Getting Started with Blood Glucose Monitoring

Why Should I Test My Blood Glucose?
It can help you learn:
- The connection between your blood glucose (BG) and your diabetes self-care (what, how much and when you eat, your activities, and how you take your diabetes medicines);
- How your BG may be related to the way you feel and that your BG can be too high even though you feel fine;
- How well your diabetes self- and health care plans are working.

It may also help:
- You keep focused on your diabetes and what you need to do;
- Your provider understand which parts of your diabetes care plan are working well and which are not.

What Should My BG Be?
A normal BG (in someone who does not have diabetes) is 70-100. BG levels change from minute to minute and some variation is normal...so that’s why there is a “range” which the BG should fall within. The American Diabetes Association recommends the following "target ranges" for most people with diabetes:
- Before meals: Under 130
- 1-2 hrs after starting to eat a meal: Under 160

Your range may be different, especially if you are pregnant or have other health issues. Your BG does not have to be "perfect", but for your diabetes to be well-controlled, your BG needs to be within your “target range” most of the time.

What Raises BG? Food, Illness, Stress, Some medicines
What Lowers BG? Physical activity, Antidiabetes medicines, Stress, Alcohol

When is the Best Time to Test?
It depends...on your diabetes, how it’s treated, and what you want to know. There is no “inaccurate” or bad time to test, but certain times are more helpful than others and these depend on your situation.

If you have type 2 diabetes, a fasting BG (first morning BG before eating or exercising) gives a general measure of your diabetes control. Testing after a meal
can help you see what portion of food your body can handle. If you take medicine for your diabetes, testing before or after certain meals helps us see if we have prescribed enough medicine. For now, we recommend you test as follows:

Test your BG ___ times a day/week:
- [ ] Before breakfast  [ ] 1-2 hours after breakfast
- [ ] Before lunch  [ ] 1-2 hours after lunch
- [ ] Before dinner  [ ] 1-2 hours after dinner
- [ ] At bedtime  [ ] Other____________________

Test more often if:
- You are ill;
- Your BG is frequently too high or too low;
- You wonder if your BG is too high or too low because of the way you feel;
- You have just started a new medicine; or
- You have changed your lifestyle.

What Do I Do With the Results?
- Keep a record of your results, along with the date, time, and whether it was before or after a meal. Bring it to your appointments and talk to your provider or diabetes educator about what the results mean.
- Look for patterns in your numbers and the meaning behind them. For example, is your before breakfast BG higher after eating later than usual the previous evening or after eating in a restaurant? Is your pre-lunch BG higher on the days you have a bagel for breakfast?
- Call your provider if your BG is under 60 or above 300 twice in one week.
- If your BG is much higher than usual:
  1. Recheck your BG, making sure you wash your hands and use the correct technique.
  2. If you wonder whether the test is accurate, check a control test.
     (Call the 800 toll-free phone number, listed on the back of your meter, for help with this.)
  3. Drink no calorie fluids, such as water, to help clear the glucose out of your body. If you feel well, you can exercise to bring your BG down. If your BG is over 300, don't exercise until your BG is under 300. If you take pills to control your diabetes, do not take more than your usual dose.
  4. If your BG is 300 or higher, recheck your BG about an hour later; if your BG is the same level or higher, call your provider for advice. If your BG is improving, but still high, continue with step 3, and limit how much carbohydrate (sugar and starch) you eat until your BG improves.

For other diabetes information, check our Web site at: www.amc.edu/diabetes