To the Editors:

Screening for diabetes mellitus in pregnancy

Diabetes mellitus in pregnancy includes those with established diabetes who become pregnant (pregestational diabetes mellitus) and gestational diabetes mellitus (GDM), which is defined as glucose intolerence with onset or first recognition during pregnancy (1). Both conditions are associated with high fetal and maternal morbidity and mortality. Furthermore, those with GDM are at an increased risk of developing type 2 diabetes mellitus later (2). In high risk populations such as Asians the World Health Organization (WHO) advocates screening during the first trimester to detect previously undiagnosed diabetes and a formal oral glucose tolerence test (OGGT) between 24 and 28 weeks of gestation to diagnose GDM (1). Previous studies in Sri Lanka show that all ethnic groups are at a high risk of

developing diabetes (3,4). We report an audit on the blood glucose testing practice in the antenatal clinics of our Teaching Hospital.

The clinical notes of all pregnant women attending all antenatal clinics at Teaching Hospital, Peradeniya, over a period of 3 months were studied. The type of blood glucose estimation, whether fasting, random, post-prandial or after OGGT was analysed. Out of a total of 791 women 6 were known to have diabetes before conception. The numbers who were tested are shown in Table 1. The numbers who underwent blood glucose estimations at different stages of pregnancy are shown in Table 2.

As the results indicate only less than one fourth (188 out of 791) of the total number of women have had blood glucose estimated in the antenatal clinics in spite of the WHO recommendations that all pregnant women in high risk populations should be screened for diabetes (1). Only 2 mothers have had their FBS estimated in the first trimester and none has had a formal OGGT. The situation would be similar in the other antenatal clinics in the country. Contributory factors would include unavailablity of adequate financial and human resources, or lack of knowledge of the health care providers.

Facilities for testing for diabetes in the antenatal clinics in Sri Lanka should be improved so that those with GDM are identified early, and appropriate management instituted. The demand for such facilities would increase in the future since the prevalence of GDM is expected to rise in proportion to the number of people with type 2 diabetes, which would increase significantly in the Asian continent (5).

Table 1. Types and number of blood glucose estimations (%)

Fasting	90 (48)
Random	34 (18)
Postprandial	39 (21)
Fasting and post-prandial	18 (10)
Fasting, random and post-prandial	7 (3)
Total	188 (100)

Table 2. Details of blood glucose estimation, numbers and (%)

Stage of Pregnancy	*FB*	*RB*	*PPB*	*FB+PPB*	*FB+RB+PPB*
0-12 weeks	2	1	2	2	0
13-23 weeks	26	7	11	2	5
24-28 weeks	17	5	10	4	0
Over 28 weeks	45	21	16.	10	2
Total	90 (48)	34 (18)	39 (21)	18 (10)	7 (3)

(FB Fasting blood, RB random blood, PPB post-prandial blood)

References

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