# The Jury System Reexamined

**Judging the Jury**. VALERIE P. HANS and NEIL VIDMAR. Plenum, New York, 1986. 285 pp. $17.95.

In the last two decades, developments in the law have rekindled the long-standing controversy over the relative merits of adjudicating disputes by popular assembly and by expert decision makers, and developments in social science research have clarified some factual predicates of the debate. Since 1970, the Supreme Court has drastically changed the composition, shape, and functioning of the trial jury. On the one hand, it has democratized the reservoir of prospective jurors from which the jury is selected, prohibiting the exclusion or underrepresentation of racial minorities and women. On the other hand, it has broken a 400-year tradition and arguably undermined the jury's democratic foundation by permitting civil and criminal juries of fewer than 12 (but no fewer than six) members and verdicts by majority (rather than unanimous) vote. In 1966, Kalven and Zeisel published their classic study *The American Jury*. It has become the frame of reference for all subsequent empirically based research and discussion on the subject. Kalven and Zeisel concluded that the jury is not the capricious and incompetent decision maker that its critics have portrayed it to be, because in three out of four cases the jury reached the same verdict as the trial judge (a presumptively competent professional).

The Supreme Court decisions on the jury and Kalven and Zeisel's study have spawned scores of books and some 200 articles, many of them authored by psychologists. Indeed, the field of legal psychology today is dominated by the psychology of the jury. Despite this explosive growth in the judicial and social science literature, no book that synthesizes these developments and communicates them to the nonspecialist has been available. Now Hans and Vidmar, two social psychologists, have stepped into the breach. Their book gracefully integrates appellate opinions, empirical studies since 1966, historical sources, and lively reports of highly publicized jury trials. The result is an eminently readable and engrossing narrative that successfully captures—as the authors had hoped—"the essence of the contemporary jury."

The book is divided into five parts. The introductory chapters of part 1 offer a cursory history of the origins of trial by jury—from trial by ordeal and battle in feudal times, to trial by jury (as we now know it) in the mid-18th century, to the evolution of the American jury after its transplant from the mother country. Part 2 examines the selection of the jury. It reviews the legal cases guaranteeing that jury panels constitute a representative cross section of the community; it discusses the psychology of questioning prospective jurors (lawyers and judges are "only minimally effective" in uncovering biases); and it evaluates scientific selection methods intended to select favorable jurors for the defense ("no easy answer" as to their efficacy and "no easy answers" as to the ethics of jury stacking by parties with deep pockets).

Part 3 portrays the dynamics of the deliberation process and assesses the factors that shape the outcome. A review of Kalven and Zeisel's research and new simulation studies show, according to the authors, that jurors are capable of comprehending the law and determining the facts ("incompetence is a rare phenomenon"); that jurors' expressions of bias are not nearly so frequent as critics have asserted; and that jurors only sometimes exercise the power of nullification—that is, the power to ignore or bend the law in order to reach a desired result. A less upbeat picture is drawn from the studies evaluating the effects of the Supreme Court's jury decisions. Six-member juries and majority verdicts are said to have altered fundamentally the nature and outcome of deliberations. The jury today is no longer the functional equivalent of the pre-1970 jury.

Part 4 addresses the special issues for jury trials that are posed by cases involving the insanity defense, the prosecution of rape, and the death penalty. As in the preceding chapters, the authors enliven their presentation by interweaving dramatic stories of actual jury trials with findings drawn from the technical literature. Juries are not "overly gullible" about the insanity plea, so the authors suggest that there is no pressing need to abolish that defense. And despite recently promulgated statutory standards for channeling jury discretion in capital sentencing, the research evidence indicates that arbitrariness and racial discrimination still persist in capital punishment.

The conclusion in part 5 reaffirms the assertion of Kalven and Zeisel that the American jury is not an incompetent decision maker. "Our final judgment," the authors say, is that "despite some flaws, the jury serves the cause of justice very well." This book is a splendid effort at assembling and evaluating a large corpus of research. It makes the subject accessible to a broad audience. Because of its projected appeal, I feel moved to add a dissenting commentary on the authors' conclusion. There are methodological flaws and mixed results in the evidence presented to warrant, in my opinion, a more qualified judgment.

The post-1966 jury studies consist principally of laboratory simulations. In describing the results of these studies, the authors spare the nonspecialist reader the methodological fine print and statistical arcana that normally accompany a scientific report. However, their sprightly narrative lends the impression of a more solid basis of knowledge than actually exists. With a few recent exceptions, most of the simulations lack fidelity to jury trials. When experimental procedures are contrived and role-playing jurors are unrepresentative of the population, the generalizability of the findings to the real world becomes precarious.

Kalven and Zeisel's claim that the jury is not arbitrary or incompetent was based on a survey (not laboratory) study that found substantial consensus between verdicts of actual juries and decisions of presiding trial judges. However, several post-1966 studies discussed by Hans and Vidmar—both simulations and statistical analyses of actual jury decisions—appear to belie that claim, though these studies did not evaluate jury performance by the yardstick of judicial decisions. For example, juries disproportionately impose the death penalty when murder victims are white rather than black; jurors with certain social views are more conviction-prone; mock jurors have low comprehension of standard jury instructions and these instructions have little impact on their decisions; and so on. In the face of these results, to reassert that jury decision making is principled strikes me as selective reading of the data. Kalven and Zeisel's study exerts such a towering influence over the field of jury research that there must be a natural reticence to deviate from the received wisdom.

In the final analysis, the claim of competency—however defined and measured—in defense of the jury expresses a political judgment as well as an empirical conclusion. Ideological values intrude in scientific inquiry, all the more so when the subject is an institution as political as the jury. Adjudication of matters of life, liberty, and property by one's fellow citizens rather than by experts is justified as the communal enactment of the democratic idea. Juries are known to be more lenient toward criminal defendants than are judges. Juries are also more sympathetic toward injured plaintiffs and award

larger monetary damages. Proponents of the jury, including social scientists, are committed to the normative order symbolized by the jury. This commitment colors their evaluation of the research.

The long-term future of the jury is uncertain. In this country, there is a constitutional right to trial by jury, but in the last two decades the composition and functioning of the American jury have been eroded. Elsewhere the jury is disappearing. Over four-fifths of all jury trials in the world are held here. Even in England, which gave us the jury, civil jury trials are virtually nonexistent and criminal jury trials are not commonplace. Thus, the ultimate question to be addressed in judging the jury is: If so many other democratic countries exist and thrive without the institution of the jury, why can we also not live without it or live with it in diminished form?

WALLACE D. LOH
*University of Washington Law School, Seattle, WA 98105*

## Life of a Physicist

**Kapitza**. Life and Discoveries. F. B. KEDROV. Mir, Moscow, 1985 (U.S. distributor, Imported Publications, Chicago). 199 pp., illus. $6.95. Outstanding Soviet Scientists. Translated with revisions from the Russian edition (1979) by Mark Fradkin. John Crowfoot, Ed.

Peter Kapitza was known as much for his life and personality as for his physics, and in this rather chatty book Kedrov devotes more attention to the former than to the latter. The main chapters in Kapitza's life are covered here—his childhood and student years in St. Petersburg, his 13 years with Rutherford in Cambridge, his setting up of the Institute of Physical Problems in Moscow in the mid-1930's, his years of virtual house arrest after the war, and his later life as a grand old man of physics. Kedrov also describes briefly Kapitza's research in low-temperature physics and on controlled thermonuclear fusion. This book was first published in Russian some years before Kapitza's death in 1984, but it has since been brought up to date.

Kapitza was incapable of saying or writing anything uninteresting, and consequently this book, with its excerpts from his letters, reports of conversations with him, and anecdotes about him, makes for lively reading. It contains no great revelations, however. Kedrov does not mention that when Kapitza stayed in the Soviet Union in 1934 it was because he was prevented from leaving the country. Nor does he refer to Kapitza's courage in going to the Kremlin in 1938 and declaring that he would leave his new institute if Landau was not released from prison. Kapitza's threat worked, but it could just as well have resulted in Kapitza's arrest as in Landau's release.

Kapitza was dismissed from the directorship of his institute in 1946. Kedrov reports that a commission was appointed in 1946 to find defects in Kapitza's wartime work on the production of liquid oxygen, and it found them. The real reason for Kapitza's removal from the institute, however, was apparently his refusal to work on the Soviet atomic bomb project. Unfortunately Kedrov is not able to explore this issue. Still, he has the sense not to try to cover up those things he cannot write about.

This is a readable book and conveys some feeling for Kapitza and his eventful life. But it does not really do justice to the various stages of Kapitza's extraordinary career. Nor does it ask the interesting questions about his readjustment to Soviet life after the mid-1930's and his ability to function in that society as a prominent scientist with an independent mind and sometimes critical tongue.

DAVID HOLLOWAY
*Center for International Security and Arms Control, Stanford University, Stanford, CA 94305*

## Electronic Structure Methods

**Comparison of *Ab Initio* Quantum Chemistry with Experiment for Small Molecules**. The State of the Art. RODNEY J. BARTLETT, Ed. Reidel, Dordrecht, 1985 (U.S. distributor, Kluwer, Hingham, MA). x, 513 pp., illus. $79. Based on a symposium, Philadelphia, Aug. 1984.

This volume takes its title from a symposium held two years ago at the national meeting of the American Chemical Society. The invited talks at this symposium (attended by the reviewer) nicely demonstrated the dynamic interplay between experiment and theory in modern chemical physics. Six of the invited speakers at the symposium have contributed papers to this volume. The remaining ten papers are for the most part by theorists engaged in accurate ab initio electronic structure calculations.

The first three papers deal with the properties of dimers and larger clusters of transition metal atoms. The paper by Weltner and Van Zee reviews the results of recent electron spin resonance studies of small transition metal clusters, and that of Walch and Bauschlicher emphasizes the role of *ab initio* electronic structure calculations in characterizing the bonding in the dimers. The latter will be of considerable value to researchers trying to understand the bonding in these species. Smalley's paper demonstrates the utility of supersonic cluster beams for studying the chemisorption and reactivity of $H_2$ and $N_2$ on transition metal clusters containing up to 30 atoms. These complex systems, which are beyond the capability of current *ab initio* methods, underscore the need for developing new approaches to the electronic structure problem in many-electron systems.

Other closely related papers are those of Peterson *et al.* and Dykstra and Lisy on the structure and bonding in "hydrogen-bonded" molecular dimers. The former authors focus primarily on the results of rotational and infrared microwave double-resonance spectroscopy, the latter on the application of high-quality electronic structure calculations coupled with vibrational analysis. The paper by Peterson *et al.* is particularly timely in that it summarizes the evidence that the ammonia dimer is not hydrogen-bonded.

Three of the papers deal with the properties of excited states of diatomic molecules. That by Werner and Rosmus provides a comprehensive review of the radiative properties of diatomic molecules and their ions, with emphasis on the results obtained with the multiconfiguration self-consistent field (MCSCF) and configuration interaction (CI) methods. Kurtz *et al.* demonstrate the utility of the antisymmetrized geminal power (AGP) wavefunction for the calculation of transition energies and moments. Bernheim *et al.* review the experimental and theoretical data available for the excited states of $Li_2$.

The papers by Dunning *et al.* and Truhlar *et al.* show the strong interplay between electronic structure theory and collision theory for predicting reaction mechanisms and rates. The former paper provides a good example of the role that theoretical methods now play in elucidating the dynamics of complex chemical reactions such as the oxidation of hydrocarbons. Bunker discusses the beautiful laser magnetic resonance studies carried out at Ottawa on the ground electronic state of $CH_2$ and also shows how these studies when coupled with theoretical calculations allow for an accurate determination of the structure and the energy separation between the lowest singlet and triplet electronic states of this molecule.

In other papers Ermler *et al.* present their results for the vibrational levels of $H_2O$ as determined from *ab initio* potential energy surfaces, Langhoff *et al.* provide a comprehensive review of theoretical dissociation energies of ionic diatomic and triatomic molecules, Nakatsuji discusses the use of ab