

J. ERIC BICKEL

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EDUCATION

- 1994–1999** **Stanford University**, Stanford, California.
Ph.D., Department of Engineering-Economic Systems, June 1999.
Coursework emphasized decision analysis, probability, optimization, dynamic systems and control, economics, and applications to business and public policy.
Principal Advisor: Ronald A. Howard (Ramsey Medalist, NAE Member).
Thesis: The Corporate Contractual System and Normative Corporate Risk Attitude.
Reading Committee: Ronald A. Howard, James E. Smith, John Weyant, Blake Johnson.
- 1993–1994** **Stanford University**, Stanford, California.
M.S., Department of Engineering-Economic Systems, June 1994.
- 1988–1992** **New Mexico State University**, Las Cruces, New Mexico.
B.S., with Honors, Department of Mechanical Engineering, December 1992.
Minor: Economics.

PROFESSIONAL EXPERIENCE

- 2008–Present** **The University of Texas at Austin**, Austin, Texas.
Assistant Professor, Graduate Program in Operations Research.
Assistant Professor, Petroleum and Geosystems Engineering.
Assistant Professor, Energy and Earth Resources Graduate Program.
Assistant Professor, Division of Statistics and Scientific Computing.
Fellow, Center for International Energy and Environmental Policy.
Fellow, Center for Petroleum Asset Risk Management.
Research Focus: Decision analysis, modeling of probabilistic dependence, copulas and maximum entropy, auditing and scoring of expert forecasts, corporate and individual risk preference, value of information, applications of decision analysis to business and public policy—especially oil and gas exploration and climate/energy policy, applications of decision analysis to strategy in sport.
Teaching Focus: Decision analysis, real options, probability, engineering finance.
- 2011–Present** **Strategic Decision and Risk Management Certificate Program (SDRM), Stanford University and The University of Texas**, Houston, Texas and Palo Alto, California.
Instructor, Decision Quality and Decision Leadership.
Executive Education: SDRM is a certificate program offered by Stanford University. In 2011, I arranged a joint offering between The University of Texas and Stanford University. The courses were offered at the Federal Reserve Bank in Houston and attended by energy executives from around the world.
- 2004–2008** **Texas A&M University**, College Station, Texas.
Assistant Professor, Department of Industrial and Systems Engineering.

1995–Present Strategic Decisions Group (SDG), Houston, Texas and Palo Alto, California.

Senior Engagement Manager & Co-Leader, Executive Client Education (1995–2004).
Outside Consultant (2004–Present).

Focus: Worked primarily with senior executives to apply decision and risk analysis techniques to the most important decisions facing some of the world’s largest corporations.

Industry Experience (North America, South America, Europe, and Asia): Fortune 100 companies in upstream oil and gas (exploration, development, and production), energy trading and marketing, power (generation, transmission, and delivery), financial services, metals and mining, chemicals (commodity and specialty), life sciences (pharmaceuticals, biotech, and medical devices), agriculture, building services, printing and publishing, and packaging.

Professional Services: Decision and risk analysis, real options, corporate/business unit/asset strategy, R&D portfolio management, economic valuation, stochastic price forecasting, financial engineering, and decision analysis training.

Executive Education: Trained hundreds of consultants and executives charged with strategic decision making.

1995–Present Competitive Edge Decision Systems, Austin, Texas

President and Founder.

Established, developed, and managed enterprise designed to market proprietary baseball/softball decision support and data-mining software (ChartMine®). Originally developed for Stanford baseball. Used by over 300 collegiate baseball and softball teams. Also used by ESPN. Named top product by Collegiate Baseball Newspaper for three consecutive years. Featured on TechTV.

1994–1999 Stanford University, Stanford, California.

Decision Analysis Program, Lead Teaching Assistant (1996-1998), TA (1999).
Energy Modeling Forum (EMF), Research Assistant, Climate Change (1994-1995).

1994 Pacific Northwest Laboratories, Richland, Washington (Summer).

Decision & Risk Analysis Group, Associated Western Universities Fellowship.

1991–1993 Sandia National Laboratories, Livermore, California (Summer and Co-op).

Internal Combustion Engines Department, Outstanding Student Summer Program and Associated Western Universities Fellowship.

1989–1990 Sandia National Laboratories, Albuquerque, New Mexico (Summers).

Intelligent Systems Department, Outstanding Student Summer Program.

PUBLICATIONS

1. Bickel, J. Eric and Shubham Agrawal. 2011. “Reconsidering the Economics of Aerosol Geoengineering.” Under Review at *Climatic Change* (revise and resubmit).
2. Zan, Kun and J. Eric Bickel. 2011. “Properties of Portfolio Value of Information.” Under Review at *Decision Analysis* (revise and resubmit).
3. Bickel, J. Eric. 2011. “Discretization, Simulation, and the Value of Information.” Under Review at *SPE Economics & Management* (revise and resubmit).
4. Montiel, Luis V. and J. Eric Bickel. 2011. “Optimal Sequential Exploration: Approximations and Robustness.” Under review at *Management Science*.

5. Montiel, Luis V. and J. Eric Bickel. 2011. "A New Approach to Decision Making with Partial Information." Under review at *Operations Research*.
6. Montiel, Luis V. and J. Eric Bickel. 2011. "Generating a Random Collection of Discrete Joint Probability Distributions Subject to Partial Information." Under review at *Methodology and Computing in Applied Probability*.
7. Bickel, J. Eric. 2011. "The Economics of Using Climate Engineering to Manage the Risk of Tipping Points in the Climate System." Under review at *Socio-Economic Planning Sciences*.
8. Keller, L. Robin, Ali Abbas, J. Eric Bickel, et al. 2011. "From the Editors: Probability Scoring Rules, Ambiguity, Multiattribute Terrorist Utility, and Sensitivity Analysis." *Decision Analysis* **8**(4) 251-255.
9. Bickel, J. Eric, Eric Floehr, and Seong-Dae Kim. 2011. "Comparing NWS POP Forecasts to Third-Party Providers." *Monthly Weather Review* **139**(11) 3304-3321.
10. Bickel, J. Eric, Larry W. Lake, and John Lehman. 2011. "Discretization, Simulation, and Swanson's (Inaccurate) Mean." *SPE Economics & Management* **3**(3) 128-140. SPE-148542-PA.
11. Bickel, J. Eric. 2011. "Scoring Rules and Decision Analysis Education." *Decision Analysis* **7**(4) 346-357.
12. Kim, Seong-Dae and J. Eric Bickel. 2010. "Roads or Radar: The Tradeoff between Investments in Infrastructure and Forecasting when Facing Hurricane Risk." *IEEE Systems Journal* **4**(3) 363-375.
13. Bratvold, Reidar, J. Eric Bickel, and Hans Petter Lohne. 2009. "Value of Information in the Oil and Gas Industry: Past, Present, and Future." *SPE Reservoir Evaluation and Engineering* **12**(4) 630-638.
14. Bickel, J. Eric. 2009. "On the Decision to Take a Pitch." *Decision Analysis* **6**(3) 186-193.
15. Bickel, J. Eric and Reidar Bratvold. 2008. "From Uncertainty Quantification to Decision Making in the Oil and Gas Industry." *Journal of Energy Exploration and Exploitation* **26**(5) 311-325.
16. Bickel, J. Eric and Seong-Dae Kim. 2008. "Verification of The Weather Channel Probability of Precipitation Forecasts." *Monthly Weather Review* **136**(12) 4867-4881.
17. Bickel, J. Eric, Richard L. Gibson, Duane A. McVay, Stephen Pickering, and John Waggoner. 2008. "Quantifying 3D Land Seismic Reliability and Value." *SPE Reservoir Evaluation and Engineering* **11**(5) 832-841.
18. Bickel, J. Eric. 2008. "The Relationship between Perfect and Imperfect Information in a Risk-Sensitive Two-Action Problem." *Decision Analysis* **5**(3) 116-128.
19. Bickel, J. Eric, James E. Smith, and Jennifer L. Meyer. 2008. "Modeling Dependence among Geologic Risks in Sequential Exploration Decisions." *SPE Reservoir Evaluation and Engineering* **11**(2) 352-361.
20. Bickel, J. Eric. 2007. "Some Comparisons among Quadratic, Spherical, and Logarithmic Scoring Rules." *Decision Analysis* **4**(2) 49-65.
21. Bickel, J. Eric. 2006. "Some Determinants of Corporate Risk Aversion." *Decision Analysis* **3**(4) 233-251.
22. Bickel, J. Eric and James E. Smith. 2006. "Optimal Sequential Exploration: A Binary Learning Model." *Decision Analysis* **3**(1) 16-32.
23. Pickering, Steve and J. Eric Bickel. 2006. "The Value of Seismic Information." *Oil and Gas Financial Journal* **3**(5) 26-33.
24. Bickel, J. Eric. 2004. "Teaching Decision Making with Baseball Examples." *INFORMS Transactions on Education* **5**(1).
25. Bickel, J. Eric. 2004. "New Insights into an Old Statistic: Why it is so Hard to Hit .400." *The Baseball Research Journal* **32** 15-21.

26. Bickel, J. Eric and Dean A. Stotz. 2003. "Batting Average by Count and Pitch Type: Fact and Fallacy." *The Baseball Research Journal* **31** 29-34.

BOOK CHAPTERS

1. Bickel, J. Eric and Lee Lane. 2012. "Climate Engineering: Climate Engineering Research." Under review as part of the Copenhagen Consensus 2012 led by Bjørn Lomborg. Expert panel: Finn Kydland (Nobel Laureate), Robert Mundell (Nobel Laureate), Thomas Schelling (Nobel Laureate), Vernon Smith (Nobel Laureate), and Nancy Stokey. Under review.
2. Bickel, J. Eric, James E. Smith, and Jennifer L. Meyer. 2011. "Modeling Dependence among Geologic Risks in Sequential Exploration Decisions." *Decision Analysis in E&P*. Society of Petroleum Engineers, Richardson, Texas.
3. Bratvold, Reidar, J. Eric Bickel, and Hans Petter Lohne. 2011. "Value of Information in the Oil and Gas Industry: Past, Present, and Future." *Decision Analysis in E&P*. Society of Petroleum Engineers, Richardson, Texas.
4. Bickel, J. Eric, Richard L. Gibson, Duane A. McVay, Stephen Pickering, and John Waggoner. 2011. "Quantifying 3D Land Seismic Reliability and Value." *Decision Analysis in E&P*. Society of Petroleum Engineers, Richardson, Texas.
5. Bickel, J. Eric and Lee Lane. 2010. "Climate Engineering." In: *Smart Solutions for Climate Change: Comparing Costs and Benefits*, Bjørn Lomborg (ed.). Cambridge University Press: Cambridge, UK.
 - a. This work was part of the Copenhagen Consensus on Climate Project. The Copenhagen Consensus Center (CCC) has been named by the University of Pennsylvania as one of the top-10 think tanks in the world. <http://www.gotothinktank.com/>
 - b. The CCC is directed by Bjørn Lomborg, who has been named one of the 100 Top Global Thinkers by *Foreign Policy*, one of the world's 75 most influential people by *Esquire*, and one of 50 people who could save the planet by the *UK Guardian*.
 - c. Our research was ranked first by an expert panel comprised of Jagdish Bhagwati, Finn Kydland (Nobel Laureate), Thomas Schelling (Nobel Laureate), Vernon Smith (Nobel Laureate), and Nancy Stokey. <http://fixtheclimate.com/#/component-1/the-result-prioritization/>

TECHNICAL REPORTS

1. Bickel, J. Eric. 2010. "The Climate Engineering Option: Economics and Policy Implications." American Enterprise Institute for Public Policy Research.
2. Bickel, J. Eric and Lee Lane. 2009. "An Analysis of Climate Engineering as a Response to Climate Change." In: *Copenhagen Consensus Recommendations for COP-15*, Bjørn Lomborg (ed.). Cambridge University Press: Cambridge, UK.
3. Lane, Lee and J. Eric Bickel. 2009. "Solar Radiation Management and Rethinking the Goals of COP-15." In: Lane, Lee, J. Eric Bickel, Isabel Galiana, Chris Green, and Valentina Bosetti, Introduction by Bjørn Lomborg, *Copenhagen Consensus on Climate: Advice for Policy Makers*. <http://fixtheclimate.com/>

DOCUMENTARY APPERANCES / INTERVIEWS

1. Allen, Max. March 19, 2012. "Demon Coal." CBC Radio One. Canada.
2. List, Barry. January 14, 2011. "Will Geoengineering Rescue Us from Climate Change?" INFORMS Podcast. <http://www.scienceofbetter.org/podcast/bickel.html>
3. *Cool It*. 2010. Directed by Ondi Timoner. Distributed by Roadside Attractions and 1019 Entertainment. Based on the book by Bjørn Lomborg. My research into geoengineering is prominently featured. I make a brief appearance in the film, as does my co-author, Lee Lane.

4. Mantle, Larry. August 18, 2009. "Air conditioning for Earth." Interviewed on *Air Talk*, *National Public Radio*. USA.

SAMPLING OF MEDIA MENTIONS

1. Furchtgott-Roth, Diana. December 1, 2011. "There's No Appetite for Kaoyo II." *Real Clear Markets*. http://www.realclearmarkets.com/articles/2011/12/01/theres_no_appetite_for_kyoto_ii_99397.html
2. Lomborg, Bjorn. August, 28, 2009. "Technology Can Fight Global Warming." *Wall Street Journal*. USA.
3. Tierney, John. August 19, 2009. "The Horror of Climate Engineering?" *New York Times*. USA.
4. Walsh, Bryan. August 18, 2009. "Can Geoengineering Help Slow Global Warming?" *Time Magazine*. USA.
5. Tierney, John. August 10, 2009. "The Earth Is Warming? Adjust the Thermostat." *New York Times*. USA.
6. Witze, Alexandra. August 7, 2009. "Geoengineering Schemes under Scrutiny." *Nature News*. USA.
7. van Loon, Jeremy and Christian Wienberg. August 7, 2009. "Ships Spraying Sea Water May Offer Climate Quick Fix." *Bloomberg*. USA.
8. Harvey, Fiona. August 7, 2009. "Study Calls for Cheaper Options to Cut Emissions." *Financial Times*. United Kingdom.
9. Webster, Ben. August 7, 2009. "Cloud Ships on Course to Beat Climate Change, Says Copenhagen Study." *The Times*. United Kingdom.
10. Staff. August 7, 2009. "Cloud Ship Scheme to Deflect the Sun's Rays is a Favourite to Cut Global Warming." *The Telegraph*. United Kingdom.
11. Robson, David. February 6, 2009. "How Good are The Weather Channel's Predictions?" *Short Sharp Science*. <http://www.newscientist.com/blogs/shortsharpscience/2009/02/how-good-are-the-weather-chann.html>

CONFERENCE PROCEEDINGS

1. Gong, X., D. A. McVay, J. E. Bickel, and L. Montiel. 2011. "Integrated Reservoir and Decision Modeling To Optimize Northern Barnett Shale Development Strategies." Paper CSUG/SPE 149459 presented at the Canadian Unconventional Resources & International Petroleum Conference, Calgary, Alberta, Canada, 15-17 November.
2. Bickel, J. Eric. 2011. "Discretization, Simulation, and the Value of Information." Paper SPE 145690 presented at the SPE Annual Technical Conference and Exhibition, Denver, Colorado, 30 October – 02 November.
3. Bickel, J. Eric and Luis Montiel. 2011. "Accuracy of Multivariate Discrete Distribution Approximations." Grant # 0954371 presented at the NSF CMMI Research and Innovation Conference, Atlanta, Georgia, 5-7 January.
4. Bickel, J. Eric and Kun Zan. 2011. "Portfolio Value of Information: Model and Properties." Grant # 090774 presented at the NSF CMMI Research and Innovation Conference, Atlanta, Georgia, 5-7 January.
5. Turkarslan, G., D. A. McVay, J. E. Bickel, L. Montiel, and R. Ortiz. 2010. "Integrated Reservoir and Decision Modeling to Optimize Spacing in Unconventional Gas Reservoirs." Paper CSUG/SPE 137816 presented at the Canadian Unconventional Resources & International Petroleum Conference, Calgary, Alberta, Canada, 19-21 October.
6. Bickel, J. Eric, Eric Floehr, and Seong-Dae Kim. 2010. "Comparing NWS POP Forecasts to Third-Party Providers." Paper AMS 161669, presented at the 20th Conference on Probability and Statistics, 90th American Meteorological Society Annual Meeting, Atlanta, Georgia, 18 January.

7. Bickel, J. Eric. 2009. "Experiential Learning and Strictly Proper Scoring Rules." ASEE Annual Conference, Paper AC 2009-2249, Austin, TX, 17 June.
8. Bickel, J. Eric and Kun Zan. 2009. "Resource Allocation and the Value of Information." Grant # 090774 presented at the NSF CMMI Research and Innovation Conference, Honolulu, Hawaii, 25-29 June.
9. Yu, O.-Y, S. D. Guikema, J. E. Bickel, J.-L. Briaud, and D. B. Burnett. 2009. "Systems Approach and Quantitative Decision Tools for Technology Selection in Environmentally Friendly Drilling." paper SPE 120848 presented at the SPE Environmental & Safety Conference, San Antonio, Texas, 23-25 March.
10. Arcos, D., D. Zhu, and E. Bickel. 2008. "Technical, Economic and Risk Analysis for a Multilateral Well." Paper SPE 115099 presented at the SPE Russian Oil and Gas Technical Conference and Exhibition, Moscow, Russia, 28-30 October.
11. Kim, Seong-Dae and J. Eric Bickel. 2008. "Roads or Radar: Investing in Infrastructure or Improved Forecasting in the Face of Tropical Cyclone Risk." 28th Conference on Hurricanes and Tropical Meteorology, Orlando, Florida, 28 April – 02 May.
12. Bickel, J. Eric and Seong-Dae Kim. 2008. "Verification of The Weather Channel Probability of Precipitation Forecasts." Presented at the 19th Conference on Probability and Statistics, 88th American Meteorological Society Annual Meeting, New Orleans, Louisiana, 23 January.
13. Bickel, J. Eric and Reidar Bratvold. 2007. "Decision-Making in the Oil & Gas Industry – From Blissful Ignorance to Uncertainty Induced Confusion." Paper SPE 109610 presented at the SPE Annual Technical Conference and Exhibition, Anaheim, California, 11-14 November.
14. Bratvold, Reidar, J. Eric Bickel, and Han Petter Lohne. 2007. "Value of Information in the Oil and Gas Industry: Past, Present, and Future." Paper SPE 110378 presented at the SPE Annual Technical Conference and Exhibition, Anaheim, California, 11-14 November.
15. Kim, Seong-Dae and J. Eric Bickel. 2007. "Roads or Radar: Investing in Infrastructure or Improved Forecasting in the Face of Hurricane Risk." *Proceedings of the 44th Annual Meeting of the Society of Engineering Science*, Texas A&M University, College Station, Texas, 21-24 October.
16. Gibson, Rick, J. Eric Bickel, Duane McVay, and Steve Pickering. 2007. "Model-Based Uncertainty Quantification and Seismic Information Value." *SEG Technical Program Expanded Abstracts* **26**(1) 71-75.
17. Bickel, J. Eric, James E. Smith, and Jennifer L. Meyer. 2006. "Modeling Dependence among Geologic Risks in Sequential Exploration Decisions." Paper SPE 102369 presented at the SPE Annual Technical Conference and Exhibition, San Antonio, Texas, 24-27 September.
18. Bickel, J. Eric, Richard L. Gibson, Duane A. McVay, Stephen Pickering, and John Waggoner. 2006. "Quantifying 3D Land Seismic Reliability and Value." Paper SPE 102340 presented at the SPE Annual Technical Conference and Exhibition, San Antonio, Texas, 24-27 September.
19. Bickel, J. Eric, Rick Gibson, Duane McVay, Steve Pickering, and John Waggoner. 2006. "Value of Seismic with Multiple Drilling Targets." *EAGE Expanded Abstracts*, B012.

RESEARCH GRANTS

- 2012 "Decision Support and Risk Reduction in the Gulf of Mexico and Frontier Areas," \$1,671,386. J. Eric Bickel (PI, 64%), Øystein Arild (Co-PI), Reidar Bratvold (Co-PI), and Jason Merrick (Co-PI). Under review at the Gulf of Mexico Research Initiative.
- "Hunting Black Swans: Elicitation methods for low probability, high-impact events," \$435,000. Matthew Walsh (PI), Steve Begg (Co-PI), Reidar Bratvold (Co-PI), J. Eric Bickel (Co-PI, 25%). Under review at the Australian Research Council.

- “Value of Monitoring Technologies in Carbon Capture and Storage,” \$44,560, 1 year, BP and The Carbon Capture Project. J. Eric Bickel (PI, 100%). In contracting.
- 2010 “CAREER: Accurate and Efficient Modeling of Probabilistic Dependence and Its Impact on Decision Making under Uncertainty,” \$400,000, 5 years, The National Science Foundation (SES-0954371). J. Eric Bickel (PI, 100%).
- 2009 “Graduate School Diversity Mentoring Fellowship,” \$24,000, 1 year, The University of Texas at Austin. J. Eric Bickel (PI, 100%).
- “Summer Research Assignment,” \$25,000, 2 months, University of Texas, J. Eric Bickel (PI, 100%).
- “Developing Comprehensive Risk Assessment Frameworks for Geological Storage of CO₂,” \$1,996,132, 3 years, DOE-NETL, Ian Duncan (PI), Jean P. Nicot, Changbing Yang, J. Eric Bickel (co-PI, 15%).
- 2008 “Optimizing Development Strategies to Increase Reserves in Unconventional Gas Reservoirs,” \$395,000 (in addition: \$80,000 in industry cost sharing from Unconventional Gas Resources Canada Operating Inc. and Pioneer Natural Resources Co.), 2 years, Research Partnership to Secure Energy for America (DOE, Grant # 07122-35). Duane McVay (PI) and J. Eric Bickel (Co-PI, 38%).
- “SGER: Resource Allocation and the Value of Information,” \$120,000, 2 years, The National Science Foundation (SES-0907794). J. Eric Bickel (PI, 100%).
- 2006 “Quantifying the Value of Seismic Information: Phase 2,” Schlumberger, \$125,000. J. Eric Bickel (PI, 60%), Duane McVay, and Richard Gibson.
- 2005 “Quantifying the Value of Seismic Information,” Schlumberger, \$50,000. J. Eric Bickel (PI, 60%), Duane McVay, and Richard Gibson.
- “Pathways to Doctorate Program,” Texas A&M University, \$25,000. J. Eric Bickel (PI, 100%).
- 2004 “Copulas and Energy Commodity Pricing,” Suez Energy North America, \$15,000. J. Eric Bickel (PI, 100%).

WORK IN PROGRESS

1. Bickel, J. Eric and Dan Bonevac. “The Ethics of Geoengineering.”
2. Bickel, J. Eric and Tianyang Wang. “The Importance of Dependence.”
3. Bickel, J. Eric and Luis Montiel. “The Accuracy of Maximum Entropy Approximations.”
4. Bickel J. Eric and Kun Zan. “Value of Information and Two-Action Problems.”
5. Bickel, J. Eric and Robert Hammond. “The Decision Relevance of Stochastic Price Models.”
6. Bickel, J. Eric. “Strictly Proper Scoring Rules and the Measurement of Uncertainty.”
7. Bickel, J. Eric and Seong-Dae Kim. “Calibration: An Investigation of Major League Baseball Betting Markets.”

INVITED LECTURES

1. Bickel, J. Eric. 2012. “Climate Change and Climate Engineering.” Rice University, Jones Graduate School of Business, 28 March.
2. Bickel, J. Eric. 2011. “Discretization, Simulation, and Swanson’s (Inaccurate) Mean.” Society of Decision Professionals, Webinar, 14 September.
3. Bickel, J. Eric. 2011. “Modeling of Probabilistic Dependence.” IBM Research, Watson Research Center, 04 February.

4. Bickel, J. Eric. 2010. "The Climate Engineering Option." IOE Department, University of Michigan, Ann Arbor, Michigan, 22 September.
5. Bickel, J. Eric. 2010. "Climate Engineering as a Response to Climate Change." The Future of the Electricity Industry, Austin, Texas, 10 June.
6. Bickel, J. Eric. 2010. "The Geoengineering Option: Economics and Policy Implications." The American Enterprise Institute for Public Policy Research, Washington, DC, 24 February. Representative Bart Gordon (D-Tennessee), Chairman of the House Committee on Science and Technology, provided introductory comments. <http://www.aei.org/event/100207>
7. Bickel, J. Eric and Lee Lane. 2009. "Climate Engineering as a Response to Climate Change." Copenhagen Consensus on Climate Change, Washington, DC, 02 September. Presentation to expert panel comprised of Jagdish Bhagwati, Finn Kydland (Nobel Laureate), Thomas Schelling (Nobel Laureate), Vernon Smith (Nobel Laureate), and Nancy Stokey. <http://fixtheclimate.com/copenhagen-consensus-on-climate/>
8. Bickel, J. Eric. 2008. "Value of Information Demonstration." SPE ATW – Probabilistic Subsurface Assessments, Houston, Texas, 10-11 November.
9. Bickel, J. Eric. 2008. "Uncertainty Quantification and Value of Information; Why we do what we do." Marathon Oil, Subsurface Forum, Houston, Texas, 23 October.
10. Bickel, J. Eric. 2008. "Unlocking the Value of Seismic Information." SPE 2008 Digital Energy Conference, Houston, Texas, 20 May.
11. Bickel, J. Eric. 2007. "Value of Information: Theory and Practice." Graziadio School of Business Management, Pepperdine University, Malibu, California, 13 November.
12. Bickel, J. Eric. 2007. "Some Comparisons among Quadratic, Spherical, and Logarithmic Scoring Rules." Operations Research / Industrial Engineering Group, University of Texas, 26 October.
13. Bickel, J. Eric. 2007. "Quantifying 3D Land Seismic Reliability and Value." Department of Petroleum and Geosystems Engineering, University of Texas at Austin, 17 September.
14. Bickel, J. Eric. 2007. "Value of Information." Eni Exploration and Production, Eni Corporate University, Milan, Italy, 25-27 June.
15. Bickel, J. Eric. 2007. "Decision-Focused Profit Predication." SPE Forum – The Future of Profit Prediction, Colorado Springs, Colorado, 4-8 June.
16. Bickel, J.E., R.L. Gibson, D.A. McVay, S. Pickering, and J. Waggoner. 2006. "Quantifying 3D Land Seismic Reliability and Value." Houston SPE Reservoir Study Group, Houston, Texas, 24 October.
17. Bickel, J. Eric. 2006. "Optimal Sequential Exploration." McCombs School of Business, University of Texas at Austin, 5 May.
18. Bickel, J. Eric. 2005. "Optimal Sequential Exploration." Optimization Technology Group, ExxonMobil Research, Houston, Texas, 19 August.
19. Bickel, J. Eric. 2005. "Optimal Sequential Exploration." National Infrastructure Simulation and Analysis Center (NISAC), Sandia National Laboratories, Albuquerque, New Mexico, 27 June.

CONFERENCE PRESENTATIONS

1. Bickel, J. Eric. 2011. "Discretization, Simulation, and Swanson's (Inaccurate) Mean." DAAG Annual Conference, 21-22 April.
2. Bickel, J. Eric. 2010. "Normative Corporate Risk Aversion." INFORMS Annual Conference, Decision Analysis Track, Austin, Texas, 9 November.
3. Bickel, J. Eric and Arjun Ramakrishnan. 2010. "Discretization and Value of Information." INFORMS Annual Conference, Decision Analysis Track, Austin, Texas, 6 November.

4. Bickel, J. Eric, Eric Floehr, and Seong-Dae Kim. 2010. "Comparing NWS POP Forecasts to Third-Party Providers." 20th Conference on Probability and Statistics, 90th American Meteorological Society Annual Meeting, Atlanta, Georgia, 18 January.
5. Bickel, J. Eric. 2009. "Geoengineering: Costs, Benefits and Risks." INFORMS Annual Conference, Decision Analysis Track, San Diego, California, 14 October.
6. Bickel, J. Eric. 2009. "The Relationship between Perfect and Imperfect Information in a Risk-Sensitive Two-Action Problem." INFORMS Annual Conference, Decision Analysis Track, San Diego, California, 13 October.
7. Kim, Seong-Dae and J. Eric Bickel. 2008. "Tradeoff between Investments in Infrastructure and Forecasting in the Face of Hurricane Risk." INFORMS Annual Conference, Decision Analysis Track, Washington, DC, 14 October.
8. Bickel, J. Eric. 2008. "Strictly Proper Scoring Rules Theory and Practice." INFORMS Annual Conference, Decision Analysis Track, Washington, DC, 14 October.
9. Bickel, J. Eric and Eric Floehr. 2008. "Calibration of Probability of Precipitation Forecasts." INFORMS Annual Conference, Decision Analysis Track, Washington, DC, 14 October.
10. Bickel, J. Eric and Seong-Dae Kim. 2008. "Verification of The Weather Channel Probability of Precipitation Forecasts." 19th Conference on Probability and Statistics, 88th American Meteorological Society Annual Meeting, New Orleans, Louisiana, 23 January.
11. Bickel, J. Eric and Reidar Bratvold. 2007. "Decision-Making in the Oil & Gas Industry – From Blissful Ignorance to Uncertainty Induced Confusion." SPE Annual Technical Conference and Exhibition, Anaheim, California, 11-14 November.
12. Bratvold, Reidar, J. Eric Bickel, and Han Petter Lohne. 2007. "Value of Information in the Oil and Gas Industry: Past, Present, and Future." SPE Annual Technical Conference and Exhibition, Anaheim, California, 11-14 November.
13. Bickel, J. Eric. 2007. "Strictly Proper Scoring Rules and the Measurement of Uncertainty." INFORMS Annual Conference, Decision Analysis Track, Seattle, Washington, 6 November.
14. Bickel, J. Eric. 2007. "Decision Education for All." INFORMS Annual Conference, Decision Analysis Track, Seattle, Washington, 5 November.
15. Gibson, Rick, J. Eric Bickel, Duane McVay, and Steve Pickering. 2007. "Model-Based Uncertainty Quantification and Seismic Information Value." SEG Annual Meeting, San Antonio, Texas, 23-28 September.
16. Bickel, J. Eric. 2007. "Applying OR across the Baseball Decision Hierarchy." Symposium on Statistics and Operations Research in Baseball, Hayward, California, 11 July 2007.
17. Bickel, J. Eric. 2007. "Value of Information: From Theory to Practice." INFORMS 2007 Conference on OR Practice, Vancouver, British Columbia, Canada, 30 April – 01 May 2007.
18. Pickering, Stephen, J. Eric Bickel, Richard L. Gibson, and Duane A. McVay. 2007. "Measuring the Value of Seismic Information in E&P Workflows." Petrotech 2007. New Delhi, India, 15-19 January.
19. Pickering, Stephen, J. Eric Bickel, Richard L. Gibson, and Duane A. McVay. 2006. "The Value of Seismic Information." PETEX 2006. London, United Kingdom, 21-23 November.
20. Bickel, J. Eric. 2006. "ChartMine[®]: Using Decision Theory and Data Mining to Improve On-Field Baseball Decision Making." 2006 INFORMS Annual Conference, Pittsburgh, Pennsylvania, 5-8 November.
21. Bickel, J. Eric, Rick Gibson, Duane McVay, Steve Pickering, and John Waggoner. 2006. "WesternGeco Uses Decision Analysis to Communicate the Value of Seismic Surveys to Potential Clients." 2006 INFORMS Annual Conference, Pittsburgh, Pennsylvania, 5-8 November. Winner of the INFORMS Decision Analysis Society 2006 Practice Award.

22. Bickel, J. Eric, Rick Gibson, Duane McVay, Steve Pickering, and John Waggoner. 2006. "Value of Seismic with Multiple Drilling Targets." 2006 SEG Annual Meeting, New Orleans, Louisiana, 1-6 October. Appeared in a special session entitled "The Best of the SBGf Conference."
23. Bickel, J. Eric, James E. Smith, and Jennifer L. Meyer. 2006. "Modeling Dependence among Geologic Risks in Sequential Exploration Decisions." SPE Annual Technical Conference and Exhibition, San Antonio, Texas, 24-27 September.
24. Bickel, J. Eric, Richard L. Gibson, Duane A. McVay, Stephen Pickering, and John Waggoner. 2006. "Quantifying 3D Land Seismic Reliability and Value." SPE Annual Technical Conference and Exhibition, San Antonio, Texas, 24-27 September.
25. Bickel, J. Eric, Rick Gibson, Duane McVay, Steve Pickering, and John Waggoner. 2006. "Value of Seismic with Multiple Drilling Targets." SEG/SBGf/ULG, Development and Production Forum, Rio de Janeiro, Brazil, 7-11 August. Selected to appear in a special session at the 2006 SEG Annual Meeting entitled "The Best of the SBGf Conference."
26. Bickel, J. Eric, Rick Gibson, Duane McVay, Steve Pickering, and John Waggoner. 2006. "Value of Seismic with Multiple Drilling Targets." 2006 EAGE Annual Conference, Vienna, Austria, 13 June.
27. Bickel, J. Eric and Reidar Bratvold. 2006. "Decision Focused Uncertainty Quantification." SPE/EAGE Workshop "What Do Geoscientists and Engineers Need to Do to Better Manage Uncertainty?" Dubrovnik, Croatia, 13-16 March.
28. Bickel, J. Eric and James E. Smith. 2006. "Optimal Sequential Exploration: A Binary Learning Model." SPE/EAGE Workshop "What Do Geoscientists and Engineers Need to Do to Better Manage Uncertainty?" Dubrovnik, Croatia, 13-16 March.
29. Bickel, J. Eric and James E. Smith. 2006. "Optimal Sequential Exploration: A Binary Learning Model." 2006 DAAG, Baltimore, Maryland, 29-31 March.
30. Bickel, J. Eric and James E. Smith. 2005. "Optimal Sequential Exploration: A Binary Learning Model." 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
31. Bickel, J. Eric. 2005. "Experiential Learning and Strictly Proper Scoring Rules." 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
32. Bickel, J. Eric. 2005. "On the Value of Throwing Strikes." 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
33. Bickel, J. Eric. 2004. "Teaching Decision Making with Baseball Examples." 2004 INFORMS Annual Conference, Denver, Colorado, 24-27 October.
34. Bickel, J. Eric. 2004. "To Take or Not to Take: Optimal Hitting Strategy in Baseball." 2004 INFORMS Annual Conference, Denver, Colorado, 24-27 October.
35. Bickel, J. Eric. 2003. "Using Maximum Entropy to Assess the Probability of Success in Oil and Gas Exploration." 2003 INFORMS Annual Conference, Atlanta, Georgia, 19-22 October.
36. Bickel, J. Eric. 1998. "The Corporate Contractual System and Normative Corporate Risk Attitude." 1998 INFORMS Annual Conference, Seattle, Washington, 25-28 October.

CONFERENCE ORGANIZATION

Cluster Chair

1. Bickel, J. Eric. 2010. SpORts Track, INFORMS 2010 Annual Conference, Austin, Texas, 7-10 November.
2. Bickel, J. Eric. 2009. SpORts Track, INFORMS 2009 Annual Conference, San Diego, California, 11-14 October.
3. Bickel, J. Eric. 2009. Management Track Selection Committee, SPE 2009 ATCE, New Orleans, Louisiana, 4-7 October.

4. Bickel, J. Eric. 2008. Decision Analysis Cluster Chair, INFORMS 2008 Regional Conference, College Station, Texas, 18-19 April.
5. Bickel, J. Eric. 2008. Management Track Selection Committee, SPE 2008 ATCE, Denver, Colorado, 21-24 September.
6. Bickel, J. Eric. 2007. Management Track Selection Committee, SPE 2007 ATCE, Anaheim, California, 11-14 November.
7. Bickel, J. Eric. 2005. Decision Analysis Cluster Co-Chair, INFORMS 2005 Annual Conference, San Francisco, California, 13-16 November.

Session Chair

1. Bickel, J. Eric. 2010. "DAS Practice Awards," INFORMS 2010 Annual Conference, Austin, Texas, 7-10 November.
2. Bickel, J. Eric. 2009. "DAS Practice Awards," INFORMS 2009 Annual Conference, San Diego, California, 11-14 October.
3. Bickel, J. Eric. 2009. "Value of Information," INFORMS 2009 Annual Conference, San Diego, California, 11-14 October.
4. Bickel, J. Eric. 2008. "Data and Integration Architectures," 2008 Digital Energy Conference, Houston, Texas, 20 November.
5. Bickel, J. Eric. 2005. "Decision Analysis Arcade II," 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
6. Bickel, J. Eric. 2005. "Decision Analysis Arcade III," 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
7. Bickel, J. Eric. 2005. "Decision Analysis Arcade IV," 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
8. Bickel, J. Eric. 2005. "SpORts Arcade," 2005 INFORMS Annual Conference, San Francisco, California, 13-16 November.
9. Bickel, J. Eric. 2004. "Teaching Decision Analysis," 2004 INFORMS Annual Conference, Denver, Colorado, 24-27 October.
10. Bickel, J. Eric. 2004. "Using Decision Analysis to Manage Canadian Resources," CORS/INFORMS, Banff, Alberta, Canada, 16-19 May.

ADVISORY PANELS

- 2012–Present Co-Chair, Ultra-Deepwater Environmental, Safety & Regulatory & Metocean Technical Advisory Committee, Research Partnership to Secure Energy for America (RPSEA, DOE NETL).
- 2009–Present Advisory Board, Mizzou Advantage Sustainable Energy Initiative.
- 2006–2008 Advisory Council, Quantification and Management of Risk in Exploration and Production, International Research Institute of Stavanger (Norway).

BOARDS OF DIRECTORS

- 2011–Present Board of Directors, *Society of Decision Professionals*.

EDITORIAL SERVICE

- 2012–Present Member Editorial Board, *EURO Journal of Decision Processes*.
- 2011–Present Topical Editor, *Wiley Encyclopedia of Operations Research and Management Science*.
- 2010–Present Associate Editor, *Decision Analysis Journal*.

- 2009–Present Member of Editorial Board, *Decision Analysis Journal*.
 2009–Present Technical Editor, *SPE Economics and Management Journal*.
 2006–2009 Ad Hoc Associate Editor, *Decision Analysis Journal*.

OUTSIDE SERVICE

- 2010 Instructor, Decision Education Foundation.
 2008–2010 Decision Analysis Society Practice Award, Chair.
 2008–2010 OR in Sports (SpORts), Vice Chair for Programs (Elected, Term: 2008–2010).
 2006–2008 Decision Analysis Membership Committee, Member.
 2006–2008 Council of INFORMS’ Decision Analysis Society (Elected, Term: 2005–2008).
 2005–2008 Decision Analysis Publications Award Committee, Member.
 2005–2008 Decision Analysis Nominating Committee, Member.

UNIVERSITY SERVICE

- 2008–Present Graduate Recruiting Search Committee, ORIE Chairman.
 2009 Cockrell School of Engineering Space and Earth Engineering Strategic Thrust Committee.
 2009 Cockrell School of Engineering Sustainable Energy Thrust Committee.
 2008–2009 Mechanical Engineering Clean Energy Committee.
 2006–2008 Industrial Engineering and Systems Awards Committee (Texas A&M).
 2005–2008 Chairman of Systems Engineering Subcommittee (Texas A&M).
 2004–2008 Dean’s Project Management Certificate Committee (Texas A&M).
 2004–2005 Industrial Engineering and Systems Engineering Graduate Committee (Texas A&M).

DOCTORAL STUDENTS

- Current Kun Zan (December 2012) and Robert Hammond (May 2013).
 2012 Luis Montiel (May 2012), in Job Market.
 2008 Seong-Dae Kim, Assistant Professor, University of Alaska, Anchorage.

COURSES TAUGHT

The University of Texas

ORI 397: Decision Analysis (new course)

ORI 390: Applied Probability

ME 353: Engineering Finance

Executive Education (Strategic Decision and Risk Management)

Decision Quality

Decision Leadership

Texas A&M University

INEN 627: Decision Analysis I (new course)

INEN 689: Engineering Analysis for Decision Making

INEN 459: Undergraduate Senior Design Course

INEN 303: Engineering Economics

AWARDS

2011 SPE Outstanding Technical Editor

2011 Fellow, Society of Decision Professionals

2010 NSF CAREER Award

2006 Winner of the INFORMS Decision Analysis Society 2006 Practice Award

2006 INFORMS Student Chapter, Appreciation Award for Faculty

2005 INFORMS Young Researcher Roundtable

AFFILIATIONS

American Meteorological Society (AMS)

American Society of Mechanical Engineers (ASME)

Decision Analysis Society (DAS)

Energy, Natural Resources, and the Environment (ENRE) INFORMS Section

Institute for Operations Research and the Management Sciences (INFORMS)

INFORMS Sports Section (SpORts)

Institute of Electrical and Electronics Engineers (IEEE)

Institute of Industrial Engineers (IIE)

Mensa

Society for American Baseball Research (SABR)

Society of Decision Professionals, Fellow

Society of Exploration Geophysicists (SEG)

Society of Petroleum Engineers (SPE)