

# Maternal GDM tied to child's cardiometabolic profile

November 22 2017

---



(HealthDay)—Teenage offspring of mothers with gestational diabetes

mellitus (GDM) have increased adiposity and an adverse cardiometabolic profile, according to a study published online Oct. 16 in *Diabetes Care*.

Louise G. Grunnet, Ph.D., from Rigshospitalet in Copenhagen, Denmark, and colleagues compared body composition and associated cardiometabolic traits among 561 9- to 16-year-old [offspring](#) of [mothers](#) with GDM and 597 control offspring.

The researchers found that offspring of mothers with GDM exhibited higher weight, body mass index (BMI), waist-to-hip ratio (WHR), systolic blood pressure, and resting heart rate, and lower height, after adjustment for age and sex. Higher total and abdominal fat percentages and lower muscle mass percentages were seen for offspring of mothers with GDM; after correction for offspring BMI, these differences disappeared. Higher fasting plasma glucose, insulin, C-peptide, homeostatic model assessment of insulin resistance (HOMA-IR), and plasma triglyceride levels were seen for offspring of mothers with GDM; they also had reduced fasting plasma high-density lipoprotein cholesterol levels. Compared with control offspring, female offspring of mothers with GDM had earlier onset of puberty. After adjustment for maternal prepregnancy BMI, offspring of mothers with GDM had significantly higher BMI, WHR, fasting glucose, and HOMA-IR; glucose and HOMA-IR remained elevated after correction for maternal and offspring BMI.

"Adolescent offspring of women with GDM show increased adiposity, an adverse cardiometabolic profile, and earlier onset of puberty among girls," the authors write.

One author disclosed financial ties to Novo Nordisk.

**More information:** [Abstract/Full Text \(subscription or payment may be required\)](#)

Copyright © 2017 [HealthDay](#). All rights reserved.

Citation: Maternal GDM tied to child's cardiometabolic profile (2017, November 22) retrieved 20 November 2023 from <https://medicalxpress.com/news/2017-11-maternal-gdm-tied-child-cardiometabolic.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.