

Goldberg et al⁴ have shown that the interobserver variability of transvaginal ultrasound is lower than that of digital examination, which is a critical factor in day-to-day practice in a teaching hospital. Ultrasound examination is also subjected to quality control by checking ultrasound pictures of cervical length, which is easier and less unpleasant than repeating cervical digital examination.

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Reasons for Increasing Trends in Large for Gestational Age Births

To the Editor:

We read the October article on increasing trends in large for gestational age (LGA) births¹ with great interest as we, too, have been concerned about the impact of the increasing rates of maternal obesity on fetal outcomes in our patient population. Having recently reviewed 5 years (1999–2003) of data on over 70,000 singleton deliveries from a regional perinatal data set in western New York, we felt it appropriate to share our findings from a U.S. population. When analyzing the data using

the LGA definition provided by the authors (2 standard deviations above the mean birth weight for gestational age and based upon the Swedish weight distributions found in Marsal et al²), our findings support most of the information provided by the authors. We find positive associations between LGA infants and maternal age, parity, prepregnancy body mass index (BMI), and gestational diabetes, and we find a negative association between LGA infants and smoking. We also find an increase in LGA infants over the 5-year time period (3.4% in 1999 to 3.9% in 2003, $P < .01$). If our data, however, are analyzed with LGA defined as infants above the 90th percentile based on the U.S. weight distributions found in Alexander et al,³ we come to different conclusions. Like Surkan et al,¹ the associations between LGA and maternal age, parity, prepregnancy BMI, and gestational diabetes, and smoking would still remain. Unlike the authors, however, we find no change in LGA infants over this time period even though we find an increase in the percentage of overweight (BMI ≥ 25) women delivering in our region (9.2%) as well as a concurrent decline in smoking (6.6%). Thus, although there is no question that there is a recent increase in the BMI of pregnant women, the increase in the proportion of LGA infants is dependent upon the LGA definition utilized.

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In Reply:

We thank Drs. Yeh and Shelton for their interest in our research and agree that increasing maternal obesity is of concern. Drs. Yeh and Shelton observed a temporal increase in the proportion of large for gestational age (LGA) infants, defined as birth weight greater than 2 standard deviations above the mean birth weight for



Table 1. Proportions of Large for Gestational Age Births, 1992–2001, Using Two Different Definitions

Year	All Births (n)	LGA Definitions			
		2 SDs Above Mean		90th Percentile	
		n	%	n	%
1992	108,871	3,619	0.033	10,335	0.095
1993	103,749	3,477	0.034	9,842	0.095
1994	98,414	3,437	0.035	9,755	0.099
1995	90,133	3,107	0.034	8,729	0.097
1996	83,748	2,976	0.036	8,174	0.098
1997	78,668	2,769	0.035	7,786	0.099
1998	75,828	2,795	0.037	7,862	0.104
1999	75,741	2,972	0.039	7,919	0.105
2000	79,128	3,170	0.040	8,539	0.108
2001	79,883	3,087	0.039	8,455	0.106
All years	874,163	31,409	0.036	87,396	0.100

LGA, large for gestational age; SD, standard deviation.

gestational age, but not in the proportion with birth weight above the 90th percentile.

We defined LGA using the Swedish standard of birth weight greater than 2 standard deviations above the mean fetal weight for gestational age to maintain comparability with other Swedish studies. We have, however analyzed our data defining LGA as a birth weight above the 90th percentile of the fetal growth curve and observed similar temporal trends (Tables 1 and 2). Two recent Canadian studies also reported temporal increases in the proportion of LGA births, while defining LGA as birth weight above the 90th percentile. Kramer et al 2002¹ found an increase in the percentage of LGA births from 8.0 in 1978–1979 to 11.5 in 1994–1996. With a different database from Canada, Wen et al 2003² also report this trend over a slightly different period (1981–1997).

Table 2. Odds Ratios of Large for Gestational Age Births, 1992–2001, Using Two Different Definitions

Year	LGA Definitions			
	2 SDs Above Mean		90th Percentile	
	Crude OR	95% CI	Crude OR	95% CI
1992	1.000		1.000	
1993	1.005	0.959–1.054	1.002	0.973–1.032
1994	1.041	0.992–1.092	1.041	1.011–1.072
1995	1.026	0.977–1.077	1.016	0.986–1.047
1996	1.057	1.006–1.111	1.024	0.993–1.056
1997	1.049	0.997–1.103	1.040	1.008–1.073
1998	1.098	1.044–1.155	1.093	1.059–1.127
1999	1.177	1.120–1.236	1.106	1.072–1.141
2000	1.203	1.146–1.263	1.146	1.112–1.182
2001	1.159	1.103–1.217	1.122	1.089–1.157

LGA, large for gestational age; SD, standard deviation; OR, odds ratio; CI, confidence interval.

The data reported by Drs. Yeh and Shelton imply that the proportion with birth weight above the 97.5th percentile is increasing, whereas the proportion between the 90th and 97.5th percentiles is decreasing. This may reflect a systematic change in the shape of birth weight distribution of potential clinical significance, or it may simply be due to random variation.

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Poor Obstetric Outcome in Subsequent Pregnancies in Women With Prior Fetal Death

To the Editor:

While we would wish to congratulate Frias et al¹ for their contribution to the scanty literature on recurrent fetal death, we have some concerns about their findings and conclusions.

Although the authors classify both first and subsequent fetal demise according to gestation, they acknowledge that the evaluation of causes of fetal death remains far from complete. Although they exclude cases with evidence of antiphospholipid syndrome or lupus anticoagulant, many other pertinent investigations do not appear to have been performed. For example, in only 88 cases was a fetal autopsy performed. Of course, it may be

