

Healthy Living Can Prevent Almost Half of Gestational Diabetes Cases

According to a recent study, maintaining a healthy lifestyle can help pregnant women cut their risk of diabetes nearly in half.

The study, published in *The BMJ*¹ (formerly the *British Medical Journal*) in September 2014, examined the effect of four “low-risk” lifestyle factors — not smoking, eating healthily, exercising regularly, and keeping a healthy weight — on the incidence of diabetes during pregnancy.

Researchers analyzed the medical records of over 14,000 healthy pregnant women in the United States from a separate 1989-2001 study.² The records included information on weight, diet, exercise habits, and smoking status, along with gestational diabetes diagnoses. Diabetes was reported in 823 of the pregnancies.

48% less

— Estimated risk of developing gestational diabetes among women who don't smoke, exercise regularly, eat well, and maintain a healthy weight

83% less

— Estimated risk of developing gestational diabetes among women who followed all four healthy living criteria, compared to those who followed none of them

Using a mathematical formula, the researchers calculated that 48% of all gestational diabetes pregnancies could have been prevented if women followed all four of the low-risk lifestyle guidelines prior to pregnancy.

The study notes that being overweight or obese before pregnancy was the strongest individual risk factor for gestational diabetes. Women with a BMI above 33 were four times more likely to develop gestational diabetes than women who had a normal BMI before pregnancy.

Still, the study's authors write: “Our data suggest that, even among overweight or obese women, healthy diet and lifestyle was associated with a significantly lower risk of gestational diabetes.”

Criteria for diagnosing gestational diabetes have varied over the years, but the Centers for Disease Control and Prevention estimates that up to 10 percent of pregnancies are affected by gestational diabetes.

Risks Associated With Gestational Diabetes

- Gestational diabetes increases the chance of developing preeclampsia and hypertension during pregnancy.
- Gestational diabetes puts women at a much higher risk of developing type 2 diabetes in the following 10-20 years.
- High glucose levels in the blood are believed to cause the malformation of embryos, leading to increased risk of birth defects.
- Children born to mothers who had gestational diabetes are believed to be at a higher risk of becoming obese or intolerant to glucose.

¹*The BMJ* 349:g5450 (September 30, 2014): <http://dx.doi.org/10.1136/bmj.g5450>. Also see accompanying editorial “Unhealthy lifestyles and gestational diabetes” in *The BMJ*: <http://dx.doi.org/10.1136/bmj.g5549>

²The Nurses' Health Study II, United States (1989-2001) examined 14,437 women without chronic disease or a previous diagnosis of diabetes. The authors acknowledge that their data sample is not wholly representative of the population, as all of the participants were health professionals and predominantly white. The authors also note that “the prevalence of [obesity] among U.S. women of reproductive age was about 60% in the National Health and Nutrition Examination Survey 2007-08, but only 27% in the present study.”