

PHYSICAL HEALTH & WELL-BEING

INDICATOR #8 Dental Caries Prevalence

DEFINITION

INDICATOR #8 — Prevalence of dental caries among BC kindergarten students.

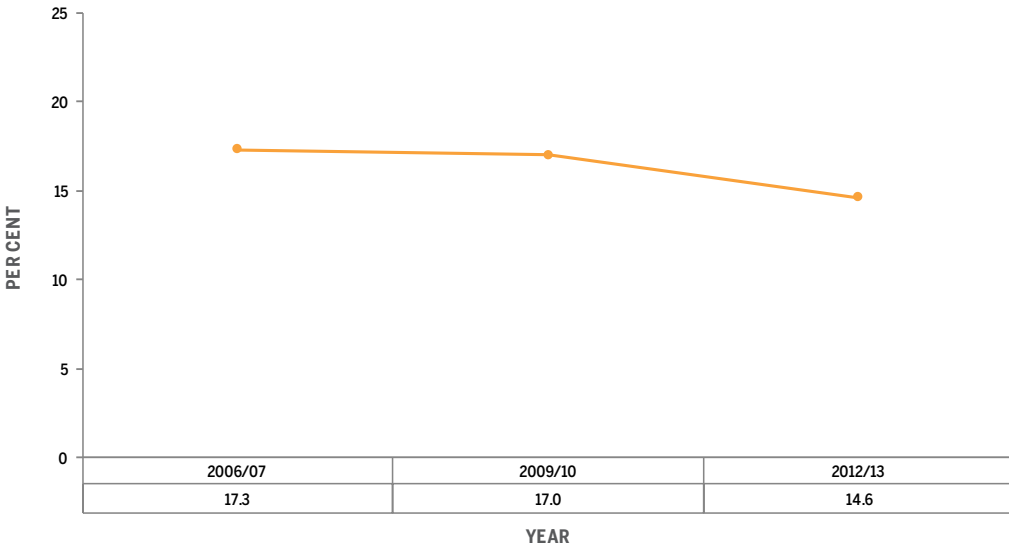
KEY MESSAGES

- ▶ Dental health is an important health issue for children and youth,¹ and **early childhood caries** are one of the most common, preventable childhood diseases.^{2,3}
- ▶ In studies of children under age six, early childhood caries have been linked to embarrassment, increased irritability, and fewer social interactions. Children’s oral health impacts their social functioning, economic productivity, and health later in life.⁴
- ▶ Population groups recognized to be at higher risk for childhood caries include children living in low-income families, children with parents with less than grade 12 education, Aboriginal children, some children of new immigrants and refugees, and children living in rural and remote areas.^{5,6}
- ▶ Access to preventive dental care and to treatment may be challenging for some families for a variety of reasons. People living in rural or remote communities have to travel farther to access care, or they may only receive preventive or treatment services when a health professional visits their community. Additionally, some families may find these services to be costly, as most dental services are provided by independent, private dentists remunerated on a fee-for-service basis and through private insurance. The BC Healthy Kids Program subsidizes the cost of basic dental care and other health needs for low-income families who qualify for Medical Services Plan (MSP) premium assistance.⁷
- ▶ Between 2010/11–2011/12 in British Columbia, 13.8 per 1,000 children age 1–5 required day surgery because of extensive dental caries.⁶ Treatment of dental caries is the leading cause of day surgery using a general anesthetic for children age 1–5, and costs more than \$3.5 million per year in BC.⁶
- ▶ The Provincial Kindergarten Dental Survey is conducted every three years across the province to estimate the prevalence of dental caries among children,⁸ with the most recent survey conducted in 2012/13.⁹ Trained staff visually assess a child’s mouth to determine if there is “visible” untreated decay.^{8,10} Some caries go unnoticed in a visual assessment, so the visible decay rate is a proxy for the prevalence of untreated caries.
- ▶ Figure 8.1 shows that from 2006/07 to 2012/13, the percentage of children in kindergarten with visible decay identified decreased, reflecting improvement across BC. This trend may be related to public health early intervention programs aimed

at improving the dental health of young children. Beginning in 2007/08, the Ministry of Health provided additional funding to health authorities to enhance early childhood dental health promotion initiatives and preventative services.⁸

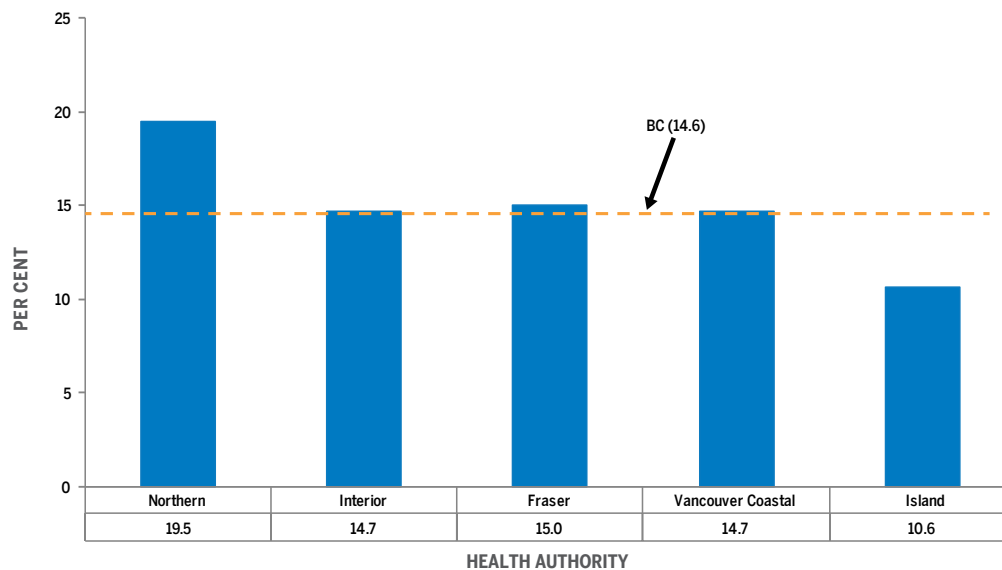
► Despite this overall improvement in results for kindergarten children, there are important geographic disparities. As shown in Figure 8.3, in 2012/13, the Northwest Health Service Delivery Area (HSDA) had the highest percentage of visible decay (23.5 per cent), followed by Richmond HSDA (21.5 per cent), and Fraser South HSDA (19.7 per cent). These percentages are considerably higher than the provincial average for visible decay (14.6 per cent).

FIG 8.1 Percentage of Kindergarten Children Showing Visible Tooth Decay, BC, 2006/07, 2009/10, and 2012/13



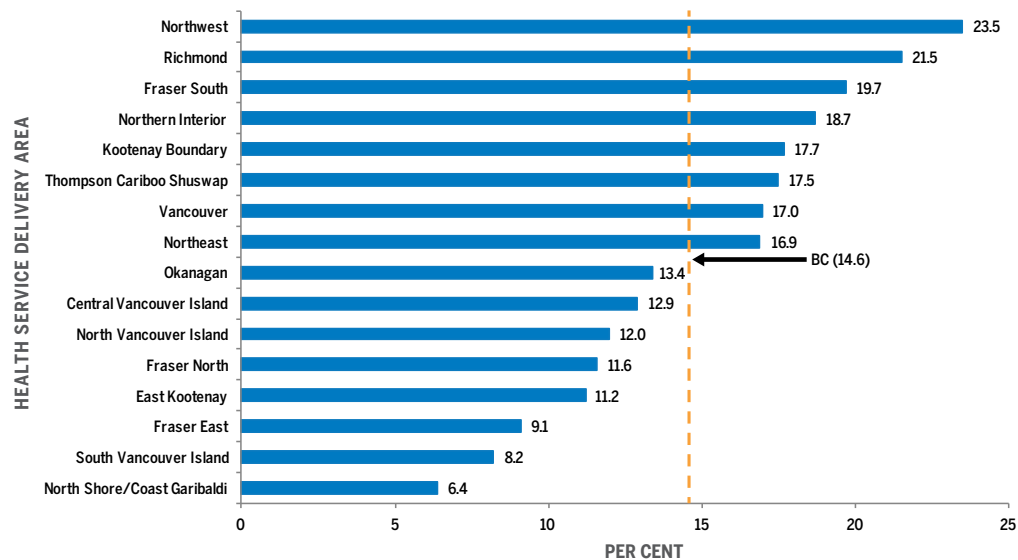
Note: Screening could have occurred at any time the child was age six or under.
Source: BC Ministry of Health, Population and Public Health. 2014. *Kindergarten Dental Screening 2012-13 Analysis*.⁹ Prepared by the Surveillance and Epidemiology Team, BC Office of the Provincial Health Officer, 2016.

FIG 8.2 Percentage of Kindergarten Children Showing Visible Tooth Decay, by Health Authority, BC, 2012/13



Notes: Screening could have occurred at any time the child was age six or under. Health authority is based on the location of the school district.
Source: BC Ministry of Health, Population and Public Health. 2014. *Kindergarten Dental Screening 2012-13 Analysis*.⁹ Prepared by the Surveillance and Epidemiology Team, BC Office of the Provincial Health Officer, 2016.

FIG 8.3 Percentage of Kindergarten Children Showing Visible Tooth Decay, by Health Service Delivery Area, BC, 2012/13



Notes: Screening could have occurred at any time the child was age six or under. Health service delivery area is based on the location of the school district.
Source: BC Ministry of Health, Population and Public Health. 2014. *Kindergarten Dental Screening 2012-13 Analysis*.⁹ Prepared by the Surveillance and Epidemiology Team, BC Office of the Provincial Health Officer, 2016.

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