

ANNUAL REPORT 2016

Bureau of Business and Economic Research School of Business Administration University of Montana

CHAIRS

ABOUT BBER

The Bureau of Business and Economic Research has been providing information about Montana's state and local economies for more than 50 years. Housed on the Missoula campus of the University of Montana, the Bureau is the research and public service branch of the School of Business Administration. On an ongoing basis, the Bureau analyzes local, state and national economies; provides annual income, employment and population forecasts; conducts extensive research on forest products, manufacturing, health care and Montana Kids Count; designs and conducts comprehensive survey research at its on-site call center; presents annual economic outlook seminars in cities throughout Montana; and publishes the award-winning Montana Business Quarterly.

OUR MISSION

The Bureau of Business and Economic Research's purpose is to serve the general public, as well as people in business, labor and government, by providing an understanding of the economic environment in which Montanans live and work.





TABLE OF CONTENTS



MESSAGE FROM THE DIRECTOR

As I write these words, the political season is in full swing. Election years can be difficult for researchers, who must sift through the distortions and oversimplifications that are part of nearly every campaign to communicate the subtlety and complexity of important issues – especially those involving the economy.

This certainly has been the case this year, but there has been one pleasant surprise. In statewide elections, the economy has been a hot button issue, which has helped highlight the strengths and weaknesses of Montana's economy. It's also raised the understanding and awareness of bigger trends that too often go underreported.

As a center whose mission is to help Montanans stay informed about issues and trends in the economy, we welcome this attention. More importantly, people across the state welcome it too, which is a key finding in a recent survey research project found in this report. That survey identified jobs and the economy as the most frequently cited issues facing the state. We certainly hope the topic stays in the spotlight long after the elections are over.

> There have been plenty of other important projects at BBER during the last year, as the pages of this report make clear. 2015-16 was a year that saw the Bureau report on everything from Medicaid expansion to environmental issues, timber availability and child welfare.



This year's annual report also features a few of the activities of our BBER advisory board for the first time. We are proud to have worked with such a tremendous group of leaders from across the state, who have given us so much of their time and expertise.

Here's hoping you and your organization have a great year ahead.

Catur M. Barling

Sincerely, Patrick M. Barkey BBER Director

OUR STAFF

Administration

Patrick Barkey Director

Bill Whitsitt Executive in Residence

Debora Simmons Office Manager

Megan Elensky Office Assistant

Jenessa Albertson Office Assistant

Economic Analysis

Paul Polzin Director Emeritus

Kyle Morrill Senior Economist

Forest Industry and Manufacturing Research

Todd Morgan Director **Steve Hayes** Research Forester

Erik Berg Research Forester

Chelsea Mclver Research Specialist

Eric Simmons Research Associate

Kate Marcille Research Associate

Bob Campbell Programmer & Database Administrator

Health Care Research

Bryce Ward Director

Thale Dillon Director, Montana Kids Count

Jennifer Calder Outreach Coordinator, Montana Kids Count Kinsey Owen Research Assistant

Survey Research

John Baldridge Program Manager

Janet Stevens Survey Research Field Coordinator

Ramona Alspaugh Senior Interviewer

Energy Research

Terry Johnson Director

Publications and Outreach

Scott Hawk Publications Director

Zoie Koostra Publications Assistant

Rob Van Driest Marketing Director

ADVISORY BOARD MEMBERS 2016-2017

Julia Altemus Montana Wood Products Association Missoula

Dennis Beams Glacier Bank Kalispell

Kathy Boelter Arrow Solutions Group, Inc. Billings **Mike Foster** St. Vincent Healthcare Bozeman

Diana Holshue Federal Reserve Bank of Minneapolis Helena

Matt Jones BNSF Railway Bozeman Meg O'Leary Montana Department of Commerce Helena

Tim Robertson Century Companies, Inc. Lewiston



YEAR IN REVIEW

Among BBER's noteworthy achievements for 2015-2016:

BBER conducted a study for the Greater Media Foundation on what Montanans consider to be their most important issues and where they seek information in the media.

The Bureau worked with the High Tech Business Alliance to conduct a second study of Montana's high tech business sector and its related economic impact within the state.

BBER performed an economic analysis of the EPA Clean Power Plan as a means of helping Montana policymakers, businesses and households understand the implications of the EPA Clean Power Plan final rule – sometimes referred to as 111(d) for the portion of the Act that gives the agency authority for its actions. NorthWestern Energy contracted with the Bureau to conduct the analysis and the impact of complying with the rule on the state's economy.

Montana KIDS COUNT continued its collection and dissemination of data relating to child and family well-being in the state.

BBER published the Montana Economic Report, an analysis and assessment of Montana's economic performance. The report was provided to Montana Economic Outlook Seminar attendees and distributed to 1000 residents, businesses and local representatives around the state.

BBER conducted its 41st annual Economic Outlook Seminar tour across Montana, featuring a keynote presented by Dr. Doug Young, emeritus professor of economics at Montana State University on "Rising Property Tax Bills – What You Should Know."

The Forest Industry Research Program produced reports on timber harvest and the forest industry in Arizona, California, Colorado, New Mexico, Oregon and Utah. It also concluded the fifth and final year of its agreement with the Northwest Advanced Renewables Alliance, which was organized to conduct research and development of the wood-based bio-jet fuel industry in Oregon, Washington, Idaho and Montana.

Health Care Research continued its leadership role in understanding the Montana health care market by conducting two studies on Montana's Medicaid expansion, collaborating on four projects with RTC: Rural, partnering with the Blackstone Launchpad and the Kauffman Foundation to study women's participation in pre-entrepreneurial activities, and a number of presentations inside and outside of the state. The Bureau hired Scott Hawk as its publications director, who spent 20 years as a radio personality and brand manager, jumping between New Orleans, Nashville and Boston. Scott hosted a syndicated radio show in the late 1990's and owned a digital marketing agency in the early 2000's. He received his Bachelor of Arts in Journalism from the University of Montana in 2016.

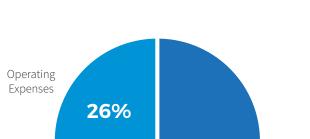
GOALS FOR 2016-17

- 1. Uphold BBER's reputation for well-researched, impartial and relevant analysis of policy issues that are important for Montanans.
- 2. Build the statewide attendance for BBER's Economic Outlook Seminars through programmatic and delivery improvements.
- Work with the new leadership in the School of Business Administration and at the University of Montana to provide maximum value to the university.
- 4. Meet the challenges of the modern communications environment to maintain the excellent quality standards for both the Bureau's publications, as well as its survey research efforts.



FINANCIAL REPORT

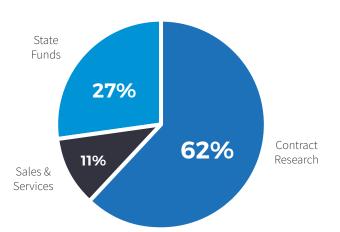
The fiscal year 2015-16 saw BBER's total expenditures fall modestly to just under \$1.9 million. Some of this decline reflects the absence of short term projects that typically occur in preparation for legislative years. The cutbacks in state funding that have occurred across the university, due to enrollment declines, will show up in spending and revenues for next year. We continue to see a roughly 3:1 ratio between revenues from contracts and state funds. The state funds are almost totally devoted to personnel with other funds being used to cover operating expenses.



74%

EXPENSES, 2015-16

REVENUES, 2015-16



Revenue	FY 2015	%	FY 2016	%
Contract Research	\$1,189,297	60%	\$1,161,308	62%
Sales & Services	\$283,648	14%	\$200,583	11%
State Contribution	\$519,318	26%	\$514,743	27%
Total Expenses	\$1,992,263	100%	\$1,876,634	100%

Personnel

Expenses

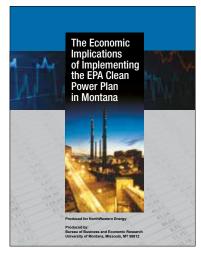
Expenses	FY 2015	%	FY 2016	%
Personnel - State	\$507,556	-	\$511,818	-
Personnel - Other	\$918,360	-	\$883,894	-
Total Personnel Expenses	\$1,425,916	72%	\$1,395,712	74%
Operating Expenses - State	\$11,762	-	\$2,925	-
Operating Expenses - Other Sources	\$554,585	-	\$477,997	-
Total Operating Expenses	\$566,347	28%	\$480,922	26%
Total Expenses	\$1,992,263	100%	\$1,876,634	100%



ECONOMIC ANALYSIS

Providing an Understanding of Montana's Economic Environment

The Bureau's purpose is to serve the general public, as well as people in business, labor and government, by providing an understanding of the economic environment in which Montanans live and work. Directed by those guidelines, BBER provides economic insight in the form of economic models and analysis, in-person presentations and in print publications. This past year, one of our more visible projects was an economic impact study on the EPA's Clean Power Plan for Montana, which involved a shutdown of the Colstrip Steam Electric Generation Station.



The Economic Implications of Implementing the EPA Clean Power Plan in Montana

On August 3, 2015, the U.S. Environmental Protection Agency released its final rule for its Clean Power Plan directed at reducing emissions of greenhouse gases. As was the case with the preliminary rules announced in June 2014, those rules require states, including Montana, to submit plans that would result in reductions in state carbon emissions from new and existing electric generation facilities that hit a specified target by year 2030.

While there is in principle some flexibility in how states construct plans to comply with the emission targets set forth in the rule, the final rule's state-specific mandates for CO2 rate reductions for Montana power producers have been set at a level that drastically reduces the choice set for our state. A nationwide analysis conducted by SNL Energy shows that the plan's required 44 percent reduction in CO2 rate emissions for Montana in year 2030, relative to what status quo projected emissions would be in 2020, is the highest of any of the lower continental 48 states.

The EPA Clean Power Plan final rule – often referred to as 111(d) for the portion of the Clean Air Act that is cited as

giving the Agency the authority for its actions – is the most significant economic event to occur in Montana in more than thirty years. Absent outcomes in markets for trading emissions allowances between states that are extremely difficult to predict, compliance with the rule will almost certainly entail the premature closure and decommissioning of the Colstrip Steam Electric Station, a coal-fired generator in southeast Montana that is the largest industrial facility in the state. It will also require significant new investment in replacement generation assets, as well as the transmission system improvement necessary to support them. As the regulation rolls out nationwide, it will significantly impact the price of wholesale and retail electric power.

As a means of helping Montana policymakers, businesses and households understand the implications of 111(d), NorthWestern Energy contracted with the Bureau of Business and Economic Research at the University of Montana to conduct an economic analysis of the impacts on the state economy that would result from actions necessary to comply with the rule.

Summary of Findings

While Montana's compliance plan for 111(d) is not due to be submitted to the EPA until 2018, any compliance scenario will contain three changes from the status quo:

The closure and decommissioning of existing generation facilities in Montana, with consequences for upstream (e.g., coal mine) and downstream (transmission line) assets, required to reduce CO2 emission rates in compliance with the rule; the construction and operation of new, less CO2-intensive generating facilities, with the necessary infrastructure (pipelines, transmission system improvements) to maintain the safe, reliable provision of electric power to Montana businesses and households, and changes in wholesale and retail electricity markets that reflect capital investments and the changing mix of generation regionally and nationally.



FOREST PRODUCTS RESEARCH

Dynamic Year in Forest Industry Research

The Forest Industry Research Program (FIRP) successfully brought in over \$522,000 in new research agreement funds during FY 2016. The program had about \$1.9 million in active agreements and 10 to 12 externally funded research projects ongoing throughout the year. Personnel expenses paid from agreements totaled \$464,312 in FY 2016, with \$374,224 remaining for personnel and \$63,446 for other expenses at year-end (June 30). Similar expenditures and savings to the state budget are expected in FY 2017.

This year the FIRP had several major personnel changes. Chuck Keegan, former director of the program, retired "for real" in November 2015, although we still see him working occasionally. In December 2015, we hired Kate Marcille, a Montana native with a master's degree in forest economics from Oregon State University and an undergraduate degree from the University of Montana.



The FIRP continued its core research with the USDA Forest Service's Forest Inventory and Analysis (FIA) Program at both the regional (12 western states) and national levels. Our ongoing agreements with FIA involve Timber Products Output (TPO) research, studying timber harvest and use, and the forest industry. We produced reports on timber harvest and forest industry in Arizona, California, Colorado, New Mexico, Oregon, and Utah. We also continued our ongoing work with the Northern Region (R1) of the Forest Service, collecting timber harvesting and log hauling costs in Idaho and Montana. These efforts benefit local and national data users seeking more information on the changes, sustainability and economic impacts of the West's forest industry.

The FIRP completed its fifth and final year with the Northwest Advanced Renewables Alliance (NARA) in July 2016. NARA was organized to conduct research and development of a wood-based bio-jet fuel industry in Oregon, Washington, Idaho and Montana.

SURVEY RESEARCH

Over 30 Years of Project-Specific Data Collection and Analysis

BBER's Survey Research program designs studies, in a variety of subject areas, for respected corporate and government clients. BBER's professional and highly trained researchers utilize sophisticated data collection mechanisms and techniques to conduct surveys for contract clients from a cross section of Montana's local and state governments, a variety of businesses and other organizations throughout the state. For over three decades, the expert team in the Survey Research program has been governed by the rigorous professional standards established by the American Association of Public Opinion Researchers.

In fiscal 2016, the Survey Research group utilized mixed-mode surveys, those using mail and the internet, and found significantly improved response rates versus a single data collection methodology. With the challenges of collecting data via telephone surveys this is a promising development for data collection in Montana.

The advanced methodology of study design, instrument development, sample design and selection, along with sophisticated mathematical analysis, ensure the data will pass demanding tests such as:

- Publication in peer-reviewed academic journals.
- Testimony before legislators.
- Examination in court proceedings.
- Close scrutiny by the media or special interest groups.

During 2015-16, BBER aided Montana policy makers, trade associations, the University of Montana and U.S. Government Agencies, by collecting and analyzing primary data in nine significant survey research projects. The survey research projects included:

- 1. The Perceptions about Alcohol and Drug Use in Montana Survey, for the Montana Department of Public Health and Human Services measured adult Montanans' attitudes about alcohol and drug use and abuse in the state, and to learn about preferences for possible measures to combat substance abuse in the state. The survey was completed by telephone, and was completed by 800 adult Montanans.
- 2. University of Montana Energy Initiative, a study for the University of Montana President's Office utilized two focus groups, in Billings, with key University stakeholders examining their perceptions of the University's role in Montana's energy economy.

- 3. TranPlan21 Public Involvement and Stakeholders' Surveys, used two telephone surveys of 1,039 adult Montana residents and 397 key stakeholders examining perceptions about, and satisfaction with, Montana's transportation system.
- 4. Montana High Tech Business Alliance Survey, used an internet survey of 129 "high tech" businesses in Montana which examined those business's contributions to the Montana economy.
- 5. Missoula Long-Range Transportation Plan Survey, was conducted for the Missoula Metropolitan Planning Organization used a mixed-mode survey technique, internet and mail, of 643 adult residents of the Missoula metropolitan planning area and examined their perceptions of, and satisfaction with, the Missoula transportation system.
- 6. University of Montana Football Game Attendees Survey, conducted for the University of Montana Athletic Department, was an internet survey of 584 adults who live outside Missoula County and attended a UM football game in the fall of 2015 to measure their football-related spending in Missoula County.
- 7. Montana Airports Survey, for the Montana Department of Transportation, designed and implemented two internet and mail surveys of 560 Montana businesses and 83 Montana hospitals to determine their use of, and satisfaction with, Montana's airports.
- 8. Montana Crime Victim Survey, for the Montana Board of Crime Control utilized an internet and mail survey of 2,000 adult Montana residents to learn about their past year experiences as possible victims of crime.
- 9. Southwest Crown of the Continent Study Development, is an ongoing study for the U.S.D.A. Forest Service developing a study plan and a test questionnaire to submit to the U.S. Office of Management and Budget for approval and future administration.

Montana Statewide Media Habits Survey

Montanans highly value their news and are increasingly using mobile devices to access news over the Internet. Among younger Montanans, ages 18 to 34, 58 percent reported obtaining news online or by mobile device every day. And young people aren't the only ones who are tech savvy news consumers. Montanans in every age group, including 65 and older, are reading the latest news stories on phones, tablets and computers. They also rely on traditional news content producers like television stations and actively seek local news.

In a world with a growing wealth of internet-based news and information, some vital questions were addressed in a survey by the Bureau of Business and Economic Research for the Greater Montana Foundation, an organization that encourages communication, with emphasis on electronic media and the important issues facing Montana. The questions asked included:

- What do Montanans believe are the most important issues facing our state?
- Where do Montanans prefer to get trusted information on these issues?

The findings of the survey were important as they come at a time of change in media technology and internet growth. These changes mean there will be new media business models and the preferences of Montana's information consumers are key. From the perspective of citizen engagement, the wealth of today's information raises questions about which sources, both inside and outside Montana, should be trusted.

The survey results demonstrate that Montanans appear discerning and have trusted media sources. In addition, traditional news sources are critical to Montanans' ability to receive information on key issues, led by television. Despite growing use of the internet as a news conduit, it appears that traditional sources are holding their own and are trusted by Montanans.

NATURAL RESOURCES AND ENERGY RESEARCH

A Year of Volatility

BBER's Natural Resources and Energy team continued to monitor the volatile energy sector in 2015-16.

With the continued decline in oil and gasoline consumption worldwide, oil production in the U.S. continued at a steady pace. However, investment in new exploration and the completion of existing wells came to a virtual standstill in late 2015-16. While this is not good news for the industry, it is nowhere near as bad as the bust that occurred in the 1980's.

Oil patch workers have begun migrating to other areas where work is available and in Montana that translates into workers moving to the areas where construction is growing, such as Kalispell and Gallatin County in Montana or perhaps simply moving back home from the Bakken.

With the decline in demand for coal in domestic and foreign markets, rail cars are being parked on sidings across Montana and the industry is down approximately 28% across the state. This has caused dramatic cutbacks on rail transportation.

Non-traditional sources of energy such as wind and solar, though still a minor component of Montana's energy portfolio, continue to see increased interest, investment and small increases in kilowatt output across the state.

MANUFACTURING RESEARCH

BBER continues to monitor this important industry sector. New and expanded manufacturing plants in Missoula and Great Falls have contributed to faster growth in those communities.

Montana manufacturing employment has grown faster than the rest of the nation. U.S. manufacturing wage and salary employment rose from 11.8 million workers in 2009Q2 to 12.4 million in 2015Q3, an increase of 4.7 percent. Montana manufacturing employment increased from 17,500 in 2009Q2 to 19,400 in 2015Q3, an increase of 10.9 percent.

The strong growth in Montana manufacturing employment occurred despite permanent closures in several industries, such as the Smurfit-Stone paper mill near Missoula, which permanently closed in early 2010. This facility was the largest manufacturing plant in the state.

In addition, there were shutdowns and closures in the wood products industry. Even though the closures in both industries occurred during a period of poor markets, the long-term cause was a significant decrease in the supply of raw materials due to diminished harvests on federal and some industrial lands.



MONTANA KIDS COUNT

Tracking Child Well-Being Since 2000

Montana KIDS COUNT is one of 53 KIDS COUNT offices throughout the United States and its territories. This network is a project of the Annie E. Casey Foundation, which also brought the Juvenile Detention Alternative Initiative to Montana and supports a number of other Montana non-profits that work to promote the well-being of children and families in the state.

Montana KIDS COUNT (MTKC) has been housed at the Bureau of Business & Economic Research since 2000. Initially part of the Bureau's health care economics section, it has evolved into a research unit in its own right, conducting data and policy research as a member of the larger KIDS COUNT network, as well as performing additional independent contract work related to child and family well-being in Montana. MTKC currently has three full-time employees and is contracting with three part-time independent consultants.

Over the past 5 years, MTKC has become increasingly involved in program evaluation work, especially evaluations of projects based on federal grant programs. Currently, MTKC manages the evaluation of state programs funded by the Substance Abuse and Mental Health Services Administration (SAMHSA) and by the U.S. Office of Adolescent Health. One of MTKC's staff is also involved in the Office of Public Instruction's Montana Behavioral Initiative as a school staff trainer, conference coordinator and as the state's representative to the national Parent-Teacher Home Visit Project.

In the past, MTKC has performed needs assessments in the area of early childhood education, and provided extensive data research for Montana counties and for Montana and Wyoming tribal communities. KIDS COUNT staff also provide communications, framing assistance and deliver presentations on a wide range of topics, but most notably in the areas of early childhood education and development, mental health care and suicide prevention, traffic safety and substance abuse prevention.



HEALTH CARE RESEARCH & SOCIAL POLICY ANALYSIS

Center of Excellence Focused on Montana's Health Care Market for Over 20 Years

The Bureau's Health Care Research Program investigates all aspects of the health care market in Montana. The program monitors and investigates health care demand, supply of care and cost of health care, along with the regulations and institutions, which impact and shape Montana's health care markets.

While keeping watch on the health care segment, the program also provides contract research services to public and private organizations, with specific information needs, to support decision making and policy direction.

For the past several years, the program has collaborated with the University of Montana's RTC: Rural. For nearly 30 years, RTC: Rural has conducted disability research as part of the Rural Institute at the University of Montana. RTC: Rural is funded by the National Institute on Disability, Independent Living and Rehabilitation Research (NIDILRR) to improve the ability of people with disabilities to engage in rural community living. BBER's health care research program worked on eight projects with UM's RTC: Rural.

Over the past year, the program has:

- Conducted several studies regarding Montana's Medicaid expansion.
- Completed two analyses of Native Americans in Montana heath and health insurance coverage.
- Investigated women's participation in pre-entrepreneurial activities with the Blackstone Launchpad and the Kauffman Foundation.
- Described the net outmigration of Montana's young educated workers.
- Evaluated school programs.

Understanding Women's Participation in Entrepreneurship

The Ewing Marion Kauffman Foundation, a leader in advancing education and entrepreneurship, recently awarded the University of Montana's Blackstone LaunchPad a \$25,000 grant to further understand women's participation in pre-entrepreneurial activities.

Research shows that women are less likely to become entrepreneurs, and the disparities between men's and women's entrepreneurial inclinations appear at the earliest stages of the process. The University of Montana's Bureau of Business and Economic Research and the Blackstone LaunchPad will administer the grant and conduct the research.

"When we examine barriers that prevent women from engaging in entrepreneurship outlined by the Small Business Administration, we see women have more domestic responsibilities than men, they are more risk averse than men, they face more discrimination than men and more," said Bryce Ward, BBER associate director. "However, a startup incubator like Blackstone LaunchPad is pretty low-risk and knocks down some of those barriers. So why aren't the numbers different? Or, how can we make those numbers different?"

BBER and Blackstone LaunchPad have designed a one-year research plan to better understand why female students may choose not to engage in entrepreneurship and to pilot and test various activities and initiatives to increase female participation. The plan includes:

- A survey of University of Montana and Montana State University students.
- Development, implementation and evaluation of a system for increasing female engagement with Blackstone LaunchPad.
- Development and implementation of a rigorous method for tracking LaunchPad participants through the startup process and evaluating that data for evidence of gendered barriers.

SEMINARS AND OUTREACH

41st Annual Economic Outlook Seminars Rising Property Tax Bills – What You Should Know



In early 2016, the Bureau traveled around the state presenting its 41st Annual Economic Outlook Seminar. This year's program was entitled "Rising Property Tax Bills: What You Should Know."

The University of Montana's Bureau of Business and Economic Research worked together with NorthWestern Energy to present keynote speaker Dr. Doug Young, emeritus professor of economics at Montana State University, along with other seminar participants to nine cities around the state. This included BBER's first ever live webcast of the Outlook Seminar from Havre and MSU-Northern.

Dr. Young, who received his PhD from the University of Wisconsin-Madison, has spent his entire academic career teaching and working with students at Montana State University, discussed Montana's current property tax system and its future viability.

Every year between late January and the middle of March, BBER presents the Montana Economic Outlook Seminars in nine cities across the state. Bureau economists, along with other industry experts, travel across Montana to offer statewide and regional economic forecasts for the coming year. These forecasts include reports on key industries, such as health care, forest industry products, real estate and housing, agriculture, tourism and energy. In each city a local expert reports on that city's economic status. In 2015, Outlook Seminars were held in Missoula, Helena, Great Falls, Billings, Bozeman, Butte, Kalispell, Sidney and Miles City.

In 2016, seminar registrations totaled nearly 1,400 throughout the nine-city seminar tour. Audiences for the 2016 Montana Economic Outlook Seminars included:

- Real Estate and Rental and Leasing
- Finance and Insurance
- Public Administration
- Professional, Scientific and Technical Services
- Educational Services
- Utilities
- Manufacturing

11th Annual Montana Economic Update Series The Competition for Talent

Bureau director Patrick Barkey and executive director of Enterprise and Executive Development, Kate McGoldrick presented the 11th Annual Economic Update Series entitled "The Competition for Talent," sponsored by the Montana Chamber Foundation, in seven cities across Montana.

In eastern Montana, commodities prices have stagnated and the transportation segment has slowed with decreases in wheat and coal shipments. Meanwhile, western Montana has seen a rebound in construction and tourism. "There is a balancing out of growth across Montana," said Patrick Barkey in his economic update presentation. "As the east side cools, the west side is warming up." These factors, coupled with low unemployment in the state, is creating a competition for talent in some markets.

In her presentation, Kate McGoldrick addressed finding and retaining a high quality workforce. With improving economic conditions in some areas, changing technology and turnover or retirement of owners, managers and workers at all levels, there is no greater need for Montana companies and organizations today than attracting and retaining the talent. McGoldrick went on to elaborate on the differences between retiring baby boomers and millennials who are competing for those opportunities, as well as insights into the best practices for recruiting, developing and retaining new employees.

Meet the Student Workers

BBER is very fortunate to have three University of Montana students working with us. They are Megan Elensky, Zoie Koostra and Jenessa Albertson. Everyone in the Bureau appreciates their efforts and there is no doubt things run smoother with their help. Thank you for doing such a great job at BBER.

Megan Elensky is a senior majoring in accounting and management. She also serves as BBER's registration coordinator. When she is not working or studying she volunteers at Run Wild Missoula. Zoie Koostra is a junior majoring in media arts and journalism. She is the publications assistant, working with the publications director. She also works at the Montana Kaimin as a designer and as a server at one of Missoula's food and beverage establishments.

Jenessa Albertson is a senior studying English literature. After graduation, she is planning on pursuing a master's in education and wants to become an English teacher. When not working or studying she volunteers at the YMCA, coaching middle school girl basketball teams.

MONTANA BUSINESS QUARTERLY

Research on the Issues of the Day

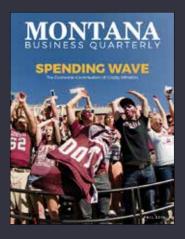
For more than 50 years, the award-winning Montana Business Quarterly has provided a comprehensive overview of business and economic trends throughout the state.

The Montana Business Quarterly has a readership of 4,800 plus across Big Sky Country. Our readers include business executives, legislators, government officials and policymakers, as well as libraries and universities.

Upcoming issues tackle subjects important to Montana, such as child well-being, retaining college graduates within the state, and the economic impact of the oil boom and bust. The magazine also publishes exclusive research, such as the economic impact of University of Montana athletics on the Missoula economy and how Montanan's use technology in consuming news.

The magazine is looking toward the future with a new focus on subject matter, design and digital distribution. Plans are in the works for a new website, providing means for digital publishing across multiple platforms like Facebook and Twitter.

Under the reigns of new publishing director, Scott Hawk, you can expect interesting stories and compelling content from the Montana Business Quarterly in the upcoming year!







10 24

FOL

30 74

83

POL

SERVICE TO THE UNIVERSITY, COMMUNITY AND PROFESSIONAL ASSOCIATIONS

Lending Time and Expertise outside BBER

Service to the various communities we work in and serve, along with those communities we engage outside of the normal sphere of our operations, is an important real-world component of BBER's mission to "serve the general public." To that end, Bureau members serve on boards for professional organizations, actively participate in important roles at the university and willingly share their knowledge and expertise with groups and individuals across the state. Examples of these contributions in FY 2016 include:

- Giving over 120 presentations across Montana and the West.
- Responding to hundreds of requests for information.
- Providing information and interviews for various media outlets around Montana.
- Board of Director service with the Association for University Business and Economic Research, the Mountain Pacific Quality Health Foundation and the Keep Montana Green Association (wild fire prevention) and Parent Teacher Home Visit Project.
- Serving on committees, such as the Lolo Restoration Committee, Montana Forest Restoration Committee, Southwest Crown
 of the Continent Monitoring and Socioeconomic sub-committee, Society of American Foresters Ethics Committee, Montana
 Behavioral Initiative Steering Committee, Missoula DUI Taskforce, Northwest Power and Conservation Council-Demand
 Forecast Advisory Committee, NorthWestern Energy Technical Advisory Committee, Pacific Northwest Regional Economic
 Conference(past President), Local Wood is Good Wood Committee and others.
- Professional members of American Association of Public Opinion Research, National Association of Business Economists, Regional Economic Models, Inc. Users Group, NorthWestern Energy Infrastructure Stakeholder Group, U.S. Geological Survey, Society of American Foresters, Rural Sociological Society, Timber Measurements Society and the Association for University Business and Economic Research.
- Montana representative in the Federal-State Cooperative Population Estimates Program (FSCPE), a partnership between the states and the U.S. Census Bureau, along with many other professional associations serving a diverse range of organizations and worthwhile causes.

The Bureau has a long-standing tradition of active involvement in its national organization, the Association for University Business and Economic Research (AUBER). BBER continues to serve as the business office and secretary-treasurer for the organization, publishing the AUBER newsletter and serving as the AUBER webmaster.

BBER is also involved in the Pacific Northwest Regional Economic Conferences (PNREC). This year's two-day conference was held in Vancouver, Washington and focused on "50 Years of Economic Transformation" in the region. The conference draws professionals from the Pacific Northwest and western Canada.



RESEARCH PROJECTS

Economic Analysis

The Economic Contribution of Grizzly Intercollegiate Athletics, (with Kyle Morrill), August 2016. University of Montana Department of Athletics. An economic impact study of intercollegiate sports at UM, based in part on a survey of UM football season ticket holders.

The Economic Implications of Implementing the EPA Clean Power Plan in Montana, November 2015. NorthWestern Energy. An economic impact study of the scenario of Clean Power Plan compliance for Montana that involves a shutdown of the Colstrip Steam Electric Station.

Economic Impact of Old Saw Mill District, Phase III [10/2015; Northern Rockies Regional Center]. Prepared analysis of economic impact of Old Saw Mill District Phase III for purposes of obtaining EB-5 certification.

University of Montana Football Game Attendees Survey, winter and spring 2016. University of Montana Athletic Department. An Internet survey of 584 adults who live outside Missoula County and attended a UM football game in fall 2015 to measure their football-related spending in Missoula County.

Economic Impact of Craft Brewing in Montana, September 2016. Sponsored by the Montana Brewers Association. A follow-up study surveying Montana craft brewers to evaluate the economic impact of the industry in the state.

Education

Montana's Knowledge Economy, ongoing. Montana has long experienced net outmigration of its young college educated workers. This project describes and attempts to explain this phenomenon and asks, "What, if anything, might be done to change this?"

Forest Products and Manufacturing

USFS Region 1 Logging/Hauling Cost Study, ongoing. Sponsored by the USDA Forest Service Region One. Loggers and log haulers are surveyed to track logging and hauling cost in Montana and northern Idaho for Region 1 of the USFS. During even number years log hauling cost are updated, in odd numbered years harvesting cost are surveyed and reported. The USFS uses these costs for timber sale planning and appraisals.

Quarterly Montana Forest Products Industry Reports, ongoing. Each Quarter major Montana forest product facilities are surveyed for their employment, wage and production numbers for analysis and reported on the BBER website. Also surveyed and reported are the average delivered log prices by species and regions at these same facilities.

Southwest Crown of the Continent Study Development, ongoing. U.S.D.A. Forest Service. Develop a study plan and test a questionnaire to submit to U.S. Office of Management and Budget for approval and future administration.

On-going Timber Product Output and Forest Industry Analysis for the Interior West States, ongoing. A joint venture research agreement with the USDA Forest Service, Rocky Mountain Research Station, Ogden, UT, to provide analysis of the forest industry, timber use, and impact on timber inventory in the Rocky Mountain region. Project completion April 2021.

Monitoring in the Southwest Crown of the Continent (SWCC) – Contract Attributes Monitoring, ongoing. A challenge cost share agreement with the USDA Forest Service to develop a contract attributes database of Collaborative Forest Landscape Restoration Program (CFLRP) contracts issued in the SWCC and perform local contract capture analysis of CFLRP contracts awarded in the SWCC area – i.e., northwest Montana. Project completion December 2020.

Alaska Logging Utilization, ongoing. A joint venture research agreement with the USDA Forest Service, Pacific Northwest Research Station, Portland, Oregon, to study and report on the quantities of logging residue generated while harvesting timber in Alaska. Project completion date July 2020.

Socioeconomic Direct Effects Monitoring for NEW Forest Vision 2020, ongoing. A cost-reimbursable agreement with the USDA Forest Service to measure and understand the distribution and effects of Forest Service contracts for projects on the Colville National Forest in northeast Washington. Project completion May 2020.

Region One Logging and Log Hauling Costs, ongoing. A challenge cost share agreement with the USDA Forest Service, Region One, Missoula, Montana, to conduct an analysis of logging and log-hauling costs in Montana and Idaho. Project completion January 2019.

Alaska Timber Harvest and Log Export Data Evaluation, ongoing. A joint venture research agreement with the USDA Forest Service, Pacific Northwest Research Station, Portland, Oregon, to identify, understand, and reconcile differences in published timber harvest and log export data in Alaska and other Pacific states by examining published data and working with the agencies and businesses that collect, compile, and report log export and timber harvest information. Project completion December 2017.

Ongoing Pacific States Forest Industry and Timber Harvest Analysis, ongoing. A joint venture research agreement with the USDA Forest Service, Pacific Northwest Research Station, Portland, Oregon, to conduct a comprehensive analysis of the primary forest products industry in Alaska, California, Hawaii, Oregon and Washington by examining trends in wood products, industry structure, source of timber supply and employment. Project completion July 2017.

Southern Rockies Logging Utilization, ongoing. A joint venture research agreement with the USDA Forest Service, Rocky Mountain Research Station, Ogden, Utah, to study and report on the quantities of logging residue generated while harvesting timber in Arizona and New Mexico. Project completion July 2017.

Employment and Income Response, ongoing. A challenge cost share agreement with the USDA Forest Service, Ecosystem Management Coordination (EMC), Fort Collins, CO, to conduct a national analysis of direct employment and worker earnings associated with the harvesting, hauling, and processing of timber into primary wood products. Project completion December 2016.

Expanding Bioenergy Production from Mill and Fuel Treatment Residues in the Southern Rocky Mountains, ongoing. A joint venture research agreement with the USDA Forest Service, Rocky Mountain Research Station, Missoula, MT, to quantify supply, demand, capacity, energy balance, and emissions related to woody materials potentially available for use for biomass energy in Arizona, Colorado, and New Mexico. Project completion December 2016.

Monitoring in the Southwest Crown of the Continent (SWCC)--Contract Attributes Monitoring, ongoing. A challenge cost share agreement with the USDA Forest Service to develop a contract attributes database of Collaborative Forest Landscape Restoration Program (CFLRP) contracts issued in the SWCC and perform local contract capture analysis of CFLRP contracts awarded in the SWCC are--i.e., northwest Montana. Project completion September 2016.

AFRI Northwest Biomass Feedstock Analysis, ongoing. A cooperative research agreement through WSU with the USDA Agriculture and Food Research Initiative (AFRI), to conduct a comprehensive analysis of the woody biomass supply and potential for bio-jet fuel production in Montana, Idaho, Oregon, and Washington. Project completion July 2016.

Montana Wood Products Directory, June 2016. A sales and service contract with the Montana DNRC to develop a new, searchable and GIS-enhanced online directory of wood products firms in Montana, building on the existing MMIS database.

On-going Timber Product Output and Forest Industry Analysis for the Interior West States, April 2016. A joint venture research agreement with the USDA Forest Service, Rocky Mountain Research Station, Ogden, Utah, to provide a comprehensive analysis of timber use and impact on timber inventory in the Rocky Mountain region.

5-year Monitoring Report: Local Business Utilization and Opportunities for Growth in the Southwestern Crown of the Continent CFLRP, ongoing. A challenge cost-share agreement with USDA Forest Service Region One to update contract capture analysis for service, stewardship, timber and agreements to understand local community benefit from CFLRP and identify opportunities for growth.

Wyoming's Forest Products Industry and Timber Harvest, 2014, fall 2015. A JVA with Rocky Mountain Research Station, Interior West FIA, to: collect updated data on Wyoming's primary forest products industry and timber harvest and produce joint report covering Wyoming and South Dakota in cooperation with the Northern Research Station and South Dakota Department of Agriculture, Forestry and Conservation Division. Data tables available on line at: http://www.bber. umt.edu/pubs/forest/fidacs/WY2014.pdf

National Mill List, ongoing. Collaborative effort with the USFS Northern and Southern Research Stations to develop a national mill list to be used as sampling frame for collecting annual TPO data, IW and PNW joint venture agreements.

Feasibility of Creating a USFS timber Flow Database, ongoing. A challenge cost-share agreement to better align timber flow trends with Forest Service cut and sold data to characterize timber flow by forest and product type (sawlog, post, pole, non-saw) with the final product and mill destination using a combination of cut and sold reports and truck ticket data. The resulting dataset will allow the Forest Service to more accurately model the location and size of economic impacts associated with timber harvest activities.

Redesign of Timber Harvest & Industry Reports, ongoing. An effort supported IW and PNW joint venture agreements to redesign the periodic reports from a single, longer print document to a series of shorter, electronic documents with the goals of improving relevance and timeliness of publications and increasing the profile of BBER.

Employment and Wage Impacts of Timber Harvesting and Processing in the U.S., June 2016. A challenge cost share agreement to develop regional direct response coefficients for timber harvesting and processing. Journal article published in Journal of Forestry: http://www.ingentaconnect.com/ content/saf/jof/pre-prints/content-jof14082

Socioeconomic Direct Effects Monitoring of the NEW Forest Vision 2020, June 2016. A cost reimbursable agreement with the USDA Forest Service, Colville National Forest to conduct an analysis of direct effects resulting from the NEW Forest Vision CFLRP project and quantify the benefits of CFLRP funds on rural, forest-based communities.

Montana Wood Products Directory, June 2016. A sales and service contract with the Montana Department of Natural Resources and Conservation to connect the MMIS database to a new directory of Montana wood products manufacturers targeted at architects, engineers, specifiers and heavy DIY'ers with the goal of increasing the demand for and use of Montana-made wood products in commercial and residential construction in the state. Part of a larger USDA-funded effort led by a Wood Promotion Team working to increase awareness and acceptance of Montana wood products, forest management and the economic benefits they provide. www. buymontanawood.com

Alaska 2015 Forest Industry Data Collection System, ongoing. The Joint Venture Agreement (JVA) with Pacific Northwest Research Station, Pacific Northwest FIA to collect and report information on Alaska's primary forest products industry and timber harvest for the year 2015. Surveys conducted via phone, mailings, and in-person visits to help produce a report on Alaska's forest products industry and the changes occurring since the 2011 Alaska FIDACS report.

Idaho 2015 Forest Industry Data Collection System, ongoing. The JVA agreement with Rocky Mountain Research Station, Interior West FIA to collect and report information on Idaho's primary forest products industry and timber harvest for the year 2015. Surveys conducted via phone, mailings, and in-person visits to help produce a report on Idaho's forest products industry and the changes occurring since the 2011 Idaho FIDACS report.

Timber Products Outputs, April 2016. Assisted in transforming 2014 Washington DNR timber harvest and mill residue data into FIDACS framework to enable delivery to the national Timber Products Output (TPO) database: http://srsfia2.fs.fed. us/php/tpo_2009/tpo_rpa_int1.php. Assisted with creating updated Interior West FIA removals tables for Arizona 2012. Volume of timber removals by source material, species group and removal type were displayed in tables and discussed further in a TPO removals and industry section report for FIA's forthcoming 10-year Arizona report.

Northwest Advanced Renewables Alliance (NARA), ongoing. A national competitive research grant sponsored by the US Department of Agriculture, National Institute of Food and Agriculture. A five year, four state (Idaho, Montana, Oregon, and Washington), study of the feasibility and implementation of using logging residue to produce bio-jet fuel and other coproducts. Organized, planned, and led all field data collection and analysis activities, measuring trees in active logging sites in Oregon, Washington and Montana. Provided ongoing analysis of data to accomplish project deliverables (final year).

Arizona and New Mexico Logging Utilization, ongoing. A four year joint venture agreement (JVA) with Rocky Mountain Research Station, Interior West FIA, to collect updated data and provide an analysis of logging utilization at the state level for Arizona and New Mexico that describes the characteristics of current logging operations in both states with comparisons between current and past analyses and provide logging residue factors for the RPA-TPO reporting process. Executed all activities to lead crews measuring trees in active logging sites in both states.

Alaska Logging Utilization Study, ongoing. A JVA with Pacific Northwest Research Station FIA, to: collect updated data and provide an analysis of logging utilization at the state level for Alaska, that describes the characteristics of current logging operations in Alaska with comparisons between current and past analyses and provide logging residue factors for the RPA-TPO reporting process. In process of planning sample scheme and first trip to measure trees in active logging sites.

Oregon's Forest Products Industry and Timber Harvest, 2013 With Trends Through 2014, June 2016. A JVA with Pacific Northwest Research Station FIA, to: collect updated data on Oregon's primary forest products industry and timber harvest to produce critical data for the Resource Planning act Timber Products Outputs (RPA-TPO) reporting process, and provide a point in time analysis with comparisons to previous reports in an ongoing periodic series. Publication in process. Data tables are available on line at: http://www.bber.umt.edu/ pubs/forest/fidacs/OR2013.pdf

Idaho's Forest Products Industry and Timber Harvest 2015, ongoing. A JVA with Rocky Mountain Research Station, Interior West FIA, to collect updated data on Idaho's forest products industry and timber harvest to produce critical data for the RPA-TPO reporting process, and provide a point in time analysis with comparisons to previous reports in an ongoing periodic series. Data collection 85 percent complete.

Health Care

Evaluation Plan for Montana Medicaid Expansion, June 2016. As part of the waiver the Montana received to implement its own version of Medicaid expansion (HELP), Center for Medicare and Medicaid Services (CMS) requires a rigorous evaluation of various aspects of waiver – we designed the evaluation to meet the requirement.

Economic Impact of Medicaid Expansion, ongoing. In many states, proponents of Medicaid expansion argued that it would increase economic activity. In this project, we examine the actual experience and compare it to projections.

Analysis of Native American Montanan's Health and Health Insurance Coverage, October 2015. Prepared report describing Native American Montanans health status and health insurance coverage.

Updated Analysis of Native American Montanan's Health and Health Insurance Coverage, January 2016. Updated report describing Native American Montanans health status and health insurance coverage to include data after ACA implementation.

Evaluation of Montana's Patient Centered Medical Home (PCMH) ongoing. Sponsored by the Commissioner for Securities and Insurance. Prepared a report and presented results to legislative committee about the effects of Montana's PCMH program. Pain and Participation, ongoing. Collaboration with the University of Montana RTC Rural Institute. Prepared multiple scholarly articles using Ecological Momentary Assessment data that examine the impact of pain, disability, etc. on individual's daily choices.

Home and Health, ongoing. Collaboration with the University of Montana RTC Rural Institute. Prepared multiple scholarly articles using original survey and American Time Use Survey to describe the effect of home environment on individual participation in daily life.

Rural Community Living, ongoing. Collaboration with the University of Montana RTC Rural Institute. Prepared multiple scholarly articles using original survey to examine participation in daily life for people with disabilities living in rural communities.

Missoula One Health, ongoing. A proposal to create a platform for improving community health in Missoula. An ongoing collaboration with Dean Reed Humphries and Professor Tony Ward (of UM Health and Medicine) and Ellen Leahy of Missoula County Public Health.

High Tech

Montana High Tech Business Alliance Survey, Fall 2015 and Winter 2016, Montana High Tech Business Alliance, an Internet survey of 129 high tech businesses in Montana that examined those business's contributions to the Montana economy.

A Profile of Montana's High-Tech Industries, February 2016. Sponsored by the Montana High Tech Business Alliance. An analysis of data collected from the High Tech business survey investigating the magnitude and trend of the industry.

Manufacturing

The State of Montana Manufacturing, July 2015. Sponsored by the Montana Manufacturing Extension Center. Provide comprehensive data on this segment of Montana's economy.

Montana KIDS Count

Healthy Montana Teen Parents Program, ongoing. Early Childhood Services Bureau, Montana DPHHS (from U.S. Office of Adolescent Health). State-level evaluation of grant implementation and outcomes for nine sub-grantee programs that deliver services to expecting and parenting teens across the state.

Montana SPF-PFS/Partnership Program, ongoing. Addictive & Mental Disorders Division, Montana DPHHS (from U.S.

Substance Abuse & Mental Health Services Administration [SAMHSA]). State-level evaluation of implementation and outcomes of two-tiered substance abuse prevention effort across 23 Montana communities.

Montana KIDS COUNT 2016, ongoing Annie E. Casey Foundation. Data and policy analysis, and information dissemination on issues pertaining to child and family well-being in Montana.

Montana Behavioral Initiative, ongoing. Montana Office of Public Instruction (from U.S. Department of Education). Initiative that promotes positive behavior and climate in Montana schools, in part through the national Parent-Teacher Home Visit Program (PTHVP) and the Academic Parent-Teacher Teams (APTT) model. Collaborative project with Missoula County Public Schools; Missoula City-County Health Department; and UM School of Education, School of Counselor Education, School of Social Work and School of Psychology, that builds the capacity of professionals to more effectively engage families in education.

Natural Resources and Energy

University of Montana Energy Initiative, spring and summer 2015, University of Montana President's Office, two focus groups with key University stakeholders examining their perceptions of the University's role in Montana's energy economy.

The Continuing Contributions of the Oil and Gas Industry to the Montana Economy, June 2016. Sponsored by the Montana Petroleum Association. An assessment of the impact of the oil and gas operations in the state of Montana

Real Estate and Housing

Montana Real Estate, Trends and Demographics, January 2016. BBER. BBER annually estimates new home construction by combining building permits with utility hookups in geographies where permits are not required, as well as affordability, rent, and other demographic information relevant to the Montana real estate market.

Transportation

TranPlan21 Public Involvement and Stakeholders' Surveys, spring through fall 2015, Montana Department of Transportation, two telephone surveys: 1,039 adult Montana residents and 397 key stakeholders that examined perceptions about and satisfaction with Montana's transportation system.

Missoula Long-Range Transportation Plan Survey, Missoula Metropolitan Planning Organization, fall 2015 and winter 2016, an internet and mail survey of 643 adult residents of the Missoula metropolitan planning area that examined their perceptions of and satisfaction with the Missoula transportation system.

Montana Airports Surveys, Montana Department of Transportation, winter 2016 through ongoing, two Internet and mail surveys: 560 Montana businesses and 83 Montana hospitals, to determine their use of and satisfaction with Montana's airports.

TranPlan21 Public Involvement Survey, September 2015. Sponsored by the Montana Department of Transportation. An analysis of the data collected from the TranPlan21 public involvement survey assessing Montanans' current attitudes and beliefs regarding public transportation infrastructure.

TranPlan21 Stakeholder Survey, October 2015. Sponsored by the Montana Department of Transportation. An analysis of the data collected from the TranPlan21 stakeholder survey assessing Montana stakeholders' current attitudes and beliefs regarding public transportation infrastructure.

Other

Understanding and Increasing Women's Participation in Pre-Entrepreneurial Activities, (10/2015-10/2017, Kauffman Foundation). Working with the Blackstone Launchpad, this project attempts to describe and explain why women are less likely to take the first baby steps toward entrepreneurship.

Survey of Perceptions of about Alcohol Use and Regulation in Montana, spring and summer 2015, Montana Department of Public Health and Human Services, a telephone survey of 800 adult Montana residents.

Montana Crime Victimization Survey, Montana Board of Crime Control, ongoing. An internet and mail survey of 2,000 adult Montana residents to learn about their past year experiences as possible victims of crime.



RESEARCH PUBLICATIONS

Economic Analysis

Barkey, Patrick M., "Statewide Economic Performance: A Year of Strong Growth," *Montana Economic Report*, January 2016.

Barkey, Patrick M., "Major Economic Events of 2015: The Economic Environment Evolves," *Montana Economic Report*, January 2016.

Barkey, Patrick M., "How Montana is Faring in the Post-Commodity Boom Economy," *Montana Business Quarterly*, Vol. 53 No. 3, (Autumn 2015).

Barkey, Patrick M. and Kyle Morrill, "The Economic Contribution of Grizzly Intercollegiate Athletics," The University of Montana Department of Athletics, August 2016.

Barkey, Patrick M., "The Economic Implications of Implementing the EPA Clean Power Plan in Montana," NorthWestern Energy, November 2015.

Polzin, Paul E., Montana's Regions and Cities. What's Driving Growth? *Montana Economic Report 2016*, pp 5-7.

Polzin, Paul E., Transportation and Logistics. The Commodity Business Cools. *Montana Economic Report 2016*. pp. 32-33.

Polzin, Paul E., 2015 Evaluation and Economic Impact of the Montana Manufacturing Extension Center, Bureau of Business and Economic Research, University of Montana.

Education

Smolkowski, Keith, Lisa Strycker, and Bryce Ward. "Scale Up of Safe & Civil Schools' Model for School - Wide Positive Behavioral Interventions and Supports." *Psychology in the Schools* (2016).

Ward, Bryce "Explaining the Outmigration of Montana's College-Educated Workers." *Montana Economic Report 2016.*

Forest Products and Manufacturing

Berg, Erik. C., Todd A. Morgan, Eric A. Simmons, and Stan J. Zarnoch, "Logging Utilization Research in the Pacific Northwest: Residue Prediction and Unique Research Challenges." In Stanton, Sharon M., Glenn A. Christensen, comps. 2016. Pushing Boundaries: New Directions in Inventory Techniques and Applications: Forest Inventory and Analysis (FIA) symposium 2015. Gen. Tech. Rep. PNW-GTR-931. Portland, Oregon. Portland, OR: U.S. Department of Agriculture, Forest Service, Pacific Northwest Research Station. Published online January 2016: http://www.fs.fed.us/pnw/pubs/pnw_gtr931.pdf

Berg, Erik, Todd Morgan, Eric Simmons, Stan Zarnoch, Micah Scudder. "Predicting Logging Residue Volumes in the Pacific Northwest." *Forest Science* 62 (Forthcoming). Accepted for publication May 2016. Published online June 2016: http:// www.ingentaconnect.com/content/saf/fs/pre-prints/ content-forsci15176;jsessionid=3efo71vgfc9i5.victoria Loeffler, Dan, Nate Anderson, Todd A. Morgan and Colin B. Sorenson. "On-Site Energy Consumption at Softwood Sawmills in Montana." *Forest Products Journal* 66(3/4):155-163. 2016. Print.

McIver, Chelsea P.; Joshua P. Meek, Todd A. Morgan, Glenn A. Christensen. "California's Forest Products Industry and Timber Harvest, 2012." Gen. Tech. Rep. PNW-GTR-908. Portland, OR: U.S. Department of Agriculture, Forest Service, Pacific Northwest Research Station. 2015. Print.

Simmons, Eric, Todd Morgan, Erik Berg, Steven Hayes and Glenn Christensen. "Logging Utilization in Oregon and Washington, 2011-2015." Gen. Tech. Rep. PNW-GTR-XXX (forthcoming). Portland, OR: U.S. Department of Agriculture, Forest Service Pacific Northwest Research Station. Submitted for electronic publication May 2016.

Sorenson, Colin B., Steven W. Hayes, Todd A. Morgan, Eric A. Simmons, Micah G. Scudder, Chelsea P. McIver, Mike T. Thompson. "The Four Corners Timber Harvest and Forest Products Industry, 2012." Resour. Bull. RMRS-RB-21. Fort Collins, CO: U.S. Department of Agriculture, Forest Service, Rocky Mountain Research Station. 2016. Print.

Sorenson, Colin B., Charles E. Keegan, III, Todd A. Morgan, Chelsea P. McIver, Michael J. Niccolucci. "Employment and Wage Impacts of Timber Harvesting and Processing in the United States." Journal of Forestry 114(4), 485-493. Print.

Werstack, Charles E., Jr., John D. Shaw, Sara A. Goeking, Chris Witt, Jim Menlove, Michael T. Thompson, R. Justin DeRose, Michael C. Amacher, Sarah Jovan, Todd A. Morgan, Colin B. Sorenson, Steven W. Hayes, Chelsea P. McIver. "Utah's Forest Resources, 2003-2012." Resour. Bull. RMRS-RB-20. Fort Collins, CO: U.S. Department of Agriculture, Forest Service, Rocky Mountain Research Station. 2016. Print.

Cook, Philip S., Todd A. Morgan, Steven W. Hayes, Colin B Sorenson, Eric Simmons, and Dennis R. Becker. 2016. "Idaho's Forest Products Industry Current Conditions and 2016 Forecast." Idaho Forest, Wildlife and Range Experiment Station, Moscow, ID. Station Bulletin 103, 4p. Available at: http://www.bber. umt.edu/pubs/forest/Outlook/IDOutlook2016.pdf

Furniss, Shannon, Colin B. Sorenson, Steven W. Hayes, and Todd A. Morgan. "Central Montana's Vibrant Manufacturing Center Reaches Global Markets." *Montana Business Quarterly* 53.2. (Summer 2015): 10-16. Print.

Marcille, Kate C., Steven W. Hayes, and Todd A. Morgan. "Uncertain Times for Montana's Dynamic Forest Industry." Montana Business Quarterly 53.4 (Winter 2015): 2-6. Print. Marcille, Kate C., Todd A. Morgan, and Steven W. Hayes. "Montana's Dynamic Forest Products Industry: Trends from 2000 to 2015." Montana Family Forest News: Are you ready? 43 (Spring 2016): 26-28. Print.

Morgan, Todd A., Steven W. Hayes, Colin B. Sorenson, and Chelsea McIver. "Forest Products: Challenges and Changes." *Montana Business Quarterly* 54.1 (Spring 2016): 17. Print.

Morgan, Todd A., Colin B. Sorenson, and Charles E. Keegan. "Manufacturing: A Year of Change." *Montana Business Quarterly* 54.1 (Spring 2016): 20. Print.

Scudder, Micah, Erik Berg, Todd A. Morgan, and Kate Marcille. "Alaska Log Exports & Timber Harvest Analysis." BBER White Paper. Prepared for PNW Research Station, Portland Forestry Sciences Lab. (December 2015): 1-23. Print.

Sorenson, Colin B., Steven W. Hayes, and Todd A. Morgan. "Results from the 2014-2015 Manufacturing Survey." Bureau of Business and Economic Research, Missoula, MT. 7p. Online: http://www.bber.umt.edu/pubs/manufacturing/ ManSurvey15.pdf

McIver, Chelsea P. "Measuring the Benefits of the Collaborative Forest Landscape Restoration Program for Local Communities in Northeast Washington, FY2012-2015." Final report submitted to USDA Forest Service, Colville National Forest. May 2016.

McIver, Chelsea P. "Infographic: Are Forest Restoration Investments Benefiting Local Communities Most in Need?" Missoula, MT: University of Montana, Bureau of Business and Economic Research, 2016. Web.

Hayes, Steve; McIver, Chelsea P. Bureau of Business and Economic Research. Montana Tree Farm News. Fall 2015.

McIver, Chelsea P. "Restoration of National Forests Benefits Local Communities." *Montana Business Quarterly,* summer 2015. Print.

Polzin, Paul E., The State of Montana Manufacturing 2016. Bureau of Business and Economic Research, University of Montana.

Health Care

Ward, Bryce "Expanding Medicaid in Montana: What do the experiences of other states tell us?" *Montana Economic Report 2016*.

Ward, Bryce "Health Care: Spending hits a speed bump." *Montana Economic Report 2016*.

Ward, Bryce "What Do We Learn About College Quality from the Average Earnings of its Students? Not Much." Working Paper. Ravesloot, Craig, et al. "Why Stay Home? Temporal Association of Pain, Fatigue and Depression with Being at Home." *Disability and Health Journal* 9.2 (2016): 218-225.

Livingston, Nick, Bryce Ward, Jennifer Wong, Tannis Hargrove, Craig Ravesloot. "The Effects of Daily Exertion and Pain on Participation: A Community-Based Ecological Momentary Assessment Study." Under review at *Rehabilitation Psychology*.

Ravesloot, Craig, Jennifer Wong, Bryce Ward. "Shared Meaning in Daily Life." Under review at *Journal of Positive Psychology*.

Greiman, Lillie, Parker Fleming, Bryce Ward, Craig Ravesloot. "Life Starts at Home: Bathing, Exertion and Participation for People with Disabilities." Working Paper.

Montana KIDS Count

Herling, Daphne. 2016. Montana Kids in Motion. *Montana KIDS COUNT Issue Brief*, Vol. 5, No. 1.

Through the Annie E. Casey Foundation/National KIDS COUNT:

"2015 National KIDS COUNT Data Book". *KIDS COUNT Annual Report*, July 2015.

"2016 National KIDS COUNT Data Book". *KIDS COUNT Annual Report*, June 2016.

"A Shared Sentence: The Devastating Toll of Parental Incarceration on Kids, Families and Communities". *KIDS COUNT Policy Report*, April 2016.

Natural Resources and Energy

Barkey, Patrick M., Paul Polzin and Terry Johnson, "Assessing the Future of Coal: Is There a Way Back Up?" *Montana Economic Report*, January 2016.

Barkey, Patrick M. and Kyle Morrill, "The Continuing Contributions of the Oil and Gas Industry to the Montana Economy." *The Treasure State Journal*, 2016.

Real Estate and Housing

Morrill, Kyle D. and Patrick Barkey. "Home Affordability in

Montana: An Issue Once Again?" *Montana Business Quarterly*, Vol. 53, No. 4, Winter 2015.

Transportation

Morrill, Kyle D. and John Baldridge "2015 TranPlan21: Public Involvement Survey," Montana Department of Transportation, September 2015.

Morrill, Kyle D., and John Baldridge. "2015 TranPlan21: Stakeholder Survey," Montana Department of Transportation, October 2015

Baldridge, John. 2015 Missoula Area Transportation Survey: Final Report. Research report. Missoula: UM Bureau of Business and Economic Research, 2015. Document.

High Tech

Barkey, Patrick, Kyle Morrill, John Baldridge. "A Profile of Montana's High Tech Industries", Montana High Tech Business Alliance, February 2016.

Other

Baldridge, John and Bill Whitsitt. "Getting the News: Technology Changes Habits." *Montana Business Quarterly*, autumn 2015: 2-7. Document.

Morrill, Kyle and Patrick Barkey. "Performance of the BBER Forecast: Data Revisions are a Challenge," *Montana Economic Report*, January 2016.

Polzin, Paul E., "2015 AUBER Membership Report." Bureau of Business and Economic Research, University of Montana.

Polzin, Paul E., "Q & A with Montana's Top Economists & Industry Experts." *Montana Business Quarterly*, Vol. 54 No. 1 (Spring 2016).

Ward, Bryce, Craig Ravesloot. "Socializing In-Person Matters." Working Paper.

Ward Bryce. "Moving Beyond Time and Money: Understanding the Effect of Effort Scarcity on Individual Choices." Working Paper.



Bureau of Business and Economic Research Gallagher Business Building, Suite 231 32 Campus Drive Missoula, Montana 59812

Phone: (406) 243-5113 Email: info@business.umt.edu

www.bber.umt.edu

