Gestational diabetes: why is it important for parents-to-be?

You might know about type 1 or type 2 diabetes, but did you know diabetes can develop during pregnancy? Diabetes during pregnancy is called gestational diabetes mellitus (GDM) and affects up to 10% of Americans each year. If a parent-to-be is diagnosed with GDM, it doesn’t mean that they had diabetes before getting pregnant, and it doesn’t necessarily mean they will still have diabetes after giving birth. (1, 2)

Like type 2 diabetes, insulin resistance causes GDM. Insulin is a hormone that helps control blood sugar levels by attaching to cells in the body. Insulin resistance occurs when cells do not respond normally to insulin. During pregnancy, hormonal changes, and weight gain to support the baby’s growth, can make cells less responsive to insulin and lead to insulin resistance. This means pregnant people may need more insulin to control blood sugar levels, and if they can’t produce enough, they may develop GDM. (1, 2)

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Gestational diabetes, continued

GDM can develop in anyone, but some people are at higher risk. Risk factors include:

- Age 25 or older
- GDM during a past pregnancy or a previous pregnancy with a baby over 9 pounds
- An immediate family member with type 2 diabetes
- Black, Hispanic, American Indian, or Asian American race or ethnicity
- Diagnosis of polycystic ovarian syndrome (PCOS), pre-diabetes, or BMI in the overweight/obese range before pregnancy

If effectively managed, GDM may resolve after giving birth. However, if not managed well, it can cause health complications for both the pregnant individual and the baby. Like other forms of diabetes, GDM can raise blood pressure, which in pregnant people, can cause a condition called preeclampsia. This condition can be life-threatening. GDM also increases lifetime risk for developing type 2 diabetes. For the baby, they can grow to be larger than normal if the pregnant parent’s blood sugar is too high, which can require higher risk medical interventions like cesarean sections. Additionally, the baby is more likely to be born prematurely, which can lead to breathing difficulties and other health problems. Like the pregnant person, the baby will be more likely to develop obesity and type 2 diabetes later in life.

Being diagnosed with GDM can be scary, but there are ways to manage it to reduce the risk of complications. For many parents-to-be, a nutritious diet and regular exercise can help manage GDM effectively.

Working with the healthcare team to create a nutrition plan focusing on diabetes-friendly foods, as well as the right timing and amounts to eat can help avoid spikes in blood sugar. Aiming for 30 minutes of physical activity at least five days a week can help keep blood sugar levels within the desired range and help lower high blood pressure and cholesterol caused by GDM.

Though lifestyle changes work for many, some may need additional support to manage their GDM. If diet and exercise are not enough to manage blood sugar levels, insulin may be prescribed. Insulin is proven to be safe for the baby and can effectively treat GDM. Healthcare providers can explain the different types of insulin and how to use them.

Make it a family affair

GDM can be scary, not just for the parent-to-be, but for the whole family. It can feel isolating for the pregnant parent, and it can introduce pressure and stress to manage the diabetes properly. Social and family support are crucial for managing GDM successfully. Research suggests that family support can boost a pregnant person’s confidence in managing GDM, leading to positive pregnancy outcomes. It is important that support isn’t just about telling the pregnant person what to do, but involves helping with management behaviors like exercise and following the prescribed diet. Having family meals that adhere to the prescribed diet and going on family walks each day can support the successful management of GDM and lead to a healthy family after pregnancy.
It is not all about how many hours of sleep you get, either. Sleep quality is important, too. Difficulty falling asleep or staying asleep, snoring, or waking often during the night may be signs your sleep quality is not at its best. Visit your healthcare provider if you are concerned that you are experiencing poor sleep quality.

If you struggle with getting enough sleep, you may benefit from building a sleep routine. Like other healthy habits, creating a routine around sleep makes you more likely to be successful in changing your habits.

- Work backwards from your wake-up time to decide what your bedtime will need to be. You might even set a reminder or an alarm to nudge you into bed in the evening.
- Take a few minutes to prepare for tomorrow; this might include making a to-do list so you fall asleep with a clear mind, laying out clothes for the next day, or setting your exercise gear out for a morning workout.
- Healthy sleep “don'ts:” avoid exposure to blue lights from electronics like TVs, laptops, or phones for about an hour before you plan to go to sleep. A common misconception is that alcohol helps with sleep, but it actually impairs sleep quality and results in less restful sleep. Avoid alcohol to enjoy a better night's sleep.

Creating a healthy sleep routine should have you waking up feeling rested and refreshed. You can also rest assured that it is beneficial for long-term health and is time well spent.
Strength training for life

Strength training – also called resistance training or muscle strengthening activity – has long been known as an important part of physical activity. It can strengthen bones and increase muscle mass. This is particularly important as we otherwise lose muscle mass as we grow older. It has additional benefits of improving balance and reducing fall risk. Health benefits from strength training occur across the lifespan and throughout all racial and ethnic groups. (7) Currently, less than one quarter of Americans get enough physical activity. (8)

Strength training includes any activity that causes the body's muscle to work against force or weight. Weight lifting is a well-known form of strength training. If you do not have access to a weight room, there are other ways to strength train. An alternative to using weights is using resistance bands, elasticized bands that increase the resistance against muscles. Resistance bands are often more affordable than weights, typically costing less than $10 per set.

We can do other strength activities using simply our own body weight without any equipment at all. Sit-ups, push-ups, certain yoga poses like planks or chair pose, or climbing stairs are examples of using body weight for strength training. Feel free to modify an exercise to suit your current abilities, such as doing standing push-ups while leaning against a wall as you build up your arm strength. As your strength increases, you can move your feet farther from the wall so your arms bear more weight.

The Physical Activity Guidelines for Americans recommend adults strength train at least two days per week, working all major muscle groups. Major muscle groups include the legs, hips, back, core, chest, shoulders, and arms. Those with injuries or physical limitations should work with their healthcare team to adapt their exercise program to their individual needs. A key message of the Physical Activity Guidelines is that no bout of activity is too small!

According to the Physical Activity Guidelines, muscle-strengthening activity has three components:

- **Intensity**: how much weight is used relative to how much the person can lift (think about ranking difficulty on a scale from 1-10);
- **Frequency**: how often the activity is performed; and
- **Sets and repetitions**: how many times the person lifts the weight.

Everyone can benefit from strength training. It may be even more important for certain population groups, like older adults and women. Recent research shows that women who do strength training 2–3 times per week have greater longevity and reduced risk of cardiovascular disease than women who do not. This study suggested that strength training might be particularly important for women because they tend to have lower lean body mass than men. (9)

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Strength training, continued

It is easy to feel intimidated by the idea of getting into a strength building routine. Keep in mind that it is all relative to your own body. The National Institutes of Health has an excellent free publication called Get Fit For Life that provides tips for incorporating physical activity in your wellness routines. A few tips to begin incorporating activity are:

- Start with small bouts of activity. Grab a can and do sets of bicep curls or squats while you wait for water to boil or the microwave timer to count down.

- Watch a video for ideas. Silver Sneakers has excellent YouTube videos with options to safely modify common exercises.

- Adapt moves as needed. Most strength activities can be adapted; for example, you may prefer to do abdominal exercises while standing instead of laying on the floor, or you may use a chair for balance.

- Look for support. Check with your insurance to see if you have any covered benefits for physical therapy or fitness memberships.

Recipe corner:

**New Orleans red beans**

1 pound dry red beans
2 quarts water
1 ½ cups chopped onion
1 cup chopped celery
4 bay leaves
1 cup chopped sweet green pepper
3 tablespoons chopped garlic
3 tablespoons chopped parsley
2 teaspoons dried thyme, crushed
1 teaspoon salt (optional)
1 teaspoon black pepper

1. Wash hands and assemble clean equipment.

2. Pick through beans to remove bad beans; rinse thoroughly. In a 5-quart pot, combine beans, water, onion, celery, and bay leaves.

3. Bring to boiling; reduce heat. Cover and cook over low heat for about 1 ½ hours or until beans are tender. Stir and mash beans against side of pan.

4. Add green pepper, garlic, parsley, thyme, salt and black pepper. Cook about 30 minutes, uncovered, over low heat until creamy. Remove bay leaves.

5. Serve over hot, cooked brown rice, if desired.

Makes 8 servings.

Nutrient Analysis (without rice): 171 calories, 32 g. carbohydrate, 10 g. protein, <1 g. fat, 0 mg. cholesterol, 7 g. fiber, 285 mg. sodium

Recipe source: Cooking for a Lifetime of Cancer Prevention
References


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Dear Friend,

Diabetes Life Lines is a quarterly publication sent to you by your local county Extension Agent.

It is written by an Extension Nutrition and Health Specialist and other health professionals from the University of Georgia. This newsletter brings you timely information on diabetes self-management, nutritious recipes, and news about important diabetes-related events.

If you would like more information, please contact your local county Extension Office.

Yours Truly,

County Extension Agent