Development and evaluation of interventions to improve care and support for pregnant women with previous bariatric surgery or obesity

Supervisor: Dimitrios Siassakos

PLAN OF INVESTIGATING AND METHODOLOGY

I: SYSTEMATIC REVIEWS

The student will collect evidence from quantitative and qualitative studies of education-based interventions to improve care and pregnancy outcomes in women with obesity. We will follow the Metasummary method (Sandelowski), a meta-analytical method that captures evidence from mixed-methods studies and assigns frequency effect sizes to findings. We will also meta-analyse quantitative studies using Cochrane methodology.

II: QUALITATIVE RESEARCH

The student will conduct a series of focus groups (FG) with obese women and members of the multi-disciplinary care teams (separately) in each of the four cities with different demographics to increase generalizability: Bristol (two Units), Taunton, Bath, Gloucester. Each group will comprise 6 to 8 participants, allowing for sufficient diversity. To analyse the content we will follow a thematic framework approach.

III: CONSENSUS STUDY

The student will conduct a study with standard Delphi methodology, involving multidisciplinary experts from around the UK, and public/patient representatives. The aim is to develop consensus with regards to the clinical management in pregnancy of obese women and women who have previously undergone bariatric surgery.

IV: INTERVENTION

We will develop an educational package of self-directed online modules and Smartphone Apps, paying attention to factors influencing acceptance.

The modules will be specific for:

- Healthcare professions
- Pregnant women with BMI>40
- Pregnant women with previous bariatric surgery

We have expertise in the development and evaluation of such packages with strong PPI, and there is evidence that obesity Apps alongside an online package can improve individuals' engagement with their health-related goals⁵.

V: INITIAL EVALUATION

We will pilot the intervention across the four cities over six months, and evaluate uptake and use by staff and women using:

- Number of Smartphone App downloads
- Number of Internet site visits
- Usage of Smartphone App: A built in tool to monitor "intra-App activity" will allow assessment of the number of times the App is opened, time spent on the App, and the area used most.
- User experience: A brief optional feedback tool covering ease of use, satisfaction, and whether it was recommended to others

The keywords are: Medical / Clinical Science, Psychology, Public Health & Epidemiology, Health Sciences, Education, Midwifery Nursing & Allied Health Professions, Sociology