

## Interventricular septal thickness as a diagnostic marker of fetal macrosomia

Authors: [Szmyd B](#)<sup>1,2</sup>, Karuga FF<sup>2</sup>, Biedrzycka M<sup>2</sup>, Rogut M<sup>2</sup>, Respondek-Liberska M, MD, PhD<sup>3,4</sup> (mentor)

<sup>1</sup>Department of Pediatrics, Oncology and Hematology, Medical University of Lodz, Poland

<sup>2</sup>Student's Scientific Association *Prenatal Cardiology*, Medical University of Lodz, Poland

<sup>3</sup>Department for Diagnoses and Prevention, Medical University of Lodz, Lodz, Poland

<sup>4</sup>Department of Prenatal Cardiology Polish Mother's Memorial Hospital, Lodz, Poland

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### Introduction:

Serious complications in both mother and child arising as a result of fetal macrosomia indicate the need for early diagnosis and prevention. Unfortunately, current predictors such as fetal biometry, fundal height and amniotic fluid index appear to be insufficient.

### Aim of the study:

Therefore, we decided to assess the predictive potential of interventricular septal thickness (IVST) as measured in  $\geq 33$  weeks of gestation.

### Material and methods:

299 patients met the inclusion criteria:  $\geq 33$  weeks of gestation and a complete medical history including all necessary measurements, namely IVST obtained by M-mode echocardiography, fetal biometry information and birth weight. Statistica 13.1 PL software was used to generate the receiver operating curve.

### Results:

46.43% of macrosomia cases were predicted based on fetal biometry abnormalities. IVST is a promising macrosomia predictor, with an area under the curve of 0.644 (0.525-0.762;  $p=0.0177$ ). Using the Youden index method, a cut-off point of 4.7mm was selected as the most optimal threshold for diagnosis, detecting up to 71.43% of cases.

### Conclusion:

IVST at  $\geq 4.7$ mm appears to have a higher sensitivity and NPV than ultrasound, which was reported both here and elsewhere

**Key words:** Fetal Macrosomia, Macrosomia, Interventricular Septal Thickness, Prenatal Cardiology