



THE ECONOMIC IMPACT OF **MONTANA'S** COOPERATIVES

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The Montana Cooperative Development Center (MCDC) and the Montana Council of Cooperatives (MCOC) coordinated the Montana Cooperative 2020 Economic Impact Report. The two organizations conduct an economic impact of Montana Cooperatives every other year. As 2020 has been a challenging year, it is exciting to get a strong baseline for the cooperative community and demonstrate cooperatives' resiliency. Our most profound appreciation goes to **CHS Foundation, Montana Electric Cooperatives Association, Montana's Farmers Union, Montana's Credit Unions, and Blackfoot Communications** for their significant contributions in making this year's Cooperative Impact Report happen.

The purpose of this report is to share the Montana cooperative community's entire story. Different cooperative sectors are highlighted, but all forms of cooperatives were asked to contribute. Montana's cooperatives are diverse, with credit unions, electrical, telecommunications, agriculture and agriculture supply stores, grocery stores, shared services, housing, opportunity development (investing), and more participating in Montana's economy. Cooperatives in Montana are significant and long-lasting, with cooperatives dating back to the early 1900s and new ones forming every year.

The MCDC Board and MCOC Board are proud to provide the Cooperative Impact Report for cooperatives and the communities they serve. It is designed to convey the economic, community, and social impact of Montana cooperatives. Cooperatives are closely tied to their communities by providing quality jobs, supporting local charities, addressing community needs, and bringing essential services across Montana.

As the State-wide Cooperative Development Center, MCDC and the MCOC strive to support, sustain, and expand Montana cooperatives. Our team is hard at work, developing and expanding services for Cooperatives such as board training, by-law review and revisions, management training, and more. As the COVID-19 continues to impact our State, MCDC and MCOC remain vigilant and are here to connect cooperatives to resources and support.

To learn more visit our websites: www.mcdc.coop and www.montanacouncil.coop.

A handwritten signature in black ink, reading "Tracy D. McIntyre".

Tracy D. McIntyre
MCDC Executive Director
MCOC Administrator

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1. EXECUTIVE SUMMARY

Montana's hundreds of cooperatives – businesses jointly owned by their customers – span a wide spectrum of activities in Montana, including finance, energy telecommunications and agriculture. The ubiquitous presence of credit unions, grain elevators, electric co-ops, and fuel distributors across the state, especially in our state's rural areas where they play such a central role in the economy, has made them so familiar that they can sometimes escape notice.

These businesses are important because of what they do – the vital products and services they provide, the quality of the jobs they sustain, and the contributions they make to the fabric of the communities they call home.

Montana cooperatives are also an important piece of the economy. The more than 5,000 jobs at the 128 cooperative businesses included in this study ultimately support a much higher number of jobs in the overall economy. The spending of co-op employees, the spending of the co-ops themselves, and the increased population of the state that comes about because of the activities of co-ops all contribute to the income of businesses and governments that are not directly part of the co-ops themselves. As this income is received and spent again, further economic activity is supported.

This study represents a comprehensive effort to assess the size of that total economic contribution. We have gathered and assembled data on the size and scope of operations at Montana cooperative businesses. This includes detail on the type of business activity, the number of employees, payroll, revenues and other operating information. We presented that information to an economic model to assess the (hypothetical) research question: what would the Montana economy look like if cooperative businesses did not exist? The model is used to represent all of the linkages between the spending and production of cooperatives and the rest of the state economy.

A comparison of this hypothetical "no cooperatives" economy to the actual economy gives a measure of the total contribution the existence of the state's cooperative businesses make to the overall economy of the state.

Summary of Findings

Our principal finding is that the presences of cooperatives makes the Montana economy larger, more prosperous and more populous than would be the case in their absence.

Table 1: The Economic Impact of Montana Cooperatives: Summary

Category	Units	Impact
Total Employment.....	Jobs	23,480
Personal Income.....	\$ Millions	1,595.5
Disposable Personal Income.....	\$ Millions	1,417.3
Output.....	\$ Millions	7,594.4
Population	People	33,072

The activities and operations of Montana’s cooperatives ultimately produce an economy with:

- 23,480 more jobs, spread across the state in a wide-ranging spectrum of industries;
- \$1.6 billion more each year in income received by Montana households, with over \$1.4 billion representing after tax income;
- \$7.6 billion each year in additional output, or gross receipts to Montana businesses and non-business organizations, and
- More than 33,000 more people attracted and retained to live in our state.

There is a wealth of detail and variability that lies behind these summary findings. Characteristics, operational parameters, products and services and physical locations of Montana’s cooperatives are quite literally all over the map, and the impacts reported in Table 1 reflect the impact of their operations as a total. Considerable insight can be obtained by examining different categories of coop businesses separately.

We consider five different categories of businesses: credit unions, electric co-ops, telecommunications co-ops, agriculture co-ops and other, and the CHS oil refinery located in Laurel. The first three categories are natural business groupings, even if the precise activities conducted by the co-ops within each category varies. They each fall into a three-digit North American Industrial Classification System (NAICS) grouping.

Table 2: Montana Cooperatives by category

Category	Number	Percent
Electric co-ops.....	28	21.9%
Credit unions.....	47	36.7%
Telecommunications.....	6	4.7%
Agricultural.....	26	20.3%
Other.....	21	16.4%
Total.....	128	100.0%

There is more variety in the remaining two categories. Agricultural cooperatives wholesalers, purchasing cooperatives, grain elevators and oil products cooperatives. The other category has even more variety, encompassing retail and consumer-based cooperatives, insurance, restaurants and an oil refinery. The latter is so different in its operational parameters from the others in the category that it is broken out separately in our findings.

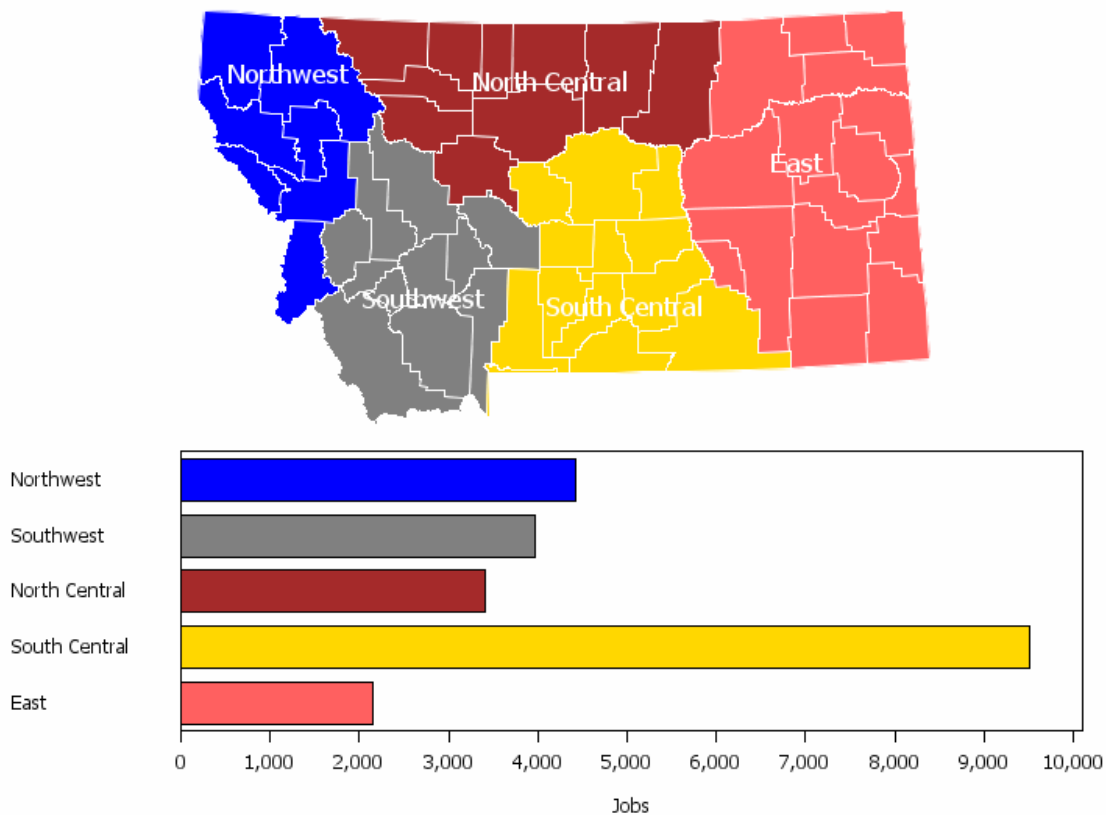
Table 3: The Economic Impact of Montana Cooperatives: Impacts by Category

Category	Units	Credit Unions	Electric Co-ops	Telecomm	Ag & Other	CHS Refinery	All
Total Employment.....	Jobs	4,687	5,761	2,542	2,745	7,591	23,480
Personal Income.....	\$ Millions	294.7	357.4	189.2	175.2	560.5	1,595.5
Disposable Personal Income.....	\$ Millions	261.9	316.2	166.8	155.0	500.3	1,417.3
Output.....	\$ Millions	1,418.1	1,199.3	542.1	586.0	3,828.3	7,594.4
Population	People	6,174	7,673	3,533	3,561	11,435	33,072

The continuing economic contributions made by each category of co-op business are all substantial, as Table 3 makes clear. The differences in magnitude between the impacts of the different categories largely reflects the number of businesses involved shown in Table 2, with one exception. The CHS Oil Refinery is a single business that has capital equipment, productivity, compensation and revenues that are unlike any of the other businesses included in this study, and their impacts reflect those differences.

The impacts of Montana cooperatives extend to every corner of the state. While many co-ops operate in or adjacent to the state's more urbanized areas, their presence in some of our smaller and sparsely populated areas of the state is outsized in comparison to business overall. This is particularly true for the agriculture cooperatives, closely linked to the farming and ranching activities across the state.

Figure 1: Employment Impacts of Montana Cooperatives, by Region



The employment impacts shown for the state's five regions in Figure 1 illustrate this geographical spread. While the eye is drawn to the large employment impacts in the South-Central region in the figure, these reflect the presence of the CHS refinery in Yellowstone County. The large impact of this single facility masks the important finding of significant job impacts in all five regions of the state, including the East region, the least populous.

It is important to note that many – in fact, most – of the job impacts shown above are only indirectly connected with the cooperatives themselves. While the more than 5,000 jobs at the 128 cooperatives included in this analysis are part of the totals shown in Figure 1, there are also jobs that come about due to the spending, production, and income flows that propagate throughout the economy.

These come about through three basic mechanisms:

- The spending of the workers at the coops is received in the local economy as income, which in turn, supports other jobs which create more spending.
- The spending of the coops themselves on vendors, materials and services, including tax payments to state and local spending, supports jobs and further spending as those entities receiving payment employ workers and pay their own vendors.
- The migration of people towards job opportunity ultimately grows the population, creating new demand for goods and services and bringing talent to our state.

Table 4: Employment Impacts by Industry

Industry	Impact
Construction.....	3,166
Telecommunications.....	543
Finance and Real Estate.....	2,630
Retail Trade.....	2,303
Transportation and Warehousing.....	564
Professional and Technical Services.....	1,738
Administrative and Waste Services.....	1,154
Health Care and Social Assistance.....	1,342
Utilities.....	859
Accommodation and Food Services.....	1,876
Other Services, except Public Administration.....	924
Other Private.....	3,134
Government.....	3,248
TOTAL.....	23,480

Some of these mechanisms can be seen at work from a more detailed breakdown of the employment impacts of Montana cooperatives by major industry groupings, as shown in Table 4. Some of the job impacts shown above reflect, in part, the employment of the cooperatives themselves. The 2,630

additional Finance and Real Estate workers that exist because of the presence of cooperatives in the economy, for instance, include the 1,609 workers at credit unions. But many categories in the table, such as Health Care and Social Assistance and Government, have substantial employment impacts without any direct connection to employment at cooperatives. And in all cases, the jobs created in industries where cooperatives themselves appear significantly exceed the direct employment impacts of the co-ops.

This illustrates the manner in which spending spreads through the economy. The additional people and the additional spending create more demand for a wide spectrum of seemingly unrelated industries, including restaurants, construction and health care. And one of the largest industry impacts comes from state and especially local government, the latter driven by increased demand for local services including K-12 education.

The larger economy that comes about because of the presence of cooperatives has more income as well. Much of that increase is tied directly to employment, but the gains in dollars received by Montana households – personal income – is larger than the gain in income that comes from earnings.

This is apparent from Table 5, which details the impacts that the presence of cooperatives in the economy has on the separate components of personal income. As the table shows, the biggest component of the nearly \$1.6 billion increase in annual personal income that occurs because of cooperatives is accounted for by the \$1.2 billion increase in net earnings. But while smaller, the \$192.1 million gain in property income – consisting of dividends, interest and rent – is not insubstantial. It shows how the increased size of the economy is reflected in more people and more prosperity, which involves more income from things other than jobs.

Table 5: Personal Income Impacts (millions of dollars)

Category		Impact
Total Earnings by Place of Work		1,445.0
Total Wage and Salary Disbursements		1,009.8
Supplements to Wages and Salaries		322.4
Employer contributions for employee pension and insurance funds		207.4
Employer contributions for government social insurance		115.0
Proprietors' income with inventory valuation and capital consumption adjustments		112.8
Less:		
Contributions for government social insurance		216.4
Employee and self-employed contributions for government social insurance		101.4
Employer contributions for government social insurance		115.0
Plus:		
Adjustment for residence		(7.1)
Gross In		21.1
Gross Out		28.2
Equals:	Net earnings by place of residence	1,221.5
Plus:	Property Income	192.1
	Dividends	69.0
	Interest	86.1
	Rent	36.9
Plus:	Personal Current Transfer Receipts	181.9
Equals:	Personal Income	1,595.5
Less:	Personal Current Taxes	178.2
Equals:	Disposable Personal Income	1,417.3

Part of the reason for the large increases in income that come about because of the presence of cooperatives in the economy has to do with the nature of the jobs the co-ops ultimately support. While not all of the 23,480 jobs that exist in the Montana economy today because of cooperatives are high paying jobs, enough of them are to make their average earnings exceed that of the state as a whole.

Earnings are defined as income received from a job, which includes wages and salaries, benefits, and income of business owners. On top of the approximately \$1 billion per year that Montana households receive in additional wages and salaries because of the presence of cooperatives in the economy, as shown in Table 6, there is also an increase of \$322 million in the cash value of benefits. When owner income increases are added, the earnings impact is \$1.4 billion.

Table 6: Compensation Impacts

Category	Units	Impact
Wages and Salaries.....	\$ Millions	1,009.8
Compensation.....	\$ Millions	1,332.2
Earnings.....	\$ Millions	1,445.0
Earnings per Job, New Jobs.....	\$ Dollars	\$61,544

That works out to an average of \$61,544 for each new job created in the state economy because of cooperatives. That is 47 percent higher than the state average of \$41,789 in earnings per job. The higher than average earnings occur because in part because of the comparatively high pay of jobs at the cooperatives themselves.

Finally, we note that an economy with the job opportunities supported directly and indirectly by the activities of Montana cooperatives is also an economy with more people. This reflects the attraction of investment, workers and their (current or future) families toward economic opportunity.

Table 7: Population Impacts

Age Cohort	Impact
Ages 0-14.....	8,883
Ages 15-24.....	3,735
Ages 25-64.....	19,411
Ages 65+.....	1,043
Total.....	33,072

We estimate that about 33,000 more people live in the state because of the presence of cooperatives in the economy. As a point of comparison, this is more people than live in all but the state's largest 8 counties. These additional people increase demand for products and services, including public services. Note from Table 7 that many of the additional people are school-aged children, who can be expected to increase demand for K-12 education. Particularly in eastern Montana where the relative presence of coops in the economy is large, this has helped stabilize school systems challenged by falling class sizes.

With thousands of owners from the communities where they operate, Montana cooperatives are arguably more connected to the communities they serve than most other businesses. Yet it is still useful to get the "big picture" on how they collectively impact the economy of the state as a whole. As this report makes clear, their contributions are significant.

2. INTRODUCTION AND OVERVIEW

Cooperatives have been part of the fabric of the Montana economy nearly as long as we have been a state. Their footprint is significant in industries that are central to the state's economy, including agriculture and food processing, banking and credit, electric power distribution and manufacturing. While their presence is most notable in Montana's rural communities, they are an important economic driver in urban areas as well.

The long-standing presence of these customer-owned organizations in cities and communities across the state has at times made their operations less visible to the general public. Yet they are jointly responsible for thousands of jobs, millions of dollars of income and investment, and the stability and viability of countless members and customers who do business with them. Assessing and presenting the economic contributions made by these organizations to the Montana economy is a useful way of highlighting their importance.

About This Study

This study was conducted by the Bureau of Business and Economic Research at the University of Montana (BBER) for the Montana Cooperative Development Center (MCDC). The principle author of this report is Patrick M. Barkey, Ph.D., BBER director.

Research Approach

BBER has conducted an analysis that addresses the research question – what would the economy of the state look like if cooperatives did not exist? The question is clearly hypothetical – no conceivable policy could (or should) make this event actually occur. Rather it is a way of highlighting how the operations of Montana's cooperatives connect with the rest of the economy.

When one (hypothetically) removes the sales, production, employment and income of cooperatives from the economy, the reduction in economic activity is much larger than the cooperatives themselves, since the spending of the organizations and their workers is received as income for other businesses and governments within their communities and in the state. Thus, the activity of cooperatives supports many jobs and livelihoods beyond those with a direct connection to the organizations themselves.

Our approach to this research involves constructing two scenarios for the economy. The first is a baseline, status-quo projection where no changes are made. The second is a "no cooperatives" scenario where the spending, production, sales and employment of cooperatives is subtracted from the economy. In the second case, the economy comes to a new equilibrium, or resting point, as other jobs and activities in the rest of the economy adjust to the absence of the cooperatives. The difference between the economic activity actually observed and this "no cooperative" scenario is the total economic contribution of Montana's cooperatives.

Since this "no cooperative" Montana economy cannot be directly observed, it must be constructed by means of an economic model. BBER uses its policy analysis model, leased from Regional Economic Models, Inc. (REMI) and constructed explicitly for this purpose, to conduct this analysis. The REMI model is a well-known, well-respected tool for economic analysis that has been used in hundreds of studies and is the subject of dozens of peer-reviewed scholarly articles.

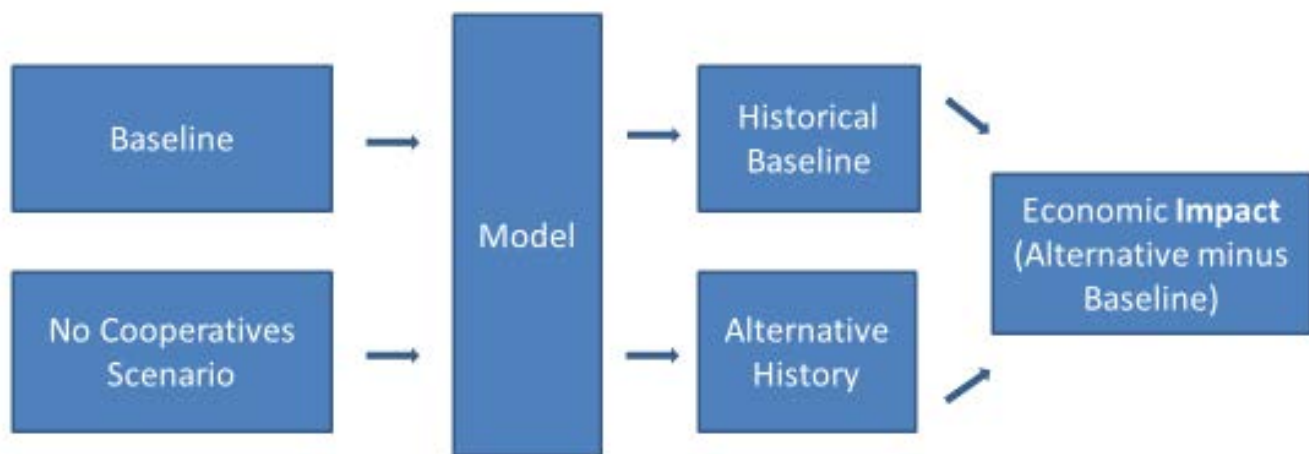
The REMI Model

To quantify the impacts of events that influence the Montana economy, The BBER uses a mathematical model of the regional economy leased from Regional Economic Models, Inc. (REMI). The fundamental premise of the REMI model is that regions compete for investment, jobs and people.

Thus, when new events occur which change the competitiveness of one particular region – such the operations of a cooperatively owned business or enterprise – investment, employment, and population flowing in and out of the region can be affected, ultimately producing new levels of economic activities. The model thus produces impact estimates by examining the economy before and after these events take place.

The total contribution of Montana cooperatives to the economy is the difference between these two scenarios, as shown diagrammatically in the figure below. The model is a means of estimating the economy's new "resting point" – which includes the changes in investment, employment, and spending that occur as the income flows due to cooperatives are removed from the economy.

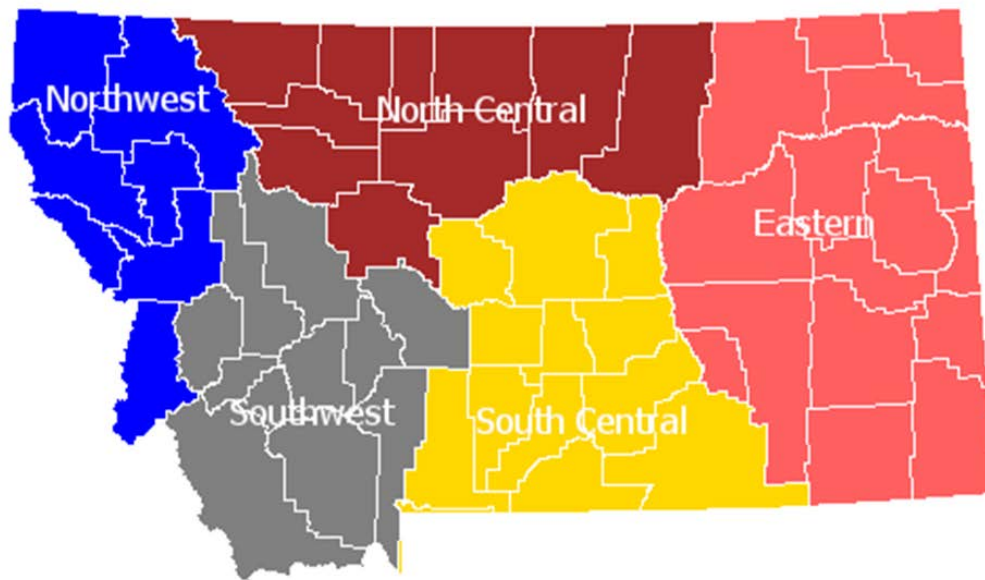
The analysis of the economic impact of Montana cooperatives involves identifying and estimating the



“direct” impact – e.g., the income flows and payments directly associated with the industry – as carefully as possible. BBER worked closely with MCDC to gather data in sufficient detail (for the most recent complete operating year) to produce these findings.

The REMI model has been the subject of dozens of peer-reviewed articles and has been used to conduct hundreds of published studies on energy, transportation, and economic development (www.remi.com). It is particularly well-suited for this analysis because it is a dynamic model. The term “dynamic” means that the analytical framework allows past events to affect future investment and spending. The model also allows for a very detailed incorporation of capital investment. The model also fully incorporates the profound impacts the cooperatives have had on labor markets as well as migration and changes in population.

The REMI model that is maintained by BBER divides the state into five regions, as shown on the map below. It will be possible to quantify economic impacts statewide and possibly down to the regional level, if desired. Statewide impacts will be the primary focus of the study.



3. POLICY ANALYSIS WITH THE REMI MODEL

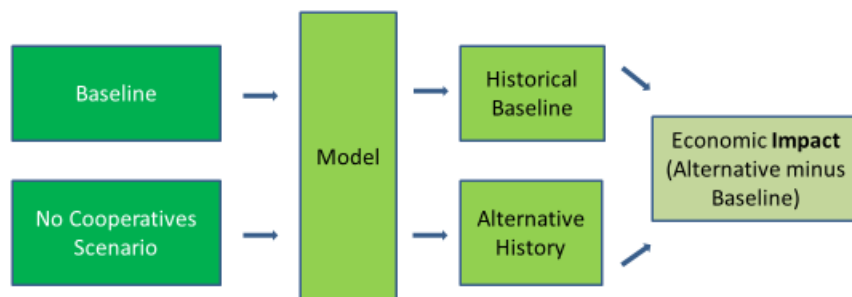
Regional economic impacts occur because of events or activities that create new expenditures within a region. “New spending” constitutes spending that is over and above existing expenditures, and which does not displace other spending elsewhere in the region. It not only adds to economic activity in its own right, but also induces further spending when the recipients of wages, sales, and tax revenues spend portions of their income in the local economy. Changes in the paths of investment, migration, prices, and wages are also possible.

This study utilized an economic model, calibrated to represent the interactions specific to the Montana economy, to estimate the economic impacts resulting from operations of the Montana cooperatives across the state. Leased from Regional Economic Models, Inc., the REMI model is one of the best known and most respected analytical tools in the policy analysis arena, and has been used in more than 100 previous studies as well as in dozens of peer-reviewed articles in scholarly journals. It is a state-of-the-art econometric forecasting model that incorporates dynamic feedbacks between economic and demographic variables. The REMI model forecasts employment, income, expenditures, and populations for counties and regions based on a model containing over 100 stochastic and dynamic relationships, as well as a number of identities. A full explanation of the design and operation of the model can be found in Treyz (Treyz, 1993).

The REMI Modeling Methodology

The basic approach of using the REMI model to produce the results for this study is illustrated in Figure 1, below. The analysis started with a baseline projection for the Montana economy, using the status quo assumption that the cooperatives continue to operate across the state at current levels. Next, the analysis employed the REMI model a second time, simulating an alternative scenario where the cooperatives and their associated economic activity are absent from the Montana economy.

Figure 1. Policy Analysis Using the REMI Model

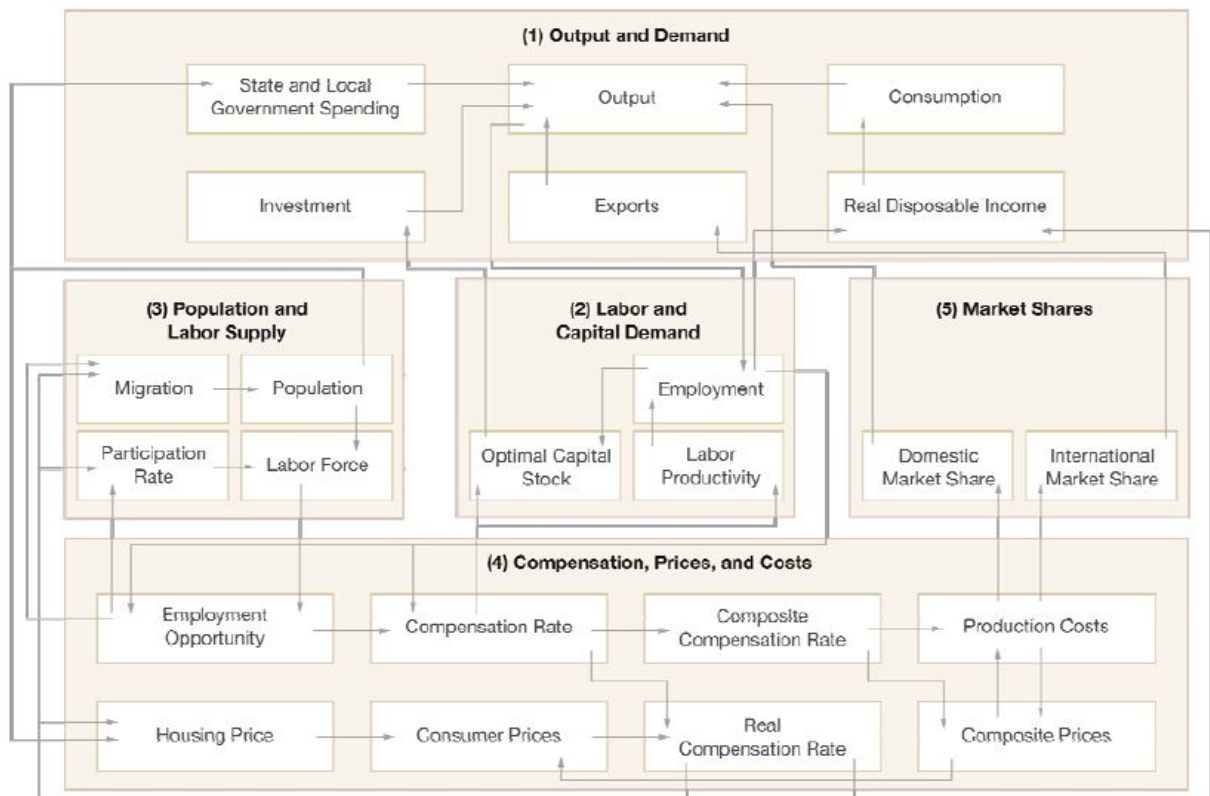


The difference between the baseline scenario and the simulated scenario constitutes the magnitude of the impact of the cooperatives on the state economy, and represents the gains the state is experiencing due to their operations.

The REMI model utilizes historical data on production, prices, trade flows, migration, and technological advances to calibrate the relationship between five basic blocks of the state economy: 1) Output and

Demand; 2) Labor and Capital Demand; 3) Population and Labor Supply; 4) Compensation, Prices and Costs; and 5) Market Shares. These linkages are shown in Figure 2, below.

Figure 2. Schematic Model of REMI Linkages



The differences in production, labor demand, and intermediate demand associated with the absence of the cooperatives impact these blocks, causing them to react to the changes and adjust to a new equilibrium. This new equilibrium constitutes the alternative scenario referred to above—the absence of the cooperatives.

The underlying philosophy of the REMI model is that regions throughout the country compete for investments, jobs, and people. When events occur in one region, they set off a chain reaction of events across the country that causes dollars to flow toward better investment and production opportunities, followed over time by workers and households toward better employment opportunities and higher wages. The REMI model consists of an 82-sector input/output matrix that models the technological inter-dependence of production sectors of the economy, as well as extensive trade and capital flow data. Together, these components enable the estimates of the shares of each sector's demand that can be met by local production. Simplified illustrations of the schematic model in Figure 2 are provided on the following pages, in figures 3 through 7.

Figure 3. Output Linkages

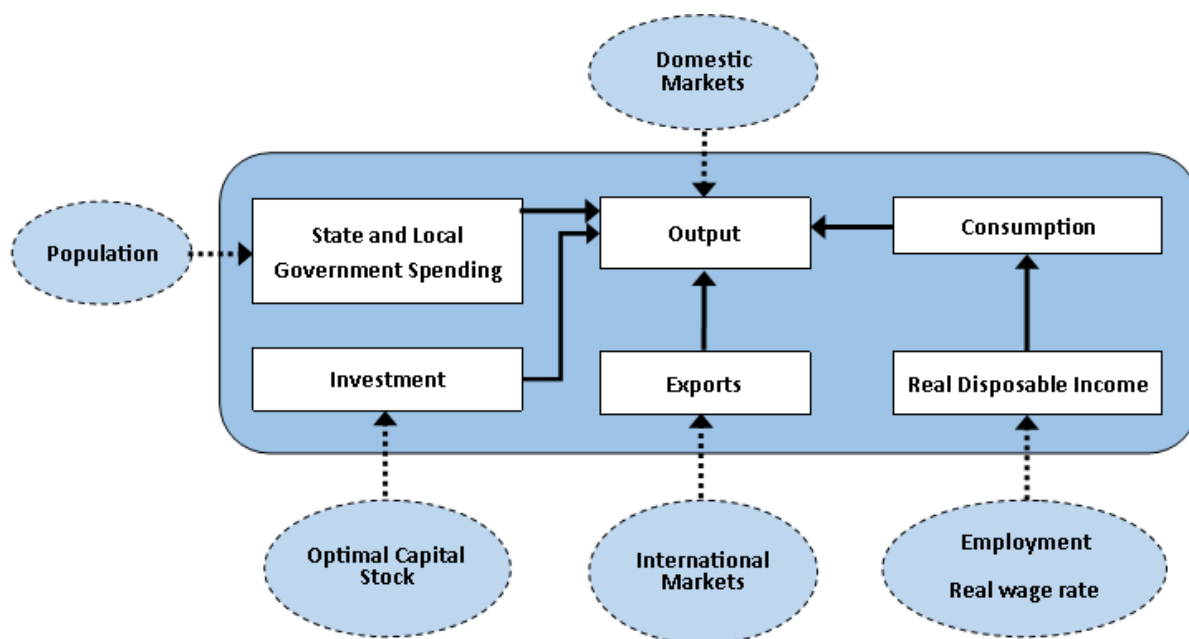


Figure 4. Labor and Capital Demand Linkages

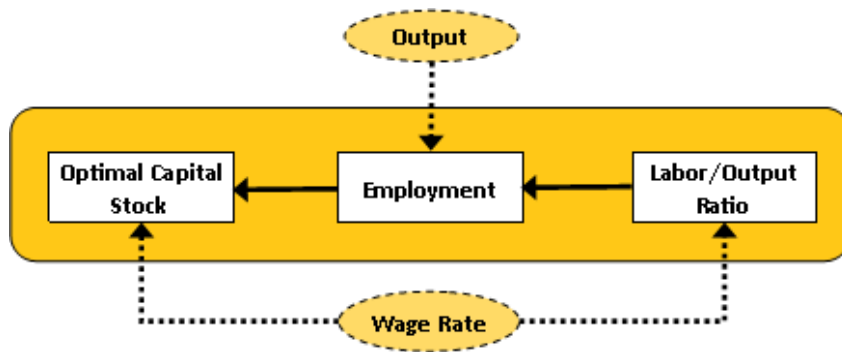


Figure 5. Demographic Linkages

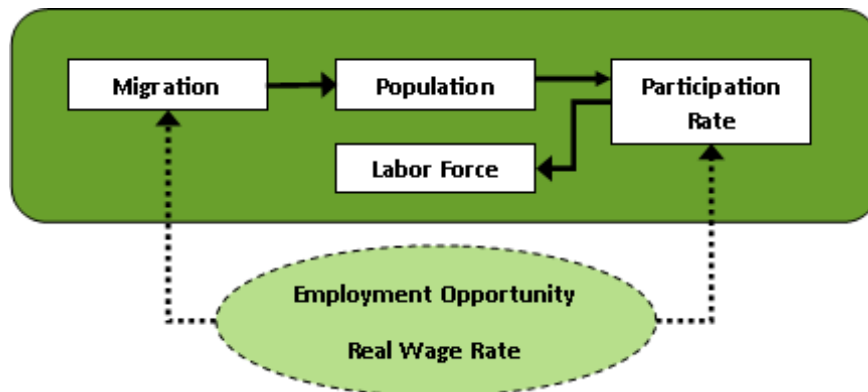


Figure 6. Wages, Prices and Production Costs Linkages

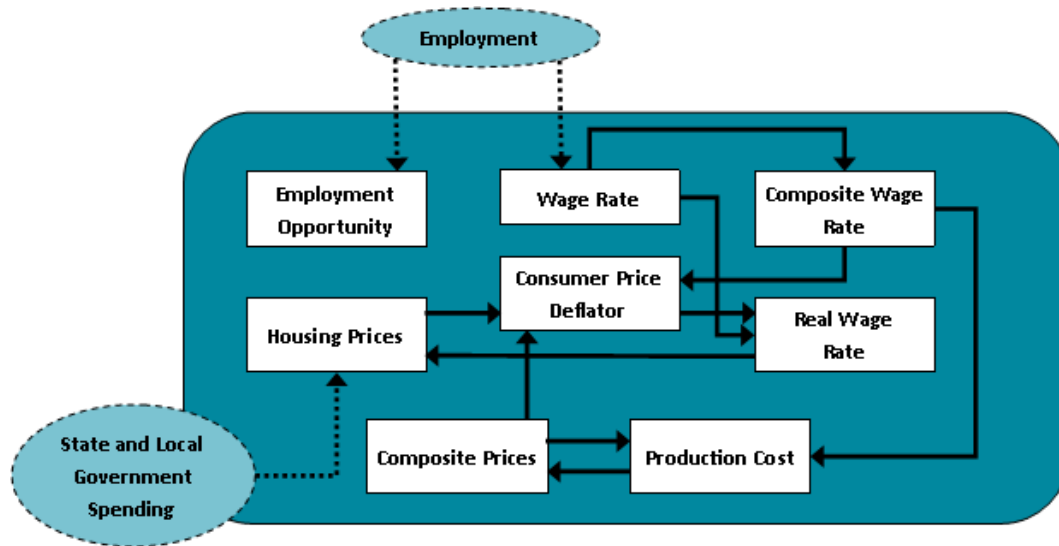
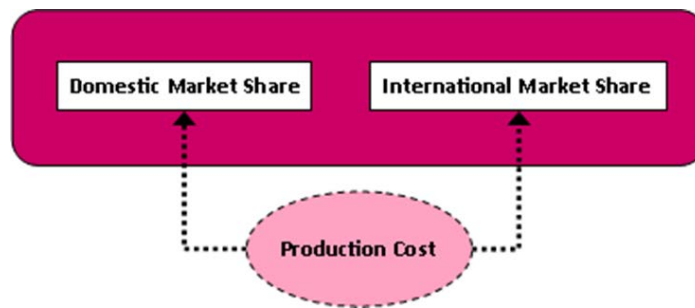


Figure 7. Market Share Linkages



As powerful and flexible as this tool is, the output it provides is only as good as the inputs provided. The majority of the work for this study was to carefully craft the inputs used to construct a scenario for the economy that faithfully represents all of the events, income flows, and the direct and indirect impacts that would not occur in the absence of Montana cooperatives.

4. DESCRIBING MONTANA'S COOPERATIVES

The paragraphs that follow present a descriptive analysis of the responses to the 2020 Survey of Montana Cooperatives. The responses of the 102 co-ops that participated in the survey are reported in the order the questions were asked.

Types of Member Co-ops

Nearly half of the responding co-ops (46.1%) were credit unions (see Table 4.1 below.) Just over one-quarter were electricity utilities (26.5%). About 7% of the responses were from telecommunications providers. The remaining 20.5% of responses were from a wide variety of firm types.

Table 4.1: Co-op types

What is your main economic sector or business type?		
	Frequency	Percent
Credit union	47	46.1
Electricity utility distribution	27	26.5
Agricultural supply	10	9.8
Telecommunications or broadband	7	6.9
Artisan or cultural	2	2.0
Manufacturing	2	2.0
Wholesale or retail	2	2.0
Biofuels	1	1.0
Hospitality or food and lodging	1	1.0
Grocery	1	1.0
Housing	1	1.0
Mutual insurance	1	1.0
Total	102	100.0

Locations of Member Co-ops

Table 4.2 presents the locations of the responding co-ops by the REMI regions defined in the map presented earlier in this report. Responding co-ops were relatively evenly distributed throughout the 5 Montana regions analyzed in this report. Eastern Montana held the most 2020 respondents (28) while Southwest Montana housed the fewest respondents (15).

Table 4.2: Co-op locations

Co-op type	Region					Total
	Northwest	Southwest	North Central	Eastern	South Central	
Electricity utility	5	3	5	9	5	27
Telecommunications	2	0	2	3	0	7
Credit union or insurance	8	11	11	11	7	48
Other	5	1	4	5	5	20
Total	20	15	22	28	17	102

Member / Owner Benefits

About half (53%) of participating co-ops chose to describe the types of member or owner benefits that they provide (see Table 4.3.) The large majority of co-ops that answered (51/62 responses) sell goods or services to members. Nine co-ops reported that they market and sell goods or services on behalf of members.

Table 4.3: Member or owner benefits

What member/ owner benefits does the co-op provide?					
	Sell goods and services to members	Market and sell goods or services on behalf of members	Provide housing to members	Process or manufacture for members	Total
Electricity utility	27				27
Telecommunications	6				6
Credit union or insurance	1				1
Other	17	9	1	1	28
Total	51	9	1	1	62

Owner Identities

As Table 4.4 demonstrates, two-thirds of participating co-ops (66%) are owned by nonfarm-based individuals. About 13% are employee or worker-owned, while 10% are cooperative businesses and another 10% are owned by farm or ranch operations. Credit unions (71%), electric utilities (93%) and telecoms (83%) are most often owned by nonfarm-based individuals.

Table 4.4: Owner identities

Who are the owners?						
Type of cooperative	Cooperative businesses	Businesses not cooperatives	Individuals non-farm	Farmers ranchers or farm operations	Employee- or worker-owned	Total
Electricity utility	2	0	25	0	0	27
Telecommunications	1	0	5	0	0	6
Credit union or insurance	0	0	34	1	13	48
Other	7	1	3	9	0	20
Total	10	1	67	10	13	101

Employment, Compensation and Revenue

Responding co-ops reported a total 2020 employment of 4,366 (see Table 4.5.) The average responding co-op employed 44 people in 2020. The participating co-ops paid their employees about \$354,896,000 or about \$3,514,000 per co-op in 2020. This yielded an average annual compensation rate of approximately \$79,900 per employee.

Table 4.5: Employment, Compensation and Revenue

	Employment			Compensation			Revenue		
	N	Sum	Mean	N	Sum	Mean	N	Sum	Mean
All	99	4,366	44	101	\$354,896,328	\$3,513,825	44	\$1,147,562,801	\$26,080,973
Electricity utility	27	755	28	27	\$80,726,050	\$2,989,854	26	\$489,286,725	\$18,818,720
Tele-comms	5	425	85	6	\$45,815,097	\$7,635,850	6	\$266,983,519	\$44,497,253
Credit union or insurance	47	1,402	30	48	\$109,276,366	\$2,276,591	1	\$33,000,000	\$33,000,000
Other	20	1,784	89	20	\$119,078,815	\$5,953,941	11	\$358,292,557	\$32,572,051

Only 44 of 102 participating co-ops (43%) chose to report their annual revenue. The total annual revenue reported was about \$1.15 billion dollars, which yielded an average annual revenue of about \$26 million dollars per co-op.

Expenditures

As Table 4.6 presents, only the electricity utilities reported their annual expenditures and they did so by reporting the combined revenue of all 25 utilities (\$247,368,400.) This yielded an average annual expenditure of \$9,894,736 per electric utility co-op.

Table 4.6: Expenditures

	Expenditures		
	N	Sum	Mean
All	25	\$247,368,400	\$9,894,736
Electricity utility	25	\$247,368,400	\$9,894,736
Tele-comms	0	\$0	\$0
Credit union or insurance	0	\$0	\$0
Other	0	\$0	\$0

5. THE ECONOMIC IMPACT OF MONTANA COOPERATIVES

Montana cooperatives are arguably among the most connected forms of business in Montana. Their collective ownership, the nature of the products and services they provide, and the wide geographic scope of their activities across the state puts them in close contact with customers and workers everywhere. And so, their presence in the economy can be expected to be felt widely as well.

The principal findings of this report, presented in the section, confirm that expectation. The results of our analysis show that the presence of cooperatives in the Montana economy produces a significantly larger, more prosperous, and more populous economy that would occur in their absence. Their sizable economic impacts are felt in a broad spectrum of industries, and occur in every region of the state.

Specifically, we find that an economy with the 128 cooperative businesses included in this study, representing more than 5,000 jobs, ultimately produces an economy that has:

- 23,480 additional permanent, year-round jobs which are ultimately supported by the spending and production of the co-ops;
- Almost \$1.6 billion each year in additional income received by Montana households, of which more than \$1.4 billion is after-tax income, available for spending elsewhere in the economy;
- An increase in the gross receipts of business and non-business organizations across the economy of \$7.6 billion per year, and
- More than 33,000 additional people, as workers and their families are attracted to and retaining in Montana due to expanded economic opportunities.

Table 5.1: The Economic Impact of Montana Cooperatives: Summary

Category	Units	Impact
Total Employment.....	Jobs	23,480
Personal Income.....	\$ Millions	1,595.5
Disposable Personal Income.....	\$ Millions	1,417.3
Output.....	\$ Millions	7,594.4
Population	People	33,072

These impacts represent permanent, ongoing contributions to the state economy, and are significantly larger than the employment and spending of the cooperatives themselves. They represent the comparison between the actual economy, which includes cooperatives, with an artificially constructed, “no cooperatives” scenario of the economy which removes co-op employment and spending.

The figures shown in Table 5.1 above are the impacts of all cooperatives as a group, which includes credit unions, electric cooperatives, telecommunications cooperatives, farm-related co-ops and others. All of these categories of cooperatives represent different kinds of economic activities, with different

products and services, different technologies, and different economic footprints. Yet they share in common impacts which ultimately make the economy larger.

Table 5.2: The Economic Impact of Montana Cooperatives: Summary

Category	Units	Credit Unions	Electric Coops	Telecomm	Ag Coops & Other	CHS Refinery
Total Employment.....	Jobs	4,687	5,761	2,542	2,745	7,591
Personal Income.....	\$ Millions	294.7	357.4	189.2	175.2	560.5
Disposable Personal Income.....	\$ Millions	261.9	316.2	166.8	155.0	500.3
Output.....	\$ Millions	1,418.1	1,199.3	542.1	586.0	3,828.3
Population	People	6,174	7,673	3,533	3,561	11,435

Those impacts by category, summarized in Table 5.2 above, are clearly substantial. The first three categories – credit unions, electric cooperatives and telecommunications cooperatives, consist of cooperatives of different sizes and locations who are in the same line of business. The different size of their overall impacts reflects the number of individual cooperatives contained in each (from 47 credit unions to 6 telecommunications co-ops) as well as differences in the nature of their businesses.

The remaining two categories contain more diverse collections of businesses. The CHS petroleum refinery, located in Laurel, Montana, is sufficiently different from the rest to merit its own category. Its highly capitalized, high value-added production processes and its highly compensated workforce underpin its outsized impacts. The remaining category includes a wider spectrum of businesses relating to agriculture, including grain elevators, distribution, and wholesaling activities.

The outcomes summarized in these tables mask a wealth of detail that yields insights into how the activities of cooperatives in Montana ultimately make the economy larger. We now turn to a more complete examination of those impacts.

Employment Impacts

The 23,480 jobs in Montana that ultimately owe their existence to the presence of cooperatives in the economy are well in excess of the 5,000 jobs that exist in the co-ops themselves. As can be seen from Table 5.3, most of the jobs in the larger total are in industries with no direct connection to the cooperatives. They ultimately come about because of the spending flows within the economy that are induced.

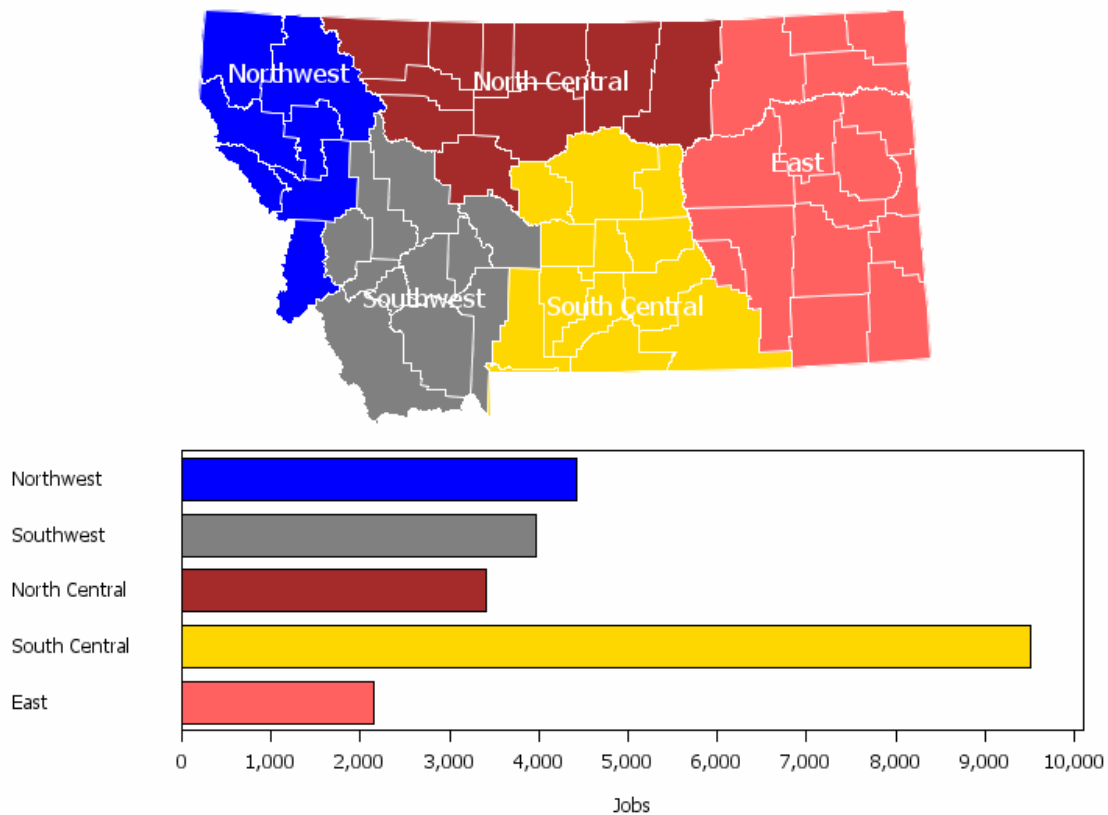
Table 5.3: Employment Impacts

Industry	Impact
Construction.....	3,166
Telecommunications.....	543
Finance and Real Estate.....	2,630
Retail Trade.....	2,303
Transportation and Warehousing.....	564
Professional and Technical Services.....	1,738
Administrative and Waste Services.....	1,154
Health Care and Social Assistance.....	1,342
Utilities.....	859
Accommodation and Food Services.....	1,876
Other Services, except Public Administration.....	924
Other Private.....	3,134
Government.....	3,248
 TOTAL.....	 23,480

Consider, for example, the more than 3,000 construction jobs created in the economy due to the operations of cooperatives within the state. Some of these jobs are linked to the cooperative business operations – the building and maintenance of facilities, especially the refinery, are an example of this. But most come about because higher population and higher incomes induce more building on residential, commercial and municipal projects.

The breadth of employment impacts across major industry categories is apparent from the Table. While some of these categories include the cooperatives themselves, such as utilities, telecommunications, and finance, significant job impacts can be found in categories such as government, health care, and accommodations and food services that do not. This spread across sectors helps illustrate the propagation of spending across the economy set in motion by the spending flows of the cooperatives themselves.

Figure 5.1 Employment Impacts by Region



The jobs supported directly and indirectly by cooperatives in Montana are distributed across the state. While the employment impacts of more than 13,000 in the south-central region of the state are significantly larger than those of the other four regions, as shown in Figure 5.1, this is largely due to the presence of the CHS refinery in Laurel that is contained within the region. As the Figure shows, there are sizable employment impacts in every part of the state.

Personal Income Impacts

The increase in income that Montana households receive because of the activities of cooperatives reflects more than the higher employment those activities support. As Table 5.4 shows, almost every source of income is larger in an economy that contains cooperatives.

Table 5.4: Personal Income Impacts (millions of dollars)

Category		Impact
Total Earnings by Place of Work		1,445.0
Total Wage and Salary Disbursements		1,009.8
Supplements to Wages and Salaries		322.4
Employer contributions for employee pension and insurance funds		207.4
Employer contributions for government social insurance		115.0
Proprietors' income with inventory valuation and capital consumption adjustments		112.8
Less:		
Contributions for government social insurance		216.4
Employee and self-employed contributions for government social insurance		101.4
Employer contributions for government social insurance		115.0
Plus: Adjustment for residence		(7.1)
Gross In		21.1
Gross Out		28.2
Equals: Net earnings by place of residence		1,221.5
Plus: Property Income		192.1
Dividends		69.0
Interest		86.1
Rent		36.9
Plus: Personal Current Transfer Receipts		181.9
Equals: Personal Income		1,595.5
Less: Personal Current Taxes		178.2
Equals: Disposable Personal Income		1,417.3

The bulk of the nearly \$1.6 billion in annual personal income that occurs because of the presence of cooperatives in the economy is due to the more than \$1.2 billion increase in net earnings. The latter represents income from employment. Clearly, in an economy with more jobs there is more earnings, and the impacts shown in Table 5.4 reflect that.

But there are significant impacts on income that come from other sources. Two are shown in the table. Transfer receipts are payments from government and businesses for which no service is performed. These include social security payments, some retirement payments, and welfare programs such as the Supplemental Nutritional Assistance Program (SNAP, formerly known as Food Stamps). Property income includes dividends, interest, royalties and rent. Both of these sources of income are higher because of cooperatives as well, simply because there is more wealth and more people in the economy.

Output Impacts

Economic output in this study is defined as gross receipts to businesses and non-business organizations, with the exception of businesses in retail and wholesale trade, where markup is used instead. This measure captures the “business” in terms of sales that companies and other organizations can expect to see because of the presence of cooperatives in the economy. It is distinct from (and significantly larger than) value added, which nets out costs from this top line revenue measure.

The impact of cooperatives on economic output statewide is a nearly \$7.6 billion each year. This substantial figure, which represents 6.5 percent of all output in the state economy, is made much larger because of inclusion of the CHS refinery. Output impacts of the refinery separately amount to \$3.8 billion annually, accounting for nearly half of the output impacts of all cooperatives taken as a whole.

Table 5.5: Output Impacts (millions of dollars)

Industry	Impact
Construction.....	463.7
Telecommunications.....	291.0
Finance and Real Estate.....	1,373.7
Retail Trade.....	220.3
Transportation and Warehousing.....	90.6
Professional and Technical Services.....	253.6
Administrative and Waste Services.....	106.3
Health Care and Social Assistance.....	188.6
Utilities.....	564.7
Accommodation and Food Services.....	122.0
Other Services, except Public Administration.....	65.8
Other Private.....	3,467.5
Government.....	386.8
 TOTAL.....	 7,594.4

Aside from the large output impacts associated with the refinery, which are included in the Other Private category in Table 5.5 above, the output impacts by industry show a spread of impacts across a wide range of industries. As was the case with employment impacts, many of these industries have no direct connection to cooperatives themselves. Examining these impacts gives a different perspective on how cooperatives act to make the statewide economic pie bigger.

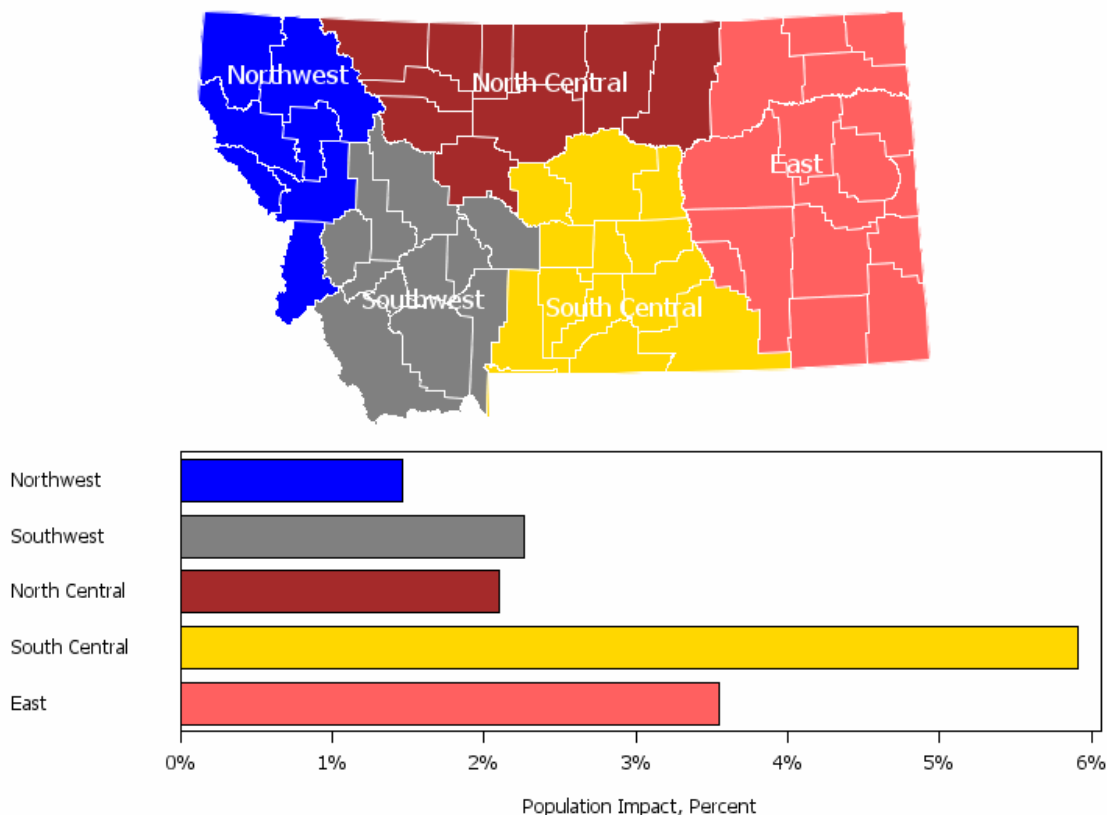
Population Impacts

An important mechanism at work in explaining the nature and the size of cooperative’s economic impacts is population migration. Simply put, workers ultimately respond to changes in economic opportunities, even if those responses take time. When job and earnings opportunities improve, more people are retained who might have otherwise left, in addition to people from other areas being attracted. The result is an increase in population that brings its own economic effects.

Some portion of the impacts shown thus far are due to population changes. More people translate into higher demand for goods and services, particularly government services. These contribute to the overall impact of cooperatives.

These impacts are of special importance because of the prominence of cooperatives in the rural parts of Montana, where in some instances population decline has put pressure on basic services, including hospitals and schools. The presence of cooperatives in the economy, especially those with important operations in those parts of the state facing these challenges, thus acts as a stabilizing force.

Figure 5.2 Population Impacts by Region, Percent



Overall population impacts are most prominent, in percentage terms, in the South-Central region of the state, as shown in Figure 5.2. This was also the case with employment impacts. In both cases this largely reflects the outsized impacts of the CHS refinery located in the region. While there are significant population impacts in all parts of the state, in percentage terms they are especially prominent in the least populous Eastern region, where the presence of cooperatives boosts population by more than 3.5 percent.

The age structure of the population impacts due to cooperatives is also relevant. Migration is dominated by working aged people and their families, including their present and future children. Thus, the population impacts by age, as shown in Table 5.6, contain a sizable fraction of school-aged children. This is a special significance for the viability of institutions including K-12 schools.

Table 5.6: Population Impacts

Age Cohort	Impact
Ages 0-14.....	8,883
Ages 15-24.....	3,735
Ages 25-64.....	19,411
Ages 65+.....	1,043
Total.....	33,072

Conclusion

The total contribution any sector of the economy makes to the whole can be assessed by assessing how the economy would look in its absence. While this is an artificial exercise, it illustrates and quantifies the connections in spending, income, production and employment that ultimately support economic activity beyond the sector itself.

Montana's customer-owned cooperatives are a diverse group of businesses that share one aspect in common, namely, their close connections to the communities in which they operate. Those connections make what those businesses do and where they do it of special importance, and combine to create a substantial economic impact.

This section has presented the main findings of this study, addressing the basic research question posed by this report. That is, what would the economy of Montana look like if the Montana credit unions, electric cooperatives, telecommunications cooperatives and farm co-ops did not exist?

Our finding is that the operations of cooperatives makes the economy significantly larger, more prosperous and more populous. The more than 23,000 jobs, the \$1.6 billion in annual personal income, the \$7.4 billion in economic output every year, and the 33,000 additional people in Montana that exist because of their operations is vivid testimony to the substantial economic benefits their presence brings.

APPENDIX 1: THE ECONOMIC IMPACT OF CREDIT UNIONS

The 47 Montana credit unions included in this study taken together employ 1,609 full and part-time workers, paying more than \$107 million annually in total compensation. Collectively they have \$965 million of gross revenue. They operate in all regions of the state, and in some cases, outside of Montana. (Only Montana operations are considered in this study).

Table A1.1: The Economic Impact of Montana Credit Unions: Summary

Category	Units	Impact
Total Employment.....	Jobs	4,687
Personal Income.....	\$ Millions	294.7
Disposable Personal Income.....	\$ Millions	261.9
Output.....	\$ Millions	1,418.1
Population	People	6,174

We find that the operations of Montana's credit unions support nearly 4,700 jobs in the state economy, as shown in Table A1.1 above. There are significant impacts on personal income, output, and population as well.

Table A1.2: Employment Impacts

Industry	Impact
Construction.....	297
Manufacturing.....	30
Finance and Real Estate.....	1,581
Retail Trade.....	394
Transportation and Warehousing.....	54
Professional and Technical Services.....	345
Administrative and Waste Services.....	271
Health Care and Social Assistance.....	255
Arts, Entertainment, and Recreation.....	67
Accommodation and Food Services.....	403
Other Services, except Public Administration.....	184
Other Private.....	86
Government.....	720
TOTAL.....	4,687

Of the 4,687 jobs supported by the presence of credit unions, roughly a third are found in the finance and real estate sector that contains the credit unions themselves. But the spending by the credit unions and their employees ultimately supports approximately twice as many jobs in the rest of the economy, as shown in Table A1.2 above. These include jobs in government, accommodations and food services, professional and technical services and retail trade.

Table A1.3: Personal Income Impacts (millions of dollars)

Category		Impact
Total Earnings by Place of Work		270.1
Total Wage and Salary Disbursements		198.3
Supplements to Wages and Salaries		55.7
Employer contributions for employee pension and insurance funds		35.8
Employer contributions for government social insurance		19.9
Proprietors' income with inventory valuation and capital consumption adjustments		16.2
Less:		
Contributions for government social insurance		40.0
Employee and self-employed contributions for government social insurance		20.2
Employer contributions for government social insurance		19.9
Plus:		
Adjustment for residence		(1.1)
Gross In		5.6
Gross Out		6.7
Equals:	Net earnings by place of residence	229.0
Plus:		
Property Income		36.0
Dividends		12.9
Interest		16.2
Rent		6.9
Plus:	Personal Current Transfer Receipts	29.7
Equals:	Personal Income	294.7
Less:	Personal Current Taxes	32.8
Equals:	Disposable Personal Income	261.9

The bulk of the \$294.7 million in additional income received by Montana households (personal income) that is due to the presence of credit unions in the economy come from the \$229 million increase in net earnings. The latter includes \$198.3 million more in wages and salaries to Montana workers. There are also gains in income unassociated with employment, both in transfer income and property income.

Gains in economic output due to credit unions are also more prominent in the category that includes the institutions themselves, finance and real estate, as shown in Table A1.4. The \$362 million in output increases in other industries are found throughout the economy, in both the public and the private sector.

Table A1.4: Output Impacts (millions of dollars)

Industry	Impact
Construction.....	43.1
Manufacturing.....	7.4
Finance and Real Estate.....	1,060.7
Retail Trade.....	38.2
Transportation and Warehousing.....	3.4
Professional and Technical Services.....	48.5
Administrative and Waste Services.....	24.4
Health Care and Social Assistance.....	35.6
Arts, Entertainment, and Recreation.....	4.0
Accommodation and Food Services.....	26.5
Other Services, except Public Administration.....	13.2
Other Private.....	27.2
Government.....	85.9
 TOTAL.....	 1,418.1

Because of the presence of credit unions in the economy, there are 6,174 additional people in our state. This total represents workers and their families who have either moved to, or remain in the state as a result of the economic opportunities that exist because of credit union operations. As shown in Table A1.5, a significant number of school-aged children are included in this number.

Table A1.5 Population Impacts

Age Cohort	Impact
Ages 0-14.....	1,631
Ages 15-24.....	718
Ages 25-64.....	3,633
Ages 65+.....	191
Total.....	6,174

APPENDIX 2: THE ECONOMIC IMPACT OF ELECTRIC COOPERATIVES

The twenty-five customer-owned electric cooperatives located throughout the state who are included in this study together employ 740 workers, pay almost \$80 million in total compensation, and collect gross revenues of \$437 million. Their presence, especially outside the state's urban centers, makes their logos, workers, and facilities familiar sights in the Montana landscape.

Table A2.1: The Economic Impact of Telecommunications Co-ops: Summary

Category	Units	Impact
Total Employment.....	Jobs	5,761
Personal Income.....	\$ Millions	357.4
Disposable Personal Income.....	\$ Millions	316.2
Output.....	\$ Millions	1,199.3
Population	People	7,673

Their relatively high-paying jobs and significant vendor spending contribute to their sizable economic impact. We find that the presence of the electric cooperatives in Montana ultimately adds 5,761 jobs, \$357.4 million in personal income, and \$1.2 billion in output to the state economy.

Table A2.2: Employment Impacts

Industry	Impact
Construction.....	1,267
Utilities.....	786
Finance and Real Estate.....	285
Retail Trade.....	607
Transportation and Warehousing.....	107
Professional and Technical Services.....	488
Administrative and Waste Services.....	227
Health Care and Social Assistance.....	291
Arts, Entertainment, and Recreation.....	68
Accommodation and Food Services.....	400
Other Services, except Public Administration.....	178
Other Private.....	307
Government.....	749
TOTAL.....	5,761

The job impacts due to the presence of electric cooperatives in the economy extend well beyond the utility industry itself. Sizable job gains in construction, government, and retail trade are supported by the operations of electric cooperatives. These impacts occur as the spending of the companies and their employees propagate throughout the economy as a whole.

Table A2.3: Personal Income Impacts (millions of dollars)

Category		Impact
Total Earnings by Place of Work		320.6
Total Wage and Salary Disbursements		225.5
Supplements to Wages and Salaries		74.3
Employer contributions for employee pension and insurance funds		48.0
Employer contributions for government social insurance		26.2
Proprietors' income with inventory valuation and capital consumption adjustments		20.9
Less:		
Contributions for government social insurance		49.0
Employee and self-employed contributions for government social insurance		22.8
Employer contributions for government social insurance		26.2
Plus:		
Adjustment for residence		(0.7)
Gross In		6.3
Gross Out		6.9
Equals:	Net earnings by place of residence	270.9
Plus:		
Property Income		46.0
Dividends		16.5
Interest		20.6
Rent		8.8
Plus:	Personal Current Transfer Receipts	40.5
Equals:	Personal Income	357.4
Less:	Personal Current Taxes	41.2
Equals:	Disposable Personal Income	316.2

The larger economy that is the result of the presence of electric cooperatives boosts the income received by Montana households by \$357.4 million annually, with \$316.2 million of that total after-tax income available for spending. 90 percent of that income comes from earnings, which is in turn comprised of wages and salaries, benefits, and income of business proprietors. Those gains are fueled by the new jobs and business expansions. But income gains also come from other sources, most notably the \$46.0 million gain in property income and the \$41.2 gain in transfer receipts.

Table A2.4: Output Impacts (millions of dollars)

Industry	Impact
Construction.....	180.2
Utilities.....	520.3
Finance and Real Estate.....	87.0
Retail Trade.....	58.9
Transportation and Warehousing.....	13.4
Professional and Technical Services.....	68.7
Administrative and Waste Services.....	20.4
Health Care and Social Assistance.....	40.8
Arts, Entertainment, and Recreation.....	4.3
Accommodation and Food Services.....	25.6
Other Services, except Public Administration.....	12.5
Other Private.....	78.9
Government.....	88.4
TOTAL.....	1,199.3

Economic output is \$1.2 billion higher each year in the Montana economy due to the operations of the states 25 customer-owned electric cooperatives. As Table A2.4 shows, almost half the output increases come from the industry itself. There is a sizable output increase in the construction industry as well.

Table A2.5: Population Impacts

Age Cohort	Impact
Ages 0-14.....	2,060
Ages 15-24.....	887
Ages 25-64.....	4,499
Ages 65+.....	227
Total.....	7,673

The larger economy that comes about because of the operations of Montana's electric cooperatives is more populous as well. The population impact of 7,673 is tilted heavily towards working aged people and their families, as shown in Table A2.5 above.

APPENDIX 3: THE ECONOMIC IMPACT OF TELECOMMUNICATIONS COOPERATIVES

Seven telecommunications cooperatives were included in the analysis conducted in this report. Those seven companies jointly employed an estimated 782 workers, who were paid an estimate \$69.3 million in total compensation. Total annual revenues of all seven companies is estimated at \$217.9 million. These companies provide telephone, internet and data services, in addition to a wide variety of technology products and services.

Table A3.1: The Economic Impact of Telecommunications Cooperatives

Category	Units	Impact
Total Employment.....	Jobs	2,542
Personal Income.....	\$ Millions	189.2
Disposable Personal Income.....	\$ Millions	166.8
Output.....	\$ Millions	542.1
Population	People	3,533

Telecommunications co-op together product a sizable economic impact. Their operations ultimately support more than 2,500 jobs across the state both within and outside their own industry. The larger economy that exists because of the presence of telecommunications cooperatives is one where Montana households receive \$189.2 million more annually in personal income, of which \$166.8 million is after-tax income. As shown in Table A3.1, there is more than a half billion more in annual economic output in the economy as well.

Table A3.2: Employment Impacts

Industry	Impact
Construction.....	233
Telecommunications.....	533
Finance and Real Estate.....	147
Retail Trade.....	257
Transportation and Warehousing.....	35
Professional and Technical Services.....	208
Administrative and Waste Services.....	162
Health Care and Social Assistance.....	153
Arts, Entertainment, and Recreation.....	65
Accommodation and Food Services.....	199
Other Services, except Public Administration.....	104
Other Private.....	99
Government.....	348
TOTAL.....	2,542

As can be seen from Table A3.2, the employment increases in the state economy because of the operations of customer-owned telecommunications cooperatives extend well beyond the industry itself.

The spending and operations of the industry creates demand, sales, and ultimately employment across a wide swath of economic activity, with job impacts particularly significant in government, and construction sectors.

Table A3.3: Personal Income Impacts (millions of dollars)

Category	Impact
Total Earnings by Place of Work	171.8
Total Wage and Salary Disbursements	117.2
Supplements to Wages and Salaries	34.3
Employer contributions for employee pension and insurance funds	22.2
Employer contributions for government social insurance	12.1
Proprietors' income with inventory valuation and capital consumption adjustments	20.3
Less:	
Contributions for government social insurance	24.0
Employee and self-employed contributions for government social insurance	11.9
Employer contributions for government social insurance	12.1
Plus:	
Adjustment for residence	(0.1)
Gross In	3.6
Gross Out	3.6
Equals:	
Net earnings by place of residence	147.7
Plus:	
Property Income	21.7
Dividends	7.8
Interest	9.7
Rent	4.2
Plus:	
Personal Current Transfer Receipts	19.8
Equals:	
Personal Income	189.2
Less:	
Personal Current Taxes	22.5
Equals:	
Disposable Personal Income	166.8

Income received by Montana households (personal income) is higher by \$189.2 million annually because of the operations of the state's customer-owned telecommunications cooperatives. This total includes \$166.8 million in after-tax, or disposable, income. 91 percent of the income impact is accounted for by earnings, defined as income that is job-related. This clearly comes about because of the wages, benefits and owner income associated with the new business activity across the economy. The remaining income impacts, from unearned income, occur though higher population and higher commercial and residential capital stock.

Table A3.4: Output Impacts (millions of dollars)

Industry	Impact
Construction.....	33.3
Telecommunications.....	283.9
Finance and Real Estate.....	43.4
Retail Trade.....	25.1
Transportation and Warehousing.....	2.0
Professional and Technical Services.....	28.2
Administrative and Waste Services.....	14.3
Health Care and Social Assistance.....	21.1
Arts, Entertainment, and Recreation.....	3.6
Accommodation and Food Services.....	12.8
Other Services, except Public Administration.....	7.4
Other Private.....	25.8
Government.....	41.1
TOTAL.....	542.1

The telecommunications cooperatives jointly support an economy that has business and non-business gross receipts, or economic output, that is more than a half billion dollars higher than otherwise would occur. Output impacts are especially prominent in the industry itself, which accounts for more than half of the total. Yet the breadth of impacts across industries, in many cases with no direct connection to telecommunications, is apparent as well.

Table A3.5: Population Impacts

Age Cohort	Impact
Ages 0-14.....	944
Ages 15-24.....	398
Ages 25-64.....	2,079
Ages 65+.....	112
Total.....	3,533

Finally, we note that a Montana economy that includes the telecommunications cooperatives is also one that has more people. The improved economic opportunities in the larger economy that telecommunications co-ops help create brings more people to the state, as well as retaining some that might have otherwise left Montana. The 3,533 addition to population is dominated by working aged people and their families, as noted in Table A3.5 above.

APPENDIX 4: 2020 CO-OP LIST BY INDUSTRY SECTOR

Agricultural Cooperatives	Cooperative Utilities
Ag Land Cooperative	Beartooth Electric Cooperative
CHS Farmers Elevator	Big Flat Electric Cooperative
CHS Animal Nutrition	Big Horn County Electric Cooperative
CHS Big Sky (Fort Benton)	Blackfoot Cooperative
CHS Inc. (Cut Bank)	Central Montana Electric Power Cooperative
CHS Inc. (Kalispell)	Fall River Rural Electric Cooperative
CHS Mountain West Cooperative	Fergus Electric Cooperative
Coffee Creek Farmers Union, Inc.	Flathead Electric Cooperative
Farmers Union Trading Company	Glacier Electric Cooperative
Farmers Union Oil Company (Circle)	Goldenwest Electric Cooperative
Farmers Union Oil Company (Plentywood)	Hill Country Electric Cooperative
Moore Farmers' Oil Company	InterBel Cooperative
Pro Co-op	Lincoln Electric Cooperative
Rocky Mountain Supply	Lower Yellowstone Rural Electric Cooperative
Town & Country Supply Association	Marias River Electric Cooperative
Western Montana Growers Cooperative	McCone Electric Cooperative
Wolf Point Ag Partners LLC	Mid-Yellowstone Electric Cooperative
	Nemont Telephone Cooperative
	NorVal Electric Cooperative
	Park Electric Cooperative
	Range Telephone Cooperative
	Ravalli Electric Cooperative
	Sheridan Electric Cooperative
	Southeast Electric Cooperative
	Sun River Electric Cooperative
	Triangle Communications Cooperative
	Upper Missouri Power Cooperative

Credit Unions	Retail/Consumer Cooperatives
1st Liberty Federal Credit Union	Clay Works! in the Bitterroot
Badlands Federal Credit Union	Mountain Brook Craft Cooperative
Bear Paw Credit Union	Red Paint Creek Cooperative, Inc.
Bitterroot Community Federal Credit Union	Riverside Crossing Adult Cottage Cooperative
Butte Community Federal Credit Union	The Original Montana Club Cooperative Association
Missoula Clearwater Federal Credit Union	
Community First Federal Credit Union	Other
Daniels-Sheridan Federal Credit Union	CHS Refinery
Deer Lodge County School Employee Federal Credit Union	
Embark Federal Credit Union	
Family First Federal Credit Union	
Fergus Federal Credit Union	
Fort Peck Community Federal Credit Union	
Union Froid Federal Credit Union	
Glendive BN Federal Credit Union	
Lincoln County Federal Credit Union	
MDU Employees Federal Credit Union	
MM Employees Federal Credit Union	
Mile High Federal Credit Union	
Miles City Federal Credit Union	
Montana Federal Credit Union	
Montana Educators Credit Union	
Mountain West Federal Credit Union	
Northern Montana Hospital Federal Credit Union	
Northwestern Energy Employees FCU	
Park Side Credit Union	
Ravalli County Federal Credit Union	
Richland Federal Credit Union	
Russell Country Federal Credit Union	
Southwest Montana Community Federal Credit Union	
St. Pat's Employee Federal Credit Union	
Whitefish Credit Union	