Southern Economic Journal 2014, 81(1), 1–6
DOI: 10.4284/0038-4038-2014.002

Roger Sherman Symposium: Introduction

SEA Symposium in Honor of Roger Sherman

This special issue is dedicated to the memory and scholarly accomplishments of Roger Sherman, who died in 2010 at the age of 80 after a series of complications from a boating accident. The articles were selected from those presented by a group of Roger's former students and coauthors at a session entitled "Studies in Regulation and Antitrust Inspired by Roger Sherman," which we organized for the 2010 Annual Meeting of the Southern Economic Association. We begin with a perspective on the legacy provided by Roger's long career, and then we provide a brief introduction for the articles included in this symposium.

Roger Sherman majored in mathematics at Grove City College, where he was briefly expelled for organizing a boat party that violated college alcohol guidelines. After graduating, he resumed his seafaring interests by serving as a radar officer for a U.S. Navy amphibious command ship, where the onboard presence of an Admiral presumably helped ensure high standards of professional conduct. He left the Navy in 1956 to obtain an MBA in Finance from the University of Colorado. One of his Colorado accounting professors encouraged him to go to Harvard for a "worthwhile MBA," which he finished in 1959.

As a doctoral student at Carnegie-Mellon (then Carnegie Tech) in the 1960s, Roger began running laboratory experiments that were motivated by issues in industrial organization. Under the intellectual leadership of Herb Simon, the focus at Carnegie was interdisciplinary and behavioral, spanning economics, psychology, computer science, and politics, with a clear interest in models of bounded rationality and observed business behavior. The second year MBA "management game" involved a computer simulation of the demand side of a multimarket competition played out by the MBA students, which provided an early connection between teaching and experimentlike simulations. This focus on actual behavior spilled over into research, and Roger was one of the first students to use experimental economics techniques (with financially motivated subjects) in his doctoral dissertation. His first scholarly article, "Individual Attitude Toward Risk and Choice Between Prisoner's Dilemma Games," was published in the *Journal of Psychology* in 1967 (Sherman 1967).

Roger's early scholarly work is collected and republished in the various chapters of his 1972 book, *Oligopoly*. The parts of this book that are most relevant for the articles included in this symposium are Chapters 6 and 7 on risk attitudes, capacity choice, and collusion. The measure of risk aversion used was the survey-based Wallach and Kogan (1961) Social Risk Preference Scale. The score is based on presenting subjects with a risky alternative to the status quo and eliciting a probability of success that makes the subject prefer to take the risk. Holt and Laury (2014) describe this "probability equivalence" procedure and compare it with other menu-based procedures that have been used subsequently. Roger once raised the possibility of using the Social Risk Preference Scale to measure risk aversion in a qualitative sense. Holt and Sherman ended up using an auction-based alternative with financial incentives in their symposium contribution, "Risk Aversion and the Winner's Curse." This auction-based procedure produced a parameter estimate of relative risk aversion that could be used to make predictions. Non-numerical measures of risk taking do have one clear advantage in that the resulting measures tend to show more consistency over time. For example, a person who is willing to admit driving without a seatbelt in one year is likely to answer the question in the same way a year later.

Roger Sherman was a risk taker in both his personal and professional life. He owned a collection of imported motorcycles and sports cars, and on several occasions he had to report to driving behavior modification school after being stopped for speeding. He resigned from a comfortable position at IBM to study for a Ph.D. at the Carnegie Tech Graduate School of Industrial Organization. He said later that he wanted to be his own boss and create things of lasting value. He joined the faculty at the University of Virginia in 1965, where he served as the Director of Undergraduate Studies, Director of Graduate Studies, and Chair of the Department of Economics for eight years. He retired and moved to the University of Houston in 2000, and he continued to teach and write until 2007.

During his long career, Roger made major contributions to the fields of market regulation, antitrust, and industrial organization. His second published article, also 1967, was titled "Potential Entrants Discourage Entry," a topic that is now a classic in both the classroom and in regulatory agencies and courts, as the next three decades saw deregulation and restructuring of many major industries, including airlines and telecommunications (Sherman and Willett 1967). He has written or edited a number of books on related topics, including oligopoly (Sherman 1972), industrial organization (Sherman 1974), antitrust policy (Sherman 1978), regulation of monopoly (Sherman 1989) and the postal service (Sherman 1980), and market regulation (Sherman 2008). Not surprisingly, he also served as an advisor for many government agencies, including the Civil Service Commission, the Council of Economic Advisors, the United States Postal Rate Commission, and the Federal Trade Commission.

Roger Sherman has always been known as a caring and diligent teacher who has coached and mentored generations of graduate students and majors, many of whom learned their economics from his textbooks. He was also innovative in terms of introducing economics experiments in the classroom. This approach has been emulated and expanded by many of his former students, including Scott Bohannon, who received a teaching award after developing a new course based on interactive negotiation exercises in law and economics while completing his doctoral work at U.Va.

Reading back over the earlier draft and some of Roger's notes on "Risk Aversion and the Winner's Curse" has regenerated our respect for Roger as a coauthor. The procedures show the attention to detail that he believed to be so important. He once remarked that designing an experiment is like working with computer code, since seemingly small errors may produce unusable output in each case. As Roger's many former graduate students can attest, he was a tireless and generous editor, always using those familiar blue pencil marks. He served on the editorial boards of several professional journals, including the *Southern Economic Journal* (1977–1980).

In addition to Roger Sherman's long list of books and scholarly writings, and all of the many junior colleagues (including one of us) who he hired and mentored over the years, his contributions continue to pay off in terms of the accomplishments of his many former graduate students. These people include former presidents of the Southern Economic Association, for example, Barry Hirsch and Catherine Eckel, who recently received the Carolyn Shaw Bell Prize for her mentoring of women in economics. Roger's students have been innovators in many areas, including regulation, industrial organization, and even in terms of developing risk preference assessment measures, for example, the investment task procedures used by Catherine Eckel and Phil Grossman (2002). A list of former students for whom Roger was a "first reader" is provided in the Appendix. This list omits many others who benefitted from insights and editorial suggestions that Roger provided as a second or third reader.

The articles in this symposium are closely related to Roger's work on regulation and experimental economics. "Risk Aversion and the Winner's Curse" is coauthored by Charles Holt and Roger Sherman and was written while Roger was teaching at the University of Houston. Although the references and motivation have been updated, most of the text was taken directly from the original working paper. The setup involves a situation in which two bidders can observe only half of the value of the object being auctioned, so the common value depends on private information of both bidders. One contribution of this article is to show that overbidding in common value auctions cannot be attributed solely to risk aversion, since the Nash equilibrium for the dual-components model implemented in the experiment is shown to be independent of utility curvature. The article then develops a model of bounded rationality in which bidders do not adjust for the fact that having a winning bid conveys information about other bidders' value estimates. The data from the experiment exhibit a pattern that could only be explained by a combination of risk aversion and the winner's curse. This model builds on the earlier experimental work of Holt and Sherman (1994) on a related concept, the "loser's curse."

The other four articles are inspired by Roger Sherman's extensive work on regulation and optimal pricing. The actual applications to securities, football tickets, health care, and telecommunications discussed in these articles illustrate the broad applicability of insights gleaned from classic work on the regulation of monopoly.

Sanford and Scott examine the pricing problem faced by Southeastern Conference (SEC) athletic departments who sell an array of related products, which are season tickets in alternative locations in their football stadiums. As indicated by the title, "What Are SEC Football Tickets Worth? Evidence from Secondary Market Transactions," the analysis is based on data collected from online resale markets. Ticket resales are typically for specific games and locations, which enables a comparison of the price of season ticket bundles with the sum of resale prices for the component parts for that location. A major issue with optimal pricing in this context relates to the ex ante uncertainty about a team's success as it evolves during the season of play. The article uses online resale data to determine which schools in the SEC do a better job of pricing ticket categories optimally. The authors acknowledge that athletic departments have goals that may be broader than ticket revenue maximization, for example, establishing strong relations with their donor base, and observed differences between optimal and actual pricing can shed light on those objectives.

Eckel and Smith also consider optimal pricing under uncertainty in "The Discriminating Beta: Prices and Capacity with Correlated Demands." When capacity is constrained and congestion-based or time-of-day pricing is not feasible, firms find it useful to manage capacity by charging prices that depend on consumer classifications. In particular, it is optimal to charge lower prices to users with specific demands that are negatively correlated with aggregate demand, in the same way that investors can manage risk by investing in stocks that have negative beta coefficients. The ratio of demand covariance to variance determines a "discriminating beta" that affects the magnitude and sign of the price-discriminating firm's optimal markup for each class of demand. Optimal capacity investment decisions are also influenced by demand correlations across user classes. The insights provided by this theoretical analysis have interesting implications for pricing telecommunications and internet-based products. The authors note that, "This article was inspired by Roger Sherman, who taught us all we know about optimal pricing under uncertainty, and much more."

Gary Fournier presents an empirical analysis of the "certificate of need" process for approval of new hospital services providers in an article entitled "Can Empirical Demand Models Assist in CON Comparative Reviews? A Case Study in Florida." The approach is to use conditional logit models of consumer choice in order to estimate willingness to pay for the services stipulated in competing hospital service applications. The methodology for comparing the estimated welfare effects is illustrated by a specific CON procedure in the state of Florida.

Harris, Hyde, and Wood develop and test a theoretical model of strategic price leadership that enabled the New York Stock Exchange to maintain its dominant position for decades. The article, which is entitled "The Persistence of Dominant Firm Market Share: Raising Rival's Cost on the NYSE," complements much of the earlier, more theoretical work on raising rivals' costs with a cross-section time-series analysis of audit trail data. Roger's contributions are eloquently acknowledged by the authors:

> Roger tenaciously challenged us with substantive questions and shared his deep insight with a delightfully ready wit. He exuded a warmth of collegiality that makes for the best kind of graduate professor, a constant critic yet caring mentor (Harris, Hyde, and Wood 2014, p 91).

In summary, these articles are a fitting tribute to Roger Sherman's rich professional legacy. His impact on his graduate students, coauthors, Virginia and Houston colleagues, and on the Southern Economic Association community will continue to be remembered with respect and admiration.

Charles A. Holt, University of Virginia and Catherine C. Eckel, Texas A&M University

Appendix: University of Virginia Dissertations Supervised by Roger Sherman (as a First Reader), Listed by Completion Date

James C. Miller III. Scheduling and airline efficiency, 1969. Miller served in the Reagan administration as Commissioner of the Federal Trade Commission and Director of the Office of Management and Budget, and is currently a Senior Advisor to Husch Blackwell LLP.

Victoria Dailey. The certificate effect: Federal entry control and the growth of motor common carrier firms. 1973. Dailey is currently President of the McLemore Avenue Foundation, Alexandria.

Anthony George. Second-best pricing and the U.S. Postal Service. 1974. George has worked at the Texas Energy Advisory Council.

Eugene William Johnson. A model of slow adjustment to relative price differences in the urban housing market. 1974. Johnson was professor at Shephard University for 36 years. Deceased.

William A. McEachern. Management control and performance. 1975 (published by D. C. Heath). McEachern was Professor, University of Connecticut, until his retirement in 2000. He also authored a successful economics textbook.

Michael Visscher. Time in the supply of goods. 1975. Visscher served as an Assistant Professor at Ohio State and Carnegie-Mellon, where he was a reader on Holt's 1979 doctoral dissertation. Deceased.

Robert Wuertz. Risk, dividends and the cost of capital. 1975. Wuertz has had a long career in international diplomacy and is currently serving as the Mission Director in Macedonia for USAID.

Robert M. Feinberg. Theoretical implications and empirical tests of the job search theory. 1976 (published by Garland Press). Feinberg is currently Professor of Economics at American University, and he has served in the International Trade Commission and the Antitrust Division of the Department of Justice, and is a co-editor of the *Southern Economic Journal.*

Vladi Catto. An empirical determination of effects of market power on performance. 1977. Catto is currently retired from Texas Instruments, where he served as Chief Economist.

A. H. ("Andy") Barnett. Taxation for the control of externalities. 1978. Barnett is Professor Emeritus at Auburn University and is currently a Professor at American University of Sharjah.

Frederick Woodhull Jones. *An Empirical Test of Input Efficiency in the Regulated Electric Utilities,* 1978, (published by Garland Press in the Outstanding Dissertations in Economics series). He started his career as an assistant professor at the University of Wisconsin-Parkside, and subsequently worked as a forecaster and manager for AT&T until retirement.

Gerald Bodisch. Industry concentration and employment fluctuation. 1979. Bodisch served as Economist at U.S. Department of Justice, Antitrust Division.

Frank Scott. An economic analysis of fuel adjustment clauses. 1979. Scott is currently Gatton Professor of Economics at the University of Kentucky.

David L. Baumer. Federal regulation of the dairy industry: Costs, benefits and legal constraints. 1980. Baumer is currently Professor and department head at North Carolina State University.

William C. Wood. Nuclear liability, nuclear safety and economic efficiency. 1980 (published by JAI Press). Wood is Professor of Economics and Director of Center for Economic Education at James Madison University.

Gary M. Fournier. The determinants of economic rents in television broadcasting. 1981. Fournier is currently Professor of Economics at Florida State University.

Frederick H. deB. Harris. Structure-performance hypotheses with decision making under risk: A market-value-maximizing approach. 1981. Harris is McKinnon Professor of Economics and Finance, Wake Forrest University.

Catherine C. Eckel. Customer class pricing by electric utilities. 1983. Eckel has taught at the University of British Columbia, Virginia Tech, University of Texas (Dallas). She is currently Sara and John Lindsay Professor in Liberal Arts and directs the Behavioral Economics and Policy Program at Texas A&M University.

David A. Lereah. Information problems and regulation in insurance markets.1983 (published by Praeger). Lereah has served as the Chief Economist for the National Association of Realtors and as the Executive Vice President of Move, Inc. and is currently President of Reecon Advisors, Inc.

Bruce Johnson. Regulation of the intercity bus industry: A comparison of the public interest theory and the economic theory of regulations. 1984. Johnson is currently James Graham Brown Professor of Economics, Centre College. He has returned to the University of Virginia to teach a popular Sports Economics course on a regular basis.

Jeffrey Eisenach. Auto insurance ratemaking under antitrust immunity. 1985. Eisenach has served in senior positions in the Federal Trade Commission and the Office of Management and Budget and, more recently, as Managing Director, Navigant Economics.

John Mullahy. Cigarette smoking: Habits, health concerns and heterogeneous unobservables in a microeconometric analysis of consumer demand. 1985. Mullahy is currently Professor of Population Health Sciences at the University of Wisconsin, Madison, and is a co-editor of *Health Economics*.

Mary Patricia Clifford. An econometric analysis of merit pay for teachers. 1987. Clifford has served on the Florida Public Service Commission.

Walter D. Strack. Productivity, technological change, and regulatory reform in the interstate trucking industry: General freight carriers from 1974 to 1982. 1987. Strack is currently Assistant Bureau Chief and Chief Economist, International Bureau, U.S. Federal Communications Commission.

Michael R. Kehoe. The choice of format and advertising time in radio broadcasting. 1989. Kehoe started his career as an Assistant Professor of Agricultural Economics at Montana State University.

David C. Huffman. Community influence over the pattern of firm location. 1990. Huffman is Associate Professor of Economics, Bridgewater College.

Richard Shipe. Cost and productivity in the U.S. urban bus transit sector, 1978–1989. 1992. Shipe is currently Professor, National Defense University, Dwight D. Eisenhower School for National Security and Resource Strategy.

Zhenhui Xu. Essays on the economy of China in the 1980's. 1993. Xu is currently Professor of Economics, Georgia College and State University.

R. David Mullin. Enhancing taxpayer compliance: Experimental evidence on alternative policies. 1993. Mullin has taught at Marietta College, the U.S. Air Force Academy, the University of Colorado at Colorado Springs, and is President of MarketLion.

Roger Rodriguez. The purchase of power by rate-of-return regulated electric utilities. 1996. Rodriguez has worked for J.W. Wilson Consulting, Washington, D.C.

References

Eckel, Catherine C., and Philip J. Grossman. 2002. Sex differences and statistical stereotyping in attitudes towards financial risk. *Evolution and Human Behavior* 23:281–95.

Harris, Frederick H. deB., Adam S. Hyde, and Robert A. Wood. 2014. The Persistence of Dominant-Firm Market Share: Raising Rivals' Cost on the New York Stock Exchange. *Southern Economic Journal* 81(1):91–112.

Holt, Charles A., and Roger Sherman. 1994. The loser's curse. *American Economic Review* 84:642–52.

Holt, Charles A., and Susan K. Laury. 2014. Assessment and estimation of risk preferences. In *Handbook of the economics of risk and uncertainty,* chapter 4, volume 1, edited by M. Machina and K. Viscusi. Oxford: North Holland, pp. 135–201.

Sherman, Roger. 1967. Individual attitude toward risk and choice between prisoner's dilemma games. *Journal of Psychology: Interdisciplinary and Applied* 66:291–8.

Sherman, Roger. 1972. *Oligopoly*. Lexington, MA: Lexington Books.

Sherman, Roger. 1974. *The economics of industry*. Boston: Little, Brown and Company.

Sherman, Roger. 1978. *Antitrust policies and issues*. Boston: Addison-Wesley Publishing Company.

Sherman, Roger. 1989. *The regulation of monopoly*. New York: Cambridge University Press.

Sherman, Roger. 2008. *Market regulation*. Boston: Addison-Wesley Publishing Company.

Sherman, Roger, ed. 1980. *Perspectives on postal service issues*. Washington: American Enterprise Institute.

Sherman, Roger, and Thomas D. Willett. 1967. Potential entrants discourage entry. *Journal of Political Economy* 75:400–3.

Wallach, M., and N. Kogan. 1961. Aspects of judgment and decision making: Interrelationships and changes with age. *Behavioral Science* 6:23–36.