

2018 COMMUNITY PROFILE REPORT

Grand Forks



APPLIED & INNOVATION
RESEARCH CENTRE Selkirk College



CONTENTS

Introduction.....	3
Location.....	4
Demographics.....	4
Total Population.....	4
Population Projections.....	4
Age Characteristics.....	4
Families & Households.....	4
Family Characteristics.....	5
Marital Status.....	5
Mobility.....	5
Cultural Characteristics.....	6
Language Spoken Most Often at Home.....	6
Ethnic Origin.....	6
Aboriginal Identity.....	7
Infrastructure.....	7
Water Services.....	7
Sewer Services.....	7
Service Providers.....	7
Landfill & Waste Management.....	8
Traffic Volumes.....	8
BC Transit.....	8
Housing.....	8
Dwellings by Structure.....	8
Dwellings by Period of Construction.....	9
Residential Property Values.....	9
Household Occupation.....	9
Housing Affordability.....	9
Vacancy Rates.....	10
Income.....	10
Household Income.....	10
Source of Income.....	11
Low Income Measure.....	11
Labour Force.....	11
Class of Worker & Occupation.....	11
Labour Force by Industry.....	12
Place of Work.....	13

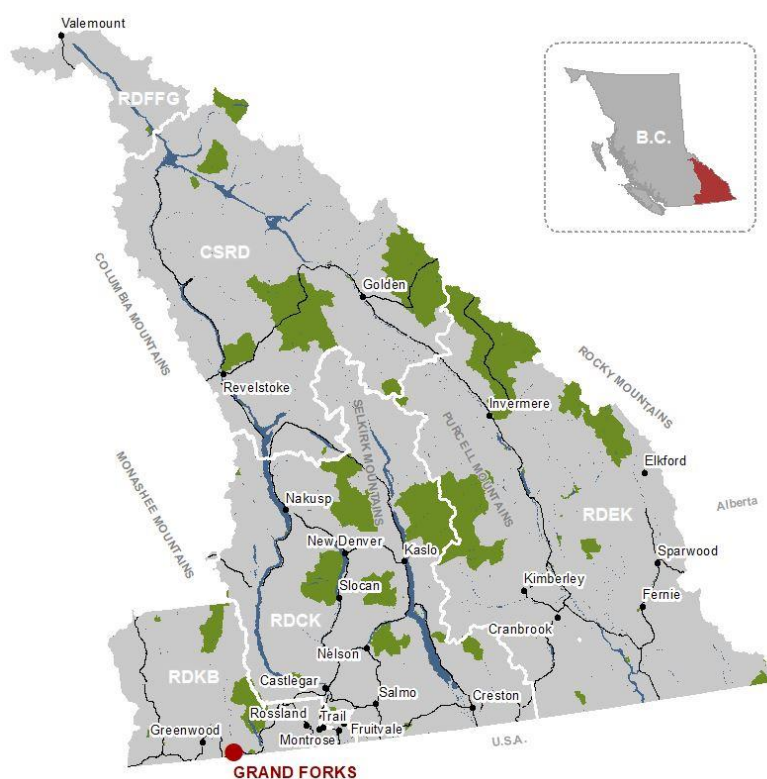
Commute to Work	13
Unemployment.....	13
Labour Force Replacement Ratio	14
Education.....	14
Early Development Instrument	14
Public School Enrolment	15
High School Completion.....	15
Educational Attainment	15
Quality of Life & Civic Engagement.....	16
Life Expectancy	16
Crime Severity Index.....	16
Voter Turnout	16
Charitable Donations.....	16
Public Library Usage.....	16
Business.....	17
Business Formations.....	17
Total Building Permits	17
Building Permits by Type	18
Visitor Centre Statistics.....	18
Local Government.....	18
Municipal Revenues.....	18
Municipal Expenses	19
Taxes & Charges on a Representative House.....	19
Environment	20
Parks & Protected Areas	20
Weather & Climate	20
Modeled Climate Data – History & Projections.....	21
References.....	22

* **Note:** Demographics –Age Characteristics updated June 2020

INTRODUCTION

Set in a beautiful valley near the Christina Range of the Monashee Mountains at the confluence of the Granby and Kettle rivers, the City of Grand Forks is the hub of the Boundary Region. Located between the Okanagan Valley and the Kootenays, residents enjoy a semi-arid climate with low precipitation, mild winters, and hot summers. The community has been home to a large Doukhobor population since the early 1900s and continues to celebrate and embrace this rich culture. Incorporated April 15, 1897, major industries include logging, agriculture, rock wool manufacturing, metal fabrication, and tourism. Recreational activities include biking, canoeing, fishing, hiking, camping, and visiting the many farms and orchards. See www.grandforks.ca.

This report provides a profile of several indicators of well-being for the community of Grand Forks. As part of the State of the Basin program, the RDI has created community-specific reports for all municipalities in the Columbia Basin-Boundary region. The primary goal of the State of the Basin is to provide access to relevant data that is easily accessible to help inform decisions that lead to greater community and regional well-being. The Community Profiles are intended to share community-specific data with local governments and other organizations to help build a better understanding of local conditions and trends, and assist in making evidence-based planning and management decisions. These reports may also be useful for supporting communications with residents, and new resident, business and workforce attraction.



State of the Basin research draws on available data from a variety of sources including federal, provincial, and local governments, crown corporations, and non-profit initiatives. The RDI collects data from open access sources and through custom data requests. Indicators in this report are quantitative, and while quantitative indicators help establish foundational knowledge of well-being, they only tell part of the story. Qualitative information, including the RDI's subjective well-being research, can further contribute to understanding the well-being of our communities and region. In order to understand geographic trends in indicators, this report compares community data with regional, provincial, and national data where appropriate. The geographic divisions used vary by indicator and depend on the topic being measured. **For additional community and regional comparisons for indicators in this report, please see the [State of the Basin reporting](#).**

For other research reports on Grand Forks please see the [RDI's Communities of the Columbia Basin](#). Statistics Canada also offers a suite of data sets through their [Census Program](#), where you can search by place name and topic, and [Census Mapper](#) provides this data in mapped format. Interior Health has also developed [Community Health Profiles](#) for municipalities across BC, and the [Weather Network](#) offers a variety of weather and climate statistics. [BC Stats](#) and [Local Government Statistics](#) are other online sources of community-specific statistics.

If you have questions or feedback on this Community Profile, please [contact the RDI](#).

LOCATION

Regional District	Regional District of Kootenay Boundary
Coordinates	Longitude is 118°26'14"W Latitude is 49°01'54"N
Elevation	520 meters
Municipal Area	10.98 km ²

DEMOGRAPHICS

Population characteristics^{1,2} help planners and local decision makers to evaluate current and future community needs, particularly with respect to service delivery and potential impacts to the local economy.

Total Population

	2006	2011	2016	Percent change 2006 to 2016
Grand Forks	4,036	3,985	4,049	0.3%
Regional District of Kootenay Boundary	30,742	31,138	31,447	2.3%
British Columbia	4,113,490	4,400,057	4,648,055	13.0%

Population Projections

	Percent change in population projected 2017 to 2037
Grand Forks Local Health Area	-8%
British Columbia	22%

Age Characteristics

	Grand Forks (2016)			British Columbia (2016)		
	Male	Female	Total	Male	Female	Total
Children (0 to 14 yrs)	255	265	520	355,400	335,985	691,390
Emerging Labour Force (15 to 24 yrs)	155	140	300	280,615	265,930	546,540
Primary Labour Force (25 to 64 yrs)	905	970	1885	1,246,670	1,314,475	2,561,145
Seniors (65+ yrs)	595	750	1345	395,560	453,425	848,985
Total population	1915	2130	4045	2,278,245	2,369,815	4,648,055
Average age of population (yrs)	49.1	51.7	50.4	41.5	43.1	42.3

FAMILIES & HOUSEHOLDS

Family characteristics¹ such as size and composition of families can help inform social, economic, health, and education programming, as well as planning and development around infrastructure needs.

Family Characteristics

	Grand Forks (2016)	British Columbia (2016)
Average household size	2.0	2.4
Total number of families in private households	1,165	1,311,345
Total couple families	940	1,113,405
Couples without children	655	577,790
Couples with children	285	535,610
One child	120	221,065
Two children	105	230,705
Three or more children	60	83,840
Total lone-parent families	225	197,940
Female parent	175	155,670
Male parent	50	42,265
One child	155	125,890
Two children	50	54,900
Three or more children	20	17,145
Total persons not in census families in private households (singles)	875	882,895

Marital Status

	Grand Forks (2016)			British Columbia (2016)		
	Male	Female	Total	Male	Female	Total
Total population 15 years+	1,665	1,870	3,530	1,922,840	2,033,825	3,956,665
Married	780	770	1,555	959,690	965,645	1,925,345
Living common law	195	195	390	186,485	185,505	371,985
Single (never married)	390	315	705	582,975	493,110	1,076,085
Separated	60	75	135	45,225	60,475	105,700
Divorced	140	185	335	103,475	160,395	263,870
Widowed	90	320	410	44,990	168,700	213,685

MOBILITY

This indicator measures the movement of people into and out of the community with respect to where they lived five years prior. Non-movers are those who have not moved. Movers include non-migrants and migrants. Non-migrants are persons who did move, but remained in the community. Migrants include those who moved within the province (intraprovincial), as well as those who moved to or from another province (interprovincial), and those who moved to Canada from outside the country (external migrants).¹

	Grand Forks (2016)	British Columbia (2016)	Canada (2016)
Non-movers (%)	58.9	57.4	61.8
Movers non-migrants (%)	18.3	21.7	20.7
Intraprovincial migrants (%)	15.6	11.6	10.6
Interprovincial migrants (%)	6.5	3.9	2.5
External migrants (%)	0.9	5.4	4.2

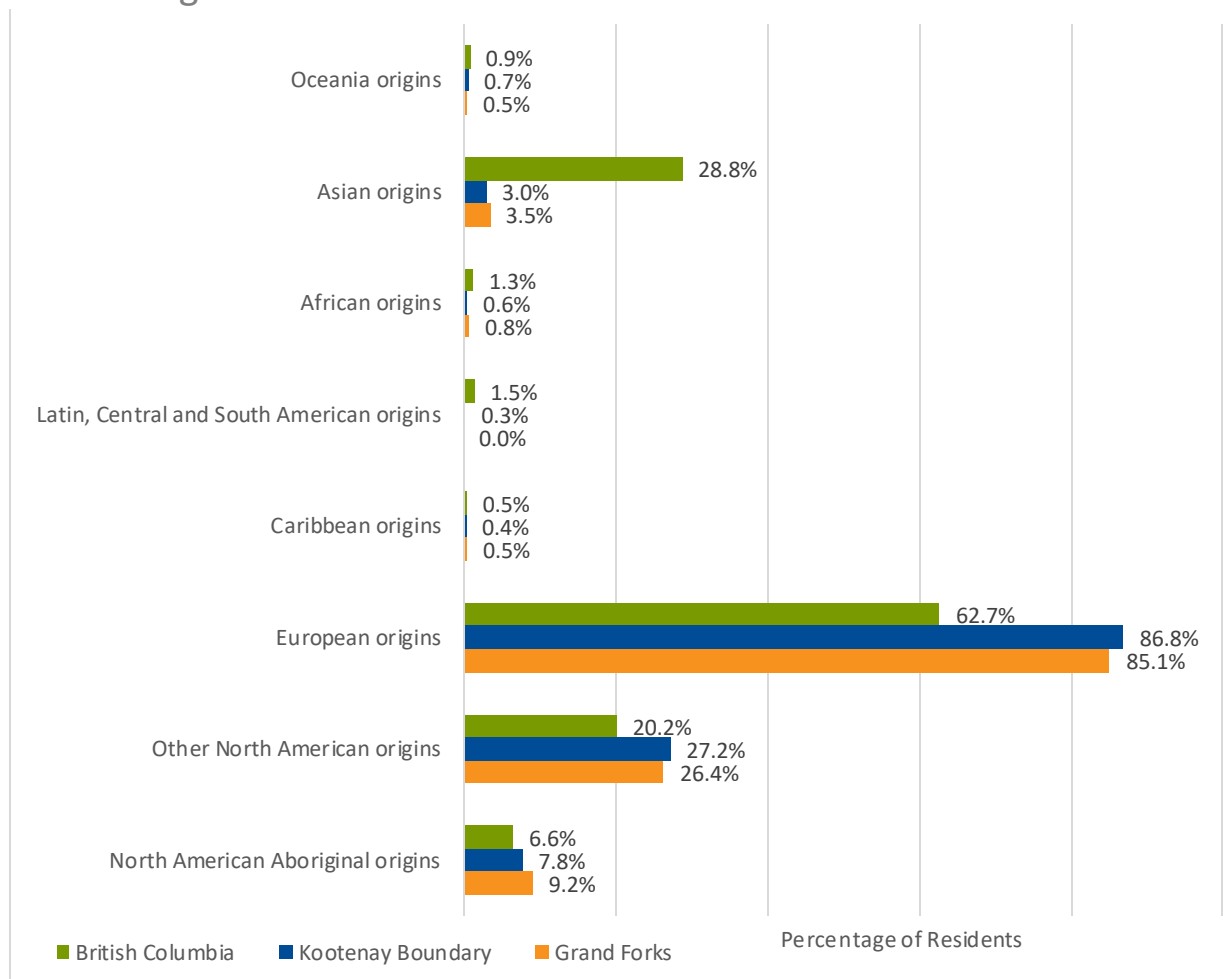
CULTURAL CHARACTERISTICS

Culture is multi-faceted and dynamic, embracing several aspects that describe and shape our way of life. Language, ethnic origin, and Aboriginal identity are a few indicators that provide insight into a community's cultural diversity.¹

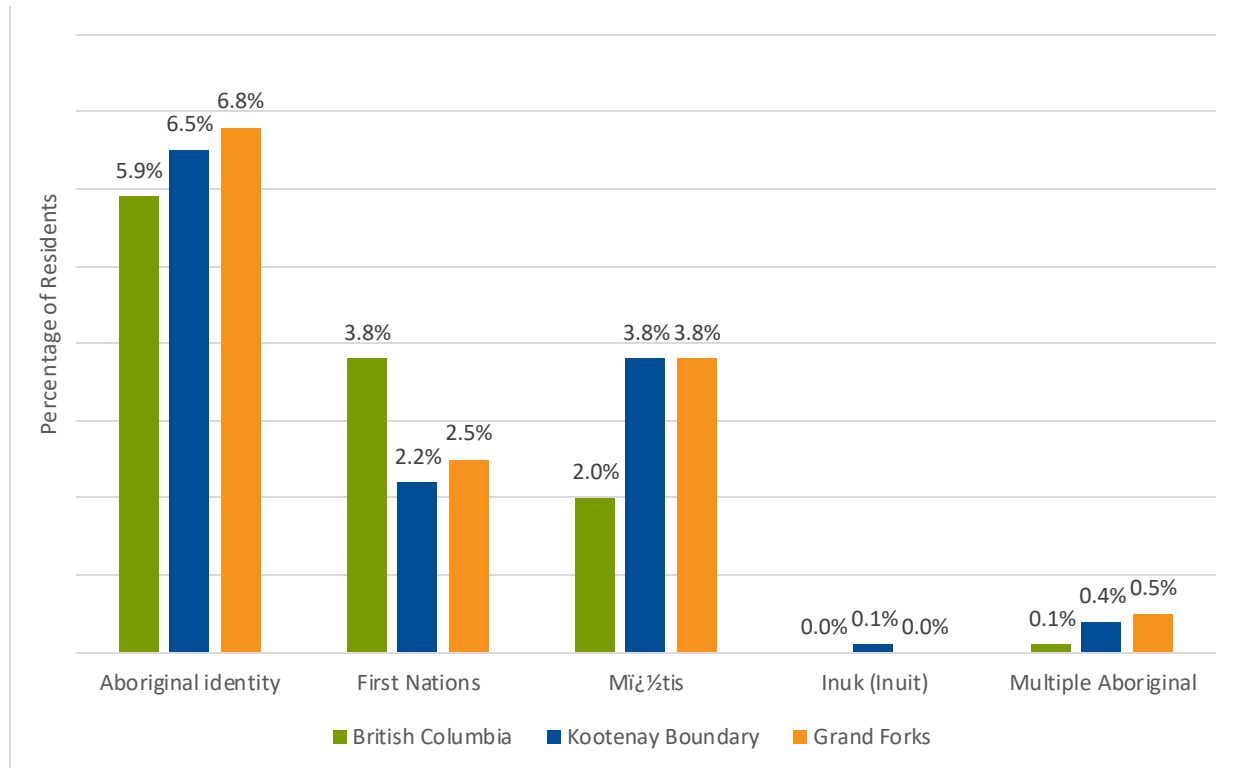
Language Spoken Most Often at Home

	Grand Forks (2016)	Kootenay Boundary (2016)	British Columbia (2016)
English (%)	98.3	98.1	83.2
French (%)	0.1	0.4	0.4
Non-official languages (%)	1.6	1.5	16.4

Ethnic Origin



Aboriginal Identity



INFRASTRUCTURE

Infrastructure is the physical foundation for community well-being. Water, sewer, utilities, roads, and waste management are all critical for a functioning healthy municipality.

Water Services

Provider	City of Grand Forks
Average per capita demand (2015)³	data not available
Annual residential water rate (2018)	\$432

* For comparison, average per capita demand for BC is 494 litres (2016)⁴

Sewer Services

Provider	City of Grand Forks
Type of treatment	Secondary
Annual sewer rate (2018) (residential)	\$510
Annual sewer rate (2018) (industrial/commercial/institutional)	varies by type

Service Providers

Electric power	City of Grand Forks / Fortis BC
Natural gas	Fortis BC
Telecommunications⁵	Telus, Shaw, Xplornet, Bell, Rogers, Columbia Basin Broadband Corporation, China Creek Internet

Landfill & Waste Management

Landfill location	Grand Forks Regional Landfill
Regional District waste disposal rate (2016)⁶	612 kg/person/year
Type of service	Curbside garbage and food waste pick up and recycling drop-off

* For comparison, average per capita waste disposal rate for BC is 472 kg/person/year (2016)⁶

Traffic Volumes

Station location ⁷	Annual Average Daily Traffic	Monthly Average Daily Traffic	Monthly Average Daily Traffic
	(number of vehicles)	January	July
Route 3, 5.1 Km West of Route 3A, Castlegar (P-32-1EW)	2,272	1,413	3,342

BC Transit

Grand Forks is serviced by BC Transit's Boundary Transit System. This system includes one fixed-route, extending from Greenwood to Grand Forks with on-request pick-up and drop-off service.

HOUSING

Housing stock, diversity, availability, and costs are an important basic foundation to a functioning and affordable community. Several indicators related to housing are included in this community profile.^{1,8}

Dwellings by Structure

	Grand Forks (2016)	British Columbia (2016)
Total number of occupied private dwellings	1,865	1,881,970
Single-detached house	1,440	830,660
Apartment in a building that has 5 or more storeys	0	177,830
Other attached dwelling	375	824,190
Semi-detached house	30	830,660
Row house	135	147,830
Apartment or flat in duplex	10	230,075
Apartment in a building that has fewer than 5 storeys	205	385,140
Other single-attached house	0	3,755
Moveable dwelling	45	49,290

Dwellings by Period of Construction

	Grand Forks (2016)	British Columbia (2016)
Total number of occupied private dwellings	1,870	1,881,970
1960 or before	525	267,560
1961 to 1980	610	559,485
1981 to 1990	190	289,565
1991 to 2000	365	331,865
2001 to 2005	75	125,335
2006 to 2010	55	171,945
2011 to 2016	50	136,210
Private dwellings in need of major repairs	9.6%	6.3%

Residential Property Values

	Grand Forks (2018)	Columbia Basin-Boundary (2018)
Number of single family dwellings	1,352	45,145
\$0 to \$99,999	3.6%	2.0%
\$100,000 to \$199,999	29.6%	17.9%
\$200,000 to \$299,999	48.7%	31.3%
\$300,000 to \$399,999	16.0%	23.0%
\$400,000 to \$499,999	1.3%	13.4%
\$500,000 to \$599,999	0.7%	5.6%
\$600,000 and over	0.1%	6.7%
Median value of dwelling	\$228,400	\$295,600

* For comparison, the median value of dwellings for BC is \$500,874¹

Household Occupation

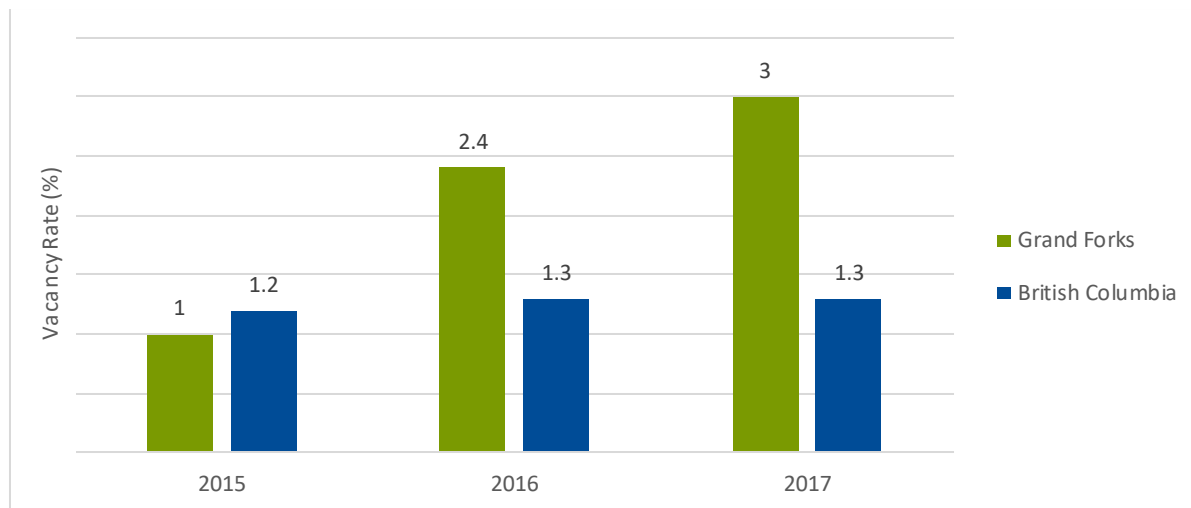
	Grand Forks (2016)	Kootenay Boundary (2016)	British Columbia (2016)
Private dwellings occupied by usual residents (%)	96	78	91
Private households who are owners (%)	79.4	80.2	68
Private households who are renters (%)	20.6	19.8	31.8

Housing Affordability

When more than 30% of a household's income is spent on shelter costs, the housing is deemed unaffordable. Shelter costs include electricity, oil, gas, wood, or other fuels, water and other municipal services, mortgage payments, property taxes, condominium fees, and rent. In Grand Forks, 18% of owner households and 42% of tenant households are spending more than 30% of their income on shelter related costs. For BC, the percentages are 21% of owner households and 43% of tenant households.

Vacancy Rates

Vacancy rates⁹ are an important indicator of the availability of affordable housing. A balanced vacancy rate is 3%.



INCOME

Income is a substantial determinant of personal well-being and income levels reflect economic opportunity.

Household Income

Before-tax (2015) household income ¹	Grand Forks		British Columbia		Canada	
	Number	%	Number	%	Number	%
Under \$5,000	35	1.9	43,415	2.3	228,790	1.6
\$5,000 to \$9,999	15	0.8	27,140	1.4	200,315	1.4
\$10,000 to \$14,999	60	3.2	55,745	3.0	374,575	2.7
\$15,000 to \$19,999	120	6.4	77,565	4.1	565,940	4.0
\$20,000 to \$29,999	235	12.6	151,680	8.1	1,141,510	8.1
\$30,000 to \$39,999	245	13.1	156,475	8.3	1,210,080	8.6
\$40,000 to \$49,999	240	12.9	152,635	8.1	1,174,435	8.3
\$50,000 to \$59,999	175	9.4	143,475	7.6	1,097,345	7.8
\$60,000 to \$79,999	270	14.5	255,195	13.6	1,934,735	13.7
\$80,000 to \$99,999	190	10.2	210,770	11.2	1,582,420	11.2
\$100,00 to \$124,999	135	7.2	198,140	10.5	1,470,255	10.4
\$125,000 to \$149,999	65	3.5	138,420	7.4	1,016,245	7.2
\$150,000 and over	80	4.3	271,290	14.4	2,075,425	14.7
Median	\$49,097		\$69,995		\$70,336	
Average	\$59,900		\$90,354		\$92,764	

Source of Income

Source of Income ¹⁰ (2015)	Grand Forks	British Columbia	Canada
Employment income (% taxfilers)	69.7	77.4	75.8
Self-employment income (% taxfilers)	17.9	17.8	15.6
Investment income (% taxfilers)	39.9	40.2	35.4
Employment insurance (% taxfilers)	12.7	11.5	13.8
Old Age Security / Net Federal Supplement (% taxfilers)	42.1	26.3	25.5
Canada Pension Plan/Quebec Pension Plan (% taxfilers)	54.0	32.6	32.4
Canada Child Tax Benefit (% taxfilers)	16.5	22.1	24.4
Workers compensation (% taxfilers)	6.1	4.2	3.5
Social assistance (% taxfilers)	7.4	6.6	9.2
Private pensions (% taxfilers)	36.1	21.6	21.2
RRSPs (% taxfilers)	4.7	2.7	2.4
Other income (% taxfilers)	23.1	27.8	26.0

Low Income Measure

The Low Income Measure (LIM) is a commonly-used indicator of poverty.¹¹ It is a fixed percentage (50%) of median adjusted household income, where “adjusted” means that household needs are taken into account. A family is considered to have low income when their income is below the LIM for their family type and size. According to 2015 taxfiler data, 15% of people in Grand Forks are considered to be low income. The provincial average is 15%.

LABOUR FORCE

Class of Worker & Occupation

	# Employees	%	# Self-employed	%	Occupation	#	%
Grand Forks (2016)¹	1,355	82	295	18	Management	190	11
					Business, finance & admin	150	9
					Natural & applied sciences	50	3
					Health	135	8
					Education, law & social, community & government	180	11
					Art, culture, recreation & sport	40	2
					Sales & service	400	24
					Trades, transport & equipment operators and related	320	19
					Natural resources, agriculture & related production	75	5
					Manufacturing & utilities	115	7

Regional District of Kootenay Boundary (2016)¹	12,225	85	2,165	15	Management	1,510	10
					Business, finance & admin	1,795	12
					Natural & applied sciences	770	5
					Health	1,205	8
					Education, law & social, community & government	1,320	9
					Art, culture, recreation & sport	375	3
					Sales & service	3,165	22
					Trades, transport & equipment operators and related	2,720	19
					Natural resources, agriculture & related production	615	4
					Manufacturing & utilities	920	6
					British Columbia (2016)¹	2,084,470	86
Business, finance & admin	368,940	15					
Natural & applied sciences	161,520	7					
Health	162,865	7					
Education, law & social, community & government	269,255	11					
Art, culture, recreation & sport	93,100	4					
Sales & service	595,225	25					
Trades, transport & equipment operators and related	360,970	15					
Natural resources, agriculture & related production	64,235	3					
Manufacturing & utilities	76,745	3					

Labour Force by Industry

Industry ¹ (2016)	Grand Forks %	British Columbia %	Canada %
Agriculture, forestry, fishing and hunting	5	3	2
Mining, quarrying, and oil and gas extraction	2	1	1
Utilities	1	1	1
Construction	9	8	7
Manufacturing	12	6	9
Wholesale trade	2	3	4
Retail trade	10	12	12
Transportation and warehousing	2	5	5

Information and cultural industries	2	3	2
Finance and insurance	3	4	4
Real estate and rental and leasing	2	2	2
Professional, scientific and technical services	3	8	7
Management of companies and enterprises	0	0	0
Administrative and support, waste management and remediation services	5	4	4
Educational services	5	7	7
Health care and social assistance	15	11	12
Arts, entertainment and recreation	1	2	2
Accommodation and food services	8	9	7
Other services (except public administration)	6	5	4
Public administration	5	5	6

Place of Work

Place ¹ (2016)	Grand Forks		British Columbia		Canada	
	Number	%	Number	%	Number	%
Worked at home	155	10	1,96,510	9	1,272,285	7
Worked outside Canada	0	0	16,040	1	78,815	0
No fixed workplace address	220	14	326,180	14	1,987,260	12
Worked at usual place	1,145	75	1,766,965	77	13,891,675	81

Commute to Work

Commute Duration ¹ (2016)	Grand Forks	British Columbia
	%	%
Less than 15 minutes	76.2	28.8
15 to 29 minutes	17.6	32.9
30 to 44 minutes	2.6	20.3
45 to 59 minutes	1.5	8.8
60 minutes or more	2.2	9.1

Unemployment

Unemployment rates are a strong indicator of economic health. Unemployment rates based on the 2016 Census are shown.¹ [Labour Force Survey](#) data is available at a regional scale and is updated more frequently.

	Total	Male	Female
Grand Forks	9.0	9.9	8.6
Regional District of Kootenay Boundary	7.9	8.7	6.9
British Columbia	6.7	7.1	6.3

Labour Force Replacement Ratio

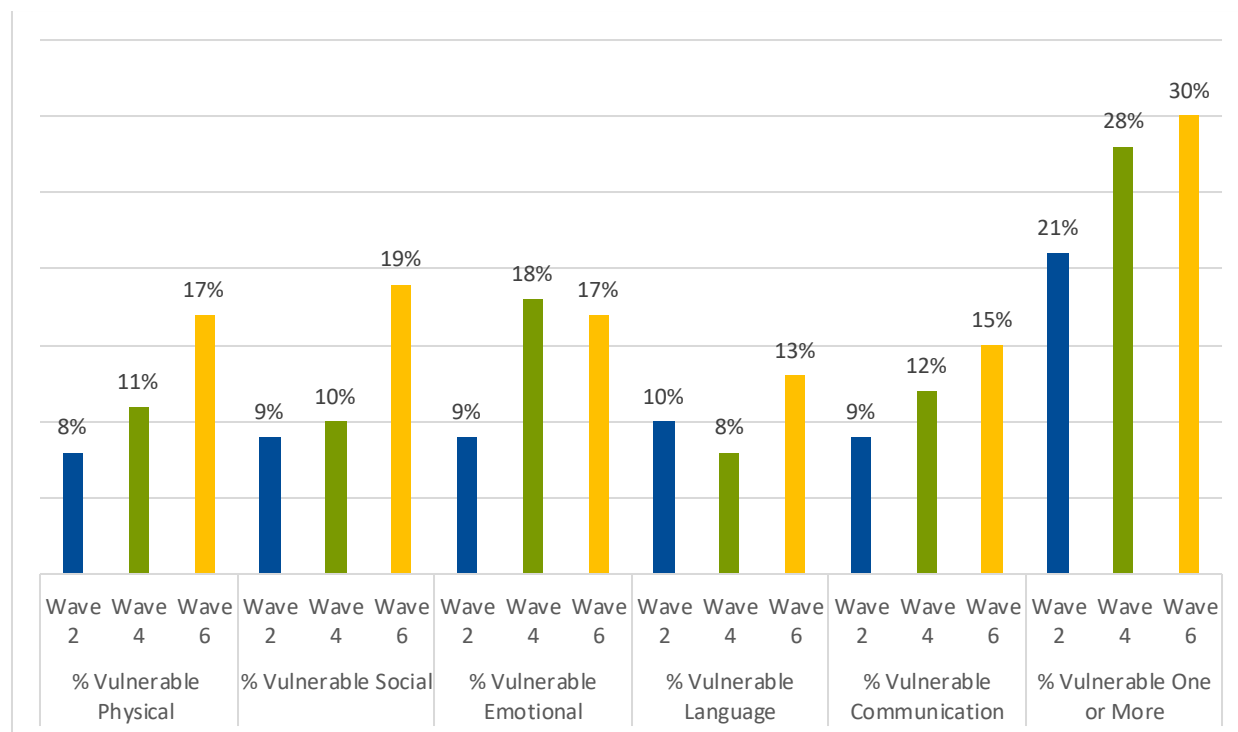
The Labour Force Replacement Ratio is a measure of the ratio of the number of people aged zero to 14 in 2016 who will be entering the workforce to the working population aged 50 to 64 who will be leaving the workforce in the next 15 years. A ratio of 1.0 means the child and retiree populations are the same. The higher the ratio, the greater the young people there are relative to potential retirees. A ratio of less than 1.0 means an area is unable to maintain the current labour force with local replacement workers. The ratio is calculated using the Census 2016 data.¹

Labour Force Replacement Ratio (2016)	
Grand Forks	0.53
Regional District of Kootenay Boundary	0.52
British Columbia	0.67

EDUCATION

Early Development Instrument

The early years are crucial in influencing a range of health and social outcomes. Research shows that many challenges in adults, including mental health and criminality, have their roots in early childhood. The Early Development Instrument (EDI) assesses the developmental readiness of children with an aim of identifying vulnerabilities. Vulnerability is reported by the percentage of children who are vulnerable on one or more scales as well as for each scale (physical, social, emotional, language, communication). Data is collected in “waves”; each wave is data from consecutive school years. EDI scores are available at the school district and neighborhood level.¹² The chart below shows the percentage of children vulnerable on each of the scales and vulnerable on one or more scales for the East Boundary neighborhood for Wave 2 (2004-2007), Wave 4 (2009-2011), and Wave 6 (2013-2016). For comparison, provincial data for Wave 6 shows that 32.2% of children are vulnerable on one or more scales.



Public School Enrolment

Grand Forks is in the Boundary School District (#51). Student enrolment¹³ measures the number of all adults and school-age persons who are enrolled in public schools and working towards graduation. Enrolment trends provide information about changes in the school-age population and is valuable for forecasting and planning.

	2012/13	2013/14	2014/15	2015/16	2016/17
Total student enrolment	1,317	1,285	1,271	1,268	1,295
Elementary student enrolment	818	797	760	755	772
Secondary school enrolment	498	487	510	513	523
Aboriginal students	387	381	364	360	379
English Language Learners	–	–	–	–	–
French Immersion	–	–	–	–	–
Non-residents	5	1	1	1	2

* Differences between total and elementary and secondary enrolments due to a small number of Graduated Adults

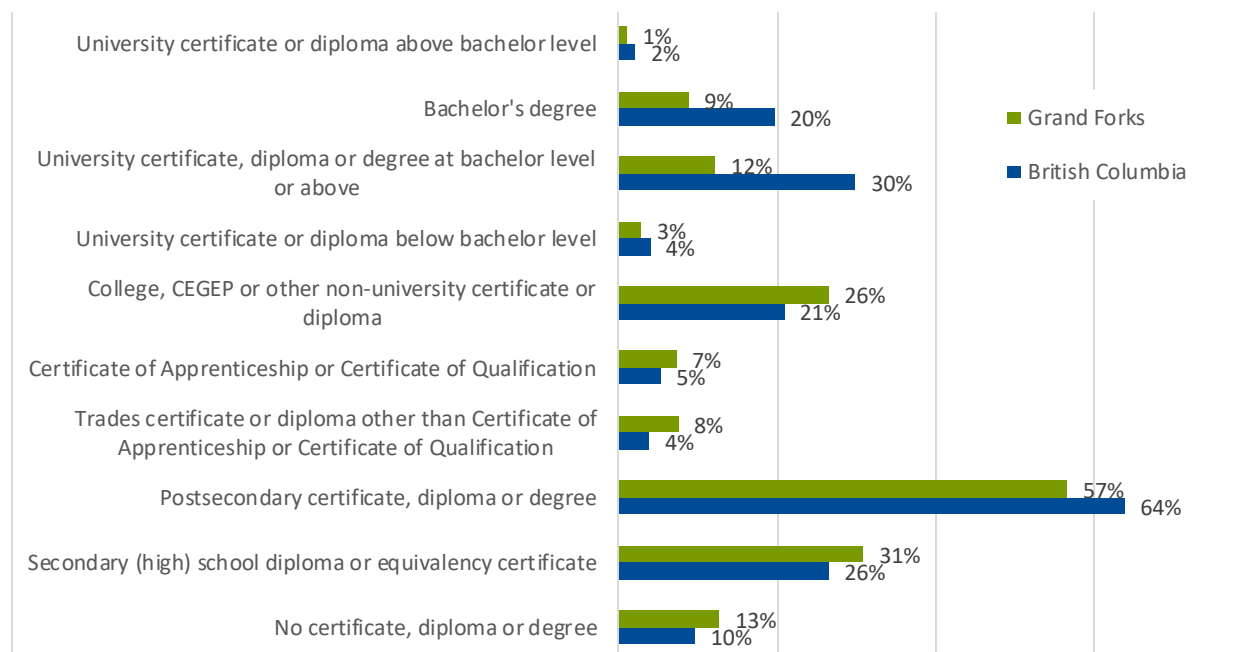
High School Completion

High school completion rates indicate how successful our families, schools, and communities are in supporting youth in achieving graduation. This indicator measures the proportion of students who graduate within six years of the first time they enroll in grade 8.¹³ High school graduation is generally a minimum education level for most employment and a foundation for positive workplace conditions and future employment success and well-being.

	2011/12	2012/13	2013/14	2014/15	2015/16	5-year average
Boundary (#51)	93.7%	82.1%	85.2%	84.4%	87.2%	86.5%
All BC Public Schools	81.8%	83.6%	84.2%	83.9%	83.6%	83.4%

Educational Attainment

Education levels are highly correlated with social determinants of health such as income, employment security, and socio-economic opportunity. This indicator measures the highest level of attainment of people aged 25 to 64 years.¹



QUALITY OF LIFE & CIVIC ENGAGEMENT

Life Expectancy

Life expectancy is a widely used indicator of population health, reporting on the number of years a person is expected to live based on mortality statistics for a Local Health Area (LHA).¹⁴ The average from 2011 to 2015 was analysed. The Grand Forks LHA has a life expectancy of 78.2 years. The BC life expectancy is 82.6 years.

Crime Severity Index

Crime rates are a common indicator of public safety. The police reported Crime Severity Index (CSI) includes all Criminal Code violations including traffic, as well as drug violations and all Federal Statutes.¹⁵ The CSI reports on the percent change in crime severity from year to year. A negative number means a decrease in the volume and severity of crime, while a positive number means an increase from one year to the next. The change from 2016 to 2017 for Boundary/Grand Forks is 16.2, while the CSI for BC is -5.1 between the last two years of data.

Voter Turnout

Voter turnout is an indicator of the health of a democracy, and can be seen as a reflection of civic mindedness and citizen engagement. This indicator measures the percentage of eligible voters who voted in local government elections for 2008, 2011, 2014 and 2018.¹⁶

	2008	2011	2014	2018
Grand Forks	49%	39%	52%	49%
Columbia Basin-Boundary average	51%	45%	41%	51%

Charitable Donations

Charitable donations¹⁷ play a role in improving well-being by providing support to a variety of initiatives. Charitable giving reflects a capacity to give, and is tied to the economy, where people may give more or less depending on their financial situation and the state of the economy.

Location (2015)	Total # taxfilers	Total charitable donors	Percent charitable donors	Total charitable donations (\$'000)	Median donation	Median income
Grand Forks	5,820	1,040	17.9%	\$1,355	\$300	\$45,210
Kootenay Boundary	23,630	5,290	22.4%	\$5,595	\$240	\$55,760
British Columbia	3,488,250	699,780	20.1%	\$1,448,625	\$430	\$58,010
Canada	26,186,760	5,495,900	21.0%	\$9,132,170	\$300	\$58,600

Public Library Usage

Libraries play an important role in the vibrancy of a community, as libraries are often a gathering place for residents where a diversity of programs and services are offered. Library statistics¹⁸ are useful for providing an indication of the health and capacity of these facilities in serving community needs and interests.

Indicator (2017)	Grand Forks & District Public Library	Average all libraries in Columbia Basin-Boundary
Population served	7,822	6,995
Total active cardholders as % of population served	40.3%	41.3%
Attendance at children's and young adult programs	2,861	3,320
Total employees, FTE	4.5	3.8
Volunteer hours worked	1,800	1,254
Number of in-person visits	73,702	42,805
Total visits per capita	11.5	8.4
Average hours open per week	46.0	38.5
Total local government support	\$381,800	\$239,789
Local government support per capita	\$48.81	\$35.10
Total other revenue	\$41,554	\$40,102

BUSINESS

Business Formations

Business formations measures the number of incorporations per year¹⁹, and is an indicator of the overall business climate, providing a sense of an expanding or contracting economy.

Year	Grand Forks	Kootenay Boundary	British Columbia
2013	9	77	32,225
2014	4	70	34,951
2015	7	58	37,934
2016	16	99	43,556
2017	15	96	46,247

Total Building Permits

This indicator measures the value of building permits issued annually by a defined region.²⁰ Building permits and housing starts are well-accepted indicators of economic performance.

Year	Grand Forks (\$'000)	British Columbia (\$'000)
2013	\$1,615	\$9,976,104
2014	\$3,799	\$11,076,715
2015	\$1,477	\$13,125,233
2016	\$2,715	\$13,255,024
2017	\$4,066	\$15,710,782

Building Permits by Type

Type ²⁰	Grand Forks (2017)	British Columbia (2017)
Residential (\$'000)	\$3,604	\$11,498,362
Commercial (\$'000)	\$182	\$2,439,623
Industrial (\$'000)	\$159	\$658,482
Institutional and Government (\$'000)	\$121	\$1,114,315
Residential (total number of units)	15	44,105

Visitor Centre Statistics

Visitor Centre Statistics²¹ are a common indicator of tourism, an economic sector for many communities.

Year	Total Visitors Grand Forks Visitor Centre	Change from previous year Grand Forks	Change for all visitor centres in BC
2013	7,523	-1.0%	-5.0%
2014	5,733	-23.8%	2.3%
2015	4,640	-19.1%	2.9%
2016	6,096	31.4%	-1.2%
2017	5,363	-12.0%	-0.5%

LOCAL GOVERNMENT

Local governments are required to submit data annually to the Ministry of Municipal Affairs and Housing, including annual reports and financial statements.²² Municipal revenues and expenses, and taxes on a representative house, provide an indication of a local government's capacity, financial needs and priorities, and costs to residents.

Municipal Revenues

	Grand Forks (2017)	% of Total Revenue
Total Own Purpose Taxation and Grants in Lieu	\$4,044,369	27.4%
Sale of Services	\$8,237,374	55.8%
Transfers from Federal Governments	\$0	0%
Transfers from Provincial Governments	\$1,800,380	12.2%
Transfers from Regional and Other Governments	\$482,641	3.3%
Investment Income	\$179,352	1.2%
Income from Government Business Enterprise	\$0	0%
Developer Contributions	\$0	0%
Disposition of Assets	\$7,200	0.0%
Other Revenue	\$0	0%
Total Revenue	\$14,751,316	

Municipal Expenses

	Grand Forks (2017)	% of Total Expenses
General Government	\$1,138,176	9.3%
Protective Services	\$938,988	7.6%
Solid Waste Management and Recycling	\$218,292	1.8%
Health, Social Services and Housing	\$79,663	0.6%
Development Services	\$388,270	3.2%
Transportation and Transit	\$1,066,561	8.7%
Parks, Recreation and Culture	\$1,086,758	8.8%
Water Services	\$717,973	5.9%
Sewer Services	\$791,202	6.4%
Other Services	\$4,085,016	33.2%
Amortization	\$1,775,155	14.4%
Other Adjustments	\$0	0%
Total Expenses	\$12,296,054	

Taxes & Charges on a Representative House

	Grand Forks (2018)
House value	\$221,592
School	\$550
General Municipal Total	\$1,085
Regional District	\$460
Hospital	\$61
BCA, MFA, and other	\$80
Total Residential Variable Rate Taxes	\$2,236
Total Residential Parcel Taxes	\$52
Total Residential User Fees	\$1,080
Total Residential Property Taxes and Charges	\$3,368

* A representative house is based on the assessment and occurrence of single family residential properties, and does not include vacant properties, multi-family, strata, etc.

ENVIRONMENT

The environment is a foundation for many aspects of well-being. Parks and protected areas help to safeguard wild spaces and species, and provide opportunity for residents and visitors to recreate and connect with nature. Weather and climate conditions and trends help us understand the context in which a community operates, and climate projections can help with forecasting and adaptive planning.

Parks & Protected Areas

Grand Forks has 8 provincial parks and protected areas within a 40 kilometer radius of the municipality. It also has at least 9 local parks and greenspaces within its boundaries.

Provincial Parks & Protected Areas^{23,24}	Boothman's Oxbow Park Boundary Creek Park Christina Lake Park Gilpin Grasslands Park Gladstone Prov. Park Jewel Lake Park Kettle River Rec. Area Rock Creek Park
Local Greenspaces²⁵	Angus MacDonald Park Barbara Ann Park Tennis Courts City Park Dick Bartlett Park Fireman's Expo Park George Massey Park Gyro Park James Donaldson Park Lois Haggen Park

Weather & Climate

Weather and climate data is based on the Government of Canada's climate normals and averages for the Grand Forks weather station.²⁶

	January	July
Daily average (°C)	-3.6	19.9
Daily maximum (°C)	-0.5	28.4
Daily minimum (°C)	-6.7	11.3
Extreme maximum (°C)	16.1 (1944)	42.2 (1941)
Extreme minimum (°C)	-38.9 (1962)	1.1 (1952)
Rainfall (mm)	16.6	39.3
Snowfall (cm)	36.5	0
Extreme daily rainfall (mm)	25.0 (1997)	47.8 (1975)
Extreme daily snowfall (cm)	40.6 (1962)	0 (1941)
Extreme snow depth (cm)	60 (1997)	0 (1981)

Modeled Climate Data – History & Projections

Climate data was modeled across the Columbia Basin-Boundary for a 10x10 km grid. The figures below show median values from results of 12 climate models for each time period and for low carbon and high carbon emission scenarios for the grid closest to Grand Forks.²⁷ Low carbon scenarios assume global greenhouse gas emissions are drastically reduced from current levels, while high carbon scenarios assume greenhouse gas emissions continue increasing at current rates.

Variable	Recent Past (1951 - 1980)	Near Future (2021 - 2050)		Far Future (2051 - 2080)	
		Low Carbon	High Carbon	Low Carbon	High Carbon
Annual mean temperature	7.5 °C	9.4 °C	9.7 °C	10.4 °C	11.6 °C
Annual total precipitation	457 mm	478 mm	471 mm	476 mm	492 mm

REFERENCES

1. Statistics Canada. Census Profile, 2016 Census. (2016). Available at: <https://www12.statcan.gc.ca/census-recensement/2016/dp-pd/prof/index.cfm?Lang=E>.
2. BC Stats. Sub-Provincial Population Projections. (2018). Available at: <https://www.bcstats.gov.bc.ca/apps/PopulationProjections.aspx>.
3. Columbia Basin Water Smart. Water Smart 2015 Data [custom data request]. (2016).
4. University of British Columbia. BC Municipal Water Survey 2016. *The Water Planning Lab at the School of Community and Regional Planning* (2016). Available at: <http://www.wpl.scarp.ubc.ca/bc-municipal-water-survey-2016/>.
5. Government of Canada. Who serves my area? (2018). Available at: <https://www.ic.gc.ca/app/sitt/bbmap/hm.html>.
6. Environmental Reporting BC. Municipal Solid Waste Disposal in BC (1990-2016). (2018). Available at: <http://www.env.gov.bc.ca/soe/indicators/sustainability/municipal-solid-waste.html>.
7. Ministry of Transportation and Infrastructure. Traffic Data Program. (2018). Available at: <https://www.th.gov.bc.ca/trafficData/>.
8. BC Assessment. Single Family Dwelling Residential Property Values by Assessment Area. (2018).
9. Canadian Mortgage and Housing Corporation. Vacancy Rates [custom data request]. (2018).
10. Statistics Canada: Income Statistics Division. Table F-6 Family data - Sources of Income by census family Type, 2015. (2015).
11. Statistics Canada. Table F-18 Family data - After-tax low income (based on after-tax low income measures, LIMs), 2015. (2016).
12. Human Early Learning Partnership. EDI Interactive Map. (2016). Available at: <http://earlylearning.ubc.ca/interactive-map/>.
13. BC Ministry of Education. District Reports. *Ministry of Education Reporting on K to 12* (2016). Available at: <http://www.bced.gov.bc.ca/reporting/district.php>.
14. BC Stats. Vital Statistics, Life Expectancy. (2018). Available at: <https://www2.gov.bc.ca/gov/content/data/statistics/people-population-community/population/vital-statistics>.
15. Statistics Canada. Crime severity index and weighted clearance rates, by police service, British Columbia. (2017). Available at: <http://www5.statcan.gc.ca/cansim/a21>.
16. Civic Info BC. Election Results. (2018). Available at: <http://www.civicinfo.bc.ca/election>.
17. Statistics Canada: Income Statistics Division. Charitable Donations, 2015. Taxfiler (T1FF) - Financial Data and Charitable Donations. (2017).
18. Ministry of Education. British Columbia Public Library Statistics. *Libraries Branch* (2018). Available at: <https://catalogue.data.gov.bc.ca/dataset/bc-public-libraries-statistics-2002-present>.
19. BC Stats. Business Formations and Failures. (2018). Available at: <https://www2.gov.bc.ca/gov/content/data/statistics/economy/business-formations-failures>.
20. BC Stats. Building Permits, Housing Starts and Sales. (2018). Available at: <https://www2.gov.bc.ca/gov/content/data/statistics/economy/building-permits-housing-starts-sales>.
21. Destination British Columbia. Visitor Services Network Statistics Program, Year over Year Reports, 2013 to 2017. (2018). Available at: <https://www.networkstats.tourismbc.com/ReportDefinition.aspx>.
22. Province of British Columbia. Municipal General & Financial Statistics. (2018). Available at: <https://www2.gov.bc.ca/gov/content/governments/local-governments/facts-framework/statistics/statistics>.

-
23. Natural Resources Canada. Open Government Portal. (2018). Available at: <https://open.canada.ca/data/en/dataset?organization=nrcan-rncan#distribution>.
 24. Ministry of Environment and Climate Change. BC Parks Locator. *Parks and Planning Management. Data BC*. (2018). Available at: <https://catalogue.data.gov.bc.ca/dataset/bc-parks-locator>.
 25. Ministry of Forests Lands Natural Resource Operations & Rural Development. Local and Regional Greenspaces. *Data BC* (2018). Available at: <https://catalogue.data.gov.bc.ca/dataset/local-and-regional-greenspaces>.
 26. Government of Canada. Canadian Climate Normals 1981-2010 Station Data. (2018). Available at: http://climate.weather.gc.ca/climate_normals/results_1981_2010_e.html?stnID=1180&autofwd=1.
 27. Climate Resilience Consulting Ltd. Community Climate Datasets (custom). (2018).