

2018 Alberta Spatial Price Survey

A Place-to-Place Price Comparison Survey

Introduction

The 2018 Alberta Spatial Price Survey (ASPS) was conducted from October 2018 to January 2019. Prices were collected on various items in select major communities across the province. The 2018 survey was funded by the Government of Alberta (GOA) through the Office of Statistics and Information (OSI) and the Ministry of Economic Development, Trade and Tourism. Statistics Canada and the OSI developed the survey methodology for the ASPS, while the bulk of survey operations, including index development were carried out by Statistics Canada.

Statistics Canada, on behalf of the GOA, collected prices for a basket of goods containing items from food to gasoline and a variety of other goods and services purchased by Alberta consumers in select communities across the province. By keeping the item basket consistent across the surveyed communities, Statistics Canada was able to develop a price index for the basket and its components so that prices can be compared across each of the communities.

Previous iterations of the Alberta Spatial Price Survey- called the Alberta Place-to-Place Price Comparison Survey were collected in-house by the Government of Alberta up to 2010. As of 2016, OSI began contracting Statistics Canada to collect and process data. Historical reports and data developed from these surveys are available on the OSI [website](#)

Table 1: Communities sampled in the 2018 Alberta Spatial Price Survey by 2018 population (Statistics Canada)

Community	Population	Community	Population
Athabasca	2,948	Jasper	4,795
Barrhead	4,720	Lethbridge	98,960
Bonnyville	6,082	Lloydminster	20,220
Brooks	14,903	Medicine Hat	65,426
Calgary	1,311,833	Olds	9,468
Camrose	19,232	Peace River	7,152
Canmore	14,761	Pincher Creek	3,715
Cold Lake	15,205	Ponoka	7,375
Drayton Valley	7,389	Red Deer	104,493
Drumheller	8,065	Rocky Mountain House	6,670
Edmonton	1,004,947	Slave Lake	7,018
Fort McMurray*	71,905	St. Paul	5,929
Grande Cache	3,503	Stettler	5,975
Grande Prairie	67,085	Taber	8,778
High Level	3,297	Vegreville	5,873
High Prairie	2,664	Wainwright	6,372
High River	14,263	Whitcourt	10,259
Hinton	10,140	Total Population Coverage	2,961,420

* The Specialized Municipality of Wood Buffalo.

Survey Background

In total, 35 Alberta communities were surveyed for the 2018 cycle of the ASPS. Table 1 lists the surveyed communities and their respective population estimates. Since one of main goals of the survey was to measure and compare relative price levels (rather than actual price levels), a price index was developed using Edmonton as the index base. This means that Edmonton is benchmarked at 100.0 and serves as the basis of comparison. As such, communities having an index value above (or below) 100.0 experienced higher (or lower) prices than Edmonton for a particular basket of commodities. Even though Edmonton is the reference location, index values can easily be adjusted so that any other community can serve as the base.

Similar to the Consumer Price Index (CPI), items included in the basket of goods and services for the ASPS are not weighted equally. Instead, the items are weighted according to relative importance. For example, if the average Alberta consumer spends more money on gasoline than on butter, then gasoline will be weighted higher in the overall basket. Thus, for the all-items basket, differences in gasoline prices will have a larger effect on the all-items price index than differences in butter prices. Some of the more important or more heavily weighted goods and services in the all-items basket include household services, recreation and leisure, transportation and shelter costs. Although individual food items have a relatively small

impact on the all-items index, their combined value is relatively large.

Note that there is a difference in the key objectives of the ASPS and CPI. The objective of the ASPS is to compare price differences across various locations at a specific point in time, whereas the Consumer Price Index (CPI) compares price differences over time across the province. In addition, the basket of goods and services surveyed for the ASPS is less comprehensive than the CPI. This is mainly due to challenges in finding all of the required items in some of the smaller communities. Thus, it is not recommended to combine ASPS and CPI data for determining price growth within specific communities.

Data Sources

For many of the basket items, such as food, gasoline and major appliances, Statistics Canada collected prices in the selected communities from October 2018 to January 2019. While some of the data were collected through visits to local retail outlets in each of the selected communities, price information was also taken from Statistics Canada's internal databases, which is used for the CPI program.

Price data for certain items were acquired from other surveys and sources. For rental costs, information was taken from the Apartment Vacancy and Rental Cost Survey (conducted annually by Alberta Seniors and Housing) and Canada Mortgage and Housing Corporation's (CMHC) Rental Market Report and Housing Market Outlook. For owned accommodations, OSI contracted a real estate representative to collect housing prices from real estate listings that were sold within 6 months prior to the ASPS collection period. Several details

on housing were collected such as, age of dwelling, square footage, lot size, number of bedrooms and bathrooms, as well as other characteristics. For the 2018 cycle, OSI also collected information on a number of goods and services through phone interviews and publicly available sources including childcare, hair care, internet, cable, telephone, dental services, veterinary services and fitness memberships. More details about the ASPS survey design and background, including the conceptual and methodological approaches, can be found in Statistic Canada's 2018 ASPI Report, available on the OSI website.

Types of Indices

Three aggregate and sixteen sub-aggregate indices were developed by Statistics Canada. The aggregated indices are:

1. An all-items index;
2. A food index; and
3. A non-food index.

The sixteen category-specific indices are allocated to two major groupings as follows:

Food Indices:

- Dairy Products
- Fats and Oils
- Cereals and Bread
- Processed Fruits and Vegetables
- Fresh Fruit and Vegetables
- Meat, Fish, Poultry and Substitutes
- Frozen and Packaged Food
- Restaurant Meals

Non-Food Indices:

- Personal Care Products
- Household Supplies
- Household Services
- Household Equipment
- Recreation and Leisure
- Transportation
- Shelter
- Utilities

Analysis

Overall, all-items price indices ranged from a high of 142.9 in Canmore to a low of 89.3 in Wainwright. This means that the overall price level in Canmore was 42.9% greater than Edmonton's, while Wainwright's was 10.7% less than Edmonton's for the all-items basket of goods. Fort McMurray (11.1% above Edmonton) and Jasper (6.8% above Edmonton) followed Canmore for the highest all-items levels, while Brooks (8.0% below Edmonton) and Pincher Creek (7.6% below Edmonton) followed Wainwright for lowest. Calgary and Red Deer were within 2% of Edmonton, while Lethbridge was 5.5% below Edmonton (Appendix Map 1 and Table 2).

In Canmore, high prices were driven by shelter costs (e.g., housing/rental costs, property taxes, 141.3% higher than Edmonton; Appendix Table 5), transportation (e.g., gasoline and vehicle purchase and leasing, 19.4% higher than Edmonton; Appendix Table 4) and to a lesser extent, food prices (11.7% higher than Edmonton; Appendix Table 2). In general, Canmore had higher index values than Edmonton on all goods and services other than dairy. Canmore's high shelter costs were largely driven by its high housing costs (mortgage payments-interest payments), as average housing costs were 121.6% above Edmonton's. However, its rental costs were actually 9.8% below Edmonton's. These costs could be influenced by increased demand for recreational and retirement properties.

Fort McMurray's food and shelter indices were above Edmonton's (8.9% and 26.0%, respectively; Appendix Tables 2 and 5) but not to the same extent as Canmore. Most goods were somewhat higher priced. For instance, personal care products and household supplies were 3.3% and 2.5% above Edmonton, respectively

(Appendix Table 4). Services, including restaurant meals (13.9% above Edmonton's; Appendix Table 3) and household services (20.0% above Edmonton's; Appendix Table 4) were considerably higher. This could be influenced by competition for labor from the oil sector and the remoteness of the community.

Unlike Canmore and Fort McMurray, Jasper's shelter index was only slightly above Edmonton's (1.9%; Appendix Table 5). However, it had notably higher indices on a number of other items. For instance, it had the highest food index (13.9% above Edmonton's; Appendix Table 2), the third highest restaurant meal index (18.4% above Edmonton; Appendix Table 3) and the third highest transportation index (8.5% above Edmonton's; Appendix Table 4). Many processed food items were considerably higher than in Edmonton (for instance, processed fruit and vegetables were 26.4 % above Edmonton's; Appendix Table 3). This may reflect limited food retailer selection and competition.

As in 2016, Wainwright had the lowest all-items index (10.7% below Edmonton's; Appendix Table 2). Its indices were below Edmonton for all categories other than restaurant meals and personal care products. It had a considerably lower shelter index (31.2% below Edmonton; Appendix Table 5), which had the largest influence on its all-items index.

In general, shelter costs across Alberta were low relative to Edmonton, with 27 of the 35 communities below Edmonton. Although prices for goods and services in smaller communities were often higher than in Edmonton, shelter costs often acted as a counterbalance. For instance, Barrhead had higher index values for all goods (excluding restaurant meals), but a lower all-items index due to its low shelter costs (40.6% below Edmonton's; Appendix Table 5).

Costs in large communities tended to be close together. The range (difference between the maximum and minimum) of the all-items index for Edmonton, Calgary, Red Deer and Lethbridge was 7.2 (Appendix Table 2), the food index was 4.9 (Appendix Table 2), and the non-food index was 8.6 (Appendix Table 2). However, the all-items range for all communities was quite a bit higher at 53.6 (Appendix Table 2). This was skewed by Canmore's exceptionally high index; excluding Canmore, the range was 21.8 (Appendix Table 2).

Prices

The average prices of household appliances varied considerably across communities. For instance, mattresses ranged from \$4,300 in Grande Cache to \$399 in St. Paul, refrigerators ranged from \$1,450 in Jasper to \$798 in Wainwright and vacuums ranged from \$700 in Jasper to \$180 in Hinton.

Everyday expenditures also varied considerably. Average gas prices varied from \$1.50 per litre in High Level to \$1.23 in Vegreville; water and sewage ranged from \$1,656 in Olds to \$563 in Pincher Creek; and electricity varied from \$163 a month in High Level to \$79 in Medicine Hat.

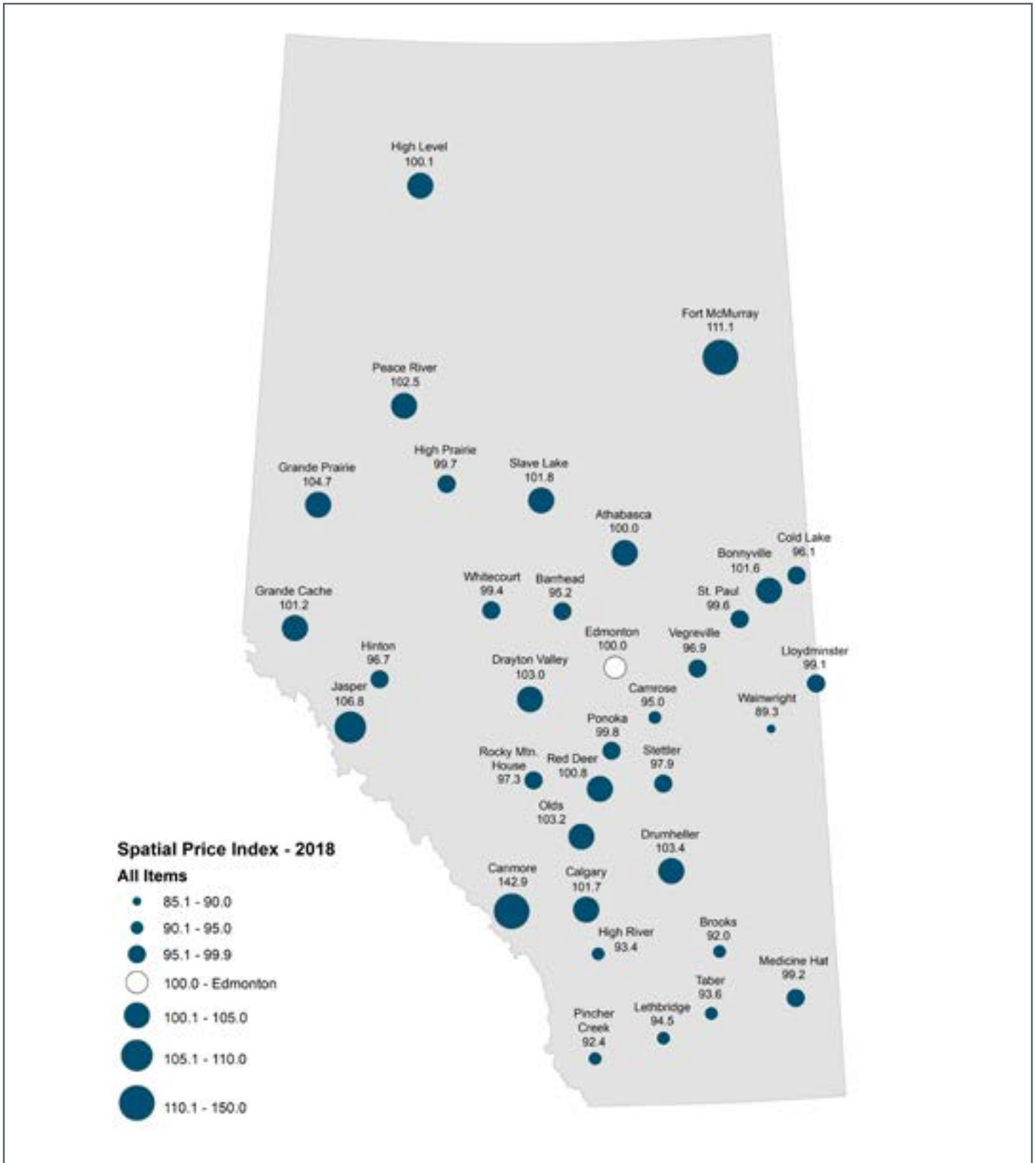
Most food prices were also quite variable. Eggs ranged from an average of \$4.19 in Grand Cache to \$2.80 in Pincher Creek; potatoes ranged from \$8.25 in Bonnyville to \$2.91 in Jasper; and canned sockeye/pink salmon ranged from \$5.13 in High Prairie to \$2.50 in Drayton Valley.

Prices of some household services, such as internet and telephone, were very similar across communities, with a number of those communities having identical prices. For instance, the average cost of internet was \$79.73 for the cities of Lloydminster, Canmore, Rocky Mountain House, High River, Brooks, Edmonton, Red Deer, Lethbridge, Medicine Hat, Barrhead, Calgary, Fort McMurray, Olds, Pincher Creek, Taber and Vegreville. This is likely due to there being a limited number of service providers within the communities.

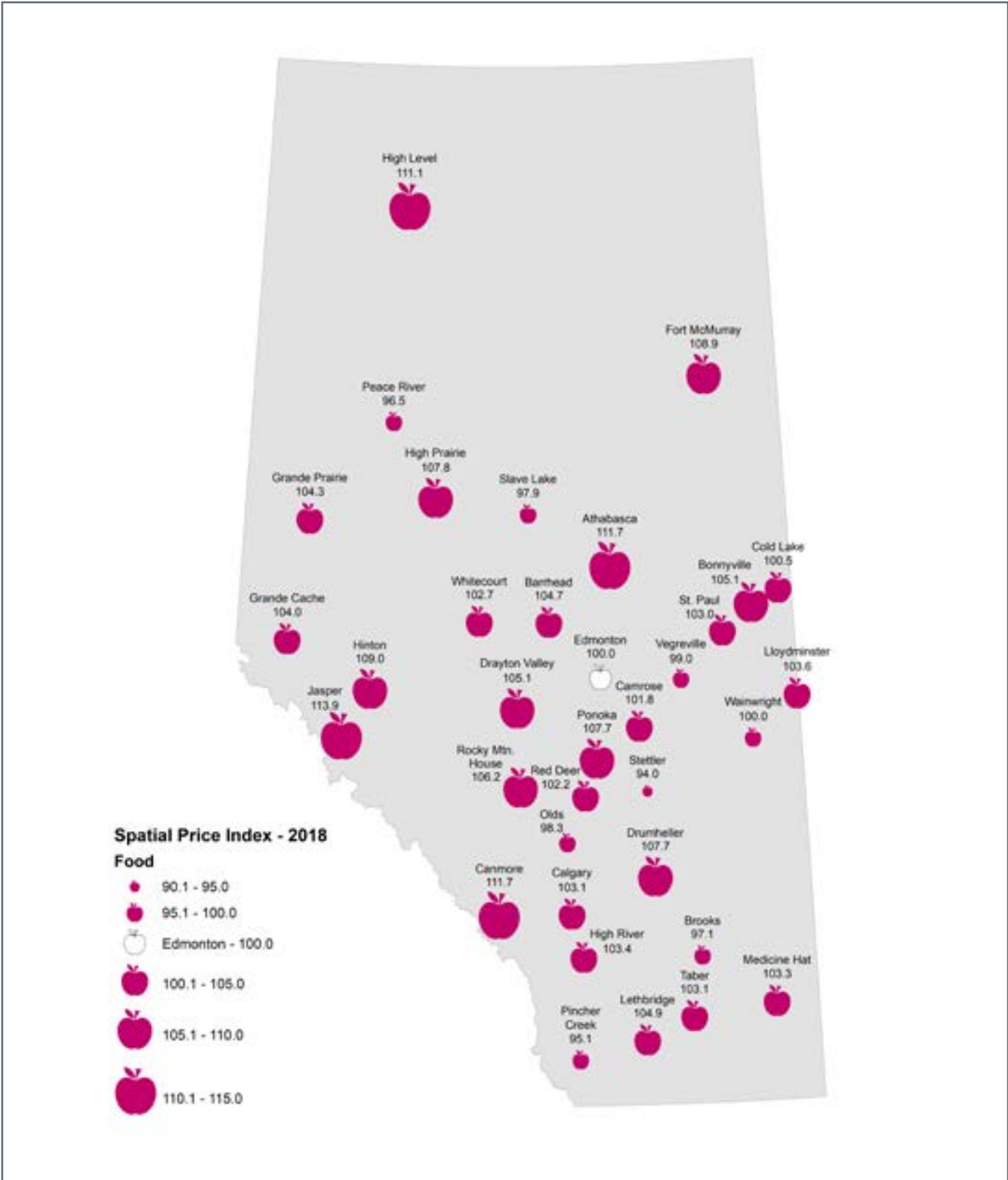
Contact: [Micah Brown](#) at 780.427.8840

Appendix

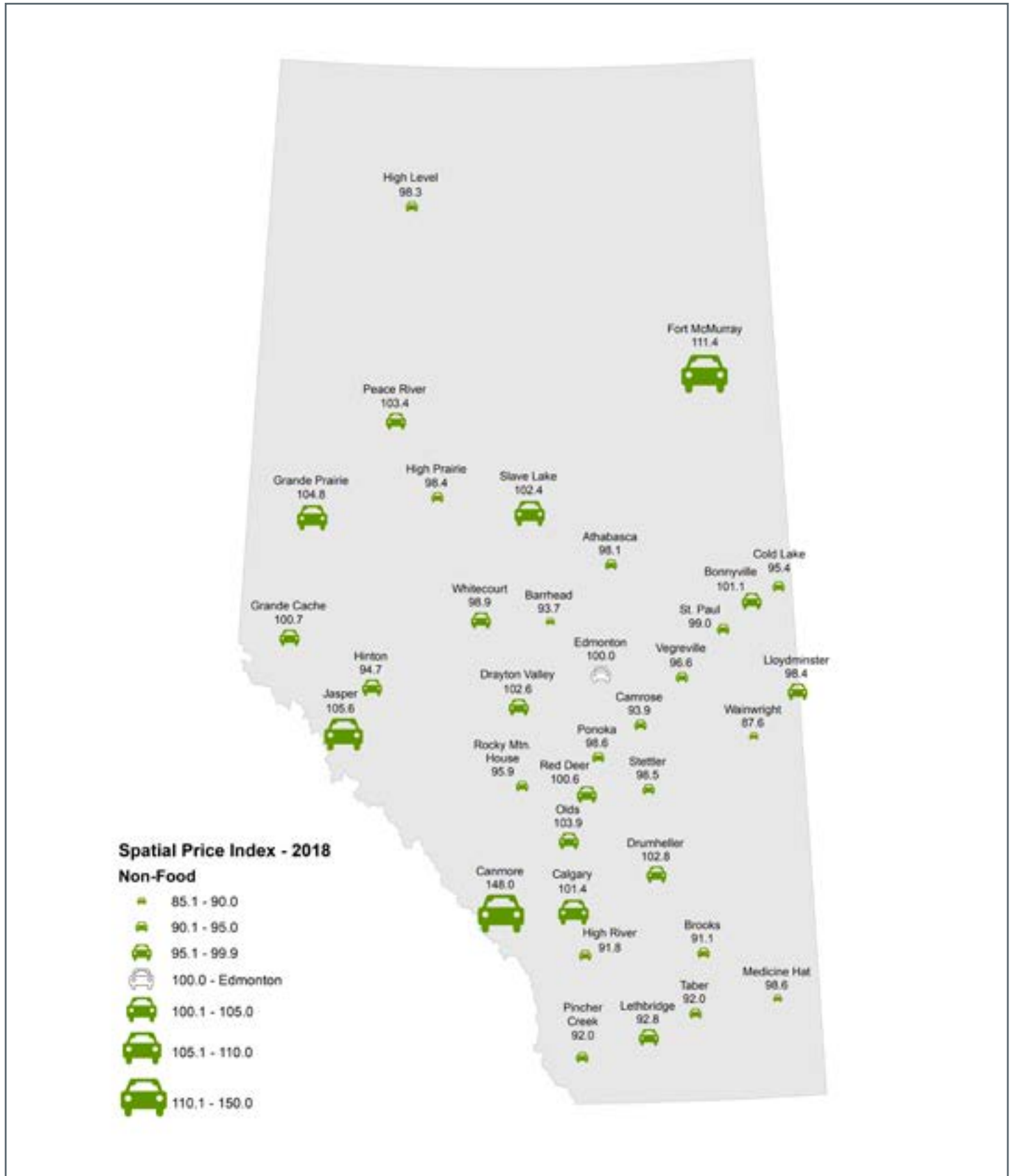
Map 1: All-Item Index



Map 2: Food Index



Map 3: Non-Food Index



Map 4: Shelter Index

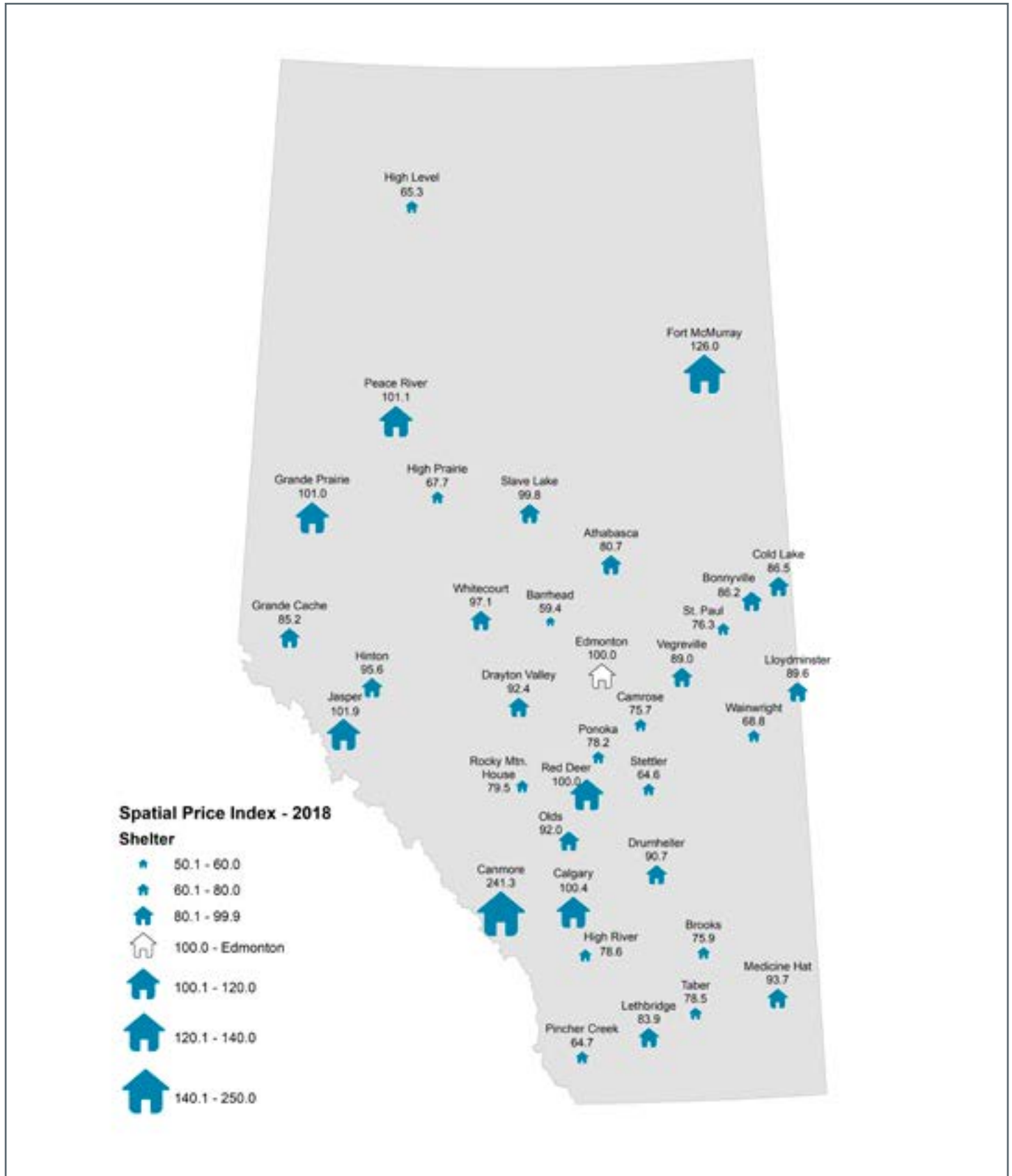


Table 2: Spatial Price Survey-All-Item Indexes

Community	All item	Food	Non-Food
Athabasca	100.0	111.7	98.1
Barrhead	95.2	104.7	93.7
Bonnyville	101.6	105.1	101.1
Brooks	92.0	97.1	91.1
Calgary	101.7	103.1	101.4
Camrose	95.0	101.8	93.9
Canmore	142.9	111.7	148.0
Cold Lake	96.1	100.5	95.4
Drayton Valley	103.0	105.1	102.6
Drumheller	103.4	107.7	102.8
Edmonton	100.0	100.0	100.0
Fort McMurray	111.1	108.9	111.4
Grande Cache	101.2	104.0	100.7
Grande Prairie	104.7	104.3	104.8
High Level	100.1	111.1	98.3
High Prairie	99.7	107.8	98.4
High River	93.4	103.4	91.8
Hinton	96.7	109.0	94.7
Jasper	106.8	113.9	105.6
Lethbridge	94.5	104.9	92.8
Lloydminster	99.1	103.6	98.4
Medicine Hat	99.2	103.3	98.6
Olds	103.2	98.3	103.9
Peace River	102.5	96.5	103.4
Pincher Creek	92.4	95.1	92.0
Ponoka	99.8	107.7	98.6
Red Deer	100.8	102.2	100.6
Rocky Mountain House	97.3	106.2	95.9
Slave Lake	101.8	97.9	102.4
St. Paul	99.6	103.0	99.0
Stettler	97.9	94.0	98.5
Taber	93.6	103.1	92.0
Vegreville	96.9	99.0	96.6
Wainwright	89.3	100.0	87.6
Whitecourt	99.4	102.7	98.9

Table 3: Food Categories

Community	Dairy	Fats & Oils	Cereals & Breads	Processed Fruits & Vegetables	Fruits & Vegetables	Meat, Fish, Poultry, & Substitutes	Frozen & Packaged Foods	Restaurant Meals
Athabasca	111.5	115.0	114.9	112.7	115.9	105.7	112.4	112.4
Barrhead	105.6	114.1	111.9	120.4	111.9	108.4	109.3	94.6
Bonnyville	102.5	101.6	101.1	105.4	108.3	105.2	116.9	99.7
Brooks	99.2	95.2	96.5	94.6	95.6	101.8	94.3	96.1
Calgary	105.4	101.7	102.5	100.7	101.1	103.1	98.8	105.7
Camrose	101.0	102.9	97.8	99.5	100.1	98.3	97.5	107.9
Canmore	96.9	107.6	104.4	108.0	113.4	113.6	101.4	120.0
Cold Lake	99.6	98.6	100.8	92.2	94.0	98.0	97.6	106.5
Drayton Valley	102.2	106.4	114.0	105.5	110.1	106.9	103.8	101.4
Drumheller	109.9	107.0	103.1	108.7	110.6	105.9	108.7	107.8
Edmonton	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Fort McMurray	106.8	109.5	106.8	107.2	108.4	103.9	106.8	113.9
Grande Cache	109.9	119.9	104.8	107.7	115.6	109.3	102.0	95.6
Grande Prairie	102.1	104.3	101.9	103.0	101.8	102.7	100.9	109.0
High Level	110.1	114.3	125.4	112.3	129.3	108.5	114.3	100.9
High Prairie	111.7	116.8	107.9	117.9	110.3	113.5	107.4	102.0
High River	105.2	97.7	102.8	101.4	104.5	109.6	101.2	100.5
Hinton	95.3	95.6	90.6	92.7	121.9	102.9	91.7	124.6
Jasper	128.9	114.1	122.0	126.4	103.2	101.3	116.6	118.4
Lethbridge	100.3	98.8	99.2	100.7	104.4	103.0	99.7	111.5
Lloydminster	101.2	101.0	97.2	102.6	104.2	104.9	102.8	105.1
Medicine Hat	103.2	101.1	101.1	101.1	102.8	105.2	100.7	104.4
Olds	99.9	94.8	92.6	96.9	95.3	98.4	96.0	101.7
Peace River	94.1	101.7	97.4	92.6	92.9	98.6	94.7	97.9
Pincher Creek	91.4	97.4	93.4	88.4	93.3	95.3	85.4	101.9
Ponoka	103.3	102.4	104.4	105.6	103.0	103.3	102.9	116.4
Red Deer	103.0	102.3	107.2	102.9	104.7	98.4	102.9	101.8
Rocky Mountain House	109.4	113.1	102.0	109.7	111.6	111.0	109.3	99.7
Slave Lake	99.7	95.6	96.6	95.6	95.8	97.7	93.6	101.2
St. Paul	108.4	109.2	105.0	109.1	109.4	100.8	110.0	96.5
Stettler	95.2	96.4	95.3	94.2	90.7	95.7	93.5	93.7
Taber	101.3	103.7	118.5	113.0	111.4	103.2	101.2	97.0
Vegreville	98.1	104.0	98.2	93.8	102.0	96.9	95.7	101.3
Wainwright	98.7	98.3	96.2	94.7	97.6	93.3	96.2	108.2
Whitecourt	96.7	100.4	95.8	96.0	95.7	101.7	96.0	112.5

Table 4: Spatial Price Survey- Non-Food Categories (excluding shelter and utilities)

Community	Personal Care Products	Household Supplies	Household Services	Household Equipment	Recreation & Leisure	Transportation
Athabasca	104.4	115.9	96.5	105.0	106.0	98.5
Barrhead	111.8	106.1	93.6	102.4	111.8	101.5
Bonnyville	97.1	110.8	96.0	100.2	122.2	97.5
Brooks	101.6	90.6	88.4	101.9	91.6	101.7
Calgary	105.8	102.0	92.9	107.0	100.1	99.8
Camrose	90.6	103.0	99.4	98.0	93.4	98.1
Canmore	103.3	114.4	119.6	107.8	113.7	119.4
Cold Lake	87.5	101.8	101.1	95.2	99.4	92.2
Drayton Valley	107.5	106.2	113.5	99.4	95.5	104.0
Drumheller	106.2	106.8	105.4	107.7	105.6	96.5
Edmonton	100.0	100.0	100.0	100.0	100.0	100.0
Fort McMurray	103.3	102.5	120.0	98.8	97.0	103.1
Grande Cache	96.5	125.2	94.8	92.0	98.8	106.0
Grande Prairie	96.3	107.2	107.0	101.0	96.5	106.8
High Level	106.7	113.9	101.8	102.2	119.9	100.7
High Prairie	105.5	101.7	113.4	99.1	111.6	98.4
High River	102.6	96.7	99.2	108.0	89.5	91.5
Hinton	86.4	90.4	97.0	93.6	91.7	94.0
Jasper	109.0	112.7	109.3	122.7	92.3	108.5
Lethbridge	104.7	96.9	97.7	99.2	93.3	93.4
Lloydminster	106.1	99.7	108.3	93.8	99.3	90.3
Medicine Hat	103.3	95.8	97.4	112.8	97.2	101.9
Olds	108.0	93.2	105.7	96.0	99.1	107.1
Peace River	92.0	93.6	119.6	108.2	97.3	94.4
Pincher Creek	93.9	82.7	91.8	89.5	100.9	110.3
Ponoka	111.3	95.9	102.3	126.4	114.0	93.5
Red Deer	105.5	103.4	97.4	97.2	106.0	94.7
Rocky Mountain House	109.9	110.5	95.3	116.0	92.8	102.1
Slave Lake	98.1	94.1	89.4	112.1	103.7	102.4
St. Paul	97.8	109.0	108.0	96.8	100.1	102.7
Stettler	103.8	97.4	113.2	110.7	112.4	98.6
Taber	102.8	100.0	92.8	107.4	82.6	97.0
Vegreville	89.6	87.4	104.9	102.8	93.6	95.2
Wainwright	102.4	90.0	91.1	96.5	94.8	93.5
Whitecourt	104.2	95.7	107.4	102.4	98.0	94.2

Table 5: Alberta Spatial Price Index-Shelter and Utilities

Community	Shelter	Utilities
Athabasca	80.7	124.9
Barrhead	59.4	122.3
Bonnyville	86.2	125.4
Brooks	75.9	99.7
Calgary	100.4	123.9
Camrose	75.7	127.2
Canmore	241.3	125.6
Cold Lake	86.5	118.8
Drayton Valley	92.4	125.3
Drumheller	90.7	146.4
Edmonton	100.0	100.0
Fort McMurray	126.0	122.2
Grande Cache	85.2	148.6
Grande Prairie	101.0	132.3
High Level	65.3	133.4
High Prairie	67.7	139.9
High River	78.6	108.0
Hinton	95.6	104.5
Jasper	101.9	113.9
Lethbridge	83.9	97.0
Lloydminster	89.6	131.9
Medicine Hat	93.7	98.3
Olds	92.0	151.7
Peace River	101.1	132.0
Pincher Creek	64.7	111.8
Ponoka	78.2	119.2
Red Deer	100.1	114.1
Rocky Mountain House	79.5	109.8
Slave Lake	99.8	134.9
St. Paul	76.3	142.5
Stettler	64.6	144.9
Taber	78.5	120.8
Vegreville	89.0	123.0
Wainwright	68.8	93.4
Whitecourt	97.1	102.2