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The impact of COVID-19 restrictions on women's pregnancy and postpartum experience in England: A qualitative exploration

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Introduction

The coronavirus (SARS-CoV-2) pandemic has resulted in more than 2.4 million deaths worldwide (as of February 2021; (World Health Organisation, 2021)). There is some evidence that the clinical symptoms and outcome of coronavirus in pregnant women is similar to that of other adults, and the likelihood of transmission to the baby through delivery and breastmilk is low (Davanzo et al., 2020; Tran et al., 2020). Yet, there is evidence of increased risk of complications in the second half of pregnancy (Ellington et al., 2020; Pirjani et al., 2020; Zambrano et al., 2020), preterm delivery and hospital admission (Allotey et al., 2020; Woodworth et al., 2020). Previous epidemics including influenza, SARS and MERS virus led to severe complications for pregnant women and infants, including intubation, renal failure, hospitalisation in intensive care, and death during pregnancy (Nicoloso-SantaBarbara et al., 2017; Schwartz and Graham, 2020). Therefore, the risk of coronavirus for pregnant women is uncertain.

Controlling the spread of virus has been challenging, with restrictions on socialisation, work, care and treatment. On the 16th March 2020, the UK Government classified pregnant women among the groups considered 'vulnerable' to coronavirus (UK Government, 2020). Subsequently, non-essential maternity care was ceased, many face-to-face appointments were offered by video or telephone, mothers were required to attend scans alone, and partners were unable to attend the birth until the mother was in 'active' labour (Jardine et al., 2020; NHS England 2020; Royal College of Obstetricians and Gynaecologists, and Royal College of Midwives, 2020). Restrictions on maternity care in England began to ease in September 2020, but with variation across the country (BBC Midlands 2021). These changes to care and concern of infection for the mother and baby (Ravaldi et al., 2020) has led to elevated emotional distress among pregnant women and new mothers (Corbett et al., 2020; Fakari and Simbar, 2020; Mappa et al., 2020; Mizrak Sahin and Kabakci, 2020) including depressive symptoms and anxiety (Farewell et al., 2020; King et al., 2020; Matsushima and Horiguchi, 2020; Salehi et al., 2020). Heightened emotional distress has been linked with perceived risk of infection, uncertainty around care, feeling unprepared for birth, inconsistent messaging, and a fear of decreasing wealth and social support (Farewell et al., 2020; Matsushima and Horiguchi, 2020; Preis et al., 2020). This is concerning

given that emotional distress in pregnancy can lead to preterm birth, low birth weight, postpartum depression, and developmental delays in the baby (Field, 2017; Ibrahim and Lobel, 2020; Lee, 2014).

Evidence for the impact of COVID-19 restrictions on the experiences of pregnant women and new mothers is limited. Interviews with pregnant women from Iran suggested the pandemic has resulted in changes to communication, social activities, and restricted access to maternity care (Bakouei et al., 2020). Barriers to healthcare have also been reported in the UK and USA (Jaffe et al., 2020; Karavadra et al., 2020), including a lack of support from health professionals and friends and family, feeling burdensome to others and a negative influence of the media on risk perception. Interviews with Spanish and English women with COVID-19 symptoms or with those who had been exposed to the virus found the pandemic had led to feelings of isolation and threatened economic and food security during pregnancy and post-natal (Jaffe et al., 2020). Despite evidence of emotional distress among pregnant women and new mothers, there are a lack of studies exploring the experience of pregnancy and postpartum during the pandemic (Corbett et al., 2020; Fakari and Simbar, 2020; Mappa et al., 2020; Mizrak Sahin and Kabakci, 2020). The aim of the study was to understand the impact of COVID-19 restrictions on women's pregnancy and postpartum experience.

Methods

Design

The study followed a qualitative design. Ethical approval was secured from Staffordshire University Ethics Committee.

Setting & sample

Participants were contacted about the research following completion of an online survey (unpublished) to understand the impact of coronavirus on individuals, their experiences and reactions. The online survey was distributed March-July 2020 and was completed by 2987 individuals. Women who were pregnant at the time of completing the survey and consented to be re-contacted (n=28) were invited to participate in a follow-up interview to talk about the impact of COVID-19 restrictions on

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Table 1
Questions included in the interview schedule.

Interview Questions
1. Tell me a bit about yourself
2. How do you feel about the current coronavirus pandemic?
3. Have you or anyone you know had Coronavirus-related symptoms?
4. In what ways has the pandemic changed how you imagined your experience of being pregnant/postpartum?
5. What support is/was available to you whilst pregnant (and postpartum if applicable)? How useful were they?
6. If you had experience of the services mentioned in the previous question (before lockdown), how have they changed?
7. Have you used any external sources aside from contact with health professionals to help with any questions/concerns you have had during pregnancy/postpartum? If so, which ones?
8. How do you plan/did you plan to give birth?
9. How do/did you feel about the prospect of giving birth?
If postpartum: What was your experience of giving birth during the pandemic?
10. Postpartum: What checks have you received from health professionals since giving birth?
11. From your experience: What has been most challenging when being pregnant/living with a new-born during the pandemic? What has been easier when being pregnant/living with a new-born during the pandemic?
12. Any other comments?

their pregnancy and postpartum experience. Participants were also recruited through contacts known to the authors (i.e., opportunistic) and through survey respondents who participated in this study (i.e., snowball). Participants were given a £20 online retail voucher in appreciation of their time. Due to the subject sensitivity, topics included in the interview were made clear to the participant at the point of invitation. Telephone or email interviews were conducted to maximise convenience and safety.

Twenty-five semi-structured interviews were conducted (average age 33) by telephone (n=17; average length 27 minutes) and email (n=8) between July-August 2020. The majority of participants were recruited through completion of the online survey (n=12), followed by opportunistic (n=8) and snowball sampling (n=5). During the period of data collection, the UK Government were in the process of gradually removing the national restrictions in England, but maternity care restrictions remained. The majority of participants were from England (n=24; n=1 from Scotland), specifically the West Midlands, West-Central England (n=12), had already given birth (n=20; average 20 weeks postpartum) and this was their first child (n=15). No participants had confirmed coronavirus (SARS-CoV-2) at the time, or prior to interview.

Data collection

Interviews were semi-structured using an interview topic guide and were conducted by the third author (LM; Research Associate). The interview topic guide was informed by open-ended responses received by respondents from the coronavirus online survey and through discussions with women known to the authors who were pregnant or had recently given birth. Topics included their feelings about the pandemic, the impact of the pandemic on their pregnancy experience and access to healthcare, information resources accessed, birth plan and where applicable birth experience (including postpartum checks) (Table 1). Interviews were audio-recorded and transcribed verbatim.

Data analysis

The analysis was underpinned by a phenomenological focus, focusing on exploring and describing participants experiences, with the acknowledgement that the same phenomenon can be experienced in a variety of different ways (Willig et al., 2017). Transcripts were uploaded to NVivo R1 and analysed using inductive reflexive Thematic Analysis following the processes set out by Braun and Clarke (Braun and Clarke, 2006; Braun and Clarke, 2020). Extensive reading was conducted for familiarisation of data and preliminary codes and themes were identified. Themes were then reviewed to ensure that they were data driven. The process enabled the development of themes generated

from participant opinion. All preliminary codes were developed and reviewed by the third author (LM; Research Associate) and verified by the first (VR; Research Associate) before agreement of initial themes and their relationships. Themes were discussed between all authors before being finalised. All authors are Caucasian females with experience of interview techniques and qualitative methodologies, and the second author has lived experience of the topic under investigation (having given birth following the UK's first national lockdown).

Results

Four main themes were identified including “[COVID-19 restrictions] totally changed the whole experience”, “the lack of information, on top of this situation, will probably make you quite anxious”, “[the birth] experience was nowhere near as bad as I thought it would be”, and the isolation, [that] was the hardest”. Each theme is discussed in turn and supported by participant quotations (Each quote is coded to denote participant number, age, whether they were pregnant [Pr] or postpartum [PP] at time of interview, and by how many weeks).

“[COVID-19 restrictions] totally changed the whole experience”

The first theme relates to the impact of COVID-19 restrictions on the pregnancy and postpartum experience including access to appointments, antenatal and baby classes, and the ability to share the experience with others. The impact of COVID-19 restrictions meant participants missed out on several key aspects and moments of a ‘typical’ pregnancy. The majority of participants had received little face-to-face contact with healthcare professionals due to the pandemic: “I received all [antenatal] midwife contact after 15 weeks via phone call” (P1, Age 26, PP 1 week) and “we very rarely see a health visitor, we haven’t seen a GP” (P6, Age 37, PP 9 weeks). Postpartum physical checks were also missed:

I have never been examined since leaving hospital and my 6 week check was again done over the phone - where I was asked if I thought my uterus had returned to the right position?! Honestly, I felt pretty abandoned after I had been discharged (P14, Age 32, PP 15 weeks)

Participants felt they had to ‘get on with it’ following the birth of their child with little professional support. Participants also “missed out on some of the antenatal classes and things [they] could be doing with new mums” (P5, Age 34, PP 5 weeks) which provides the opportunity for their child “to get some interaction with other babies” (P20, Age 32, PP 15 weeks). Alternative formats including online classes were not “the same” (P22, Age 32, PP 4 weeks) and participants worried their baby was not “going to be as sociable because for a good few months they have only dealt with their parents and the occasional health visitor” (P21, Age 34, PP 17 weeks).

Participants were empathetic of first-time mothers: *"I do really feel for those mums whose experience...it is their first experience of having a baby and all those things just aren't available, like even things like you can't just drop into your health visitor clinic and go and get them weighed"* (P19, Age 34, PP 8 weeks). Reassurance that the baby was doing well and the opportunity to spontaneously seek support was perceived to be important for first-time mothers. Yet, when the few face-to-face appointments were attended, participants commented on the speed of the service: *"we are not standing around queuing for half-an-hour, to an hour after your scan like you are in and out"* (P9, Age 29, Pr 30 weeks). The efficiency of face-to-face care was considered *"a plus point"* (Participant 7, Age 33, PP 4 weeks) as it reduced the degree of contact with others and the risk of infection.

The final few months of pregnancy were not as anticipated for participants and several spoke about missing out on 'typical' pregnancy-related activities: *"I imagined the last few months to be getting ready with everyone, baby shower and having a bit of a holiday before she arrived"* (P4, Age 36, PP 8 weeks). Participants commented on being unable *"to go shopping and look at stuff, you always want to go and feel the baby clothes"* (P15, Age 29, Pr 30 weeks). Whilst others expressed disappointment that family members were unable to share the experience with them: *"my dad didn't even get to see me, he doesn't know what I looked like when I was about to drop or ... never saw my bump, or rubbed my belly"* (P8, Age 29, PP 7 weeks).

Participants also felt their partners had missed out on the pregnancy experience: *"Well I got excited about my midwife appointments because me and my husband got to go together, hear the baby's heartbeat etc but this was all spoiled because I had to attend alone"* (P2, Age 32, PP 6 weeks). Some participants were able to *"get around it by WhatsApp"* (P3, Age 42, PP 3 weeks), but others were left feeling *"horrible and angry"* by *"how excluded [their] partner was from the whole experience"* (P13, Age 34, PP 7 weeks). It was a worrying experience for participants in case *"anything was wrong, [they] would have to get through it on [their] own"* (P23, Age 29, Pr 33 weeks). COVID-19 restrictions also led to worry that partners would miss the birth: *"my husband's colleague only got there about twenty minutes before she gave birth. When I found that out, I was like 'oh well that could happen, and he could miss it'"* (P7, Age 33, PP 4 weeks). The absence of partners was described as *"a piece of jigsaw missing"* (Participant 19, Age 34, PP 8 weeks) and meant they felt they had *"been robbed of [the experience of their] first child"* (P12, Age 29, Pr 33 weeks). The coronavirus pandemic had a considerable impact on participants' and their partner's experiences of pregnancy, birth and missing out on several aspects associated with a 'typical' pregnancy.

"that lack of information, on top of this situation, will probably make you quite anxious"

Due to the changing nature of the pandemic, information for pregnant women was *"very non-specific... what you looked at one night was different the following day"* (P3, Age 42, PP 3 weeks). This was particularly felt *"right at the beginning of lockdown, things were changing... on a daily basis, about delivery"* (P17, Age 32, PP 17 weeks). Concern and uncertainty were exacerbated by media coverage: *"there was a lot of media noise about birth partners not being allowed in and that worried me"* (P14, Age 32, PP 15 weeks). A *"fear of the unknown...was the worst"* (P2, Age 32, PP 6 weeks) which was perceived to be *"hard enough, just in normal life, let alone being pregnant and giving birth through it all as well"* (P17, Age 32, PP 17 weeks).

This uncertainty and lack of information was still an issue postpartum. Participants talked about how they *"weren't given any information on which [health] service(s) [they] should contact and for what period of time they would support"* (P14, Age 32, PP 15 weeks) following the birth of their child. This was difficult for participants: *"I consider my husband and I to have enough about us to do the research and things like that, but it has been so hard, it has just put so much extra pressure on"* (P6, Age 37, PP 9 weeks). As a result, participants heavily relied upon online resources

for information about birth and caring for their child. Some participants sought support from *"several Facebook groups where ... women who were pregnant and giving birth during coronavirus, loads of them, all around the world, America, Canada, there were lots of places and they were all posting their positive experiences"* (P8, Age 29, PP 7 weeks). Whilst others suggested the *"NHS website is like [their] Bible"* (P16, Age 33, PP 17 weeks). However, online resources were also perceived to be *"dangerous... my mum and husband told me to stop googling things in the early days... I wouldn't recommend it as a resource for an anxious new mum in a pandemic"* (P14, Age 32, PP 15 weeks). Some forums were useful as they had *"different people's experiences on there"* but also had *"its negatives as well, because you get a lot of...judgemental people now"* (P7, Age 33, PP 4 weeks). Participants also relied on *"friends and family for information on the changing requirements or how appointments are being conducted"* (P10, Age 39, PP 6 weeks) and family members who were health professionals: *"My sister-in-law is a midwife and she has been a godsend"* (P8, Age 29, PP 7 weeks). Participants particularly found solace in friends who were also new mothers: *"I had quite a lot of friends who have had babies in the last sort of 12 months or so, they have been a lifeline really"* (P21, Age 34, PP 17 weeks). Whilst information from non-medical sources was perceived to be their only way to keep on top of the latest developments and caring for their baby, it led to increased fear, anxiety and concern for many participants.

"[Birth] was nowhere near as bad as I thought it would be"

Despite the emotional impact of the pandemic and the anxiety and uncertainty pre- and post-birth, the majority of participants said their actual birth experience *"kind of surpassed what [they] were expecting"* (P19, Age 34, PP 8 weeks) and *"was really informative and [practitioners] helped make informed decisions about [their] care and the delivery"* (P1, Age 26, PP 1 week) of their baby. Participants were particularly thankful of hospital staff: *"the people in the hospital were very, very positive. They were very much like 'no matter what, this is your birth, right no matter what pandemic is going on, this is your birth story'"* (P3, Age 42, PP 3 weeks). Health professionals were under immense pressure due to the stress of the pandemic on the National Health Service, but were commended for their positivity and reassurance:

they are on the front line, so for them to be so happy, and so kind and so patient when they are under an incredible amount of pressure, was just incredible and there was just a lovely atmosphere on the ward (P8, Age 29, PP 7 weeks)

Participants felt safe in the hospital setting and suggested hospital staff were doing everything they could to manage the risk of infection: *"PPE, cleaning, everything like that, so yes I don't think it concerned me that I would come out with anything, you know, the virus or anything"* (P22, Age 32, PP 4 weeks). Participants also suggested once they were admitted to hospital, any concerns quickly slipped away: *"You are so fully concentrated on 'OK I will meet my baby soon' so for those hours when you are in established labour, actually giving birth, you forget about what is going on outside"* (P16, Age 33, PP 17 weeks). Support from midwives and nurses was also comforting for those who had to stay following the birth of their baby:

for the 24 hours I had to stay in for, the midwives and nurses had to play 'dad'. They changed her and handed her to me while I still was suffering from the effects of the spinal block it was all strangely comforting. Like a safety bubble (P4, Age 36, PP 8 weeks)

The use of the term 'safety bubble' and 'forgetting' about the pandemic suggested that some participants felt protected when in hospital which helped them to cope with being without their partner and escape from the realities of the world outside. This, and the relationships that were formed with other women also on the maternity ward: *"every other woman on the induction ward was in the same boat and we all actually formed a nice friendship which was a really positive thing"* (P2, Age 32, PP

6 weeks). The 'fear of the unknown' from a lack of information and subsequent uncertainty around birth appeared to be worse than the actual experience itself, for those that had given birth.

"the isolation, [that] was the hardest"

Isolation, felt as a result of the restrictions to reduce the spread of infection, was challenging for participants. Whilst friendships were formed with other women when in hospital, the extended stay and separation from friends and family was difficult for some participants and did not match their expectations of their postpartum experience: *"You just expect to be all excited with your partner and have your family come and visit, as if being in [hospital] for five days in total wasn't bad enough but to be stuck there [by] yourself"* (P2, Age 32, PP 6 weeks). Being alone in the hospital became too much for one participant:

The fact they were like no, if you want to breastfeed you will have to stay in and the night shift can see if we can get you breastfeeding, I was like no, not another night without visitors or my husband... I just said I am going to give him a bottle, let me give him a bottle, and let me go home with my husband...then I just ended up formula feeding which I am fine with (P8, Age 29, PP 7 weeks)

The participant felt they had to make a choice between staying at the hospital alone to receive breastfeeding support or to go home with their partner and choose to use formula. Participants also talked about their struggles to obtain breastfeeding support upon returning home due to COVID-19 restrictions and their subsequent isolation from health care professionals. Whilst some *"stuck it out and continued to feed"* following *"a very rocky start"* (P14, Age 32, PP 15 weeks), some participants *"stopped at three months, because [they] couldn't get any help with it"* (P25, Age 35, PP 8 weeks). Breastfeeding services attempted to support new mothers in other ways through *"zoom calls"*, but *"having someone look at it through a camera...just didn't cut it"* (P17, age 32, PP 17 weeks). Yet for a minority of participants, isolation from others was considered key *"to the success that [they] have had with breastfeeding this time...there has been nowhere to go to, no one to see, no one coming here"* (P19, Age 34, PP 8 weeks).

Isolation from friends and family continued when home from the hospital: *"Your emotions are all over the show anyway when you've had a baby, but ... close relatives, not being able to see them, that was difficult"* (P18, Age 31, PP 10 weeks). As some restrictions were lifted, people were able to meet *"in the garden"* but this was upsetting for participants who were introducing their baby to the family for the first time: *"just showing them this tiny baby, [was] the hardest thing in the world"* (P3, Age 42, PP 3 weeks). Prolonged isolation from friends and family led to considerable emotional distress:

I was very tired about the lockdown situation and I was crying half the day because I was tired of having to do things like face time with the family or things like that. So that emotional side I feel...being isolated (P16, Age 33, PP 17 weeks)

The restrictions and isolation from others also meant that participants were unable to take the opportunity to rest: *"no one else could come and help and let me have a sleep or just let me know he's OK"* (P8, Age 29, PP 7 weeks). Participants felt the absence of face-to-face support: *"everyone says it take a village to raise a baby and it's true and we've not had our village around us"* (P13, Age 34, PP 7 weeks). Therefore, for those that were able, they formed *"a social bubble at the first opportunity"* (P6, Age 37, PP 9 weeks). Partners who worked from home during lockdown were able to provide a degree of respite for participants:

thanks to lockdown my partner is here 24-7...even though he is working...we actually had the beauty of sharing both of our love with the baby, so if I am tired I can take a nap and he can take care of the baby for half-an-hour" (P16, Age 33, PP 17 weeks)

Participants appreciated the additional time they were able to spend as a family and suggested the restrictions *"stopped loads of people coming to the house and staying for a ridiculous amount of time and having to clean the house"* (P3, Age 42, PP 3 weeks). For those that were pregnant when interviewed, they felt they had *"an excuse to have to stay in and do very little"* which *"wasn't a bad thing"* (P10, Age 39, PP 6 weeks). It also saved *"a fortune on maternity clothes, not having to buy all work stuff"* (P15, Age 29, Pr 30 weeks). Whilst it is evident that isolation from friends and family was challenging, participants were able to find some positives in the unsettling circumstances they found themselves in.

Discussion

Interviews with women who were either pregnant or had given birth during the first UK national lockdown suggested they had missed out on key moments of a 'typical' pregnancy experience due to the coronavirus pandemic. Limited access to information about the implications of COVID-19 restrictions led to increased fear and anxiety for participants who resorted to non-medical online resources and help and advice from family and friends. Despite this, the majority of those interviewed had a positive birth experience, particularly emphasising the safety procedures and the special care from midwives, which helped them to feel safe and protected. Prolonged restrictions both in and out of hospital led to fear about attending antenatal appointments alone and feelings of loneliness due to isolation from friends, family and health professionals. Isolation appeared to have had a profound effect on participants' experiences, highlighting the need for adequate support during all stages of pregnancy and the postpartum period.

Insight into the impact of COVID-19 restrictions on the livelihood and experiences of pregnant women and new mothers is limited. Yet, similar to the experiences described here, there is emerging evidence that the pandemic has led to increased fear, worry and uncertainty in pregnant women in both Italy and Iran, which often resulted in a negative pregnancy experience (Bakouei et al., 2020; Ravalidi et al., 2020). Our participants resorted to help-seeking from friends and family, which can be useful for emotional support, but also a source of stress due to added pressure from family to stay safe (Shorey and Chan, 2020).

Restrictions to reduce transmission of coronavirus in the UK led to social isolation and increased loneliness due to little emotional and physical support from friends and family. Loneliness has also been reported by pregnant and postpartum women in the USA (Farewell et al., 2020). Attempts to maintain communication with friends and family were made virtually, however this increased emotional distress for some participants. Social distancing which limits communication with relatives and friends has shown to increase stress, anxiety and depression (Mehta et al., 2020). Without physical and emotional support, pregnant women and new mothers may be increasingly vulnerable to postpartum depression and anxiety.

Concerns about the use of and acceptability of virtual clinics have already been raised by pregnant women in the UK (Karavadra et al., 2020). Whilst it is important for maternity services to evolve with the changing circumstances, some aspects of support for pregnant women and new mothers may not be appropriate for virtual platforms. Participants expressed frustration following the lack of physical support provided once discharged from hospital. The absence or limited physical checks for their baby and breastfeeding support were also evident. It was felt the use of virtual clinics and video calls to provide breastfeeding support did not replace the benefit of having a health professional physically present to provide help and advice. Three participants resorted to using formula due to struggles to successfully breastfeed, others were able to continue but not without difficulty. Yet some suggested their success was a result of the pandemic due to uninterrupted time at home allowing the opportunity to bond with their baby. Similar findings have been reported in the UK and Belgium whereby insufficient support and practical problems resulted in barriers to continuation of breastfeeding

(Vazquez-Vazquez et al., 2021) and prolonged isolation helped to facilitate longevity of breastfeeding practices (Ceulemans et al., 2020).

Strengths & limitations

The qualitative design enabled us to capture the nuances and complexity of the experiences of pregnant women and new mothers. The second author also has lived experience of the topic under investigation, having given birth following the UK's first national lockdown which adds strength to the process of analysis. However, limitations are acknowledged. First, the majority of participants were from the West Midlands in West-Central England and had already given birth at the time of interview, which limits the transferability of the findings to other areas of the UK where services may differ. Second, some participants may have delivered their child as lockdown restrictions were eased in England which may have impacted on their labour experience.

Implications for practice

Cases of coronavirus continue to fluctuate in the UK which has led to further national lockdowns to control virus transmission. Loneliness felt as a result of isolation from friends and family had a considerable impact on participants' pregnancy and postpartum experience and subsequently their emotional wellbeing during the first wave of the coronavirus pandemic. The pandemic has been challenging for all individuals, with evidence that women, in particular, may experience unique health risks and outcomes influenced by their gender (Connor et al., 2020). Yet, heightened emotional distress specifically in pregnant women and new mothers, could also have considerable implications for the foetus/infant (Field, 2017; Ibrahim and Lobel, 2020; Lee, 2014). Guidance from NHS England in December 2020 (NHS England 2020) now permits pregnant women in England to have support during ultrasound scans, consultant and midwife appointments and labour. Following the findings reported from our research, it is essential to ensure this continues, to protect the emotional wellbeing of pregnant women and new mothers throughout the coronavirus pandemic. Equally, the findings should also be considered when re-evaluating the restrictions on postpartum hospital visitation to ensure the mother is appropriately supported at all times.

There is also a need to protect pregnant and new mothers from added emotional distress which can lead to pregnancy and postpartum complications (Field, 2017; Ibrahim and Lobel, 2020; Lee, 2014). Whilst it is recognised that little information was known about high risk individuals at the start of the pandemic and treatment for those infected remains priority, it is important to ensure pregnant women and new mothers are equipped with the latest information about available services for advice and support to reduce further distress for the mother and unborn baby.

To mitigate the impact of limited physical support and isolation on breastfeeding practices, there is a need to explore how community breastfeeding support can be improved for new mothers during the coronavirus pandemic. Given UK breastfeeding rates are among some of the lowest in Europe (Bolck et al., 2004; UNICEF 2013), this is particularly important.

Conclusion

Interviews with pregnant women and new mothers suggested COVID-19 restrictions in England had a negative impact on their pregnancy experience, resulting in limited support from others and increased emotional distress due to a lack of information about the impact of coronavirus on maternity care and provision. Yet, most participants reported a positive birth experience. The findings stress the importance of emotional and physical support networks for pregnant women and new mothers, consistency and urgency of information exchange and adequate community breastfeeding support during the coronavirus pandemic.

Ethical approval

The study was approved by Staffordshire University Research Ethics Committee.

Funding sources

Internal funding received by Staffordshire University to support data collection and analysis.

Declaration of Competing Interest

None declared.

CRediT authorship contribution statement

Victoria Riley: Conceptualization, Methodology, Funding acquisition, Data curation, Supervision, Project administration, Writing – original draft. **Naomi Ellis:** Conceptualization, Methodology, Funding acquisition, Data curation, Supervision, Writing – review & editing. **Lorna Mackay:** Investigation, Formal analysis, Data curation, Writing – review & editing. **Jennifer Taylor:** Data curation, Validation, Writing – review & editing.

Acknowledgments

The authors would like to acknowledge all participants who contributed in the research and Staffordshire University for funding the study.

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