

November/December 2017

What is PRAMS?

PRAMS (Pregnancy Risk Assessment Monitoring System) is a population-based risk factor surveillance system jointly sponsored by the Wyoming Department of Health and the Centers for Disease Control and Prevention (CDC). The purpose of PRAMS is to find out why some babies are born healthy and others are not. To do this, PRAMS asks a sample of Wyoming women who had a live birth infant in the past two to six months, questions about their experience and behaviors before, during, and shortly after pregnancy.

PRAMS Mission: To promote the collection, analysis, and dissemination of population-based data of high scientific quality and to support the use of data to develop policies and programs in order to decrease maternal and infant morbidity and mortality.

For more information about the WY PRAMS visit our website.

For more information about PRAMS including questionnaires, methodology, participating states, data to action and publications, visit the <u>CDC website</u>.

Diabetes and Pregnancy

Diabetes during pregnancy can cause serious problems for both the mother and fetus, including birth defects, high birth weight, and pregnancy complications (1). According to the National Center for Chronic Disease Prevention and Health Promotion at the Centers for Disease Control and Prevention (CDC), in 2015 an estimated 30.3 million people (9.4% of the total U.S. population) had diabetes (1-2). Of this total, approximately 23.1 million people were diagnosed while about 7.2 million cases, or 23.8%, were undiagnosed (2).

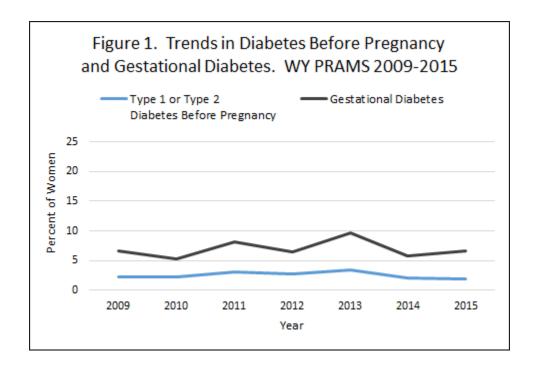
By contrast, crude prevalence rates from the Wyoming Behavioral Risk Factor Surveillance System show that in 2016, 8.1% of Wyoming women (aged 18+) reported that a doctor told them that they had diabetes. There has been no significant change in the rate of diabetes among women in Wyoming over the past five years with levels ranging from high of 8.7% (2013) to a low of 7.2% (2015).

There are three types of diabetes that can negatively impact pregnancy and birth outcomes for women: Type 1, Type 2, and gestational diabetes (1). Type 1 and Type 2 diabetes are conditions mothers have prior to pregnancy due to an autoimmune response or inefficient insulin use (3). Given the number of women of childbearing age who may have undiagnosed diabetes, the importance of preconception care should be emphasized. Preconception care can identify the presence of diabetes and other chronic conditions *before* pregnancy, giving women and their providers the tools that they need to improve future birth outcomes (4).

Some women will also experience Gestational Diabetes; diabetes first seen during pregnancy in women that have no prior history of diabetes. While most women who are diagnosed with gestational diabetes do not continue to have diabetes after delivery, in some cases, they develop Type 2 diabetes following birth. They are also at higher risk of developing Type 2 diabetes later in life (5).

Wyoming PRAMS Data: Diabetes Trends

Wyoming PRAMS data shows no significant changes in the rate of diabetes before pregnancy or gestational diabetes during pregnancy in Wyoming between the years 2009 and 2015 (Figure 1). In 2011, 3.1% of Wyoming women reported that they were diagnosed with diabetes before pregnancy; a proportion that is slightly higher than the 2.2% reported by other PRAMS states (6). Additionally in 2011, 8.1% of women sampled by PRAMS in Wyoming said that they were diagnosed with gestational diabetes during their pregnancy; Wyoming is lower than other PRAMS states (9.0%) for the same year (6). Readers are cautioned that small numbers of events can mean unstable rates.



Diabetes: Resources for Patients and Providers

The CDC has a number of resources for patients ranging from phone apps to infographics and podcasts.

The *Show Your Love* App is a free resource for women to guide them as they learn how to improve their health before pregnancy (preconception care). Created by the CDC Foundation and Anthem, this app is available for Android and iOS phones. Campaign materials for *Show Your Love* are also available (7).

For patients with Type 1 and Type 2 diabetes, the CDC has created a resource page with information about risks to the mom and baby, personal testimony about diabetes and pregnancy, and a chart clearly showing the potential risks of uncontrolled diabetes before and after pregnancy. Included are seven tips for women with diabetes that include links to other national resources and supports (8).

Finally, for women who have been diagnosed with gestational diabetes during their pregnancy, the CDC provides basic health information, tips for women who are diagnosed with gestational diabetes, and a podcast for download (9).

Providers who wish to learn more about Gestational Diabetes may be interested in the July 2017 Practice Bulletin #180 from The American Congress of Obstetricians and Gynecologists (ACOG), Gestational Diabetes Mellitus (10).

References:

- (1). CDC. Diabetes Home: About Diabetes. Accessed 11/21/2017 at https://www.cdc.gov/diabetes/basics/diabetes.html
- (2). CDC. National Diabetes Statistics Report. Accessed 11/21/2017 at https://www.cdc.gov/diabetes/data/statistics/statistics-report.html
- (3). CDC. Diabetes Home: About Diabetes. Accessed 11/21/2017 at https://www.cdc.gov/diabetes/basics/diabetes.html
- (4). CDC. Preconception Health and Health Care. Accessed 11/21/2017 at https://www.cdc.gov/preconception/index.html
- (5). CDC. Diabetes Home: Gestational Diabetes. Accessed 11/21/2017 at https://www.cdc.gov/diabetes/basics/gestational.html
- (6). CDC. PRAMStat System. Accessed 11/21/2017 at https://www.cdc.gov/prams/pramstat/index.html
- (7). Show Your Love App and Resources. Accessed 11/21/2017 at https://www.cdc.gov/preconception/showyourlove/index.html
- (8). Type 1 or Type 2 Diabetes and Pregnancy: Problems of Diabetes in Pregnancy. Accessed 11/21/2017 at https://www.cdc.gov/pregnancy/diabetes-types.html
- (9). Gestational Diabetes and Pregnancy. Accessed 11/21/2017 at https://www.cdc.gov/pregnancy/diabetes-gestational.html
- (10). Obstetrics & Gynecology Practice Bulletin No. 180: Gestational Diabetes Mellitus. Accessed 11/21/2017 at

http://journals.lww.com/greenjournal/fulltext/2017/07000/Practice Bulletin No 180 G estational_Diabetes.51.aspx

Our goal with WY PRAMS continues to be to:

- 1. To work with YOU to disseminate data from WY PRAMS
- 2. To inform WY stakeholders, programs, and policies.
- 3. To conduct and present analyses of WY PRAMS data pertaining to priorities of stakeholders and programs across the state.

If you would like more information please contact the WY PRAMS Project (wdh-wyprams@wyo.gov)

To Subscribe to the WY PRAMS Listserv: Please encourage anyone you feel would be interested in participating in PRAMS activities to subscribe to the Wyoming PRAMS Listserv. To subscribe, send an email to sympa@lists.health.wyo.gov. In the subject line of the email please type "subscribe wyoprams", and in the body of the email, please provide your first and last name.

To unsubscribe send an email to sympa@lists.health.wyo.gov. In the subject line of the email please type "unsubscribe wyoprams", and in the body of the email please provide your first name and last name.