

# Diabetes in New Brunswick: 1998-2007 / In-Brief

Office of the Chief Medical Officer of Health

## Introduction

By 2016, the estimated health-care costs for New Brunswickers living with diabetes will be \$198 million per year, a 66.4% increase from 2000.<sup>1</sup> An aging population and a dramatic rise in obesity place New Brunswickers at increased risk of developing the disease.

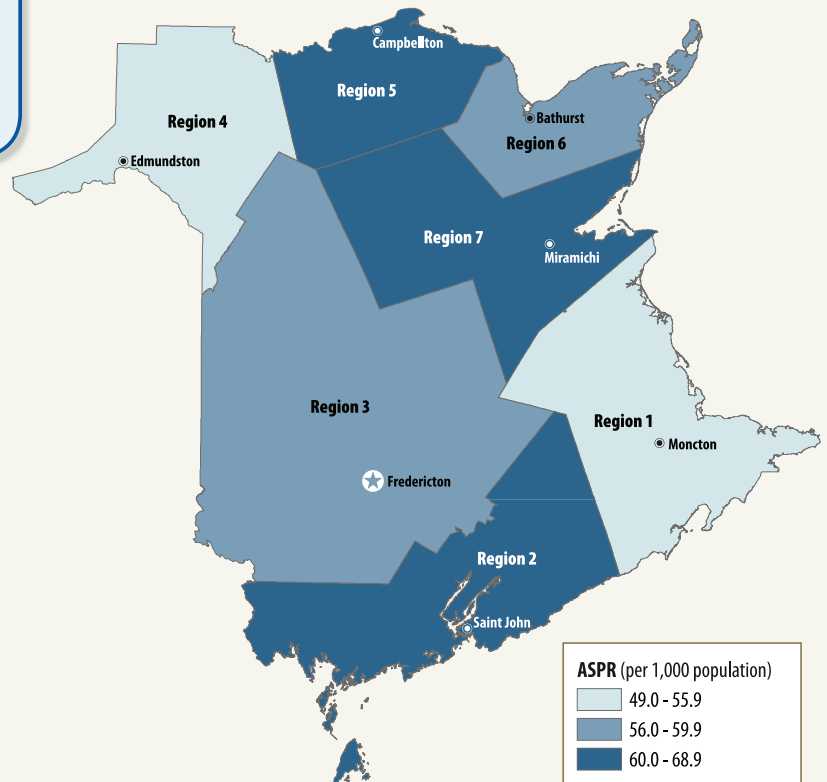
The Canadian Chronic Disease Surveillance System, a collaborative project between the Government of New Brunswick and the Public Health Agency of Canada, was used to extract information\* on the prevalence and incidence of diagnosed diabetes as well as on health-care utilization and hospitalizations for selected co-morbidities of diabetes. Statistics on gestational diabetes are also included.

To obtain a copy of the full report, visit our website at [www.gnb.ca/0051/pub/pdf/2010/diabetes\\_report\\_1998-2007-e.pdf](http://www.gnb.ca/0051/pub/pdf/2010/diabetes_report_1998-2007-e.pdf)

## Prevalence

*In 2007-08, after age standardization, prevalence rates of diagnosed diabetes were statistically higher in health regions 2, 5 and 7 and statistically lower in health regions 1 and 4 than the provincial rate.*

Age-standardized prevalence rates<sup>†</sup> of diagnosed diabetes, by health region, New Brunswick, 2007-08

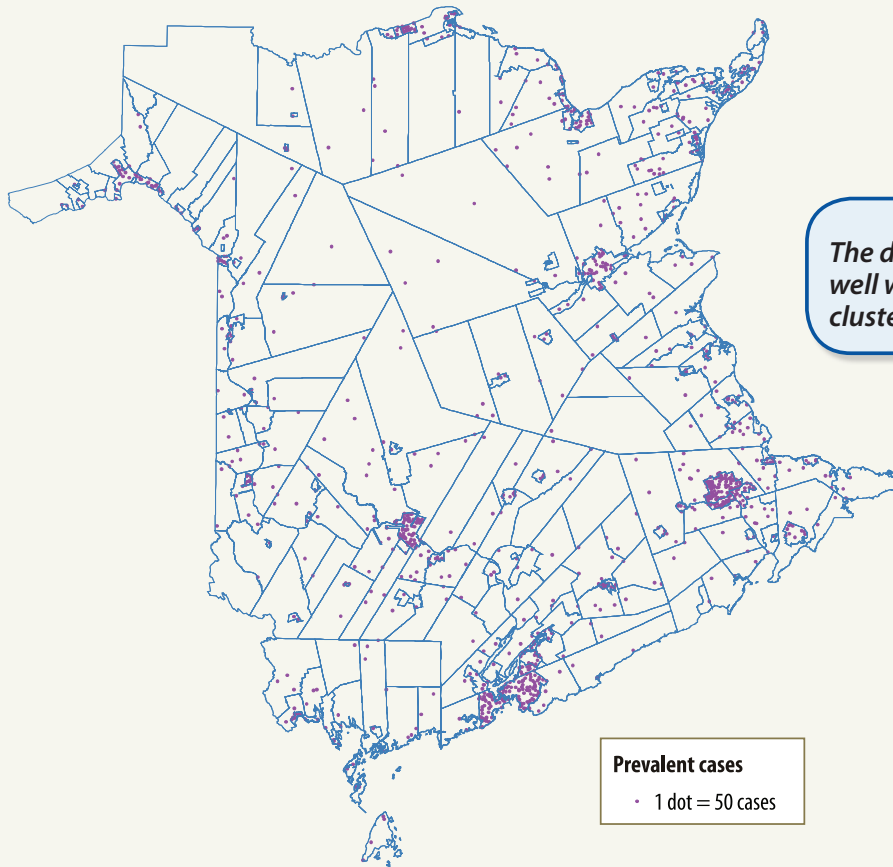


<sup>†</sup>Age-standardized to 1991 Canadian population.

<sup>1</sup>Ohinmaa A et al, "The projection of prevalence and cost of diabetes in Canada: 2000-2016". Can J Diabetes 2004 28(2): 1-8.

\*According to fiscal years.

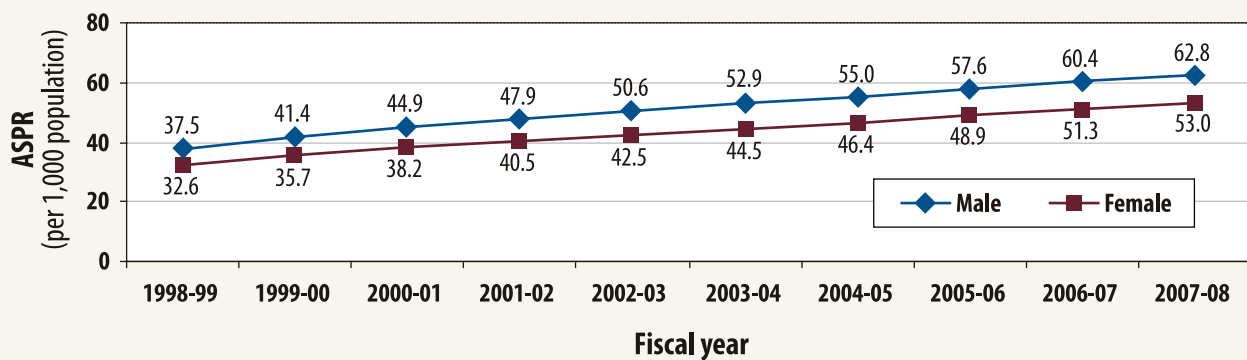
### Distribution of diagnosed diabetes cases, New Brunswick, 2007-08



*The distribution of diabetes cases corresponds well with population density and were clustered in the urban areas of the province.*

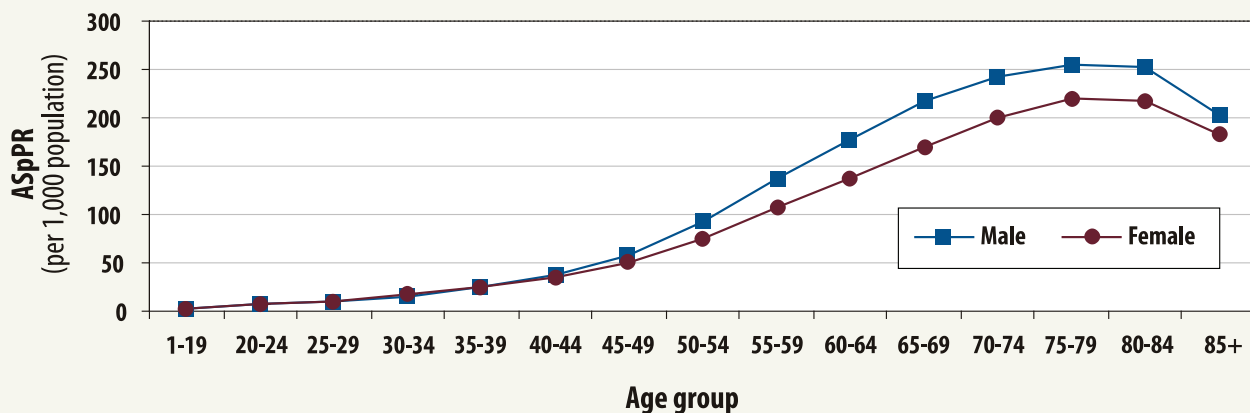
From 1998-99 to 2007-08, the age-standardized prevalence rate of diagnosed diabetes increased steadily. In 2007-08, 1 in 13 New Brunswickers lived with the disease, and it is predicted that by 2012-13 it will be 1 in 10.

### Age-standardized prevalence rates of diagnosed diabetes in individuals $\geq 1$ year old, New Brunswick, 1998-99 to 2007-08

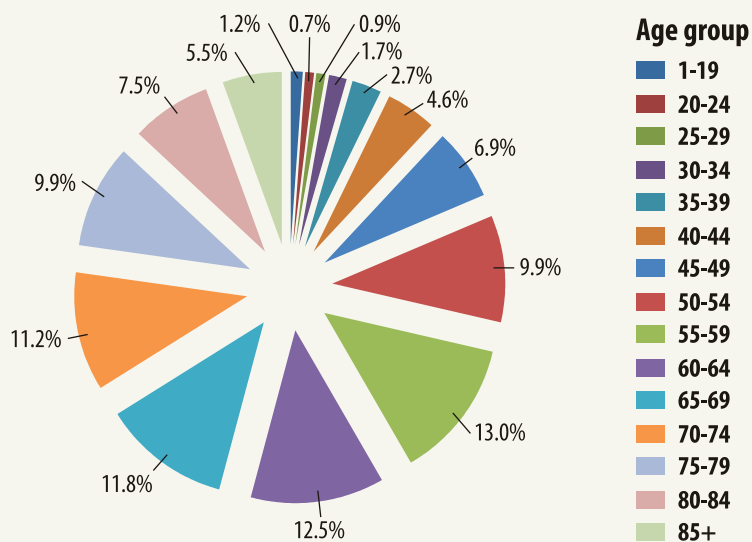


1 in 4 men and 1 in 5 women 70 to 84 years old lived with diagnosed diabetes.

**Age-specific prevalence rates of diagnosed diabetes in individuals  $\geq 1$  year old, New Brunswick, 2003-04 to 2007-08**



**Percentage distribution of prevalent cases of diagnosed diabetes, by age group, New Brunswick, 2003-04 to 2007-08**



About 2 in 3 individuals with diagnosed diabetes were 50 to 79 years old.

## Health-care utilization

Individuals with diabetes consumed more health-care resources than those who did not have the disease. They accounted for about 27% of total hospital care days during the period 2003-04 to 2007-08. Compared with people without diagnosed diabetes, individuals with the disease were:

- 1.7 times more likely to visit family physicians;
- 2.4 times more likely to visit specialists;
- 3.3 times more likely to be hospitalized and, when in hospital stayed 3.4 times longer.

## Incidence

From 2003-04 to 2007-08, an average of 4,887 new cases of diabetes were diagnosed each year in New Brunswick. Age-standardized incidence rates were statistically higher in health regions 5, 6 and 7 than the provincial average.

## Mortality

Individuals with diabetes were at increased risk of premature death. After controlling for age, individuals  $\geq 20$  years old with diagnosed diabetes were twice more likely to die early than those without the disease.

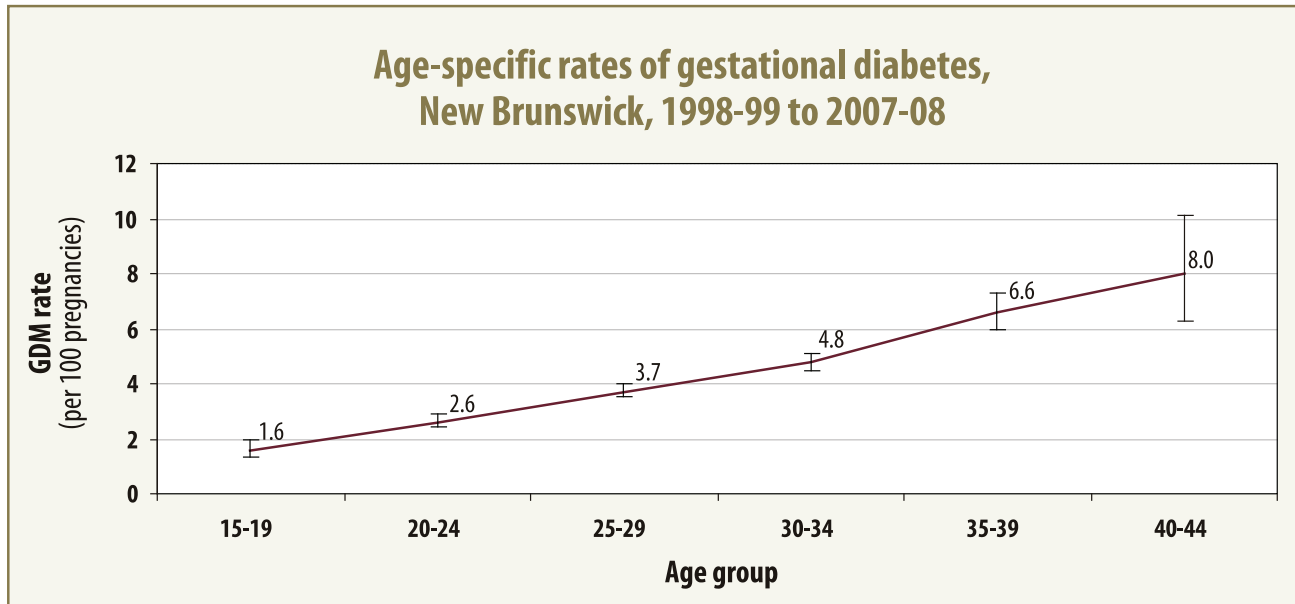
## Co-morbidities of diabetes

Compared to the general population, individuals with diagnosed diabetes were about:

- 3 times more likely to be hospitalized with cardiovascular disease;
- 7 times more likely to be hospitalized with chronic kidney disease;
- 15 times more likely to be hospitalized with lower limb amputations.

## Gestational diabetes

During the period 1998-99 to 2007-08, gestational diabetes (GDM) occurred in 3.6% to 4.2% of pregnancies. The GDM rate increased with age, at an average of about one percentage point per age group from the 15-19 to 30-34 year age groups, and it reached 8% in the 40-44 age group.



Women with GDM were more likely to develop type 2 diabetes later in life. About 1 in 9 females who were between 20 and 39 years old when first diagnosed with GDM developed type 2 diabetes within 5 years and 1 in 5 developed diabetes within 9 years.

## Diabetes in children and adolescents

The prevalence rate of diagnosed diabetes in New Brunswick's children and adolescents consistently increased from 1998-99 to 2007-08. In 2007-08, about 620 New Brunswickers 1 to 19 years old were living with the disease, a 12% increase from 2002-03. On average, 78 new cases were diagnosed each year during the 10-year period.

