

## **J. WESLEY BURNETT**

Division of Resource Management  
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### **RESEARCH INTERESTS**

Energy and Environmental Economics, Applied Microeconomics, Energy Policy, Resource Economics, Regional Economics, Panel Data Econometrics, Spatial Econometrics, Land-Use Change

### **EDUCATION**

University of Georgia, Athens, GA	PhD 2011
University of Georgia, Athens, GA	MA 2007
College of Charleston, Magna Cum Laude, Charleston, SC	BA 1999

### **ACADEMIC EMPLOYMENT**

2011—Present. Assistant Professor, Agricultural and Resource Economics, West Virginia University, Morgantown, WV  
2006—2011. Teaching/Research Assistant, University of Georgia, Department of Agricultural and Applied Economics, Athens, GA  
2007—2008. President, Graduate Student Association, University of Georgia, Athens, GA

### **TEACHING EXPERIENCE**

#### Undergraduate Courses

- ARE 187 Energy Resource Economics, 3 CR
- ARE 445 Energy Economics, 3 CR
- AAEC 499 Special Topics in Agricultural and Applied Economics, 3 CR

#### Graduate Courses

- ARE 693S Advanced Energy Economics, 3 CR
- ARE 703 Advanced Natural Resource Economic Theory, 3 CR

### **HONORS AND AWARDS**

- Ralph E. Powe Jr. Faculty Enhancement Award (2013)
- Southern Economics Association Invited Graduate Student Award (2010)
- Outstanding PhD Student, Department of Agricultural and Applied Economics, University of Georgia (2010)
- Outstanding PhD Paper, Department of Agricultural and Applied Economics, University of Georgia (2010)

- Outstanding PhD Student, Department of Agricultural and Applied Economics, University of Georgia (2011)
- Outstanding PhD Paper, Department of Agricultural and Applied Economics, University of Georgia (2011)
- Who's Who Among Students in American Universities and Colleges (2011)

## PROFESSIONAL AFFILIATIONS

U.S. Association for Energy Economics, Agricultural and Applied Economics Association, American Economic Association, Regional Science Association International, Southern Regional Science Association, Council of Energy Research and Education Leaders

## SELECTED GRANTS RECEIVED

1. Primary Investigator, "Energy and Speculation: New Dynamics in Agricultural Commodity Price Volatility" (Funded by USDA Office of the Chief Economist, Office of Energy Policy and New Uses, \$18,200)
2. Co-Investigator, "The Technology, Energy, Economy, and Environment (TEEE) Chain: Integrated Modeling for Technology Transition in Energy Rich Regions" (Funded by the National Science Foundation, \$335,930)
3. Co-Investigator, "Social economic impacts of biofuel production in central Appalachia" (Funded by USDA National Institute of Food and Agriculture, Biomass Research and Development Initiative, \$349,952)
4. Primary Investigator, "The Dynamic Effect of Shale Gas Development on Local Communities: Evidence from Property Values" (Funded by USDA Office of the Chief Economist, Office of Energy Policy and New Uses, \$19,160)
5. Co-Investigator, "Projecting Surface Coal Mining Footprints in Central Appalachians Over the Next 25 Years" (Funded by the Nature Conservancy, \$96,460)
6. Primary Investigator, "The Dynamic Effect of Shale Gas Development on Local Communities" (Funded by the Oak Ridge Associated Universities, \$10,000)
7. Primary Investigator, "Dynamic Evaluation of Volatility Transmission between Agricultural Commodities" (Funded by USDA Office of Chief Economist, Office of Energy Policy and New Uses, \$11,445)

## GRADUATE STUDENTS MENTORED OR TRAINED

Current Graduates as Committee Member: Marc Mulkey, Praveena Jayaraman, Kofi Nkansah, Damon Hartley, Brandon Kiger, Seth Wiggins

Major Professor: Davina Bird (expected completion, August 2014), Nykundi Michieka (completed, August 2013), Xueting Zhao (expected completion, May 2014), Zohreh Erfanian Ghanad Shirinkaam

## PUBLICATIONS

### Peer-Reviewed Papers

1. Burnett, J.W. "Club Convergence and Clustering of U.S. Energy-Related CO2 Emissions." *Resource and Energy Economics*, Under revision.
2. Burnett, J.W., Jackson, R.W., and Blobaum, R. "The State of Play in Poland's Unconventional Shale and Oil Development." *Development Policy Review*, Under revision.
3. Burnett, J.W. and Zhao, X. "Forecasting U.S. State-Level Carbon Dioxide Emissions." *The Review of Regional Studies*, (2014), Under revision.

4. Zhao, X., Burnett, J.W., and Fletcher, J.J. "Spatial Analysis of China Province-Level CO2 Emission Intensity," *Renewable and Sustainable Energy Reviews*, (2014), 33: 1-10.
5. Zhao, X. and Burnett, J.W. "Forecasting Province-Level CO2 Emissions in China," *Letters in Spatial and Resource Science*, (2013), October.
6. Burnett, J.W., Bergstrom, J.C., and Dorfman, J.H. "A Spatial Panel Data Approach to Estimating U.S. State-Level Energy Emissions," *Energy Economics* (2013), 40: 396-404.
7. Burnett, J.W., Bergstrom, J.C., and Wetzstein, M.E. "Carbon Dioxide Emissions and Economic Growth in the U.S." *Journal of Policy Modeling* (2013), 35: 1014-1028.
8. Michieka, N.M., Fletcher, J.J. and Burnett, J.W. "An Empirical Analysis of the Role of China's Exports on CO2 Emissions." *Applied Energy* (2013), 104: 258-267.
9. Burnett, J.W. and Lacombe, D.J. "Accounting for Spatial Autocorrelation in the 2004 Presidential Popular Vote: A Reassessment of the Evidence." *The Review of Regional Studies* (2012), 42(1): 75-89.

#### Papers Under Review

1. Burnett, J.W. and Zhao, X. "Spatially Explicit Prediction of Wholesale Electricity Prices"
2. Zhao, X., Burnett, J.W., and Lacombe, D.J. "Province-level Convergence of China CO2 Emission Intensity: A Spatial Dynamic Panel Data Analysis."
3. Weber, J., Burnett, J.W., and Xiarchos, I.M. "Shale Gas Development and Housing Values Over a Decade: Evidence from the Barnett Shale"

#### Other Peer-Reviewed Papers

1. Weber, J.G., Burnett, J.W., and Xiarchos, I.M. "Shale Gas Development, Housing Values, and School Finances: What has happened in the Barnett Shale?" *National Agricultural and Rural Development Policy Center, Policy Brief* (2014).
2. Burnett, J.W., Bergstrom, J.C., and Dorfman, J.H. "A Spatial Panel Data Approach to Estimating U.S. State-Level Energy Emissions." *Renewable Energy: Global Innovations* (2014).
3. Burnett, J.W. and Bergstrom, J.C. "The Role of Technology in Energy Consumption, Economic Growth, and Environmental Degradation." *USAEE Working Paper Series* (2011).
4. Burnett, J.W. "Cooperative Management of Water Resources: An Economic Perspective." *Global Water Forum*, (2013), December.
5. Burnett, J.W. "Hydraulic Fracturing and U.S. Water Policy." *Global Water Forum* (2013), March.
6. Burnett, J.W. "Spatial Modeling Techniques in the Analysis of Energy Economics," *USAEE Dialogue* (2011).

#### Working Papers

1. Burnett, J.W., Xiarchos, I.M., and Kucher, O.K. "Volatility Spillovers in Agricultural and Oil Price Commodities"
2. Strager, M.P., Burnett, J.W., Strager, J.M., Kreps, B. and Maxwell, A.E. "A Spatially Explicit Surface Coal Mining Predictive Model"
3. Kucher, O.K., Burnett, J.W. and Lacombe, D.J. "Spatial Dependence In Wholesale Gasoline Market Across The United States"

#### Undergraduate Advisee Peer-Reviewed Papers

1. Harker, A. "Influencing Energy Consumption Behavior in Residence Halls through Education and Outreach." *SS-AAEA Journal of Agricultural Economics*, Forthcoming
2. Allison, V.L. "Econometric Analysis of Childhood Poverty in Georgia." *SS-AAEA Journal of Agricultural Economics* (2011)

## REVIEWER

Resource and Energy Economics, Public Choice, Annals of Regional Science, Agricultural and Resource Economics Review, Natural Resources Research, Renewable and Sustainable Energy Reviews, Applied Energy, Energy Efficiency, Mitigation and Adaptation Strategies for Global Change

## PRESENTATIONS

### Conference Papers

1. Burnett, J.W. and Zhao, X. 2013. Spatially Explicit Prediction of Wholesale Electricity Prices. In: Proceedings of the Regional Science Association International Conference, Atlanta, GA.
2. Zhao, X. and Burnett, J.W. 2013. Province-level Convergence of China CO2 Emission Intensity: A Spatial Dynamic Panel Data Analysis. In: Proceedings of the Regional Science Association International Conference, Atlanta, GA.
3. Burnett, J.W. and Zhao, X. 2013. Spatially Explicit Prediction of Wholesale Electricity Prices. Invited Presentation, University of Georgia, Athens, GA.
4. Zhao, X., Burnett, J.W., and Lacombe, D.J. 2013. Province-level Convergence of China CO2 Emission Intensity: A Spatial Dynamic Panel Data Analysis. Invited Presentation, Zhejiang University, Hangzhou, China.
5. Burnett, J.W., Strager, M., Strager, J., Maxwell, A.E., and Kreps, B. 2013. Forecasting Future Coal Production from Surface Mining in Central Appalachia. In: Proceedings of the International Pittsburgh Coal Conference, Beijing, China.
6. Zhao, X. and Burnett, J.W. 2013. Spatial analysis of China's province-level emission intensity. In: Proceedings of the Agricultural and Applied Economics Association, Washington, D.C.
7. Burnett, J.W. 2013. Club Convergence and Clustering of U.S. Energy-Related CO2 Emissions. In: Proceedings of the Agricultural and Applied Economics Association, Washington, D.C.
8. Burnett, J.W. 2013. Club Convergence and Clustering of U.S. Energy-Related CO2 Emissions. In: Proceedings of the U.S. Association of Energy Economics, Anchorage, AK.
9. Zhao, X. and Burnett, J.W. 2013. Province-level Convergence of China CO2 Emissions Intensity: A Spatial Econometric Analysis. In: Proceedings of the VII World Conference of the Spatial Econometrics Association, Washington, DC.
10. Burnett, J.W. and Zhao, X. 2013. Forecasting U.S. State-Level Carbon Dioxide Emissions. In: Proceedings of the VII World Conference of the Spatial Econometrics Association, Washington, D.C.
11. Zhao, X. and Burnett, J.W. 2013. Forecasting China Province-Level CO2 Emissions with a Spatial Panel Data Approach. In: Proceedings of the London Symposium on Climate Change, London, England.
12. Burnett, J.W. 2013. Dutch Disease and the Resource Curse: Too Much Wealth Managed Unwisely. In: Proceedings of the XXIV International Conference Drilling Oil-Gas AGH 2013, AGH University of Science and Technology, Krakow, Poland.
13. Burnett, J.W. 2013. Dutch Disease and the Resource Curse: Too Much Wealth Managed Unwisely. Invited Presentation, Warsaw University of Life Sciences, Warsaw, Poland.
14. Burnett, J.W. 2013. Club Convergence and Clustering of U.S. Energy-Related CO2 Emissions. In: Proceedings of the Southern Regional Science Association, Washington, D.C.
15. Zhao, X., Burnett, J.W. and Fletcher, J. 2013. Spatial Analysis of China Province-Level CO2 Emission Intensity. In: Proceedings of the Southern Regional Science Association, Washington, D.C.
16. Michieka, N., Fletcher, J. and Burnett, J.W. 2012. The Cost of Energy - The Environmental Effects of Coal Production in China. In: Proceedings of the U.S. Association of Energy Economics, Austin, TX.

17. Xiarchos, I., Burnett, J.W., and Kucher, O. 2012. Energy and Speculation: New Dynamics in Agricultural Commodity Price Volatility. In: Proceedings of the Agricultural and Applied Economics Association, Seattle, WA.
18. Michieka, N., Fletcher, J., and Burnett, J.W. 2012. An Empirical Analysis of the Role of China's Exports on CO<sub>2</sub> Emissions. In: Proceedings of the Agricultural and Applied Economics Association, Seattle, WA.
19. Zhao, X., Fletcher, J. and Burnett, J.W. 2012. CO<sub>2</sub> Emissions, Energy Consumption and Economic Growth in China: a Spatial Econometric Approach Based on Panel Data. In: Proceedings of the Northeastern Agricultural and Resource Economics Association, Lowell, MA.
20. Sivanandan, L., Jaczynski, J., Singh, K., Burnett, J.W., Lies, G., Mishra, H.N., Matak, K., and Ronaghi, M. 2012. Global Food Security and Sustainability through Agricultural Education and Training. In: Proceeding of the American Society of Agricultural and Biological Engineers, Dallas, TX.
21. Michieka, N. Fletcher, J., and Burnett, J.W. 2012. An Empirical Analysis of the Role of China's Exports on CO<sub>2</sub> Emissions. In: Proceeding of the Southern Regional Science Association, Charlotte, NC.
22. Burnett, J.W., Bergstrom, J.C., and Dorfman, J.H. 2011. State-Level Energy Consumption, Carbon Dioxide Emissions, and Economic Growth. In: Proceedings of the US Association of Energy Economists, Washington, DC.
23. Burnett, J.W., Bergstrom, J.C., and Dorman, J.H. 2011. A Spatiotemporal Fixed Effects Estimation of U.S. State-Level Carbon Dioxide Emissions. In: Proceedings of the Agricultural and Applied Economics Association, Pittsburgh, PA.
24. Burnett, J.W. and Ferrer, M.C. 2010. Dynamic Optimization of Nitrogen Use in Agriculture. In: Proceedings of the Agricultural and Applied Economics Association, Denver, CO.
25. Burnett, J.W. and Bergstrom, J.C. 2010. U.S. State-Level Carbon Dioxide Emissions: A Spatial-Temporal Econometric Approach of the Environmental Kuznets Curve. In: Proceedings of the North American Regional Science Council, Denver, CO.
26. Burnett, J.W., and Bergstrom, J.C. 2010. U.S. State-Level Carbon Dioxide Emissions: A Spatial-Temporal Econometric Approach of the Environmental Kuznets Curve. In: Proceedings of the Southern Economics Association, Atlanta, GA.
27. Burnett, J.W., and Bergstrom, J.C. 2009. Economic Growth and Environmental Degradation. In: Proceedings of the Southeastern Agricultural Economics Association, Atlanta, GA.

#### Other Presentations

1. Burnett, J.W. 2014. Sustainable Energy Development: An Economic Perspective. Center for Applied Energy Research, University of Kentucky, Lexington, KY. Invited presentation.
2. Burnett, J.W. and Zhao, X. 2013. Spatially Explicit Prediction of Wholesale Electricity Prices. University of Georgia, Athens, GA. Invited presentation.
3. Zhao, X., Burnett, J.W., and Lacombe, D.J. 2013. Province-level Convergence of China CO<sub>2</sub> Emission Intensity: A Spatial Dynamic Panel Data Analysis. Zhejiang University, Hangzhou, China. Invited presentation.
4. Burnett, J.W. 2012. The Importance of Early Preparation. In: Proceedings of the Agricultural and Applied Economics Association, Seattle, WA.
5. Burnett, J.W. 2012. A West Virginia Policy Perspective. In: Proceedings of the Multi-State Marcellus Shale Research Conference, Pittsburgh, PA.
6. Burnett, J.W., Ferrer, M.C., and Patton, D. 2010. Shepherd's Grain: Sustainable Business Plan. Agricultural and Applied Economics Association, Denver, CO.

7. Burnett, J.W., Cai, R., and Ferrer, M.C. 2009. Jowler Creek Winery: Uncorking Sustainable Growth in the Boutique Wine Industry. Agricultural and Applied Economics Association, Milwaukee, WI.