

Blackfeet Reservation Community Food Security & Food Sovereignty Assessment

Prepared by Marissa McElrone

This document, the Blackfeet Reservation Community Food Security and Food Sovereignty Assessment (CFSA), was created for the use of FAST Blackfeet to further its mission of supporting community strengths, culture and wellness by developing local, sustainable systems that provide healthy food access and education at every age, for all who need it. FAST Blackfeet desires to work with all community organizations on the reservation to achieve its mission and is available to all organizations and individuals to help inform their work on behalf of the Blackfeet people.

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This document is a work in progress. Some of the statistics will be updated as new data becomes available. Subsequent survey information will be incorporated into the document to keep information as current as possible. For additions, corrections, observations and suggestions please contact us at fastblackfeet@gmail.com.



Table of Contents

Executive Summary	4
FAST Blackfeet	
Blackfeet Reservation CFSA	
Introduction	5
Food insecurity and hunger in the United States	
What is household and community food security?	
What is food sovereignty?	
CFSA Process	7
What is a community food security assessment?	
Why conduct a community food security assessment?	
Blackfeet Reservation CFSA Methodology	
Blackfeet Reservation Socioeconomic and Demographic Characteristics	8
Methodology	
Demographic Data	
Socioeconomic Data	
Health Related Data	
Food Resource Assessment	15
Methodology	
Federal Food Assistance Resources	
Retail Resources for Food Purchases	
Emergency Food Resources	
Food Security Assessment	23
Individual Food Security Rates	
Household Food Security Methodology	
Blackfeet Reservation Community Food Security Status	
Food Accessibility & Food Production Assessment	27
Methodology	
Blackfeet Reservation Food Access Map	
Food Availability and Affordability Assessment	29
Methodology	
NEMS-S Results	
Food Sovereignty Assessment	32
Methodology	
Results	
Conclusion	37
Recommendations for Change	
Limitations	
References	39
Appendix A: FAST Blackfeet Food Security and Food Sovereignty Survey	41
Appendix B: US Household Food Security Survey: Six-Item Short Form Scoring Protocol	43
Appendix C: Blackfeet Reservation Food Access Map Assessment Questions	44
Appendix D: NEMS-S Scoring Protocol	45



Executive Summary

FAST Blackfeet

FAST (Food Access and Sustainability Team) Blackfeet is a group of community leaders, health professionals, educators and involved citizens on the Blackfeet Reservation who are dedicated to:

1. Identifying areas of food insecurity in our communities and to exploring solutions to these issues.
2. Addressing issues of food sovereignty on the Blackfeet Reservation to ensure access to culturally relevant and affordable foods for all.

FAST Blackfeet's purpose involves supporting community strengths, culture and wellness by developing local, sustainable systems that provide healthy food access and education at every age, for all who need it. For many tribal communities, the term sovereignty is used as a term that recognizes the right of Native peoples to retain their cultural identity and to acknowledge and reserve fundamental rights granted in treaties or other legal documents.

FAST Blackfeet is in the process of creating a strategy to define what Food Sovereignty looks like for the Blackfeet Nation while examining food insecurity on the reservation. FAST Blackfeet seeks to accomplish this through collaboration and cooperation with tribal government, educators, community members and health professionals, using existing data and through a series of focused surveys to determine the causes of hunger in our communities and to find solutions addressing these causes. We will also examine the important cultural connection and impact that Traditional Foods have on the Blackfeet Nation. Our goal is to increase access to healthy food for our children, for our elders, and for our community.

The Blackfeet Reservation Community Food Security & Food Sovereignty Assessment

The primary goal of a community food security & food sovereignty assessment (CFSA) is to paint a picture of a community's food security and food sovereignty status. By enhancing a common understanding of the resources and gaps present within Blackfeet Nation's food system, FAST Blackfeet will create common goals, strategic plans, and policy recommendations that inform FAST Blackfeet's future endeavors to ensure a more food secure and food sovereign Blackfeet Nation.

Goals for the CFSA, as set by the FAST Blackfeet, include:

1. Identify areas of food insecurity on the Blackfeet Reservation
2. Explore solutions to identified food insecurity issues
3. Identify issues of food sovereignty on the Blackfeet Reservation
4. Explore access solutions regarding culturally relevant and affordable foods



Introduction

This report provides a CFSA of the Blackfeet Reservation based on the United States Department of Agriculture (USDA) Community Food Security Assessment Toolkit,¹ developed by the Economic Research Service, and Food Sovereignty Assessment Tool,² developed by the First Nations Development Institute. These toolkits provided a set of standardized measurement tools to assess various community food security and food sovereignty indicators.

Food insecurity and hunger in the United States

Despite continued expansion of the national nutrition safety net in the US, in 2014 the USDA estimated that 14% of households in the US struggled to meet basic food needs.³ These 17.4 million households were deemed food insecure. Food insecurity is defined as the inadequate or unreliable availability or ability to obtain nutritious and safe foods,⁴ while food security describes a household with current access and limited risk in losing adequate, nourishing, and safe foods for all household members.⁵ Food insecurity is a major public health threat with positive correlations to heart disease and high cholesterol,⁶ high blood pressure,⁷ metabolic syndrome,⁸ obesity,⁹ and limited social capital.^{10,11}

What is household and community food security?

Household food security is the household status regarding its access to nutritionally adequate and culturally appropriate foods in sufficient quantities to meet all of the household members health needs.¹ Community food security, an expansion of household food security, concerns the community's social, economic, and institutional factors that affect food quantity, quality, availability, and affordability.¹² Figure 1 below describes some of the reasons a community may be considered food insecure.

Figure 1: Reasons Communities are considered Food Insecure¹²



Source: Kantor LS. "Community Food Security Programs Improve Food Access." Food Review 2001; 24(1):20-26.

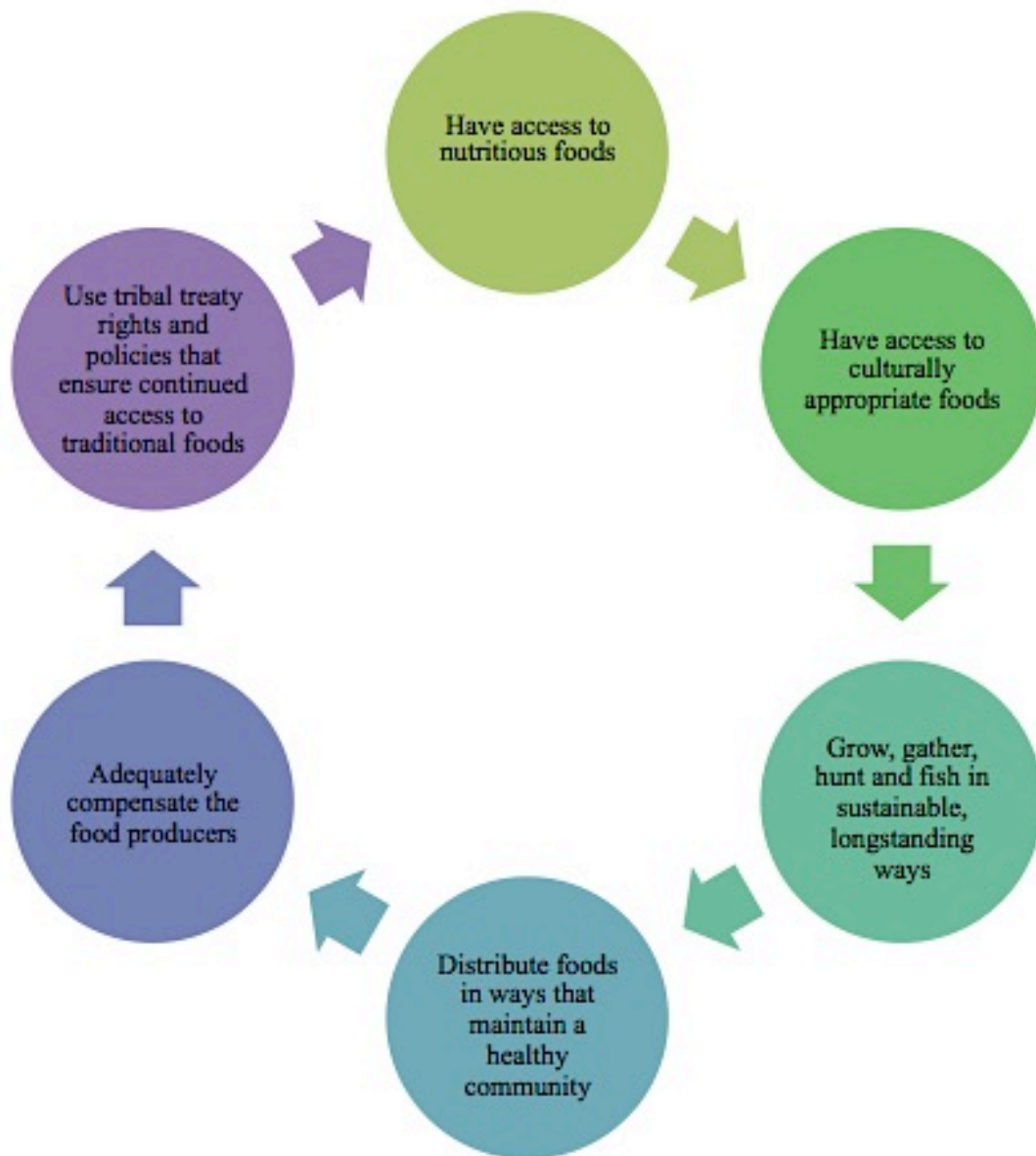
What is food sovereignty?

Food sovereignty is defined as the right to healthy and culturally appropriate food produced through local, sustainable ways and the right of people to define their own food and agriculture systems.¹³ A sustainable community food system integrates production, processing, distribution, consumption, and disposal of food and food-related materials in environmentally, economically, and socially just ways.² Additionally, a sustainable community food system



includes collaborative efforts between farmers, consumers, and community partners to create a locally supplied, self-sustaining food economy.² As depicted in Figure 2, the First Nations Development Institute states that tribal communities exhibiting food sovereignty and sustainability are those that demonstrate the components described below.

Figure 2: Components of a Food Sovereign and Food Sustainable Tribal Community²



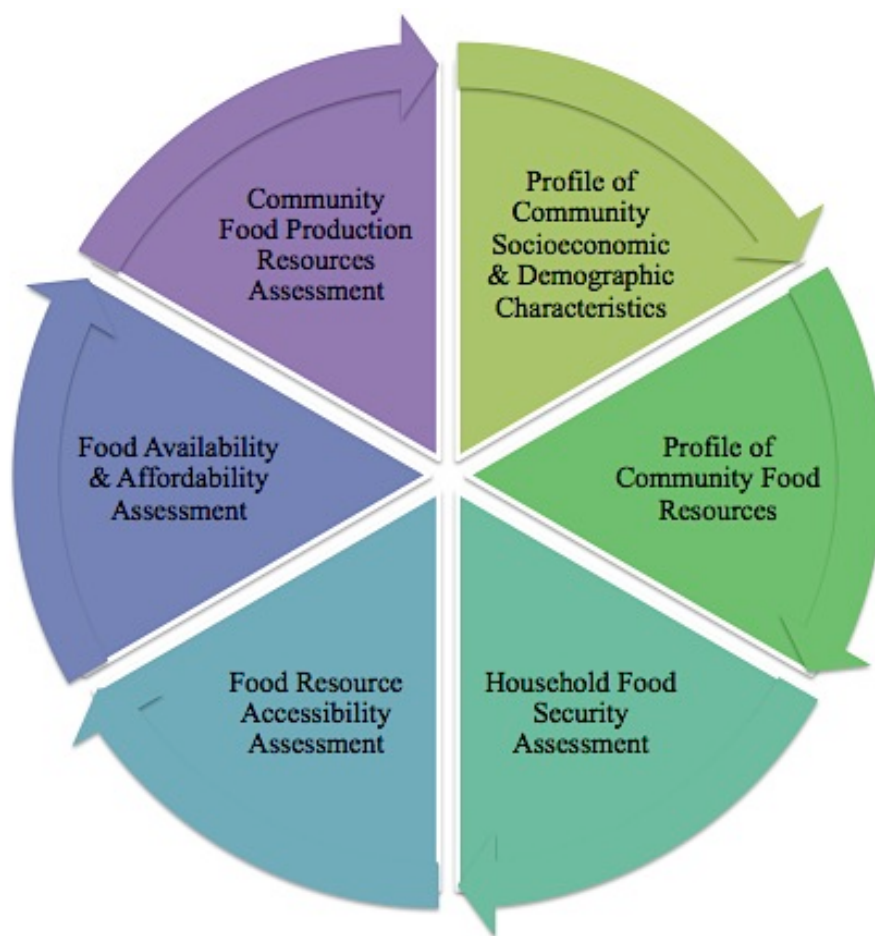
Source: Bell-Sheetter, Alicia, Food Sovereignty Assessment Tool, Fredericksburg, VA: First Nations Development Institute, 2004.

CFSA Process

What is a community food security assessment?

A community food security assessment is data collection and analysis that determines if households within a community have access to nutritious, adequate, sufficient, and culturally appropriate foods to meet dietary and health needs.¹ Figure 3 below describes the six community food security assessment components contained in this report. Additionally, the Blackfeet Reservation CFSA included a food sovereignty assessment piece examining current availability, access, and barriers to traditional and locally produced foods on the Blackfeet Reservation.

Figure 3: Six Components of Community Food Security Assessment¹



Source: Cohen B, Andrews M, Kantor L. Community Food Security Assessment Toolkit. USDA: Economic Research Service, 2002.

Why conduct a community food security assessment?

Although there are many Federal nutrition and agricultural policies and programs that contribute to the overall nutrition safety net of both households and communities, many local level decisions affect community food security. This CFSA integrated information from various public and community sources to paint an overall picture of the Blackfeet Reservation

community food security and food sovereignty status with the aim to inform the Blackfeet Tribal Business Council.

A CFSA aims to increase understanding of the local food systems, inform goal setting to improve local food systems, inform decision makers about policies and actions to improve community food security and food sovereignty, and establish a food security surveillance system that can be used to compare with other communities throughout the US.

Blackfeet Reservation CFSA Methodology

Existing tools and resources were used in the development of the CFSA, including the USDA *Community Food Security Assessment Toolkit*¹ and *Food Sovereignty Assessment Tool*,² a publication by the First Nations Development Institute. Using preexisting toolkits streamlined the assessment process, however, the FAST Blackfeet and other collaborating community members were involved in all steps to provide guidance and feedback through a community based participatory approach. The Blackfeet Reservation CFSA contains 7 components including: 1) profile of community socioeconomic and demographic characteristics, 2) profile of community food resources, 3) assessment of household food security, 4) assessment of food resource accessibility, 5) assessment of food availability and affordability, 6) assessment of community food production resources, and 7) food sovereignty assessment.

Blackfeet Reservation Socioeconomic and Demographic Characteristics

Methodology

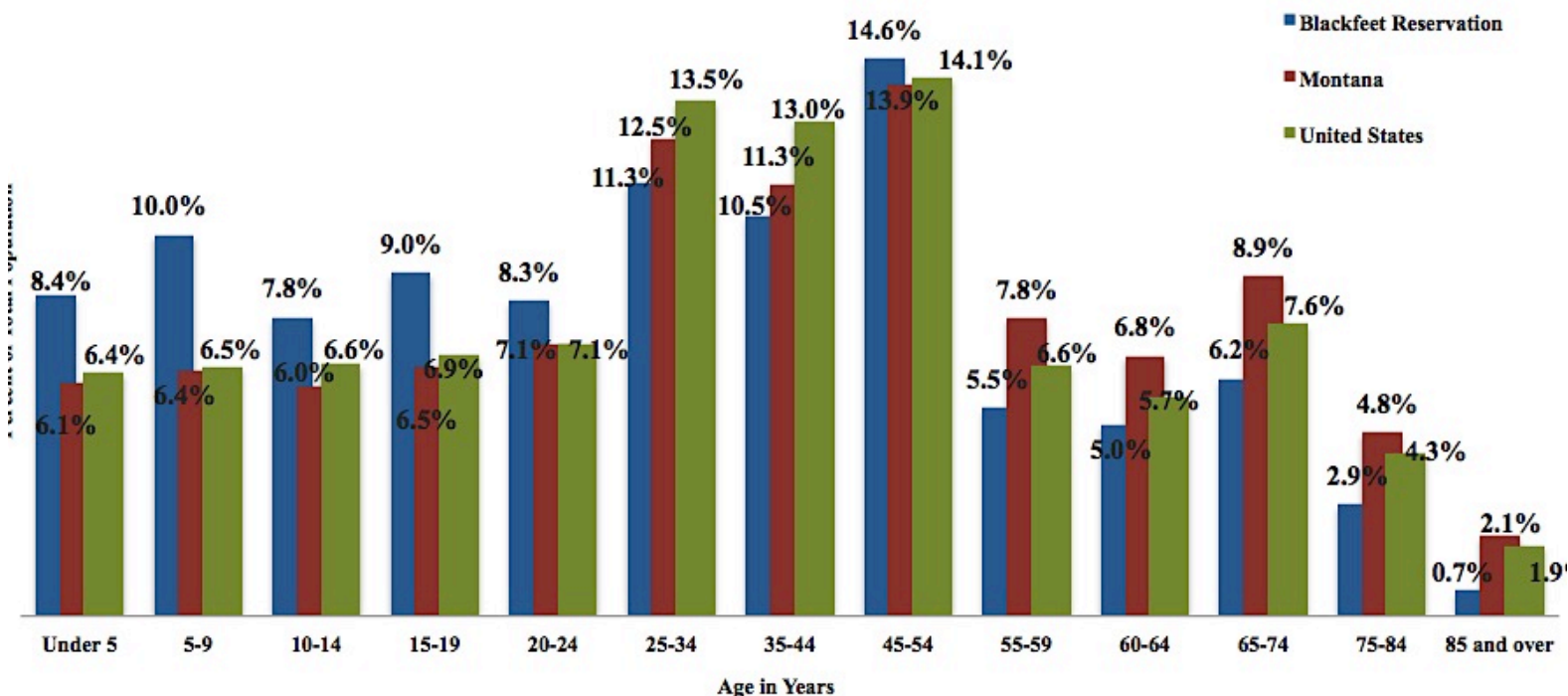
The following demographic and socioeconomic data were collected from the US Census Bureau, 2010-2014 American Community Survey. The comparison populations included the Blackfeet Reservation, Montana, and the United States. Since reservation specific Census data were not available, data from all zip codes on the reservation were collected and totaled for a more accurate, overall representation of the population living on the Blackfeet Reservation. The zip codes used were as follows: 59411 (Babb), 59417 (Browning/St. Mary), 59427 (Seville), 59434 (East Glacier Park), and 59448 (Heart Butte). Since the 59427 zip code contains a highly populated town, Cut Bank that is not on the Blackfeet Reservation, the estimated data used in analysis for this zip code was calculated by subtracting the Cut Bank, MT data from the total 59427 zip code data.

Demographic Data

The US Census Bureau estimated that 11,392 people lived on the Blackfeet Reservation in 2014.¹⁴ Approximately 50.1% of the population were reported as female and 49.9% were male. As seen in Chart 1, the highest percentage of the populations living on the Blackfeet Reservation, in Montana, and the nation, fell within the 45-54 age profile at the time of data collection. Also depicted in Chart 1, the percentage of the population 19 years and under was almost 10% higher on the Blackfeet Reservation (35.2%) when compared to both Montana (25%) and the US (26.4%)¹⁴ which may have indicated a younger overall population on the reservation.

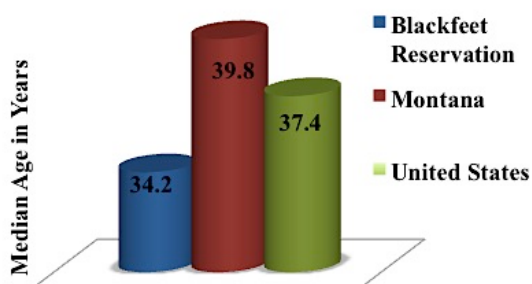


Chart 1: Comparison of US, Montana, and Blackfeet Reservation Age Profiles, 2014¹⁴



Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimates

Chart 2: Comparison of US, Montana, and Blackfeet Reservation Median Age, 2014¹⁴

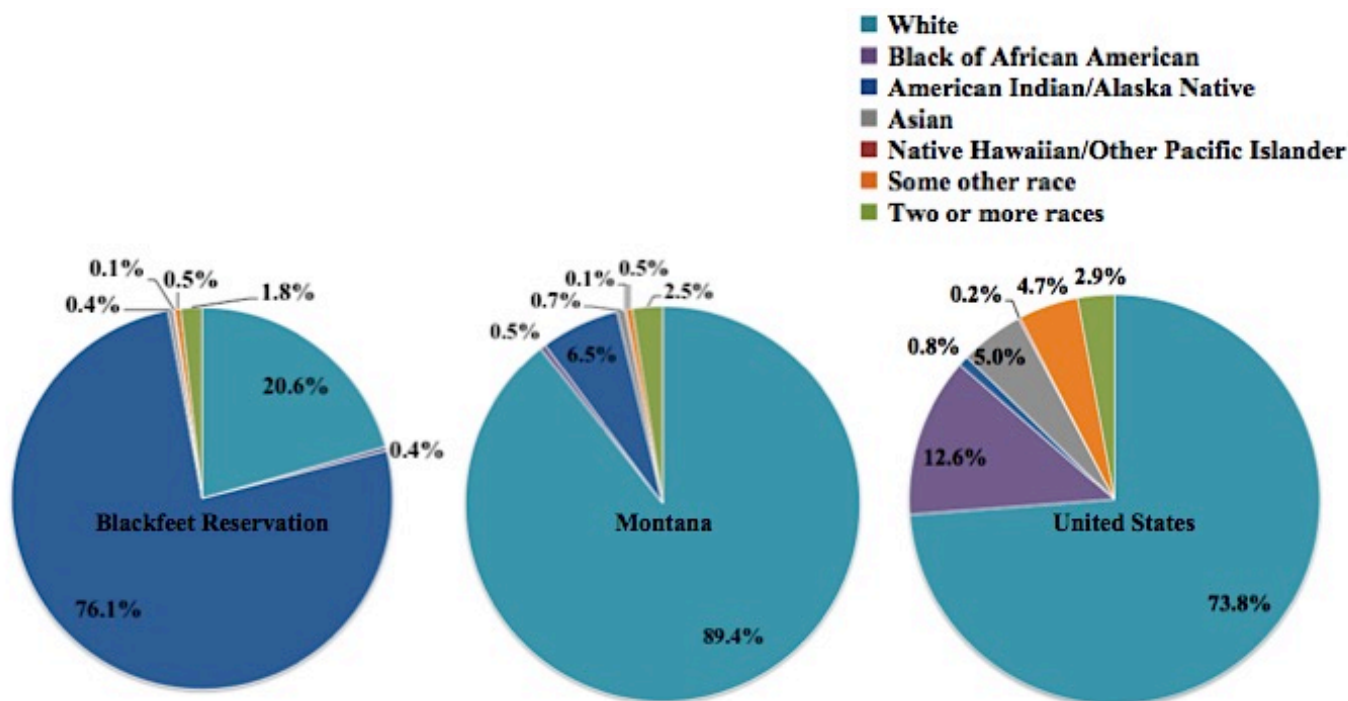


Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimates

Additionally, a younger population on the reservation was implicit by the lower median age. Displayed in Chart 2 on the left, the median age on the Blackfeet Reservation was 34.2 years. This was much lower when compared to 39.8 years seen in Montana and 37.4 years nationally.¹⁴

Chart 3 compared the racial profiles of the populations living on the Blackfeet Reservation, Montana, and the United States. The pie graph signified a much larger percentage of American Indian and Alaska Native (74%) comprised the population on the reservation compared to the other assessed populations. The second largest racial group at 21% on the Blackfeet Reservation was White.¹⁴

Chart 3: Comparison of US, Montana, and Blackfeet Reservation Race Profiles, 2014¹⁴



Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimates

Socioeconomic Data

Income is a strong food security indicator and individuals living below the federal poverty line are more likely to experience food insecurity.¹⁵ The median household annual income on the Blackfeet Reservation was considerably lower at \$30,762 compared to both Montana (\$46,766) and the US (\$53,482).¹⁴ Furthermore, Figure 4 portrayed the estimated number of individuals living per occupied housing unit in the 3 populations. With the highest rate of 3.5 individuals per occupied housing unit, the Blackfeet Reservation surpassed both the state and national averages.¹⁴ With a lower annual income supporting more people per household, the Blackfeet Reservation families might be experiencing a shortage of funds needed to maintain healthy diets for all household members.

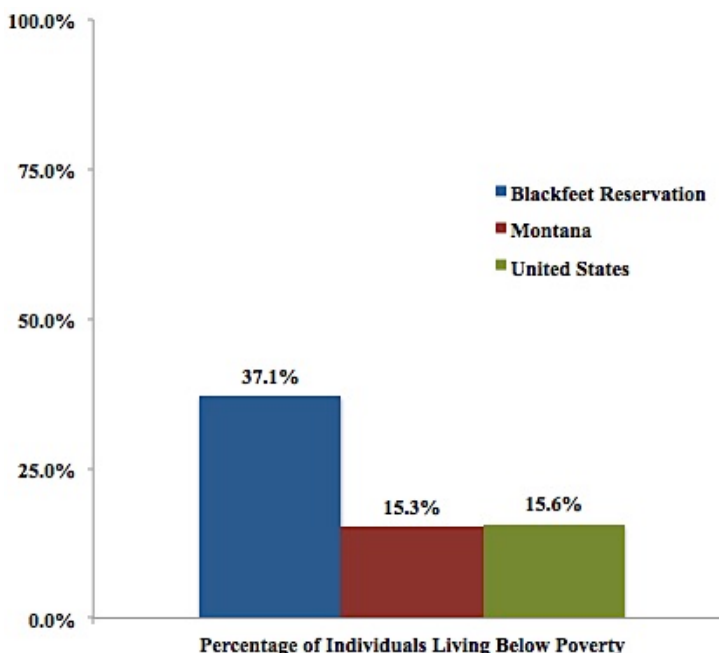
Figure 4: Comparison of US, Montana, and Blackfeet Reservation Estimated Individuals Living Per Occupied Housing Unit, 2014¹⁴



Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimates

Chart 4: Comparison of US, Montana, and Blackfeet Reservation Poverty Rates, 2014¹⁴

Comparative poverty rates were depicted in Chart 4 on the right. The percentage of individuals living on the reservation (37.1%) below the poverty line was more than double the state (15.3%) and national (15.6%) averages indicating there may be more poverty related food security issues in the target population.¹⁴

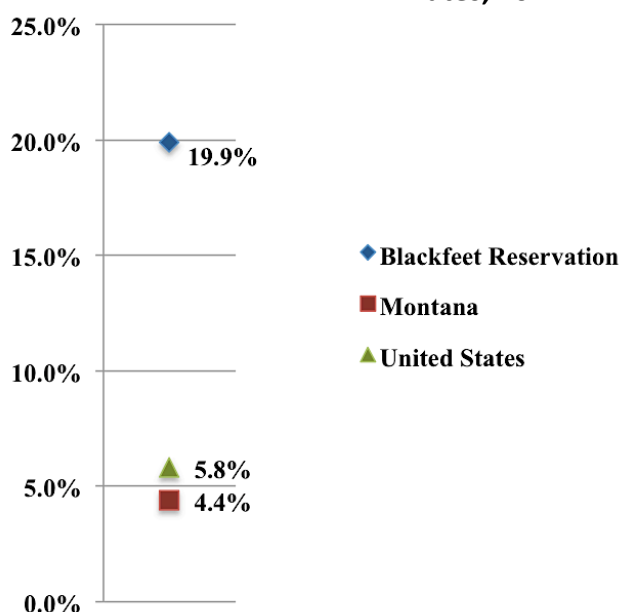


Source: US Census Bureau, 2010-2014 American Community Survey 5-Year

Similarly to the higher poverty rates recognized above, the Supplemental Nutrition Assistance Program (SNAP) participation rates (27.4%) on the Blackfeet Reservation were more than double both the state (10.8%) and national rates (13.0%).¹⁴ This may have indicated that more households on the reservation depended on federal food assistance programs to meet their monthly food needs when compared to other populations.

Although education does not guarantee protection from hunger and poverty, education often influences employment opportunities and income potential. The population 18 years and older on the Blackfeet Reservation had a lower educational attainment rate (high school or higher) at 84.6% when compared to the state rate of 92.4% and 86.3% nationally.¹⁴ Often related to educational attainment, the unemployment rate on the Blackfeet Reservation was 4.5 times higher than the state of Montana as shown in Chart 5.¹⁴ This may indicate a greater reliance on local and federal food assistance programs to feed the Blackfeet Reservation is much higher than in the other populations.

Chart 5: Comparison of US, Montana, and Blackfeet Reservation Unemployment Rates, 2014¹⁴

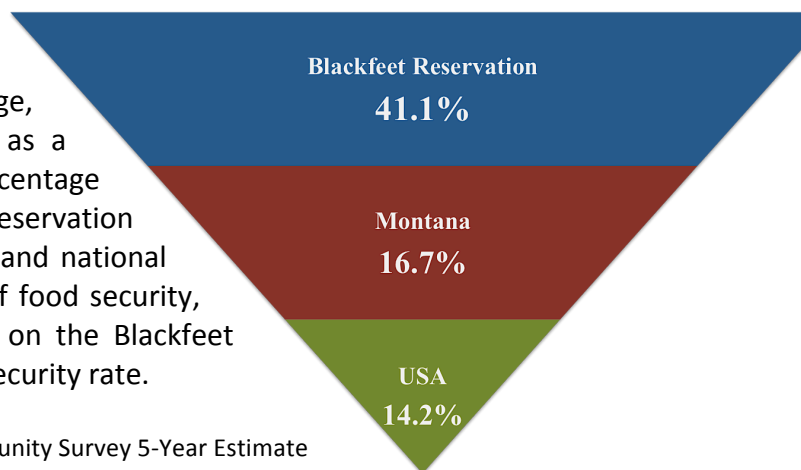


Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimate

Figure 5: US, Montana, and Blackfeet Reservation Comparison Rates of Individuals without Health Care Coverage, 2014¹⁴

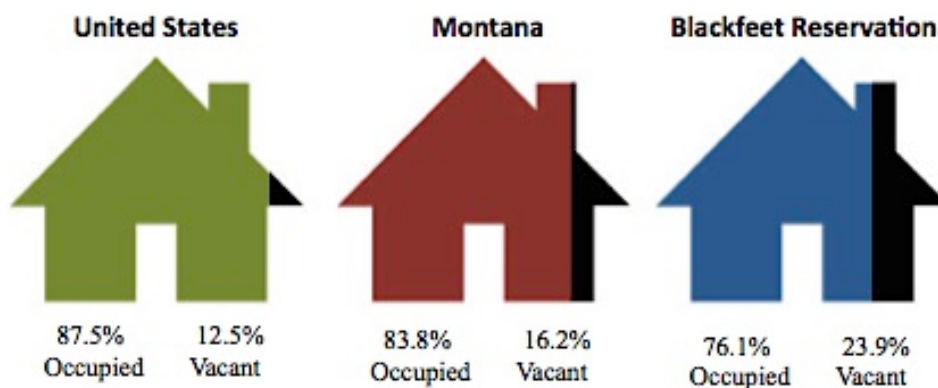
Other indicators such as health care coverage, independent of income, have been shown as a reliable determinant of food security. The percentage of uninsured individuals on the Blackfeet Reservation was almost 2.5 times that of both the state and national rates as seen in Figure 5.¹⁴ As an indicator of food security, this higher percentage of uninsured people on the Blackfeet Reservation may also reflect a higher food insecurity rate.

Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimate



Often used as an economic indicator, housing occupancy and vacancy rates can gauge the economic climate of an area. Higher vacancy rates commonly signify a lesser economic environment that in turn affects community food security. In Figure 6 below, the percentage of vacant housing units on the Blackfeet Reservation was higher at 23.9% than both comparison populations.¹⁴ This data may indicate a poor economic climate with tighter budgets and less funds to meet household food needs.

Figure 6: Comparison of US, Montana, and Blackfeet Reservation Housing Occupancy and Vacancy Rates, 2014¹⁴



Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimates

Health Related Data

Food insecurity is associated with poor health outcomes including obesity,⁹ metabolic issues,⁸ and chronic diseases.^{6,7} Moreover, food insecure diabetic patients have been shown to have poor blood sugar control and more doctor visits when compared to their food secure counterparts.^{16,17} There is also evidence that people in food insecure homes are more likely to experience issues related to mental health,^{18,19} alcohol use,²⁰ and cigarette smoking.²¹ Investigating the health climate of a population may reflect possible issues related to food

access, availability, and sustainability and help to understand the community food security status.

The following health related data from the County Health Rankings were collected by the University of Wisconsin Population Health Institute and funded through the Robert Wood Johnson Foundation.²² Table 1 below, compared various health outcome data regarding the population living in Glacier County, the state of Montana, and the Top US Performers. Top US Performers have been defined as the 90th percentile for the nation with only 10% of the population above this value.²² Public health related data specific to the population on the Blackfeet Reservation were not available; therefore, Glacier County data were used for best available estimates. The data reflecting the poorest value in each health category from the three comparison populations were presented in white text in Tables 1 and 2 below.

Premature death prevalence, defined as the years of potential life lost before the age of 75 per 100,000 people (age-adjusted), was more than double in Glacier County (15,100) when compared to Montana (7,300) and the Top US Performers (5,200). Additionally, quality of life measurements including poor or fair health (percentage of adults reporting this condition), poor physical health days and poor mental health days (average number in past 30 days) were higher in the Glacier County population. Low birth weight (LBW), the percentage of live births with LBW <2500 grams, was higher in the target population at 8% compared to the state at 7% and the Top US Performers at 6%. Additionally, child mortality rates, the number of deaths among children under 18 per 100,000, were higher in Glacier County at a value of 120. Lastly, diabetes prevalence in the target population was much higher at 14% when compared to the 9% rates found at both the state and national levels.²²

Table 1: Comparison of US, Montana, and Glacier County, MT Health Outcomes Including: Premature Death, Quality of Life, LBW, Child Mortality, and Diabetes Prevalence, 2016²²

<i>Health Outcomes</i>	<i>Geographic Area</i>		
	Glacier County, MT	Montana	Top US Performers*
Premature death	15,100	7,300	5,200
Quality of Life: Poor or fair health	22%	14%	12%
Quality of Life: Poor physical days	5.2	3.9	2.9
Quality of Life: Poor mental health days	4.6	3.4	2.8
LBW	8%	7%	6%
Child mortality	120	60	40
Diabetes prevalence	14%	9%	9%

Source: University of Wisconsin Population Health Institute. County Health Rankings 2016. Accessible at www.countyhealthrankings.org. Published 2016. Accessed May 15, 2016.

Below various health factors results, shown in Table 2, described the target population, state, and the Top US Performers.²² Adult smoking rates, alcohol related driving deaths, and sexually transmitted infections were all higher in Glacier County when compared to the state and Top US Performers; however, the rate of excessive drinking (percentage of adults reporting binge or heavy drinking) was higher in Montana (21%) than in the target population (18%).²² Glacier County adult obesity (34%) and physical inactivity (30%) rates were higher than both state and Top US Performers, while only 26% of people reported access to exercise opportunities in the target population compared to 67% in Montana.²²

The food environment index (FEI), scaled from 0 (worst) to 10 (best), is a set of factors contributing to a healthy food environment. Glacier County reported a FEI of 5.5, which was lower than Montana (7.2) and Top US Performers (8.3). Related to the FEI, limited access to healthy foods, defined as a percentage of population who do not live close to an adequate grocery store, was higher at 10% in the target population when compared to the state (9%) and Top US Performers (2%).²²

Table 2 also showed that Glacier County teen births, the number of births per 1,000 females aged 15-19, were more than double that of Montana and 4 times that of Top US Performers.²² Lastly, insufficient sleep, those who reported <7 hours on average, was higher at 34% in Glacier County relative to the other populations.²² Overall, the health related data indicated that the Glacier County population were experiencing poorer health related outcomes compared to the other populations which may indicate increased food security related issues.

Table 2: Comparison of US, Montana, and Glacier County, MT Health Factors Including: Smoking, Obesity, FEI, Physical Inactivity, Exercise Opportunities, Excessive Drinking, Alcohol Related Accidents, Sexually Transmitted Infections, Teen births, Healthy Food Access, and Sleep, 2016²²

<i>Health Factors</i>	<i>Geographic Area</i>		
	Glacier County, MT	Montana	Top US Performers*
Adult smoking	31%	20%	14%
Adult obesity	34%	25%	25%
FEI	5.5	7.2	8.3
Physical inactivity	30%	22%	20%
Access to exercise opportunities	26%	67%	91%
Excessive drinking	18%	21%	12%
Alcohol-impaired driving deaths	60%	47%	14%
Sexually transmitted infections	1,196.10	379.8	134.1
Teen births	78	33	19

Limited access to healthy foods	10%	9%	2%
Insufficient sleep	34%	30%	28%

Source: University of Wisconsin Population Health Institute. County Health Rankings 2016. Accessible at www.countyhealthrankings.org. Published 2016. Accessed May 15, 2016.

Food Resource Assessment

Methodology

The profile of community food resources was developed through a series of key informant interviews with program directors and retail managers at each of the establishments discussed in Tables 3-4 and Figure 7 below. The information included profiles of the Federal food assistance, retail food outlets, and emergency food resources available on the Blackfeet Reservation.

Federal Food Assistance Resources

The USDA spends billions annually to fund food assistance programs all over the country for low-income people. The Federal food assistance programs are delivered through the local community infrastructure in order to effectively reach those in need. Table 3 below described the 8 Federal food assistance programs, locations, participation rates, and contacts available on the Blackfeet Reservation at the time of data collection.

Table 3: Federal Food Assistance Programs Available on Blackfeet Reservation, July 2016

Program	Description	Location(s)	Participation Rates	Contact
Supplemental Nutrition Assistance Program (SNAP)	SNAP is a federal entitlement program, formerly known as food stamps, is a federal nutrition program that helps low income individuals purchase foods at grocery stores, convenience stores, and some farmers markets and co-op food programs and provides nutrition education.	121 First Avenue NW Browning, MT 59417 <u>Hours of Operation:</u> Monday-Friday 8:00AM-5:00PM	In 2014, 27.4% of households on Blackfeet Reservation participated in SNAP ¹³ Browning Field Office estimated that they serve ~3000 families through the SNAP program monthly	Browning Field Office 121 First Avenue NW Browning MT 59417 (406) 338-5131 hhshcsopaglacier@mt.gov
National School Lunch Program (NSLP)	NSLP is a federally assisted meal program operating in public and nonprofit private schools and residential child care institutions. It provides nutritionally	Browning District Child Nutrition Program serves 8 schools on Blackfeet Reservation: <i>Browning Elementary</i> 112 1st St Ave SW Browning, MT 59417	Total NSLP Meals Served from Sept 2015-April 2016 by Browning District: 239,842	Browning District Child Nutrition Program Lynne Kennan Child Nutrition Director (406) 338-7952 lynnek@bps.k12.mt.us

	<p>balanced, low-cost or free lunches to children each school day.</p> <p>The schools located on the Blackfeet Reservation have Community Eligibility Provision (CEP). CEP through the Healthy, Hunger-Free Kids Act of 2010, allows schools with high poverty rates to provide free meals to all students.</p>	<p><i>Napi Elementary</i> 124 1st Ave SE Browning, MT 59417</p> <p><i>Vina Chattin Elementary</i> 312 1st Ave SW Browning, MT 59417</p> <p><i>KW Bergan Elementary</i> 212 1st Ave SW Browning, MT 59417</p> <p><i>Browning Middle School</i> 900 S Piegan St. Browning, MT 59417</p> <p><i>Browning High School</i> 105 US-89 Browning, MT 59417</p> <p><i>De La Salle Blackfeet School</i> 104 1st St NW Browning, MT 59417</p> <p><i>Blackfeet Learning Academy</i> 132 2nd Ave SW Browning, MT 59417</p> <p>Heart Butte District Child Nutrition Program serves 2 schools on Blackfeet Reservation:</p> <p><i>Heart Butte Elementary</i> 1 School Rd. Heart Butte, MT 59448</p> <p><i>Heart Butte High School</i> 1 School Rd. Heart Butte, MT 59448</p> <p>*Other schools on Blackfeet Reservation including <i>East Glacier Park Grade School (EGPGS)</i> in East Glacier Park Village and <i>Cutswood School</i> (25-30 students) in Browning serve meals independent from District food service programs.</p>	<p>Total NSLP Meals Served from Aug 2015-May 2016 by Heart Butte District: 26,424</p> <p>Total NSLP Meals Served from Sept 2015-May 2016 by EGPGS: 7,228</p>	<p>Heart Butte District Child Nutrition Program Tammy Dusty Bull Food Service Manager (406) 338-2200</p> <p>EGPGS Child Nutrition Program Andrea DeCarlo Food Service Manager (406) 226-5543</p>
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School Breakfast Program (SBP)	<p>SBP provides federally subsidized breakfasts to children at schools and child care facilities in the United States.</p> <p>The schools located on the Blackfeet Reservation have Community Eligibility Provision (CEP). CEP through the Healthy, Hunger-Free Kids Act of 2010, allows schools with high poverty rates to provide free meals to all students.</p>	<p>Browning District Child Nutrition Program serves 8 schools on Blackfeet Reservation:</p> <p><i>Browning Elementary</i> 112 1st St Ave SW Browning, MT 59417</p> <p><i>Napi Elementary</i> 124 1st Ave SE Browning, MT 59417</p> <p><i>Vina Chattin Elementary</i> 312 1st Ave SW Browning, MT 59417</p> <p><i>KW Bergan Elementary</i> 212 1st Ave SW Browning, MT 59417</p> <p><i>Browning Middle School</i> 900 S Piegan St. Browning, MT 59417</p> <p><i>Browning High School</i> 105 US-89 Browning, MT 59417</p> <p><i>De La Salle Blackfeet School</i> 104 1st St NW Browning, MT 59417</p> <p><i>Blackfeet Learning Academy</i> 132 2nd Ave SW Browning, MT 59417</p>	<p>Total SBP Meals Served from Sept 2015-April 2016 by Browning District: 106,066</p>	<p>Browning District Child Nutrition Program Lynne Kennan Child Nutrition Director (406) 338-7952 lynnek@bps.k12.mt.us</p>
		<p>Heart Butte District Child Nutrition Program serves 2 schools on Blackfeet Reservation:</p> <p><i>Heart Butte Elementary</i> 1 School Rd. Heart Butte, MT 59448</p> <p><i>Heart Butte High School</i> 1 School Rd. Heart Butte, MT 59448</p>	<p>Total SBP Meals Served from Aug 2015-May 2016 by Heart Butte District: 19,382</p>	<p>Heart Butte District Child Nutrition Program Tammy Dusty Bull Food Service Manager (406) 338-2200</p>
		<p>*Other schools on Blackfeet Reservation including EGPGS in East Glacier Park Village</p>	<p>Total SBP Meals Served from Sept 2015-May 2016</p>	<p>EGPGS Child Nutrition Program Andrea DeCarlo</p>

		and <i>Cutswood School</i> (25-30 students) in Browning serve meals independent from District food service programs.	by EGP GS: 4,705	Food Service Manager (406) 226-5543
Child and Adult Care Food Program (CACFP)	CACFP is a federal assistance program that provides a subsidized food service for children, elderly or mentally or physically impaired adults in non-residential, day-care settings. On the Blackfeet Reservation CACFP reimburses for meals served at Head Start, Early Head Start, senior citizen centers, and after school dinner programs at in both Browning and Heart Butte School Districts.	<p>Head Start Locations (7)</p> <p>1) Blackfeet Early Childhood Center Head Start 615 S Piegan St. Browning, MT 59417</p> <p>2) Blackfeet Early Childhood Center Early Head Start 615 S Piegan St. Browning, MT 59417</p> <p>3) Starr School Head Start 6 Old School Rd Browning, MT 59417</p> <p>4) East Glacier Head Start 602 Rita St. East Glacier Park Village, MT 59434</p> <p>5) Heart Butte Head Start 10 Sweat Lodge Drive Heart Butte, MT 59448</p> <p>6) Seville Head Start 39 Golf Course Rd. Cut Bank, MT 59427</p> <p>7) Babb/St. Mary Head Start 4065 US-Hwy 89 Babb, MT 59411</p> <p>Senior Center Locations</p> <p><i>Browning Eagle Shields</i> 603 Popimi St. Browning, MT 59417</p> <p><i>Heart Butte Senior Citizens</i> Old Government Square Heart Butte, MT 59448</p>	<p>Total Head Start meals served from Sept 2015-May 2016 (9 months): 114,554</p> <p><i>Breakfast</i> 39,921 meals</p> <p><i>Lunch</i> 40,109 meals</p> <p><i>Snack</i> 34,524 meals</p> <p>Approximately 220 lunches served daily by Browning Eagle Shields</p> <p>Approximately 80 lunches served daily by Heart Butte Senior Citizens</p>	<p>Head Start Jackie Gilham Head Start Nutrition Manager (406) 338-7370 jackiem@inaksim.com</p> <p>Senior Centers Browning Eagle Shields Maria Wagner Food Service Manager (406) 338-7257</p> <p>Heart Butte Senior Citizens Kathy Rutherford Food Service Manager (406) 338-2222</p>

		<p>After School Meal Programs</p> <p><u>Browning District</u> (offered in summer months only) <i>KW Bergan Elementary</i> 212 1st Ave SW Browning, MT 59417</p> <p><i>Napi Elementary</i> 124 1st Ave SE Browning, MT 59417</p> <p><u>Heart Butte District</u> <i>Heart Butte Elementary</i> 1 School Rd. Heart Butte, MT 59448</p> <p>*Other schools on Blackfeet Reservation including <i>EGPGS</i> in East Glacier Park Village and <i>Cutswood School</i> (25-30 students) in Browning serve meals independent from District food service programs.</p>	<p>Total after school program meals served from June 2015-August 2015 by Browning District: 18,528</p> <p>Total after school program meals served from August 2015-May 2016 by Heart Butte District: 12,740</p> <p>Total after school program meals served from Sept 2015-May 2016 by EGP GS: 1,169 student snacks and 1,326 adults meals (breakfast and lunch)</p>	<p>Browning District Child Nutrition Program Lynne Kennan Child Nutrition Director (406) 338-7952 lynnek@bps.k12.mt.us</p> <p>Heart Butte District Child Nutrition Program Tammy Dusty Bull Food Service Manager (406) 338-2200</p> <p>EGPGS Child Nutrition Program Andrea DeCarlo Food Service Manager (406) 226-5543</p>
		<p>6 Old Person Street Browning, MT 59417</p> <p><u>Hours of Operation:</u> Monday-Friday 7:30AM-5PM</p>	<p>An average of 761 WIC participants served at this location monthly in 2015</p>	<p>Dorothy Champine WIC Manager (406) 338-5311</p>
<p>Special Supplemental Nutrition Program for Women, Infants, and Children (WIC)</p>	<p>WIC is a federal assistance program for healthcare and nutrition of low-income pregnant women, breastfeeding women, and infants and children under the age of five.</p> <p>Individuals enrolled as a member of the Blackfeet Tribe can provide a self reported income. All others must provide written proof of income upon enrollment/reenrollment.</p>			






Summer Food Service Program (SFSP)	<p>SFSP provides kids and teens in low-income areas free meals when school is out.</p> <p>The schools located on the Blackfeet Reservation have Community Eligibility Provision (CEP). CEP through the Healthy, Hunger-Free Kids Act of 2010, allows schools with high poverty rates to provide free meals to all students.</p>	<p><u>Browning District</u> Monday-Friday</p> <p><i>Breakfast</i> Napi Elementary: 8-11AM Browning Middle: 8-11AM</p> <p><i>Lunch</i> Napi Elementary: 11-3:30PM Browning Middle: 11-4PM Babb Elementary: 12-12:30PM East Glacier Park Elementary: 12-1PM</p> <p><i>Mobile Lunch Sites</i> Old Low Rent: 11-11:30AM Low Rent: 11:45-12:15PM Sinclair Drive: 12:30-1PM Starr School: 1:15-1:45PM New Blackfeet Homes: 11-12PM Skate Park: 12:15-2:30PM</p> <p><i>Supper 3:30-6PM</i> KW Bergan Elementary</p>	<p>Total SFSP Meals Served in Summer 2015 by Browning District: 35,229</p> <p><i>Breakfast</i> 3,603 meals</p> <p><i>Lunch</i> 20,297 meals</p> <p><i>Supper</i> 9,429 meals</p> <p><i>PM Snack</i> 1,900 meals</p>	<p>Browning District Child Nutrition Program Lynne Kennan Child Nutrition Director (406) 338-7952 lynnek@bps.k12.mt.us</p>
		<p><u>Heart Butte District</u> Monday-Friday</p> <p>Heart Butte Elementary:</p> <p><i>Breakfast</i> 7:30-9:00AM (Hot) 9:00-10:00AM (Cold)</p> <p><i>Lunch</i> 11:30AM-1:00PM</p>	<p>Total SFSP Meals Served in Summer 2015 by Heart Butte District: 4,277</p> <p><i>Breakfast</i> 684 meals</p> <p><i>Lunch</i> 3,593 meals</p>	<p>Heart Butte District Child Nutrition Program Tammy Dusty Bull Food Service Manager (406) 338-2200</p>
BackPack Program	Feeding America's BackPack Program helps offers children nutritious and easy-to-prepare food to take home and eat on the weekends.	Distributed at Browning District schools on Friday afternoons.	Approximately 80 BackPacks are distributed weekly through the Browning District Child Nutrition Program	Browning District Child Nutrition Program Lynne Kennan Child Nutrition Director (406) 338-7952 lynnek@bps.k12.mt.us
Food Distribution Program on Indian Reservations (FDPIR)	FDPIR is a federal program that provides foods to agencies based on their orders from a list of available commodity foods. These	<p>Blackfeet Commodity Warehouse E Boundary St Browning, MT 59417</p> <p>Hours of Operation: Monday-Friday</p>	<p>Approximately 220 households participate every month.</p> <p>Blackfeet FDPIR delivers to</p>	<p>Delores Matson Commodities Warehouse Acting Director (406) 338-7340 blkftfdp@yahoo.com</p>

	<p>administering agencies store and distribute the food, determine applicant eligibility, and provide nutrition education to recipients.</p> <p>Participants can be made eligible for 3, 6, or 12 months; however, if there is no household income, enrollment eligibility is must be done every month. Participants must live on the Blackfeet Reservation to enroll. Households cannot participate in both SNAP and FDPIR in the same month.</p>	<p>8:00AM-4:30PM (Closed the last business day of every month for inventory)</p>	<p>approximately 90 elderly and housebound households in Heart Butte, Babb, Cut Bank/Seville, East Glacier, and Browning.</p>	
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Retail Resources for Food Purchases

Access to food retail resources such as supermarkets, grocery and convenience stores, farmers markets, and other retail spaces can impact the quality and affordability of a community's food. The number of retail food resources that accept WIC and SNAP is especially important for the low-income households on the Blackfeet Reservation. As seen in Table 4 below, there were 4 grocery stores, 8 convenience stores (3 only open seasonally), and 1 food co-op on the Blackfeet Reservation at the time of data collection. Only 2 retail locations, both located in Browning, accepted WIC benefits. Anecdotal data collected through key informant interviews with managers yielded evidence that many convenience stores previously accepted WIC, but due to past difficulties with state WIC regulations, managers felt it was not worth their time to continue accepting WIC vouchers. Since many residents of the Blackfeet Reservation do not live near a site that accepts WIC benefits, many qualified families may not be utilizing this Federal food assistance resource. This may warrant future communication or trainings with state WIC program representatives to reestablish contracts at the smaller retail locations located on the Blackfeet Reservation.

Table 4: Consumer Food Retail Resources Available on Blackfeet Reservation, July 2016

Name of Business	Type	Location	Accepts SNAP	Accepts WIC
Glacier Family Foods	Grocery	601 SE Boundary St Browning, MT 59417		
Teeple's IGA	Grocery	209 W Central Ave Browning, MT 59417		
Town Pump	Convenience	304 SE Boundary St Browning, MT 59417		No

Conoco	Convenience	330 Central Ave W Browning, MT 59417		No
Glacier Way Convenience Store	Convenience	200 State Hwy 464 Browning, MT 59417		No
Park Café & Grocery	Convenience	3147 US Hwy 89 St. Mary, MT 59417	No	No
St. Mary Supermarket	Grocery	US-89 St. Mary, MT 59411		No
St. Mary Convenience Store	Convenience	3 Going-To-The-Sun Rd St. Mary, MT 59417	No	No
Glacier Park Trading Co	Grocery	316 US-2 East Glacier Park, MT 59434		No
Bear Track Travel Center	Convenience	20958 US-2 East Glacier Park, MT 59434		No
Thronson's General Store	Convenience	4013 US-89 Babb, MT 59411	No	No
Heart Butte Trading Post	Convenience	12 Wild Gun Dr Heart Butte, MT 59448		No
Bountiful Baskets	Food Co-op	Browning UMC Annex 108 2nd St NW Browning, MT 59417	No	No

Emergency Food Resources

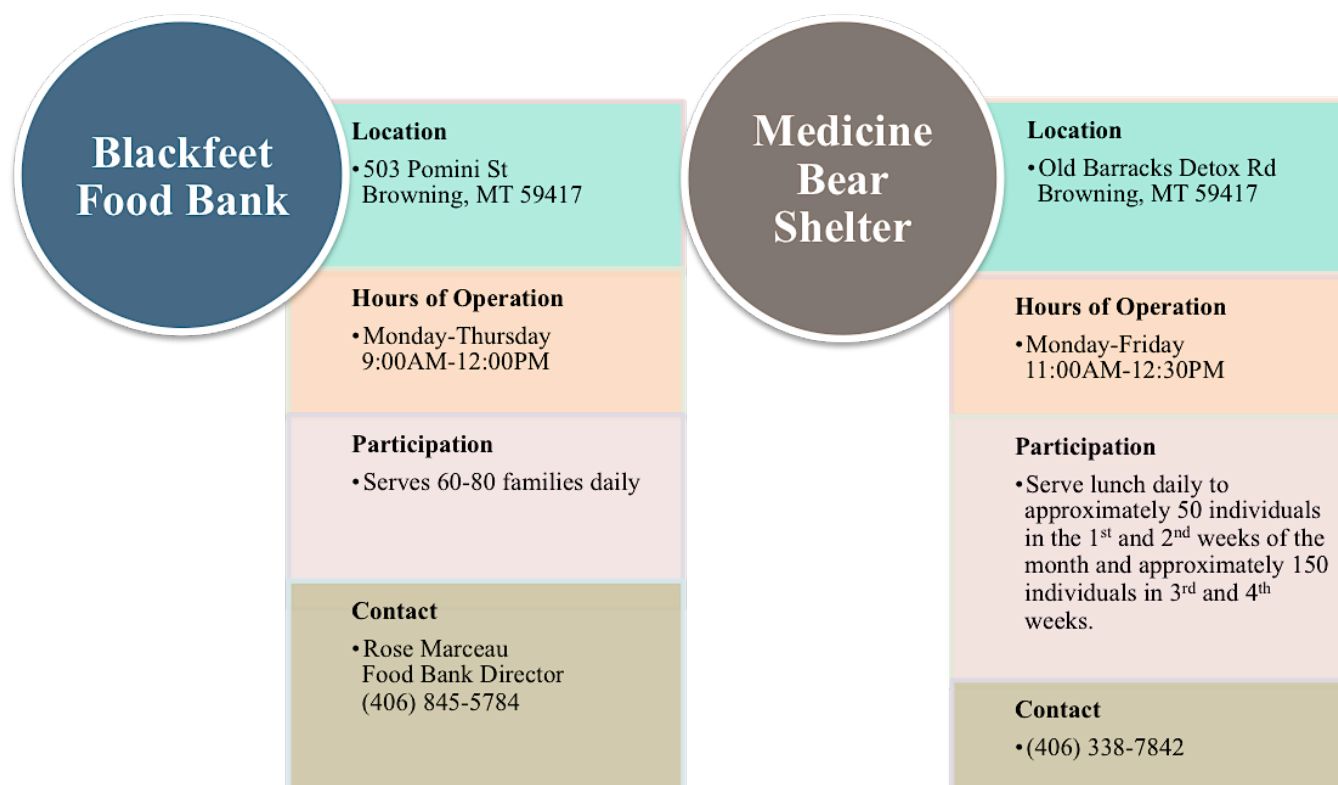
There were 2 locations on the Blackfeet Reservation that provide emergency food assistance at time of data collection. There was only 1 food bank and 1 soup kitchen (serving lunches only), both located in Browning. Many families living outside of Browning may be missing these emergency food resource opportunities due to distance from their homes.

As shown in Figure 7, the Medicine Bear Shelter estimated that they serve 3 times more people in the last 2 weeks of the month compared to the first 2 weeks. Employees stated that this change in participation rates might be correlated with TANF (Temporary Assistance for Needy Families) assistance distribution. In the beginning of the month, when TANF is allocated, fewer people may find themselves in need of immediate food assistance. This anecdotal data may reflect a need for food budget management education in the Blackfeet Reservation community.

The Blackfeet Food Bank is supplied with food donations from 3 partnering organizations throughout the month. Nourish the Flathead delivers food every other week, Montana Food Bank Network delivers every 4-6 weeks, and American Indian Relief Council delivers food donation one time per month. Despite the donations from these agencies, the Blackfeet Food Bank Director, Rose Marceau expressed that most weeks, the food runs out and she has to turn down patrons. Although community members are supposed to request food bank donations only one time per month, Ms. Marceau said that many patrons visit the Blackfeet Food Bank daily. Ms. Marceau stated that she serves residents from all parts of the Blackfeet Reservation. Patrons from Seville, Babb, and Heart Butte are traveling long distances for this emergency food resource. This evidence including insufficient food supply to meet demands and the distance traveled by various patrons to the Blackfeet Food Bank may warrant additional funding to increase inventory and possibly expand through mobile sites to reach the remote areas of the

reservation.

Figure 7: Emergency Food Resources Available on Blackfeet Reservation, July 2016



Food Security Assessment

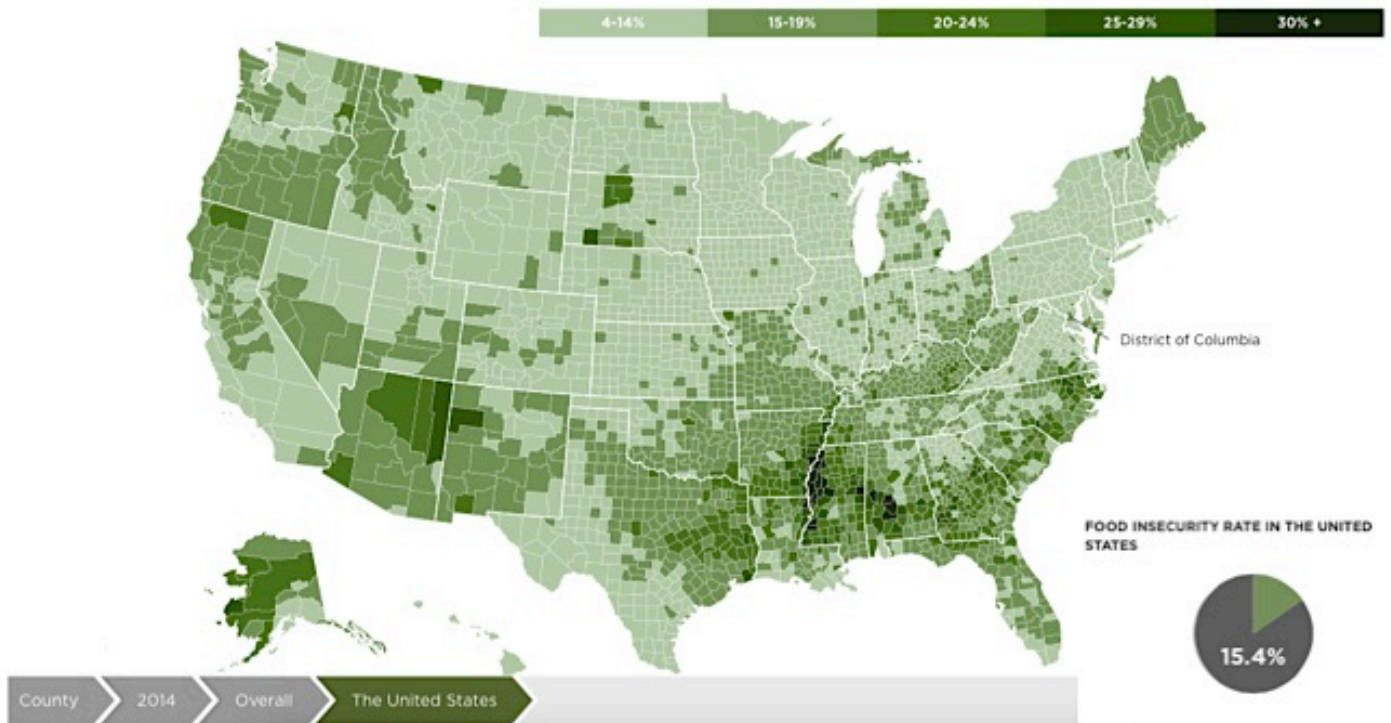
Individual Food Security Rates on Blackfeet Reservation

The following section described food security data collected by Feeding America, which is the country's largest organization focusing on domestic hunger issues. The food insecurity rates shown in *Map the Meal Gap 2016* used data from the 2011-2014 Current Population Survey on food insecure households, the 2014 American Community Survey on poverty, incomes, and racial and ethnic demographics, and the 2014 Bureau of Labor Statistics on unemployment rates.

The *Map the Meal Gap 2016* methodology for collecting food insecurity rates included analyzing the relationship between indicators of food insecurity such as poverty estimates, unemployment rates, homeownership, etc. at the state level. Then coefficient estimates at the county level were used to generate estimated food insecurity rates for individuals in every county in the United States. As shown in Figure 8 below, the national food insecurity rate was estimated at 15.1% in 2014.²³ This rate was higher than the overall estimated food insecurity rate of 13.6% in the state of Montana expressed in Figure 9. However, Figure 10 showed that Glacier County, which included most of the target population living on the Blackfeet

Reservation, had an estimated food insecurity rate of 21.0%, which was higher than both the state and national estimates.²³

Figure 8: United States Food Insecurity Rates, 2014²³



Source: Feeding America. Food Insecurity in The United States 2014. Feeding America website. <http://map.feedingamerica.org/county/2014/overall>. Accessed May 15, 2016.

Figure 9: Montana Food Insecurity Rates, 2014²³

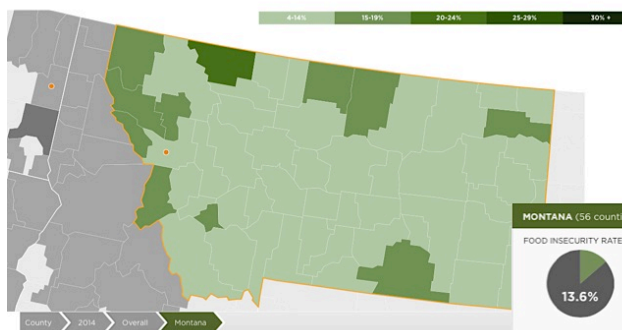
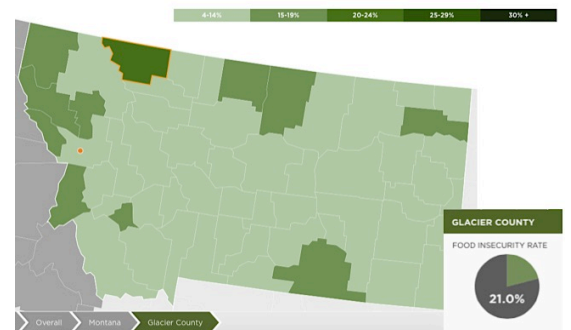


Figure 10: Glacier County, MT Food Insecurity Rates, 2014²³

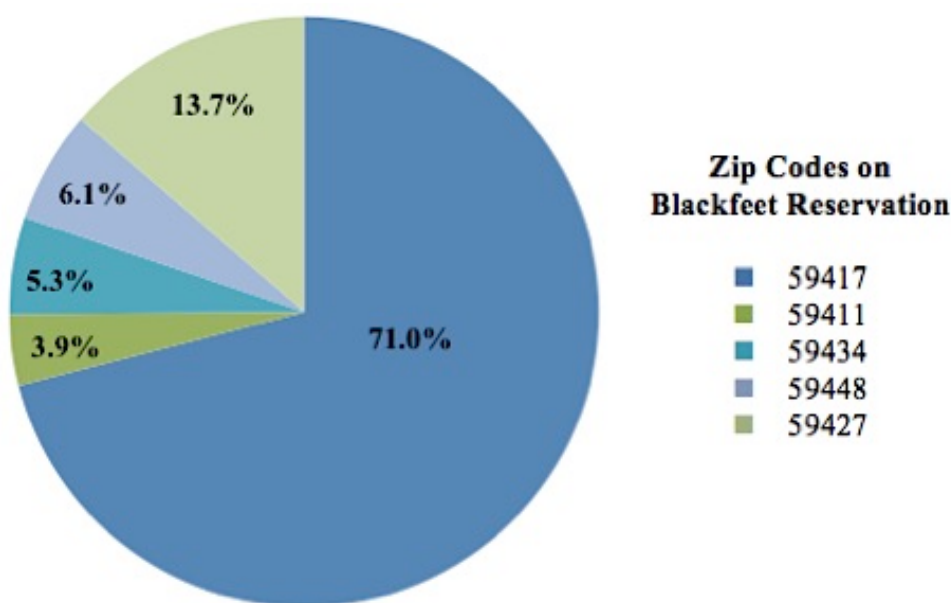


Source: Feeding America. Food Insecurity in The United States 2014. Feeding America website. <http://map.feedingamerica.org/county/2014/overall>. Accessed May 15, 2016.

Blackfeet Reservation Household Food Security Methodology

In addition to the publically available data, the CFSa team gathered primary data on household food security via survey (Appendix A). The Six-Item Food Security Scale,²⁴ developed by the National Center for Health Statistics and the Abt Associates Inc., was used to evaluate household food security status on the Blackfeet Reservation. Percentages in Chart 6 below were targeted to obtain a representative sample estimating the populations living in each major zip code on the Blackfeet Reservation. The sample target for survey participants was n=250. Calculated from the percentages in Chart 6, the target was for 178 completed surveys from 59417 (Browning/St. Mary) zip code; 34 from 59427 (Seville); 15 from 59448 (Heart Butte); 13 from 59434 (East Glacier); and 10 from 59411 (Babb).

Chart 6: Percent of Population Living on the Blackfeet Reservation by Zip Code, 2014¹⁴



Source: US Census Bureau, 2010-2014 American Community Survey 5-Year Estimate

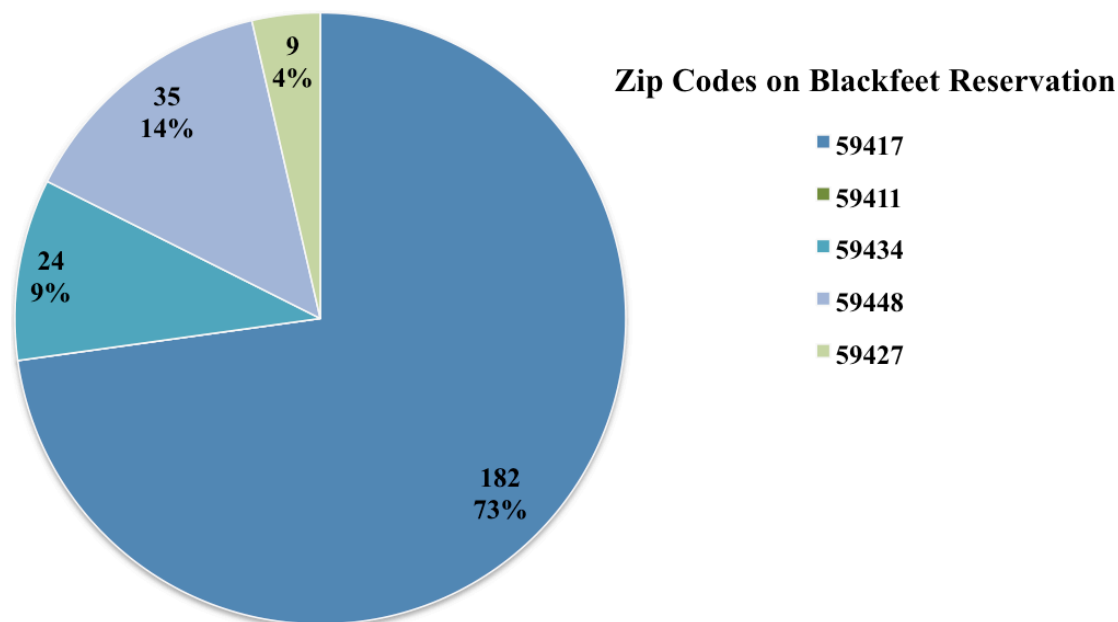
The US Household Food Security Survey Module: Six-Item Short Form Scoring Protocol (Appendix B) was used to analyze collected survey data. The sum of affirmative responses to the 6 questions was the household's raw score on the scale. The food security status of households with a raw score 0-1 were deemed food secure and those with a raw score 2-6 were deemed food insecure.

Blackfeet Reservation Community Food Security Status

A total of 250 surveys were collected from June 20, 2016–July 19, 2016 including: 182 (72.8% of total) from 59417 (Browning/St. Mary) zip code; 0 (0% of total) from 59411 (Babb); 24 (9.6% of total) from 59434 (East Glacier); 35 (14.0% of total) from 59448 (Heart Butte); and 9 (3.6% of total) from 59427 (Seville) as displayed in Chart 7 below. The overall estimated food security raw score for the surveyed residents on the Blackfeet Reservation was 2.44 conveyed in Table 5. This score of 2.44 indicated that the average resident on the Blackfeet Reservation was food

insecure at the time of data collection. This signified that the average Blackfeet Reservation household lacked reliable access to safe, nutritious, and affordable foods at some time in the last 12 months from the period of survey collection.

Chart 7: Completed Surveys by Zip Code on the Blackfeet Reservation, Summer 2016



Out of the 4 major zip codes surveyed, the residents of 59448 zip code had the lowest food security status (2.63) while the residents of 59434 zip code reported the highest food security status (0.92). This data may indicate that future hunger related programming in the 59448 community is of highest priority, closely followed by the 59417 (2.62) and 59427 (2.11) communities. Furthermore, 139 of the 250 surveyed community members reported food security raw scores deemed food insecure. This number represented 56% of the households on the Blackfeet Reservation which is 4 times the national average (14%).³ In fact, only 31% (77/250) of surveyed households reported a food security score of 0 which indicates high food security. This indicated that 69% of households experienced some form of food insecurity in the last 12 months.

Table 5: Household Food Security Scores by Zip Code & Overall Blackfeet Reservation Score, July 2016

Zip Code	Food Security Raw Score
59448 (Heart Butte)	2.63
59417 (Browning/St. Mary)	2.62
59427 (Seville)	2.11
59434 (East Glacier)	0.92
59411 (Babb)	UA
Blackfeet Reservation Average	2.44

*Data not available for 59411 zip code

Lastly, data collection during the summer months may have had an effect on Blackfeet Reservation food security results. Summer gardening, farming, hunting, fishing, etc. practices may have increased food security during the month of collection. Additionally, ease of travel to off-reservation grocery stores in the summer may have increased the reported food security statuses. The CFSA team recommends replicating this food security survey in the winter months to gain a better year round food security status estimate for the Blackfeet Reservation.

Food Accessibility & Food Production Assessment

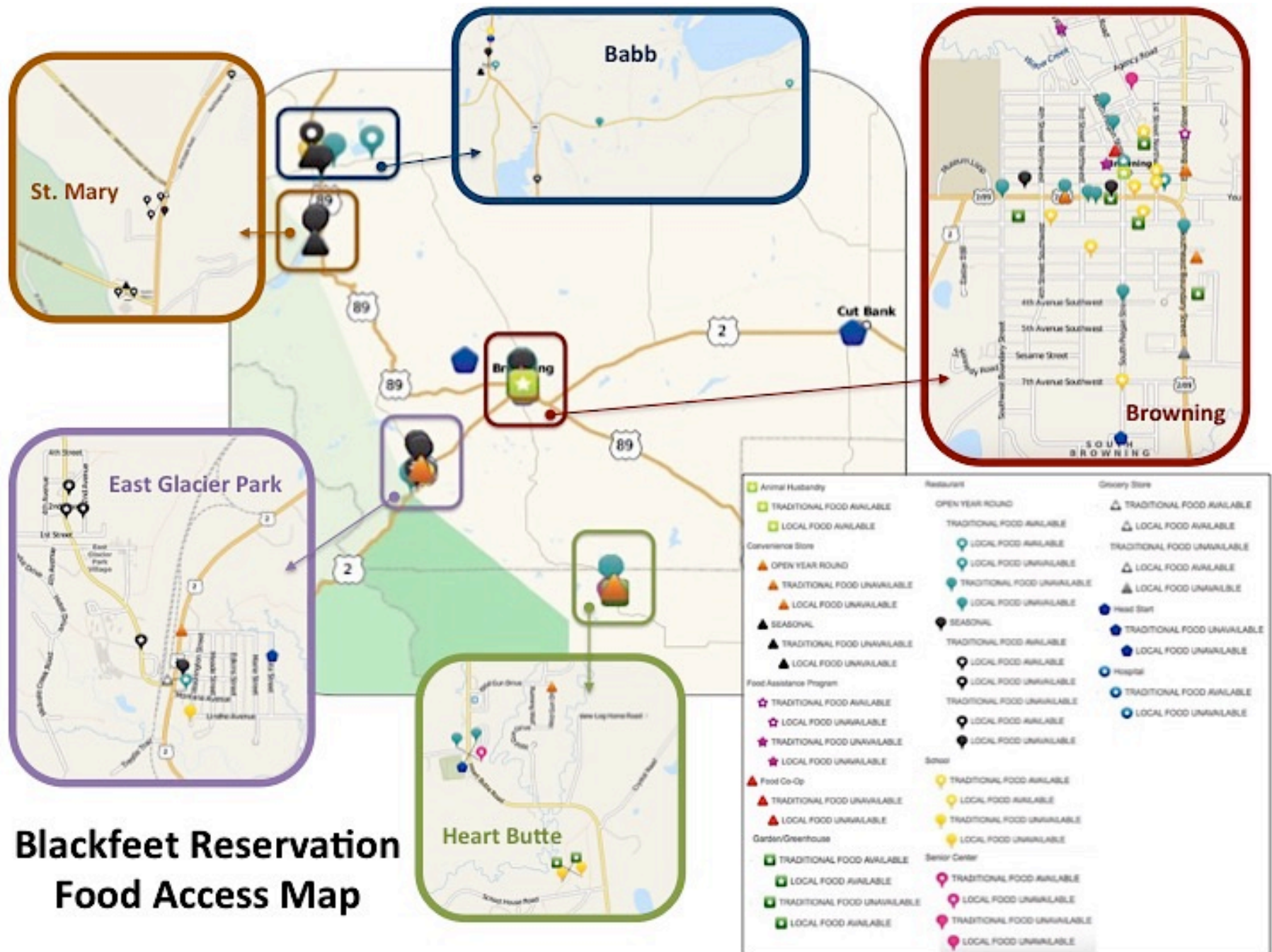
Methodology

The food accessibility and food production data were collected through a series of key informant interviews (both in person and by phone) with managers, directors, and community members of the Blackfeet Reservation. The following types of establishments that served, sold, or produced food on the Blackfeet Reservation were included in the food access map: restaurants, grocery and convenience stores, schools, Head Start programs, senior centers, food assistance programs, hospitals, food co-ops, gardens, greenhouses, and animal husbandry programs. Each establishment was assessed using the same set of questions regarding traditional and locally produced food accessibility on the Blackfeet Reservation (Appendix C). For the purpose of this assessment traditional Blackfeet foods were defined as foods that were part of the indigenous peoples' diet before contact with an outside culture. Culturally relevant foods, that were not considered traditional, were denoted with an asterisk (*) on the map. Additionally, for the purposes of this assessment, locally produced foods were defined as foods produced on or within 100 miles of the Blackfeet Reservation.

Blackfeet Reservation Food Access Map

The information from all participating establishments was compiled and is presented in the Blackfeet Reservation Food Access Map shown in Figure 11 on the next page. This information was made available through an interactive map at the following link: [Blackfeet Reservation Food Access Map](#).

Figure 11: Blackfeet Reservation Food Access Map, Summer 2016



The map included data from 86 establishments including: animal husbandry programs (1), convenience stores (7), food assistance programs (5), food co-op (1), gardens/greenhouses (7), grocery stores (4), Head Start programs (7), hospitals (1), restaurants (38), schools (13), and senior centers (2). Out of the 86 polled locations, 31 offer traditional Blackfeet food, 37 offer locally produced food, and 26 offer both traditional and local foods.

Anecdotal data collected through key informant interviews with managers yielded evidence that numerous establishments were interested in increasing both traditional and local food availability; however, most stated that there was a lack of resources available to do this. Moreover, 21/37 establishments that offered locally produced foods purchased produced from the Hutterite Colony. This data may warrant future economic opportunities for the Blackfeet Reservation residents via local production of traditional Blackfeet foods. Contacting the Hutterite Colony about conducting farming and gardening trainings for Blackfeet Reservation residents may be a potential step to seize this economic opportunity.

Seasonal establishments were denoted with a black icon on the map. Of the 38 polled restaurants, 18 were open only seasonally. Additionally, 2 of the 7 polled convenience stores were seasonal establishments. This data indicated that food access on the Blackfeet Reservation might be even lower in the winter months especially for residents living in Babb, St. Mary, and East Glacier, where 18/20 seasonal establishments are located.

Furthermore, the results from the Blackfeet Reservation Food Access Map showed that all emergency and federal food assistance programs available on the Blackfeet Reservation were located in Browning, which is far from many outlying areas of the reservation. People living in the outlying areas, such as Heart Butte and Babb, may not be utilizing these food resources due to transportation related issues. This may warrant funding for additional emergency food programming, such as food banks, in these remote areas of the Blackfeet Reservation.

Food Availability and Affordability Assessment

Methodology

The Nutrition Environment Measure Survey (NEMS) assessment tools are observational measures that assess availability, pricing, and quality of healthful foods at consumer food establishments. The NEMS Store Measure (NEMS-S)²⁵ uses 10 measurements of the store nutrition environment comparing healthy and less-healthy options of the following foods: milk, fruits, vegetables, ground beef, hot dogs, frozen dinners, baked foods, beverages (soda/juice), whole grain bread, and baked chips. According to the NEMS-S Scoring Protocol (Appendix D) a store can receive a score up to 50 points, with 50 being the highest. NEMS-S was used to assess 9 retail food outlets on the Blackfeet Reservation. There were 2 food retail outlets that were not included in the assessment (1 unavailable at time of assessment and 1 refusal). Although NEMS does have a separate Corner Store assessment tool, NEMS-S was used for all establishments of interest for comparison purposes. Blackfeet Reservation NEMS-S results were compared to the results of the nearest grocery store located off the reservation in Cut Bank, MT (Albertsons). Additionally, recorded prices of selected available products available at the

assessed stores on the Blackfeet Reservation were compared to similar product prices from items available at the off-reservation grocery store.

NEMS-S Results

Table 6 below depicted the NEMS-S assessment results of the retail food grocery and convenience stores on the Blackfeet Reservation. At the time of data collection, Albertsons, located off the reservation, earned the highest NEMS-S score of 36/50. This store was followed by Teeple's IGA (34/50) and Glacier Family Foods (21/50) from the list of assessed stores located on the Blackfeet Reservation. When compared to the closest off-reservation grocery store, the Blackfeet Reservation NEMS-S results were lower, indicating a poorer availability, quality, and pricing of healthful foods for Blackfeet Reservation residents. This may warrant funding to implement farmers market programs or community gardening initiatives to increase healthful food access to the target community.

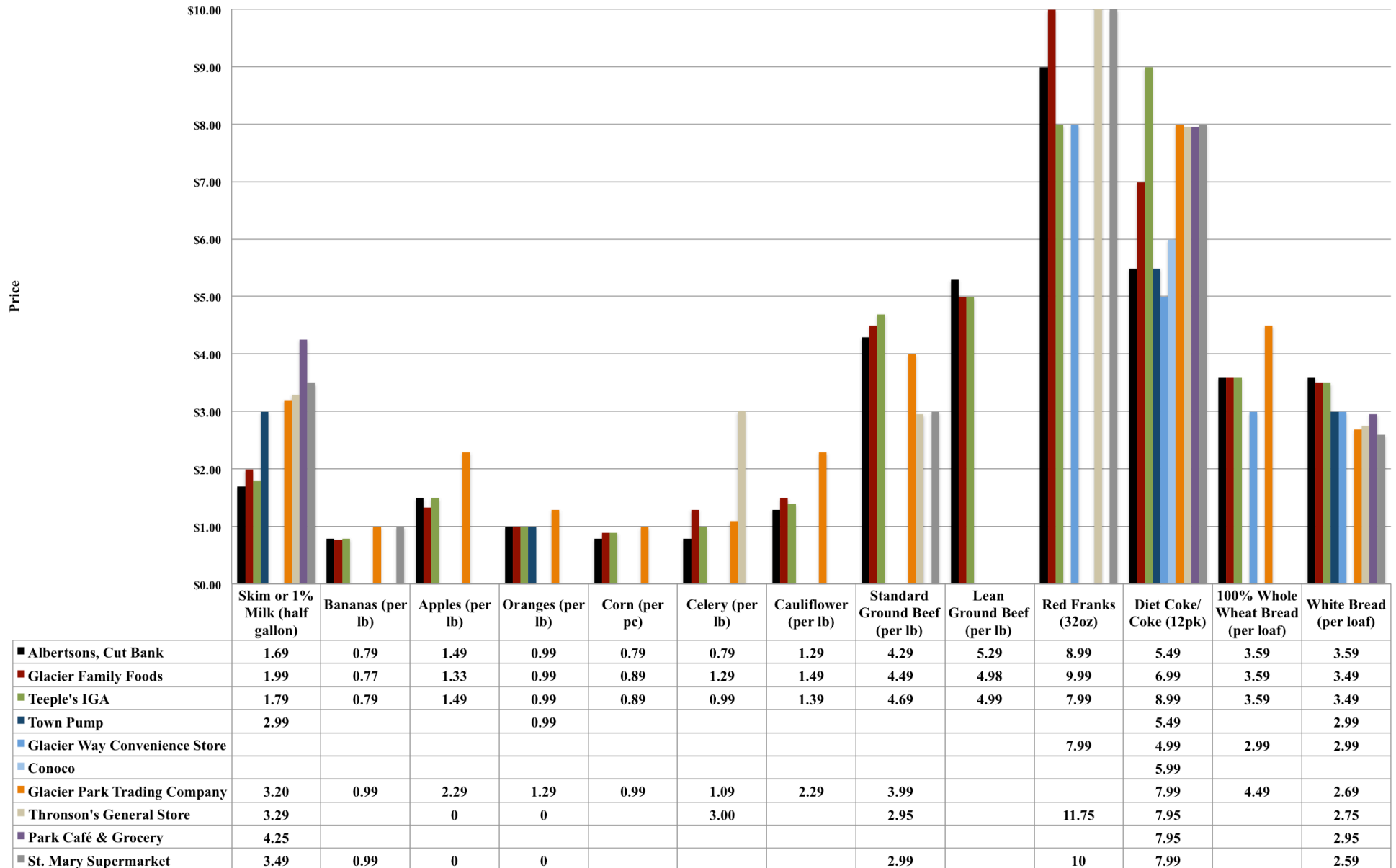
Table 6: Blackfeet Reservation NEMS-S Results, Summer 2016

Store	Location	Score (out of 50)
Albertsons*	Cut Bank	36
Teeple's IGA	Browning	34
Glacier Family Foods	Browning	21
Glacier Park Trading Co	East Glacier Park	19
St. Mary Supermarket	St. Mary	16
Thronson's General Store	Babb	13
Town Pump	Browning	8
Glacier Way Convenience Store	Browning	7
Park Café & Grocery	St. Mary	5
Conoco	Browning	3
Bear Track Travel Center	East Glacier Park	UA
Heart Butte Trading Company	Heart Butte	UA

*Albertsons is located off the Blackfeet Reservation but was used as a comparison store

Additionally, price comparisons shown in Chart 8 below indicated that the cost of food available at the two major grocery stores (red and green) on the Blackfeet Reservation were comparable to the prices collected at the off-reservation grocery store (black). However, costs of selected food items (when available) at the Blackfeet Reservation convenience stores and more remote grocery stores were generally much higher than prices available at both the off-reservation and Blackfeet Reservation grocery stores. Since a larger percentage of residents live in these remote areas, this may indicate that they are spending more money on food or traveling off reservation to purchase their food.

Chart 8: Price Comparison of Selected Food Items from Blackfeet Reservation Food Stores (Grocery & Convenience) and Closest Off-Reservation Grocery Store, Summer 2016



Methodology

The qualitative food sovereignty survey data regarding response frequency to questions about traditional Blackfeet and locally produced food availability on the Blackfeet Reservation were displayed using word clouds. The larger and bolder words represented the more frequently reported responses. For the purpose of this assessment traditional Blackfeet foods were defined as foods that were part of the indigenous peoples' diet before contact with an outside culture. Culturally relevant foods introduced post-contact, were not considered traditional. Additionally, for the purposes of this assessment, locally produced foods were defined as foods produced on or within 100 miles of the Blackfeet Reservation.

The word clouds below (Figures 11-15) reflect responses from the 250 surveys collected on the Blackfeet Reservation (Appendix A). The sampled population profile (Chart 7) was previously discussed in the food security assessment section. Figures 11 and 12 reflected the responses to the survey question: *What do you consider traditional foods of the Blackfeet Nation?* The largest words signified the most common recorded replies from surveyed residents. The most frequently stated foods were potatoes, followed by meat, buffalo, frybread, berries, etc. Figure 12 depicted that same set of response data; however, this it displayed the traditional Blackfeet foods in red and the non-traditional foods (although considered culturally relevant) in black. Figure 12 showed that many community members might not have accurate information regarding traditional Blackfeet cuisine. This may warrant education or workshops focusing on traditional Blackfeet cuisine, how it can be part of a healthy overall diet, and the role traditional foods play in community food security.



[illegible]

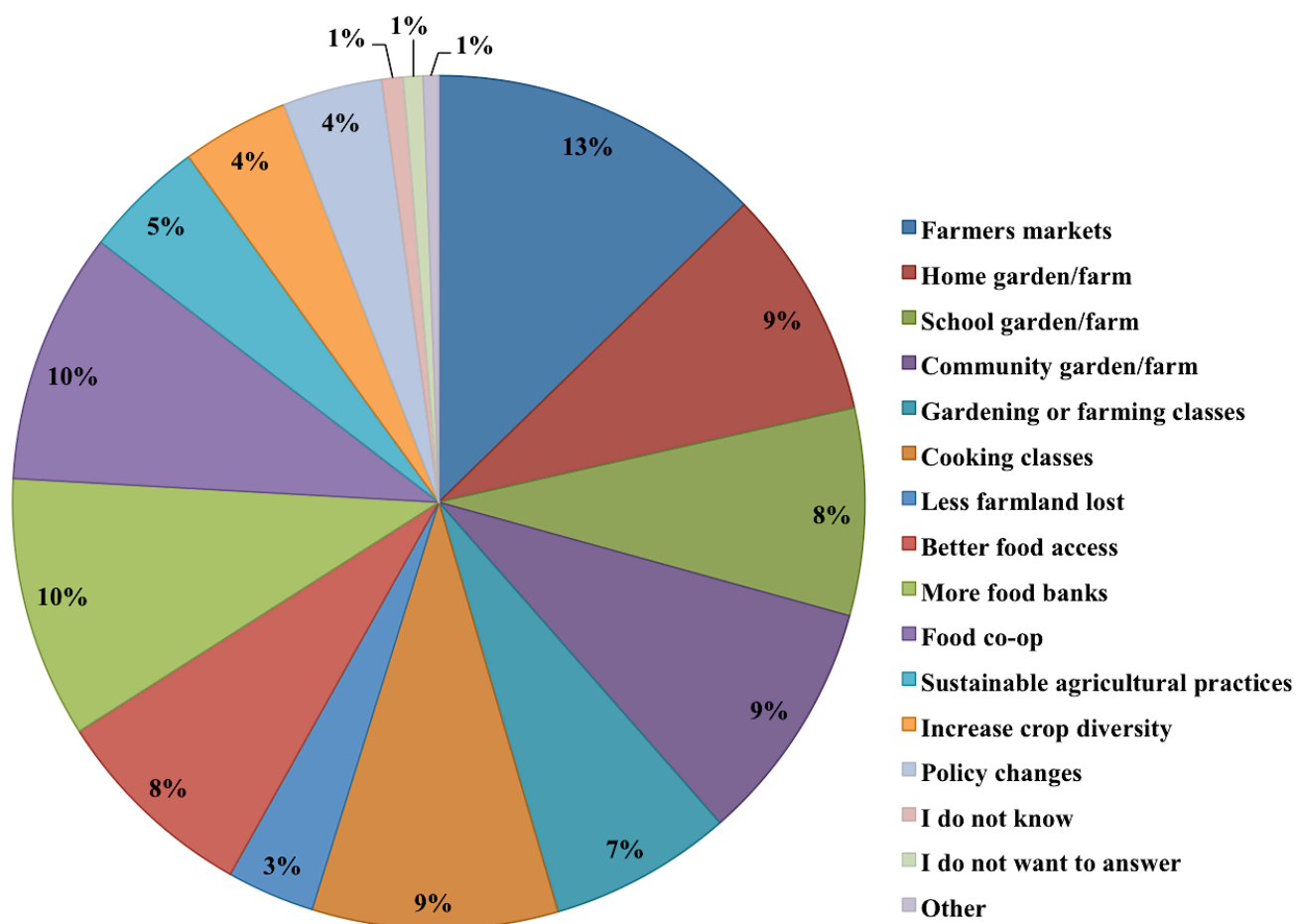
The most frequently reported response was local stores, followed by hunting, gathering, homemade, friends and family, etc. These responses indicated that community members on the Blackfeet Reservation are still practicing traditional hunting and gathering practices.

[illegible][illegible]

Additionally, the survey requested respondents to list barriers to both local and traditional Blackfeet food access on the reservation. Responses such as high prices or lack of money to purchase foods, lack of knowledge, limited food producers and availability, poor soil quality, limitations of the hunting season and laws, and transportation were commonly reported. This may suggest that home and community garden workshops for Blackfeet Reservation residents could increase community access and production of local and traditional foods.

Chart 9 displayed the responses to the question: *What would you like to see happen in your community to increase locally produced, traditional foods?* The most frequent answer was farmers markets (13%) followed by more food banks and food co-ops (10%). This data may indicate that the community would support future efforts seen in Chart 9 to take action regarding access to local and traditional foods on the Blackfeet Reservation. Additionally, this may indicate that many Blackfeet Reservation residents are unaware of the current Food Co-Op availability. This may warrant advertising to expand this resource's reach in the community.

Chart 9: Reported Survey Responses Regarding Future Community Supported Action to Increase Local and Traditional Foods, Summer 2016



Lastly, Table 7 described several reported responses to the following question: *If you could tell your tribal leaders anything about food and hunger issues in the Blackfeet community, what would you tell them?* These comments from the community solidified the importance and severity of hunger and food sovereignty issues on the Blackfeet Reservation.

Table 7: Blackfeet Reservation Food Security & Food Sovereignty Survey Results: What would you like to tell your tribal leaders about food and hunger?, Summer 2016

"We [homeless family of 3] eat mostly at Medicine Bear Shelter. We have nowhere to cook. We live on candy and whatever we can get. We cannot get foods to heat because we have no microwave. That means no heated meals." – Browning Resident

"Our people at the end of the month in Heart Butte don't have anything to eat. I know this because sometimes I give people food out of my house." – Heart Butte Resident

[About] "The traditional hunter role and responsibility. Today's hunting policies make the traditional hunters into poachers." – East Glacier Park Resident

"I would say that we deserve healthy foods at low cost that are accessible to everyone. We need environmentally friendly practices in our communities." – Seville Resident

"We need to grow our own food." – Heart Butte Resident

"Our children, our future, cannot learn if they are hungry. Make sure our children are fed." – Browning Resident

"I am a fully employed and have a good job yet, I or my family will eat fewer meals to make sure other family members have food." – Browning Resident

[Is there] "Any way for food stamps to be divided and half given on 1st and half on 15 the to help end of the month food issues?" – East Glacier Park Resident

"The issues going on now with food disparities would not have happened back then. We must learn to be a community again and learn to take care of one another. Food sovereignty is our right as Blackfeet people and we must form policies that meet our people's needs traditionally and to this day." – Browning Resident

Conclusion

CFSA Recommendations for Change

Throughout the CFSA report gaps in community food security and food sovereignty were identified. The following list of 8 recommendations in Figure 16 was based on identified gaps in the Blackfeet Reservation community.

Figure 16: CFSA Recommendations for Change, Summer 2016



Communicate with state WIC program to reestablish contracts and hold trainings for the smaller food retail locations located on the Blackfeet Reservation.

Provide food budget management education for Blackfeet Reservation residents.

Increase funding for food bank inventory and expansion through mobile sites targeting the remote areas of the reservation.

Target the most food insecure populations (59448 and 59417 zip codes) first with hunger related programming.

Replicate the food security and food sovereignty survey in the winter months to gain a better year round food security and food sovereignty status for the Blackfeet Reservation.

Contact the Hutterite Colony about conducting farming and gardening trainings for Blackfeet Reservation residents.

Establish a consistent farmers market and advertise the current food co-op opportunity on the Blackfeet Reservation.

Limitations

There were some noteworthy limitations to the Blackfeet Reservation CFSA. The food security and food sovereignty surveys were distributed in the summer months. During this time travel to off-reservation grocery stores is easier, local food production may be higher (gardens, farms), and seasonal restaurants and food retail outlets are open. This may have influenced the reported food security scores. As previously mentioned, the CFSA team recommends repeating the survey distribution in the winter months to obtain a better year round community food security status. Additionally, there was some difficulty reaching the goal of 250 completed surveys from a representative sample. Although 250 surveys were collected, there was 0 from the 59411 zip code and the 59427 zip code was underrepresented.

In conclusion, the Blackfeet Reservation CFSA found evidence that the community living on the Blackfeet Reservation is food insecure, has limited availability of year round food resources, especially in the outlying areas of the reservation, and future funding is warranted to improve the identified food security and food sovereignty issues.

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Appendix A: FAST Blackfeet Food Security and Food Sovereignty Survey (Page 1)

What town or community on the Blackfeet Reservation do you live in? _____

What zip code do you live in? _____

What race do you identify with? _____

How many people live in your house? _____

Age: _____ Gender: _____

Food Security Questions

1. In the last 12 months, the food that my family or I bought just didn't last and we didn't have money to get more. Was it true for you, often, sometimes or never?

- ☐ Often true
- ☐ Sometimes true
- ☐ Never true
- ☐ I don't know
- ☐ I do not want to answer

2. In the last 12 months, my family or I couldn't afford to eat balanced meals. Was that often, sometimes, or never true?

- ☐ Often true
- ☐ Sometimes true
- ☐ Never true
- ☐ I don't know
- ☐ I do not want to answer

3. In the last 12 months, did you or other adults in your household ever cut the size of your meals or skip meals because there wasn't enough money for food?

- ☐ Yes
- ☐ No
- ☐ I don't know
- ☐ I do not want to answer

4. If **YES to Question #3**, how often did this happen—almost every month, some months but not every month, or in only 1 or 2 months?

- ☐ Almost every month
- ☐ Some months but not every month
- ☐ Only 1 or 2 months
- ☐ I don't know
- ☐ I do not want to answer

5. In the last 12 months, did you ever eat less than you felt you should because there wasn't enough money for food?

- ☐ Yes
- ☐ No
- ☐ I don't know
- ☐ I do not want to answer

6. In the last 12 months, were you ever hungry but didn't eat because there wasn't enough money for food?

- ☐ Yes
- ☐ No
- ☐ I don't know
- ☐ I do not want to answer

Appendix A: FAST Blackfeet Food Security and Food Sovereignty Survey (Page 2)

Food Sovereignty Questions

7. What do you consider traditional foods of the Blackfeet Nation? _____

8. Are any of these traditional foods available on the Blackfeet Reservation now?

- ☐ Yes
- ☐ No
- ☐ I don't know
- ☐ I do not want to answer

If YES, which ones do you eat? _____

If YES, where do you get them? _____

If NO, what barriers exist, if any, to you getting traditional foods? _____

9. Are there any locally produced foods available on the Blackfeet Reservation now?

- ☐ Yes
- ☐ No
- ☐ I don't know
- ☐ I do not want to answer

If YES, which ones do you eat? _____

If YES, where do you get them? _____

If NO, what barriers exist, if any, to you getting locally produced foods? _____

10. What would you like to see happen in your community to increase locally produced, traditional foods?
Check all that apply.

- | | |
|--|---|
| <input type="checkbox"/> Farmers' markets | <input type="checkbox"/> Food co-op |
| <input type="checkbox"/> Home garden/farm | <input type="checkbox"/> More food banks |
| <input type="checkbox"/> School garden/farm | <input type="checkbox"/> Sustainable agricultural practices |
| <input type="checkbox"/> Community garden/farm | <input type="checkbox"/> Increase crop diversity |
| <input type="checkbox"/> Gardening or farming
workshops/classes | <input type="checkbox"/> Policy changes |
| <input type="checkbox"/> Cooking classes | <input type="checkbox"/> I don't know |
| <input type="checkbox"/> Better food access | <input type="checkbox"/> I don't want to answer |
| <input type="checkbox"/> Less farmland lost | <input type="checkbox"/> Other _____ |

11. If you could tell your tribal leaders anything about food and hunger issues in the Blackfeet community, what would you tell them? _____

Appendix B: US Household Food Security Survey: Six-Item Short Form Scoring Protocol

User Notes

(1) Coding Responses and Assessing Households' Food Security Status:

Responses of “often” or “sometimes” on questions HH3 and HH4, and “yes” on AD1, AD2, and AD3 are coded as affirmative (yes). Responses of “almost every month” and “some months but not every month” on AD1a are coded as affirmative (yes). The sum of affirmative responses to the six questions in the module is the household’s raw score on the scale.

Food security status is assigned as follows:

- Raw score 0-1—High or marginal food security (raw score 1 may be considered marginal food security, but a large proportion of households that would be measured as having marginal food security using the household or adult scale will have raw score zero on the six-item scale)
- Raw score 2-4—Low food security
- Raw score 5-6—Very low food security

For some reporting purposes, the food security status of households with raw score 0-1 is described as food secure and the two categories “low food security” and “very low food security” in combination are referred to as food insecure.

For statistical procedures that require an interval-level measure, the following scale scores, based on the Rasch measurement model may be used:

Number of affirmatives	Scale score
0	NA
1	2.86
2	4.19
3	5.27
4	6.30
5	7.54
6	8.48
(evaluated at 5.5)	

However, no interval-level score is defined for households that affirm no items. (They are food secure, but the extent to which their food security differs from households that affirm one item is not known.)

(2) Response Options: For interviewer-administered surveys, DK (“don’t know”) and “Refused” are blind responses—that is, they are not presented as response options but marked if volunteered. For self-administered surveys, “don’t know” is presented as a response option.

Appendix C: Blackfeet Reservation Food Access Map Assessment Questions

1. Name of business
 2. Address
 3. Type of business
 4. Is your establishment seasonal?
 - 4a. If yes, what months are you open?
 5. Do you offer any traditional Blackfeet foods?
 - 5a. If yes to Q4, what kind of traditional foods do you offer?
 - 5b. If yes to Q4, where do you get these foods?
 6. Do you offer any locally produced foods?
 - 6a. If yes to Q5, what kind of locally produced foods do you offer?
 - 6b. If yes to Q5, where do you get these foods?
- Questions 7 & 8 asked to retail grocery and convenience stores only*
7. Do you accept SNAP benefits?
 8. Do you accept WIC vouchers?

Appendix D: NEMS-S Scoring Protocol

Scoring Systems for NEMS Store Measures

Item	Availability	Price	Quality*
1. Milk	YES low-fat/skim = 2 points (pts) Proportion (lowest-fat to whole) \geq 50% = 1 point (pt)	Lower for lowest-fat (low-fat/skim) = 2 pts Same for both = 1 pt Higher for low-fat = -1 pt	- inapplicable -
2. Fruit	0 varieties = 0 pts < 5 varieties = 1 pt 5-9 varieties = 2 pts 10 varieties = 3 pts	[no points; for comparison with convenience stores]	25-49% acceptable = 1 pt 50-74% acceptable = 2 pts 75%+ acceptable = 3 pts
3. Vegetables	0 varieties = 0 pts < 5 varieties = 1 pt 5-9 varieties = 2 pts 10 varieties = 3 pts	[no points; for comparison with convenience stores]	25-49% acceptable = 1 pt 50-74% acceptable = 2 pts 75%+ acceptable = 3 pts
4. Ground Beef	YES lean meat = 2 pts 2-3 varieties < 10% fat = 1 pt > 3 varieties < 10% fat = 2 pts	Lower for lean meat = 2 pts Higher for lean meat = -1 pt	- inapplicable -
5. Hot dogs	YES fat-free available = 2 pts Light, but not fat-free = 1 pt	Lower for fat-free or light = 2 pts Higher for fat-free or light = -1 pt	- inapplicable -
6. Frozen dinners	YES all 3 reduced-fat types = 3 pts YES 1 or 2 reduced-fat types = 2 pts	Lower for reduced-fat (based on majority of frozen dinners) = 2 pts Higher for reduced-fat = -1 pt	- inapplicable -
7. Baked goods	YES low-fat items = 2 pts	Lower for low-fat (per piece) = 2 pts Higher for low-fat (per piece) = -1 pt	- inapplicable -
8. Beverages	YES diet soda = 1 pt YES 100% juice = 1 pt	Lower for diet soda = 2 pts Higher for 100% juice = -1 pt	- inapplicable -
9. Bread	YES whole grain bread = 2 pts >2 varieties whole wheat bread = 1 pt	Lower for whole wheat = 2 pts Higher for whole wheat = -1 pt	- inapplicable -
10. Baked chips	YES baked chips = 2 pts > 2 varieties baked chips = 1 pt	Lower for baked chips = 2 pts Higher for baked chips = -1 pt	- inapplicable -

* For scoring quality, it is based on the % of acceptable ratings on the total amount of varieties available. For example, if there were 6 varieties of fruit available with 4 items having acceptable ratings, then you would score it with 2 points, as it falls within the 50-75% range.

TOTAL POSSIBLE SCORE: 0 to 27 points (availability) -8 points to 17 points (price) 0 to 6 points (quality)

Total Summary Score: Up to 50 points possible (availability + price + quality)