A UK feasibility study of motivational interviewing based peer-support for breastfeeding maintenance

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Overview

Background

– Inequalities in breastfeeding rates
– Breastfeeding peer-support interventions
– Motivational interviewing

The Mam-Kind Study

– Rapid evidence review
– Intervention development
– Feasibility study
Breastfeeding inequalities

![Breastfeeding Inequality Chart]

- **Deprivation quintile 5 (Most)**
- **1 week**
- **2 weeks**
- **6 weeks**

- **Birth**
- **1 (Least)**
Peer-support for breastfeeding (BFPS)

- Peer-support – provided to pregnant women or new mothers by women who have personal experience of breastfeeding

- BFPS is part of UK strategy to address low breastfeeding rates

- NICE guidelines for commissioning BF peer support (BFPS) (2008) does not specify
  - theoretical basis
  - critical components
  - optimal delivery mode

- Systematic review (Jolly 2012)
  - Reduces risk of not exclusively breastfeeding by 28% in low and middle income countries
  - 5 UK RCTs not effective
    - Low intensity
    - Self-refer for support
    - Essential elements of peer support not defined
UK BFPS research opportunity

NIHR HTA Commissioned call

Research Question: Can peer support for breastfeeding in the UK contribute to the maintenance of breastfeeding, particularly in groups of the population who are less likely to breastfeed?

Study design:
1. Rapid evidence review to identify the range of current practice
2. Development of BFPS intervention
3. Test feasibility and acceptability (impact in different population groups)
4. Recommendations for a full trial (if appropriate)
Motivational interviewing (MI)

Style of counseling that supports behaviour change by enhancing a person’s motivation for change and increasing self efficacy
MI in the context of breastfeeding

Factors associated with continuing BF
• motivation, self-efficacy, affective attitudes,
• social norms and strong beliefs that breastfeeding is normal

Support should be proactive and mother-centered

A motivational interviewing (MI) based approach can provide peer-supporters with
• engagement skills
• ability to elicit solutions from the mothers they support
• mother-centered approach that is required.


**Study aim:**

To develop a novel breastfeeding peer-support (BFPS) intervention based on motivational interviewing (MI) for breastfeeding maintenance and test the feasibility of delivering it to mothers living in areas with high levels of social deprivation

**Objectives:**

1. Identify, categorise and enumerate the range of BFPS interventions used in the UK.
2. Develop programme for MI based BFPS including content and requirements for implementation.
3. Use the Behaviour Change Wheel framework to map the identified sources of behaviour and intervention functions and provide the specification of the MI based BFPS intervention.
4. Assess the feasibility of delivering the MI based BFPS to women living in areas with high levels of social deprivation.
5. Assess the feasibility of collecting resource usage and costs for implementation and develop a strategy for economic evaluation.
6. Recommendations for a full RCT.
Final specification of Mam-Kind intervention for feasibility testing

Revised intervention description and logic model

2nd Stakeholder Workshop

Revised intervention description

Focus groups and interviews

Intervention components mapped on to the BCW

1st Stakeholder Workshop

Initial intervention description

Survey of Infant Feeding Coordinators

Literature review

Rapid evidence review

Literature review

Survey of Infant Feeding Coordinators

1st Stakeholder Workshop

Focus groups and interviews

Intervention components mapped on to the BCW

2nd Stakeholder Workshop

Revised intervention description
1. Rapid evidence review
Web survey of UK infant feeding coordinators

• To map how, when and where BFPS is provided in the UK

• Developed and piloted questionnaire

• Surveyed all UK Infant Feeding Coordinators (n=696), covering 178 NHS Trusts/Health Boards

• Follow-up email after 1 week, and 12 days after initial invite
## Survey content

<table>
<thead>
<tr>
<th>Theme</th>
<th>Sub-question topics</th>
</tr>
</thead>
<tbody>
<tr>
<td>Demographics</td>
<td>Nation; NHS Trust; number of births in area; staff roles; IFC role description</td>
</tr>
<tr>
<td>Breastfeeding support groups</td>
<td>Number of groups; who organises groups; record-keeping - attendance, support provided, referrals</td>
</tr>
<tr>
<td>Training peer supporters</td>
<td>Number of trained peers; what training is provided, by whom</td>
</tr>
<tr>
<td>Peer support</td>
<td>Recruitment; supervision; activities; integration with NHS services; accessibility of peer support</td>
</tr>
<tr>
<td>Other non-NHS support</td>
<td>Details; provider of support; third sector activities; breastfeeding counsellors.</td>
</tr>
</tbody>
</table>
## Survey response rate

<table>
<thead>
<tr>
<th></th>
<th>England</th>
<th>Scotland</th>
<th>Wales</th>
<th>Northern Ireland</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Individual invitations</td>
<td>617</td>
<td>40</td>
<td>19</td>
<td>20</td>
<td>696</td>
</tr>
<tr>
<td>Individual responses</td>
<td>113</td>
<td>11</td>
<td>8</td>
<td>4</td>
<td>136</td>
</tr>
<tr>
<td>NHS Trusts invited</td>
<td>152</td>
<td>14</td>
<td>7</td>
<td>5</td>
<td>178</td>
</tr>
<tr>
<td>NHS Trusts responses</td>
<td>108</td>
<td>9</td>
<td>7</td>
<td>3</td>
<td>127</td>
</tr>
<tr>
<td>Non-NHS</td>
<td>9</td>
<td>n/a</td>
<td>n/a</td>
<td>n/a</td>
<td>9</td>
</tr>
</tbody>
</table>
Survey results

- 75% reported availability of BFPS
  - 33% reported not well integrated with NHS services
  - 25% reported poor accessibility for women living in socially deprived areas

- Training provided by Breastfeeding Network, National Childbirth Trust, Infant Feeding Coordinator
  - Most have some additional training

- Peer-supporter activities
  - Attending +/- organising breastfeeding groups
  - Home visits to support mothers, Antenatal clinic visits, Parenthood sessions
  - Working on the postnatal ward

- Reduction in available funding
Variation in availability of BFPS

Most comprehensive service available:

“The Peer Support Service is a 7 days service 356 days of the year Team of 10 members, total 7.5 WTE from 9-5 man a 24 telephone support line. The Service is integrated into the universal Child Health Service, work alongside Health Visitors, School Nurses, and support staff. The service deliver Health Promotion sessions within Primary schools, They provide bedside support within the three feeder hospitals, Provide support groups with Children's Centre Groups It is an excellent service provided by a dedicated team.”

Least available:

“There is none”
Literature review: To inform intervention design

• Focus on
  – Theoretical models used
  – Key design issues including facilitators and barriers to implementation

• Search of 14 electronic databases and grey literature
  – 3 systematic reviews
  – 13 randomised controlled trials from developed countries
  – Other UK-based studies
<table>
<thead>
<tr>
<th>Key Messages – design</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Relational</strong></td>
</tr>
<tr>
<td>Mother-centred, warm, non-judgmental, enough time</td>
</tr>
<tr>
<td>Incremental goals</td>
</tr>
<tr>
<td>Whole family’s needs.</td>
</tr>
<tr>
<td><strong>Prompt Intensive Flexible Antenatal</strong></td>
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<tr>
<td>Early contact (24-48 hours)</td>
</tr>
<tr>
<td>More than 5 contacts</td>
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<tr>
<td>Mother has some control</td>
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<tr>
<td>Some successful interventions include antenatal, others not</td>
</tr>
<tr>
<td><strong>Proactive</strong></td>
</tr>
<tr>
<td>Seems to be important though poss. good relationship can substitute</td>
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<tr>
<td><strong>Supervision</strong></td>
</tr>
<tr>
<td>Evidence unclear</td>
</tr>
<tr>
<td><strong>Training</strong></td>
</tr>
<tr>
<td>More training does not necessarily equal better outcomes</td>
</tr>
<tr>
<td><strong>Mode of support</strong></td>
</tr>
<tr>
<td>Telephone v. face-to-face v. groups - conflicting evidence.</td>
</tr>
<tr>
<td>Also texts, social media – little evidence</td>
</tr>
<tr>
<td><strong>The peer</strong></td>
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<tr>
<td>Evidence unclear - studies attempt to match characteristics to intended clients</td>
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<tr>
<td><strong>Integration and service context</strong></td>
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<tr>
<td>Poor integration or unsupportive service context</td>
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<tr>
<td>- can impede delivery</td>
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<tr>
<td>- parents do not make use of existing resources.</td>
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2. Intervention development
Focus groups
• mothers and expectant mothers (n=14 in 3 groups)
• fathers (n=4, 1 group)
• peer supporters (n=14, 3 groups)

Interviews
• health professionals (n=14)

Stakeholder group meetings (n=2)
Key messages from focus groups and interviews

- Authentic presence
- A relationship - a friend?
- Non-judgemental
- Incremental goals
- Flexible timing
- Consistent advice
- Time
- Knowledge
- Continuity
- To be informed and involved
- Good links to existing services
- To supervise?
- Boundaries
- No toe-stepping
- To share the load
- Health professionals sometimes want
- To be included
- Feeding in context of whole family
- Discontinuous care
- Mothers Want
- Dogmatic style
- Partners & family sometimes want
- Time pressure
- Invasive touch
Timing & frequency

May help build relationships

Early contact (48hrs) seems to help (critical window)

Cessation highest in first days & weeks

More contacts better (+5) Flexibility & responsiveness key.

New problems (expressing, feeding out)

Antenatal

Peri-natal

First week

Early months

How long?

How much? How (home, phone, text, social media)? Information? Partners also? MI content?

How will peer know about birth? What if complications? MI content?

Partners and family? MI content?

Lots of other visits at this time

Beyond cessation? Signposting/ accompanying to other support?
If low take-up or not enough contacts the peer-mother relationship doesn’t get a chance to deliver intervention, everything should be done to support relationship incl. appropriate integration with existing services and supportive service culture.
Timing & frequency

The peer support 'product'
- goal setting (MI)
- information
- service links
- enhanced network
- encouragement
- hope

If the peer-mother relationship doesn’t deliver the ‘product’ at the right time it won’t work. Some critical decision points. But mothers may need help at different times.
Key considerations

1. Will it make the support/intervention more acceptable?
2. Will it help facilitate a relationship that allows the support/intervention to be received?
3. Will it help deliver the support at the times when it is needed?
**MI-BFPS logic model v3**

**PURPOSE:** To improve maternal and infant health and well-being by increasing breastfeeding duration, particularly in high risk groups for early breastfeeding discontinuation

**INPUT/RESOURCES**
- Breastfeeding peer-supporters’ time
- Midwives’ time
- Trainers’ time (MI, breastfeeding & safeguarding)
- Resources for use with parents (i.e. information leaflets, fridge magnet, agenda mapping and decision balance sheets)
- Resources for peer-supporters (i.e. handbook, supervision diary, closed Facebook page/website)
- Access to transport for peer-supporters (own or public transport)

**CONSTRAINTS**
- Competing demands on midwives’ time
- Varying caseload
- Balancing the need to keep the peer-supporter role manageable, while being responsive to mothers’ needs
- Availability of funding

**ACTIVITIES**

**Set-up**
- Recruitment of local supervising midwives
- Recruitment of peer-supporters
- Initial training for peer-supporters
- Initial training for supervising midwives
- Orientation of peer-supporters with local services
- Raising awareness of project within local services and community

**Delivery**
- Midwives refer women to the service from 28th week of pregnancy
- Peer-supporters contact women during the antenatal period, within 48 hours of birth, and every other day for the first two weeks post-partum. Within these visits, peer-supporters will:
  - Engage with mothers, using a kind, friendly, honest, and non-judgmental approach
  - Exchange information about breastfeeding
  - Encourage reflection on ambivalence and elicit change talk
  - Provide social support with regards to breastfeeding (emotional, informational, and companionship/appraisal)
  - Provide a positive role model for breastfeeding
  - Signposting/referral to other local services as required
- Further contact can be provided by peer-supporters based on the needs of individual mothers for up to six weeks post-partum

**Supervision and support**
- Regular supervision for peer-supporters with midwife (weekly)
- Coaching sessions for peer-supporters with MI trainer (approx. three sessions every 6 months)
- Regular contact between peer-supporters via closed social media facility and group supervision sessions

**OUTPUTS**
- Local services taking up the intervention
- Peer-supporters recruited, trained and retained
- Women taking up and adhering to the intervention

**EFFECTS**

**Short/medium term**
- Duration of exclusive breastfeeding
- Duration of any breastfeeding
- Beliefs/attitudes/knowledge about breastfeeding continuation
- Improved ‘quality’ of breastfeeding experience for mothers
- Maternal and infant health and well-being

**Long term**
- Greater knowledge and understanding in the community of how to breastfeeding for longer
- Shift in social and moral norms

**CONTEXT:** Strong influence of social, cultural and moral norms around breastfeeding; emotive issue; mistrust of health professionals amongst some groups; complex cases (emotional/social/medical needs); limited funding for public health initiatives; changing public health infrastructure; lack of clear infrastructure for breastfeeding peer-support programmes (depending on location); need for integration with pre-existing professional and voluntary services that provide breastfeeding support; need for clearer guidelines to inform policy on the features and implementation of effective breastfeeding peer-support.
**Contact**

- Midwives refer women to the service from 28th week of pregnancy

- Pro—active contact during the antenatal period, within 48 hours of birth, and every other day for the first two weeks post-partum

- Further contact - based on individual need for up to six weeks post-partum

**Content**

- Engage with mothers, using a kind, friendly, honest, and non-judgmental approach

- Information about breastfeeding

- Encourage reflection on ambivalence and elicit change talk

- Provide social support

- Positive role model for breastfeeding

- Signposting/referral to other local services as required


Supervision and support

• Regular supervision for peer-supporters with midwife (weekly)

• Coaching sessions for peer-supporters with MI trainer (approx. three sessions every 6 months)

• Regular contact between peer-supporters via closed social media facility and group supervision sessions
2. Feasibility testing
**Setting:**
Community maternity services covering
- 20% of most deprived communities (English IMD, WIMD)
- breastfeeding initiation rates lower than UK average (<70%)
- higher than average proportion of teenage pregnancies (> 41.9 conceptions per 1000 women aged under 18)

**Study sites:**
- Ely, Merthyr, Fleetwood

**Recruited 8 peer-supporters**
- Accredited BFPS training, study training, MI training
- MI supervision sessions
- Local midwife supervisor
Data collection:

- Baseline questionnaire - socio-demographics, breastfeeding attitudes, maternal health and well-being

- Peer-supporter diaries

- Telephone interview at 10 days and 8 weeks after birth to ascertain duration of exclusive or partial breastfeeding, breastfeeding attitudes, maternal and child health and well-being (GHQ-12)

- Qualitative interviews with a subset of participants (n=30), peer-supporters (n=8) and healthcare professionals (n=9) (process evaluation)

- Recorded peer-support sessions for fidelity to MI
Feasibility study recruitment

• Aimed to recruit 30 pregnant women in each site

• Inclusion criteria: English speaking, at least 28 weeks gestation who are considering breastfeeding

• Exclusion criteria: unable to provide written informed consent, clinical reason that precludes breastfeeding or planned admission to neonatal unit following birth
Feasibility study progress to date:

• Recruitment completed (Ely n= 32, Merthyr n= 21, Fleetwood n= 17)

• Data collection, follow-up interviews completed

• Analysis ongoing

• Stakeholder meeting in July 2016
Summary

- Survey shows BFPS are available in most areas, although there is variation in what is being provided and how well integrated these are with NHS services.
- Concern about threats to existing services due to financial constraints.
- Literature review – poor reporting of theoretical models underpinning BFPS interventions, scope for a realist review to unpick the design mechanisms; what works in what context and why.
- Feasibility study results awaited
  - Can peer-supporters be trained to use a MI approach in their interactions with mothers?
  - Can MI based BFPS be delivered as intended?
  - Is it acceptable?
  - Is there scope for a trial to test effectiveness?
Acknowledgements

• The women who took part in Mam-Kind

• Peer-supporters

• Study team: Lauren Copeland, Laura Merrett, Heather Trickey, Aimee Grant, Rhiannon Phillips, Nina Gobat, Sally Tedstone, Sian Regan, Julia Sanders, Billie Hunter, Becky Playle, Kirsten McEwan, Deb Fitzsimmons, Amy Brown, Mandy Iles, Beverley Carey, Mike Robling, Steve Rollnick

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Thank you for listening
Any questions?