a

<table>
<thead>
<tr>
<th>Outcome and Effect on Award</th>
<th>Percentage of Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Awarda</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plaintiff verdicts</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reduced</td>
<td>15</td>
<td>635</td>
<td>335</td>
<td>.53</td>
</tr>
<tr>
<td>Unchanged</td>
<td>43</td>
<td>135</td>
<td>135</td>
<td>1.00</td>
</tr>
<tr>
<td>Increased</td>
<td>3</td>
<td>62</td>
<td>78</td>
<td>1.26</td>
</tr>
<tr>
<td>Defense verdicts</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Unchanged</td>
<td>37</td>
<td>0</td>
<td>0</td>
<td>—</td>
</tr>
<tr>
<td>Increased</td>
<td>2</td>
<td>0</td>
<td>85</td>
<td>—</td>
</tr>
<tr>
<td>All cases</td>
<td>100</td>
<td>161</td>
<td>114</td>
<td>.71</td>
</tr>
</tbody>
</table>

NOTE: Based on 621 closed cases. How results were adjusted to represent all trials in the study jurisdictions is described in App. C.

aBecause the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.

bA case is counted as "unchanged" when the full award as specified at trial was paid. These cases do not consider whether posttrial interest was paid.
proportion of .90 of the jury award, but only .82 of the full plaintiff entitlement. Though collecting precise information about the amounts of posttrial interest due and paid was beyond the scope of this report, in App. D we estimate that plaintiffs collected from between .64 and .67 of their full entitlement, .04 to .07 less than if posttrial interest is ignored.

Although relatively few verdicts were reduced, those reductions disproportionately affected cases with large average awards (Table 4.1). The average verdict in cases where the defendants paid the full jury award was $135,000. In contrast, when the payout was less than the verdict, the mean jury award was $635,000, an amount almost five times greater.

When they occurred, reductions tended to be significant, averaging $300,000. The resulting average payment in reduced cases was $335,000, .53 of the average verdicts. Moreover, complete reversals were relatively rare. Winning plaintiffs ended up receiving nothing in less than 5 percent of all cases in which awards were reduced.

Plaintiff awards that were increased after a trial were modest to begin with (an average verdict of $62,000) and were increased modestly (an average increase of $16,000). (See Table 4.1.) In a small number of cases where defendants won at trial (2 percent of all cases), posttrial adjustments were greater (averaging $85,000). Though the increases were not insignificant for the particular cases affected, the total dollars involved were small in relation to the total award volume. If all cases with increases had instead ended with the jury decision, the overall proportion paid would have been lower by only .02.

**POSTTRIAL OUTCOMES BY SIZE OF JURY AWARD**

We expected and found that posttrial reductions were most likely and greatest in cases that had large trial verdicts. We hypothesized this result for two reasons. First, large jury awards are vulnerable to challenges for being excessive. Second, as the stakes increase, so does the incentive to challenge the trial verdict.

Table 4.2 shows how the average proportion paid decreases with award size. For the smallest cases in the study—those with less than a $100,000 award—the average proportion paid was .93, representing a reduction of only .07. For larger cases, those from $100,000 to $1 million, the payout was .82. For million dollar awards, payments were even less. If the award was over $1 million but less than $10 million,

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1See Sec. II for a discussion of the economic incentives and legal environment in posttrial processes.
Table 4.2
EFFECTS OF POSTTRIAL ACTIONS BY SIZE OF JURY AWARD

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Number of Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Awarda</th>
</tr>
</thead>
<tbody>
<tr>
<td>Zero-defense verdict</td>
<td>1240</td>
<td>0</td>
<td>3</td>
<td>—</td>
</tr>
<tr>
<td>1-99,000</td>
<td>1466</td>
<td>23</td>
<td>21</td>
<td>.93</td>
</tr>
<tr>
<td>100,000-999,000</td>
<td>422</td>
<td>314</td>
<td>256</td>
<td>.82</td>
</tr>
<tr>
<td>1-10 Million</td>
<td>81</td>
<td>2873</td>
<td>1826</td>
<td>.68</td>
</tr>
<tr>
<td>Over 10 Millionb</td>
<td>5</td>
<td>27220</td>
<td>15460</td>
<td>.57</td>
</tr>
<tr>
<td>All cases</td>
<td>3214</td>
<td>161</td>
<td>114</td>
<td>.71</td>
</tr>
</tbody>
</table>

NOTE: Based on 621 closed cases. How results were adjusted to represent all trials in the study jurisdictions is described in App. C.

aBecause the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.

bEstimated from six cases with verdicts exceeding $10 million. See text and Appendix C for full explanation.

an average of .68 was paid; and if the award was over $10 million, the estimated proportion paid was an estimated .57.

The statistical precision of those estimates also decreases with award size. For the smallest award category, we estimate with 95 percent certainty that the true ratio varies by less than .02 from the .93 estimate shown in Table 4.2. However, because of the smaller sample sizes and the larger variance in outcomes, the bounds for 95 percent certainty were wider for the larger award categories. In the case of the $1-10 million dollar verdicts (based on 36 closed cases), we estimate that the true ratio could vary by as much as .10 to .15 from the .68 that appears in Table 4.2.

To increase our confidence in the results for the largest cases, we undertook additional analyses. First, we sought more information about $10 million cases. Although there were only five such cases in the original database, they represented a substantial proportion, 25 percent, of all monies awarded in the study areas. Further, of the five we learned the final payment in only two. Thus, to supplement this sparse information, we sought final outcomes for the 13 additional cases in the ICJ database with awards over $10 million, verdicts that occurred either within the sample area before 1982, or elsewhere in California (usually Los Angeles) between 1980 and 1984. Of the 18 total cases in the expanded $10-million-plus category (five from the original sample and 13 added on), we obtained information on payment in six closed cases, showing an average payout of .54 of the original
awards. The procedure used to estimate the outcomes for the missing three in the sample (to arrive at the .57 proportion in Table 4.2) is described in App. C.

Second, we sought more information about cases with verdicts between $1 million and $10 million. Survey packages were sent to lawyers in the 33 $1–$10 million dollar cases that occurred in the study areas in 1980 and 1981, the two years prior to the main study period. Data on 19 closed cases resulted from that effort. Among those cases, .59 of the original verdict was paid by defendants. That proportion is smaller than the .68 that appears in Table 4.2 but within the estimated confidence limits.

In addition to our own analyses, we compared our findings with an independent study of posttrial outcomes that focused only on posttrial outcomes for verdicts exceeding a million dollars (Broder, 1986). We found those results highly consistent with ours. Broder’s study was based on a nationwide sample of nearly 200 personal injury cases tried in 1984 and 1985, all of which had verdicts of a million dollars or more. She estimated that a verdict of $1 million would, on average, reduce to .79 of the original verdict. Further, each increase of $1 million dollars in the award would result in an additional reduction of .04 in the ratio of payment to award. For example, a two million dollar verdict would pay .75 (.79 – .04) of the original verdict. Applying the Broder finding to the 81 cases in this sample, with awards between $1 million and $10 million, yields an estimated payout rate of .68, exactly what was calculated in Table 4.2.  

Given the increase in reductions by award size, how is the distribution of total dollars affected? Despite the bigger reductions for the larger awards, we found that payments, like awards, were still concentrated in the largest cases. Figure 4.2 divides total dollars awarded by the dollar size categories of the award. The pie chart on top represents the award distribution, and the chart on the bottom represents the payment distribution. Among awards, million dollar cases represent 68 percent of the total dollar volume, an amount consistent with other

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2 These cases were also used to obtain more information on million dollar cases open for long periods. See App. C.

3 Findings in the two studies are not completely comparable, however. For example, the Broder report included reductions due to comparative negligence as part of the post-trial process, whereas this report did not include those reductions. Further, this report adjusts results for open cases, while the other report does not. Finally, the Broder study included only personal injury cases, while Table 4.2 combines that type of case with business and contract actions. Later in this section, we show how our results differ for personal injury and business/contract cases.
Fig. 4.2—Distribution of total payments and awards by award size
estimates of the importance of million dollar verdicts. Posttrial actions reduce many of the million dollar verdicts. However, about one-third are paid in full, and many of the others do not reduce the payment to less than one million. Thus, among payments, we found that 58 percent of the dollars were still distributed in cases that exceeded one million dollars. While the change represents a statistically significant decrease in the concentration of monies, it still means that over half of the money is distributed in less than 5 percent of the cases.

VARIATION IN RESULTS BY TYPE OF CASE

This section examines that variation in posttrial activity by trial location, the subject matter of the litigation, type of damages, type of defendant, and by how the case was resolved. For this analysis, we excluded defense verdicts because payments are rare in such cases. In addition, we excluded the five cases in the sample with verdicts exceeding $10 million, because they can mask underlying patterns in the rest of the data.

Outcomes by Location of Case

Given the similarities in the laws relating to posttrial bargaining in California and Illinois, we expected little variation in results across states. In fact, we found the outcomes varied little across the three areas designated for the study (Fig. 4.3). These areas include Cook County, the San Francisco Metropolitan area, and the group of smaller California jurisdictions described earlier. Cook County had a proportion paid of .75 of the award, an amount not greatly different from the .81 proportion in the San Francisco area, though the difference is consistent in each award category (Table 4.3). The smaller California jurisdictions had the smallest proportion paid, .66 of the award. However, that difference disappears when cases with awards above a million dollars are excluded (Table 4.3). For cases smaller than a million dollars, the proportion paid in nonmetropolitan California and in the San Francisco area was nearly identical.

Note: Peterson (1987) found that million dollar awards accounted for the bulk of the money awarded by juries in the 1980s. More than half of the money awarded by San Francisco jurors in the 1980s resulted from the 5.6 percent of trials that yielded awards over $1 million. In Cook County, 85 percent of all money was awarded in the 3.5 percent of trials that produced $1-million-plus verdicts.
Fig. 4.3—Proportion of trial awards paid by jurisdiction
Table 4.3
POSTTRIAL OUTCOMES BY AWARD SIZE AND JURISDICTION
(Cases with verdicts up to $10 million)

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Number of Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award¹</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Cook County</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>972</td>
<td>18</td>
<td>16</td>
<td>.88</td>
</tr>
<tr>
<td>100–999 thousand</td>
<td>165</td>
<td>306</td>
<td>240</td>
<td>.78</td>
</tr>
<tr>
<td>1–10 Million</td>
<td>38</td>
<td>2855</td>
<td>2004</td>
<td>.70</td>
</tr>
<tr>
<td>All cases</td>
<td>1175</td>
<td>150</td>
<td>112</td>
<td>.75</td>
</tr>
<tr>
<td></td>
<td>San Francisco Area</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>304</td>
<td>32</td>
<td>31</td>
<td>.97</td>
</tr>
<tr>
<td>100–999 thousand</td>
<td>150</td>
<td>327</td>
<td>289</td>
<td>.82</td>
</tr>
<tr>
<td>1–10 Million</td>
<td>29</td>
<td>2311</td>
<td>1796</td>
<td>.78</td>
</tr>
<tr>
<td>All cases</td>
<td>492</td>
<td>262</td>
<td>213</td>
<td>.81</td>
</tr>
<tr>
<td></td>
<td>Smaller California Jurisdictions⁰</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>190</td>
<td>33</td>
<td>32</td>
<td>.97</td>
</tr>
<tr>
<td>100–999 thousand</td>
<td>98</td>
<td>305</td>
<td>280</td>
<td>.85</td>
</tr>
<tr>
<td>1–10 Million⁰</td>
<td>14</td>
<td>2931</td>
<td>1497</td>
<td>.48</td>
</tr>
<tr>
<td>All cases</td>
<td>302</td>
<td>256</td>
<td>169</td>
<td>.66</td>
</tr>
</tbody>
</table>

NOTE: Table based on sample of 516 closed cases with plaintiff verdict under $10 million.
¹Because the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.
⁰See Fig. 3.1 for map of included jurisdictions.
⁰Based on six completed cases.

Outcomes for Personal Injury, Contract/Business, and Intentional Tort Cases

When compared with personal injury cases, we expected that payments on business and contract cases would be a higher proportion of verdicts. Business and contract cases tend to involve issues for which calculating monetary compensation is clearer. Damages in personal injury cases consist mostly of general damages, involving the value of “pain and suffering” and other difficult-to-quantify factors. With damages more easily defined and calculated in business and contract cases, we expected fewer challenges and changes upon review.
However, findings were not consistent with the working hypothesis. Contrary to expectations, we found that personal injury cases had an overall payout rate (.79) that was nearly identical to that for business/contract cases, where the overall proportion was .77 (Fig. 4.4). Further, results by award size are not easily explained (Table 4.4). For awards above $100,000 but less than a million, business/contract cases paid out at an average proportion of .73, considerably smaller than the .87 paid in personal injury cases. In contrast, for both the largest and smallest cases, defendants in business and contract cases paid relatively more. Although personal injury cases under $100,000 had a high payout (92 percent), business and contract awards under $100,000 were almost never reduced (97 percent payout). For awards above $1 million, business and contract cases paid .77 as compared to .71 for personal injury cases.

As expected, intentional tort cases had a smaller payout than either personal injury or business/contract cases; in fact, on average less than half (.48) of those awards were ever paid by defendants (Fig. 4.4). However, the explanation for the result may differ from the one we proposed in Sec. II. Our hypothesis centered on the calculability of damages; that is because intentional torts often involve losses that are especially difficult to quantify, (e.g., emotional distress, damaged reputation, discrimination) awards in such cases would be more open to challenge and reduction. However, findings show that unless the verdict was exceptionally large, over $1 million, payouts in intentional tort cases were no smaller than other types of cases (Table 4.4). Further, though payments were extremely small in multimillion dollar award cases, there were only two in our analysis file. Moreover, both of the large cases involved punitive damages; and, as we show below, cases with punitive damages pay out at a smaller rate than cases with only compensatory damages.

Findings suggest that multiple and varied factors determine payouts in different types of cases. A complete analysis of the differences in posttrial outcomes by case type requires a more sophisticated methodology than that presented here. Though beyond the scope of this report, such an analysis is suggested for future research (see Conclusions). For this report, we look at the effects of one factor at a time for small, large, and very large awards. Below we examine how results vary by type of damages, type of defendant, and other case characteristics.

5Under intentional torts, we include assault, discrimination, and defamation (libel or slander) cases.
Fig. 4.4—Proportion of trial awards paid by case type

Outcomes by Presence of Punitive Damages

Punitive damage awards do not occur frequently, but when they do they are likely to be greatly reduced by posttrial actions. First, there is often sharp disagreement about whether or not punitive damages were appropriately awarded. Second, courts are more likely to scrutinize punitive damage awards because they reflect jurors’ outrage and, almost by definition, can be claimed to be a product of jury passions. Third, the basis for determining the amount of a punitive damage


Table 4.4
POSTTRIAL OUTCOMES BY AWARD SIZE AND CASE TYPE
(Cases with verdicts up to $10 million)

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Number of Cases&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award&lt;sup&gt;b&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 100 thousand</td>
<td>1194</td>
<td>21</td>
<td>19</td>
<td>.92</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>287</td>
<td>320</td>
<td>277</td>
<td>.87</td>
</tr>
<tr>
<td>1-10 Million</td>
<td>52</td>
<td>2360</td>
<td>1681</td>
<td>.71</td>
</tr>
<tr>
<td>All cases</td>
<td>1533</td>
<td>156</td>
<td>124</td>
<td>.79</td>
</tr>
</tbody>
</table>

**Personal Injury**

| Less than 100 thousand | 204 | 33 | 32 | .97 |
| 100-999 thousand | 111 | 315 | 230 | .73 |
| 1-10 Million | 33 | 3067 | 2347 | .77 |
| All cases | 348 | 410 | 315 | .77 |

**Business or Contract**

| Less than 100 thousand | 110 | 29 | 28 | .96 |
| 100-999 thousand | 51 | 270 | 187 | .69 |
| 1-10 Million<sup>c</sup> | 5 | 3071 | 611 | .20 |
| All cases | 166 | 195 | 94 | .48 |

**Intentional Tort<sup>d</sup>**

NOTE: Table is based on sample of 516 closed cases with plaintiff verdicts under $10 million; 319 were personal injury actions, 112 were contract or business cases, and 47 were intentional tort cases.

<sup>a</sup>Total cases for all three case types exceeds the total population because categories are not mutually exclusive.

<sup>b</sup>Because the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.

<sup>c</sup>Includes defamation, assault, and discrimination cases.

<sup>d</sup>Based on two completed cases.

Award is much less precise than for a compensatory award, which usually involves some measure of economic loss. Punitive damages have no such benchmark. Finally, defendants will often be insistent on appealing punitive damage awards to help eliminate the stigma that goes with paying such awards. In summary, defendants should be especially likely to appeal punitive damage awards, as both the basis and appropriate amount are likely to be disputed; and plaintiffs may be more willing to discount such awards to avoid the uncertainty of judicial resolutions.
Data from this report confirmed our expectations. In the 165 cases where punitive damages constituted a part of the total award, final payments were only .57 of the total. In contrast, when only compensatory damages were involved, final payments were .82 of the total (Fig. 4.5). This result is not just a function of the larger award size of punitive damage cases, but holds for all cases with verdicts greater than $100,000. Table 4.5 shows that for cases with verdicts between $100,000 and $999,000, those with punitive damages paid an average proportion of .61, while those without such damages paid an average proportion of .86. For cases exceeding $1 million, the difference is about the same. With punitive damages the payout rate was .55, while without punitive damages the payout was .76.

The findings here agree with an earlier ICJ study of posttrial processes in punitive damage cases (Peterson, Sarma, and Shanley, 1987). That study involved 68 trials with punitive damages that took place in Cook and San Francisco counties between 1979 and 1983. The report concluded that .50 of awards in punitive damage cases are finally paid—a proportion quite close to the result (.57) in the present study. Those two figures would be even closer if awards exceeding $10 million were included in Table 4.5. Further, the earlier study, like this one, showed larger reductions for larger award sizes in cases with punitive damages. Reductions in that sample were small (.10) where the total award was less than $50,000, but increased to more than .50 when the original award exceeded $500,000.

**Outcomes by Type of Defendant**

We might expect that posttrial adjustments differ among types of defendants. Previous Institute for Civil Justice research (Chin and Peterson, 1985) found that deep pocket defendants (i.e., businesses, government agencies, hospitals, and doctors) were assessed larger jury verdicts than individuals sued by plaintiffs with similar injuries. If deep pocket defendants are subject to excessive awards, posttrial processes might lessen the differences, producing greater reductions in awards against deep pocket defendants. Alternatively, posttrial reductions might be less when defendants are deep pockets, because such defendants have greater assets and insurance.

We found, in fact, that cases with deep pocket defendants paid a much larger proportion of the original verdict than did cases with only individual defendants (Fig. 4.6). When deep pockets were held responsible, the average proportion paid was .77, whereas when only individuals paid, the proportion was .58. Those results occurred despite the fact that cases with deep pockets had awards six times the size of those
Fig. 4.5—Proportion of trial awards paid by presence of punitive damage awards
Table 4.5

POSTTRIAL OUTCOMES BY AWARD SIZE AND TYPE OF DAMAGES
(Cases with verdicts up to $10 million)

| Size of Award ($) | Number of Cases | Average Jury Award ($1000) | Average Amount Paid ($1000) | Ratio Paid/Award*
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Cases with Compensatory Damages Only</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>1399</td>
<td>22</td>
<td>21</td>
<td>.93</td>
</tr>
<tr>
<td>100–999 thousand</td>
<td>352</td>
<td>312</td>
<td>267</td>
<td>.86</td>
</tr>
<tr>
<td>1–10 Million</td>
<td>53</td>
<td>2564</td>
<td>1948</td>
<td>.76</td>
</tr>
<tr>
<td>All cases</td>
<td>1807</td>
<td>153</td>
<td>125</td>
<td>.82</td>
</tr>
<tr>
<td>Cases with Punitive and Compensatory Damages</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>67</td>
<td>57</td>
<td>35</td>
<td>.93</td>
</tr>
<tr>
<td>100–999 thousand</td>
<td>70</td>
<td>320</td>
<td>196</td>
<td>.61</td>
</tr>
<tr>
<td>1–10 Million</td>
<td>28</td>
<td>2881</td>
<td>1585</td>
<td>.55</td>
</tr>
<tr>
<td>All cases</td>
<td>165</td>
<td>640</td>
<td>368</td>
<td>.57</td>
</tr>
</tbody>
</table>

NOTE: Table is based on sample of 516 closed cases with plaintiff verdicts under $10 million. Of the total, 44 had punitive damage awards.

*aBecause the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.

in cases with only individuals. Under most circumstances, we would expect that larger awards would pay out at a smaller, rather than a larger, rate (see Table 4.2).

Table 4.6 shows the overall finding holds for cases with verdicts exceeding $100,000. For cases with verdicts less than $100,000, the payout rate was identical (.93) for individuals and deep pockets. However, for larger verdicts, those between $100,000 and $999,000, the average posttrial reduction was .23 larger when deep pockets were involved; the payout was .85 versus .62 for cases with only individual defendants. Cases involving million-dollar-plus verdicts rarely involve individual defendants as the only paying defendants. However, in the few cases where it did occur, defendants paid less than .15 of the verdict. It is interesting to note that for the two such completed cases in our sample, deep pockets were originally involved in the cases, but were ruled not liable at trial.

This pattern suggests that plaintiffs had greater difficulty in collecting from individual defendants because of their limited assets and insurance. We take a closer look at the issue of collection problems later in this section.
Fig. 4.6—Proportion of trial awards paid by type of defendant
Table 4.6

POSTTRIAL OUTCOMES BY AWARD SIZE AND TYPE OF DEFENDANT
(Cases with verdicts up to $10 million)

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Number of Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award(^a)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Cases with Individual Defendants Only</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>748</td>
<td>15</td>
<td>14</td>
<td>.93</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>80</td>
<td>270</td>
<td>167</td>
<td>.62</td>
</tr>
<tr>
<td>1-10 Million(^b)</td>
<td>6</td>
<td>1851</td>
<td>228</td>
<td>.12</td>
</tr>
<tr>
<td>All cases</td>
<td>834</td>
<td>53</td>
<td>31</td>
<td>.58</td>
</tr>
<tr>
<td><strong>Cases with Business, Government, Hospital, or Doctor Defendants</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>718</td>
<td>31</td>
<td>28</td>
<td>.93</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>342</td>
<td>324</td>
<td>276</td>
<td>.85</td>
</tr>
<tr>
<td>1-10 Million(^b)</td>
<td>75</td>
<td>2739</td>
<td>1954</td>
<td>.71</td>
</tr>
<tr>
<td>All cases</td>
<td>1135</td>
<td>298</td>
<td>230</td>
<td>.77</td>
</tr>
</tbody>
</table>

NOTE: Table is based on sample of 516 closed cases with plaintiff verdicts under $10 million. In 131 of those cases, only defendants who were individuals were found guilty.

\(^a\)Because the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.

\(^b\)Based on two completed cases.

Outcomes for Product Liability and Medical Malpractice Cases

Posttrial outcomes in high-stakes personal injury litigation differed from those in more routine personal injury cases (Fig. 4.7). As we predicted from our discussion in Sec. II, the payout in product liability cases was unusually high, .91 of the total. In other personal injury cases (except medical malpractice, which is discussed below), the corresponding proportion was .78. The difference in the proportions is especially large given that the average award in product liability cases ($539,000) is five times larger than in the other personal injury category ($104,000). Further, though the sample size was not large enough for statistically significant results in the largest cases (over $1 million—see Table 4.7), another study of posttrial outcomes suggests the finding holds for million dollar cases as well (Broder, 1986). Using a larger sample, Broder concluded that “product liability and medical malpractice cases have the smallest gap between verdict and settlement of all case types” (see p. 28 of that final report).
Additional research would be required to explain further the high payout for product liability cases. We offer two possible explanations here. As we discussed in Sec. II, defendants in product liability cases may face higher risks in appealing a case than defendants in other types of cases. Because the products in question are often mass-produced, a loss on appeal could set a precedent that affects future litigation. Defendants may judge that paying the award and avoiding the appeals process makes more economic sense. Also, because negligence is not typically an issue in product liability trials (given the doctrine of strict liability), there may be fewer grounds for an appeal, and thus fewer instances of compromise settlements.

In contrast to the results for product liability, medical malpractice cases appear to pay out at a lower rate than other personal injury cases. In cases of medical malpractice, a proportion of .67 was eventually paid to the plaintiff (Fig. 4.7). This is lower than for other personal injury, but, because of the high award size, it is consistent with the award size results discussed earlier. In addition, the finding for medical malpractice cases could be affected by the California law that places a cap of $250,000 on general damages in such cases.

Outcomes by Reason for Reduction

Defendants might pay less than the original jury award because of posttrial settlement between the parties, court action, or problems in collecting the judgment. A posttrial settlement for less than the award is an option especially attractive to plaintiffs who see a risk of a much smaller recovery in continuing litigation. Court action reducing the award may result from a posttrial motion to the trial court, appeals to higher courts, or a new trial granted by either court. Collection problems can result when liable defendants have insufficient insurance and assets to cover the award, declare bankruptcy, or are otherwise found unwilling or incapable of paying the judgment.

Table 4.8 shows the distribution of posttrial reductions by reason for reduction. Trial awards were most frequently reduced by settlement in lieu of further court action, but the proportion paid was higher (two-thirds) than if other matters had reduced the final payment. Cases in

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6 Doctrine states that sellers of defective and unreasonably dangerous products are liable for the harm caused regardless of their negligence.

7 Some of these cases may actually reflect limitations in insurance or other collection problems. The questionnaire did not ask directly about collection problems; rather findings were based on handwritten notes in an “other” category. (See Question 4 of the questionnaire in App. A.) Some respondents could have indicated a posttrial settlement rather than including a written response describing a collection problem.
Fig. 4.7—Proportion of trial awards paid in high-stakes case types
Table 4.7
POSTTRIAL OUTCOMES BY AWARD SIZE IN HIGH-STAKES CASE TYPES
(Cases with verdicts up to $10 million)

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Number of Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Product Liability</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>41</td>
<td>44</td>
<td>43</td>
<td>.98</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>55</td>
<td>352</td>
<td>315</td>
<td>.90</td>
</tr>
<tr>
<td>1-10 Millionb</td>
<td>14</td>
<td>2728</td>
<td>2457</td>
<td>.90</td>
</tr>
<tr>
<td>All cases</td>
<td>110</td>
<td>539</td>
<td>488</td>
<td>.91</td>
</tr>
<tr>
<td>Medical Malpractice</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>35</td>
<td>43</td>
<td>39</td>
<td>.98</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>29</td>
<td>348</td>
<td>280</td>
<td>.80</td>
</tr>
<tr>
<td>1-10 Millionc</td>
<td>12</td>
<td>2380</td>
<td>1444</td>
<td>.61</td>
</tr>
<tr>
<td>All cases</td>
<td>76</td>
<td>528</td>
<td>353</td>
<td>.67</td>
</tr>
<tr>
<td>Other Personal Injury</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 100 thousand</td>
<td>1118</td>
<td>19</td>
<td>17</td>
<td>.91</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>204</td>
<td>309</td>
<td>268</td>
<td>.87</td>
</tr>
<tr>
<td>1-10 Million</td>
<td>26</td>
<td>2153</td>
<td>1372</td>
<td>.54</td>
</tr>
<tr>
<td>All cases</td>
<td>1348</td>
<td>104</td>
<td>82</td>
<td>.78</td>
</tr>
</tbody>
</table>

NOTE: Table is based on sample of 391 closed personal injury cases with plaintiff verdicts under $10 million. Of the total, 45 were product liability cases and 37 were medical malpractice cases.

$Because the ratio is calculated from exact rather than rounded numbers, it may differ slightly from payments divided by awards as they appear in the table.

bBased on four completed cases.

cBased on six completed cases.

which plaintiffs have collection problems show the smallest proportion paid, less than a third, but they are also the least numerous and involve cases with the smallest average verdicts. The average trial award was less than $150,000 for cases with collection problems, as compared with $519,000 for all reduced cases.

Verdicts reduced by the courts involved the largest verdicts and quite substantial reductions in jury awards. The average verdict in such trials is nearly $780,000, but the average payment by defendants is less than half that amount. More of those cases resulted from motions to the trial court than from the appeals process.
<table>
<thead>
<tr>
<th>Reason for Reduction</th>
<th>Percentage of Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award</th>
</tr>
</thead>
<tbody>
<tr>
<td>Settlement(^a)</td>
<td>62</td>
<td>512</td>
<td>342</td>
<td>.67</td>
</tr>
<tr>
<td>Court action(^b)</td>
<td>23</td>
<td>779</td>
<td>355</td>
<td>.46</td>
</tr>
<tr>
<td>Collection problem(^c)</td>
<td>13</td>
<td>148</td>
<td>46</td>
<td>.31</td>
</tr>
<tr>
<td>Unknown</td>
<td>2</td>
<td>135</td>
<td>25</td>
<td>.19</td>
</tr>
<tr>
<td>Total</td>
<td>100</td>
<td>519</td>
<td>301</td>
<td>.58</td>
</tr>
</tbody>
</table>

**NOTE:** Based on sample of 156 plaintiff verdicts with payments less than awards.

\(^a\)Cases in which the parties settle for amounts not constrained by defendant’s ability to pay. However, some may involve collection problems. See text for explanation.

\(^b\)Includes cases with verdicts adjusted by trial or appellate courts or that resulted in a new trial.

\(^c\)Settlements constrained by defendant assets or insurance.
V. CONCLUSIONS

In the Illinois and California jurisdictions studied in this report, posttrial processes affected only a small number of cases; 80 percent of jury verdicts remained unchanged after trial. A few cases of verdicts for both the defense and the plaintiff ended with increased payments, representing 2 and 3 percent of all cases, respectively. However, most of the changes were reductions. Posttrial processes resulted in lower payments to plaintiffs in 15 percent of all cases, or in about 25 percent of the plaintiff verdicts.

Though small in number, the reduced cases involved much larger than average awards and significant reductions. When the defendant paid the full jury award, it averaged $135,000. In contrast, when the payout was less than the verdict, the mean jury award was $635,000, an amount almost five times greater. Posttrial processes reduced that average to $335,000, representing a payout rate of .53 for cases with reductions. Combining the cases with decreases with those that increased or stayed the same, the average payout for all cases in the study areas was .71 of the jury award.

The average proportion paid of .71 is somewhat smaller if the definition of the jury award includes posttrial interest, a plaintiff entitlement in each of the study jurisdictions. The ratio goes down because awards, the denominator in the calculation, increases to take into account the time-value of money. For example, a $100,000 award is worth $110,000 a year after trial. If $90,000 is paid at that time, the amount represents .90 of the award, but less, .82, of the full plaintiff entitlement. Though collecting precise information about the amounts of posttrial interest due and paid was beyond the scope of this report, we estimate that plaintiffs collected from between .64 and .67 of their full entitlement, .04 to .07 less than if posttrial interest is ignored.

The larger the jury award the smaller the proportion that defendants eventually paid. For the smaller cases in the study, those with less than a $100,000 award, the average proportion paid was .93, representing a reduction of only .07. However, for larger cases, those up to $1 million, the payout was .82. For million dollar awards, payments were even less. If the award was over $1 million but less than $10 million, an average of .68 was paid; and if the award was over $10 million, the estimated proportion paid was .57.

Even though the largest cases received the greatest reductions, total payments were still concentrated in the biggest cases. For both awards
and payments, million dollar cases accounted for the majority of total dollars. Among awards, million dollar cases represented 68 percent of the total volume; among payments, they represented 58 percent of the total volume.

The study did not find major differences in results among jurisdictions nor between personal injury and business/contract disputes. However, it did discover significant differences in posttrial outcomes based on other characteristics of tried disputes. When juries awarded punitive damages, defendants paid only .57 of the total award, a much smaller proportion than the .82 payout paid by defendants in other cases. Similarly, when defendants included only individuals, they paid only .58 of the award, whereas when the case included deep pocket defendants, the payout was .77. Further, plaintiffs in product liability cases were paid an exceptionally high proportion of the award, .91, compared to plaintiffs in other types of personal injury cases. Finally, most changes to the award were made through an agreement between the parties; but courts made decisions in bigger cases and made reductions that averaged more than .50 of the award.

Having examined the results of this study, what can be said about posttrial processes in the current tort liability system? Do they, in fact, work as presently conceived, or are substantial changes needed? The answer appears to depend partially on how one looks at it. Consider, for example, the overall size of the change to jury awards. One could focus on the .29 of the award not paid, a significant reduction from the amounts juries decided. Or, one could focus on the relatively large proportion, .71, that is paid. Whether the change is large or small is partially a question of whether you see the glass as about 30 percent empty or 70 percent full. To take another example, consider the type of cases reduced under current posttrial rules. One could focus on the finding that the current system subjects the largest awards to the greatest scrutiny and the largest reductions. Thus, it appears already to work in much the same way that the current proposals for legal change are intended to work. However, one could also note that not all large awards are reduced; in fact, to take product liability cases as an example, for some of the largest awards, the payout is also one of the highest.

While providing a basic description of posttrial outcomes, this report also gives rise to a series of unanswered questions, questions that suggest areas for future research. First, one would like to ask “Are the ‘right’ awards reduced?” Of course, considerable disagreement is likely to exist on which cases should or should not have been reduced, but analysis can contribute more to the debate than this initial effort. For example, one possible approach is to compare final payments with the
amount of the losses or extent of the injuries, an issue not addressed in
this report. Such an analysis could determine if the cases with large
awards—relative to the plaintiff’s actual loss—were those reduced, or
whether the changes were more random. More generally, one might
determine whether, given specific injuries payments are more or less
variable than awards. Do posttrial processes make it more or less true
that similarly situated plaintiffs receive similar amounts of money?
Multivariate analysis of the present data set, adding a few new vari-
ables, could address these questions.

Multivariate analysis could also provide better answers to questions
about how posttrial outcomes vary by case characteristic. The present
effort provided only simple descriptive analyses; that is, it examined
results by each of several case characteristics (e.g., type of damages,
subject matter of case, jurisdiction, and type of defendant) taken one at
a time, but did not consider interactions. However, we know that some
interactions are important, and that not taking them into account
could lead to confusion. For example, the low payout in intentional
tort cases appears to occur because of the high frequency of punitive
damage awards in such cases; this does not appear to represent an
independent result. Multivariate modeling is ideal when several effects
interact, because it allows an examination of individual effects while
holding all others constant. Such modeling would be the first step in
more fully answering questions such as “Why do product liability cases
pay out at such a high rate?” or “Why do cases with only individual
defendants pay out at such a low rate compared with cases with deep
pocket defendants?” While some work can be done using the present
data set, additional studies also seem warranted, perhaps some that
concentrate on these particular questions.

Another question concerns time trends in compensation. Has the
average payment increased over time? Much of the concern over
awards has actually focused on the sharp rise in average amounts over
the last 25 years, rather than simply the latest year’s value. We have
shown what happened to payments in 1982–1984 but have not reported
on how that compares with earlier periods. The trend line for pay-
ments could simply parallel that for awards, showing the same sharp
rise over time, or could prove considerably flatter. Additional data on
older cases would be required to answer the question.

Finally, how do alternative posttrial policies compare? One might
consider, for example, various strategies that place caps on awards
compared with others that provide for more stringent judicial review.
then ask a series of questions: What is the effect of the various alter-
 natives on the final payment? Are the “right” awards changed? What
are the transaction costs of the various processes? Costs are an issue
not addressed at all in this report. Opportunities for such analyses might be in comparing states with different laws or, within a single state, from comparing outcomes before and after a change in law. The projects could take the form of in-depth case studies involving a small number of disputes or a multivariate analysis of a larger number of cases.
Appendix A

SURVEY QUESTIONNAIRE

This appendix describes the survey questionnaire, how it was filled out, and how the data were used. Figure A.1 contains a copy of the instrument sent to plaintiff lawyers with single clients. It basically had three purposes: to determine the final outcome on the case, the reason for any change, and the date the case closed.

The questionnaire had six questions. Lawyers were first asked to verify the trial verdict (net of reductions due to comparative negligence) published in the jury verdict reporters, both for the case as a whole (Question 1), and for the lawyer’s client in particular (Question 2). Though we found the reporters generally accurate, in a few cases lawyers indicated different outcomes than reported; thus, asking the questions ensured we had the correct amount with which to compare final payments.

Question 3 then asked for the final payments to the lawyer’s client. If the payment equaled the award, the lawyer was asked to verify that fact in Question 4, by checking “verdict amount as awarded.” If the amount paid was different than the award, Question 4 asks how that amount was determined; for example, from adjustment by trial courts or appellate courts. (See Fig. A.1 for complete list.) Any number of responses could have been coded. Note we were careful here to capture reductions in the award of no consequence to posttrial processes, so they would not be counted as an effect. In particular, we did not want to confuse offsets to the verdict because of liens or pretrial settlements as a posttrial reduction in the award, since those adjustments do not change the jury’s decision. Also, note that the list of reasons for reductions is not exhaustive; there is provision for writing in other answers. The most numerous of those responses concerned reductions in the award due to collection problems; for example, “limited by defendant insurance” or “defendant declared bankruptcy.”

Sometimes lawyers would provide additional information on payments in Question 3, separating out the amount paid on the original jury award from payments on interest, fees, or costs. When provided, the information was coded and incorporated in the analysis. For
SURVEY OF POST-TRIAL OUTCOMES

INSTRUCTIONS - PLEASE READ FIRST

These questions apply to the award and payments made in the case described in the attached report. Please refer to that description in answering these questions.

To answer these questions, please place an X in the box next to the response that you choose, or fill in the line with a dollar amount. You should answer all questions, unless an answer you select is followed by an instruction to skip to the applicable question. This means that you should proceed directly to the question indicated, skipping the question in between.

If you have any questions, please call Pat Ebenee or Nora Fitzgerald at 213-593-0411.

Thank you for your cooperation.

First, please verify the information contained in the attached report.

1. What was the total amount awarded by the jury to all plaintiffs in this case, after reductions for comparative negligence?

   Total award: $ ____________

   13-20/

2. What was the award (if any) to your client?

   [ ] Award to client: $ ____________

   22-29/

   [ ] No award to client

Fig. A.1—Survey questionnaire
The following questions pertain to payments made to plaintiff(s) after the verdict.

3. Did your client receive any post-trial payments, from any defendants involved in the trial? (Include payment of award and post-trial settlements)
   □ 0 No payment received — Skip to Q.5 13/
   □ 1 Amount received to date — $ ____________________________ 14-21/

4. How was this amount determined? (Check all that apply)
   □ 1 Verdict amount as awarded 22/
   □ 1 Verdict adjusted by lien amount 23/
   □ 1 Verdict adjusted by pre-trial settlement amount 24/
   □ 1 Verdict adjusted by trial court 25/
   □ 1 Verdict adjusted by appellate court 26/
   □ 1 New trial verdict 27/
   □ 1 Post-trial settlement negotiations 28/
   □ 1 Other, please specify: ____________________________ 29/

5. Is this case completely closed with regard to your client, or is it still pending?
   □ 0 Case completely closed — When? ___________ No. / ___________ Yr 32-35/
   □ 1 Pending motion for remittitur/additur
   □ 1 Pending motion for new trial
   □ 1 Pending new trial
   □ 1 Pending appeal to intermediate appellate court
   □ 1 Pending appeal to Supreme Court
   □ 1 Other, specify: ____________________________ 36/
   □ 1 Pending execution of judgment only

6. Do you know how much the other plaintiff(s) who went to trial ultimately received directly from defendants who took part in the trial? Do not include your client.
   □ 1 Total amount received by other plaintiff(s) — $ ____________________________ 38-45/
   □ 0 No payments to other plaintiff(s)
   □ 1 Don't Know

CARD 02
example, see Appendix D on the calculation of posttrial interest paid to plaintiffs.

Question 5 asked whether the case was completely closed. If it was, the survey asks for the month and year the case closed. If still open, the survey asks what issue was pending. Finally, Question 6 asked what lawyers knew about final outcomes for clients other than their own. Data here, however, were not used in place of direct lawyer responses; rather, the data were used for verification purposes only.

Four versions of the survey instrument were created to allow for proper recording of the information: a plaintiff and defendant version, and, for each, a single and multiple client version. Questionnaires for plaintiff and defendant attorneys had appropriately different wording (e.g., how much did your client “pay” for defendant attorney, and “receive” for plaintiff attorneys), and the multiple forms allowed space for recording of separate information about each client. Finally, defendant questionnaires distinguished whether an award was allocated specifically against a client or was an unallocated joint and several award against multiple parties.
Appendix B

CONSISTENCY OF PLAINTIFF AND DEFENDANT LAWYER SURVEY RESPONSES

Information on posttrial outcomes came from a mail survey of both plaintiff and defendant lawyers. For the 880 cases in the sample, over 2,000 lawyer surveys were mailed. Complete information on a trial could be obtained from either the plaintiff or defendant side of the case, or both. Responses yielded complete information on 621 trials, about 60 percent of which came from only one side of the dispute (Table B.1). On the one hand, that strategy sharply increased the completion rate for the survey, from about 60 to over 80 percent (see Section III). On the other hand, it raised the question of the consistency of plaintiff and defendant lawyer responses.

This appendix compares plaintiff and defendant lawyer responses for the 256 cases in which we have complete information from both sides. It concludes that plaintiff and defendant lawyers give essentially the same answers about posttrial outcomes and justifies the decision to use information from either side of the dispute interchangeably.

The study uses two basic measures of posttrial results: the frequency of change to the original award and the ratio of amount paid to amount awarded. Table B.2 compares the distribution of plaintiff and defendant lawyer responses according to the first measure. The table shows the two distributions are nearly identical: About 70 percent of

<table>
<thead>
<tr>
<th>Table B.1</th>
</tr>
</thead>
<tbody>
<tr>
<td>CLOSED CASES WITH COMPLETE DATA BY SOURCE OF INFORMATION</td>
</tr>
<tr>
<td>Source</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td>Plaintiff lawyers only</td>
</tr>
<tr>
<td>Defendant lawyers only</td>
</tr>
<tr>
<td>Both</td>
</tr>
<tr>
<td>Total</td>
</tr>
</tbody>
</table>
the cases remain unchanged from posttrial processes, 25 percent show a decrease in the original award, and 4 percent show an increase. ¹

Table B.3 compares plaintiff and defendant lawyer responses according to the proportion of the original verdict eventually paid. For the sample taken as a whole, plaintiff and defendant side proportions are identical (.79). However, there are some small differences by award category. ² Specifically, the ratio of payment to award as reported by defendant lawyers is a little higher in the smaller award categories, and somewhat lower in the “over 1 million” category. However, those differences are well within the range of random variation and do not indicate a fundamental difference in plaintiff and defendant lawyer response.

Table B.2

FREQUENCY OF POSTTRIAL CHANGES TO JURY AWARDS AS REPORTED BY PLAINTIFF AND DEFENDANT LAWYERS

<table>
<thead>
<tr>
<th>Change in Award</th>
<th>Percentage Distribution of Trials</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Plaintiff Side</td>
</tr>
<tr>
<td>Reduced</td>
<td>24</td>
</tr>
<tr>
<td>Unchanged</td>
<td>72</td>
</tr>
<tr>
<td>Increase</td>
<td>4</td>
</tr>
<tr>
<td>Total</td>
<td>100</td>
</tr>
</tbody>
</table>

NOTE: Based on 256 trials with complete information from both plaintiff and defendant lawyers.

¹The table reflects 20 cases of plaintiff and defendant lawyer disagreements on how the payment compared with the award. In 11 cases the plaintiff lawyer indicated a higher relative payment, while in 9 the defendant lawyer indicated a higher relative payment.

²Plaintiff and defendant lawyers often differed by small amounts as to the size of the award or payments, but rarely by large amounts. While we do not have definitive explanations, the differences appeared to be due to a mixture of recording error, rounding amounts from memory, and differing treatment of interest, fees, or costs. In addition, cases with multiple lawyers on at least one side of the dispute appeared especially likely to result in differences between plaintiff and defendant figures.
<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Plaintiff Side</th>
<th>Defendant Side</th>
</tr>
</thead>
<tbody>
<tr>
<td>1–99 Thousand</td>
<td>.90</td>
<td>.93</td>
</tr>
<tr>
<td>100–499 Thousand</td>
<td>.83</td>
<td>.84</td>
</tr>
<tr>
<td>500–999 Thousand</td>
<td>.84</td>
<td>.88</td>
</tr>
<tr>
<td>Over 1 Million</td>
<td>.89</td>
<td>.57</td>
</tr>
<tr>
<td>Total</td>
<td>.79</td>
<td>.79</td>
</tr>
</tbody>
</table>

**NOTE:** Based on 196 plaintiff verdicts with complete information from both plaintiff and defendant lawyers.
Appendix C

ESTIMATING POSTTRIAL OUTCOMES FOR CASES MISSING FROM THE SAMPLE

The validity of analysis depends upon the representativeness of the 621 closed cases in the analysis file. If closed cases (representing 71 percent of the sample) are fundamentally different from open cases or cases with no response (representing the other 29 percent), then results must be adjusted to reflect those facts. This appendix describes how the analysis took into account nonrandomness in survey responses. For the most part, the strategy called for filling in the missing final payments with estimated amounts, leading to a data set that included all 880 sampled cases. The estimated amounts were calculated by assuming that missing cases pay the same amounts as closed cases with similar characteristics. The characteristics accounted for include all those analyzed in this report: award size, location, case type, presence of punitive damages, and type of defendants. In addition, the methodology adjusts for open cases, taking into account the smaller relative payout of cases that take longer than one year to conclude.

The section begins with the further exploration of the randomness of the survey response (Table 3.5 found response differed by award size). It concludes that nonrandomness is pervasive enough to preclude the use of simple weighting techniques to adjust the analysis file. Instead, for each award category, a simple multivariate relationship between payment and awards is established using the sample of closed cases. Those relationships are then used for filling in missing cases in the sample. The technique used is exactly analogous to weighting, but

---

1The oversampling of larger cases is not an issue here, as within stratum the sample was randomly drawn; and, therefore, statistical weighting of returns can effectively recover the original trial mix. The weighting of returns is a straightforward process. For example, if only one-third of the cases of a particular type are included in the sample, then outcomes for each of those cases receive three times the weight of cases sampled at the 100 percent rate. The sample was weighted by sample stratum and award category as defined in Section III. In addition, the weighting reflected the fact that the ICJ database contains only one in four Cook County trials concerned with auto accidents or injuries on common carriers. However, it should be noted that weighting had little effect on the overall ratio of payment to award, since the sampling plan called for surveying trials that accounted for over 90 percent of all original awards (see Table 3.2 in Section III).

2Except in the largest award category, where the sample size is too small.
has the added feature that it allows for the simultaneous consideration of multiple variables important to the final outcome.

Next, the issue of open cases is considered, and the conclusion reached that a special adjustment is required when estimating final payments in those cases. Analysis finds a negative relationship between the posttrial interval and the final payment. Thus, because open cases as a whole have longer posttrial intervals than closed cases, the methodology assumes that they will eventually pay relatively smaller amounts.

Finally, the section concludes with a summary description of the methods and assumptions used to estimate missing outcomes in the sample.

THE REPRESENTATIVENESS OF CLOSED CASES

Survey responses yielded data on 621 closed cases out of the original 880 sampled, a 71 percent response rate. Though quite high, the response rate was not uniform over all relevant dimensions of the analyses. Table C.1 displays response rates across the major variables in the analysis—award size, type of damages, case type, location, and type of defendant. At one end of the spectrum, cases with million dollar verdicts, those with punitive damages, and those involving an intentional tort had a much lower response rate than the study as a whole. At the other end, cases with damages under $100,000, personal injury cases, and Cook County trials involved somewhat higher response rates than average. The analysis will have to compensate for those differences to avoid biased results.

Even within well-defined subsets of the sample, closed cases are not a random sample of all cases surveyed. Table C.2 compares the average jury verdict for closed cases with that for open and missing cases. Overall, closed cases had smaller awards (an average of $350,000) than the sample as a whole ($460,000). Open cases had the largest verdicts ($870,000), suggesting that cases with the highest stakes take the longest to conclude. A quick scan of the table confirms that the award differences among closed, open, and missing cases hold within most subsets of the data. The analysis will have to take those differences into account.
### Table C.1

**USABLE SURVEY RESPONSES BY CASE CHARACTERISTIC**

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Sample Size</th>
<th>Closed Responses</th>
<th>Response Rates (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Award Size ($)</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than $100 thousand</td>
<td>344</td>
<td>268</td>
<td>78</td>
</tr>
<tr>
<td>100 thousand-1 million</td>
<td>312</td>
<td>212</td>
<td>68</td>
</tr>
<tr>
<td>1-10 million</td>
<td>81</td>
<td>36</td>
<td>44</td>
</tr>
<tr>
<td><strong>Type of Damages</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Compensatory only</td>
<td>644</td>
<td>472</td>
<td>73</td>
</tr>
<tr>
<td>Punitive and compensatory</td>
<td>93</td>
<td>44</td>
<td>47</td>
</tr>
<tr>
<td><strong>Type of Defendant</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Individuals</td>
<td>194</td>
<td>131</td>
<td>68</td>
</tr>
<tr>
<td>Business, government,</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>hospitals, doctors</td>
<td>543</td>
<td>385</td>
<td>71</td>
</tr>
<tr>
<td>*<em>Case Type</em></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business/contract</td>
<td>183</td>
<td>112</td>
<td>61</td>
</tr>
<tr>
<td>Intentional tort</td>
<td>80</td>
<td>47</td>
<td>59</td>
</tr>
<tr>
<td>Personal injury</td>
<td>542</td>
<td>391</td>
<td>75</td>
</tr>
<tr>
<td><strong>Region</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cook County</td>
<td>346</td>
<td>252</td>
<td>73</td>
</tr>
<tr>
<td>San Francisco area</td>
<td>243</td>
<td>157</td>
<td>65</td>
</tr>
<tr>
<td>Smaller California jurisdictions</td>
<td>148</td>
<td>107</td>
<td>72</td>
</tr>
<tr>
<td><strong>All cases</strong></td>
<td>737</td>
<td>516</td>
<td>70</td>
</tr>
</tbody>
</table>

**NOTE:** Based on 737 cases in sample with original plaintiff verdicts.

*Categories not mutually exclusive.

### ESTIMATING THE RELATIONSHIP BETWEEN PAYMENT AND AWARD

The study uses the sample of closed cases to estimate relationships between payments and awards for different case types. Once determined, those relationships can be used to estimate posttrial results for missing survey returns. Separate methods are employed for three categories of trials: defense verdicts, plaintiff verdicts less than $10 million, and plaintiff verdicts exceeding $10 million. Each is considered in turn below.
### Table C.2

**AVERAGE JURY AWARD (IN THOUSANDS OF DOLLARS) BY CASE CHARACTERISTIC AND SURVEY STATUS**

(Cases with up to $10 million verdicts)

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Closed</th>
<th>Open</th>
<th>Missing</th>
<th>All</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Award Size ($)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than $100 thousand</td>
<td>29</td>
<td>35</td>
<td>26</td>
<td>29</td>
</tr>
<tr>
<td>100 thousand–1 million</td>
<td>350</td>
<td>390</td>
<td>370</td>
<td>360</td>
</tr>
<tr>
<td>1–10 million</td>
<td>2800</td>
<td>2400</td>
<td>3000</td>
<td>2700</td>
</tr>
<tr>
<td><strong>Type of Damages</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Punitive and compensatory</td>
<td>1100</td>
<td>880</td>
<td>1500</td>
<td>1100</td>
</tr>
<tr>
<td>Compensatory only</td>
<td>280</td>
<td>870</td>
<td>450</td>
<td>370</td>
</tr>
<tr>
<td><strong>Type of Defendant</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Individuals</td>
<td>100</td>
<td>460</td>
<td>100</td>
<td>150</td>
</tr>
<tr>
<td>Business, government, hospitals, doctors</td>
<td>440</td>
<td>1000</td>
<td>760</td>
<td>570</td>
</tr>
<tr>
<td><strong>Case Type</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business/contract</td>
<td>490</td>
<td>1000</td>
<td>1200</td>
<td>730</td>
</tr>
<tr>
<td>Intentional tort</td>
<td>310</td>
<td>530</td>
<td>100</td>
<td>350</td>
</tr>
<tr>
<td>Personal injury</td>
<td>340</td>
<td>940</td>
<td>380</td>
<td>400</td>
</tr>
<tr>
<td><strong>Region</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cook County</td>
<td>380</td>
<td>1000</td>
<td>300</td>
<td>450</td>
</tr>
<tr>
<td>San Francisco area</td>
<td>290</td>
<td>810</td>
<td>800</td>
<td>470</td>
</tr>
<tr>
<td>Smaller California jurisdictions</td>
<td>390</td>
<td>600</td>
<td>690</td>
<td>460</td>
</tr>
<tr>
<td><strong>All cases</strong></td>
<td>350</td>
<td>870</td>
<td>580</td>
<td>460</td>
</tr>
<tr>
<td><strong>Sample size</strong></td>
<td>520</td>
<td>100</td>
<td>120</td>
<td>740</td>
</tr>
</tbody>
</table>

**NOTE:** Based on 737 cases in sample with original plaintiff verdicts. Averages rounded to two significant digits.

### Defense Verdicts

Survey returns showed that few defense verdicts resulted in payments to plaintiffs. Further, when payments were made, the amount was small. Due to their small effect on the overall outcome, defense verdicts were all considered the same. The study simply assumes that the missing defense verdicts paid the same average amount, $3,000, as did the closed defense verdicts in the sample.
Plaintiff Verdicts Less than $10 Million

Plaintiff verdicts require a more detailed categorization. For example, separate posttrial outcomes have to be established for cases with million dollar verdicts, for cases involving punitive damages, for cases in Cook County and the San Francisco area, for cases with deep pocket defendants, and for personal injury and business/contract actions. To account for all these variables at the same time, the study used the statistical tool of multiple regression, which is designed to control simultaneously for multiple variables.

To understand how the process would be used to estimate payments for missing cases, consider a one-dimensional example. Suppose the only characteristic considered important was whether the case had a million dollar verdict or not. Then the process would assume missing million dollar cases would result in the same ratio of payment to award as did closed million dollar cases in the sample. Similarly, those missing with verdicts less than a million would pay out at the same average as the corresponding closed cases. This process would adjust for bias that would otherwise occur in results because of, for example, the smaller survey response rate for cases with million dollar verdicts.

The multivariate process used in this report is exactly analogous to the example above, only it accounts for multiple variables (listed above) at the same time. Using closed cases from the sample, the final payment was regressed on the original award, and that award interacted with all the remaining study variables. Regressions were completed in each of three award categories: original plaintiff verdicts under $100,000, those between $100,000 and $999,999, and those in the $1-10 million category. To make the process exactly analogous to weighting (i.e., hand-calculating a separate ratio for all possible subsets of the data) the constant term that ordinarily appears in regression equations was restricted to have zero value.

Regression results are presented in Table C.3. To illustrate their interpretation and use, consider as an example, the middle category in the table, covering plaintiff verdicts between $100,000 and $999,999. There, the base case, a personal injury case in Cook County state court, would, on average, pay .64 of the original award. (See the coefficient on the award variable.) Estimated results for different types of cases would be calculated by merely adding the coefficients that apply.
Table C.3

REGRESSION EQUATIONS USED TO ESTIMATE FINAL PAYMENTS FOR MISSING CASES
(Plaintiff verdicts up to $10 million)
Dependent variable = final payment.

<table>
<thead>
<tr>
<th>Independent Variables\ab</th>
<th>Coefficients by Award Category</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1-99K</td>
</tr>
<tr>
<td>Awardb</td>
<td>.84*</td>
</tr>
<tr>
<td>Award interacted with</td>
<td></td>
</tr>
<tr>
<td>following indicator</td>
<td></td>
</tr>
<tr>
<td>variables (1,0):</td>
<td></td>
</tr>
<tr>
<td>Deep pocket who paid</td>
<td>-.02</td>
</tr>
<tr>
<td>Punitive damages</td>
<td>-.04</td>
</tr>
<tr>
<td>Contract business case</td>
<td>0</td>
</tr>
<tr>
<td>Intentional tort case</td>
<td>0</td>
</tr>
<tr>
<td>Product liability case</td>
<td>.12*</td>
</tr>
<tr>
<td>San Francisco area</td>
<td>.15*</td>
</tr>
<tr>
<td>Other Calif. jurisdictions</td>
<td>.11*</td>
</tr>
<tr>
<td>Federal court</td>
<td>.14*</td>
</tr>
</tbody>
</table>

R Squ.         | .89   | .81  | .79  |
Sample size    | 268   | 212  | 36   |

NOTE: Table is based on 516 closed cases in the sample with plaintiff verdicts under $10 million. A separate equation was estimated for each award category.
\abConstant term of equations constrained to equal zero.
\bEstimates for a personal injury case (but not product liability) with compensatory damages, only individual defendants, and in Cook County state courts.
\cIn this category, all but one case involved deep pocket defendants. A better estimate of a base case is obtained by adding this coefficient to the deep pocket coefficient (i.e., .03 + .61 - .66).
*Significantly different from zero at the .05 level.

For example, if the original case involved punitive damages, the average final payout would drop to .58 (.64 - .16).\d

\dWhile the process is well designed to fill in missing values in a descriptive study of posttrial outcomes, caution should be exercised in over interpretation of the regression equations. Since the equations do not account for all the variables important to outcomes (e.g., it does not consider the severity of the injury in personal injury cases), the coefficients cannot be construed to represent the importance of those variables holding everything else of consequence constant. To make such statements would require further research on the modeling of posttrial outcomes.
The relationships defined in Table C.3 can be used to estimate post-trial outcomes for missing cases in the study. The jury verdict reporters supply all the relevant characteristics of those missing cases: the original jury award, location of trial, and so on. By just applying the equations to those data, final payments were calculated for missing survey returns.

**Plaintiff Verdicts More than $10 Million**

Plaintiff verdicts exceeding $10 million were too few in number to employ exactly the same estimation process as used for the smaller plaintiff verdicts. In that award category, only five cases were in the sample, and only two had complete information from survey returns. However, despite their rarity, payments in those cases strongly influence final outcomes in the study, as they represent 25 percent of all monies awarded.

To help determine the relationship between payments and awards for the largest cases, we expanded the sample with 13 more cases with verdicts exceeding $10 million. Those cases included all remaining $10 million trials in the ICJ database. They occurred either within the sample area but before 1982 (in 1980 or 1981), or elsewhere in California (usually Los Angeles) between 1980 and 1984. Of the 18 cases in the expanded group, six returns on closed cases were obtained. Results for those six cases showed plaintiff payments amounting to .54 of trial verdicts.

Using the data to estimate payments on verdicts exceeding $10 million dollars again involved the use of multiple regression. Payments on all closed verdicts of all sizes (including those in the expanded sample) were regressed on awards, and awards interacted with various characteristics of the case, just as before. Awards were also interacted with the “log of awards.” That variable acts as a type of continuous award category and helps control for the wide range of verdicts among the missing cases (from $12 to $50 million).

The results of the analysis are shown in Table C.4. That equation was used to estimate final payments for the three missing cases with verdicts over $10 million. Results of those estimations are described in Section IV.
Table C.4
REGRESSION EQUATIONS USED TO ESTIMATE FINAL PAYMENTS FOR MISSING CASES WITH VERDICTS EXCEEDING $10 MILLION

Dependent variable = final payment.

<table>
<thead>
<tr>
<th>Independent Variables</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Constant</td>
<td>-763.00</td>
</tr>
<tr>
<td>Award</td>
<td>1.81*</td>
</tr>
<tr>
<td>Award times log of award</td>
<td>-.11*</td>
</tr>
<tr>
<td>Award interacted with</td>
<td></td>
</tr>
<tr>
<td>following indicator</td>
<td></td>
</tr>
<tr>
<td>variables (1,0):</td>
<td></td>
</tr>
<tr>
<td>Deep pocket who paid</td>
<td>.36*</td>
</tr>
<tr>
<td>Punitive damages</td>
<td>-.37*</td>
</tr>
<tr>
<td>Contract business case</td>
<td>.27*</td>
</tr>
<tr>
<td>Intentional tort case</td>
<td>.07</td>
</tr>
<tr>
<td>Product liability case</td>
<td>.15*</td>
</tr>
<tr>
<td>Cook County</td>
<td>.15*</td>
</tr>
<tr>
<td>Federal court</td>
<td>.31*</td>
</tr>
<tr>
<td>R Sq</td>
<td>.92</td>
</tr>
<tr>
<td>Sample size</td>
<td>519</td>
</tr>
</tbody>
</table>

NOTES: Table is based on (a) 513 closed cases in the sample with plaintiff verdicts more than $100 but less than $10 million and (b) six cases from the original and supplemental samples with verdicts greater than $10 million.

Estimates are for a personal injury case (but not product liability) with compensatory damages, only individual defendants, and in California state courts.

*Statistically different from zero at the .05 level.

ADJUSTING FOR OPEN CASES

The regression techniques described above treat open and closed cases the same. This section examines whether special treatment is required for open cases. It concludes that the open cases in the sample will eventually pay relatively less than the closed cases and describes how we have adjusted for this fact in the analysis.
Comparing Closed and Open Cases in the Sample

Of the cases with survey returns, 15 percent had failed to terminate by September 1986. That proportion of open cases is relatively small due to the 1982–1984 trials chosen for this study rather than more current trials. However, high-stakes cases, those of most importance to this study, are more likely open than smaller cases. In the $1–10 million category, 42 percent of the survey returns indicated the case was still pending.

Open cases differ from others in that they take much longer to conclude. Table C.5 compares open and closed cases among survey returns based on the number of years they remain open. Because of the study design, open cases had been pending a minimum of over one and a half years. In contrast, 75 percent of the closed cases took less than a year to terminate after trial. If the study treats the open cases the same as closed ones, it implicitly assumes the time a case takes to close after trial does not affect the final payout.

Logic does not clearly suggest whether cases reaching a judgment quickly will yield a different return than those taking a longer period. On the one hand, cases may conclude quickly at a high payout rate if the parties find the judgment acceptable. On the other hand, cases that conclude quickly may result in a low payout rate if the trial court grants a large remittitur or if the plaintiff finds the liable parties have

Table C.5

<table>
<thead>
<tr>
<th>Years Open after Trial</th>
<th>Still Open</th>
<th>Closed</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 1</td>
<td>0</td>
<td>76</td>
<td>62</td>
</tr>
<tr>
<td>1–3</td>
<td>56</td>
<td>22</td>
<td>28</td>
</tr>
<tr>
<td>More than 3</td>
<td>44</td>
<td>2</td>
<td>10</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>100</strong></td>
<td><strong>100</strong></td>
<td><strong>100</strong></td>
</tr>
</tbody>
</table>

| Sample Size | 100 | 445 | 545 |

**NOTE:** Table compares open and closed cases by the number of years those cases were open from trial to survey date. Table is based on the 545 plaintiff verdicts for which posttrial intervals were known.

*There is no longer an incentive to delay, as there once was, because the posttrial interest rate in each jurisdiction has been raised to close to 10 percent.*
few assets to pay the judgment. Similarly, cases that take several years to proceed through the entire appeal process could pay more or less than the original award depending on the appeals outcome.

Closed cases in the sample can be used to examine the relationship between the posttrial interval and the final payment. Since the sample includes cases as far back as January, 1982, a closed case in the sample could have been open as long as four years and ten months after trial. Of the 516 plaintiff verdicts in the original sample, 98 took longer than a year to close, and eight took longer than three years.

Cases that took over a year to conclude yielded less to the plaintiff than those closing in less than a year. Table C.6 examines the ratio of payment to award among closed cases by how long they were open after trial. The ratio decreases with time in all three award categories, but by differing amounts. In the $100,000–999,000 category, where the decrease is largest, the ratio drops from .88 in the first year to about .75 after that, a difference of .13. The million dollar category shows a smaller drop, .05 after the first year, and the smallest award category an even smaller drop (.03).

While Table C.6 shows a smaller payout for cases open more than a year after trial, it contains little data on cases open longer than three years. The $100,000–999,999 category contains most of the data, with seven cases open longer than three years after trial. Results there imply that the ratio remains constant after the first year.

To test whether the ratio for million dollar award follows the same pattern, a supplemental group of older trials was added to the sample. Survey packages were sent to lawyers involved in the 33 cases of million dollar or more verdicts that occurred in the study areas in 1980 or 1981, the two years prior to the main study period. Data on 19 closed cases resulted from that effort; six of the closed cases were open more than three years before closing. Findings showed no decrease in the ratio of payment to award in million dollar cases open three years or longer.3

To test statistically the importance of the posttrial interval on the final payment, multivariate regressions similar to those used in Table C.3 were employed. As before, the amount of the payment was regressed on the independent variables important to the analysis. In addition, a new variable was added, indicating whether the case took longer than one year to conclude. Doing so limited the sample for this analysis, however. The time taken to terminate is known for only 85 percent of the closed cases.

3In fact, the supplemental sample showed no relationship between the final payout and time to terminate; rather, for that group payments were uniformly lower in all year groupings, the overall average nearly .10 lower than for the original sample.
Table C.6

POSTTRIAL OUTCOMES OVER TIME

<table>
<thead>
<tr>
<th>Years Open After Trial</th>
<th>Number of Closed Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 1</td>
<td>21</td>
<td>2,720</td>
<td>2,025</td>
<td>.74</td>
</tr>
<tr>
<td>1-3</td>
<td>13</td>
<td>2,657</td>
<td>1,832</td>
<td>.69</td>
</tr>
<tr>
<td>More than 3</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Unknown</td>
<td>2</td>
<td>3,800</td>
<td>570</td>
<td>.15</td>
</tr>
</tbody>
</table>

**Award between $1-$10 Million**

| Less than 1            | 136                    | 371                         | 325                         | .88              |
| 1-3                    | 43                     | 305                         | 225                         | .74              |
| More than 3            | 7                      | 385                         | 290                         | .75              |
| Unknown                | 26                     | 324                         | 303                         | .94              |

**Award between $100-$999 Thousand**

| Less than 1            | 181                    | 30                          | 28                          | .93              |
| 1-3                    | 43                     | 30                          | 27                          | .90              |
| More than 3            | 1                      | 34                          | 34                          | -                |
| Unknown                | 43                     | 24                          | 24                          | 1.00             |

**Award between $1-$99 Thousand**

NOTE: Table compares the payment with the original award for 516 closed cases with original plaintiff verdicts.

The multivariate analysis shows somewhat different results than the simple descriptive analysis (Table C.7). Like the descriptive results, the equations show a drop in payments for all three award categories if the case was open for more than a year after trial. However, unlike the descriptive results, the multivariate findings show a greater effect the larger the award. Controlling for all other variables in the analysis, payments for cases with million dollar verdicts are an estimated 17 percent less if open longer than a year.

The results of Table C.7 can be used to adjust for open cases when filling in final payments for missing values. This study uses the coefficients on the time variables in Table C.7 to adjust estimates produced from Table C.3. Thus, for a case in the $100,000–999,999 category, the
Table C.7

REGRESSION ANALYSIS: EFFECT OF POSTTRIAL INTERVAL ON THE FINAL PAYMENT
(Plaintiff verdicts up to $10 million)

Dependent variable = final payment.

<table>
<thead>
<tr>
<th>Independent Variables(^a)</th>
<th>Award(^b)</th>
<th>1-99K</th>
<th>999K</th>
<th>Million</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>.82(^*)</td>
<td>.71(^*)</td>
<td>-.32(^*)</td>
<td></td>
</tr>
<tr>
<td>Award interacted with</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>following indicator variables (1,0):</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Deep pocket who paid</td>
<td>-.01</td>
<td>.18(^*)</td>
<td>1.13</td>
<td></td>
</tr>
<tr>
<td>Punitive damages</td>
<td>-.02</td>
<td>-.16(^*)</td>
<td>-.25(^*)</td>
<td></td>
</tr>
<tr>
<td>Contract business case</td>
<td>.02</td>
<td>-.10(^*)</td>
<td>.15</td>
<td></td>
</tr>
<tr>
<td>Intentional tort case</td>
<td>-.09</td>
<td>-.08</td>
<td>-.36</td>
<td></td>
</tr>
<tr>
<td>Product liability case</td>
<td>.13(^*)</td>
<td>.04</td>
<td>.19</td>
<td></td>
</tr>
<tr>
<td>San Francisco area</td>
<td>.15(^*)</td>
<td>.04</td>
<td>.01</td>
<td></td>
</tr>
<tr>
<td>Other Calif. jurisdictions</td>
<td>.12(^*)</td>
<td>.08</td>
<td>.32</td>
<td></td>
</tr>
<tr>
<td>Federal court</td>
<td>.18(^*)</td>
<td>-.02</td>
<td>.04</td>
<td></td>
</tr>
<tr>
<td>More than 1 year to close</td>
<td>-.02</td>
<td>-.11(^*)</td>
<td>-.17(^*)</td>
<td></td>
</tr>
<tr>
<td>R Sq.</td>
<td>.89</td>
<td>.82</td>
<td>.83</td>
<td></td>
</tr>
<tr>
<td>Sample size</td>
<td>225</td>
<td>186</td>
<td>34</td>
<td></td>
</tr>
</tbody>
</table>

NOTE: Table is based on 445 closed cases in the sample where the posttrial interval was known.
\(^a\)Constant term of equations constrained to equal zero.
\(^b\)Estimates for a personal injury case (but not product liability), with compensatory damages, only individual defendants, and in Cook County state courts.
\(^c\)In this category all but one case involved deep pocket defendants. A better estimate of a base case obtained by adding this coefficient to the deep pocket coefficient (i.e., -.32 + 1.13 = .81).
\(^d\)T = 1.8.
\(^*\)Significantly different from zero at the .05 level.

Estimated payment is (.11 \times award) less than the amount calculated from Table C.3. The corresponding reduction for million dollar cases is (.17 \times award).\(^6\)

\(^6\)This procedure produces an upper bound estimate of the proper adjustment for open cases.
ESTIMATING POSTTRIAL OUTCOMES FOR CASES MISSING IN THE SAMPLE

Having described how payments are related to awards in various award categories, this section summarizes how those relationships are used to estimate final payments for missing cases.

Defendant verdicts: Assumed to pay an average of $3,000, the average for all closed cases.

Plaintiff verdicts
(> $10 million):

Open Cases Estimated using equations in Table C.3, with the additional reduction implied in Table C.7, (e.g., a reduction of (1.11 × award) for the $100,000-$999,999 category).

Other Missing Cases: Calculated using equations in Table C.3 with an adjustment for the estimated number that are open. The proportion open among missing cases is assumed to be the same as among survey returns. That proportion is multiplied times the reduction described above for open cases. For example, in the million dollar category, 42 percent of the returned surveys were open. Thus, rather than adjusting the estimates determined in Table C.3 by (.17 × award) as done for cases known to be open, they are adjusted by (.42 × .17 × award).

Plaintiff verdicts
(> $10 million): Estimated using equation in Table C.4, and, if open, the same adjustment made as for other million dollar cases.

EFFECTS OF STATISTICAL ADJUSTMENTS ON THE FINAL RESULTS

Making the statistical adjustments described in this appendix ensures that the report’s results are as complete a picture as possible of posttrial outcomes in the study areas. However, it is important to note that the changes represent only adjustments and not major changes. This section shows that though those adjustments were important to the analysis, they did not drive the report’s conclusions. Here we compare the final estimates used in this report with what we would have
obtained using only the raw data on closed cases, without making any adjustments for missing cases.

Table C.8 examines the proportion of trial awards paid by size of the original award. The top portion of the table represents the full data set, a copy of Table 4.9 from the analysis section. It displays estimated outcomes for all 3,200 trials in our study areas. The bottom portion gives the corresponding results for the subset of 621 closed cases obtained from the survey.

Comparing the ratio of payment to award by award size shows a high degree of correspondence in the two data sets (Table C.8). For plaintiff verdicts less than $100,000, the ratio differs by only .01; it is .93 for the full data set and .94 for the set of closed cases from the survey. The difference is slightly larger (.03) for cases with verdicts greater than $100,000 but less than a million. However, for cases between $1 and $10 million the proportions are exactly the same. Only for the handful of cases with verdicts greater than $10 million did making the statistical adjustments greatly affect the final proportion paid.

### Table C.8

**EFFECT OF STATISTICAL ADJUSTMENTS ON THE FINAL RESULTS**

<table>
<thead>
<tr>
<th>Years Open After Trial</th>
<th>Number of Closed Cases</th>
<th>Average Jury Award ($1000)</th>
<th>Average Amount Paid ($1000)</th>
<th>Ratio Paid/Award</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td><em>Includes Estimates for Missing Cases</em></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Zero-defense verdict</td>
<td>1240</td>
<td>0</td>
<td>3</td>
<td>-</td>
</tr>
<tr>
<td>1-99,000</td>
<td>1466</td>
<td>23</td>
<td>21</td>
<td>.93</td>
</tr>
<tr>
<td>100,000-999,000</td>
<td>422</td>
<td>314</td>
<td>256</td>
<td>.82</td>
</tr>
<tr>
<td>1-10 Million</td>
<td>81</td>
<td>2673</td>
<td>1826</td>
<td>.68</td>
</tr>
<tr>
<td>Over 10 Million</td>
<td>5</td>
<td>27220</td>
<td>15460</td>
<td>.57</td>
</tr>
<tr>
<td>All cases</td>
<td>3214</td>
<td>161</td>
<td>114</td>
<td>.71</td>
</tr>
<tr>
<td></td>
<td><em>Includes Only Completed Cases</em></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Zero-defense verdict</td>
<td>103</td>
<td>0</td>
<td>4</td>
<td>-</td>
</tr>
<tr>
<td>1-99,000</td>
<td>268</td>
<td>29</td>
<td>27</td>
<td>.94</td>
</tr>
<tr>
<td>100,000-999,000</td>
<td>212</td>
<td>352</td>
<td>301</td>
<td>.85</td>
</tr>
<tr>
<td>1-10 Million</td>
<td>36</td>
<td>2757</td>
<td>1874</td>
<td>.68</td>
</tr>
<tr>
<td>Over 10 Million</td>
<td>2</td>
<td>16800</td>
<td>12800</td>
<td>.76</td>
</tr>
<tr>
<td>All cases</td>
<td>621</td>
<td>347</td>
<td>264</td>
<td>.76</td>
</tr>
</tbody>
</table>

*May slightly disagree with ratio of payments to awards as printed due to rounding.
Appendix D

ESTIMATING THE EFFECTS OF POSTTRIAL INTEREST ON THE RATIO OF PAYMENT TO AWARD

The ratio of payment to award in this study is calculated net of posttrial interest. “Awards” are defined as reported at trial, regardless of how long it took to finally settle the case. Further, whenever possible, posttrial interest is excluded from the definition of “payment”; if lawyers indicate they have included interest payments on the survey, those amounts are subtracted for purposes of the analysis.

A full consideration of posttrial interest is excluded from this report because we are not always in a position to calculate it. In only 85 percent of our analysis file of closed cases were we able to determine the date the trial closed. Further, while we know how long open cases have been pending, we do not know how long they will take to close. Finally, we do not have information on the settlement period for any of the trials missing from the sample or not surveyed.

However, because interest can become a substantial amount when posttrial processes extend for years, we have calculated its maximum effect using the subset of cases where calculation is possible. This appendix contains the details of that analysis. We conclude that having complete information on interest would lower the overall ratio from a minimum of .04 and a maximum of .07.

For purposes of this analysis, data from all survey returns with known closure dates were employed. The “award” was calculated as defined in Section III, with the addition of 10 percent simple interest in California, and 9 percent interest in Illinois. These were applied based on the number of months between the trial date (as indicated in the jury verdict reporters) and the date the case closed (as indicated in the survey). Interest for cases that had not concluded was calculated as of the date of the survey, and not adjusted for additional time the case would remain open.

The “payment” was also supplemented with the posttrial interest that survey respondents claimed they received or paid. Since the survey asks for all monies that transfer between the parties, respondents’ answer to Question 3 of the survey was normally considered to include interest payments. The one exception is cases that are indicated paid
"verdict amount as awarded." In such cases it was often unclear whether posttrial interest was given up in the bargaining or paid in addition to the verdict. Thus, we calculate a maximum and a minimum effect of posttrial interest, the former assuming the interest was given up, the latter assuming it was paid.

Table D.1 shows the estimated effect of posttrial interest. It compares the ratio of payment to award based on whether posttrial interest is included or excluded from the calculations. The table uses the 545 open and closed cases in the sample with known settlement periods to make the calculations. The final outcomes for the open cases are estimated using the method described in Appendix C. Because not all settlement periods are known, and because the cases are not adjusted to reflect the entire population of trials, the ratios differ from those presented in Section IV. However, we expect that the difference between the ratios will approximate the difference for the entire study area.

Results show that the final ratio is decreased from a minimum of .04 to a maximum of .07. Open cases explain most of the difference, since they tend to have long settlement periods and to pay out at the lowest rates.

Table D.1

<table>
<thead>
<tr>
<th>Size of Award ($)</th>
<th>Excluding Interest</th>
<th>Including Interest</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 100 thousand</td>
<td>.93</td>
<td>.91</td>
</tr>
<tr>
<td>100-999 thousand</td>
<td>.80</td>
<td>.75</td>
</tr>
<tr>
<td>1—10 million</td>
<td>.63</td>
<td>.59</td>
</tr>
<tr>
<td>Over 10 million</td>
<td>.57</td>
<td>.54</td>
</tr>
<tr>
<td>All sizes</td>
<td>.67</td>
<td>.63</td>
</tr>
</tbody>
</table>

NOTE: Table shows results for the 545 open and closed plaintiff verdicts completed in the sample where time open is known and is adjusted to account for the estimated smaller payments of open cases. Table is not adjusted to portray the entire study area.
REFERENCES


Other ICJ Publications

R-2716-ICJ
The Law and Economics of Workers' Compensation
Policy Issues and Research Needs
L. Darling-Hammond and T. J. Kniesner
1980

R-2717-ICJ
Models of Legal Decisionmaking
Research Design and Methods
D. A. Waterman and M. A. Peterson
1981

R-2732-ICJ
Court Efforts to Reduce Pretrial Delay
A National Inventory
P. Ebener, with the assistance of J. Adler, M. Selvin, and M. Yesley
1981

R-2733-ICJ
Judicial Arbitration in California
The First Year
D. Hensler, A. Lipson, and E. Rolph
1981

R-2792-ICJ
The Resolution of Medical Malpractice Claims
Modeling the Bargaining Process
P. M. Danzon and L. A. Lillard
1982

R-2793-ICJ
The Resolution of Medical Malpractice Claims
Research Results and Policy Implications
P. M. Danzon and L. A. Lillard
1982

R-2870-ICJ/HCFA
The Frequency and Severity of Medical Malpractice Claims
P. M. Danzon
1982

R-2881-ICJ
The Civil Jury
M. A. Peterson and G. L. Priest
1982

R-2882-ICJ
Cost-Benefit Analysis and Voluntary Safety Standards for Consumer Products
L. L. Johnson
1982

R-2886-ICJ
Costs of the Civil Justice System
Court Expenditures for Processing Tort Cases
J. Kakalik and A. Robyn
1982

R-2904-ICJ
Educational Policymaking Through the Civil Justice System
P. T. Hill and D. L. Madley
1982
R-2918-ICJ
Workers' Compensation and Workplace Safety
Some Lessons from Economic Theory
R. B. Victor, L. Cohen, and C. Phelps
1982

R-2922-ICJ
The Pace of Litigation
Conference Proceedings
J. W. Adler, W. F. Felstiner,
D. R. Hensler, and M. A. Peterson
1982

R-2979-ICJ
Workers' Compensation and Workplace Safety
The Nature of Employer Financial Incentives
R. B. Victor
1982

R-2985-ICJ
Costs of the Civil Justice System
Court Expenditures for Various Types of Civil Cases
J. S. Kakalik and R. L. Ross
1983

R-3002-ICJ
Managerial Judges
J. Resnik
1982

R-3006-ICJ
Comparative Justice
Civil Jury Verdicts in San Francisco and Cook Counties, 1959–1980
M. G. Shanley and M. A. Peterson
1983

R-3011-ICJ
Compensation of Injuries
Civil Jury Verdicts in Cook County
M. A. Peterson
1984

R-3013-ICJ
New Tools for Reducing Civil Litigation Expenses
M. A. Peterson
1983

R-3022-ICJ
Designing Safer Products: Corporate Responses to Product Liability Law and Regulation
G. Eads and P. Reuter
1983

R-3032-ICJ
The Selection of Disputes for Litigation
G. L. Priest and B. Klein
1984

R-3042-ICJ
Costs of Asbestos Litigation
J. S. Kakalik, P. A. Ebener,
W. L. F. Felstiner, and M. G. Shanley
1983

R-3050-ICJ
Automobile Accident Compensation
Volume I: Who Pays How Much How Soon
J. E. Rolph, J. K. Hammit, R. L. Houchens,
and S. S. Polin
1985

R-3051-ICJ
Automobile Accident Compensation
Volume II: Payments by Auto Insurers
J. K. Hammit
1985

R-3052-ICJ
Automobile Accident Compensation
Volume III: Payments from All Sources
R. L. Houchens
1985

R-3053-ICJ
Automobile Accident Compensation
Volume IV: State Rules
J. K. Hammit, R. L. Houchens, S. S. Polin,
and J. E. Rolph
1985

R-3071-ICJ
Simple Justice
How Litigants Fare in the Pittsburgh Court Arbitration Program
J. W. Adler, D. R. Hensler,
C. E. Nelson, and G. Rest
1983

R-3084-ICJ
Regulating the Content and Volume of Litigation
An Economic Analysis
G. L. Priest
1983

R-3132-ICJ
Variation in Asbestos Litigation Compensation and Expenses
J. S. Kakalik, P. A. Ebener,
W. L. F. Felstiner, G. W. Haggstrom, and
M. G. Shanley
1984
R-3165-ICJ
Managing the Unmanageable
A History of Civil Delay in the
Los Angeles Superior Court
M. Selvin and P. A. Ebener
1984

R-3167-ICJ
Introducing Court-Annexed
Arbitration
A Policymaker’s Guide
E. Rolph
1984

R-3249-ICJ
Deep Pockets, Empty Pockets
Who Wins in Cook County
Jury Trials
A. Chin and M. A. Peterson
1985

R-3311-ICJ
Punitive Damages
Empirical Findings
M. Peterson, S. Sarma, and M. Shanley
1987

R-3324-ICJ
Asbestos in the Courts
The Challenge of Mass Toxic Torts
D. R. Hensler, W.L.F. Feistiner, M. Selvin,
and P. A. Ebener
1985

R-3391-ICJ
Costs and Compensation Paid
in Tort Litigation
J. S. Kastlak, N. M. Pace
1986

R-3410-ICJ
New Evidence on the Frequency
and Severity of Medical
Malpractice Claims
P. M. Danzon
1986

R-3466-ICJ
Civil Juries in the 1980s
Trends in Jury Trials and Verdicts
in California and Cook County, Illinois
M. A. Peterson
1987

R-3479-ICJ
The Debate Over Jury Performances:
Observations from a Recent Asbestos
Case
M. Selvin, L. Picus

N-1965-ICJ
Court-Administered Arbitration:
An Alternative for Consumer
Dispute Resolution
D. R. Hensler and J. Adler, with the
assistance of G. Rest
1985

N-1994-ICJ
Jury Awards and Prejudgment
Interest in Tort Cases
S. J. Carroll
1983

N-2096-ICJ
California Enacts Prejudgment
Interest: A Case Study of
Legislative Action
A. Lipson
1984

N-2186-ICJ
Court-Ordered Arbitration:
The California Experience
E. S. Rolph and D. R. Hensler
1984

N-2257-ICJ
Court-Annexed Arbitration:
The National Picture
P. A. Ebener and D. R. Betancourt
1985

N-2342-ICJ
Punitive Damages: Preliminary
Empirical Findings
M. A. Peterson
1985

N-2418-ICJ
Limiting Liability for
Automobile Accidents: Are No-
Fault Tort Thresholds Effective?
J. K. Hammitt and J. E. Rolph
1985

N-2444-ICJ
What We Know and Don’t Know
About Court-Administered
Arbitration
D. R. Hensler
1986

P-6963-ICJ
Court-Annexed Arbitration in
the State Trial Court System
D. R. Hensler
1984
Reforming the Civil Litigation Process: How Court Arbitration May Help
D. R. Hensler
1984

Evaluating Civil Claims: An Expert Systems Approach
D. A. Waterman and M. A. Peterson
1985

Designing Safer Products: Corporate Responses to Product Liability Law and Regulation
G. Eade and P. Reuter
1985

The Impact of Fee Arrangement on Lawyer Effort
H. Kritzer, W. L. F. Pesatúner, A. Sarat, and D. Trubek
1986

Some Observations on the Need for Tort Reform
G. H. Shubert
1986

Summary of Research Results on the Tort Liability System
D. R. Hensler
1986

The Effects of Tort Reforms on the Frequency and Severity of Medical Malpractice Claims: A Summary of Research Results
P. M. Danzon
1986

Summary of Research Results: Trends and Patterns in Civil Jury Verdicts
M. A. Peterson
1986

Changes in the Tort System: Helping Inform the Policy Debate
G. H. Shubert
1986

Costs and Compensation Paid in Tort Litigation: Testimony Before the Joint Economic Committee of the U.S. Congress
J. S. Kakali, N. M. Pace
1986

Summary of Research Results on Product Liability
D. R. Hensler
1986

Failing Faith: Adjudicatory Procedure in Decline
J. Resnik
1986

Trends in California Tort Liability Litigation
D. R. Hensler
1987

A special bibliography (SB 1064) provides a list of other RAND publications in the civil justice area. To request the bibliography or to obtain more information about The Institute for Civil Justice, please write the Institute at this address: The Institute for Civil Justice, The RAND Corporation, 1700 Main Street, P.O. Box 2138, Santa Monica, California 90406-2138, (213) 393-0411.