

### **Plenary: Economic impacts of mitigation and adaptation strategies**

- **Economic impacts of Michigan's Climate Action Plan**  
Dr. Steve Miller, Agricultural, Food, and Resource Economics, MSU
- **The impact of biofuels**  
Dr. Harry De Gorter, Applied Economics and Management, Cornell University
- **The effect of the US biofuel mandate on world food prices and the effect on land use change (CO2 emissions)**  
Dr. Wolfram Schlenker, Economics, Columbia University
- **The cost of mitigation and adaptation in agriculture and forestry**  
Dr. Bruce McCarl, Agricultural Economics, Texas A & M University

Moderated by [Jinhua Zhao](#), Economics and Agricultural, Food and Resource Economics, MSU

### **SESSION ABSTRACT**

This session explores the economic impacts of mitigation and adaptation strategies and renewable fuel policies as the nation moves ahead in its debate over carbon and renewable energy regulation. Dr. Miller will discuss the direct and indirect economic impacts on Michigan of the mitigation strategies proposed in the Michigan Climate Action Plan. Dr. de Gorter will draw upon his extensive research experience on biofuels to discuss the associated challenges and opportunities. Dr. Schlenker will focus on the effects of US biofuel development on world food prices and land use changes. Dr. McCarl looks at the costs of mitigation and adaptation in the overall sector of agriculture and forestry.

### **SPEAKER BIOS**

#### **[Dr. Steve Miller](#), Agricultural, Food, and Resource Economics, MSU**

Dr. Steve Miller is the Director of the Center for Economic Analysis in the Department of Agricultural, Food and Resource Economics. Dr. Miller received his Ph.D. in Economics from Oklahoma State University with specialty fields in Urban-Regional Economics, Econometrics, and Monetary Economics. His dissertation, entitled *A Dynamically-Calibrated Regional Forecasting and Simulation Model: A Maximum Entropy Approach* integrated econometric and computable general equilibrium model development for policy analysis. He has produced numerous policy impact assessments around economic development, health and tax systems, produced papers on demand responses across competing regional airports, and papers on alternative estimation methods of systems modeling for forecasting. Steve's research interests includes economic model building for policy analysis, economic evaluation of state and local policies – especially as they relate to economic growth – economic impact modeling and valuing agricultural research.

#### **[Dr. Harry De Gorter](#), Applied Economics and Management, Cornell University**

Harry de Gorter teaches and conducts research on the applied welfare economics and political economy of agricultural trade policy. His research is both theoretical and empirical with direct policy implications for governments, international institutions, and non-governmental organizations.

Recent research focuses on the economics of biofuel policies, WTO disciplines on agriculture, alternative agricultural import barriers, domestic subsidy programs and export subsidies, implication of preferential tariffs and quotas for least developed countries, the economics of WTO trade disputes, and the impact of trade liberalization.

Since early 2007, he has embarked on a massive research program on the social costs and benefits of biofuel policies, including implications for the environment. He is a leading expert on the policy economics of biofuels, has been involved with the Doha negotiations and WTO trade disputes concerning biofuel policies, and is currently advising the Food and Agriculture Organization of the United Nations and the World Bank on the social costs and benefits of alternative biofuel policies.

#### **[Dr. Wolfram Schlenker](#), Economics, Columbia University**

**Wolfram Schlenker** teaches classes in environmental and natural resource economics. His research interests include the economics of climate change, water rights, and their impact on agricultural output, as well as models of exhaustible resources with endogenous discoveries.

His most recent publication is "Will U.S. Agriculture Really Benefit From Global Warming? Accounting for Irrigation in the Hedonic Approach" in *American Economic Review* (March 2005).

He holds a PhD in agricultural and resource economics from the University of California, Berkeley (2003) and a Master of engineering and management sciences from the University of Karlsruhe, Germany (2000), as well as a Master of environmental management from Duke University (1998).

**[Dr. Bruce McCarl](#), Agricultural Economics, Texas A & M University**

Regents Professor and Distinguished Professor of Agricultural Economics at Texas A&M University.

Received B.S. in Business Statistics at the University of Colorado and Ph.D. in Management Science from Pennsylvania State University. My recent research efforts have largely involved policy analysis (mainly in climate change, climate change mitigation, ENSO analysis and Edwards Aquifer water) as well as the proper application of quantitative methods to such analyses. I teach graduate courses in applied mathematical programming and applied risk analysis.