

# PROJECT INITIATION DOCUMENT

(15<sup>th</sup> September 2004)

**Project name:**

**2004 strategic framework implementation:  
REDUCING PERINATAL MORTALITY**

## 1 INTRODUCTION

- 1.1 This PID describes a programme to implement an enhanced system of maternity care across the 12 PCTs of the Birmingham and the Black Country. Its primary aim is to reduce perinatal and infant mortality, by providing a maternity service which is equitable, evidence based and fulfils the needs of mothers and babies.

## 2 BACKGROUND

- 2.1 The Birmingham and The Black Country Strategic Health Authority issued for consultation in summer 2004 a Strategic Framework which included as one of its main priorities a "Healthy Start to Life". This priority is closely linked with another – to reduce health inequalities across the SHA patch. A key component of providing a healthy start to life is that of reducing perinatal mortality.
- 2.2 Most instances of infant deaths (first year of life) originate in the perinatal period (24 weeks in pregnancy to first week of life). The BBC area has the highest Perinatal Mortality Rate in the country. There is evidence that adverse outcome is strongly linked to social deprivation and inequalities. There is also general and local evidence that many instances of adverse outcome are potentially avoidable.
- 2.3 Improved maternity services in the community are regarded as a key to the delivery of preventative and pro-active perinatal care. The Bellevue Project, commissioned by the former BHA, showed that an enhanced midwifery service in the community can lead to substantial improvements in outcome. Following on , the BBC Maternity Services Group (MSG) examined and agreed on general principles of enhanced, community based midwifery care which can be implemented according to local needs within the BBC. The final report of the MSG is archived on [www.perinatal.nhs.uk/msg](http://www.perinatal.nhs.uk/msg).
- 2.4 It is an aim of this PID to ensure the implementation of these principles to improve maternity care, with initial emphasis on areas of greatest need, but eventually across all areas. Initial training of foetal growth monitoring and the recruitment of midwives will be targeted in the areas with a higher perinatal mortality rate. This roll out will be decided by PCT leads within the project team. As stated in the BBC Strategic Framework's 'Making it Happen', PCTs have agreed to collaborate across BBC in order to achieve comprehensive and systematic transformational

change. Reduction of the perinatal mortality rate will contribute to the reduction of the infant mortality rate.

### 3 SPONSORSHIP OF THE PROJECT

3.1 The project sponsors are the 12 PCT Chief Executives and the Directors of the BBC SHA.

3.2 The key stakeholders in the BBC SHA patch include the following:

- Mothers and babies of target populations
- 12 PCTs
- Acute Service Providers of Maternity Services
- Maternity Services Liaison Committees
- The SHA
- The Perinatal Institute (in its support to the SHA on implementation of the maternity module of the National Service Framework for maternity services)
- 6 Local Authorities and their equivalent of the Children and Young People's Strategic Partnerships
- Sure Start Programme/Children's Centres
- Voluntary Sector Agencies

### 4 KEY OBJECTIVES

4.1 The overall objective is the reduction of perinatal mortality. An assessment of the feasibility of this target has been provided by the Perinatal Institute (Appendix).

4.2 The work will focus on the provision of enhanced maternity care in the community, rolling audit in all pregnancies, and targeted case reviews. The project is considered in three categories:

- Antenatal
- Intrapartum
- Neonatal / children

## 5 ANTENATAL: CARE DURING PREGNANCY

- 5.1 Most perinatal deaths are unexpected, and currently categorised as unexplained antepartum stillbirths. Most of these follow intra-uterine growth restriction (IUGR) which is usually unrecognised. Recognition of IUGR requires evidence based antenatal assessment; continuity of carer, training (fundal height measurement customised charts, and established care pathways for management. There is a need to include ALL pregnancies, as there is no reliable method to identify at risk individuals. NICE guidelines should be considered in the development of care pathways as appropriate.
- 5.2 As there is a strong link between adverse outcome and socio-economic deprivation, community care needs to be strengthened and joined up with other aspects of primary care. The following components of a community based maternity service are deemed essential.
- 5.3 Continuity of carer: the cornerstone of the approach is that of the mother is establishing a constructive relationship with a lead midwife. A target of 75% of ante and post-natal contacts would be with the same lead midwife.
- 5.4 Lead midwife to co-ordinate all services: the lead midwife would act as a key worker in liaising with and referring to relevant specialist support or agencies.
- 5.5 The service should be readily accessible: the local facilities for the provision of services could be in GP surgeries, Sure Start or Children's centres including schools or other suitable venues
- 5.6 From a mother's perspective the key elements are
  - I want support throughout my pregnancy
  - I want care during my pregnancy to be personalised to my needs
  - I want care during my pregnancy to address the needs of my baby
  - I want adequate information throughout my pregnancy
  - I want to be seen by any professional who can help me
  - I want a smooth transition of care during childbirth and motherhood

## 5.7 Action points for antenatal care:

| Action points  | Rationale   | Target   |
|--|---|--|
| 5.7.1 Ensure continuity of carer   | Reduces inter observer variability in detection of IUGR. Vehicle for delivery of other elements   | 75% of visits with lead midwife  |
| 5.7.2 Ensure early gestational age at first visit                        | Needed to ensure timeliness of screening and other advice<br>Risk Assessment  | 80% in first trimester   |
| 5.7.3 Ensure screening tests offered                                     | NSC requirements offer informed choice  | 95% incl. Ethnic minorities  |
| 5.7.4 Detection of fetal growth restriction                              | Two thirds of antenatal deaths are unexplained; over 50% follow intra-uterine growth restriction  | 60% of growth restricted babies detected antenatally                                       |
| 5.7.5 Reduce smoking in pregnancy  | Affects birth weight, prematurity and child development<br>National target  | 15% by 2010 (=national target)   |
| 5.7.6 Promote breastfeeding  | National target   | Incr.breastfeeding rates by 2% per year (=national target)                                 |
| 5.7.7 Improve maternal experience/satisfaction                           | Patient and Public Involvement<br>Choice  | Qualitative assessment   |
| 5.7.8 Collect standardised data to allow audit through MANNERS Maternity | To monitor <ul style="list-style-type: none"> <li>• rates of early booking</li> <li>• continuity of care</li> <li>• IUGR detection</li> <li>• Breast feeding</li> </ul> | 95% of MANNERS data fields completed in all pregnancies                                    |
| 5.7.9 Supply anonymised case notes to WMPI for confidential case reviews | Need to standardise management of the at-risk fetus   | All antepartum deaths which occurred even though a growth problem was detected antenatally |

5.8 In addition to the above, the following supplementary indicators will be considered

5.8.1 Midwife informed within 1 week of initial presentation, by GP

5.8.2 Non attendance at appointments

5.8.3 Ante-natal detection of anomalies

5.8.4 Emergency caesarean section rates

5.9 In addition to these indicators, the following measures will be collected by hand held maternity records and maternal surveys

5.9.1 Appropriate choices offered and provided

5.9.2 Expectations continually evaluated

5.9.3 Mothers physical and emotional needs continuously assessed and addressed

5.9.4 Babies physical and psychological needs continuously assessed and addressed

5.9.5 Forming a relationship with the carer

5.9.6 Primary care provider engaging key agencies and support groups in care

5.9.7 Care made accessible

5.9.8 Preparation/classes made available for childbirth and motherhood

5.9.9 Breast feeding promoted and discussed by 34 weeks

## 6 INTRAPARTUM: MANAGEMENT DURING LABOUR

6.1 There is a need for good linkage between antepartum and intrapartum care. The project will again seek the implementation of evidence based protocols

| Action points   | Rationale  | Target  |
|---|--|---|
| 6.1.1 Standardised intrapartum notes  | Better record keeping and risk assessment recommended by CESDI   | All units using same IP Notes   |
| 6.1.2 Training of fetal heart rate monitoring for all staff undertaking fetal heart rate monitoring (with reference to CNST), with standardised competency assessment | Confidential enquiries show that many adverse outcome associated with errors in fetal heart rate monitoring and interpretation | All staff undertaking fetal heart rate monitoring to demonstrate competency |
| 6.1.3 Units to supply WMPI with anonymised case notes for confidential case review  | CESDI evidence that most intrapartum deaths are potentially avoidable  | All intrapartum deaths  |

## 7 NEONATAL

| Action points  | Rationale                                      | Target   |
|--|--|--|
| 7.1.1 Consider implications of national and regional policies/guidelines on assisted reproduction with commissioners | Multiple births associated with prematurity    | To be defined  |
| 7.1.2 Promote breastfeeding  | National target                                | Increase breastfeeding rates by 2% per year (=national target) |
| 7.1.3 Reduce smoking   | National target                                |  |
| 7.1.4 Collect standardised data for MANNERS Neonatal   | Assess compliance with standards and protocols | 95% of data fields completed                                   |
| 7.1.5 Assist implementation of a standardised method of data collection for children                                 | Laming Report                                  | To be defined  |

## 8 PROJECT MANAGEMENT

8.1 The most senior group responsible for the overall programme co-ordination of the 5 priority areas of the Strategic Framework to be implemented comprises 12 PCT Chief Executives and SHA Chief Executive and Lead Director

8.2 A small project board will meet every 2 months and will comprise:

- Gill Combes, Chief Executive Oldbury and Smethwick PCT and Chair of Project Board
- Professor Jason Gardosi, Director, Perinatal Institute
- Kate Sallah, Director of Nursing and Midwifery, BBC SHA
- Representative of regional MSLC group
- Bridget Nisbet (Chair Maternity Services Group)
- Project Manager

8.3 A project team will meet regularly comprising

- Project manager (Chair)
- 12 PCT leads from the patch
- Perinatal Institute
- SHA lead
- Head of Midwifery from one or two acute providers
- Work force Development Directorate representative

8.4 This PID will not prescribe arrangements to be put in place in each PCT to deliver on this project. Nevertheless it is expected that in order to achieve the objectives of the project in paragraph 4 and meet the milestones specified in paragraph 10 a Local Implementation Group (LIG) is established. PCTs with their main provider/s may choose to do this on a Local Health Economy basis and this will be up to local determination. The PCTs should consider the list of potential stakeholders in paragraph 3.2 to assess the involvement on the LIG.

## 9 ASSESSMENT OF OUTCOME

9.1 Assessment of outcome will include pregnancy / perinatal outcomes (perinatal mortality and morbidity), equity assessment, achievements of targets as well as indicators of process. Methods of reporting will be developed through the project team.

## 10 KEY MILESTONES

10.1 Project team to be established as defined in Paragraph 8.3.

Timescale: Summer 2004

10.2 Project Board to be established following the Project Team meeting in July 04.

Timescale: September 04

10.3 Each PCT lead to inform the Project Manager of the formation of the LIG and its configuration in terms of organisations covered in the patch.

Timescale: September 2004

10.4 Project team to assist PCT's in identifying populations of greatest need in a way which can be used to consider appropriate local service models. This will be disseminated to PCTs for local consideration and use. PCTS will use a consistent approach to identifying areas of greatest need.

Timescale: September 2004

10.5 Each LIG will confirm back to the project team the intended target population in their PCT. If the combined proposals from all the PCTs do not achieve an overall target of 25% of the SHA population then the project team will negotiate with LIGs an increase to individual targets until the overall target is achieved. The project team will submit a profile of the target population by PCT to the project board demonstrating that in total it delivers 25% coverage.

Timescale: October 2004

10.6 Project will be implemented in the 25% of the SHA population

Timescale: March 2006

10.7 Each LIG to identify the availability of information relating to the performance indicators set out in paragraphs 5.7,5.8,5.9,6.1and 7 above

Timescale: Summer 2004.

10.8 Project Team to work with SHA information department and Perinatal Institute on the information collection requirements of the project both in terms of establishing baseline position and prospective monitoring.

Timescale: Summer 2004

10.9 The project team, working with WDD, will identify current workforce capacity including age analysis, vacancy rates, training places and return to practice.

Timescale: September 2004

10.10 Each LIG will draft a model of service and analyse the workforce required to deliver the model. This will be compared to current capacity to produce a gap analysis. This will also include a risk assessment on likelihood of meeting any additional required capacity through recruitment, retraining or skill mix.

Timescale: December 2004

10.11 To assist PCTs and LIGs to specify the components of the gap analysis of the target of continuity of carer, a standard template for a needs assessment for the target population will be developed by a subgroup of the project team. By estimating the average number of contacts a crude assessment can be made of the capacity required in terms of lead midwife time and use of local clinic facilities; this should be compared with current capacity to identify the gap between need and existing capacity.

Timescale: December 2004

10.12 Each LIG to outline resource assumptions for implementation to be produced for the LDP roll forward.

Timescale: Outline resource assumption December 2004

10.13 Project team to establish links with WDD to determine the best approach to be made within each PCT and partner agencies and the range of workforce implications for the potential local schemes concerning the project objectives.

Timescale: Autumn 2004

10.14 LIG and project team to determine needs and commission programme for CTG training and accreditation

10.15 Timescale: From Autumn 2004

10.16 LIGS/Project team to initiate discussions with commissioners on implications of assisted reproduction

Timescale: Autumn 2004

10.17 LIGS/Project team to discuss with WMPI re provision of confidential case review programme

Timescale: Autumn 2004

10.18 Each LIG to outline implementation plan potentially for action from April 05 setting out the following components:

- Workforce (full range of issues from numbers of new posts, new ways of working, new roles, all agencies, education and training implications)
- Facilities (range of local settings for target population, GP surgeries, schools, Surestart)
- Recurrent and non recurrent revenue
- Capital

Timescale: March 2005

10.19 Perinatal Institute in collaboration with LIGs / Project Team to implement standardised data collection (MANNERS Maternity Module)

Timescale: October – December 2004

10.20 Progress on programme to be part of the SHA Performance Review Mechanism.

Timescale: Minimum annually

10.21 SHA/Perinatal Institute to assess the benefits of the programme of work

Timescale: annually from December 2005

## 11 RESOURCES FOR PROJECTS

11.1 The implementation of new models of community based maternity care are mainstream activities and if a net increase in resource is required this must be planned through the LDP process.

11.2 A part time Project Manager will be funded for this work, based at the Perinatal Institute. This will be for one day a week at a cost of £15,000/year. A job description will be available which clarifies lines of responsibility and accountability. The Perinatal Institute will also provide on-going administrative support and meeting facilities for the Project Team, Project Board and any sub group/ad-hoc meetings arising out of this work at a cost of £10,000/year.

11.3 In addition, several areas of work may be commissioned, for the benefit of the whole patch, for example information collection/analysis and workforce analysis.

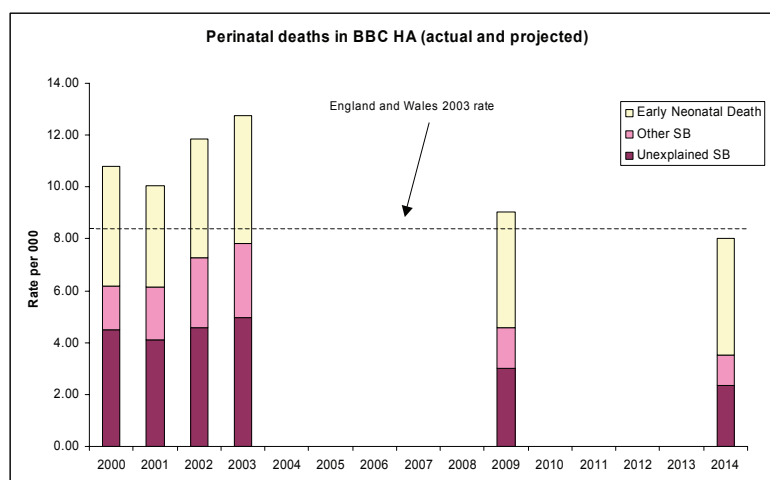
A case will need to be put forward through the Project Board and agreed by the PCT Chief Executives group.

- 11.4 If any of the LIGs, wish to make a case for their work to be financially supported because it has benefits for all other LIG, they should make a case to the PCT Chief Executive Lead for agreement by wider Chief Executive Group.

## 12 APPENDIX: Reducing the perinatal mortality rate (PNMR) in Birmingham and the Black Country

A detailed year-on-year analysis of PNM rates is available on [www.perinatal.nhs.uk/pnm](http://www.perinatal.nhs.uk/pnm). As the figure below shows, the perinatal mortality rate in the BBC has increasing over the last three years and was at 12.7/1000 in 2003. The three year average is 11.4/1000, which is substantially higher than the 2003 rate for England and Wales: 8.3/1000.

At these rates, and allowing for year on year variation, provisional assessment would indicate that a 20% reduction in PNMR over 5 years, to 9/1000 by 2009, would be statistically significant i.e. unlikely to be due to chance. This drop could be achieved by a reduction in each of the contributors of perinatal mortality, or even only in the reduction by one third of unexplained stillbirths (which are strongly linked to fetal growth restriction). A further ten percent reduction over the subsequent 5 years to 2014 (i.e. 30% reduction from 2003 figures) would result in a drop to 8/1000, which is less than the current national average.



Reduction of PNMR requires a vehicle to deliver a service which corresponds to evidence and targets in maternity care already available; effective monitoring to ensure equitable provision; and greater effort to understand the causes of adverse outcome. Perinatal mortality rates are subject to many influences. A better understanding is of high priority, and is the rationale for integrating audit and targeted case reviews.

Thus the three key components in the drive to reduce perinatal mortality in the BBC are

Strengthened maternity services, along the principles laid out by the MSG

*Purpose:* to establish an enhanced, community based system of midwifery care which can deliver evidence based targets consistent with the BBC Strategic Framework and the NSF for maternity and children

Monitoring service provision for all mothers and babies through MANNERS.

*Purpose:* to enable ongoing assessment of indicators such as early booking, continuity of care and detection of growth restriction; and to ensure that the service is equitable across the BBC

Confidential case reviews

*Purpose:* To understand adverse outcome (the 'tip of the iceberg') and the adherence to standards and guidelines; and to use this information to improve training and care provision.

Each of these components build on already existing initiatives and expertise developed in the West Midlands. However, there are no effective early pregnancy indicators of risk: most instances of adverse outcome occur in the 'low risk' population. Hence a project to enhance maternity services and reduce PNMR needs to be rolled out for the whole maternity population.