



Sustaining Farmers Market Success

The Economic Contributions of Farmers Markets in Montana



June 2022
Bureau of Business and Economic Research
University of Montana—Missoula

Photo credit: Maura Henn

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Acknowledgements

The University of Montana's Bureau of Business and Economic Research (BBER) recognizes the outstanding products and services that farmers markets provide all across Montana. The markets would never happen without the hard work and creativity of vendors, market managers and staff. This same group of people - vendors, market managers and staff - made this study possible and were very generous with their time and information.

The National Center for Appropriate Technology (NCAT) kindly and wisely sponsored this study. NCAT staff, specifically Tammy Howard and Maura Henn, were indispensable colleagues as this study progressed.

Finally, Janet Stevens, BBER's data collection coordinator, did an amazing job obtaining the data BBER presents here. She was the key to this study's success.

Bureau of Business and Economic Research
University of Montana - Missoula
June 16, 2022

Executive summary

The National Center for Appropriate Technology (NCAT) needed information about the economic impacts farmers markets have on Montana. NCAT hired the University of Montana's Bureau of Business and Economic Research (BBER) to obtain this information. Specifically, the primary objective of this study is to summarize the economic contributions of farmers markets in Montana. A secondary objective of this study is to provide a portrait of Montana's farmers markets from a statewide perspective.

BBER collected data on 71 farmers markets during the period from August 7, 2021 through November 11, 2021. The following summarizes the results of the study.

BBER finds that:

- In 2021 farmers markets made substantial contributions to the Montana economy. Specifically, in 2021 Montana farmers markets received \$17.3 million in revenue and generated an additional \$10.4 million in new spending from resident wages, tax payments, sales, and investments that occurred as a result of farmers markets.
- An impressive 4,900 people worked to produce and sell the goods and services offered on one typical market day at Montana's 71 markets during the 2021 market season. In 2021 farmers markets also generated 260 full-time, Montana jobs over and above the 4,900 people who worked to put on farmers markets.
- The typical 2021 Montana farmers market offered 22 individual market stands, generated \$244,000 in revenue over the course of the market season and used the work of 69 people to put on the market for one typical market day.
- In 2021 farmers markets offered a very broad and important selection of products all across Montana, especially in rural economic areas - from Libby to Broadus. These products included fresh produce, crafts, baked goods, meat and other items that are key staples in most economies.
- Farmers markets in Montana are highly scalable businesses. As a business model 2021 farmers markets adapted to a very wide range of communities, from the smallest and most rural to large urban communities. They adapted by offering an appropriate number of market stands and an appropriate mix of products and services tailored to each community. This scalability made 2021 farmers markets in Montana a very useful business model that has propagated across the state in all sizes of communities.

Introduction

Montana's farmers markets are vibrant, visible, and important centers of commerce in communities across the state. Not only do they constitute a valuable source of locally produced foodstuffs in the areas in which they operate, but they also provide a variety of social benefits as they bring producers and consumers together into the centers of the towns in which they thrive.

The National Center for Appropriate Technology (NCAT) in 2020 undertook a three-year program titled Sustaining Farmers Market Success to support and grow Montana's farmers markets. As a part of this program NCAT needed information about the economic impacts farmers markets have on Montana. NCAT hired the University of Montana's Bureau of Business and Economic Research (BBER) to obtain this information.

Specifically, the primary objective of this study is to summarize the economic contributions of farmers markets in Montana. A secondary objective of this study is to provide a portrait of Montana's farmers markets from a statewide perspective. This report presents the results of the study.

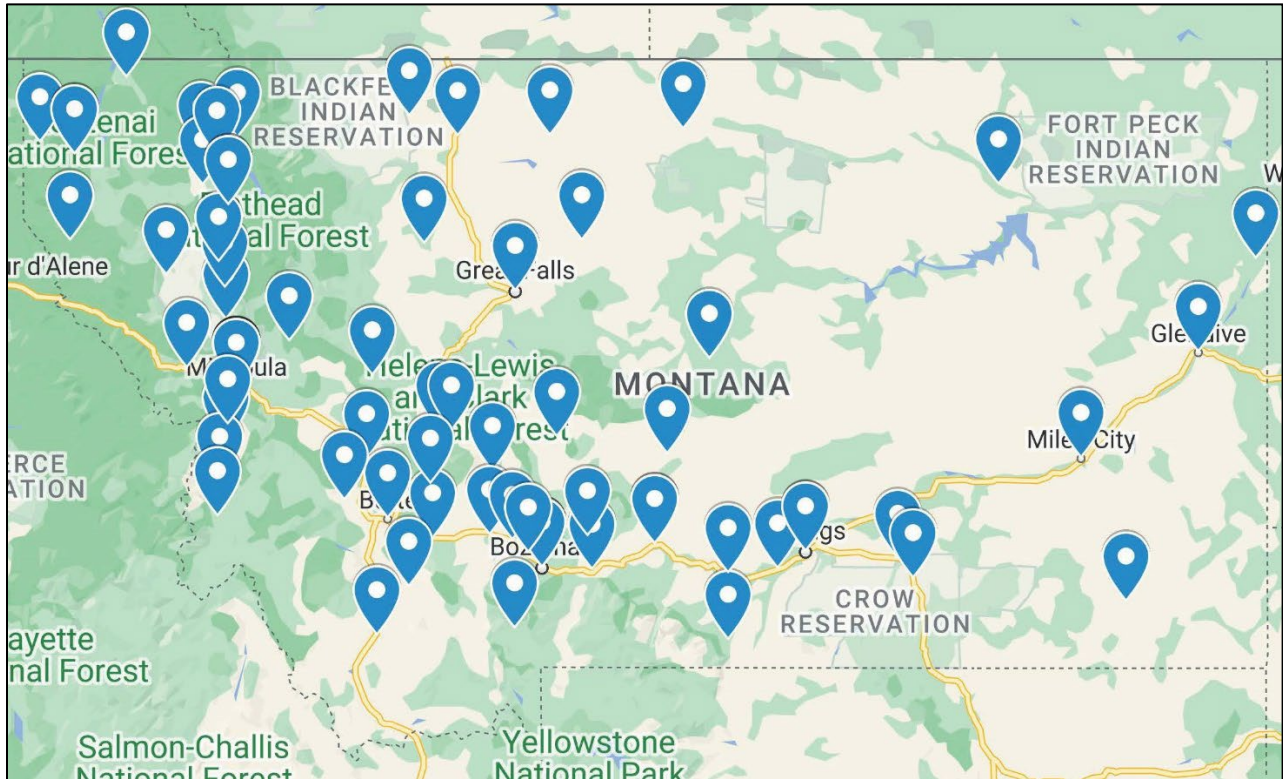
Structure of this report

This report contains four sections. First, the data collection efforts administered by BBER are described to provide readers with needed context for the remainder of the report. Next, the findings of the study are presented. The findings are summarized in three parts: the direct economic contributions of farmers markets, the indirect and total economic contributions of farmers markets and the description of the farmers markets. The third section summarizes BBER's conclusions. Finally, the works cited in this report are presented for reference.

Data collection

Bureau of Business and Economic Research (BBER) studied 71 markets. National Center for Appropriate Technology (NCAT) provided the list of markets studied. The markets were located across the state of Montana. Figure 1 presents the locations of the farmers markets which were studied for this report.

Figure 1: Locations of farmers markets studied



BBER collected data during the period from August 7, 2021 through November 11, 2021. BBER staff collected extensive data during in-person visits to 12 markets located in 10 Montana communities:

1. Boulder
2. Bozeman
3. Havre
4. Helena
5. Glendive
6. Great Falls
7. Miles City
8. Red Lodge
9. Twin Bridges
10. Missoula

BBER also conducted in-depth telephone interviews with the managers of 47 additional markets. BBER then collected basic data from the internet and other sources on the 12

remaining markets that did not respond to requests for information. The final outcomes of data collection were that BBER collected data on 100% of the studied markets and 59 of the 71 markets (83%) directly participated in the study. This high participation rate makes it very likely that the data collected are representative of the markets studied.

Findings

The primary objective of this study is to summarize the economic contributions of farmers markets in Montana. The paragraphs that follow present that summary. The summary is presented in two parts. First, the direct contributions farmers markets made to the 2021 Montana economy are described. Second, the indirect and total economic contributions are presented.

A secondary objective of this study is to provide a portrait of Montana's farmers markets from a statewide perspective. The portrait presented here focuses on three areas: market stands, revenue generated and the workers who make the markets happen. This description of Montana's farmers markets follows the summary of the economic contributions of farmers markets.

Direct economic contributions

The direct contributions farmers markets made to the 2021 Montana economy fall into two categories: revenue generated and workers engaged. These are described in more detail below.

Revenue

Farmers markets contribute a significant amount of money to the Montana economy through the revenue they generate directly. BBER found that customers spent a total of \$16.86 million dollars at the 71 farmers markets studied during the spring through fall market season of 2021. In addition, the administration of each of the 71 markets collected a total of \$440,000 in grant and other revenue during the study period. The combined total of revenue directly generated by the farmers markets during the study period was \$17.3 million dollars. Table 1 describes the amounts of revenue generated by specific types of farmers market product or activity.

Table 1: Statewide revenue by product or activity - 2021

Product or activity	Revenue	Product or activity	Revenue
Produce	\$5,700,000	Honey	\$270,000
Crafts	\$5,000,000	Floral	\$200,000
Bakery	\$2,140,000	Health or beauty (lotions, salves or non-food herbal products)	\$170,000
Processed and packaged food or beverages	\$1,200,000	Live plants	\$60,000
Meat	\$1,100,000	Eggs	\$20,000
Hot or cold food or beverage served on site	\$1,000,000	Market administration	\$440,000

Across Montana produce products generated the most revenue in 2021 (\$5.7 million). Crafts products of all types generated the second most revenue in 2021 (\$5.0 million). Bakery goods were the third largest source of 2021 revenue (\$2.1 million).

Workers

In addition to the direct contribution farmers market revenue makes to Montana’s economy, farmers markets are a significant source of work for Montanans. During the 2021 spring through fall market season BBER found that 4,700 people worked at least one hour to sell or produce products for the 71 markets across Montana. Also, a total of 200 people worked to administer and manage the 71 markets. The combined total number of people who directly worked for farmers markets during the 2021 study period was 4,900. Table 2 describes the number of people who worked for farmers markets in 2021 by the market product or activity on which they worked.

Table 2: Number of people who work at farmers markets by product or activity - 2021

Product or activity	People	Product or activity	People
Produce	1,900	Honey	100
Crafts	1,000	Floral	100
Bakery	500	Health or beauty (lotions, salves or non-food herbal products)	90
Processed and packaged food or beverages	400	Live plants	60
Meat	300	Eggs	50
Hot or cold food or beverage served on site	200	Market administration	200

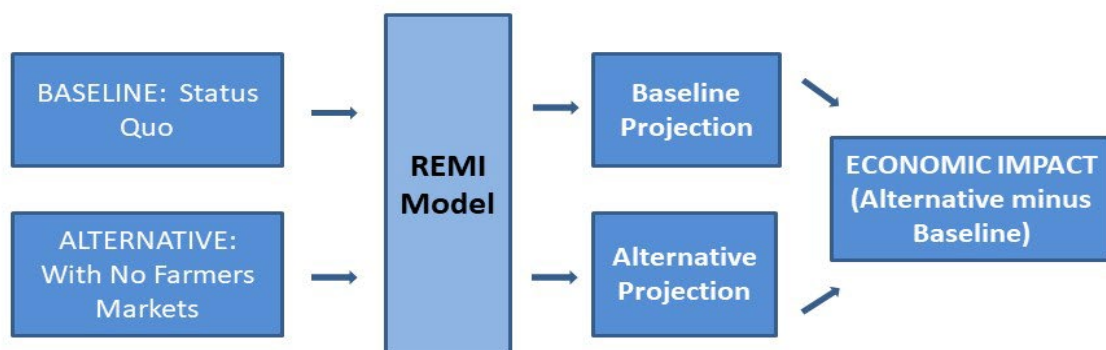
Produce vendors used the largest number of workers (1,900) to produce and sell their products during the 2021 market season. Crafts vendors used the second largest number of workers (1,000) to produce and sell their products. Bakery vendors used the third largest number of workers to produce and sell their products (500).

Indirect and total economic contributions

The presence of farmers markets in Montana creates economic contributions over and above the direct revenue generated and the number of people who work at farmers markets. They do this through new spending from resident wages, tax payments, sales, and investments and new jobs that occur as a result of farmers markets. This new spending and these new jobs are what this report refers to as indirect economic contributions. The following paragraphs describe the indirect economic contributions made by farmers markets to Montana's economy.

In general, the method used to quantify the indirect economic contributions made by farmers markets is to answer the question: how much larger is Montana's economy due to the presence of farmers markets compared to the absence of farmers markets? BBER uses an economic model calibrated for the current Montana economy to capture all the interrelated connections between farmers markets and the rest of the Montana economy. The Regional Economic Model produced by REMI is an industry-leading tool for estimating overall economic contributions from economic activity or policies on regional and state economies (Treyz, 1993). The approach of this research is to find the difference between two scenarios for the Montana economy, the Montana economy if farmers markets were not present set against the Montana economy as it is, depicted graphically in Figure 2 below. The economy absent farmers markets is explicitly calibrated to extract the total economic contribution of farmers markets in the state.

Figure 2: Economic impact analysis with the REMI model



Indirect economic contributions

The indirect economic contributions in 2021 by farmers markets were considerable. There were two primary types of indirect economic contribution made by farmers markets: additional dollars generated and additional jobs created.

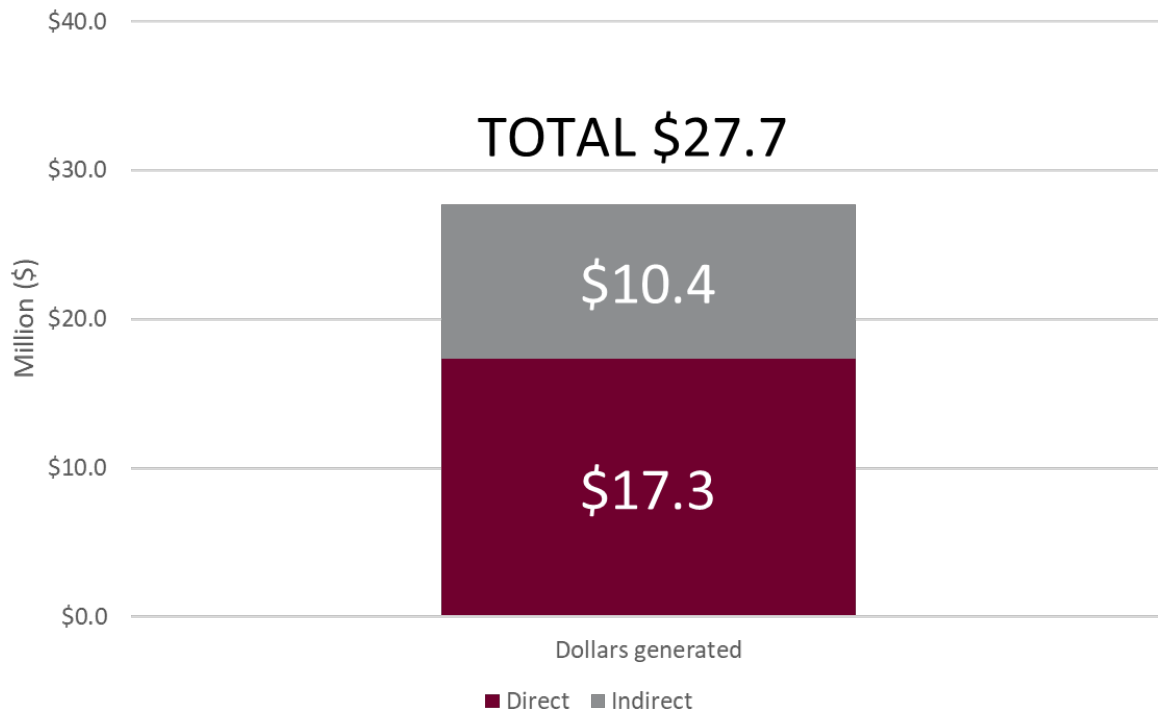
BBER finds that farmers markets were responsible for generating \$10.4 million in indirect dollars over and above the direct revenue generated in 2021. They did this through generating new spending from resident wages, tax payments, sales, and investments that occur as a result of farmers markets. BBER’s finding is supported by research from the University of Montana’s Institute of Tourism and Recreation Research (ITRR). ITRR reported that in the year 2020 nonresident visitors to Montana spent \$6.3 million at farmers markets (Grau, 2021). Spending on farmers markets by nonresident visitors brings “new” dollars into Montana and generates indirect economic contributions.

BBER also finds that farmers markets were responsible for increasing employment in Montana by generating 260 jobs above and beyond the people who worked for farmers markets in 2021. The additional jobs generated in 2021 were full-time, Montana jobs.

Total economic contribution

BBER estimates that the total 2021 economic contribution of farmers markets to Montana was \$27.7 million, \$17.3 million in direct revenue and \$10.4 million in indirect contributions generated. Figure 3 illustrates this finding.

Figure 3: Total economic contribution - 2021



Economic contributions of farmers markets in context

To place the economic contributions of Montana farmers markets in context it helps to look at the results of other studies. Table 3 below presents two key findings from this study and compares them to three additional studies (Otto, 2010), (Zendehdel, 2021) (Yosick, 2008).

Table 3: Economic contribution of farmers markets around the country

Location	Year	Direct revenue (million)	Total contribution (million)
Montana	2021	\$17.3	\$27.7
Washington D.C. metro area	2021	\$24.4	\$36.8
Iowa	2009	\$38.4	\$59.4
Portland, Oregon	2008	\$11.7	\$17.1

When viewed in the context of farmers markets from around the country, the economic contributions of farmers markets in Montana are entirely consistent with those found in other places. The direct revenue generated by Montana farmers markets is very comparable to that generated in other areas. Similarly, the amount of the total economic contributions of farmers markets in Montana tracks closely with the totals found by studies of markets in other areas. While the number of economic impact studies of farmers markets is limited, the consistency among these studies lends credibility to the findings presented here. In addition, the similarity of the Montana findings to those from other places suggests that farmers markets in Montana were thriving in 2021.

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Description of the markets

Collecting the data needed to summarize the economic contributions of farmers markets in Montana enabled BBER to fulfill a second study objective: to provide a portrait of Montana’s farmers markets from a statewide perspective. The paragraphs that follow present that portrait. One key aspect of the farmers markets studied is their market stands.

Market stands

The sheer number of farmers market stands that operated in Montana was impressive, about 1,560 on a typical 2021 market day. There were 22 stands operating at a typical Montana farmers market on a market day. Table 4 presents the typical distribution of stands by type within an average Montana market. But readers should keep in mind that every individual market was unique and didn’t look quite like this statistical portrait.

Table 4: Typical distribution of stands by type within in a typical market

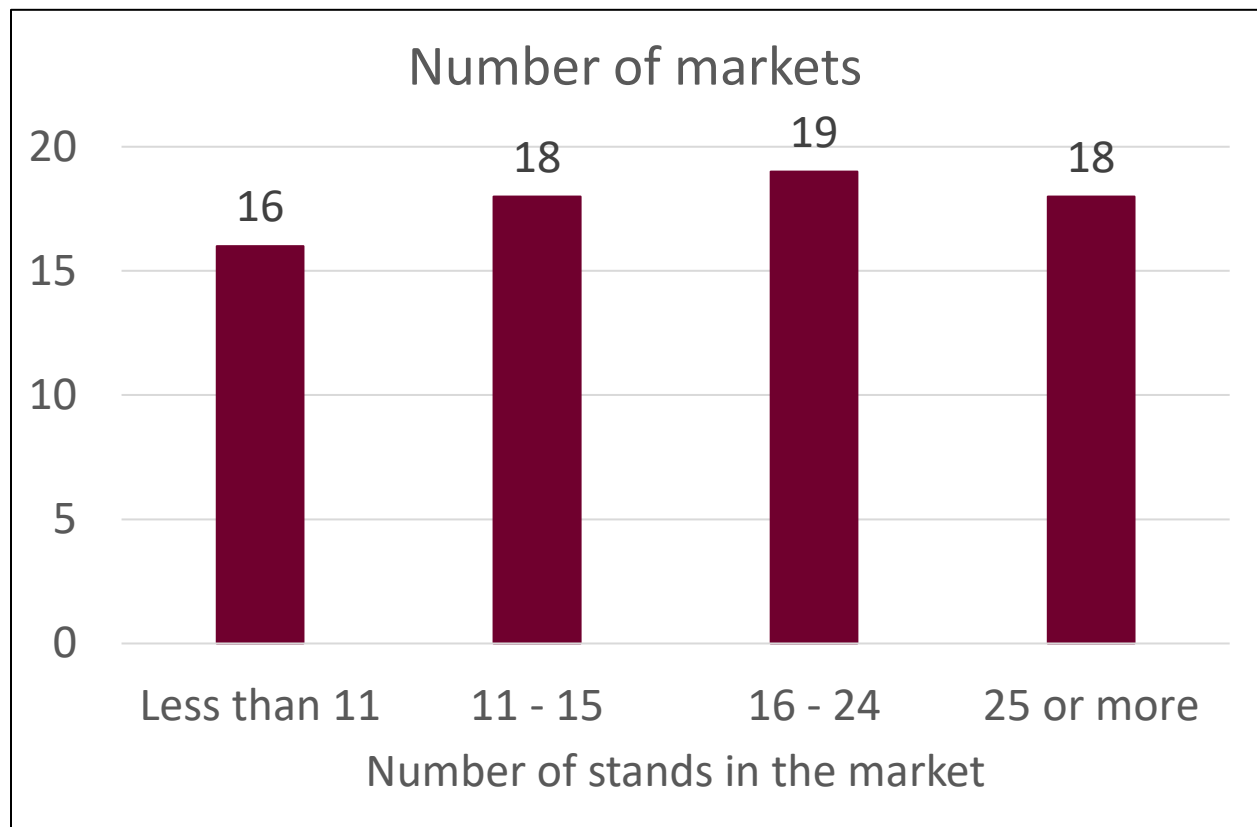
Type of stand	Number per market	Percent
Total	22	100%
Crafts	9	41%
Produce	5	23%
Bakery	2	9%
Health or beauty	1	5%
Meat	1	5%
Processed and packaged food or beverages	1	5%
Hot or cold food or beverage served on site	.9	4%
Live plants	.6	3%
Honey	.6	3%
Eggs	.5	2%
Floral	.4	2%

Crafts stands were the most common among markets statewide (9 stands per market), followed by produce (5 stands per market) and bakery stands (2 stands per market). Egg stands and floral stands were the least common, each averaging about 1 stand for every 2 markets. For this report a stand is classified by the main product sold.

The breadth of products offered in 2021 by markets stands (see Figure 1 and Table 4) across Montana indicates that farmers markets were an important source of goods, especially in rural Montana economies. However, BBER staff did receive a few anecdotal reports saying it was difficult to recruit produce vendors to markets. Happily, fewer than 10% of markets in 2021 reported not having any produce vendor. The few markets without produce vendors in 2021 were all in very rural areas of the state.

When examining the number of market stands at markets statewide, Montana’s farmers markets in 2021 ranged from very small, with under five stands at a market, to very large, with over 70 stands at a market. Figure 4 presents the relative sizes of farmers markets in Montana by the number of stands at each market.

Figure 4: Distribution of markets by number of stands at each market - 71 markets



The smallest one-quarter of Montana’s 2021 farmers markets all had fewer than 11 individual market stands. The largest one-quarter of markets had 25 or more market stands. The middle one-half of Montana’s farmers markets had between 11 and 24 markets each in 2021.

Revenue

Of course, the Montana farmers market stands BBER studied in 2021 generated revenue. This revenue provided another vital way to examine Montana's 71 farmers markets. The average Montana farmers market generated a total of \$244,000 during the 2021 market season. The smallest markets generated less than \$10,000 while the largest generated more than \$1.5 million. It is important to note that the 2021 average presented here is skewed somewhat by Montana's largest markets. So, it is useful to consider that the median 2021 farmers market generated about \$180,000 in total revenue during the spring through fall season.

Figure 5: Distribution of markets by total season revenue - 71 markets

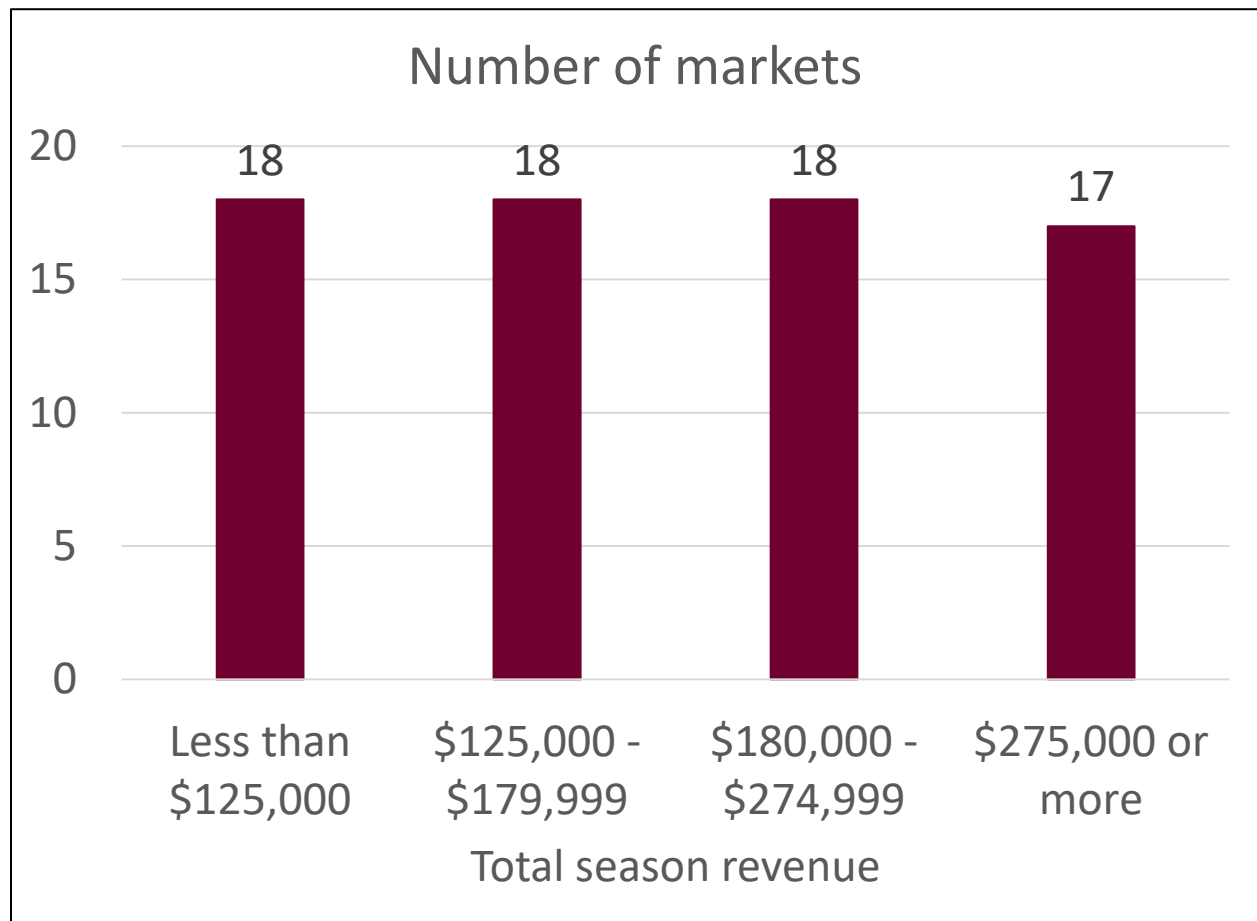


Figure 5 shows the distribution of Montana farmers markets by the total amount of revenue each market generated during the 2021 season. The smallest one-quarter of markets generated less than \$125,000 over the season. The largest one-quarter of markets generated \$275,000 or more. The middle one-half generated between \$125,000 and \$274,999.

Workers

Like revenue, the people whose hard work was required to put on Montana's 71 farmers markets were fundamental to this portrait of the markets. Presenting a farmers market needed the work of a large number of people. Workers in this study were defined as people who worked at least one hour to sell or produce products or services at a farmers market on a typical market day, including market administrators. The typical Montana farmers market required 69 people to put on the market for one typical market day during the 2021 season. In 2021, Montana's smallest markets needed fewer than 20 people to put on a market, while the largest markets needed more than 110 people.

Figure 6: Distribution of markets by the number of people who worked to put on each market - 71 markets

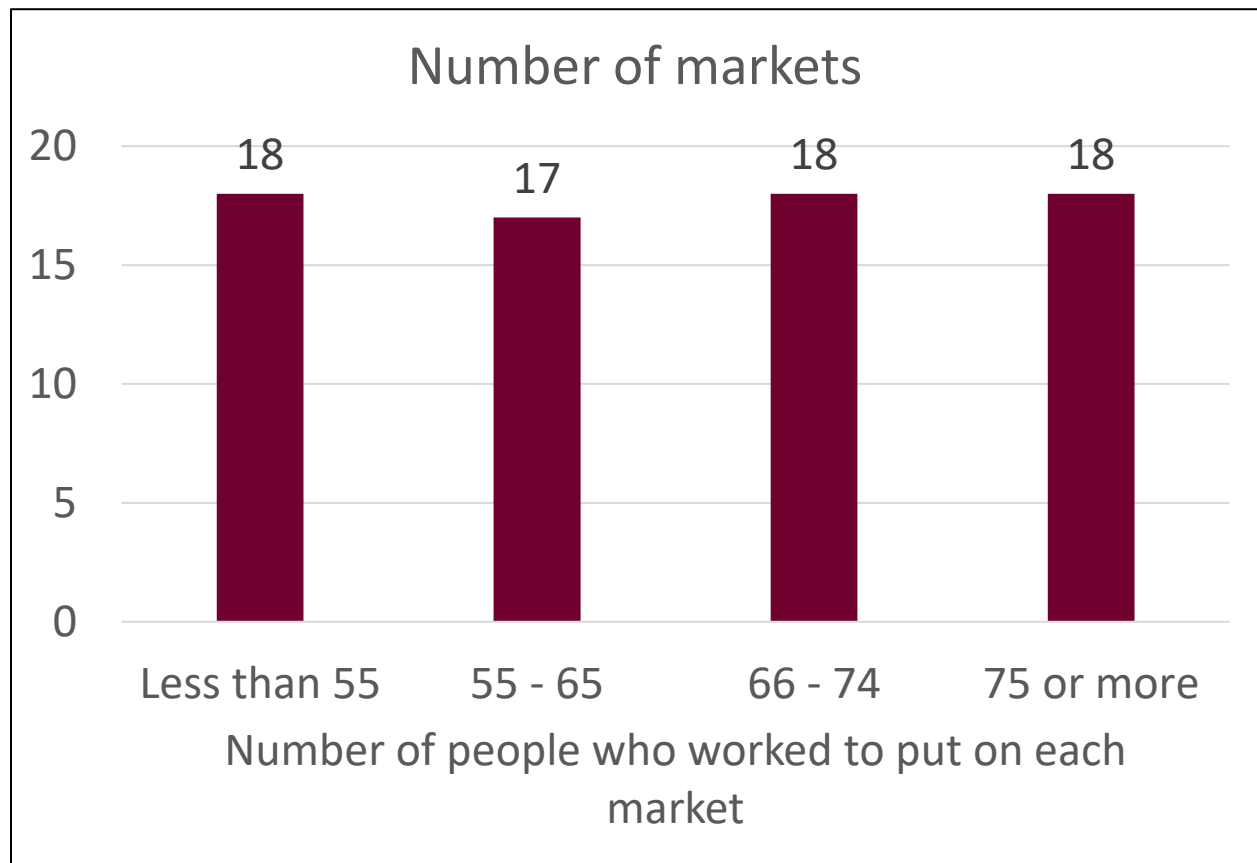


Figure 6 illustrates the distribution of Montana farmers markets in 2021 by the number of workers required to put on a market for one typical market day. Montana's smallest one-quarter of markets needed fewer than 55 workers. Montana's largest one-quarter of markets needed 75 or more workers. The middle one-half of markets needed between 55 and 74 workers.

Scalability and utility of the business model

The portrait of 2021 Montana farmers markets presented here indicates that farmers markets in Montana are highly scalable. As a business model markets adapted to a very wide range of communities, from the smallest and most rural to large urban communities. They adapted by tailoring an appropriate number of market stands and an appropriate mix of products and services to each community. This scalability made 2021 farmers markets in Montana a very useful business model that was found across the state and in all sizes of communities.

Conclusions

BBER finds that in 2021 farmers markets made substantial contributions to the Montana economy. Specifically, in 2021 Montana farmers markets received \$17.3 million dollars in revenue and generated an additional \$10.4 million dollars in new spending from resident wages, tax payments, sales, and investments that occurred as a result of farmers markets.

BBER finds that an impressive 4,900 people worked to produce and sell the goods and services offered on one typical market day at Montana's 71 markets during the 2021 market season. In 2021 farmers markets also generated 260 full-time, Montana jobs over and above the 4,900 people who worked to put on farmers markets.

BBER finds that the typical 2021 Montana farmers market offered 22 individual market stands, generated \$244,000 in revenue over the course of the market season and used the work of 69 people to put on the market for one typical market day.

BBER also finds that in 2021 farmers markets offered a broad and important selection of products all across Montana, especially in rural economic areas - from Libby to Broadus. These products included fresh produce, crafts, baked goods, meat and other items that are staples of most economies.

Finally, BBER finds that farmers markets in Montana are highly scalable. As a business model markets adapted to a very wide range of communities, from the smallest and most rural to large urban communities, by adopting an appropriate number of market stands and an appropriate mix of products and services for each community. This scalability made 2021 farmers markets in Montana a very useful business model that was found across the state and in all sizes of communities.

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