

# Self-Monitoring Blood Glucose (SMBG)

## Frequency & Pattern Tool

<http://guidelines.diabetes.ca/bloodglucoselowering/smbgcalculator>

### Pattern Recommendation:

### Insulin pump

Typically given as a rapid-acting analogue (bolus) before each meal and a continuous rapid-acting insulin analogue throughout the day and night.

*SMBG at least as often as insulin is being given.*

- After meal testing is usually done 2 hours after the start of a meal.
- SMBG should be QID, pre-meal and bedtime in order to assess previous dose and to adjust next dose. Some patients find post-prandial checking can also be helpful.
- For people with type 2 diabetes, insulin pump therapy may be given in combination with non-secretagogue or injectable (GLP-1 analogue) medications.
- Insulin pump therapy would not typically be used in combination with secretagogue medications.

	breakfast		lunch		supper		bedtime	night
	before	after	before	after	before	after		
Insulin	rapid (bolus)		rapid (bolus)		rapid (bolus)			
	rapid (basal)							
SMBG pattern 1: Starting or Stable	SMBG test		SMBG test		SMBG test		SMBG test	
SMBG pattern 2: Stable Focus on post-meal BG	SMBG test	SMBG test		SMBG test		SMBG test		
SMBG pattern 3: Intensive management	SMBG test	SMBG test	SMBG test	SMBG test	SMBG test	SMBG test	SMBG test	SMBG test
Adjustment	Basal insulin (night)	Pre-breakfast bolus insulin ↑ if BG hi ↓ if BG low		Pre-lunch bolus insulin ↑ if BG hi ↓ if BG low		Pre-supper bolus insulin ↑ if BG hi ↓ if BG low		Basal insulin (night)
	↑ if BG hi ↓ if BG low	or adjust basal insulin (day)						↓ if BG low