

# Coverage of Capillary Blood Glucose Monitoring (CBG) Strips



## Background

Glucose monitoring gives people living with diabetes a more complete picture of their blood sugar levels, which can influence short- and long-term treatment decisions and improve health outcomes. It allows them and their health-care providers to assess glycemic status and adverse effects, and to determine the effectiveness of glucose-lowering therapies.

Glucose monitoring has the potential to improve blood sugar management and quality of life for people living with diabetes, resulting in physical, social, emotional, and functional benefits.

Capillary blood glucose monitoring (CBG, previously referred to as self-monitoring of blood glucose or SMBG) is one way for people living with diabetes to measure and assess their glucose levels. CBG uses a drop of blood from a finger prick to get a blood glucose reading using a blood glucose meter, or glucometer. Those with diabetes are advised to work with their care team to determine the frequency and pattern of testing that is right for them.

In Canada, CBG test strips cost, on average, \$0.79 each.<sup>1</sup> Reimbursement from the government for test strips is provided through provincial drug plans and is based on prescribed course of treatment, age, and income (see chart on page 2).

## Challenges

Public coverage varies across the country. Some provincial and territorial plans reimburse the entire cost of test strips for people who are eligible, and others provide little to no reimbursement at all. Every jurisdiction imposes eligibility criteria (e.g., age, income), which means that not all people who use test strips qualify for coverage. Diabetes Canada has developed **minimum reimbursement** recommendations for CBG test strips **based on an evidence review and the expertise of leading clinicians** across the country. New Brunswick, Prince Edward Island, and Newfoundland & Labrador lag behind the other provinces and the territories, as they do not meet the recommended minimum amounts for yearly coverage to support people's diabetes management.

## Policy Implications

The out-of-pocket cost of CBG test strips is very high for Canadians residing in provinces with limited coverage and/or co-pays and deductibles, and for those who do not meet the eligibility criteria for their provincial plan. Private insurance can help offset the cost of test strips, but approximately 30 per cent of Canadians do not have any.<sup>2</sup>

Those who cannot afford test strips may be unable to monitor their blood glucose according to best practice recommendations. An absence of CBG data can make it more difficult for people living with diabetes and their practitioners to properly identify and treat abnormal blood glucose levels, potentially leading to poorer outcomes. This can have very serious short and long-term effects and represents a burden to individuals, families, and Canadian society at large. Significant and unnecessary costs are incurred from lost productivity and high health-care system use secondary to diabetes and its complications.

## Recommendations

Diabetes Canada recommends that the provinces of New Brunswick, Prince Edward Island, and Newfoundland & Labrador provide reimbursement for CBG test **strips to meet or exceed Diabetes Canada's recommended yearly minimum quantity**. Eligibility clauses should allow exceptions without limits to the test strips coverage policy on a case-by-case basis, where clinically indicated. In every jurisdiction, where they are a barrier to access, co-pays and deductibles on test strips should be limited or eliminated. People living with diabetes across Canada should also have access to the education and supports they require that allow them to test with purpose and effectively self-manage their disease.

## References

1. Yeaw J, Lee WC, Wolden ML, et al. Cost of Self-Monitoring of Blood Glucose in Canada among Patients on an Insulin Regimen for Diabetes. *Diabetes Ther.* 2012;3(7):1-17.
2. Diabetes Canada. 2015 Report on Diabetes: Driving Change. Toronto, ON: Diabetes Canada, 2015.

# Coverage of CBG Test Strips Across Canada

	Diet/lifestyle	Oral medicines with <i>lower</i> risk of hypo	Oral medicines with <i>higher</i> risk of hypo	Insulin	Eligibility for additional CBG test strips
<b>Diabetes Canada recommended yearly minimum amount</b>	180	180	360	No limits; to be determined for each individual	Additional strips should be approved for clinically valid reasons on an individual basis
<b>Yearly maximum amount by province/territory</b>					
Yukon	As prescribed	As prescribed	As prescribed	As prescribed	No
<a href="#">Northwest Territories</a>	200	200	400	2,920	Prior approval must be obtained for quantities exceeding the maximum limit.
Nunavut	200	200	400	2,920	Prior approval must be obtained for quantities exceeding the maximum limit.
<a href="#">NIHB</a>	200	200	400	2,920	Prior approval must be obtained for quantities exceeding the maximum limit.
<a href="#">British Columbia</a>	200	200	400	3,000 (no CGM) 200 (with CGM)	Up to 100 more if approved by MD/HCP at DEC or MD/endocrinologist if on insulin.
<a href="#">Alberta</a>	200	200	400	3,000	No
<a href="#">Saskatchewan</a>	200	200	400	3,650	<a href="#">Up to 100 more if approved by MD/NP/pharmacist/CDE</a>
<a href="#">Manitoba</a>	200	200	400	3,650	Up to 100 more if approved by MD/NP.
<a href="#">Ontario</a>	200	200	400	3,000	<a href="#">100 more at a time if approved by MD/NP.</a>
Quebec	200	200	400	3,000	Up to 100 more if approved by HCP providing care.
<a href="#">New Brunswick</a>	50	100	As prescribed	As prescribed	Up to 2 requests of 50 more if approved by MD/NP (for diet/exercise & lower risk of hypo, else unlimited based on MD/NP recommendation).
<a href="#">Nova Scotia</a>	As prescribed	As prescribed	As prescribed	As prescribed	No
<a href="#">Prince Edward Island</a>	0	0	0	1,460 3,000*	No
<a href="#">Newfoundland &amp; Labrador</a>	51	102	102	Short acting: 2,550 Long-acting: 714	Up to 102 more for long-acting insulin users, 51 more for non-insulin users, unlimited for short acting insulin users if approved by HCP.

**NOTE:** \*Specific to pregnancy.

**Abbreviations:** CDE = certified diabetes educator; DEC = diabetes education centre; HCP = health-care provider; hypo = hypoglycemia; MD = medical doctor; NIHB = Non-Insured Health Benefits; NP = nurse practitioner.