

## Antenatal care

[D] Peer support

*NICE guideline NG201*

*Evidence reviews underpinning recommendations 1.3.22 to  
1.3.23*

*August 2021*

*Final*

*These evidence reviews were developed  
by the National Guideline Alliance, which  
is a part of the Royal College of  
Obstetricians and Gynaecologists*



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ISBN: 978-1-4731-4227-5

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# Peer support

## Review question

What peer support (for example, support groups) is helpful to women during their pregnancy?

## Introduction

Peer support is a non-professional form of support provided by someone who has similar experiences in common with the person seeking support. In general, peer support is thought to offer the opportunity for a more authentic empathy between the person and their peer than between them and healthcare professionals who may not have the same lived experiences. This type of support is widely used in healthcare for these reasons. This review aims to determine what type of peer support women find helpful during their pregnancy.

## Summary of the protocol

See Table 1 for a summary of the Population, Phenomenon of Interest, and Context (PICO) characteristics of this review.

**Table 1: Summary of the protocol (PICO table)**

<b>Population</b>	All pregnant women
<b>Phenomenon of Interest</b>	Views and experiences of women who are or have been pregnant on in-person or remote (for example, online) peer support. Themes will be identified from the available literature, but expected themes are: <ul style="list-style-type: none"><li>• Avoiding dependency</li><li>• Building trust</li><li>• Reduction of anxiety related to pregnancy</li></ul>
<b>Context</b>	Only studies conducted in high income countries, as defined by the World Bank, with centrally-funded healthcare systems will be included

For further details see the review protocol in appendix A.

## Methods and process

This evidence review was developed using the methods and process described in [Developing NICE guidelines: the manual](#). Methods specific to this review question are described in the review protocol in appendix A.

Declarations of interest were recorded according to [NICE's conflicts of interest policy](#).

## Clinical evidence

### Included studies

Fourteen qualitative studies were included in this review (Adler 2002, Backstrom 2017, Berg 2006, Breustedt 2013, Canuso 2003, Demecs 2011, Humphries 2012, Johnson 2015, Lundgren 2010, McGarry 2016, McLeish 2015, McLeish 2017, McLeish 2019, Valaitis 2005).

All included studies focused on women's views and experiences of peer support during pregnancy. The types of peer support considered in the studies are: group peer support (Breustedt 2013, Canuso 2003, Demecs 2011); volunteer peer supporters (Backstrom 2017, McLeish 2015, McLeish 2017); online support (Adler 2002, Johnson 2015, Valaitis 2005); and doula support (Berg 2006, Humphries 2012, Lundgren 2010, McGarry 2016, McLeish 2019).

The included studies are summarised in Table 2.

Two studies were conducted in Australia (Demecs 2011, Johnson 2015); 1 study was conducted in Canada (Valaitis 2005); 3 studies were conducted in Sweden (Backstrom 2017, Berg 2006, Lundgren 2010); 5 studies were conducted in the UK (Breustedt 2013, McGarry 2016, McLeish 2015, McLeish 2017, McLeish 2019); and 3 studies were conducted in the USA (Adler 2002, Canuso 2003, Humphries 2012).

In all but 2 studies, which used an email questionnaire (Adler 2002) or diaries, interviews, field notes, and a questionnaire (Demecs 2011), data was collected using interviews. One study used a telephone interview (Backstrom 2017); 4 studies used semi-structured interviews (Johnson 2015, McLeish 2015, McLeish 2017, McLeish 2019); and 7 studies used open interviews (Berg 2006, Breustedt 2013, Canuso 2003, Humphries 2012, Lundgren 2010, McGarry 2016, Valaitis 2005).

In 1 study, women had a high-risk pregnancy and were prescribed bed-rest (Adler 2002). In 2 studies, only first-time mothers were studied and the population included some same-sex couples (Backstrom 2017, Johnson 2015). Two studies focused on young mothers (Humphries 2012, Valaitis 2005) and 6 studies included women who had social (Breustedt 2013, Canuso 2003, McLeish 2015, McLeish 2017, McLeish 2019) or intellectual (McGarry 2016) disadvantages.

In 5 studies the data was collected whilst women were still pregnant (Adler 2002, Backstrom 2017, Canuso 2003, Demecs 2011, Humphries 2012). In 3 studies the data was collected after women had given birth (Berg 2006, Breustedt 2013, Lundgren 2010). In 6 studies data was collected from the same women both before and after women had given birth (Johnson 2015, McGarry 2016, McLeish 2015, McLeish 2017, McLeish 2019, Valaitis 2005).

See the literature search strategy in appendix B and study selection flow chart in appendix C.

### Excluded studies

Studies not included in this review are listed, and reasons for their exclusion are provided in appendix K.

### Summary of studies included in the evidence review

Summaries of the studies that were included in this review are presented in Table 2.

**Table 2: Summary of included qualitative studies**

Study	Aim of the study	Population	Data collection methods	Themes identified
Adler 2002 General qualitative inquiry US	The purpose of this qualitative study was threefold: to investigate the effectiveness of a “virtual focus group” as a mechanism for collecting qualitative data, to explore the lived experience of pregnant women confined to home bed rest following a diagnosis of preterm labour, and to assess the value of the virtual focus group as an online peer support group for women on home bed rest.	N=7 women Maternal age range: 21-39 years	Email questionnaire	<ul style="list-style-type: none"> <li>• Social connectivity</li> </ul>
Bäckstrom 2017 General qualitative inquiry Sweden	The aim of this study was to explore expectant first-time mothers’ experiences of social support within the social network, when preparing for childbirth and parenting.	N=15 women Maternal age range: 20-37 years	Interviews Interviews conducted over telephone Duration: 39-70 minutes	<ul style="list-style-type: none"> <li>• Informational support</li> <li>• Shared experiences</li> <li>• Social connectivity</li> </ul>
Berg 2006 Qualitative (Phenomenological approach) Sweden	To describe women’s experiences of having a doula present during childbirth.	N=10 women Maternal age range: 25-35 years	Interviews Open-ended interviews Duration: 40-70 minutes	<ul style="list-style-type: none"> <li>• Accessibility and availability</li> <li>• Interpersonal sharing and support</li> <li>• Self-efficacy and empowerment</li> </ul>
Breustedt 2013 Qualitative (Phenomenological study) UK	This study explores participants’ experiences of taking part in Mellow Bumps (a group-based intervention which draws on psychological and practical techniques to reduce anxiety and promote well-being in vulnerable pregnant women).	N=4 women Maternal age range: 19-38 years	Interviews Non-directive interviews Duration: 40-60 minutes	<ul style="list-style-type: none"> <li>• Attachment</li> <li>• Practical support</li> <li>• Safe space</li> <li>• Social connectivity</li> </ul>
Canuso 2003 General qualitative inquiry US	The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers	N=7 women Maternal age range: not reported	Interviews Open-ended interviews Duration: not reported	<ul style="list-style-type: none"> <li>• Attachment</li> <li>• Interpersonal sharing and support</li> </ul>



Study	Aim of the study	Population	Data collection methods	Themes identified
	who participated in a project that was designed to improve their participation in perinatal care by using peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.			<ul style="list-style-type: none"> <li>• Self-efficacy and empowerment</li> <li>• Shared experiences</li> <li>• Social connectivity</li> </ul>
Demecs 2011 General qualitative inquiry Australia	This study aimed to explore pregnant women's experiences of participating in a pregnancy program designed around the use of creative activities.	N=7 women Maternal age range: 26-38 years	Diaries, interviews, field notes, and a brief questionnaire	<ul style="list-style-type: none"> <li>• Attachment</li> <li>• Interpersonal sharing and support</li> <li>• Safe space</li> <li>• Self-efficacy and empowerment</li> <li>• Shared experiences</li> <li>• Social connectivity</li> </ul>
Humphries 2012 General qualitative inquiry US	The study examines the qualities of the helping relationship as it develops between young mothers and doulas.	N=12 women Maternal age range: 15-20 years	Interviews Open-ended interviews Duration: 45-90 minutes	<ul style="list-style-type: none"> <li>• Accessibility and availability</li> <li>• Attachment</li> <li>• Shared experiences</li> </ul>
Johnson 2015 General qualitative inquiry Australia	The study considered the changing nature of pregnancy and mothering practices in the context of increasing digitalisation, with a particular focus on whether and how technologies enable new spaces for experiential learning and health responsibilities.	N=12 women Maternal age range: 29-44 years	Interviews Semi-structured interviews Duration: not reported	<ul style="list-style-type: none"> <li>• Anonymity</li> <li>• Informational support</li> <li>• Interpersonal sharing and support</li> <li>• Social connectivity</li> </ul>
Lundgren 2010 General qualitative inquiry Sweden	To describe women's experiences of doula support during childbirth.	N=9 women Maternal age range: 15-40 years	Interviews Open-ended interviews Duration: 50-120 minutes	<ul style="list-style-type: none"> <li>• Accessibility and availability</li> <li>• Interpersonal sharing and support</li> <li>• Self-efficacy and empowerment</li> <li>• Social connectivity</li> </ul>
McGarry 2016	The aim of this study was to gain insight	N=4 women	Interviews	<ul style="list-style-type: none"> <li>• Informational support</li> </ul>

Study	Aim of the study	Population	Data collection methods	Themes identified
Qualitative (Phenomenological study) UK	into the experiences of parents who received support from Doulas during pregnancy, birth and following the birth of their child.	Maternal age range: 20's to 30's	Semi-structured interviews Duration: not reported	<ul style="list-style-type: none"> <li>• Interpersonal sharing and support</li> <li>• Practical support</li> <li>• Self-efficacy and empowerment</li> </ul>
McLeish 2015 Qualitative (Phenomenological study) UK	This study particularly focuses on peer support for women experiencing a range of vulnerabilities during pregnancy and the postnatal period, in projects which assigned trained volunteers to individual pregnant women.	N=42 women Maternal age range: 19-40 years	Interviews Semi-structured interviews Duration: not reported	<ul style="list-style-type: none"> <li>• Accessibility and availability</li> <li>• Attachment</li> <li>• Interpersonal sharing and support</li> <li>• Shared experiences</li> </ul>
McLeish 2017 Qualitative (Phenomenological study) UK	This study explores mainly disadvantaged and migrant women's views about the impact of organised peer support on their emotional well-being during pregnancy and after birth, and their understanding of the mechanisms involved.	N=47 women Maternal age range: 19-40 years	Interviews Semi-structured interviews Duration: 16-90 minutes	<ul style="list-style-type: none"> <li>• Practical support</li> <li>• Shared experiences</li> <li>• Social connectivity</li> </ul>
McLeish 2019 Qualitative (Phenomenological study) UK	This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.	N=13 women Maternal age range: 20's to mid-40's	Interviews Semi-structured interviews Duration: 25-75 minutes	<ul style="list-style-type: none"> <li>• Attachment</li> <li>• Informational support</li> <li>• Interpersonal sharing and support</li> <li>• Practical support</li> <li>• Self-efficacy and empowerment</li> <li>• Social connectivity</li> </ul>
Valaitis 2005 General qualitative inquiry Canada	The study explored the use of online discussions as a means of obtaining pregnant and parenting adolescents' perspectives regarding needs, capacities, and service delivery issues.	N=14 women Maternal age range: 15-23 years	Interviews Open-ended interviews Duration: not reported	<ul style="list-style-type: none"> <li>• Anonymity</li> <li>• Social connectivity</li> </ul>

See the full evidence tables in appendix D. No meta-analysis was conducted (and so there are no forest plots in appendix E). See appendix M for a full table of quotes supporting the themes identified in this review.

## Quality assessment of studies included in the evidence review

See the evidence profiles in appendix F for GRADE-CERQual tables.

## Theme map

The evidence was categorised into 5 levels using Bronfenbrenner's socioecological model (Bronfenbrenner 1979). Framework analysis was used to identify themes, presented as a theme map in Figure 1. For further details about the methods, see Supplement 1: methods.

**Figure 1: Theme map for peer support**



## Economic evidence

### Included studies

A systematic review of the economic literature was conducted but no economic studies were identified which were applicable to this review question.

A single economic search was undertaken for all topics included in the scope of this guideline. See supplementary material 2 for details.

### **Excluded studies**

There was no economic evidence identified for this review question and therefore there is no excluded studies list in appendix K.

studies not included in this review are listed, and reasons for their exclusion are provided in appendix K.

### **Summary of studies included in the economic evidence review**

No economic studies were identified which were applicable to this review question.

### **Economic model**

No economic modelling was undertaken for this review because the committee agreed that other topics were higher priorities for economic evaluation.

### **Qualitative evidence statements**

See appendix M for a full table of quotes supporting the themes identified in this review.

#### **Level 1. Individual level**

##### Theme 1a. Interpersonal sharing and support

Low quality evidence from 8 studies showed that interpersonal sharing and support is a key theme in peer support. The sharing of personal experiences was helpful to some women as it informed their own decisions and normalised the birthing experience. In group interventions, rich, varied, and valuable stories were shared, which provided emotional support and knowledge to other women- something that women thought was not always possible in clinical encounters.

Many women, particularly first-time mothers, commented that since none of their friends were having babies at the same time, meeting other pregnant women was beneficial. Interpersonal sharing is often not present in the lives of isolated women and sharing of stories was a form of social support that women found useful.

Women found support provided by doulas invaluable and perceived them to be non-judgemental with a wealth of 'shareable' knowledge and experience. For example, doula's knowledge of the physiological changes that occur during pregnancy and how to cope with them can help allay women's fears. Women report that a doula or peer supporter is a 'neutral' person whom they can trust and confide in, and rely on for emotional and practical support.

Women appreciated that doulas followed and respected their decisions and acted as advocates for them, if required. The evidence showed that mothers wanted doulas to support them and help them understand their pregnancy without the fear of being perceived as ignorant. This was particularly so for women that had intellectual disabilities, who appreciated the friendly support doulas provided.

Finally, some women also thought that their partners would benefit from having the doula around. The evidence showed that women noticed a positive relationship develop between the doula and their partner, which was informative and supportive.

Given the above considerations, women often found it more natural to call their doula or peer supporter first rather than calling a doctor or midwife.

### Theme 1b. Feeling socially connected

Low quality evidence from 9 studies showed that social connectivity is a prevalent theme throughout all forms of peer support during pregnancy. Most women described feeling isolated and lonely during their pregnancy, regardless of their social circumstance. Women without accessible social networks, or those who felt uncomfortable to share difficult thoughts and feelings with family and friends, particularly desired peer support. A few women initially did not like the idea of peer support since they thought it would be an additional stressful social obligation. However, these women quickly changed their minds upon receiving peer support.

Women described positive experiences for all forms of peer support. It enabled them to share pregnancy experiences and feel supported, resulting in friendship with those who supported them. These friendships developed gradually over time and women reported that this had a positive impact on their mental health. Women commented on wanting to maintain new social contacts after the arrival of the baby, to share their experiences, and to support each other throughout their journey as a parent.

With respect to peer group interventions, most women reported feeling uncertain or uncomfortable at the prospect of engaging in group activities with people they did not know. However, this apprehension appears to quickly dissipate as participating in activities allows them to be open and bond with each other. For example, one mother reported feeling understood, validated, and heard by other mothers, which strengthened their bond with the rest of the group. Interventions that involved singing and dancing were particularly favoured by women, with three women mentioning group singing as promoting a sense of trust and comfort between them. Some women considered the physical benefits of singing as a way of releasing their voices, which could help them in labour. In general, women appear to become more playful after participating in group peer support and enjoy themselves more than they think they would before it.

Women valued that peer supporters offered to run group interventions after the study period and that doulas signposted them to local sources of social support, to integrate them into their community. Women reported this was hugely beneficial and considered this another form of support and a way to keep connected to other mothers.

The evidence also showed that women appreciated online support, which helps to alleviate feelings of isolation. Women identified a number of benefits, of which forging friendships was an important advantage. One study found that some young mothers prefer gender-specific online discussion forums, which had been created for the study. This was because some women thought they could have different needs to men, however this was not universally believed as some women appreciated hearing the male perspective.

### Theme 1c. Attachment

Low quality evidence from 6 studies showed that peer support can have a strong effect on attachment to doulas, peer supporters, or other women in a group, and also towards the attachment to the baby. A few studies also report women describing feelings of loss at the end of a group session or the difficulties faced when ending their relationship with a peer supporter or a doula.

Group interventions allowed women to form deep connections with other pregnant women. In particular, women felt that the activities conducted in group sessions reinforced the bond they had with their babies, with those involving singing and dancing particularly strengthening their connection with the group. A few mothers, who felt especially connected to the group, reported that they trust other mothers' anecdotal but experiential knowledge over that of the 'academic' knowledge of health professionals. Given the strength of this attachment, women

felt a sense of loss and adjustment, and found it hard to say goodbye when group interventions came to end. This resulted in the group of this study planning a reunion.

Despite their initial reluctance or scepticism regarding the benefits of peer support, women who receive it appear to develop a much deeper attachment based on feelings of emotional closeness and trust than they initially believed they would. At first, some women had suspicions about forming this type of relationship, but eventually described it as an enjoyable and supportive medium of care. Indeed, the majority of women described the relationship with their doula or peer supporter as a 'mother', 'sister', or 'friend'. However, since the relationship is open and non-judgemental, they considered this support more helpful than the 'social' support provided by actual family and friends. In one study, one woman, who received peer support from someone she already knew as a friend, believed that the effectiveness of the relationship was restricted as a result. Additionally, some women felt that peer supporters were not the same as healthcare professionals and felt that they could be open in way that was not possible with a healthcare professional. Indeed, one woman described the person providing her with peer supporter as falling "between the NHS and friend", providing something unique.

However, some women experienced dissatisfaction when there was infrequent contact between them and the doula with each of the pair tending to view the other as the responsible for this lack of contact.

In general, most women reported positive experiences with doulas and peer supporters and felt emotional when ending the relationship. Women interviewed in the postnatal period felt that although they had made local friends and had attended other community services, these were no replacement for the unique role the doula had played in their lives with many of them becoming upset when recalling saying goodbye to them.

#### Theme 1d. Self-efficacy and empowerment

Moderate quality evidence from 6 studies showed that peer support improves women's self-efficacy throughout the pregnancy period and empowered them to make decisions.

Women appreciated the doula acting as a mediator between the woman and her partner, as well as between the woman and the midwife. This empowers women to be able to voice their needs and wishes. Women felt secure that, if required, the doula would be able to help them convey their needs and wishes to healthcare staff. In this way, the doula was seen as a champion for the woman, who supports the woman and accepts her for who she is. Women also commented on how this support improved both their and their partner's self-esteem and confidence throughout the pregnancy. In one study, some women who gave birth in hospital reported experiencing a loss of power during their pregnancy, in terms of decision-making, which was taken away by healthcare staff. This loss of power was restored when the doula advocated on her behalf ensuring that the woman's views were represented. Women felt secure and calm knowing that they could fall back on their doula.

In general, doula support appears to have a profound effect on women's self-esteem as they encourage women to believe they are worthy of care. When recalling experiences of doula support after the birth of the child, one woman mentioned how her doula had motivated her to look to the future and remain positive.

Women described enjoying group peer support sessions as they satisfy the emotional needs of pregnancy, which traditional antenatal care has not always focussed on. These sessions served to validate many women's sense of self-worth, rather than simply being a learning exercise as they are often already aware of the information being shared during group sessions. The feeling of knowing what one is doing reinforced their identity as a mother. In one study, several women commented on how group peer sessions provided them with a calm and relaxing space away from their problems at home. Women valued this safe space as it provided them with the opportunity to reflect on their lives and pregnancies, enhancing

their self-esteem and having a positively impact on how they view their upcoming labour and birth.

#### Theme 1e. Accessibility and availability

Low quality evidence from 4 studies showed that women place a lot of importance on being able to access peer support as needed.

Women and their partners cherished the continual presence of their doula, which served to assure them that they are always there for them from pregnancy to birth and even afterwards. This continuity of care throughout pregnancy provided women with feelings of security and trust, something that did not always happen with midwives as they often had no opportunity to meet them before or after the birth.

Women enjoyed talking to, and learning from, their doula and many noted that being able to talk to them as needed was important. Although this contact with the doula need not always be face-to-face, women reported that she needed to be available and easy to reach. In one study, at first a woman felt she had to find things for the doula to do but quickly realised that she did not have to worry about this, as the doula was there to support her.

Women reported similar experiences with other peer supporters, who were open and flexible in what they offered. Although experiences with these other peer supporters were largely positive, some women found their openness and flexibility a hindrance as they were unclear about what the peer supporter could offer. Some women also reported that they did not want to take too much of the peer supporter's time given that they are unpaid volunteers.

### **Level 2. Community level**

#### Theme 2a. Informational support

Low quality evidence from 4 studies showed that women value receiving information through social support as it makes them feel more knowledgeable and able to make informed choices. When information came from different sources and was inconsistent, or overly exaggerated, women felt confused and uncertain. Women were satisfied when they felt that they had received enough information from reliable sources, which helped them feel prepared for birth and being a parent. Several women thought it was beneficial to receive information from a combination of lay people and healthcare professionals, whilst a few felt that information from healthcare professionals should be trusted as the final word for decision-making. Information provided by doulas was coveted as it was individualised and tailored to their own circumstances. This in turn made them feel more knowledgeable about their own pregnancy and helped them make better decisions. First-time mothers who lived far away from their female relatives especially appreciated this doula support, as it acted as a proxy for those relatives who might otherwise have shared their experiences and knowledge.

#### Theme 2b. Practical support

Moderate quality evidence from 4 studies showed that alongside informational support, practical support is also considered an important facet of peer support. Women greatly appreciated this type of support and thought it as beneficial as emotional support, as it still carried some emotional meaning.

In group interventions, women participated in a session focused on communicating with their baby, which allowed them to strengthen their connection with their baby. In one study, some activities during a group session allowed women to be disabused of some myths or preconceptions about pregnancy and birth.

In one study, women commented on how her doula showed her through modelling how to perform relevant tasks such as holding a baby in different positions or feeding a baby. In another study, doulas provided practical support as needed, for example, by driving women

to their antenatal care appointments, helping with their weekly shops, or helping with the cooking. Since important or pressing questions can often be forgotten during antenatal appointments, doulas also often acted as external reminders for questions the woman may have, for example, by encouraging them to write down any questions they may have or by raising questions that they know the woman has forgotten to ask about.

### **Level 3. Societal level**

#### Theme 3a. Shared experiences and backgrounds

Low quality evidence from 6 studies showed that women value support and advice from those who have been or are in similar situations to themselves. The evidence suggests that age and parity status have an influence on women's perceptions of peer support.

Women interpreted experiences shared by women of a similar age in a more positive light or as 'true' to their reality, compared to older women who often spoke of their negative experiences more and had traditional approaches to child-rearing. Furthermore, young mothers wanted to share experiences with and talk to other young people in the same situation. They felt they were more likely to trust other mothers their age due to commonalities between them. In one study, a young woman was worried about what a doula might think of her and so did not fully engage with her. Although the young woman thought her doula was 'nice' she felt unable to speak to her about certain issues since they were different ages and therefore could not relate to her. In the peer group workshop, two young women had contrasting experiences with their peers: one woman felt enriched by the experience and enjoyed spending time and learning from her peers, whilst another, who was the youngest peer in the group, felt excluded due to her age.

Some women reported that sharing experiences with other first-time pregnant women was beneficial since they are all experiencing similar things at similar times. Women felt a sense of recognition and belonging that normalised their pregnancies. In one study, three first-time mothers commented that they were only interested in gaining information from others about the birthing process rather than other aspects of pregnancy. The workshop allowed them to broaden their understanding of pregnancy when women who already have children talked about their own experiences. In this case, multiparous women were very enthusiastic to share their knowledge with other mothers, especially with first-time mothers.

Women felt more comfortable if they knew they had a shared experience with the peer supporter or doula. This shared experience provides peer supporters with a unique perspective and allows them to offer realistic strategies to cope with pregnancy and motherhood. Some women reported how having shared experiences helped improve their confidence and served to validate their own thoughts and feelings. In one particular study, one woman who had experience of mental health issues felt that the peer supporter's own similar experience enabled them to have an effective relationship.

#### Theme 3b. Safe space

Low quality evidence from 2 studies showed that peer support provides women a safe space to share their thoughts, concerns and feelings without fear of censure or being judged.

Regarding group interventions, women believed it was the facilitator's role to make attendees feel comfortable as many had reservations or experienced anxiety about attending them. In one study, women felt the facilitator enabled the participants to feel relaxed and promoted a non-judgemental atmosphere which helped break down barriers for attendance. Women felt safe and emotionally supported attending group interventions and felt comfortable sharing significant personal experiences with an open and accepting atmosphere in which there are no right or wrong answers, encouraging honest and frank discussions. This safe space also acted as a relaxed social space where women could make friends with other women.



In one study, multiparous women commented on how they were looking for a way to make their current pregnancy feel special, which engendered feelings of guilt as it implied that their current pregnancy was not considered as special as their first. These women felt comfortable sharing these thoughts in a group context and also considered it as a place in which they could indulge in and feel good about their pregnancies.

### Theme 3c. Anonymity

Very low quality evidence from 2 studies showed that women value anonymity when seeking peer support online. Women reported positive benefits of using online discussion forums or online resources whilst being able remain anonymous. In one study, women reported feeling part of an online community, allowing a sense of intimacy, support, and care from other members. These women could choose whether they wished to reveal their identity and could choose to read online discussion boards instead of directly contributing to them.

Some women valued the sense of anonymity provided by the internet when researching or asking questions about pregnancy that might be considered taboo or inappropriate, such as child vaccination, advice on same-sex parenting, and methods of child discipline. These women felt protected by the anonymity granted by the internet, which allowed them to find answers to questions they might not otherwise have found. Women referred to this as providing a comfort zone in which women feel they can be more open and honest than in a group setting. In one study, young mothers believed that barriers to using online forums include being tired, not having enough time, a lack of computer access, technical problems, and a lack of interest. Nevertheless, in this study, young mothers still preferred using an online resource rather than face-to-face peer support with some of them indicating that it can help those who are too shy to express themselves.

### **Economic evidence statements**

No economic evidence was identified which was applicable to this review question.

### **The committee's discussion of the evidence**

#### **Interpreting the evidence**

##### ***The outcomes that matter most***

This review focused on identifying what kinds of peer support are helpful to pregnant women during their pregnancy.

To address this, the review was designed to include qualitative data and as a result the committee could not specify in advance the data that would be located. Instead they identified the main themes which they expected to emerge from the data. Suggested themes included:

- Reduction of anxiety related to pregnancy
- Building trust
- Avoiding dependency

The evidence review identified data relating to these suggested themes within the themes of feeling socially connected, self-efficacy and empowerment, and practical support. Other themes identified in this review included attachment, accessibility and availability, interpersonal sharing and support, informational support, shared experiences and backgrounds, safe space, and anonymity in an online space. The committee considered the evidence from all identified themes and with their own knowledge and experience, were able to draft the recommendations.

### ***The quality of the evidence***

The overall confidence in the review findings ranged from very low to moderate quality, with the majority of them being low.

Concerns about methodological limitations of the primary studies were assessed using the CASP Qualitative checklist and ranged from no or very minor to moderate concerns. The most common issues were: insufficient or no justification of the recruitment strategy used; inadequate or no consideration of the researcher-participant relationship; and partial or no consideration about the value of the research, in terms of further research and transferability.

Concerns about relevance for the context and population of interest to this guideline ranged from minor to moderate concerns. The most common concern was the recruitment of specific populations of women, for example, vulnerable women or women with high-risk pregnancies, meaning the findings were difficult to generalise to the wider population.

Concerns about coherence ranged from no or very minor to minor concerns. The most common issue was the different types of peer support contributing to the same theme. Additionally, some studies presented women's views before birth and some presented views after birth. Since these studies are combined within the themes, there are concerns on the comparability and the overall fit between the data and the review finding.

Concerns about adequacy ranged from no or very minor to moderate concerns. There were moderate concerns for most themes because there were few studies supporting the findings. Furthermore, data from these studies is thin since the authors also consider the views of partners, peer supporters, and doulas in some studies.

### ***Discussion of findings***

#### **Benefits of peer support**

The evidence largely reports on the benefits of peer support for women during pregnancy. Eight studies reported on the importance of 'interpersonal sharing and support'. The sharing of personal experiences was helpful to some women as it informed their own decisions and normalised the birthing experience. Four studies reported on 'informational support', which showed that women valued receiving information through social support. Nine studies reported on the theme 'feeling socially connected' as most women from these studies reported feeling isolated or lonely during their pregnancy and wanted to socially connect with others. Six studies reported on women's 'attachment' to doulas, peer supporters, women in peer group interventions and also towards their baby. Women formed deep connections with their peer supporter and often felt this was not possible with healthcare professionals. Two studies reported on the theme 'safe space', which showed that women found peer support to be a safe space where they could share their thoughts, concerns, and feelings. Four studies reported on the theme 'practical support'. In one study, doulas provided practical support as needed, for example, by driving women to their antenatal care appointments, helping with their weekly shops, or helping with the cooking. Six studies supported how women's 'self-efficacy and empowerment' increased with peer support. Women felt secure and calm in their decision-making and thoughts around the pregnancy. Six studies reported on 'shared experiences and backgrounds' since women benefited hugely from spending time with those who were in or had been in a similar situation to themselves. Four studies reported on the theme 'accessibility and availability' which showed that women place importance on being able to access peer support when it is needed. On the basis of this evidence, the committee recommended that women should be advised of the potential benefits of peer support. The committee also noted that in their experience peer support may be most beneficial between women in similar situations or of similar backgrounds, for example young women with other young women.

There was some very low quality evidence from 2 studies on theme 'anonymity', which suggested that women valued being anonymous when using peer support online. The committee discussed that this was a matter of personal preference and therefore no recommendation was made based on this theme.

### **Signposting services**

The committee agreed that third sector organisations were predominately responsible for developing and maintain peer support services for women during pregnancy. However, the committee was aware of some peer support facilities for particular groups of women that were commissioned by the NHS. As it is current practice, the committee felt that healthcare professionals caring for pregnant women (midwives, GPs, obstetricians, and so on) should signpost local or national peer support services to women and their partners.

### **Cost effectiveness and resource use**

No economic studies were identified which were applicable to this review question.

These recommendations reflect current practice and therefore no resource impact is anticipated.

### **References**

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Adler, C. L., Zarchin, Y. R., The "virtual focus group": using the Internet to reach pregnant women on home bed rest, *JOGNN - Journal of Obstetric, Gynecologic, & Neonatal Nursing*, 31, 418-27, 2002

#### **Backstrom 2017**

Backstrom, C., Larsson, T., Wahlgren, E., Golsater, M., Martensson, L. B., Thorstensson, S., 'It makes you feel like you are not alone': Expectant first-time mothers' experiences of social support within the social network, when preparing for childbirth and parenting, *Sexual and Reproductive Healthcare*, 12, 51-57, 2017

#### **Berg 2006**

Berg, M., Terstad, A., Swedish women's experiences of doula support during childbirth, *Midwifery*, 22, 330-338, 2006

#### **Breustedt 2013**

Breustedt, Sarah, Puckering, Christine, A qualitative evaluation of women's experiences of the Mellow Bumps antenatal intervention, *British Journal of Midwifery*, 21, 187-194, 2013

#### **Bronfenbrenner 1979**

Bronfenbrenner, U. *The Ecology of Human Development: Experiments by Nature and Design*. Cambridge, Massachusetts: Harvard University Press, 1979

#### **Canuso 2003**

Canuso, R., Low-income pregnant mothers' experiences of a peer-professional social support intervention, *Journal of community health nursing*, 20, 37-49, 2003

#### **Demecs 2011**

Demecs, I. P., Fenwick, J., Gamble, J., Women's experiences of attending a creative arts program during their pregnancy, *Women and Birth*, 24, 112-121, 2011

**Humphries 2012**

Humphries, M. L., Korfmacher, J., The good, the bad, and the ambivalent: Quality of alliance in a support program for young mothers, *Infant Mental Health Journal*, 33, 22-33, 2012

**Johnson 2015**

Johnson, S. A., 'Intimate mothering publics': comparing face-to-face support groups and Internet use for women seeking information and advice in the transition to first-time motherhood, *Culture, health & sexuality*, 17, 237-251, 2015

**Lundgren 2010**

Lundgren, I., Swedish women's experiences of doula support during childbirth, *Midwifery*, 26, 173-180, 2010

**McGarry 2016**

McGarry, A., Stenfert Kroese, B., Cox, R., How Do Women with an Intellectual Disability Experience the Support of a Doula During Their Pregnancy, Childbirth and After the Birth of Their Child?, *Journal of applied research in intellectual disabilities : JARID*, 29, 21-33, 2016

**McLeish 2015**

McLeish, J., Redshaw, M., Peer support during pregnancy and early parenthood: A qualitative study of models and perceptions, *BMC Pregnancy and Childbirth*, 15 (1) (no pagination), 2015

**McLeish 2017**

McLeish, J., Redshaw, M., Mothers' accounts of the impact on emotional wellbeing of organised peer support in pregnancy and early parenthood: a qualitative study, *BMC Pregnancy & Childbirth*, 17, 28, 2017

**McLeish 2019**

McLeish, J., Redshaw, M., "Being the best person that they can be and the best mum": A qualitative study of community volunteer doula support for disadvantaged mothers before and after birth in England, *BMC pregnancy and childbirth*, 19 (1) (no pagination), 2019

**Valaitis 2005**

Valaitis, R. K., Sword, W. A., Online discussions with pregnant and parenting adolescents: perspectives and possibilities, *Health promotion practice*, 6, 464-471, 2005

# Appendices

## Appendix A – Review protocol

**Review protocol for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

**Table 3: Review protocol**

Field (based on <u>PRISMA-P</u> )	Content
Review question	What peer support (for example, support groups) is helpful to women during their pregnancy? Note: 'Peer support' is here defined as a person, or group of people, acting in a non-professional capacity, who provide emotional, physical or practical (for example, advocacy) support to a pregnant woman. This does not include support provided by a family member or friend who are acting in these capacities.
Type of review question	Qualitative
Objective of the review	The aim of this review is to identify what kinds of peer support are helpful to pregnant women during their pregnancy.
Eligibility criteria – population	All pregnant women
Eligibility criteria – Phenomenon of interest	Views and experiences of women who are or have been pregnant on in-person or remote (for example, online) peer support. Themes will be identified from the available literature, but expected themes are: <ul style="list-style-type: none"> <li>• Reduction of anxiety related to pregnancy</li> <li>• Building trust</li> <li>• Avoiding dependency</li> </ul>
Eligibility criteria – comparator	Not applicable

Field (based on <u>PRISMA-P</u> )	Content
Outcomes and prioritisation	Not applicable
Eligibility criteria – study design	<p>INCLUDE:</p> <ul style="list-style-type: none"> <li>• Systematic reviews of qualitative studies that specifically address women’s views/experiences of peer support during pregnancy</li> <li>• Qualitative studies (for example, studies that use interviews, focus groups, or observations) that specifically address women and partner’s views/experiences of peer support.</li> </ul> <p>Note: Identified studies will be reviewed in chronological order with most recent first.</p>
Other inclusion exclusion criteria	<p>Exclusion</p> <p>STUDY DESIGN:</p> <ul style="list-style-type: none"> <li>• Purely quantitative studies (including surveys that report only quantitative data)</li> </ul> <p>PUBLICATION STATUS:</p> <ul style="list-style-type: none"> <li>• Conference abstract</li> </ul> <p>LANGUAGE:</p> <ul style="list-style-type: none"> <li>• Non-English</li> </ul> <p>Inclusion</p> <p>COUNTRY:</p> <ul style="list-style-type: none"> <li>• Only studies conducted in high income countries, as defined by the World Bank, with centrally-funded healthcare systems will be included. For a list of these countries, see <a href="https://datahelpdesk.worldbank.org/knowledgebase/articles/906519-world-bank-country-and-lending-groups">https://datahelpdesk.worldbank.org/knowledgebase/articles/906519-world-bank-country-and-lending-groups</a></li> </ul> <p>Note: The use of the World Bank definitions of low-, middle- and high-income countries in this guideline is consistent with its use in the <a href="#">Postnatal care up to 8 weeks after birth (update)</a> NICE guideline CG37.</p>
Proposed sensitivity/sub-group analysis, or meta-regression	Data will be analysed in consultation with committee; equality issues will be addressed if possible. Attention will be paid to potential differences between views and experiences of women currently receiving antenatal care compared to those of women who received it in the past.

Field (based on <u>PRISMA-P</u> )	Content
Selection process – duplicate screening/selection/analyses	Review questions selected as high priorities for health economic analysis (and those selected as medium priorities and where health economic analysis could influence recommendations) will be subject to dual weeding and study selection; any discrepancies above 10% of the dual weeded resources will be resolved through discussion between the first and second reviewers or by reference to a third person. All data extraction will quality assured by a senior reviewer. Draft excluded studies and evidence tables will be circulated to the Topic Group for their comments. Resolution of disputes will be by discussion between the senior reviewer, Topic Advisor and Chair.
Data management (software)	NGA STAR software will be used to generate bibliographies/citations, and to conduct study sifting and data extraction. For the qualitative review, GRADE-CERQual will be used to assess the confidence in the findings from a thematic analysis.
Information sources – databases and dates	Sources to be searched: Embase, Medline, Medline In-Process, PsychINFO, CINAHL Limits (for example, date, study design): <ul style="list-style-type: none"> <li>• Qualitative, patient concerns</li> <li>• Date limit: 2000 (Date limit justified because services have changed dramatically over the past 20 or so years, especially since the internet has become ubiquitous).</li> <li>• Apply standard animal/non-English language exclusion</li> </ul>
Identify if an update	This is a new area in the guideline.
Author contacts	Developer: National Guideline Alliance.
Highlight if amendment to previous protocol	For details please see section 4.5 of <a href="#">Developing NICE guidelines: the manual</a> .
Search strategy – for one database	For details please see appendix C.
Data collection process – forms/duplicate	A standardised evidence table format will be used, and published as appendix D (clinical evidence tables) or H (economic evidence tables).
Data items – define all variables to be collected	For details please see evidence tables in appendix D (clinical evidence tables) or H (economic evidence tables).

Field (based on <b>PRISMA-P</b> )	Content
Methods for assessing bias at outcome/study level	Quality assessment of individual studies will be performed using the following checklists: <ul style="list-style-type: none"> <li>CASP checklist for qualitative studies</li> </ul> For details please see section 6.2 of <a href="#">Developing NICE guidelines: the manual</a> . Methodological limitations across all available evidence will be evaluated for each outcome using GRADE-CERQual.
Criteria for quantitative synthesis (where suitable)	For details please see section 6.4 of <a href="#">Developing NICE guidelines: the manual</a> .
Methods for analysis – combining studies and exploring (in)consistency	For details please see supplement 1: methods.
Meta-bias assessment – publication bias, selective reporting bias	Not applicable.
Assessment of confidence in cumulative evidence	For details please see sections 6.4 and 9.1 of <a href="#">Developing NICE guidelines: the manual</a> .
Rationale/context – Current management	For details please see the introduction to the evidence review.
Describe contributions of authors and guarantor	A multidisciplinary committee developed the guideline. The committee was convened by the National Guideline Alliance and chaired by Kate Harding in line with section 3 of <a href="#">Developing NICE guidelines: the manual</a> . Staff from the National Guideline Alliance undertook systematic literature searches, appraised the evidence, conducted meta-analysis and cost-effectiveness analysis where appropriate, and drafted the guideline in collaboration with the committee. For details please see supplement 1: methods.
Sources of funding/support	The National Guideline Alliance is funded by NICE and hosted by the Royal College of Obstetricians and Gynaecologists.
Name of sponsor	The National Guideline Alliance is funded by NICE and hosted by the Royal College of Obstetricians and Gynaecologists.
Roles of sponsor	NICE funds the National Guideline Alliance to develop guidelines for those working in the NHS, public health, and social care in England.



Field (based on <u>PRISMA-P</u> )	Content
PROSPERO registration number	This protocol is not registered with PROSPERO.

*CERQual: Confidence in the Evidence from Reviews of Qualitative Research; CG: clinical guideline; DARE: Database of Abstracts of Reviews of Effects; GRADE: Grading of Recommendations Assessment, Development and Evaluation; GP: general practitioner; HIV: Human immunodeficiency virus; HTA: Health Technology Assessment; NGA: National Guideline Alliance; NICE: National Institute for Health and Care Excellence; NIHR: National Institute for Health Research*

## Appendix B – Literature search strategies

**Literature search strategies for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

### Database(s): Medline & Embase (Multifile)

Last searched on **Embase Classic+Embase** 1947 to 2019 May 01, **Ovid MEDLINE(R) and Epub Ahead of Print, In-Process & Other Non-Indexed Citations and Daily** 1946 to May 01, 2019, **PsycINFO** 1806 to April Week 4 2019

Date of last search: 2<sup>nd</sup> May 2019

*Multifile database codes: emczd = Embase Classic+Embase; ppez= MEDLINE(R) and Epub Ahead of Print, In-Process & Other Non-Indexed Citations and Daily; psych = PsycINFO*

#	Searches
1	(Pregnancy/ or Pregnant Women/ or Prenatal Care/) use ppez
2	(pregnancy/ or pregnant woman/ or prenatal care/) use emczd
3	(Pregnancy/ or Prenatal Care/) use psych
4	(antenatal\$ or ante-natal\$ or ante natal\$ or prenatal\$ or pre-natal\$ or pre natal\$ or pregnan\$).tw,kw.
5	1 or 2 or 3 or 4
6	(*Social Support/ or Peer Group/) use ppez
7	(*social support/ or peer group/) use emczd
8	(*Social Support/ or Peers/ or Peer Relations/ or Peer Counseling/) use psych
9	peer support\$.mp.
10	(peer\$ adj (group\$ or support\$)).tw,kw.
11	((peer\$ or peer-facilitat\$ or peer-led\$ or peer-focus\$) adj3 (support\$ or learn\$ or coach\$ or mentor\$ or counsel\$ or educator\$ or volunteer\$ or outreach\$ or communicat\$ or discuss\$)).tw,kw.
12	((peer-facilitat\$ or peer-led\$ or peer-focus\$) adj (service\$ or program\$ or model\$)).tw,kw.
13	peer-to-peer.tw,kw.
14	lay support\$.tw,kw.
15	doula/ use emczd
16	doula\$.tw,kw.
17	Self-Help Groups/ use ppez
18	(self help/ or exp support group/) use emczd
19	support groups/ use psych
20	(group\$ support\$ or support\$ group\$).tw,kw.
21	((self-help\$ or self help\$ or selfhelp\$) adj3 group\$).tw,kw.
22	(mutual\$ adj (aid\$ or support\$)).tw,kw.
23	*Psychosocial care/ use emczd
24	((psychosocial\$ or support\$) adj intervention).tw,kw.
25	6 or 7 or 8 or 9 or 10 or 11 or 12 or 13 or 14 or 15 or 16 or 17 or 18 or 19 or 20 or 21 or 22 or 23 or 24
26	(Internet/ or Social Media/ or Mobile Applications/ or Telephone/ or Hotlines/ or Text Messaging/ or Electronic Mail/ or Telemedicine/) use ppez
27	(exp Internet/ or social media/ or mobile application/ or telephone/ or telephone support/ or hotline/ or text messaging/ or text message support/ or e-mail/ or email support/ or telemedicine/ or telehealth/) use emczd
28	(exp internet/ or exp social media/ or telephone systems/ or Hot Line Services/ or text messaging/ or computer mediated communication/ or telemedicine/) use psych
29	(computer\$ tablet\$ or tablet\$ computer\$).tw,kw.
30	((phone\$ or telephone\$) adj3 (intervention\$ or program\$)).tw,kw.
31	blogging.tw,kw.
32	(mobile\$ app\$ or mobile\$ phone\$ app\$ or mobile\$ health\$ app\$ or mHealth\$ app\$ or smartphone app\$ or online app\$ or phone app\$ or download\$ app\$ or ipad app\$).tw,kw.
33	((discussion\$ or online\$ or on-line\$ or internet\$) adj3 (forum\$ or fora)).tw,kw.
34	messag\$ board\$.tw,kw.
35	(hotline\$ or helpline\$ or hot-line\$ or help-line\$ or hot line\$ or help line\$).tw,kw.
36	((meeting\$ or network\$) adj site\$).tw,kw.
37	(social adj network\$).tw,kw.
38	(social adj media\$ adj (group\$ or platform\$)).tw,kw.
39	((online\$ or on-line\$ or internet\$ or eHealth or mHealth or web-based\$) adj (intervention\$ or program\$ or network\$ or communit\$)).tw,kw.
40	26 or 27 or 28 or 29 or 30 or 31 or 32 or 33 or 34 or 35 or 36 or 37 or 38 or 39
41	social support/
42	support\$.tw,kw.
43	41 or 42
44	(Interview/ or Interviews as Topic/ or Qualitative Research/) use ppez

#	Searches
45	(interview/ or qualitative research/) use emczd
46	(Interviews/ or Qualitative Research/) use psych
47	(experience\$ or qualitative or interview\$ or themes).tw.
48	(metasynthes\$ or meta-synthes\$ or metasummar\$ or meta-summar\$ or metastud\$ or meta-stud\$ or metathem\$ or meta-them\$).tw.
49	44 or 45 or 46 or 47 or 48
50	5 and 25 and 49
51	5 and 40 and 43 and 49
52	50 or 51
53	limit 52 to english language
54	limit 53 to yr="2000 -Current"
55	letter/
56	editorial/
57	news/
58	exp historical article/
59	Anecdotes as Topic/
60	comment/
61	case report/
62	(letter or comment*).ti.
63	55 or 56 or 57 or 58 or 59 or 60 or 61 or 62
64	randomized controlled trial/ or random*.ti,ab.
65	63 not 64
66	animals/ not humans/
67	exp Animals, Laboratory/
68	exp Animal Experimentation/
69	exp Models, Animal/
70	exp Rodentia/
71	(rat or rats or mouse or mice).ti.
72	65 or 66 or 67 or 68 or 69 or 70 or 71
73	letter.pt. or letter/
74	note.pt.
75	editorial.pt.
76	case report/ or case study/
77	(letter or comment*).ti.
78	73 or 74 or 75 or 76 or 77
79	randomized controlled trial/ or random*.ti,ab.
80	78 not 79
81	animal/ not human/
82	nonhuman/
83	exp Animal Experiment/
84	exp Experimental Animal/
85	animal model/
86	exp Rodent/
87	(rat or rats or mouse or mice).ti.
88	80 or 81 or 82 or 83 or 84 or 85 or 86 or 87
89	72 use ppez
90	88 use emczd
91	89 or 90
92	54 and 91
93	54 not 92

### Database(s): Cochrane Library

Last searched on **Cochrane Database of Systematic Reviews**, Issue 5 of 12, May 2019,  
**Cochrane Central Register of Controlled Trials**, Issue 5 of 12, May 2019

Date of last search: 2<sup>nd</sup> May 2019

#	Searches
#1	MeSH descriptor: [Pregnancy] this term only
#2	MeSH descriptor: [Pregnant Women] this term only
#3	MeSH descriptor: [Prenatal Care] this term only
#4	((antenatal* or ante-natal* or ante natal* or prenatal* or pre-natal* or pre natal* or pregnan*)):ti,ab,kw (Word variations have been searched)
#5	#1 OR #2 OR #3 OR #4
#6	MeSH descriptor: [Social Support] this term only
#7	MeSH descriptor: [Peer Group] this term only
#8	((peer* NEXT (group* or support*)):ti,ab,kw
#9	((((peer* or peer-facilitat* or peer-led* or peer-focus*) NEAR/3 (support* or learn* or coach* or mentor* or counsel* or educator* or volunteer* or outreach* or communicat* or discuss*)):ti,ab,kw

#	Searches
#10	((peer-facilitat* or peer-led* or peer-focus*) NEXT (service* or program* or model*)):ti,ab,kw
#11	(peer-to-peer):ti,ab,kw
#12	(lay NEXT support*):ti,ab,kw
#13	(doula*):ti,ab,kw
#14	MeSH descriptor: [Self-Help Groups] this term only
#15	((group* NEXT support*) or (support* NEXT group*))
#16	((self-help* or self help* or selfhelp*) NEAR/3 group*)):ti,ab,kw
#17	((mutual* NEXT (aid* or support*)):ti,ab,kw
#18	((psychosocial* or support*) NEXT intervention)):ti,ab,kw
#19	#6 OR #7 OR #8 OR #9 OR #10 OR #11 OR #12 OR #13 OR #14 OR #15 OR #16 OR #17 OR #18
#20	#5 AND #19
#21	MeSH descriptor: [Internet] this term only
#22	MeSH descriptor: [Social Media] this term only
#23	MeSH descriptor: [Mobile Applications] this term only
#24	MeSH descriptor: [Telephone] this term only
#25	MeSH descriptor: [Hotlines] this term only
#26	MeSH descriptor: [Text Messaging] this term only
#27	MeSH descriptor: [Electronic Mail] this term only
#28	MeSH descriptor: [Telemedicine] this term only
#29	((computer* NEXT tablet*) or (tablet* NEXT computer*)):ti,ab,kw
#30	((phone* or telephone*) NEAR/3 (intervention* or program*)):ti,ab,kw
#31	(blogging):ti,ab,kw
#32	((mobile* NEXT app*) or (mobile* NEXT phone* NEXT app*) or (mobile* NEXT health* NEXT app*) or (mHealth* NEXT app*) or (smartphone NEXT app*) or (online NEXT app*) or (phone NEXT app*) or (download* NEXT app*) or (ipad NEXT app*)):ti,ab,kw
#33	((discussion* or online* or on-line* or internet*) NEAR/3 (forum* or fora)):ti,ab,kw
#34	(messag* NEXT board*):ti,ab,kw
#35	((hotline* or helpline* or hot-line* or help-line* or (hot NEXT line*) or (help NEXT line*)):ti,ab,kw
#36	((meeting or network*) NEXT site*)):ti,ab,kw
#37	((social NEXT network*)):ti,ab,kw
#38	((social NEXT media* NEXT (group* or platform*)):ti,ab,kw
#39	((online* or on-line* or internet* or eHealth or mHealth or web-based*) NEXT (intervention* or program* or network* or communit*)):ti,ab,kw
#40	#21 OR #22 OR #23 OR #24 OR #25 OR #26 OR #27 OR #28 OR #29 OR #30 OR #31 OR #32 OR #33 OR #34 OR #35 OR #36 OR #37 OR #38 OR #39
#41	MeSH descriptor: [Social Support] this term only
#42	(support*):ti,ab,kw
#43	#41 OR #42
#44	#5 AND #40 AND #43
#45	#20 OR #44
#46	MeSH descriptor: [Interviews as Topic] this term only
#47	MeSH descriptor: [Interview] this term only
#48	MeSH descriptor: [Qualitative Research] this term only
#49	((experience* or qualitative or interview* or themes)):ti,ab,kw
#50	((metasynthes* or meta-synthes* or metasummar* or meta-summar* or metastud* or meta-stud* or metathem* or meta-them*)):ti,ab,kw
#51	#46 OR #47 OR #48 OR #49 OR #50
#52	#45 AND #51 Publication Year from 2000 to current

### Database(s): Cinahl Plus

Date of last search: 2<sup>nd</sup> May 2019

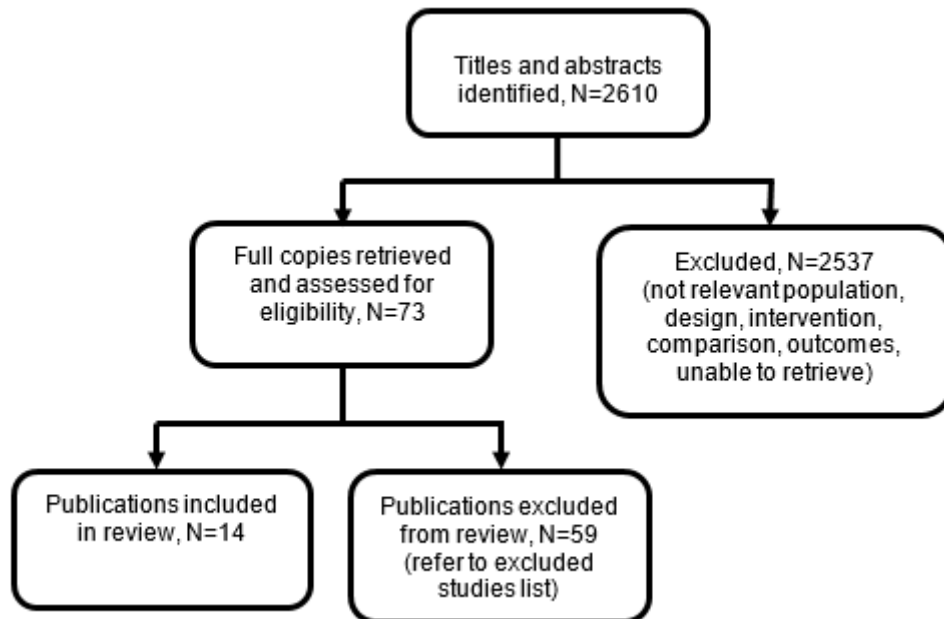
#	Searches
S70	S68 NOT S69 Limiters - Publication Year: 2000-2019; English Language; Clinical Queries: Qualitative - Best Balance
S69	PT anecdote or PT audiovisual or PT bibliography or PT biography or PT book or PT book review or PT brief item or PT cartoon or PT commentary or PT computer program or PT editorial or PT games or PT glossary or PT historical material or PT interview or PT letter or PT listservs or PT masters thesis or PT obituary or PT pamphlet or PT pamphlet chapter or PT pictorial or PT poetry or PT proceedings or PT "questions and answers" or PT response or PT software or PT teaching materials or PT website
S68	S44 OR S67
S67	S5 AND S63 AND S66
S66	S64 OR S65
S65	TI support* OR AB support*
S64	(MH "Support, Psychosocial")
S63	S45 OR S46 OR S47 OR S48 OR S49 OR S50 OR S51 OR S52 OR S53 OR S54 OR S55 OR S56 OR S57 OR S58 OR S59 OR S60 OR S61 OR S62

#	Searches
S62	T1 ((online* or on-line* or internet* or eHealth or mHealth or web-based*) N1 (intervention* or program* or network* or communit*)) OR AB ((online* or on-line* or internet* or eHealth or mHealth or web-based*) N1 (intervention* or program* or network* or communit*))
S61	T1 (social N1 media* N1 (group* or platform*)) OR AB (social N1 media* N1 (group* or platform*))
S60	T1 (social N1 network*) OR AB (social N1 network*)
S59	T1 ((meeting or network*) N1 site*) OR AB ((meeting or network*) N1 site*)
S58	T1 (hotline* or helpline* or hot-line* or help-line* or (hot N1 line*) or (help N1 line*)) OR AB (hotline* or helpline* or hot-line* or help-line* or (hot N1 line*) or (help N1 line*))
S57	T1 messag* N1 board* OR AB messag* N1 board*
S56	T1 ((discussion* or online* or on-line* or internet*) N3 (forum* or fora)) OR AB ((discussion* or online* or on-line* or internet*) N3 (forum* or fora))
S55	T1 ((mobile* N1 app*) or (mobile* N1 phone* N1 app*) or (mobile* N1 health* N1 app*) or (mHealth* N1 app*) or (smartphone N1 app*) or (online N1 app*) or (phone N1 app*) or (download* N1 app*) or (ipad N1 app*)) OR AB ((mobile* N1 app*) or (mobile* N1 phone* N1 app*) or (mobile* N1 health* N1 app*) or (mHealth* N1 app*) or (smartphone N1 app*) or (online N1 app*) or (phone N1 app*) or (download* N1 app*) or (ipad N1 app*))
S54	T1 blogging OR AB blogging
S53	T1 ((phone* or telephone*) N3 (intervention* or program*)) OR AB ((phone* or telephone*) N3 (intervention* or program*))
S52	T1 ((computer* N1 tablet*) or (tablet* N1 computer*)) OR AB ((computer* N1 tablet*) or (tablet* N1 computer*))
S51	(MH "Telemedicine")
S50	(MH "Email")
S49	(MH "Text Messaging")
S48	(MH "Telephone")
S47	(MH "Mobile Applications")
S46	(MH "Social Media")
S45	(MH "Internet")
S44	S27 AND S43
S43	S28 OR S29 OR S30 OR S31 OR S32 OR S33 OR S34 OR S35 OR S36 OR S37 OR S38 OR S39 OR S40 OR S41 OR S42
S42	T1 ((psychosocial* or support*) N1 intervention) OR AB ((psychosocial* or support*) N1 intervention)
S41	T1 (mutual* N1 (aid* or support*)) OR AB (mutual* N1 (aid* or support*))
S40	T1 ((self-help* or self help* or selfhelp*) N3 group*) OR AB ((self-help* or self help* or selfhelp*) N3 group*)
S39	T1 ((group* N1 support*) or (support* N1 group*)) OR AB ((group* N1 support*) or (support* N1 group*))
S38	(MH "Support Groups")
S37	T1 doula* or AB doula*
S36	(MH "Doulas")
S35	T1 lay support* OR AB lay support*
S34	T1 peer-to-peer OR AB peer-to-peer
S33	T1 ((peer-facilitat* or peer-led* or peer-focus*) N1 (service* or program* or model*)) OR AB ((peer-facilitat* or peer-led* or peer-focus*) N1 (service* or program* or model*))
S32	T1 ((peer* or peer-facilitat* or peer-led* or peer-focus*) N3 (support* or learn* or coach* or mentor* or counsel* or educator* or volunteer* or outreach* or communicat* or discuss*)) OR AB ((peer* or peer-facilitat* or peer-led* or peer-focus*) N3 (support* or learn* or coach* or mentor* or counsel* or educator* or volunteer* or outreach* or communicat* or discuss*))
S31	T1 (peer* N1 (group* or support*)) OR AB (peer* N1 (group* or support*))
S30	peer support*
S29	(MH "Peer Group")
S28	(MM "Support, Psychosocial")
S27	S23 OR S24 OR S25 OR S26
S26	T1 (antenatal* or ante-natal* or ante natal* or prenatal* or pre-natal* or pre natal* or pregnan*) OR AB (antenatal* or ante-natal* or ante natal* or prenatal* or pre-natal* or pre natal* or pregnan*)
S25	(MH "Prenatal Care")
S24	(MH "Expectant Mothers")
S23	(MH "Pregnancy")

## Appendix C – Clinical evidence study selection

**Study selection for: What peer support (for example, support groups) is helpful to women during their pregnancy?**

**Figure 2: Study selection flow chart**



## Appendix D – Clinical evidence tables

Evidence tables for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?

Table 4: Evidence tables

Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Full citation</b> Adler, C. L., Zarchin, Y. R., The "virtual focus group": using the Internet to reach pregnant women on home bed rest, JOGNN - Journal of Obstetric, Gynecologic, &amp; Neonatal Nursing, 31, 418-27, 2002</p> <p><b>Ref Id</b> 419434</p> <p><b>Study type</b> General qualitative inquiry</p> <p><b>Aim of the study</b> The purpose of this qualitative study was threefold: to investigate the effectiveness of a "virtual focus group" as a mechanism for collecting qualitative data, to explore the lived experience of pregnant women confined to home bed rest following a diagnosis of preterm labour, and to assess the value of the virtual focus group as an online peer support group for women on home bed rest.</p> <p><b>Country/ies where the study was carried out</b> USA</p>	<p><b>Sample size</b> N=7</p> <p><b>Inclusion criteria</b></p> <ul style="list-style-type: none"> <li>• A diagnosis of preterm labour;</li> <li>• A prescribed treatment of bed rest at home;</li> <li>• Bed rest conditions that allowed the use of a computer;</li> <li>• Computer literacy;</li> <li>• Internet access (e-mail account).</li> </ul> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Demographic data were collected for 6 of the 7 participants.</li> <li>• Participants' ages ranged from 21 to 39 years;</li> <li>• All participants were married;</li> <li>• Four were White, 1 was African American, and 1 was Asian;</li> </ul>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. The effect of bed rest on participants' lives</li> <li>2. Transitioning onto bed rest</li> <li>3. Loss of control and activities</li> <li>4. Changes in identity and role</li> <li>5. Coping and personal growth</li> <li>6. Transitioning off bed rest</li> <li>7. The effect of bed rest on relationships with others</li> <li>8. Relationships with the fetus and other children</li> <li>9. Relationships with husbands and extended family members</li> <li>10. The virtual focus group</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Study dates</b> August 1998</p> <p><b>Source of funding</b> Not mentioned.</p>	<ul style="list-style-type: none"> <li>• Three respondents were primiparae and 3 were multiparae;</li> <li>• In addition to having a diagnosis of preterm labour, 1 participant was carrying twins;</li> <li>• Participants' mean gestational age at the beginning of the study period was 31.4 weeks (SD = 1.7);</li> <li>• Family gross yearly incomes ranged from \$36,000 to \$100,000;</li> <li>• Mean length of time spent on bed rest was 8 weeks (SD=3.1).</li> </ul> <p><b>Setting</b> This study was conducted on the Internet and the virtual focus group was conducted via an email loop.</p> <p><b>Sample selection</b> The women were recruited from two settings: the perinatal service centre of a large health maintenance organisation in Northern California (n=3) and a World Wide Web site dedicated to discussions of high-risk pregnancy and bed rest (n=4).</p> <p><b>Data collection</b> Purposive sampling technique used to recruit participants.</p> <p><b>Data analysis</b> Content analysis was used to categorise the findings (Burnard's method of thematic content analysis).</p>	<p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Yes</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Can't tell</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results and also consider future research within the field.</p>



Study Details	Participants and Methods	Themes, limitations and other comments
	<p>All printed e-mail responses were independently read twice by both researchers. Then, an open coding system was used to generate as many categories as were necessary.</p> <p>Next, the list of categories was collapsed by grouping similar categories into broader, more general headings. Validation of the categories was confirmed by two additional readers, one a study participant and the other a colleague conducting independent qualitative research.</p> <p>Both individuals read through all of the data and confirmed that the categories were an accurate representation of the thematic content of the data. Researchers separately reread and colour-coded the original transcripts by category.</p> <p>Categorisation of all data was compared and integrated as necessary until consensus was reached.</p>	<p><b>CASP - Overall quality</b> High</p>
<p><b>Full citation</b> Backstrom, C., Larsson, T., Wahlgren, E., Golsater, M., Martensson, L. B., Thorstensson, S., 'It makes you feel like you are not alone': Expectant first-time mothers' experiences of social support within the social network, when preparing for childbirth and parenting, <i>Sexual and Reproductive Healthcare</i>, 12, 51-57, 2017</p> <p><b>Ref Id</b> 1009643</p> <p><b>Study type</b> General qualitative inquiry</p> <p><b>Aim of the study</b></p>	<p><b>Sample size</b> N=15</p> <p><b>Inclusion criteria</b></p> <ul style="list-style-type: none"> <li>• Expectant first-time mothers;</li> <li>• Singleton pregnancies;</li> <li>• The intention to give birth at the county hospital;</li> <li>• The ability to understand and speak Swedish.</li> </ul> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b> Maternal age range (20 to 37 years).</p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Social support can strengthen expectant first-time mothers' relationship with their partner and contribute to feelings of calm and security about childbirth and parenting</li> <li>2. Mutual preparation with partner facilitated the feeling of strengthened relationship</li> <li>3. Mutual preparation with partner</li> <li>4. Being able to communicate with the partner</li> <li>5. Practical support from the partner</li> </ol>

Study Details	Participants and Methods	Themes, limitations and other comments
<p>The aim of this study was to explore expectant first-time mothers' experiences of social support within the social network, when preparing for childbirth and parenting.</p> <p><b>Country/ies where the study was carried out</b> Sweden</p> <p><b>Study dates</b> Not mentioned.</p> <p><b>Source of funding</b> The study was funded by the department 'Woman, Child (K3)' at Skaraborg Hospital Skövde; the Research Fund at Skaraborg Hospital; the Skaraborg Research and Development Council; the Skaraborg Institute for Research and Development; the School of Health and Education, University of Skövde; the School of Health and Welfare, Jönköping University; and Närhälsan Midwifery Unit, Skövde.</p>	<p><b>Setting</b> All interviews were conducted via telephone to increase the level of comfort as well as the possibility to participate.</p> <p><b>Sample selection</b> Strategic sampling was used to select the participants in order to ensure maximum variation among the mothers in terms of age, place of residence, and high school and/or university education.</p> <p><b>Data collection</b> Data was collected through interviews, which were conducted during gestational weeks 36-38 and lasted 39 to 70 minutes. The interviews followed an interview guide comprising an open-ended question and follow-up questions. Each interview was audio-taped and transcribed verbatim by the first author. Prior to the first interview, two pilot interviews were conducted to test the procedure and determine the best approach for conducting the upcoming interviews. The results showed that the interview guide and technical equipment were adequate for addressing the aim of the study.</p> <p><b>Data analysis</b> To analyse the data, qualitative latent content analysis was performed. The content analysis involved analysing the interview transcripts in different steps.</p>	<ol style="list-style-type: none"> <li>6. Being able to share experiences with other was both strengthening and frightening</li> <li>7. Sharing experiences with other expectant first time parents facilitated feelings of recognition and belonging</li> <li>8. Taking part in others' experiences was both strengthening and frightening</li> <li>9. Adequate information facilitated a feeling of understanding</li> <li>10. Obtaining information about childbirth and parenting</li> <li>11. Adequate amount of consistent information</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> No</p>

Study Details	Participants and Methods	Themes, limitations and other comments
		<p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results and also consider future research within the field.</p> <p><b>CASP - Overall quality</b> High</p>
<p><b>Full citation</b> Berg,M., Terstad,A., Swedish women's experiences of doula support during childbirth, Midwifery, 22, 330-338, 2006</p>	<p><b>Sample size</b> N=10</p> <p><b>Inclusion criteria</b></p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. The doula as:             <ol style="list-style-type: none"> <li>a. An experienced adviser</li> <li>b. A fixer</li> </ol> </li> </ol>

Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Ref Id</b> 134274</p> <p><b>Study type</b> Qualitative (Phenomenological study)</p> <p><b>Aim of the study</b> To describe women's experiences of having a doula present during childbirth.</p> <p><b>Country/ies where the study was carried out</b> Sweden</p> <p><b>Study dates</b> October 2002 to March 2003</p> <p><b>Source of funding</b> Not mentioned.</p>	<ul style="list-style-type: none"> <li>• The women had to be fluent in Swedish;</li> <li>• The women had to be willing to be interviewed within 2 months after the birth.</li> </ul> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range (25 to 35 years);</li> <li>• Education varied from compulsory schooling (9 years) to university education;</li> <li>• 9 out of 10 women were employed;</li> <li>• Six women had given birth in a hospital and 4 women had given birth at home.</li> </ul> <p><b>Setting</b> The interviews took place in a room in the women's homes without disturbances.</p> <p><b>Sample selection</b> Women interested in participating contacted the interviewing researcher (AT) to make an appointment for an interview.</p> <p><b>Data collection</b> Data were collected via open-ended taped interviews 1–2 months after childbirth. The analysis of the text of transcripts included search for meaning units sorted into clusters for a final expression of the essential structure of the phenomenon. The length of the interviews varied between 40 and 70 minutes.</p>	<ul style="list-style-type: none"> <li>c. A mediator</li> <li>d. An affirmative person</li> <li>e. A guarantor</li> <li>f. An accessible presence.</li> </ul> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> No</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> No</p> <p><b>CASP - Ethical issues considered?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p><b>Data analysis</b> Each interview was transcribed word-by-word into text. Phenomenological analysis was used.</p>	<p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> No</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results and also consider future research within the field.</p> <p><b>CASP - Overall quality</b> Moderate</p>
<p><b>Full citation</b> Breustedt, Sarah, Puckering, Christine, A qualitative evaluation of women's experiences of the Mellow Bumps antenatal intervention, British Journal of Midwifery, 21, 187-194, 2013</p> <p><b>Ref Id</b> 1009716</p> <p><b>Study type</b> Qualitative (Phenomenological study)</p> <p><b>Aim of the study</b> This study explores participants' experiences of taking part in Mellow Bumps (a group-based intervention which draws on psychological and practical techniques</p>	<p><b>Sample size</b> N=4</p> <p><b>Inclusion criteria</b></p> <ul style="list-style-type: none"> <li>• All participants will be of child-bearing age;</li> <li>• All participants were resident in the Greater Glasgow and Clyde NHS region during pregnancy;</li> <li>• All children will be aged between 4 weeks and 18 months</li> </ul> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range (19 to 38 years);</li> </ul>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Time for personal growth</li> <li>2. Personal growth</li> <li>3. Social connectivity</li> <li>4. Time for bonding</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p>to reduce anxiety and promote well-being in vulnerable pregnant women).</p> <p><b>Country/ies where the study was carried out</b> UK</p> <p><b>Study dates</b> October and November 2011</p> <p><b>Source of funding</b> Not mentioned.</p>	<ul style="list-style-type: none"> <li>• One women had more than one child (4) and the rest had one;</li> <li>• The age of the infant ranged from 4 weeks to 15 months.</li> </ul> <p><b>Setting</b> The interview was conducted as a home visit.</p> <p><b>Sample selection</b> It was agreed that first contact about the study would be made by Mellow Parenting staff. During the initial phone call the woman was informed about the study and invited to participate. She was advised she would be contacted by the researcher who would provide further details of the study and arrange an interview.</p> <p><b>Data collection</b> Non-directive interviews were conducted that lasted between 40 and 60 minutes. All interviews were digitally recorded. The interviews were conducted after the women had given birth.</p> <p><b>Data analysis</b> Transcripts were analysed using IPA. This involved repeated and careful reading of the transcripts while listening to the digital recordings. Points of significance were noted line by line. The researcher then re-read the transcripts and noted recurring themes. Emerging themes for each interview were compared and integrated, noting similarities and discrepancies between them. Themes were clustered together and</p>	<p><b>CASP - Recruitment strategy appropriate?</b> No</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP – Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The authors consider the transferability of the results and also consider future research within the field.</p> <p><b>CASP - Overall quality</b> High</p>

Study Details	Participants and Methods	Themes, limitations and other comments
	their relationship to each other considered in order to generate super ordinate themes.	
<p><b>Full citation</b> Canuso, R., Low-income pregnant mothers' experiences of a peer-professional social support intervention, Journal of community health nursing, 20, 37-49, 2003</p> <p><b>Ref Id</b> 1009745</p> <p><b>Study type</b> General qualitative inquiry</p> <p><b>Aim of the study</b> The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers who participated in a project that was designed to improve their participation in perinatal care by using peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.</p> <p><b>Country/ies where the study was carried out</b> USA</p> <p><b>Study dates</b> April to October 2000.</p> <p><b>Source of funding</b> Not mentioned.</p>	<p><b>Sample size</b> N=7</p> <p><b>Inclusion criteria</b> Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Four mothers were African American, 1 was Native American, 1 was Caucasian, and 1 was Latina;</li> <li>• Three of the mothers were married;</li> <li>• Three of the mothers had other children;</li> <li>• Two mothers were teenagers.</li> </ul> <p><b>Setting</b> In each case the interviews regarding the luncheon were done at the mother's home and at her convenience.</p> <p><b>Sample selection</b> Pregnant women enrolled in EHS were recruited into the campaign and invited to the luncheon by home visitors. The first event was held in April 2000; the second was held in October 2000. The luncheon events were designed to offer information, modelling, reduction of isolation, and self-esteem enhancement.</p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Reduction of isolation.</li> <li>2. Information and modelling.</li> <li>3. Self-esteem enhancement.</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> No</p> <p><b>CASP - Recruitment strategy appropriate?</b> No</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> No</p> <p><b>CASP - Ethical issues considered?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p><b>Data collection</b> Within two months of the April luncheon, the author contacted each of the five participants for their permission to be interviewed and audio-taped. The author repeated this step after the October luncheon, choosing to interview only the two mothers for whom this was their first event (because there were many returning mothers at the second luncheon) in an attempt to capture the initial experience of a group event.</p> <p><b>Data analysis</b> The steps for data analysis were: 1. Becoming well-acquainted with the raw material. 2. Noting impressions and deriving categories. 3. Reviewing and refining categories. 4. Developing themes. 5. Reviewing previous steps to derive new themes, commonalities, patterns, and differences</p>	<p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> No</p> <p><b>CASP - Value of research</b> The results are not discussed within the wider context of the literature. The authors don't consider the transferability of the results and also do not consider future research within the field.</p> <p><b>CASP - Overall quality</b> Low</p>
<p><b>Full citation</b> Demecs, I. P., Fenwick, J., Gamble, J., Women's experiences of attending a creative arts program during their pregnancy, Women and Birth, 24, 112-121, 2011</p> <p><b>Ref Id</b> 577278</p> <p><b>Study type</b> General qualitative inquiry</p> <p><b>Aim of the study</b></p>	<p><b>Sample size</b> N=7</p> <p><b>Inclusion criteria</b></p> <ul style="list-style-type: none"> <li>• Demonstrate proficiency in English</li> </ul> <p><b>Exclusion criteria</b></p> <ul style="list-style-type: none"> <li>• Women who were currently participating in professional or recreational choir, dance or other art activities were excluded.</li> </ul> <p><b>Characteristics</b></p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Seeking support</li> <li>2. Connecting with each other, myself, and the baby</li> <li>3. Finding a place to share, learn, and grow</li> <li>4. Finding balance</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b></p>



Study Details	Participants and Methods	Themes, limitations and other comments
<p>This study aimed to explore pregnant women’s experiences of participating in a pregnancy program designed around the use of creative activities.</p> <p><b>Country/ies where the study was carried out</b> Australia</p> <p><b>Study dates</b> Not mentioned.</p> <p><b>Source of funding</b> Not mentioned.</p>	<ul style="list-style-type: none"> <li>• Maternal age range (26 to 38 years)</li> <li>• Four women had a Bachelor Degree; one had a diploma; one had finished Year 12;</li> <li>• Average gestational age at the start of the program 25.7 weeks</li> </ul> <p><b>Setting</b> All data collection methods were conducted in the woman's home.</p> <p><b>Sample selection</b> Women were recruited via flyers and posters placed on community boards and emailed through networks such as Maternity Coalition and Childbirth Education Association. All potential participants were contacted via telephone and provided with information about the program and participation requirements.</p> <p><b>Data collection</b> Several methods were used to collect data over the course of the program, including personal diaries, interviews, field notes, and a short open-ended questionnaire.</p> <p><b>Data analysis</b> Narrative data obtained through diaries and interviews were transcribed verbatim by the first author to facilitate familiarity and immersion in the data. A systematic approach to thematic analysis was used to explore and reveal key patterns underlying women’s perceptions and experiences.</p>	<p>Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider future research within the field.</p>

Study Details	Participants and Methods	Themes, limitations and other comments
		<b>CASP - Overall quality</b> High
<p><b>Full citation</b> Humphries, M. L., Korfmacher, J., The good, the bad, and the ambivalent: Quality of alliance in a support program for young mothers, <i>Infant Mental Health Journal</i>, 33, 22-33, 2012</p> <p><b>Ref Id</b> 887561</p> <p><b>Study type</b> General qualitative inquiry (a secondary study to an intervention study)</p> <p><b>Aim of the study</b> The study examines the qualities of the helping relationship as it develops between young mothers and doulas.</p> <p><b>Country/ies where the study was carried out</b> USA</p> <p><b>Study dates</b> Not mentioned.</p> <p><b>Source of funding</b> The Maternal and Child Health Bureau, Health Resources and Services Administration, Department of Health and Human Services, and the Irving B. Harris Foundation.</p>	<p><b>Sample size</b> N=12</p> <p>There were also 4 doulas that were interviewed but this data will not be extracted or analysed.</p> <p><b>Inclusion criteria</b> Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range (15 to 20 years).</li> </ul> <p><b>Setting</b> All but one interview took place in a private room in the administrative wing of a university community medical clinic where many of the mothers received prenatal care and social services (one interview took place in the mother's home).</p> <p><b>Sample selection</b> Recruitment on those who scored either high or low on relationship security at the initial intake, using a measure that had distinguished patterns of early childhood program involvement in other research using low-income, ethnically diverse mothers.</p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Positive alliance</li> <li>2. Negative interactions</li> <li>3. Ambivalent relationships</li> <li>4. Agreement</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Can't tell</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Can't tell</p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p><b>Data collection</b> Each mother was interviewed individually after her doula was interviewed to maintain consistency within the interviewing process. Each interview lasted approximately 60 minutes (range 45 to 90 minutes).</p> <p><b>Data analysis</b> All interviews were audio-taped, transcribed, and then checked for accuracy by the interviewer. Interview transcripts were coded by both authors and uploaded into NVivo7, a qualitative software program utilized in the analysis of the interview data.</p>	<p><b>CASP - Ethical issues considered?</b> Can't tell</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP – Clear statement of findings?</b> No</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results and also consider future research within the field.</p> <p><b>CASP - Overall quality</b> Moderate</p>
<p><b>Full citation</b> Johnson, S. A., 'Intimate mothering publics': comparing face-to-face support groups and Internet use for women seeking information and advice in the transition to first-time motherhood, Culture, health &amp; sexuality, 17, 237-251, 2015</p> <p><b>Ref Id</b> 1010203</p> <p><b>Study type</b> General qualitative inquiry</p>	<p><b>Sample size</b> N=12</p> <p>2 interviews were conducted with 10 participants and 1 interview with the remaining 2 participants. For participants interviewed twice, the first interview was conducted during the third trimester of pregnancy, ranging from 32 to 38 weeks. The second interview was undertaken postnatally, when the babies were aged 3–7 months.</p> <p><b>Inclusion criteria</b></p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Surreptitious support</li> <li>2. Anonymity, advice, and intimacy</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Aim of the study</b> The study considered the changing nature of pregnancy and mothering practices in the context of increasing digitalisation, with a particular focus on whether and how technologies enable new spaces for experiential learning and health responsibilities.</p> <p><b>Country/ies where the study was carried out</b> Australia</p> <p><b>Study dates</b> January to September 2012</p> <p><b>Source of funding</b> This research received no specific grant from any funding agency in the public, commercial, or not-for-profit sectors.</p>	<p>Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range (29 to 44 years);</li> <li>• All participants were pregnant with their first child;</li> <li>• Two participants were in same-sex relationships;</li> </ul> <p><b>Setting</b> Not mentioned.</p> <p><b>Sample selection</b> Not mentioned.</p> <p><b>Data collection</b> Semi-structured interviews.</p> <p><b>Data analysis</b> Not mentioned.</p>	<p><b>CASP - Research design appropriate?</b> No</p> <p><b>CASP - Recruitment strategy appropriate?</b> No</p> <p><b>CASP - Data collection appropriate?</b> No</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Can't tell</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> No</p> <p><b>CASP - Clear statement of findings?</b> No</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature.</p> <p><b>CASP - Overall quality</b> Low</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Full citation</b> Lundgren,I., Swedish women's experiences of doula support during childbirth, Midwifery, 26, 173-180, 2010</p> <p><b>Ref Id</b> 168562</p> <p><b>Study type</b> General qualitative inquiry</p> <p><b>Aim of the study</b> To describe women's experiences of doula support during childbirth.</p> <p><b>Country/ies where the study was carried out</b> Sweden</p> <p><b>Study dates</b> November 2006 to July 2007.</p> <p><b>Source of funding</b> Not mentioned.</p>	<p><b>Sample size</b> N=9 Primiparous: n=7 Multiparous: n=2</p> <p><b>Inclusion criteria</b></p> <ul style="list-style-type: none"> <li>• Women who had received doula support within the 'Doula support for single mothers' project;</li> <li>• Women with a good knowledge of the Swedish language;</li> <li>• Primiparous and multiparous women.</li> </ul> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b> Maternal age range (15 to 40 years)</p> <p><b>Setting</b> The interviews were conducted in the woman's home or at a place chosen by the woman, such as a cafe.</p> <p><b>Sample selection</b> Women who had received doula support (n=19) were informed about participating in this study. Nine women were chosen from this group and contacted by the researcher, asking if they wanted to participate.</p> <p><b>Data collection</b></p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Continuity</li> <li>2. To have a sister by your side</li> <li>3. To follow the woman's wishes</li> <li>4. To get help to deal with the birth</li> <li>5. A mediator to the unknown</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> No</p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p>Interviews were tape-recorded and lasted between 50 to 120 minutes.</p> <p><b>Data analysis</b> First, all the interviews were read to get a picture of the whole. When the researcher had gained a preliminary understanding of the data, a new dialogue with the text began. The data were organised into different themes. Then the text and the themes were read to search for a new whole, a main interpretation, going from the whole to the parts and back to the whole again. The main interpretation was structured at a more abstract level than the earlier interpretation made during the analysis process.</p>	<p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP – Value of research</b> The results are discussed within the wider context of the literature. The authors consider future research within the field.</p> <p><b>CASP - Overall quality</b> Moderate</p>
<p><b>Full citation</b> McGarry, A., Stenfert Kroese, B., Cox, R., How Do Women with an Intellectual Disability Experience the Support of a Doula During Their Pregnancy, Childbirth and After the Birth of Their Child?, Journal of applied research in intellectual disabilities : JARID, 29, 21-33, 2016</p> <p><b>Ref Id</b> 1010404</p> <p><b>Study type</b> Qualitative (Phenomenological study)</p> <p><b>Aim of the study</b></p>	<p><b>Sample size</b> N=4 Pre-natal interview: n=3 Postnatal interview: n=3</p> <p><b>Inclusion criteria</b></p> <ul style="list-style-type: none"> <li>• Participants had to have an intellectual disability;</li> <li>• Participants had to be pregnant at the time of the study;</li> <li>• Participants had to have been offered Doula support.</li> </ul> <p><b>Exclusion criteria</b> Not mentioned.</p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Pre-birth <ol style="list-style-type: none"> <li>a. Not knowing</li> <li>b. Doulas can meet our needs</li> <li>c. Support with hopes and dreams</li> <li>d. Preparing and coping with pregnancy changes</li> </ol> </li> <li>2. Post-birth <ol style="list-style-type: none"> <li>a. Support received during labour</li> <li>b. A trusting relationship</li> </ol> </li> </ol>

Study Details	Participants and Methods	Themes, limitations and other comments
<p>The aim of this study was to gain insight into the experiences of parents who received support from Doulas during pregnancy, birth and following the birth of their child.</p> <p><b>Country/ies where the study was carried out</b> UK</p> <p><b>Study dates</b> Not mentioned.</p> <p><b>Source of funding</b> Not mentioned.</p>	<p><b>Characteristics</b> Approximate age of participants was between the 20's and the 30's</p> <p><b>Setting</b> All interviews took place in a private place.</p> <p><b>Sample selection</b> Referrals were received from health and social services professionals. During an initial meeting the research and what would happen if the woman gave her informed consent to participate was explained. Accessible leaflets were utilised to aid informed consent. If the woman agreed to participate she was asked to sign an accessible consent form.</p> <p><b>Data collection</b> The same interview schedule was used for each participant during pre- and post-birth interviews. The interview schedule for the mother participants comprised of six questions with prompts that asked about their experiences of Doula support. Interviews were audio recorded and transcribed for the purpose of analysis.</p> <p><b>Data analysis</b> The qualitative methodology employed in the current study was Interpretive Phenomenological Analysis. The first author analysed the data. This involved reading and re-reading the transcripts several times to become familiar with the content.</p>	<p>c. Learning and having an informed choice</p> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b></p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p>During the reading of each transcript, the author noted any significant themes of interest and a list of emerging themes was identified for each participant.</p> <p>Connections between the themes were sought, which were then clustered and labelled to denote super-ordinate and sub-ordinate themes across all interviews.</p>	<p>Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results and also consider future research within the field.</p> <p><b>CASP - Overall quality</b> High</p>
<p><b>Full citation</b> McLeish, J., Redshaw, M., Peer support during pregnancy and early parenthood: A qualitative study of models and perceptions, BMC Pregnancy and Childbirth, 15 (1) (no pagination), 2015</p> <p><b>Ref Id</b> 823637</p> <p><b>Study type</b> Qualitative (Phenomenological study)</p> <p><b>Aim of the study</b> This study particularly focuses on peer support for women experiencing a range of vulnerabilities during pregnancy and the postnatal period, in projects which assigned trained volunteers to individual pregnant women.</p> <p><b>Country/ies where the study was carried out</b> UK</p>	<p><b>Sample size</b> N=42 women from 9 peer support groups Volunteer peer supporters: n=47. This data will neither be extracted nor analysed.</p> <p><b>Inclusion criteria</b> Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range (19 to 40 years);</li> <li>• 22 primiparous (1 mother had twins) and 20 were multiparous (one was a grandmother in full-time care of her granddaughter).</li> </ul> <p><b>Setting</b></p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. What is peer support</li> <li>2. Befriending or mentoring</li> <li>3. Responding to the individual</li> <li>4. Who is a peer supporter</li> <li>5. Someone like me</li> <li>6. Valuing difference</li> <li>7. The peer support relationship</li> <li>8. A friend or a professional friend</li> <li>9. Building relationships of trust</li> <li>10. Avoiding dependency</li> <li>11. Managing endings</li> <li>12. How peer supporters differ from professionals</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p>



Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Study dates</b> July 2013 to September 2014</p> <p><b>Source of funding</b> Policy Research Program in the Department of Health.</p>	<p>The researcher travelled to meet each person who agreed to participate at the project base, at their home, or at another place of their choice.</p> <p><b>Sample selection</b> The co-ordinator described the research to the project's volunteers and supported mothers using the study information leaflets (one version for mothers and one for volunteers) and asked their permission for the researcher to contact them, or arranged with those who wished to participate when the researcher could interview them. The sampling was thus purposive insofar as all participants had experience of giving or receiving peer support.</p> <p><b>Data collection</b> Semi-structured, in depth interviews were conducted.</p> <p><b>Data analysis</b> The interview transcripts were analysed using inductive thematic analysis. Each verbatim transcript was first checked against the audio recording, and then by reading and rereading each transcript, codes were identified inductively and recorded using NVIVO software.</p>	<p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The</p>

Study Details	Participants and Methods	Themes, limitations and other comments
		<p>authors consider the transferability of the results.</p> <p><b>CASP - Overall quality</b> High</p>
<p><b>Full citation</b> McLeish, J., Redshaw, M., Mothers' accounts of the impact on emotional wellbeing of organised peer support in pregnancy and early parenthood: a qualitative study, BMC Pregnancy &amp; Childbirth, 17, 28, 2017</p> <p><b>Ref Id</b> 887758</p> <p><b>Study type</b> Qualitative (Phenomenological study)</p> <p><b>Aim of the study</b> This study explores mainly disadvantaged and migrant women's views about the impact of organised peer support on their emotional wellbeing during pregnancy and after birth, and their understanding of the mechanisms involved.</p> <p><b>Country/ies where the study was carried out</b> UK</p> <p><b>Study dates</b> July 2013 to September 2014</p> <p><b>Source of funding</b></p>	<p><b>Sample size</b> N=47 from 10 different peer groups across the country.</p> <p><b>Inclusion criteria</b> Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range from 19 to 40 years;</li> <li>• 27 primiparous women and 20 multiparous women (one was a grandmother with legal custody of her grandchild);</li> </ul> <p><b>Setting</b> Not mentioned.</p> <p><b>Sample selection</b> The participants were sought from 10 peer groups around the country. The project co-ordinators described the research to supported mothers using the study information leaflet and either asked permission for the researcher to contact them, or arranged with those who wished to participate a time for interview.</p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Mothers' self-identified issues <ol style="list-style-type: none"> <li>a. Emotional distress</li> <li>b. Stressful circumstances</li> <li>c. Lack of social support</li> <li>d. Unwilling to be open with health professionals</li> </ol> </li> <li>2. How peer support affects mothers <ol style="list-style-type: none"> <li>a. Social connection</li> <li>b. Being heard</li> <li>c. Building confidence</li> <li>d. Empowerment</li> <li>e. Feeling valued</li> <li>f. Reducing stress</li> </ol> </li> <li>3. Mental health peer experience</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p>The research was funded by UK Policy Research Program in the Department of Health.</p>	<p><b>Data collection</b> Face-to-face, semi-structured interviews that lasted between 16 and 90 minutes. All interviews were audio-recorded and fully professionally transcribed.</p> <p><b>Data analysis</b> The mothers' interviews were analysed using inductive thematic analysis. Transcripts were first checked against the audio recording, and then read and reread, and codes were identified inductively and recorded using NVIVO software. Codes were refined, combined and disaggregated as data collection continued, and emergent themes identified; initial codes and emergent themes were reconsidered in the light of subsequent interviews using constant comparison.</p>	<p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p> <p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results.</p> <p><b>CASP - Overall quality</b> High</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p><b>Full citation</b> McLeish, J., Redshaw, M., "Being the best person that they can be and the best mum": A qualitative study of community volunteer doula support for disadvantaged mothers before and after birth in England, BMC pregnancy and childbirth, 19 (1) (no pagination), 2019</p> <p><b>Ref Id</b> 991168</p> <p><b>Study type</b> Qualitative (Phenomenological study)</p> <p><b>Aim of the study</b> This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.</p> <p><b>Country/ies where the study was carried out</b> UK</p> <p><b>Study dates</b> June 2015 to March 2016.</p> <p><b>Source of funding</b> NIHR Policy Research Programme in the Department of Health &amp; Social Care.</p>	<p><b>Sample size</b> N=13 Doulas: n=19 doulas took part in this study, however no data will be extracted or analysed for them.</p> <p><b>Inclusion criteria</b> Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Maternal age range (20's to mid-40's);</li> <li>• Three women were primiparous and 10 were multiparous;</li> <li>• All participants had additional vulnerabilities including social isolation, poverty, poor mental health, domestic violence, recent migration, previous traumatic birth, and an older child with disabilities.</li> </ul> <p><b>Setting</b> Participants were allowed to choose the time and place of the interview. Most chose the project base or their home, but 4 volunteers and one mother chose to be interviewed by telephone.</p> <p><b>Sample selection</b> The co-ordinator of each volunteer doula project was contacted to introduce the research.</p>	<p><b>Themes from study</b></p> <ol style="list-style-type: none"> <li>1. Overcoming stress, anxiety, and unhappiness</li> <li>2. Becoming knowledgeable and skilful</li> <li>3. Developing self-esteem and self-efficacy</li> <li>4. Using services effectively</li> <li>5. Becoming locally connected</li> </ol> <p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Yes</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP - Researcher-participant relationship adequately considered?</b> Yes</p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p>Using the study information leaflets the co-ordinator then explained the research to the volunteers and recently supported mothers.</p> <p>When a volunteer or mother had agreed to participate, the co-ordinator asked her permission for the researcher to contact her, or arranged an interview time. The researcher had no prior contact with participants.</p> <p><b>Data collection</b> Semi-structured, in-depth interviews were conducted. Each participant was interviewed once. The interviews lasted 25 to 75 minutes (median length 40 mins).</p> <p><b>Data analysis</b> All interviews were audio-recorded and fully professionally transcribed. Data collection continued until saturation was reached in the themes identified in the analysis.</p> <p>The transcripts were analysed using inductive thematic analysis. After checking against the audio recording, each transcript was read and reread, and codes were identified inductively and recorded using NVIVO software.</p> <p>Codes were refined, combined and disaggregated as data collection continued, and emergent themes identified; the technique of constant comparison was used to reconsider earlier codes and emergent themes in the light of subsequent interviews.</p>	<p><b>CASP - Ethical issues considered?</b> Yes</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b> Yes</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results.</p> <p><b>CASP - Overall quality</b> High</p>
<p><b>Full citation</b> Valaitis, R. K., Sword, W. A., Online discussions with pregnant and parenting adolescents: perspectives and</p>	<p><b>Sample size</b> N=17 n=14 were young women</p>	<p><b>Themes from study</b> 1. Experiences and Perceptions Related to Virtual Discussion</p>

Study Details	Participants and Methods	Themes, limitations and other comments
<p>possibilities, Health promotion practice, 6, 464-471, 2005</p> <p><b>Ref Id</b> 1010925</p> <p><b>Study type</b> General qualitative inquiry</p> <p><b>Aim of the study</b> The study explored the use of online discussions as a means of obtaining pregnant and parenting adolescents' perspectives regarding needs, capacities, and service delivery issues.</p> <p><b>Country/ies where the study was carried out</b> Canada</p> <p><b>Study dates</b> Not mentioned.</p> <p><b>Source of funding</b> Hamilton Community Foundation</p>	<p>n=3 male parents (this data will not be extracted or analysed)</p> <p><b>Inclusion criteria</b> Not mentioned.</p> <p><b>Exclusion criteria</b> Not mentioned.</p> <p><b>Characteristics</b></p> <ul style="list-style-type: none"> <li>• Participants ranged from 15 to 23 years of age (mean 18.2 years);</li> <li>• Ten women were primiparous and 4 women were multiparous.</li> </ul> <p><b>Setting</b> The online discussion site was accessed from computers in schools, libraries, service agencies, and private and group homes. The eight interviews took place at a location of the respondent's choice.</p> <p><b>Sample selection</b> Participants were recruited through teen-parent group homes and, to a lesser extent, through prenatal and breast-feeding clinics, doctors' offices, alternative school settings, youth drop-in centres, public health nurses, and word of mouth.</p> <p><b>Data collection</b></p>	<p><b>CASP - Clear statement of aims?</b> Yes</p> <p><b>CASP - Qualitative methodology appropriate?</b> Yes</p> <p><b>CASP - Research design appropriate?</b> Can't tell</p> <p><b>CASP - Recruitment strategy appropriate?</b> Can't tell</p> <p><b>CASP - Data collection appropriate?</b> Yes</p> <p><b>CASP – Researcher-participant relationship adequately considered?</b> No</p> <p><b>CASP - Ethical issues considered?</b> Can't tell</p> <p><b>CASP - Data analysis rigorous?</b> Yes</p> <p><b>CASP - Clear statement of findings?</b></p>

Study Details	Participants and Methods	Themes, limitations and other comments
	<p>Following each online discussion session, individual face-to-face interviews were conducted with a purposeful sample.</p> <p><b>Data analysis</b> Data were analysed using ATLAS.ti qualitative analysis software according to established procedures. Transcripts were read and reread independently by each co-principal investigator. Phrases and sentences that defined specific issues were assigned a code. The analysis proceeded to pattern or thematic coding where findings were clustered into themes with specific dimensions. The two researchers compared all coding and reached consensus on the emergent themes.</p>	<p>Can't tell</p> <p><b>CASP - Value of research</b> The results are discussed within the wider context of the literature. The authors consider the transferability of the results and also consider future research within the field.</p> <p><b>CASP – Overall quality</b> Low</p>

*CASP: critical appraisal skills programme; EHS: early head start; IPA: interpretive phenomenological analysis; NHS: national health service; SD: standard deviation*

## **Appendix E – Forest plots**

**Forest plots for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

No meta-analysis was conducted as this is a qualitative review so no forest plots have been included.



## Appendix F – GRADE-CERQual tables

**GRADE tables for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

**Table 5: Qualitative evidence profile for peer support**

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>Berg 2006</p> <ul style="list-style-type: none"> <li>To describe women's experiences of having a doula present during childbirth.</li> </ul> <p>Canuso 2003</p> <ul style="list-style-type: none"> <li>The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers who participated in a project that was designed to improve their participation in perinatal care by using peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.</li> </ul> <p>Demecs 2011</p> <ul style="list-style-type: none"> <li>This study aimed to explore pregnant women's experiences of participating in a pregnancy program</li> </ul>	<p><b>Level 1. Individual level</b></p> <p><u>Theme 1a. Interpersonal sharing and support</u></p> <p>N=8 studies</p> <p>The evidence shows that interpersonal sharing and support is a key theme in all types of peer support. The sharing of personal experiences was helpful to some women as it informed their own decisions and normalised the birthing experience. In group interventions, rich, varied, and valuable stories were shared, which provided emotional support and knowledge to other women.</p> <p><i>She had experienced a home birth before and she was confident. But also it is very intimate to give birth. And it would not have felt right to have someone there who is too close to us. A doula has seen it before and she knows why. It was very nice that she knew and understood. (Woman 8)</i></p>	<p><u>Methodological limitations</u></p> <p><i>Moderate concerns.</i></p> <p>The quality rating based on CASP checklist was high for Demecs 2011, McGarry 2016, McLeish 2015, and McLeish 2019. It was moderate for Berg 2006 and Lundgren 2010. The rating was low for Canuso 2003 and Johnson 2015. In two studies the research design was not appropriate. In all studies the recruitment strategy described is either inappropriate or described in insufficient detail. In one study, the data collection methods and the data analysis described are not rigorous, and in four studies the researcher-participant relationship is either not adequately considered or described in inadequate detail. Three studies do not have a clear statement of findings. In two studies, the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In four studies, authors have not considered the value of research in terms</p>	<p><b>Low quality</b></p> <p>(Moderate concerns for methodological limitations and relevance, minor concerns for coherence and adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>designed around the use of creative activities.</p> <p>Johnson 2015</p> <ul style="list-style-type: none"> <li>The study considered the changing nature of pregnancy and mothering practices in the context of increasing digitalisation, with a particular focus on whether and how technologies enable new spaces for experiential learning and health responsibilities.</li> </ul> <p>Lundgren 2010</p> <ul style="list-style-type: none"> <li>To describe women's experiences of doula support during childbirth.</li> </ul> <p>McGarry 2016</p> <ul style="list-style-type: none"> <li>The aim of this study was to gain insight into the experiences of parents who received support from Doulas during pregnancy, birth and following the birth of their child.</li> </ul> <p>McLeish 2015</p> <ul style="list-style-type: none"> <li>This study particularly focuses on peer support for women experiencing a range of vulnerabilities during pregnancy and the postnatal period, in projects</li> </ul>	<p><i>“The real reason why I came along was to be able to gain . . . from other people’s experiences.”</i></p> <p><i>‘Because I feel upset and down and sometimes happy, sometimes sad, you know, I want to share my feelings somebody else’ (M013).</i></p> <p><i>“She’s like a little light at the end of the phone, if anything I was worried about, I would text her” (M06).</i></p>	<p>of further work and transferability of results.</p> <p><u>Coherence</u> <i>Minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, two studies report women’s experiences of peer support postnatally, and two studies report women’s views ante- and postnatally.</p> <p><u>Adequacy</u> <i>Minor concerns.</i></p> <p>There are eight studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women and their peer supporters, and another study focused on the views of women and their doulas. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p> <p>Although all studies covered all aspects of peer support and focused on women’s views, Canuso 2003 specifically recruited</p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>which assigned trained volunteers to individual pregnant women.</p> <p>McLeish 2019</p> <ul style="list-style-type: none"> <li>This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.</li> </ul>		<p>low income women. Johnson 2015 included same-sex partners and McGarry 2016 focused on women who had intellectual disabilities. Furthermore, McLeish 2015 and McLeish 2019 used a sample of vulnerable women as their population. This may therefore restrict the applicability of the results to the review finding.</p>	
<p>Adler 2002</p> <ul style="list-style-type: none"> <li>The purpose of this qualitative study was threefold: to investigate the effectiveness of a “virtual focus group” as a mechanism for collecting qualitative data, to explore the lived experience of pregnant women confined to home bed rest following a diagnosis of preterm labor, and to assess the value of the virtual focus group as an online peer support group for women on home bed rest.</li> </ul> <p>Backstrom 2017</p> <ul style="list-style-type: none"> <li>The aim of this study was to explore expectant first-time mothers’ experiences of social support within the</li> </ul>	<p><b>Level 1. Individual level</b> <u>Theme 1b. Feeling socially connected</u> N=9 studies The evidence shows that social connectivity was a prevalent theme throughout all forms of peer support during pregnancy. Most women described feeling isolated and lonely during their pregnancy, regardless of their social circumstance. With all peer support forms women described positive experiences that enabled them to share experiences of pregnancy and feel supported, which resulted in friendships with their supporters. Women commented on wanting to maintain new social contacts after the arrival of the baby, to share their experiences and support each other throughout their parenting journey.</p>	<p><u>Methodological limitations</u> <i>Moderate concerns.</i> The quality rating based on CASP checklist was high for Adler 2002, Backstrom 2017, Breusdedt 2013, Demecs 2011, and McLeish 2017. The quality was moderate for Lundgren 2010, and low for Canuso 2003, Johnson 2015 and Valaitis 2005. In three studies the research design is not described or described inadequately. In four studies the recruitment strategy is not described and in four studies is not clear how the researchers recruited their participants. In one study, there is no description on how data was collected. In three studies there is no mention of the researcher considering the influence of their relationship with the participant, and in two studies it is not clear whether the influence of this relationship has been considered. In one study it is</p>	<p><b>Low quality</b> (Moderate concerns for methodological limitations and relevance, minor concerns for adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>social network, when preparing for childbirth and parenting.</p> <p>Breustedt 2013</p> <ul style="list-style-type: none"> <li>This study explores participants' experiences of taking part in Mellow Bumps (a group-based intervention which draws on psychological and practical techniques to reduce anxiety and promote well-being in vulnerable pregnant women).</li> </ul> <p>Canuso 2003</p> <ul style="list-style-type: none"> <li>The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers who participated in a project that was designed to improve their participation in perinatal care by using peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.</li> </ul> <p>Demecs 2011</p> <ul style="list-style-type: none"> <li>This study aimed to explore pregnant women's experiences of participating in a pregnancy program</li> </ul>	<p><i>"Being a part of the focus group has definitely been a highlight of my bedrest experience. It helped so much to know that I wasn't the only one feeling the things I did and fighting through the difficulties."</i></p> <p><i>"It was also nice to feel that I instantly made new friends, as quickly as I had lost daily contact with my friends at work."</i></p> <p><i>'It was really good, I made a lot of friends and the facilitators were really nice too. It was nice to get out and meet people.'</i> (Linda)</p> <p><i>"I liked doing it as a group . . . kind of made it fun"</i> (Lorna).</p> <p><i>It's made me a lot more confident because I'm getting out more and I'm seeing people more"</i> (M025).</p> <p><i>"[They could meet] somebody in particular that they talk more to and they had very similar what they went through and they said, let's meet up or something and they end up becoming friends."</i></p>	<p>unclear whether the authors have considered the ethical issues of their study, and in another study there is no description of a rigorous data analysis. In two studies there is no clear statement of findings, and in one study is unclear what the conclusion of the study was. In three studies the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In three studies, authors have not considered the value of research in terms of further work and transferability of results.</p> <p><u>Coherence</u> <i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, two studies report women's experiences of peer support postnatally, and another study reports experiences ante- and postnatally.</p> <p><u>Adequacy</u> <i>Minor concerns.</i></p> <p>There are nine studies contributing to this theme that all offer moderately rich</p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>designed around the use of creative activities.</p> <p>Johnson 2015</p> <ul style="list-style-type: none"> <li>The study considered the changing nature of pregnancy and mothering practices in the context of increasing digitalisation, with a particular focus on whether and how technologies enable new spaces for experiential learning and health responsibilities.</li> </ul> <p>Lundgren 2010</p> <ul style="list-style-type: none"> <li>To describe women's experiences of doula support during childbirth.</li> </ul> <p>McLeish 2017</p> <ul style="list-style-type: none"> <li>This study explores mainly disadvantaged and migrant women's views about the impact of organised peer support on their emotional well-being during pregnancy and after birth, and their understanding of the mechanisms involved.</li> </ul> <p>Valaitis 2005</p> <ul style="list-style-type: none"> <li>The study explored the use of online discussions as a means of obtaining pregnant and parenting adolescents'</li> </ul>		<p>qualitative data to support the finding. However, one study focused on the views of women on bed-rest as well as their views of online support, and another study focused on the views of women and some men. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p> <p>Although all studies covered all aspects of peer support and focused on women's views, Alder 2002 specifically studied peer support for high-risk pregnant women who required bed-rest. Backstrom 2017 and Johnson 2015 included same-sex couples in their population. Breustedt 2013 included women with complex and social care needs in their population, who were referred to this intervention since they reported feeling low or lacking an effective social network. Canuso 2003 studied very low income women, and McLeish 2017 studied disadvantaged and vulnerable women. Finally, Valaitis 2005 focused on young mothers. This may therefore restrict the applicability of the results to the review finding.</p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>perspectives regarding needs, capacities, and service delivery issues.</p>			
<p>Breustedt 2013</p> <ul style="list-style-type: none"> <li>This study explores participants' experiences of taking part in Mellow Bumps (a group-based intervention which draws on psychological and practical techniques to reduce anxiety and promote well-being in vulnerable pregnant women).</li> </ul> <p>Canuso 2003</p> <ul style="list-style-type: none"> <li>The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers who participated in a project that was designed to improve their participation in perinatal care by using peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.</li> </ul> <p>Demecs 2011</p> <ul style="list-style-type: none"> <li>This study aimed to explore pregnant women's experiences of participating in a pregnancy program</li> </ul>	<p><b>Level 1. Individual level</b> <u>Theme 1c. Attachment</u> N=6</p> <p>The evidence discusses how peer support has a strong effect on attachment to doulas, peer supporters, or other women in a group, and also towards the attachment to the baby. A few studies also report women describing feelings of loss at the end of a group session or the difficulties faced when ending their relationship with a peer supporter or a doula.</p> <p><i>'I made friends; it's not like just going to a group. The group is having a reunion soon so I'll get to see everyone, and Mellow Babies is coming up, so I want to go to that.'</i> (Joanne)</p> <p><i>'Without Mellow Bumps I wouldn't have had the start of that process where I thought "I do love my baby and I'm excited to see her and hold her." Before that I didn't feel it was my baby.'</i> (Joanne)</p> <p><i>[The volunteer] was like on 24 h call outs, she would say, "Phone me." She could come to my place six in the evening, and I thought, "This lady doesn't know me and she is just volunteering to do this. Why is she sacrificing her own personal time?"</i></p>	<p><u>Methodological limitations</u> <i>Moderate concerns.</i></p> <p>The quality rating based on CASP checklist was high for Breustedt 2013, Demecs 2011, McLeish 2015, and McLeish 2019. The rating was moderate for Humphries 2012 and low for Canuso 2003.</p> <p>One study did not describe the research design adequately and in one study it was unclear. It was unclear in four studies whether the recruitment strategy was appropriate and in two studies details on the strategy were not given. In one study the researcher-participant relationship was not adequately considered and in another study it was not clear whether the authors had considered it. In one study it was unclear whether the ethical issues had been considered. In two studies there was no clear statement of findings. In two studies the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In three studies, authors have not considered the value of research in terms of further work and transferability of results.</p>	<p><b>Low quality</b> (Moderate concerns for methodological limitations and relevance, minor concerns for adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>designed around the use of creative activities.</p> <p>Humphries 2012</p> <ul style="list-style-type: none"> <li>The study examines the qualities of the helping relationship as it develops between young mothers and doulas.</li> </ul> <p>McLeish 2015</p> <ul style="list-style-type: none"> <li>This study particularly focuses on peer support for women experiencing a range of vulnerabilities during pregnancy and the postnatal period, in projects which assigned trained volunteers to individual pregnant women.</li> </ul> <p>McLeish 2019</p> <ul style="list-style-type: none"> <li>This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.</li> </ul>	<p><i>...She wouldn't be bothering unless she really cared."</i> (M006).</p> <p><i>"I really still missing her...the person I like, I have to lose them at the end, so that's my struggle"</i> (M15).</p>	<p><u>Coherence</u> <i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, one study reports women's experiences of peer support postnatally.</p> <p><u>Adequacy</u> <i>Minor concerns.</i></p> <p>There are six studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women and their peer supporters, and two other studies focused on the views of women and their doulas. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p> <p>Although all studies covered all aspects of peer support and focused on women's views, Breustedt 2013 included women with complex and social care needs in their population, who were referred to this intervention since they reported feeling low or lacking an effective social network. Canuso 2003 studied very low</p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
		income women and Humphries 2012 studied young mothers. McLeish 2015 and McLeish 2019 studied vulnerable women as their population. This may therefore restrict the applicability of the results to the review finding.	
<p>Berg 2006</p> <ul style="list-style-type: none"> <li>To describe women's experiences of having a doula present during childbirth.</li> </ul> <p>Canuso 2003</p> <ul style="list-style-type: none"> <li>The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers who participated in a project that was designed to improve their participation in perinatal care by using peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.</li> </ul> <p>Demecs 2011</p> <ul style="list-style-type: none"> <li>This study aimed to explore pregnant women's experiences of participating in a pregnancy program</li> </ul>	<p><b>Level 1. Individual level</b>  <u>Theme 1d. Self-efficacy and empowerment</u>            N=6            The evidence shows how peer support improved women's self-efficacy through the pregnancy period and empowered them in their decision-making.            Women appreciated the doula acting as a mediator between her and her partner, as well as between her and the midwife. This empowered women to be able to voice their needs and wishes.  <i>She was in a surrounding familiar to her... knew who could understand how I was functioning and which midwives would be positive to my wishes. She was like a mediator to the staff, really, and it was, above all, that which made me able to relax.</i> (Woman 2)    <i>You are strong when you are safe. If you are safe at the hospital it is a good thing to be there, but it is easy for the hospital to take over and take away your power, it is</i></p>	<p><u>Methodological limitations</u>  <i>Minor concerns.</i>            The quality rating based on CASP checklist was high for Demecs 2011, McGarry 2016, and McLeish 2019. It was moderate for Lundgren 2010 and low for Canuso 2003.            In one study the research design was not mentioned. In two studies the recruitment strategy was not described and in four studies it was unclear. The three studies the researcher-participant relationship was not adequately considered and in two studies there was no clear statement of findings. In one study the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In three studies, authors have not considered the value of research in terms of further work and transferability of results.    <u>Coherence</u></p>	<p><b>Moderate quality</b>            (Moderate concerns for relevance and minor concerns for methodological limitations)</p>



Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>designed around the use of creative activities.</p> <p>Lundgren 2010</p> <ul style="list-style-type: none"> <li>To describe women's experiences of doula support during childbirth.</li> </ul> <p>McGarry 2016</p> <ul style="list-style-type: none"> <li>The aim of this study was to gain insight into the experiences of parents who received support from Doulas during pregnancy, birth and following the birth of their child.</li> </ul> <p>McLeish 2019</p> <ul style="list-style-type: none"> <li>This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.</li> </ul>	<p><i>then difficult to give birth when you can't help yourself. (Woman 4)</i></p> <p><i>"I knew all the education pieces even before I was pregnant."</i></p>	<p><i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, one study reports women's experiences of peer support postnatally and another study reports their experiences ante- and postnatally.</p> <p><u>Adequacy</u></p> <p><i>No or very minor concerns.</i></p> <p>There are six studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However one study focused on the views of women and their doulas. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u></p> <p><i>Moderate concerns.</i></p> <p>Although all studies covered all aspects of peer support and focused on women's views, Canuso 2003 studied women who were a very low income background; McGarry 2016 focused on women with intellectual disabilities; and McLeish 2019 studied vulnerable women. This may therefore restrict the applicability of the results to the review finding.</p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>Berg 2006</p> <ul style="list-style-type: none"> <li>To describe women's experiences of having a doula present during childbirth.</li> </ul> <p>Humphries 2012</p> <ul style="list-style-type: none"> <li>The study examines the qualities of the helping relationship as it develops between young mothers and doulas.</li> </ul> <p>Lundgren 2010</p> <ul style="list-style-type: none"> <li>To describe women's experiences of doula support during childbirth.</li> </ul> <p>McLeish 2015</p> <ul style="list-style-type: none"> <li>This study particularly focuses on peer support for women experiencing a range of vulnerabilities during pregnancy and the postnatal period, in projects which assigned trained volunteers to individual pregnant women.</li> </ul>	<p><b>Level 1. Individual level</b> <u>Theme 1e. Accessibility and availability</u> N=4 studies</p> <p>The evidence showed that women placed a lot of importance on having accessible peer support that was available whenever they required it. Women cherished the doula's continuous presence, which assured her the doula was always there for the woman. Both the woman and her partner felt the doula was an accessible presence who was with them from pregnancy, through birth, and even afterwards. Having this continuity of care throughout the pregnancy experience gave the women a feeling of security and trust.</p> <p><i>It is an enormous support that you can just ask and she is there. To have a doula present the whole time is very good, to have somebody with you the whole time when the midwives change now and then. (Woman 6)</i></p> <p><i>There is no chance for me to meet the midwife who was going to be with me during the birth before, to get to know her. (2)</i></p> <p><i>It is more like a production line for the midwives since they are running in and out</i></p>	<p><u>Methodological limitations</u> <i>Moderate concerns.</i></p> <p>The quality rating based on CASP checklist was high for McLeish 2015 and moderate for Berg 2006, Humphries 2012, and Lundgren 2010.</p> <p>In one study it was unclear whether the research design for appropriate. In three studies it was unclear whether the recruitment strategy was appropriate and in one study there was no detail given about the strategy used. In two studies there is no detail on whether the researcher-participant relationship is considered and in one study it is unclear. In one study it is unclear whether the ethical issues are considered, and in two studies there is no clear statement of findings. In two studies, authors have not considered the value of research in terms of further work and transferability of results.</p> <p><u>Coherence</u> <i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, two</p>	<p><b>Low quality</b> (Moderate concerns for methodological limitations and relevance, minor concerns for adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
	<p><i>the rooms... they are not present all the time. (6)</i></p> <p><i>[The volunteer] would just suggest, "Oh when shall we meet again, in about four weeks?" and so it didn't make me feel like I could say, "Actually..." I'm aware she's a volunteer, you don't want to take up too much time. (It would be better if there was more frequency, maybe more regular time slot...then you don't need to worry about you asking too much. (M003)</i></p>	<p>studies report women's experiences of peer support postnatally.</p> <p><u>Adequacy</u> <i>Minor concerns.</i></p> <p>There are four studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women and their peer supporters, and another study focused on the views of women and their doulas. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p> <p>Although all studies covered all aspects of peer support and focused on women's views, Humphries 2012 studied young mothers and McLeish 2015 focused on vulnerable women. This may therefore restrict the applicability of the results to the review finding.</p>	
<p>Backstrom 2017</p> <ul style="list-style-type: none"> <li>The aim of this study was to explore expectant first-time mothers' experiences of social support within the social network, when</li> </ul>	<p><b>Level 2. Community level</b> <u>Theme 2a. Informational support</u> N=4 studies</p> <p>The evidence shows that women value receiving information through social support as it made them feel more</p>	<p><u>Methodological limitations</u> <i>Minor concerns.</i></p> <p>The quality rating based on CASP checklist was high for Backstrom 2017, McGarry 2016, and McLeish 2019. The quality for Johnson 2015 was low. In one study there was no description on whether the research design was</p>	<p><b>Low quality</b> (Moderate concerns for relevance, and minor concerns for methodological limitations, coherence, and adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>preparing for childbirth and parenting.</p> <p>Johnson 2015</p> <ul style="list-style-type: none"> <li>The study considered the changing nature of pregnancy and mothering practices in the context of increasing digitalisation, with a particular focus on whether and how technologies enable new spaces for experiential learning and health responsibilities.</li> </ul> <p>McGarry 2016</p> <ul style="list-style-type: none"> <li>The aim of this study was to gain insight into the experiences of parents who received support from Doulas during pregnancy, birth and following the birth of their child.</li> </ul> <p>McLeish 2019</p> <ul style="list-style-type: none"> <li>This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.</li> </ul>	<p>knowledgeable and able to make an informed choice.</p> <p><i>“ . . .because you get a lot [of different information] and have to mix it all together, how others [other expectant mothers or parents] have had it, and so on. . . it can turn into a lot of exaggerated facts. Because, sometimes, it can be a bit too overwhelming and then. . . it can be very difficult to absorb the information. . . especially when you are in my situation and are to give birth for the first time.” (W 8)</i></p> <p><i>“She usually makes me feel a bit better. I think it’s just when you go to your doctor it allays your fears. She’s a fairly conventional doctor in some ways, so um, sometimes I feel a little bit like I can’t address certain things with her because I know she’ll just, you know?” (Rachel, prenatal)</i></p>	<p>appropriate. In two studies the recruitment strategy was not described sufficiently and in two studies it is unclear. In one study the data collection methods were not described appropriately and in one study it was unclear whether the researcher-participant relationship was considered adequately. In one study the data analysis was not rigorous enough and there was no clear statement of findings. In one study the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In one study, authors have not considered the value of research in terms of further work and transferability of results.</p> <p><u>Coherence</u> <i>Minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, two studies report women’s experiences of peer support ante- and postnatally.</p> <p><u>Adequacy</u> <i>Minor concerns.</i></p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
		<p>There are four studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women their doulas. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p> <p>Although all studies covered all aspects of peer support and focused on women's views, Backstrom 2017 and Johnson 2015 included same-sex couples in their population. McGarry 2016 focused on women with intellectual disabilities and McLeish 2019 focused on vulnerable women. This may therefore restrict the applicability of the results to the review finding.</p>	
<p>Breustedt 2013</p> <ul style="list-style-type: none"> <li>This study explores participants' experiences of taking part in Mellow Bumps (a group-based intervention which draws on psychological and practical techniques to reduce anxiety and promote well-being in vulnerable pregnant women).</li> </ul> <p>McGarry 2016</p>	<p><b>Level 2. Community level</b> <u>Theme 2b. Practical support</u> N=4 studies</p> <p>The evidence shows that alongside informational support, practical support was also considered an important facet of peer support. In group interventions, women were able to gain knowledge on how to communicate with their baby, thus reinforcing their connection with their baby. In one study, women commented on how her Doula showed</p>	<p><u>Methodological limitations</u> <i>No or very minor concerns.</i></p> <p>The quality rating based on CASP checklist was high for Breustedt 2013, McGarry 2016, McLeish 2017, and McLeish 2019.</p> <p>In three studies there was uncertainty surrounding the appropriateness of the recruitment strategy and in one study there was not enough information describing the strategy. In one study the authors have not discussed the results</p>	<p><b>Moderate quality</b> (Moderate concerns for relevance, and minor concerns for adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<ul style="list-style-type: none"> <li>The aim of this study was to gain insight into the experiences of parents who received support from Doulas during pregnancy, birth and following the birth of their child.</li> </ul> <p>McLeish 2017</p> <ul style="list-style-type: none"> <li>This study explores mainly disadvantaged and migrant women's views about the impact of organised peer support on their emotional well-being during pregnancy and after birth, and their understanding of the mechanisms involved.</li> </ul> <p>McLeish 2019</p> <ul style="list-style-type: none"> <li>This paper explores how the antenatal and postnatal role of the community doula is experienced and understood by the volunteer doulas and the disadvantaged women who they support.</li> </ul>	<p>her how to do tasks and taught her skills through modelling. This included skills such different positions to hold the baby in, how to feed the baby, and so on. Women appreciated this type of support and thought it was as beneficial as emotional support, as it still carried some emotional meaning.</p> <p><i>She showed me how to hold my baby, how to hold her in a sling and then I could do stuff like housework whilst holding her, holding her close to my heart.</i> (Charlotte)</p> <p><i>"It was just like having a sister there ... she tried to get me to not think about whatever it is they were doing, they were poking and prodding everywhere"</i> (M08).</p> <p><i>"I would have some questions and if I forgot to ask any she would say, 'What about this?'"</i> (M01)</p>	<p>within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In two studies, authors have not considered the value of research in terms of further work and transferability of results.</p> <p><u>Coherence</u> <i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable. Furthermore, one study reports women's experiences of peer support postnatally, and another study reports their experiences ante- and postnatally.</p> <p><u>Adequacy</u> <i>Minor concerns.</i></p> <p>There are four studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women and their doulas. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
		<p>Although all studies covered all aspects of peer support and focused on women's views, Breustedt 2013 included women with complex and social care needs in their population, who were referred to this intervention since they reported feeling low or lacking an effective social network. McGarry 2016 focused on women with intellectual disabilities. McLeish 2017 focused on disadvantaged and migrant women's views and McLeish 2019 focused on vulnerable women. This may therefore restrict the applicability of the results to the review finding.</p>	
<p>Backstrom 2017</p> <ul style="list-style-type: none"> <li>The aim of this study was to explore expectant first-time mothers' experiences of social support within the social network, when preparing for childbirth and parenting.</li> </ul> <p>Canuso 2003</p> <ul style="list-style-type: none"> <li>The purpose of this study was to describe the experiences of a group of Early Head Start (EHS) mothers who participated in a project that was designed to improve their participation in perinatal care by using</li> </ul>	<p><b>Level 3. Societal level</b> <u>Theme 3a. Shared experiences and backgrounds</u> N=6 studies The evidence shows that women value support and advice from those who have been or are in similar situations to themselves. The evidence demonstrates that age and parity have an influence on women's perceptions of peer support. For peer supporters and doulas, women felt more comfortable if they knew they had a shared experience with the peer supporter or doula.</p>	<p><u>Methodological limitations</u> <i>Minor concerns.</i> The quality rating based on CASP checklist was high for Backstrom 2017, Demecs 2011, McLeish 2015 and McLeish 2017. The quality for Humphries 2012 was moderate and the quality for Canuso 2003 was low. In one study there was no description on the research design and in one study it was unclear what design was used. In two studies the recruitment strategy was not appropriate and in four studies it was unclear what sampling methods had been used. In one study the researcher-participant relationship had not been considered adequately and in one study it was unclear. In one study it was not</p>	<p><b>Low quality</b> (Moderate concerns for relevance, minor concerns for methodological concerns and adequacy)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>peer and professional support in a group setting to increase their investment in their pregnancy and birth experiences.</p> <p>Demecs 2011</p> <ul style="list-style-type: none"> <li>This study aimed to explore pregnant women's experiences of participating in a pregnancy program designed around the use of creative activities.</li> </ul> <p>Humphries 2012</p> <ul style="list-style-type: none"> <li>The study examines the qualities of the helping relationship as it develops between young mothers and doulas.</li> </ul> <p>McLeish 2015</p> <ul style="list-style-type: none"> <li>This study particularly focuses on peer support for women experiencing a range of vulnerabilities during pregnancy and the postnatal period, in projects which assigned trained volunteers to individual pregnant women.</li> </ul> <p>McLeish 2017</p> <ul style="list-style-type: none"> <li>This study explores mainly disadvantaged and migrant women's views about the impact of organised peer</li> </ul>	<p><i>It's clear that I'm not the only one to have a baby, but you can get feelings like that in the beginning. . . but when you meet these other expectant [first-time] parents, it feels like you are not as much alone. . . (W 4).</i></p> <p><i>I have been in contact with people who are older, and I have to say that they [the elderly] are thinking differently. But relatives and friends who are in my age group have also told me about their experiences. . . and it has been nice. They have told me what they did and didn't do, and what was good for them. . . and then it feels like we [me and my partner] can find a way that can work for us. (W 4).</i></p> <p><i>"I was able to meet and enjoy the company of other mothers, teenagers of my age, and older than myself."</i></p> <p><i>"I thought they left out that I was the youngest one."</i></p> <p><i>"I was interested in seeing how other second time mums became more empowered after their first birth . . . they've sort of gained a bit of control over the next one"</i></p> <p><i>'Do you know when you get Pakistani people with another Pakistani person, you can't actually open up to them...And they asked me if I wanted an Asian lady and I goes, "I'd prefer White"' (M020)</i></p>	<p>apparent whether the authors had considered ethical issues and in two studies there was no clear statement of findings. In one study the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In three studies, authors have not considered the value of research in terms of further work and transferability of results.</p> <p><u>Coherence</u></p> <p><i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. However, the studies contributing to this theme report different types of peer support that may not be directly comparable.</p> <p><u>Adequacy</u></p> <p><i>Minor concerns.</i></p> <p>There are six studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women and their peer supporters, and two other studies focused on the views of women and their doulas. This may reduce the adequacy of evidence for this theme.</p>	



Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>support on their emotional well-being during pregnancy and after birth, and their understanding of the mechanisms involved.</p>		<p><u>Relevance</u> <i>Moderate concerns.</i> Although all studies covered all aspects of peer support and focused on women's views, Backstrom 2017 included same-sex couples, Canuso 2003 studied women from a low income background, and Humphries 2012 focused on young mothers. McLeish 2015 focused on vulnerable women and McLeish 2017 focused on disadvantaged and migrant women's views. This may therefore restrict the applicability of the results to the review finding.</p>	
<p>Breustedt 2013</p> <ul style="list-style-type: none"> <li>This study explores participants' experiences of taking part in Mellow Bumps (a group-based intervention which draws on psychological and practical techniques to reduce anxiety and promote well-being in vulnerable pregnant women).</li> </ul> <p>Demecs 2011</p> <ul style="list-style-type: none"> <li>This study aimed to explore pregnant women's experiences of participating in a pregnancy program</li> </ul>	<p><b>Level 3. Societal level</b> <u>Theme 3b. Safe space</u> N=2 studies The evidence shows that because women felt strong connections with women in peer groups and they regarded this environment as a safe space to share their thoughts, concerns and feelings. <i>'I thought I'd be really judged and everyone would judge me and look down on me. The more I went, the more welcome I felt. [The facilitator] went extremely out of her way to make us feel welcome; I think that's what you really need to do.'</i> (Joanne)</p>	<p><u>Methodological limitations</u> <i>No or very minor concerns.</i> The quality rating based on CASP checklist was high for both Breustedt 2013 and Demecs 2011. In one study there was insufficient information on how appropriate the recruitment strategy was. In another study it was unclear what recruitment strategy had been used. In one study the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study. In one study, the authors have not considered the value of</p>	<p><b>Low quality</b> (Moderate concerns for adequacy and relevance)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>designed around the use of creative activities.</p>	<p><i>'It was a very chilled non-judgemental atmosphere. You feel so welcome, it sorts out your mind ... stops your mind being so confused. It feels like going for a chat with your friends but all your friends are going through the same thing at the same time, which never happens with your friends normally!'</i> (Joanne)</p> <p><i>"It sounded more of a naturalistic approach to motherhood, not something that was structured or intellectual classes . . . , it was very appealing, seemed to be relaxed."</i></p> <p><i>"I was looking for a space which is totally dedicated to the pregnancy."</i></p>	<p>research in terms of further work and transferability of results.</p> <p><u>Coherence</u> <i>No or very minor concerns.</i> This theme is well supported by the evidence and there are little conflicting or ambiguous data. Both studies describe a peer group support intervention. However, one study reports women's experiences of peer support postnatally.</p> <p><u>Adequacy</u> <i>Moderate concerns.</i> There are two studies contributing to this theme that all offer moderately rich qualitative data to support the finding.</p> <p><u>Relevance</u> <i>Moderate concerns.</i> The studies focused on women's views of peer group support only and therefore the finding may not be generalisable to other forms of peer support. Furthermore, Breustedt 2013 included women with complex and social care needs in their population, who were referred to this intervention since they reported feeling low or lacking an effective social network. This may therefore restrict the applicability of the results to the review finding.</p>	

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
<p>Johnson 2015</p> <ul style="list-style-type: none"> <li>The study considered the changing nature of pregnancy and mothering practices in the context of increasing digitalisation, with a particular focus on whether and how technologies enable new spaces for experiential learning and health responsibilities.</li> </ul> <p>Valaitis 2005</p> <ul style="list-style-type: none"> <li>The study explored the use of online discussions as a means of obtaining pregnant and parenting adolescents' perspectives regarding needs, capacities, and service delivery issues.</li> </ul>	<p><b>Level 3. Societal level</b> <u>Theme 3c. Anonymity</u> N=2 studies</p> <p>The evidence shows that women value anonymity when seeking online peer support. In one study, women mentioned how they enjoyed being a part of an online community and commented on experiencing intimacy, support, and care from other members, and finding this very beneficial. Some women valued that the Internet gave a sense of anonymity when researching or asking questions on some taboo topics in pregnancy, such as child vaccinations, advice on same-sex parenting, and methods of child discipline.</p> <p><i>I've never participated on an online forum, I've only looked to find what other people have said . . . maybe I've never had the guts or felt the need to put in my own question? And maybe because my own questions kind of are there already. (Jenny, postnatal)</i></p> <p><i>I'm a very open person, and if someone asked me a question I'll be open with them and answer them. I'm not gonna hide around the bush and beat around the bushes about it. But it's a nice comfort zone for those who aren't as open because then they can be open as they want, know that no one will know who they are.</i></p>	<p><u>Methodological limitations</u> <i>Moderate concerns.</i></p> <p>The quality rating based on CASP checklist was low for Johnson 2015 and Valaitis 2005.</p> <p>In one study there is no description of the research design or recruitment strategy and in the other study it is unclear. In one study information on whether the data collection methods are appropriate is not given. In one study the researcher-participant relationship is not considered adequately and in the other study it is unclear. In one study it is unclear whether the ethical issues have been considered. In one study there is insufficient information on whether the data analysis is rigorous. In one study there is no statement of findings and in the other study it is not clear what the findings are. In one study the authors have not discussed the results within the wider context of the literature, and have neither considered future research, nor the transferability of the results from the study.</p> <p><u>Coherence</u> <i>No or very minor concerns.</i></p> <p>This theme is well supported by the evidence and there are little conflicting or ambiguous data. Both studies describe an online peer support intervention.</p>	<p><b>Very low quality</b> (Moderate concerns for methodological limitations, adequacy, and relevance)</p>

Study and study aim	Theme	Assessment of GRADE-CERQual components	Overall confidence (Quality)
	<p><i>Some people don't mind, you know, sharing with other people like face-to-face. Like, I personally probably would be more comfortable doing it on the computer. Like, I guess I'm more like a shy type to be face-to-face and kind of speak out my opinions in front of a lot of people. So it would be easier for me to do it on the computer.</i></p>	<p>However, one study reports women's experiences of peer support ante- and postnatally.</p> <p><u>Adequacy</u> <i>Moderate concerns.</i></p> <p>There are two studies contributing to this theme that all offer moderately rich qualitative data to support the finding. However, one study focused on the views of women and men on online peer support. This may reduce the adequacy of evidence for this theme.</p> <p><u>Relevance</u> <i>Moderate concerns.</i></p> <p>The studies focused on women's views of online peer support only and therefore the finding may not be generalisable to other forms of peer support. Johnson 2015 included same-sex relationships and Valaitis 2005 studied young mothers. This may therefore restrict the applicability of the results to the review finding.</p>	

CASP: critical appraisal skills programme

## **Appendix G – Economic evidence study selection**

### **Economic evidence study selection for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

A single economic search was undertaken for all topics included in the scope of this guideline. No economic studies were identified which were applicable to this review question. See supplementary material 2 for details.

## **Appendix H – Economic evidence tables**

**Economic evidence tables for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

No evidence was identified which was applicable to this review question.

## **Appendix I – Economic evidence profiles**

**Economic evidence profiles for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

No economic evidence was identified which was applicable to this review question.

## **Appendix J – Economic analysis**

**Economic evidence analysis for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

No economic analysis was conducted for this review question.



## Appendix K – Excluded studies

### Excluded studies for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?

#### Clinical studies

**Table 6: Excluded studies and reasons for their exclusion**

Study	Reason for exclusion
Ahmed, S., Bryant, L., Hewison, J., 'Balance' is in the eye of the beholder: providing information to support informed choices in antenatal screening via Antenatal Screening Web Resource, <i>Health Expectations</i> , 10, 309-20, 2007	The study focuses on information given via online sources.
Alstveit, M., Severinsson, E., Karlsen, B., Obtaining confirmation through social relationships: Norwegian first-time mothers' experiences while on maternity leave, <i>Nursing &amp; health sciences</i> , 12, 113-118, 2010	The experiences of social support for women on maternity leave. No mention of ANC.
Beck, C. T., Benefits of participating in internet interviews: women helping women, <i>Qualitative Health Research</i> , 15, 411-22, 2005	The study focuses on trauma related to delivery. There is no ANC focus.
Bhavanani, V., Newburn, M., Women's experiences of telephone-based peer support during the transition to parenthood, <i>Community practitioner : the journal of the Community Practitioners' &amp; Health Visitors' Association</i> , 89, 36-40, 2016	Population is mostly mothers (8) rather than pregnant women (4). One pregnant woman's issue is breastfeeding which is not in the protocol for this review.
Bruinooge, Stephanie Pike, A phenomenological exploration of women's pre- and postnatal use of online social support forums, <i>Dissertation Abstracts International: Section B: The Sciences and Engineering</i> , 68, 3388, 2007	Dissertation.
Carissoli, C., Villani, D., Triberti, S., Riva, G., User experience of BenEssere Mamma, a pregnancy app for women wellbeing, <i>Annual Review of CyberTherapy and Telemedicine</i> , 14, 195-198, 2016	The data from the questionnaire are presented as quantitative data.
Cohen, Jodi H., Raymond, Jennifer M., Baker, Barker Bessett Bylund Declercq Drentea Eble Epstein Fogel Fox Fox Hoybye Kahlor Lagan Lagan Larsson Ley Madge Madge Mullin Pandey Rawal Raymond Romano Satterlund Shannon Sharf Sullivan Weissman, How the Internet is giving birth (to) a new social order, <i>Information, Communication &amp; Society</i> , 14, 937-957, 2011	Internet forums for pregnant women. The study does not give women's views of this forum.
DeNicola, N., Sheth, S., Leggett, K., Woodland, M. B., Ganju, N., Marko, K., Evaluating patient satisfaction and experience for technology-enabled prenatal care for low risk women, <i>Obstetrics and Gynecology</i> , 131 (Supplement 1), 129S, 2018	Abstract only.
Denton, L. K., Creeley, C. E., Stavola, B., Hall, K., Foltz, B. D., An analysis of online pregnancy	This study focuses on message board advice for medicines used during pregnancy.

Study	Reason for exclusion
message boards: Mother-to-mother advice on medication use, <i>Women and Birth.</i> , 2018	
Drentea, P; Moren-Cross, J , Social capital and social support on the web: the case of an internet mother site, <i>Sociology of Health &amp; Illness</i> , 920-943, 2005	The study does not present women's views on peer support.
Eapen, Doncy Joji, A qualitative description of pregnancy related social support experiences of low income mothers with low birth weight babies, <i>Dissertation Abstracts International: Section B: The Sciences and Engineering</i> , 77, No-Specified, 2017	Dissertation.
Fleming, S. E., Vandermause, R., Shaw, M., First-time mothers preparing for birthing in an electronic world: internet and mobile phone technology, <i>Journal of Reproductive and Infant Psychology</i> , 32, 240-253, 2014	The study focuses on information given via online sources.
Gale, N. K., Kenyon, S., MacArthur, C., Jolly, K., Hope, L., Synthetic social support: Theorizing lay health worker interventions, <i>Social Science and Medicine</i> , 196, 96-105, 2018	The study does not present women's views on peer support.
Gleeson, D. M., Craswell, A., Jones, C. M., Women's use of social networking sites related to childbearing: An integrative review, <i>Women and Birth.</i> , 2019	This is a review article and all relevant articles have been extracted.
Gray, J. B., Social support communication in unplanned pregnancy: support types, messages, sources, and timing, <i>Journal of health communication</i> , 19, 1196-1211, 2014	Commentary article.
Gray, Ron, Review: Social networking research opportunities: The example of 'Netmums', <i>Journal of Research in Nursing</i> , 17, 207, 2012	The data from the questionnaire are presented as quantitative data.
Guo, S. H. M., Lee, C. W., Tsao, C. M., Hsing, H. C., A Social Media-Based Mindful Yoga Program for Pregnant Women in Taiwan, <i>Studies in health technology and informatics</i> , 225, 621-622, 2016	The study does not present women's views on peer support.
Halili, L., Liu, R., Hutchinson, K. A., Semeniuk, K., Redman, L. M., Adamo, K. B., Development and pilot evaluation of a pregnancy-specific mobile health tool: a qualitative investigation of SmartMoms Canada, <i>BMC medical informatics and decision making</i> , 18, 95, 2018	The focus of the study is on women's feedback of a pregnancy app. There is no mention of peer support.
Harpel, T., Pregnant Women Sharing Pregnancy-Related Information on Facebook: Web-Based Survey Study, <i>Journal of medical Internet research</i> , 20, e115, 2018	The data from the questionnaire are presented as quantitative data.
Henshaw, E., Sabourin, B., Warning, M., Treatment-seeking behaviors and attitudes survey among women at risk for perinatal depression or anxiety, <i>JOGNN - Journal of Obstetric, Gynecologic, and Neonatal Nursing</i> , 42, 168-177, 2013	The data from the questionnaire are presented as quantitative data.
Hether, Heather Jane, Social media and health: Social support and social capital on pregnancy-related social networking sites, <i>Dissertation Abstracts</i>	Dissertation.

Study	Reason for exclusion
International Section A: Humanities and Social Sciences, 71, 15, 2010	
Hmiel, L., Collins, C., Brown, P., Cherney, E., Farmer, C., "We have this awesome organization where it was built by women for women like us": Supporting African American women through their pregnancies and beyond, <i>Social work in health care</i> , 1-17, 2019	The study does not present women's views on peer support.
Jakobsen, S. P., Charlotte, Overgaard, 'They'll be judging us' a qualitative study of pregnant women's experience of being offered participation in a supportive intervention, <i>Midwifery</i> , 61, 81-87, 2018	The study focuses on peer support provided by a professional.
Jamieson, R., Theodore, K., Raczka, R., Becoming a mother: Supported decision-making in context, <i>Journal of Intellectual DisabilitiesJ Intellect Disabil</i> , 20, 313-328, 2016	The study focuses on peer support provided by a professional or family member.
Johnson, S. M., Trejo, G., Beck, K. L., Worsley, C., Tranberg, H., Plax, K. L., Linton, J. M., Building Community Support Using a Modified World Cafe Method for Pregnant and Parenting Teenagers in Forsyth County, North Carolina, <i>Journal of Pediatric &amp; Adolescent GynecologyJ Pediatr Adolesc Gynecol</i> , 31, 614-619, 2018	There are no quotes published to support the themes mentioned.
Kerrick, Madeleine R., Refining the role of social support in first-time mothers' development of parental self-efficacy, <i>Dissertation Abstracts International: Section B: The Sciences and Engineering</i> , 79, No-Specified, 2018	Dissertation.
Khojasteh, F., Dokht, Z. E., Ansari, H., Comparison of in-person counseling and telephone support on delivery self-efficacy in primiparous women, <i>Iranian journal of obstetrics, gynecology and infertility</i> , 21, 26-34, 2018	Full text in Farsi.
Kita, A., Quality of social network for pregnant women in Japan with focus on parity and family structure, <i>The Kobe journal of medical sciences</i> , 46, 125-136, 2000	The data from the questionnaire are presented as quantitative data.
Kouri, P., Turunen, H., Tossavainen, K., Saarikoski, S., Pregnant Families' Discussions on the Net-From Virtual Connections Toward Real-Life Community, <i>Journal of Midwifery and Women's Health</i> , 51, 279-283, 2006	The study does not present women's views on peer support.
Lancastle, D., How to help patients help themselves, <i>Human Reproduction</i> , 32 (Supplement 1), i47, 2017	Abstract only.
Lingetun, L., Fungrbrant, M., Claesson, I. M., Baggens, C., 'I just want to be normal' - A qualitative study of pregnant women's blogs who present themselves as overweight or obese, <i>Midwifery</i> , 49, 65-71, 2017	The study does not present women's views on peer support.
Logsdon, M. C., Davis, D. W., Social and professional support for pregnant and parenting women, <i>Mcn, The American journal of maternal child nursing</i> . 28, 371-376, 2003	Review article on social and professional support for women. All relevant references extracted.

Study	Reason for exclusion
Logsdon, M. C., Gagne, P., Hughes, T., Patterson, J., Rakestraw, V., Social support during adolescent pregnancy: Piecing together a quilt, <i>JOGNN - Journal of Obstetric, Gynecologic, and Neonatal Nursing</i> , 34, 606-614, 2005	The study focuses on peer support provided by a professional, family member or friend.
Lunda, P., Minnie, C. S., Benade, P., Women's experiences of continuous support during childbirth: a meta-synthesis, <i>BMC Pregnancy &amp; Childbirth</i> BMC Pregnancy Childbirth, 18, 167, 2018	Review article that focuses on peer support provided by a professionals, doulas, family members, or friends. Relevant references extracted.
Malik, S., Coulson, N. S., 'They all supported me but I felt like I suddenly didn't belong anymore': An exploration of perceived disadvantages to online support seeking, <i>Journal of Psychosomatic Obstetrics and Gynecology</i> , 31, 140-149, 2010	The study does not present women's views on peer support.
McLeish, Jenny, Redshaw, Maggie, "I didn't think we'd be dealing with stuff like this": A qualitative study of volunteer support for very disadvantaged pregnant women and new mothers, <i>Midwifery</i> , 45, 36-43, 2017	The study does not present women's views on peer support.
Moseson, H., Dehlendorf, C., Gerdt, C., Vittinghoff, E., Hiatt, R. A., Barber, J., No one to turn to: low social support and the incidence of undesired pregnancy in the United States, <i>Contraception</i> , 98, 275-280, 2018	This study focused on whether low social support leads to a higher incidence of undesired pregnancies.
Nct., Effectiveness of WhatsApp Online Group Discussion for Smoking Relapse Prevention, <a href="https://clinicaltrials.gov/show/nct03760224">https://clinicaltrials.gov/show/nct03760224</a> , 2018	Entry to clinical trial page.
Nystrom, K., Ohrling, K., Parental support: mothers' experience of electronic encounters, <i>Journal of Telemedicine and Telecare</i> , 12, 194-197, 2006	There are no quotes published supporting the reported themes.
Palsson, P., Kvist, L. J., Ekelin, M., Hallstrom, I. K., Persson, E. K., "I Didn't Know What to Ask About": First-Time Mothers' Conceptions of Prenatal Preparation for the Early Parenthood Period, <i>Journal of Perinatal Education</i> J Perinat Educ, 27, 163-174, 2018	The study does not present women's views on peer support.
Paterno, M. T., Fiddian-Green, A., Gubrium, A., Moms Supporting Moms: Digital Storytelling With Peer Mentors in Recovery From Substance Use, <i>Health promotion practice</i> , 19, 823-832, 2018	The study design is a workshop and presents data as a case-study.
Paulina, B. V., Aixa, C. M., Angelina, D. C., Maximiliano, C. M., Antonia, R. R., Psychosocial needs and characteristics of an online intervention to support adolescent mothers, <i>Revista Chilena de Obstetricia y Ginecologia</i> , 82, 566-573, 2017	Full text in Spanish.
Potvin, L. A., Brown, H. K., Cobigo, V., Social support received by women with intellectual and developmental disabilities during pregnancy and childbirth: An exploratory qualitative study, <i>Midwifery</i> , 37, 57-64, 2016	The study focuses on peer support provided by a professional or family member.

Study	Reason for exclusion
Schrag, A., Schmidt-Tieszen, A., Social Support Networks of Single Young Mothers, <i>Child and Adolescent Social Work Journal</i> , 31, 315-327, 2014	The study focuses on peer support provided by a professional or family member.
Scott, D., Brady, S., Glynn, P., New mother groups as a social network intervention: consumer and maternal and child health nurse perspectives, <i>The Australian journal of advanced nursing : a quarterly publication of the Royal Australian Nursing Federation</i> , 18, 23-29, 2001	The study does not present women's views on peer support.
Seefat-van Teeffelen, A., Nieuwenhuijze, M., Korstjens, I., Women want proactive psychosocial support from midwives during transition to motherhood: A qualitative study, <i>Midwifery</i> , 27, e122-e127, 2011	The study focuses on peer support provided by a professional.
Skurzak, A., Kicia, M., Wiktor, K., Iwanowicz-Palus, G., Wiktor, H., Social support for pregnant women, <i>Zdrowie Publiczne</i> , 125, 169-172, 2015	Narrative review study on social support for women during pregnancy.
Snaith, V. J., Robson, S. C., Hewison, J., Antenatal telephone support intervention and uterine artery Doppler screening: A qualitative exploration of women's views, <i>Midwifery</i> , 31, 512-518, 2015	The study focuses on peer support provided by a professional.
Sparud-Lundin, C., Ranerup, A., Berg, M., Internet use, needs and expectations of web-based information and communication in childbearing women with type 1 diabetes, <i>BMC medical informatics and decision making</i> , 11, 49-, 2011	The data from the questionnaire are presented as quantitative data. There are some quotes from open-ended questions but this is feedback data.
Sturgis, Ronald Carl, The lived experience of pregnant women: The role of social support as a resilience resource in mitigating stress processes associated with human pregnancy, <i>Dissertation Abstracts International: Section B: The Sciences and Engineering</i> , 75, No-Specified, 2014	Dissertation.
Suarez, L., Cardarelli, K., Hendricks, K., Maternal stress, social support, and risk of neural tube defects among Mexican Americans, <i>Epidemiology</i> , 14, 612-6, 2003	The data from the questionnaire are presented as quantitative data.
Taggart, A. V., Short, S. D., Barclay, L., 'She has made me feel human again': an evaluation of a volunteer home-based visiting project for mothers, <i>Health &amp; social care in the community</i> , 8, 1-8, 2000	This study focuses on the postnatal period and there is no mention of peer support during ANC.
Thomson, Gill, Frances Delap, Naomi, Balaam, Marie-Claire, van Lessen, Logan, Caring to make a difference with vulnerable women: the impact of targeted support on birth-related outcomes and experiences, <i>Practising Midwife</i> , 1-6, 2017	Unavailable.
Wahlbeck, H., Kvist, L. J., Landgren, K., Gaining hope and self-confidence-An interview study of women's experience of treatment by art therapy for severe fear of childbirth, <i>Women and Birth</i> , 31, 299-306, 2018	The study focuses on peer support provided by a professional.

Study	Reason for exclusion
Webster, J., Linnane, J. W., Dibley, L. M., Hinson, J. K., Starrenburg, S. E., Roberts, J. A., Measuring social support in pregnancy: can it be simple and meaningful?, <i>Birth</i> (Berkeley, Calif.), 27, 97-101, 2000	The data from the questionnaire are presented as quantitative data.
White, Jane, Thompson, Lucy, Puckering, Christine, Waugh, Harriet, Henderson, Marion, MacBeth, Angus, Wilson, Philip, Antenatal parenting support for vulnerable women, <i>British Journal of Midwifery</i> , 23, 724-732, 2015	There are no themes generated through the qualitative analysis.
Wright, Patricia Ann, Davis, Anita Ann, Barrera, Blinn-Pike Cauce Coleman Davis Dryfoos Erskine Furstenberg Geronimus Hersch Irvine Kalil Ketterlinus Klaw LePage-Lees Musick Nettles Rappaport Rhodes Rhodes Sanders Sanders Sanders Scott-Jones Shumaker Stiffman Strauss Thompson Way Werner Zimet, Adolescent parenthood through educators' eyes: Perceptions of worries and provision of support, <i>Urban Education</i> , 43, 671-695, 2008	The study does not present women's views on peer support.
Zapart, Siggi, Knight, Jennifer, Kemp, Lynn, 'It Was Easier Because I Had Help': Mothers' Reflections on the Long-Term Impact of Sustained Nurse Home Visiting, <i>Maternal &amp; Child Health Journal</i> , 20, 196-204, 2016	The study focuses on peer support provided by a professional.

### Economic studies

A single economic search was undertaken for all topics included in the scope of this guideline. No economic studies were identified which were applicable to this review question. See supplementary material 2 for details.

## **Appendix L – Research recommendations**

**Research recommendations for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?**

No research recommendations were made for this review question.

## Appendix M – Quotes supporting themes

Quotes supporting themes for review question: What peer support (for example, support groups) is helpful to women during their pregnancy?

Table 7: Table of quotes for peer support

Study (author and year)	Theme	Quotes
Adler 2002	Social connectivity	<p>“Being a part of the focus group has definitely been a highlight of my bedrest experience. It helped so much to know that I wasn’t the only one feeling the things I did and fighting through the difficulties.”</p> <p>“It was also nice to feel that I instantly made new friends, as quickly as I had lost daily contact with my friends at work.”</p> <p>“There were times when I was depressed because of my situation, but then someone would come along and put my small problem into perspective. I read their letters, and at times, cried.”</p> <p>I have enjoyed this study in so many ways! It has really helped me get through this ordeal having others to talk with about my feelings and aches and pains being on bedrest. I wish more women out there had access to the Internet and the chat rooms designed to help them through bedrest and of course the rest of their pregnancy. Even though I have a wonderful doctor and many friends and family that care about me, they are not always there to talk to. Even though I did not get instant replies I knew that the next time I turned this on there was a message waiting from one of you.</p>
Backstrom 2017	Informational support	. . .because you get a lot [of different information] and have to mix it all together, how others [other expectant mothers or parents] have had it, and so on. . . it can turn into a lot of exaggerated facts. Because, sometimes, it can be a bit too overwhelming and then. . . it can be very difficult to absorb the information. . . especially when you are in my situation and are to give birth for the first time. (W 8).
	Shared experiences	It’s clear that I’m not the only one to have a baby, but you can get feelings like that in the beginning. . . but when you meet these other expectant [first-time] parents, it feels like you are not as much alone. . . (W 4).
	Shared experiences	I have been in contact with people who are older, and I have to say that they [the elderly] are thinking differently. But relatives and friends who are in my age group have also told me about their experiences. . . and it has been nice. They have told me what they did and didn’t do, and what was good for them. . . and then it feels like we [me



Study (author and year)	Theme	Quotes
		and my partner] can find a way that can work for us. (W 4).
	Social connectivity	It's clear that I'm not the only one to have a baby, but you can get feelings like that in the beginning. . . but when you meet these other expectant [first-time] parents, it feels like you are not as much alone. . . (W 4).
Berg 2006	Accessibility and availability	<p>It is an enormous support that you can just ask and she is there. To have a doula present the whole time is very good, to have somebody with you the whole time when the midwives change now and then. (Woman 6)</p> <p>You can be a reassurance even if you are not there- it is a strong psychological feeling that I just have to call her or that she is out there just for me. (Woman 5)</p>
	Interpersonal sharing and support	<p>She had experienced a home birth before and she was confident. But also it is very intimate to give birth. And it would not have felt right to have someone there who is too close to us. A doula has seen it before and she knows why. It was very nice that she knew and understood. (Woman 8)</p> <p>And I think, in the past you might have your mother or grandmother but that depends if you have a good relationship with them and if you want to have them there. I wouldn't like to have my mother with me because she would be so hysterical that it was her grandchild about to be born- you don't want that close relationship though, you want someone who can think straight. (Woman 10)</p> <p>I think the man is powerless and he might not see what is happening. And maybe he suffers because I am in pain. Maybe he feels he cannot do anything. It is a relief; the man gets more support, understands more what is happening and is not as worried if a doula is there. (Woman 3)</p> <p>It was a supportive person who came along- one who had been there before who knew. Not to help with the medical part but just to be there, support and explain what might happen, what you can ask for and so on. (Woman 9)</p>
	Self-efficacy and empowerment	She was in a surrounding familiar to her... knew who could understand how I was functioning and which midwives would be positive to my wishes. She was like a mediator to the staff, really, and it was, above all, that which made me able to relax. (Woman 2)
	Self-efficacy and empowerment	With help from the doula I can trust myself and my ability. She praised me when she heard how I handled the contractions; I could trust that I was on my way into

Study (author and year)	Theme	Quotes
		<p>the next stage. That was like an affirmation. (Woman 10)</p> <p>It is safe and secure, like having an extra man, I think, yes like an extra man I would like to say. It is almost the same thing but without competition towards the husband. (Woman 5)</p>
	Self-efficacy and empowerment	<p>I say that it is like a guarantee, you know what you get...you might be better guaranteed to get what you want from the childbirth. (Woman 5)</p> <p>You are strong when you are safe. If you are safe at the hospital it is a good thing to be there, but it is easy for the hospital to take over and take away your power, it is then difficult to give birth when you can't help yourself. (Woman 4)</p>
	Breustedt 2013	Attachment
Attachment		<p>'Without Mellow Bumps I wouldn't have had the start of that process where I thought "I do love my baby and I'm excited to see her and hold her." Before that I didn't feel it was my baby.' (Joanne)</p> <p>'Well I suppose the big difference was... it was just, I think because I felt that I knew her, I had that time at Mellow Bumps and it gave me a chance to get to kind of know her and that was different with the kind of bond that I had had before ...' (Hannah)</p>
Safe space		<p>'I thought I'd be really judged and everyone would judge me and look down on me. The more I went, the more welcome I felt. [The facilitator] went extremely out of her way to make us feel welcome; I think that's what you really need to do.' (Joanne)</p> <p>'I was nervous. First thing obviously, I was wondering what it was going to be like and what the people would be like and you're a bit anxious ... because I'm quite shy.' (Linda)</p> <p>'It was a very chilled non-judgemental atmosphere. You feel so welcome, it sorts out your mind ... stops your mind being so confused. It feels like going for a chat with your friends but all your friends are going through the same thing at the same time, which never happens with your friends normally!' (Joanne)</p>
Social connectivity		<p>I feel as if I made friends ... I felt like I could go and say, I don't enjoy my baby moving, I find it really strange, trying to break down the barriers. If I went to another</p>

Study (author and year)	Theme	Quotes
		<p>group and everyone was saying “I like it and it’s lovely” I would just be like “uhuh”; I wouldn’t have had the confidence to say [that I didn’t enjoy it]. They would have thought it wasn’t normal and I didn’t want my baby.’ (Joanne)</p> <p>Even the staff, they got involved. I expected they would ask us to do things but they expressed their opinions too. I felt it was great.’ (Anna)</p> <p>‘It was really good, I made a lot of friends and the facilitators were really nice too. It was nice to get out and meet people.’ (Linda)</p> <p>‘Let’s face it, when you’re pregnant you don’t really get a chance to go and spend time with other people and put your feet up. I would love to go back, it was really enjoyable.’ (Hannah)</p>
	Practical support	No supporting quote
Canuso 2003	Attachment	I liked meeting the girls that I didn’t know and some I saw after the luncheon and said hello to that we knew each other from the luncheon. I had a transition meeting for [my daughter] to go from EHS to Head Start, so there were some mothers there that were at the luncheon who hadn’t had their babies [yet] and they had their babies [by the time of the transition meeting].
	Interpersonal sharing and support	One girl there said she was already dilating. I said, “Isn’t that scary?” I thought you’d have to be in the hospital, and she said it’s no big deal. I was still scared. It was encouraging that she could be right there and not be scared. It’s nice to know that I’m going to live—that I’m going to get through labor. Everybody’s been talking about the baby’s development, but it was the first time someone talked to me about labor.
	Self-efficacy and empowerment	<p>“I knew all the education pieces even before I was pregnant.”</p> <p>I was kind of nervous about getting together with other mothers in a group. I have been in groups like that but I never was in a group with just everybody, we had to say our name. After a while I got used to it and started answering questions. It was fun.</p> <p>It was “good to be out of the house. I get irritable in the house. Nice to be without my kids and relax. I’m a good mom but I get stressed.”</p> <p>"It helped me a lot with having to run to the hospital and start every week because of the complications it like [sic]</p>

Study (author and year)	Theme	Quotes
		gave me a chance to relax and breathe. It is not unusual for me to do this kind of exercise, but with everything that was going on I kind of lost touch with that. So it was nice to kind of bring that back."
	Shared experiences	"I was able to meet and enjoy the company of other mothers, teenagers of my age, and older than myself."  "I thought they left out that I was the youngest one."
	Social connectivity	I enjoyed being out around other mothers sharing the same thoughts and feelings of being pregnant and stuff [sic], that we have all the time. It is nice to be around other pregnant people because we all have the same emotions, we share the same things, and we can complain more to each other than we do with other people who can't really appreciate our point of view, I think, more than we can as pregnant mothers.
Demecs 2011	Attachment	'As a group it just reiterated the feeling of a bit of celebration, just gave us strength.'" (Tammy)
	Interpersonal sharing and support	"The real reason why I came along was to be able to gain . . . from other people's experiences."
	Safe space	"It sounded more of a naturalistic approach to motherhood, not something that was structured or intellectual classes . . . , it was very appealing, seemed to be relaxed."  "I was looking for a space which is totally dedicated to the pregnancy."
	Self-efficacy and empowerment	"I wouldn't class myself as a very earthy person . . . but it really gave me that extra level that I needed to prepare and connect with myself and others . . . on more of a humanistic level, not text book level" (Leila).  "When you're pregnant, in looking after the baby physically, making sure that you eat properly, resting well and all that side of it . . . this course just reminded me to nurture the emotional side of pregnancy, put back a bit more balance there."  "when it boils down to labour, it is raw emotion. It is important to be ready and in balance".
	Shared experiences	"I was interested in seeing how other second time mums became more empowered after their first birth . . . they've sort of gained a bit of control over the next one".
	Social connectivity	"You have got these strangers in the room there all singing together for the first time, naturally you are a little bit nervous".  "It was nice to see how we progressed and how we all

Study (author and year)	Theme	Quotes
		<p>got quite comfortable with each other” (Leila)</p> <p>The dance “helped everybody to ease off as well, like the singing”.</p> <p>“I have got more comfortable with everybody”.</p> <p>“I liked doing it as a group . . . kind of made it fun” (Lorna).</p>
Humphries 2012	Accessibility and availability	<p>She was there. I could call her. If I needed her to come over she was there to come over. I mean I had access to her like that. I could page her and she would call me right back. To go to the hospital and she would be there. All my appointments before I [gave birth], my OB appointments, she was there. And the other programs it wasn’t like that. I didn’t have a way to get in touch with her. She called me when she felt like it. So this really helped. (Michelle)</p>
	Attachment	<p>“I don’t know how to explain, but it’s like you’re having fun while you’re doing things with her.” (Teresa)</p> <p>“It makes me think that she cares. Even if it’s her job, I feel that she does care.” (Candace)</p>
	Attachment	<p>“Well just—I’m not really, really mad at her. You know, I’m just—I had fun talking to her. She was so nice. So [I]miss talking to her. I be needing that sometimes.”</p>
	Shared experiences	<p>It’s very, it’s very like well-bonded, and supportive, ‘cause like stuff I can’t say to my mom, or even to my father, I can tell her. Or there’s stuff I tell, that I talk to her about, like if I want to talk about my family, she can be like, okay, she won’t say anything about it, because she won’t go back and tell them. (Kenya)</p>
	Shared experiences	<p>“You know how you want to say stuff, but it won’t let it come out?” (Teresa)</p>
Johnson 2015	Anonymity	<p>The overwhelming majority of participants in this study engaged both ante- and postnatally with online communities from a distance, experiencing the intimacy, support and care of other women or community members without making their presence felt. Some women mentioned that they preferred to be a reader than a contributor in the online community arena. However, other women did interact online and found it a very useful exercise.</p>
	Anonymity	<p>Participants often spoke about the importance of the Internet as a safe space when researching some of the more taboo (or backstage) topics, including debating child vaccinations, questioning a diagnosis of gestational diabetes, looking for advice on same-sex parenting and seeking advice on ‘French’ methods of child discipline.</p>

Study (author and year)	Theme	Quotes
	Informational support	She usually makes me feel a bit better. I think it's just when you go to your doctor it allays your fears. She's a fairly conventional doctor in some ways, so um, sometimes I feel a little bit like I can't address certain things with her because I know she'll just, you know? (Rachel, prenatal)
	Interpersonal sharing and support	I've joined one of like a Bubbub group . . . I have asked a couple [of questions] . . . but it was more about just socialising with other people who are pregnant, you know, and not feeling alone with it. (Amber, prenatal)
	Social connectivity	I've got quite friendly with one of the girls in particular [from mothers' group] and you know, can have very candid chats with her. (Karen, 36, postnatal)  "I probably do put on a little bit of a 'I'm coping better than I am', often . . . joining the mother's group you definitely do initially. And that's why I feel really fortunate to have the group that I do, because over time you get more comfortable with that." (Stephanie, 30, postnatal)
Lundgren 2010	Accessibility and availability	For me it was very important to get to know the person who was going to be with me...to feel secure with her beforehand.  There is no chance for me to meet the midwife who was going to be with me during the birth before, to get to know her. (2)  It is more like a production line for the midwives since they are running in and out the rooms... they are not present all the time. (6)
	Interpersonal sharing and support	She was with me a week before the birth and supported me to go there and say that I can't stand this any more...She knew before that I wanted a caesarean and supported me and came along when I talked to the doctors. (4)
	Self-efficacy and empowerment	...the human dimension...it is important that you feel it. The person who is with you should mediate this feeling. The feeling that I am a human being for her. (1)
	Social connectivity	I didn't have to think about what was going to happen next. Or why she or the midwife left or I didn't have to think about different things since I got information and I didn't have to feel lonely...and I think that this made me calm. I didn't have to worry. (2)
McGarry 2016	Informational support	We've learned so much it's because of them [Douglas], we've learned so much. . . . (Katie)  She talked about labour with me, a normal birth and a caesarean. When she told me about a caesarean I said no way, I wanted a normal birth. (Charlotte)

Study (author and year)	Theme	Quotes
	Interpersonal sharing and support	<p>People with disabilities means a lot of support especially support with social services because they think oh because a girl's got moderate learning problems they think can't look after a baby you know. (Sally)</p> <p>I didn't know much about it actually, but they, a Doula's for people who ain't got intellectual disability but they have got, now they do people with intellectual disability. I think it's good because if people who've got learning disabilities and don't understand labour and they're scared to ask questions to a midwife, I think it's really good. (Le)</p>
	Interpersonal sharing and support	Is good to have support now with changing hormones, helps me remember new things. (Sally)
	Practical support	She showed me how to hold my baby, how to hold her in a sling and then I could do stuff like housework whilst holding her, holding her close to my heart. (Charlotte)
	Self-efficacy and empowerment	They're like family now to us, she's like a mum I never had. (Katie)
McLeish 2015	Accessibility and availability	<p>'She makes time for me. Like if I need to ask her something, I'll just ring her up and I'll be like, "Can you talk?" and make an appointment and she'll come to see you soon' (M020).</p> <p>I'm still not particularly sure what the scheme is actually there for, but I know what I've been using it for and that has really helped' (M016).</p> <p>[The volunteer] would just suggest, "Oh when shall we meet again, in about four weeks?" and so it didn't make me feel like I could say, "Actually..." I'm aware she's a volunteer, you don't want to take up too much time. (It would be better if there was) more frequency, maybe more regular time slot...then you don't need to worry about you asking too much. (M003)</p>
	Attachment	<p>[The volunteer] is like my mum. Seriously, she [has] been like a mum to me. She is my friend, I can talk to her [about] whatever I want, I can meet her whenever I want... She is really friendly, she is patient, she will listen to you and I like everything about her. (M037)</p> <p>'She is a non-judgemental person, it's different to a friend because a friend would say, "Oh, why don't you do this?" or, "Why [do] you worry so much?" (M015).</p> <p>If when she is my [volunteer] she is already my friend, sometimes we can [feel] shy and you can't take the help...I don't want to ask her because she is my friend</p>

Study (author and year)	Theme	Quotes
		<p>and I don't want to feel "I do this to you"... I don't want to hear somewhere else I done this to her... I don't want the other neighbour talk about it. (M011)</p> <p>[The volunteer] was like on 24 h call outs, she would say, "Phone me." She could come to my place six in the evening, and I thought, "This lady doesn't know me and she is just volunteering to do this. Why is she sacrificing her own personal time? ...She wouldn't be bothering unless she really cared." (M006)</p> <p>Some midwives they don't have any kids. And when I ask about the breastfeeding they are trying to answer me as the profession or as they read in the book or learn in the college, but when I ask another mum already they had practical experience. That's why they can answer you better than non-practical one... that is more acceptable and helpful for me. (M036)</p> <p>"Hard. 'Cause I've got to know [her] and... yeah, she's sort of grown to know my family really, so she's been like part of the family almost.' (M030).</p> <p>(Because she's a volunteer) it makes me more free...to talk to her...With social working and stuff, they tend to make you scared...of what they will do, they can take your kids. I know I'm not a bad mum but some things can go wrong at times. Yeah, so anything that I think I'm not doing right I will say to [the volunteer] and she will put me in the right way. (M012)</p> <p>If I want to get some professional suggestions I should contact GP or midwife, but they don't have enough time to understand... your situation personally. If I want to get emotional support from friends, friends can give me suggestion but their suggestion may not fit for you. I think the volunteer provides a package of solutions, choice, and they told you what's pros and cons, and you make decision which is right for you. There is no push, no demand... It's kind of between the NHS and a friend. (M043)</p>
	Interpersonal sharing and support	<p>'Because I feel upset and down and sometimes happy, sometimes sad, you know, I want to share my feelings somebody else' (M013).</p> <p>'It means I can talk to someone other than (my husband), 'cause I feel like I don't want to offload him on all my problems' (M026).</p>
	Shared experiences	<p>I can [be] free to talk about myself without anybody saying, 'Oh,' or anybody still giving me names...I understand [the volunteers] were somebody like me too,</p>



Study (author and year)	Theme	Quotes
		<p>we are both in the same shoe, they never blame me. (M033)</p> <p>'Do you know when you get Pakistani people with another Pakistani person, you can't actually open up to them...And they asked me if I wanted an Asian lady and I goes, "I'd prefer White"' (M020)</p>
McLeish 2017	Practical support	No supporting quote
	Shared experiences	<p>'[The peer supporter] talk about...her personal experience. Or how she look after her kids, and that's made me a bit calm and I say, "Oh my gosh, just not me I have this difficulty. People had before"' (M036).</p> <p>'[The peer supporter]'ll never give you the answers, she'd just suggest stuff... she'll say, "Have you tried this, have you tried that?"' (M003).</p> <p>'[The peer supporter] was encouraging. Not only with words...When I am stressed, the way she would make food for me, it has given me encouragement' (M028).</p> <p>'Talking to someone who'd gone through [postnatal depression] made me feel okay about divulging some of the things that I was thinking and feeling' (M038).</p>
	Social connectivity	<p>'If [the peer supporter] wasn't there I would feel like alone, crying every day' (M010).</p> <p>It's made me a lot more confident because I'm getting out more and I'm seeing people more" (M025).</p> <p>I just thought, "It's going to be somebody that's going to come round every other day and do my head in ... [But] I stuck with it and... I'm glad I actually got the support because they are actually like really, really friendly' (M020).</p> <p>'When the problem is really, really much I feel depressed, I just call her and she listens to me. I just smash everything on her and she listens to me' (M028).</p> <p>'[The peer supporter] was someone who talked to me all the time, kept in touch with me all the time, so if someone is talking to you, is building that kind of relationship, you kind of feel confident to share with them anything' (M045)</p> <p>'[The peer supporter] gave me the confidence...the first thing she said to me was, "You're doing OK and this is normal"' (M003).</p>

Study (author and year)	Theme	Quotes
	Social connectivity	<p>'I don't even know anybody here, I don't know where to start' (M021).</p> <p>'He's very focused on himself... it wasn't good for my self-esteem at all 'cause he really was cruel to me' (M039)</p> <p>'I can't tell people I can't cope. In Africa they would say "Then why did you get pregnant?" (M006).</p> <p>'[People say,] "I don't understand how she can be depressed when she's just had a baby, one of the most beautiful things in the world" ...That makes you go even more into your shell and feel more embarrassed and distraught...so ashamed' (M038).</p> <p>'[The midwives] were all really nice... but I feel they actually had their own agenda...The checklist – "Blood pressure, is it fine? Are we having the urine test? And let's feel the baby." So they do ask, "Oh how are you feeling?" But that's very much at the bottom of the priorities... they don't have the knowledge to actually deal with it'. (M015)</p>
McLeish 2019	Attachment	<p>"I really still missing her...the person I like, I have to lose them at the end, so that's my struggle" (M15).</p>
	Informational support	<p>"[The doula] explained how things going in hospital... how to make decisions." (M14).</p> <p>"[The doula] helped me, I have nothing – mother, friends, sister – I have nothing" (M15).</p>
	Interpersonal sharing and support	<p>"It was a huge weight lifted... I used to have sleepless nights thinking about what's going to happen" (M07).</p> <p>"She's like a little light at the end of the phone, if anything I was worried about, I would text her" (M06).</p> <p>"It's not someone there to judge you... Because they're not professional people, they're not midwives, they're not social services, they're not doctors, you feel like you can talk about anything and you know nothing's going to go anywhere" (M09).</p> <p>"She was really like my sister, my friend, my mother" (M16)</p> <p>"I don't always let a lot of people in" (M09).</p> <p>"after getting to know her and her being such a lovely person" (M07).</p>
	Practical support	<p>"It was just like having a sister there ... she tried to get me to not think about whatever it is they were doing, they were poking and prodding everywhere" (M08).</p>

Study (author and year)	Theme	Quotes
		<p>"I would have some questions and if I forgot to ask any she would say, 'What about this?'" (M01)</p>
	<p>Self-efficacy and empowerment</p>	<p>"We do feel judged... [by professionals] saying, 'Oh you should be doing this'" (M09).</p> <p>"Life not finished, you have to build yourself...you can do everything, go forward.' Then I start thinking what I can do" (M16).</p> <p>"Even [the doula's] kids that are sacrificing that mummy time with her, it's the family as a whole that are supporting one person to give comfort to a total stranger... It was so overwhelming" (M07).</p>
	<p>Social connectivity</p>	<p>"Before [the doula] left we'd gone out and seen what playgroups there was, or baby massage and stuff, so when she'd left I had all this to do" (M01).</p>
Valaitis 2005	<p>Anonymity</p>	<p>Anonymity was highly valued by most participants as it provided a "comfort zone" where participants felt they could be more open and honest. However, others agreed that more discussion is likely to occur if people know each other.</p> <p>Participants were asked about the differences between face-to-face and online discussions. Despite poor online participation, it was generally preferred. Being online helped some, who said they were shy, to feel more comfortable in expressing themselves.</p>
	<p>Social connectivity</p>	<p>"You need somebody to talk to that's in the same situation with you, and it's a lot more comforting if you have somebody who's a teen parent than [to] go to talk to an adult. So you're just looking for that sort of opportunity to share experiences."</p> <p>"I wanted to speak to people in my age group that have done it before and find out what their hardships were. Find out how they coped."</p> <p>"There are certain things I guess you'd want to talk just to [females] about, like I guess, emotionally wise. . . . But even the males I guess if the father is involved and they have their emotional feelings about it...I think there are some things that you just would want to talk to a female about or just to a male about."</p>
	<p>Social connectivity</p>	<p>"I guess just the thought that I wouldn't feel alone at this. Kind of feeling, like you know, there's other people that are in the kind of same situation."</p> <p>"[They could meet] somebody in particular that they talk more to and they had very similar what they went</p>

Study (author and year)	Theme	Quotes
		through and they said, let's meet up or something and they end up becoming friends."