In response:

Gestational diabetes mellitus: the importance of adherence to diagnostic criteria in research

We appreciate the interest shown by Senanayake and colleagues in our publication.

Senanayake and colleagues have missed out on the basic premise that WHO criteria are for screening and are in no way diagnostic. It is well established that further testing is recommended for diagnosis before patient management [1], which is what we are being faulted for! Furthermore, you would agree that fasting and 2-hour values used for screening must be derived from an oral glucose tolerance test (OGTT) performed according to well defined protocol. In the best of circumstances the OGTT is poorly reproducible [2]. What we did was to remove obviously inaccurate datasets from a retrospective database. This is not a violation of WHO recommendations but respect for scientific accuracy. In fact our hospital-based studies determined the practicalities of 'cut-off values' of the OGTT based on pregnancy outcome [3].

The recommendation to take 75g glucose load within 5 minutes is based on valid evidence [4]. In the practical setting women are not closely supervised and can sip, vomit, consume other food or even share their glucose with others [2]. Careful study conditions with optimum number of reliable time-points are required to diagnose. We excluded OGTT with delayed peak since the test was not conducted under strict research supervision and being retrospective, precluded further study of subjects. However, the absence of 'undiagnosed diabetics' delivering in our unit during the study period suggests these were not abnormal OGTT. Blind adherence to WHO epidemiological criteria could have resulted in hospital-based misdiagnosis (false positive) in about 12% of such a study population. Moreover, the clinical outcomes of our Unit's management protocol, adhered to for over 10 years with this interpretation of the OGTT, showed a reduction in the stillbirth rate from 17.5% to 1.5% [5].

The objective of guidelines is to simplify diagnosis, minimise non-diagnosis (often at the expense of specificity) and standardize reporting relevant to primary care. Patient care in a tertiary teaching centre, which is the last port of call for such women in Sri Lanka, cannot be limited to criteria laid out for screening. We need to verify screen-positives, carry out additional tests and improve the use of guidelines by critical analysis of data to enable quality care. Senanayake and colleagues, having applied epidemiological criteria on a retrospective laboratory database without clinical outcomes, are liable to have made inaccurate conclusions and caused confusion for practicing clinicians.

References

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