

Local Health Area Profile

ARMSTRONG/SPALLUMCHEEN

2018

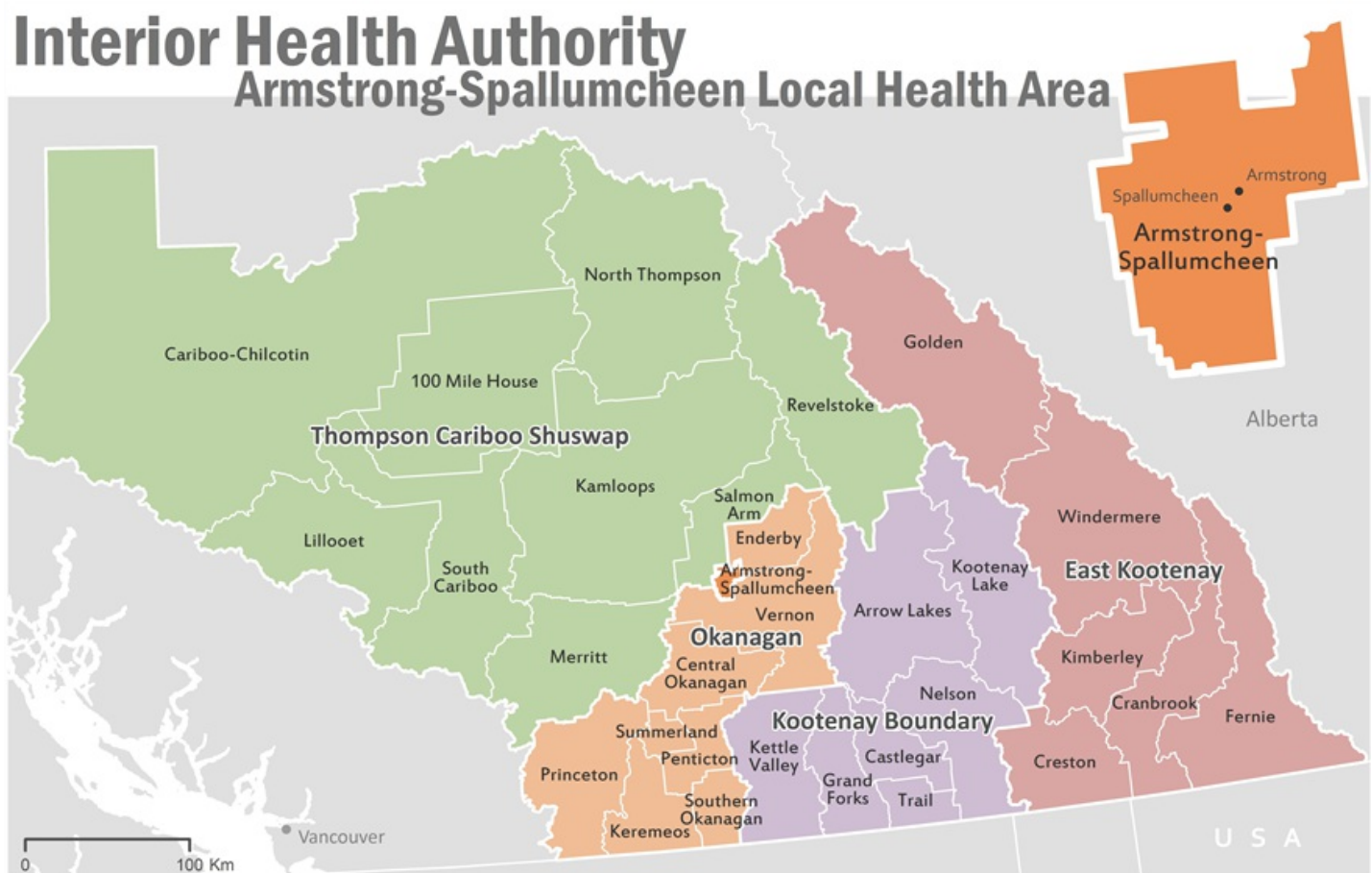
This profile provides an overview of the Armstrong/Spallumcheen Local Health Area population in the areas of:

**Population Health | Health & Social Status | Health System Performance
Home & Community Care | Healthy Behaviours**

The health indicators provided within this document are based on a conceptual framework developed by the Canadian Institute for Health Information (CIHI). This framework reflects the principle that health is not determined solely by medical care, but by a range of individual and population, social and economic factors.

The Interior Health Strategic Information department produces a number of utilization and service reports. In addition to this Local Health Area Population Profile, Health Service Delivery Area (HSDA), Interior Health Authority and Facility Profiles can be found on the Interior Health website at:

<https://www.interiorhealth.ca/AboutUs/QuickFacts/PopulationLocalAreaProfiles/Pages/default.aspx>



Population Health statistics provide information about past, present and future demographics, with breakdowns by age, sex and geographic region. These indicators include population counts, growth rates and densities, as well as vital statistics relating to births and deaths.

Figure 1: Population by Local Health Area, 2018

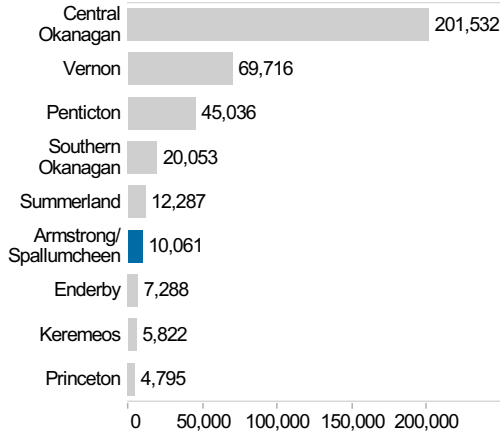


Figure 1: This graph compares Local Health Area populations within the Okanagan Health Service Delivery Area.
Source: PEOPLE 2018, BC Stats

Table 1: Population Density, 2018

| | |
|--------------------------|--------|
| Population | 10,061 |
| Area (Sq. Km) | 264 |
| Pop'n Density per Sq. Km | 39 |

Table 2: Population Growth, 2018-2023

| | |
|----------|-----|
| All Ages | 4% |
| Ages 65+ | 17% |
| Ages 75+ | 23% |
| Ages 85+ | 16% |

Table 1: Population density represents the number of people living within one square kilometre. Lower densities indicate more rural areas which typically have lower access to health services, while those living in urbanized areas with higher population densities typically have greater access to health services. The Interior Health population density is 3.5 people per Sq. Km which is lower than the BC density of 5.1 people per Sq. Km.
Source: Summary Statistics, PEOPLE 2018, BC Stats

Table 2: Population growth rates project the change in size of each age group over the next five years. These projections reflect a forecasting model that accounts for trends in migration, employment and past population change.
Source: PEOPLE 2018, BC Stats

Figure 2: Life Expectancy, 2011-2015

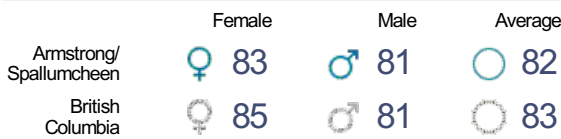


Figure 2: Life expectancy can be viewed as a gauge of population health. It measures average lifespan from birth, of persons currently residing in a particular health region. In some cases, blank values indicate limited data availability due to small populations.
Source: Deaths - Vital Statistics | Population - BC Stats (Prepared by BC Stats, Ministry of Technology, Innovation and Citizens' Services, June 2015)

Figure 3: Age Demographic Trends in Armstrong/Spallumcheen Local Health Area, 1991-2041

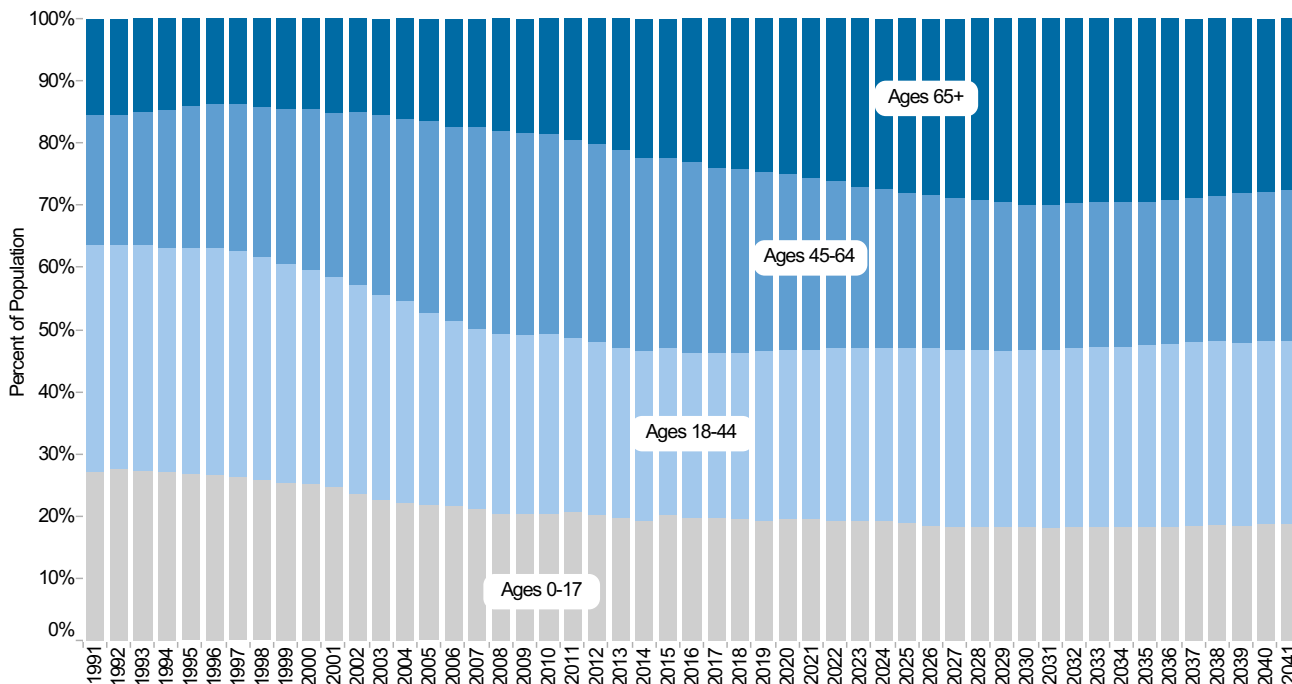


Figure 3: Demographic trends over 50 years estimate (1991-2017) and project (2018-2041) the fluctuation of age groups within a population. Overall trends across Interior Health indicate a growth in the population ages 65+ and a decline in the population under age 45 between 1991 and 2041.
Source: PEOPLE 2018, BC Stats..

Population Health information comes from Population Extrapolation for Organizational Planning with Less Error (PEOPLE), provided by BC Stats. This information includes estimates of past populations (1976-2017) and projections for future populations (2018-2041) based on migration, employment and growth trends.

Figure 4: Armstrong/Spallumcheen Local Health Area Population Pyramid, 2018

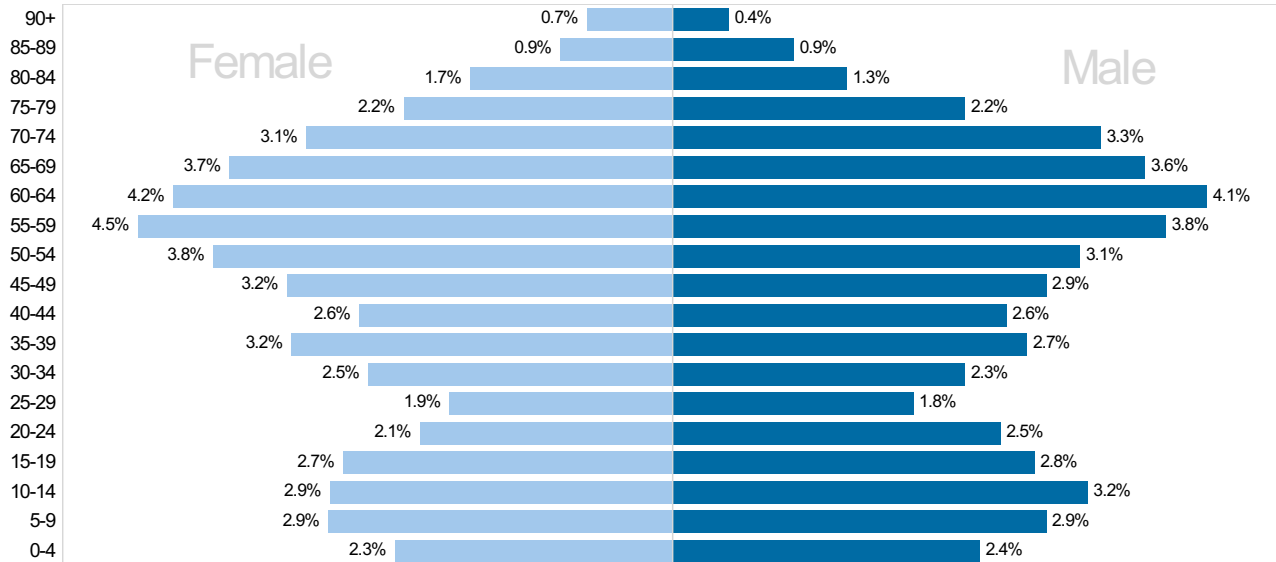


Figure 4: Population pyramids are commonly used by demographers to identify the age and gender make-up of a population. A pyramid with a wide base indicates a younger population, while a top heavy pyramid indicates an aging population with a longer life expectancy. The latter is becoming more common in developed nations with highly educated populations.

Source: PEOPLE 2018, BC Stats

Figure 5: Up-to-date Immunizations at 2 Yrs, 2018

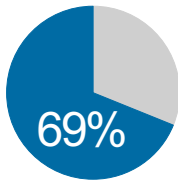


Figure 5: The proportion of children with up-to-date immunizations at 2 years of age. The current IH target for this measure is 76 percent. For details visit: <http://www.bccdc.ca/health-professionals/data-reports/childhood-immunization-coverage-dashboard>

Source: Panorama, BC Centre for Disease Control.

Figure 6: Median Age & Median Age at Death by LHA, 2018

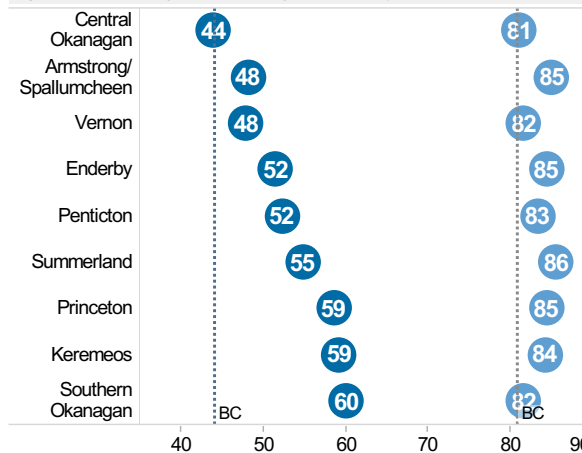


Figure 6: Median age and median age at death indicate the average age of a population compared to life expectancy in Local Health Areas across the Okanagan region. Differences in median age can be influenced by migration patterns. Median age at death varies by up to seven years depending on place of residence. This could be due to disparities in health, social, and economic conditions.

Source: Summary Statistics, PEOPLE 2018, BC Stats

Legend:
● Median Age at Death
● Median Age

Figure 7: Standardized Mortality Ratio by Cause of Death in Armstrong/Spallumcheen Local Health Area, 2011-2015



Figure 7: Standardized Mortality Ratio (SMR) compares the number of deaths that occurred in a geographic region to the expected number of deaths in that region, based on provincial age specific mortality rates.

Source: Table B - Mortality Statistics by Local Health Area, British Columbia 2011-2015, Annual Report 2015, BC Vital Statistics Agency

Health & Social Status provides a snapshot of indicators that reflect health and environmental conditions experienced by people across Interior Health. Some key indicators measure early childhood vulnerabilities, low birth weight, and chronic disease prevalence which represents a growing economic and health care concern.

Figure 8: Vulnerable Kindergarten Aged Children 2009/10-2015/16

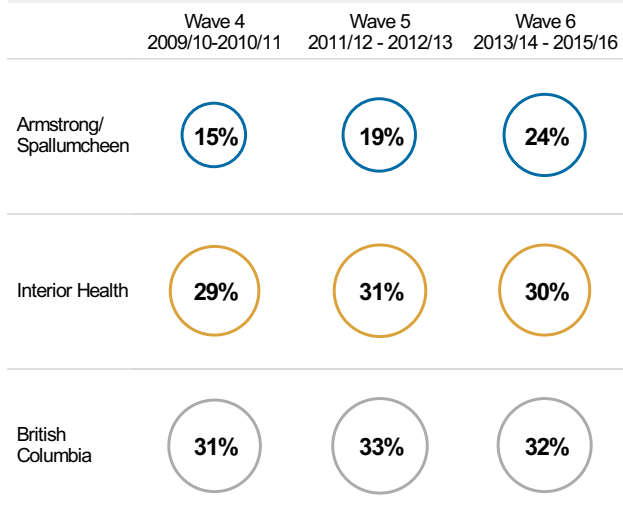


Figure 8: The Early Development Instrument (EDI) is a questionnaire that measures the vulnerability of kindergarten aged children across five domains including: Physical Health & Well Being, Social Competence, Emotional Maturity, Language & Cognitive Ability, Communication Skills & General Knowledge. 'Vulnerable kindergarten aged children' refers to the proportion of children who are identified as vulnerable in one or more domain(s). The EDI is reported in multi-year waves between 2004/05 and 2015/16. **Source:** Early Development Instrument, Human Early Learning Partnership, University of British Columbia, Waves 4-6, 2009/10-2015/16

Figure 9: Low Birth Weight per 1,000 Live Births, 2009-2015

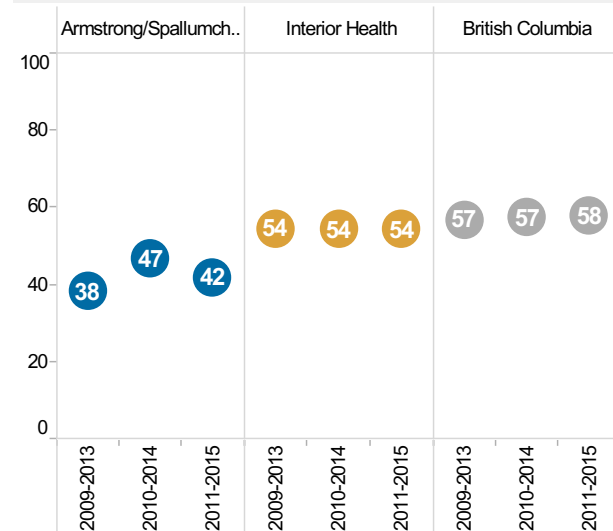


Figure 9: Low birth weight (LBW) per 1,000 live births measures newborns weighing less than 2500 grams over a five year period. Low birth weight is an important indicator of mortality, morbidity and disability in infancy and childhood. Risk factors associated with low birth weight include: socio-economic disadvantage, poor health and nutrition of women during pregnancy, smoking while pregnant, consumption of drugs and alcohol while pregnant, and experiencing abuse while pregnant. **Source:** Table A - Summary Statistics by Local Health Area, British Columbia, Annual Report 2013, 2014 & 2015, BC Vital Statistics Agency

Figure 10: Chronic Disease Crude Prevalence Rates in Armstrong/Spallumcheen Local Health Area, 2016/17

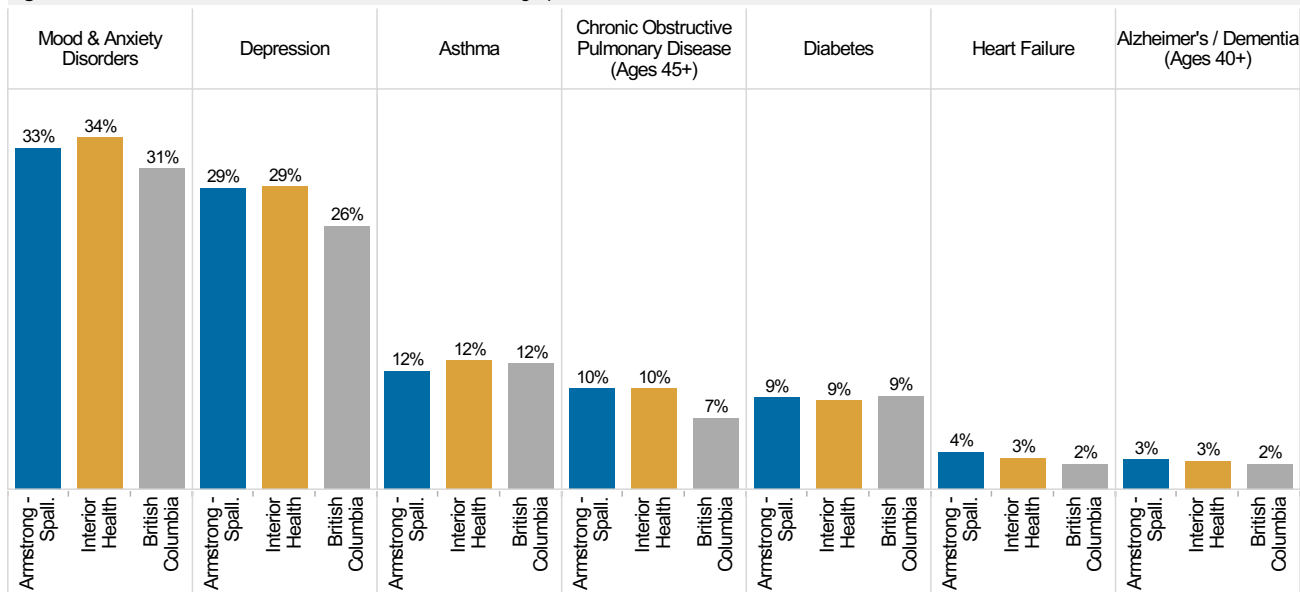


Figure 10: Chronic diseases are long-term conditions that usually progress slowly over time. The chronic diseases displayed above represent health conditions affecting many Interior Health residents over one year of age unless indicated otherwise. As the IH population ages, the prevalence of these diseases is expected to grow. The 2010 World Health Organization (WHO) Global status report on noncommunicable diseases identifies primary risk factors including: tobacco use, harmful use of alcohol, raised blood pressure, physical inactivity, raised cholesterol, obesity, unhealthy diet and raised blood glucose levels. **Source:** Chronic Disease Registry, Ministry of Health, 2016/17

Health System Performance indicators measure the quality of health care, with regard to health service access, efficiency and utilization. These indicators are often expressed as age standardized rates per 1,000 population. Age standardization facilitates comparisons of health care service use across a variety of geographic regions, and accounts for differences in age distribution between populations.

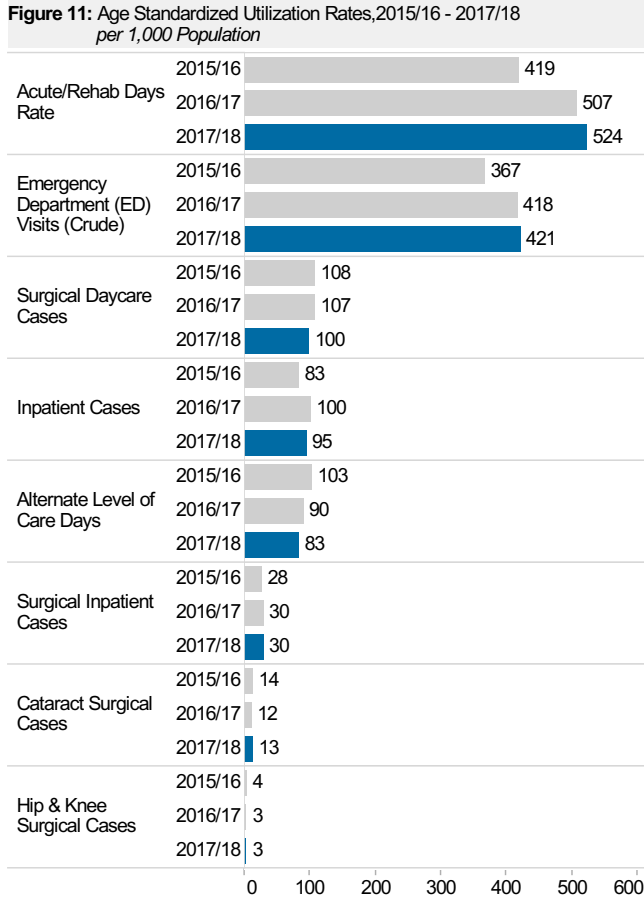


Figure 11: Age standardized utilization rates are used to compare health care service use across geographic regions with varying demographic profiles. These rates adjust for differences in the age breakdowns of each (newborns excluded). They represent rates that would be observed if the region's population experienced the same age specific utilization rates as the entire province. Note that the ED Visit rate is not age standardized and includes unscheduled visits to all EDs within a given LHA. **Sources:** Health Ideas Summary Reports, Ministry of Health | PEOPLE 2018, BC Stats

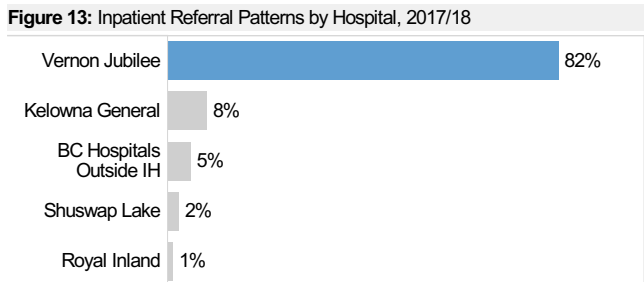


Figure 13: Inpatient referral patterns identify which hospitals Armstrong/Spallumcheen residents visit most frequently (excludes newborns). The length and colour of the horizontal bar shows the proportion of inpatients who travel from Armstrong/Spallumcheen to each facility or region. Note that totals may not add up to 100 per cent as only the most common hospitals are shown. **Source:** Discharge Abstracts Database (DAD), Ministry of Health, 2017/18

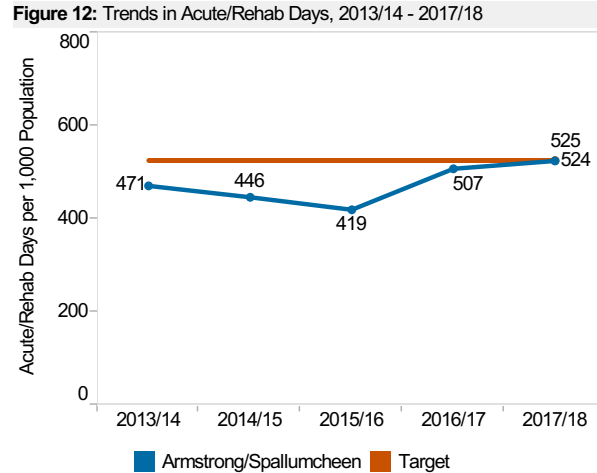


Figure 12: The age standardized Acute/Rehab days rate per 1,000 population and target rate indicate whether an LHA is performing as expected. Rates above the target tell us that residents of a given LHA used inpatient days at a higher rate than targeted. **Sources:** Health Ideas Summary Reports, Ministry of Health | PEOPLE 2018, BC Stats | Interior Health, Acute Care Roles Review, 2004

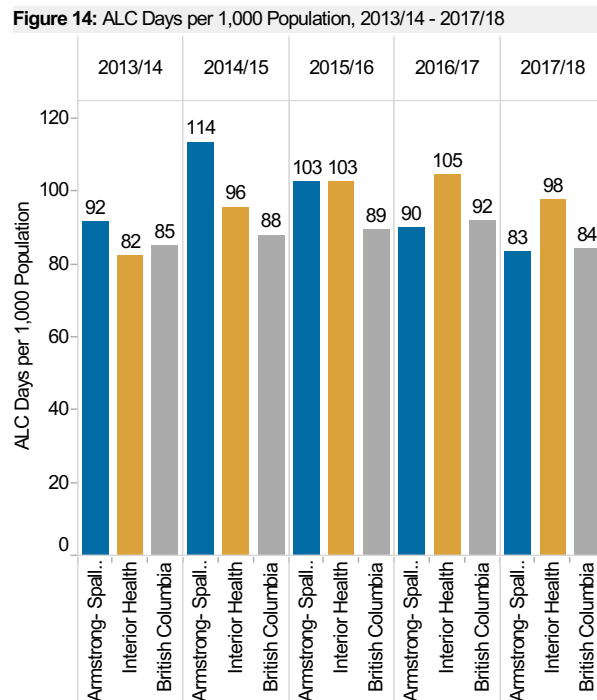


Figure 14: Alternate Level of Care (ALC) refers to the time that a patient spends in hospital after their acute care needs have been met. These patients remain in hospital due to a lack of other care options. ALC days are an important measure of the appropriate use of acute care resources. This figure facilitates comparison between Local Health Area, Interior Health and Provincial ALC day rates per 1,000 population. **Sources:** Health Ideas Summary Reports, Ministry of Health | PEOPLE 2018, BC Stats

Home & Community Care indicators represent Long-term Care and Home Health services provided by Interior Health. Home and Community Care offers a variety of at-home and community services to people with acute, chronic, palliative or rehabilitative health care needs. IH supports a philosophy that home, with appropriate supports, is the best place to recover from illness and injury, manage chronic conditions and live out final days.

Figure 15: Assisted Living, Long-term Care & Short Stay Beds, 2015/16 - 2017/18

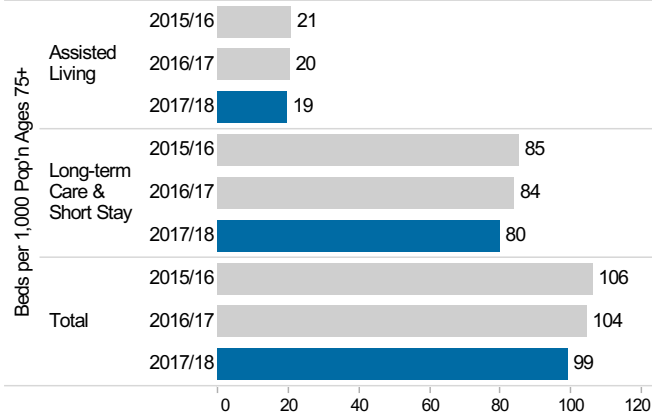


Figure 15: All bed rates include permanent and temporary beds, and reflect the population ages 75+. Long-term care and short stay beds exclude family care and group home beds. Long-term care short stay beds include convalescent, respite, end of life and flex beds.

Source: Long-term Care Bed Inventory | PEOPLE 2018, BC Stats

Table 3: Home & Community Care Quick Stats, 2015/16 - 2017/18

| | 2015/16 | 2016/17 | 2017/18 |
|---------------------------|---------|---------|---------|
| Case Managed Clients | 12 | 19 | 20 |
| Case Managed Visits | 36 | 79 | 61 |
| Community Rehab Clients | 17 | 17 | 19 |
| Community Rehab Visits | 80 | 89 | 110 |
| Home Care Nursing Clients | 28 | 34 | 38 |
| Home Care Nursing Visits | 336 | 421 | 459 |
| Adult Day Service Clients | 32 | 32 | 30 |
| Adult Day Service Days | 1,128 | 1,087 | 1,315 |
| Assisted Living Clients | 21 | 26 | 25 |
| Assisted Living Days | 6,527 | 6,205 | 5,003 |
| Home Support Clients | 135 | 143 | 144 |
| Home Support Hours | 14,980 | 18,254 | 18,878 |
| Long-term Care Days | 31,759 | 31,173 | 29,650 |

Table 3: Home and community care measures are based on the number of clients, visits and days utilized per 1,000 population. Long-term care days include convalescent, respite, end of life and complex care. Home support rates include long term, short term and end of life care.

Source: HCC Universe | PEOPLE 2018, BC Stats

Healthy Behaviours

OKANAGAN
HEALTH SERVICE DELIVERY AREA

Health Behaviour indicators are derived from the Canadian Community Health Survey (CCHS), a cross-sectional survey about health status, health care utilization and determinants of health. CCHS indicators are self-reported by survey respondents. In some cases, data quality is compromised by small sample sizes. This information is only available by Health Service Delivery Area. Armstrong/Spallumcheen LHA is located within the Okanagan HSDA.

Figure 16: Health & Wellness Indicators, 2015 - 2016

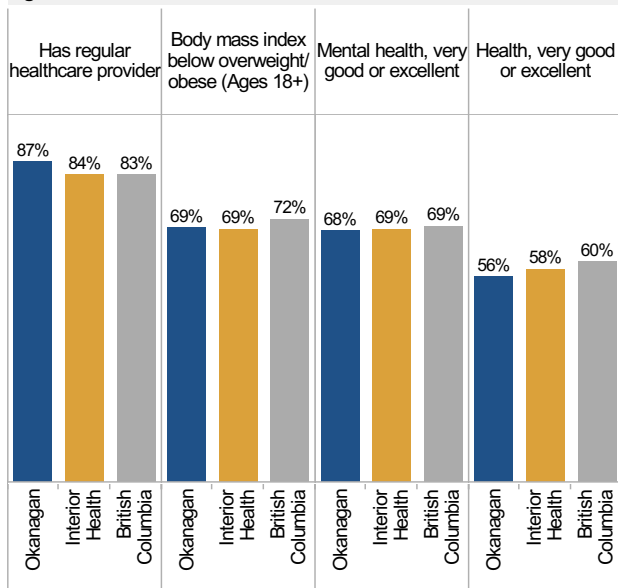


Figure 16: Health and wellness indicators provide self-reported information about the health of individuals ages 12 or older, unless stated otherwise.

Source: Canadian Community Health Survey 2015-2016, Table 105-0509, Statistics Canada

Figure 17: Unhealthy Behaviour Indicators, 2015 - 2016

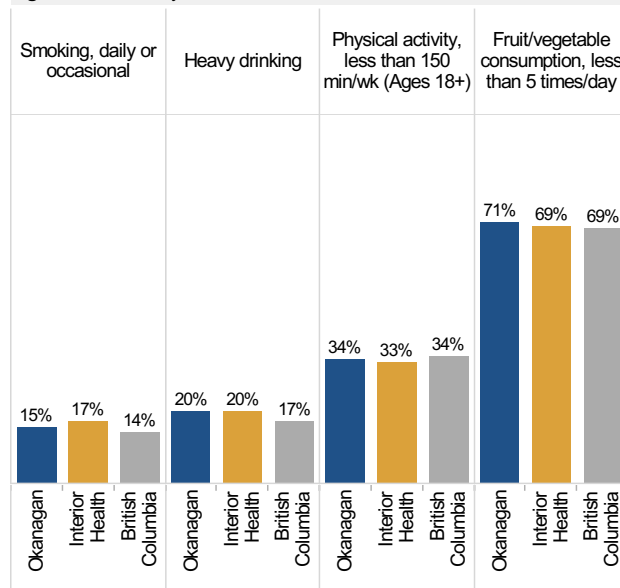


Figure 17: Unhealthy behaviour indicators provide self-reported information about individuals ages 12 or older, unless stated otherwise.

Source: Canadian Community Health Survey 2015-2016, Table 105-0509, Statistics Canada