Introduction

Alcohol use during pregnancy is estimated to be one in ten women globally and two in five in the UK (1). As no safe level of alcohol consumption during pregnancy has been identified (2), policy in most countries is guided by the precautionary principle of advising complete abstinence (3). In the UK, drinking guidelines for the population in general, and pregnant women specifically, have changed over time. In 1995, women were advised to reduce risk by limiting intake to no more than 1–2 units once or twice per week and avoid intoxication, but did not mention abstinence (4). Within the *Safe Sensible Social* strategy in 2007 this limit remained, with the addition of abstinence as the main advice (5). In 2008, the National Institute for Health and Care Excellence (NICE) added further detail by focusing on the first trimester as the most sensitive to alcohol exposure (6). These guidelines remained until December 2018, when the recommendation was withdrawn and replaced with references to the UK Chief Medical Officers (CMOs) Guidelines ('the Guidelines'). Published in 2016, the Guidelines state that "if you are pregnant or think you could become pregnant, the safest approach is not to drink alcohol at all, to keep risks to your baby to a minimum"(7). Within the UK, however, the abstinence advice was endorsed in Scotland, Wales and through work in one trust in Northern Ireland ahead of the publication of the Guidelines (e.g. 8,9).

The Guidelines in their revised form were intended to simplify the advice around alcohol use during pregnancy and reflect the uncertainty of risks with drinking at low levels. A qualitative study in Wales on different stakeholders' views of the Guidelines however showed that the lack of a rationale behind the precautionary approach still left the Guidelines open to interpretation, despite the intention to simplify the message. Midwives were in favour of the clear message of abstinence, while other stakeholders felt the accuracy of the message was diluted and could cause distress for women who have consumed alcohol before knowing they were pregnant (10).

Antenatal care is universally available to all women in the UK and as the lead professional, the midwife is ideally placed to address public health issues such as alcohol use. While surveys conducted following changes to abstinence-based drinking guidelines have indicated increases in proportion of midwives advising abstinence (11), challenges with implementing advice has also been identified. For example, qualitative studies have highlighted midwives' concerns about advising abstinence when a woman has consumed alcohol before knowing about the pregnancy and may as a result experience some level of distress (12). Furthermore, Crawford-Williams et al. found that midwives questioned whether the abstinence-based Australian guidelines were supported by the evidence, despite being generally supportive of advising that no alcohol is the safest option (13). Similarly, a study from The Netherlands found that although the majority of midwives reported giving advice in line with abstinence-based guidelines, interviews with women and partners suggested many had been informed by their midwife that some alcohol was not considered to be harmful (14).

Further discord between midwives' and women's perceptions has been shown from qualitative work in Australia, where midwives reported routinely asking women about alcohol while women perceived the conversation to be limited, only occur at the initial antenatal appointment and not followed up later (15).

To our knowledge, no study to date has evaluated how the Guidelines are perceived among midwives across the UK and how they have been implemented in practice. This study therefore aimed to explore how UK midwives have implemented the Guidelines and their views on advising women in line with the recommendations for abstinence.

Materials and methods

This qualitative study was part of a larger mixed-methods study of implementation of the Guidelines in antenatal care (16). The first phase of the research was a nation-wide survey, which we report on elsewhere (17) and informed the second phase reported on here. The findings from the survey were used to devise the interview topic guide and indicated areas to explore in-depth.

Participants

A convenience sample were recruited from across the UK through a variety of methods, including through the researchers' own professional networks and key contacts, the Royal College of Midwives (RCM) national branches, and social media. The aim was to recruit frontline midwives currently undertaking bookings, however due to difficulties in recruitment midwives working in research or educational roles (with valid registrations to practice) were included. Midwives interested in participating contacted Author 1 via email to arrange an interview. Data was collected from February to May 2019, either through a focus group or during individual interviews, depending on availability of midwives. The aim was to conduct focus groups across all nations, however difficulties to attend due to clinical commitments led to cancelling two focus groups and for pragmatic reasons phone interviews were offered to accommodate the midwives' schedules. A total of 22 of the 37 midwives who expressed interest took part in the study. We anticipated a required minimum sample of 20 participants across all four nations (18), however no new themes were developed upon completion of the two focus groups and eleven interviews upon which we considered having reached saturation.

The interview/focus group topic guide

A draft topic guide was developed by the research team, drawing upon the Theoretical Domains Framework (TDF) (19). The TDF was used to underpin the interview guide as it claims to be a comprehensive list of all of the potential determinants to practice behaviours, devised from a total of 33 published theories which include 128 theoretical constructs. Vignettes were used, outlining hypothetical scenarios to stimulate further discussions (Table S2, Supplementary file). Vignettes are beneficial aids in ascertaining participants' knowledge and interpretations of a specific situation using a non-confrontational approach, though it cannot be assumed they accurately predict behaviour in a similar situation (ref). The interview guide (Table S1, Supplementary file) was pilot tested in one focus group and as only minor changes were subsequently made, data from the pilot focus group were included in the analysis. The same topic guide was used for individual interviews and the two focus groups.

Data collection

All prospective participants were provided with a Participant Information Sheet in advance of the focus group or interview. All focus groups/interviews followed the same structure but had a flexible approach to the number and type of vignettes depending on the topics discussed and time constraints. Involvement of different members of the research team was in response to adapting to the availability of midwives, though all researchers were involved in the development of the data collection tool. A small number of participants were known to Author 2 through her clinical and academic role, the remaining participants were unknown to the researchers. The interviews and focus groups lasted between 35 and 75 minutes (mean time 53 minutes).

Focus groups

The two focus groups with seven and four participants were conducted face-to-face at suitable locations (RCM premises in Wales and university premises in England). Author 1 and Author 4 (public health researchers) conducted one focus group, and Author 2 and Author 3 (registered midwife, lecturer and researcher; and health psychologist and researcher) conducted the other focus group. Written consent was obtained at the time of the focus group.

Interviews

Midwives who were interviewed over telephone were sent a consent form in advance with a request to return it electronically before or shortly after the interview. Additionally, consent was confirmed verbally at the time of the interview. One interview was conducted in person and the remaining ten over telephone. Author 2 conducted three interviews, and the remaining interviews were conducted by Author 1.

Data analysis

Ten of the 11 interviews and both focus groups were audio recorded and transcribed verbatim; one interview participant did not consent to being audio recorded and instead detailed notes were taken to capture the discussion. Data were imported to NVivo 12 and subject to thematic analysis using Braun and Clarke's framework (20). Inductive coding of one transcript was undertaken by Author 1 and Author 2 and a draft coding framework was developed and applied to another two transcripts. Following coding of these three transcripts, further discussion was held between Author 1 and Author 2 to revise and finalise the coding framework which was applied to the remaining transcripts. From the analysis, three high-level themes were developed that are presented on in this paper; views on the Guidelines, communication with women, and strategies in addressing alcohol use (see Figure 1 in Results). We analysed both focus group data and interview data together using the same approach, as we did not identify any data in the focus group transcripts which suggested it differed to the views expressed in individual interviews.

Ethical considerations

All participants were informed about the study ahead of agreeing to take part. Participants were informed that their data would be treated confidentially and that no personal information would be presented with any direct quotes. The study was approved by the Section of Nursing Studies Ethics Research Panel, School of Health in Social Science, University of Edinburgh (ref: STAFF124).

Results

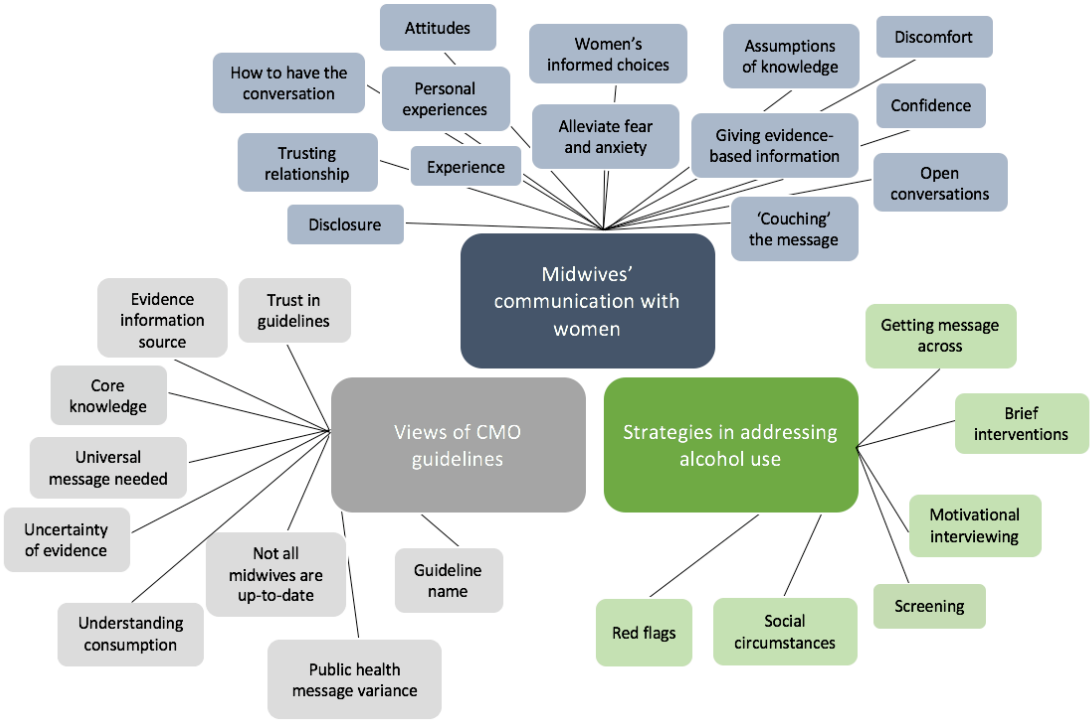
In total 22 midwives participated in the study. Characteristics of participants are described in Table 1. The three developed themes are presented in Figure 1 and encompassed a number of subthemes. Each of the three main themes are presented in the next sections.

Table 1. Participant characteristics

Characteristic	n (%)
Participants	
Focus groups (n=2)	11 (50.0)
Interviews	11 (50.0)
Country	
England (E)	7 (31.8)
Northern Ireland (NI)	3 (13.6)
Scotland (S)	5 (22.7)
Wales (W)	7 (31.8)
Main role	
Specialist midwife	3 (13.6)
Supervisor/manager/lead midwife	5 (22.7)
Research or academic role/rotational and academic	7 (31.8)
Hospital labour ward/antenatal or postnatal ward	3 (13.6)
Antenatal and community/triage[a]	4 (18.2)
Years of experience	
<10	4 (18.2)
10-20	5 (22.7)
21-30	10 (44.5)
>30	3 (13.6)
Last booking	
Within the last week	4 (18.2)
Within the last month	5 (22.7)
Within the last year	5 (22.7)
Over a year ago	8 (36.4)

[a]*Includes community only, and antenatal and community/triage*

Figure 1. Thematic map of main themes and subthemes



Views on the Guidelines

The key finding in this theme was that midwives were aware of the advice for women to abstain from alcohol during pregnancy, but not familiar with the source being the Guidelines. The abstinence message within the Guidelines was seen as being clearer than previous recommendations in national guidelines, removing any ambiguity and any potential for misinterpretation. Midwives supported the precautionary principle that underpins the Guidelines, but acknowledged the uncertainty of risk of alcohol-related harm to the fetus at low levels of drinking, which they incorporated into their communications with women (see next section). Only one midwife believed that the lack of evidence for negative fetal/infant outcomes at low levels of drinking meant that the abstinence message is not based on robust evidence.

While midwives agreed that abstinence should be the advice to pregnant women, some felt that other health professionals might give different advice. One midwife spoke in particular about how advice from doctors may be perceived as more influential and may therefore

make it more difficult for midwives to maintain the abstinence recommendation if another medical professional has suggested small amounts can be consumed.

> "*Medics (say) "oh one drink will be okay" […] because, it's always been a society that will listen to the doctor, the doctor knows best, so that's quite difficult then, isn't it, to change the mindset.* Midwife 1

In the phase preceding the current study (17), our survey showed that 58% of midwives were aware of the Guidelines and we asked participants in the current study to reflect on that statistic. Participants believed that midwives should be aware of the Guidelines, particularly as they have been in place for several years. However, the content of the Guidelines was perceived to be widely known but not necessarily their name.

> *I think that people will know what they are, but possibly not that they are the CMO advice. So, they will know what the advice is but they would not necessarily know it has that title.* Midwife 2

Some midwives also suggested that dissemination of the Guidelines may not have been effective in reaching midwives; *"It's disseminated […] but they're skimmed over, because it's assumed everyone knows it"* (Midwife 9). The presence of messages within other guidelines and timing of updates to these was another reason why midwives felt awareness of the Guidelines was low. Antenatal guidelines from NICE, which issues health guidelines based on evaluations of available evidence, were not updated until 2018 to signpost to the Guidelines. Until then, old guidelines were provided on the NICE website. Midwives noted this, as well as differences from other professional bodies.

> *The Royal College of Obstetricians and Gynaecologists, they say that the advice is no alcohol, but NICE guidelines say that there is no evidence that two units per week is harmful to the baby. So, our guidelines are in conflict with each other.* Midwife 3

The content of old guidelines was noted as a potential for causing confusion, due to the change in core advice. This observation was made within the wider context of recommendations from different professional bodies. Midwives therefore seemed to appreciate that women may rationalise some drinking as previous guidelines provided a limit.

> *One minute they were saying, obviously, no alcohol, no risk, and then the next they were kind of saying, actually a small amount now and then probably is okay. So, you know, if people saw both, they would be confused* Midwife 4

For that reason, midwives emphasised the need to provide evidence-based information and viewed their role as providing information that would enable women to make an informed decision. This included being honest about what is, and isn't, known about alcohol use during pregnancy and risks, whilst maintaining the key message of not drinking while pregnant. In essence, midwives focused on reiterating the precautionary principle on which the Guidelines are based.

[It] would be to [say] 'the evidence tells us to abstain' and that we don't have a lot of evidence around safety and drinking and pregnancy, so to keep the risk to a minimum with there not being a safe limit in the evidence so we would strongly advise to abstain. Midwife 5

Just being really honest with the information, being honest about what evidence is out there and making sure we say the official guidelines and offering support Midwife 6

Communication with women

The theme around communication primarily focused on the need to establish a trusted relationship with women which would then allow midwives to ask questions about alcohol. For some that meant treading a bit carefully and perhaps addressing the question later in pregnancy once a relationship has been established, while initially just ensuring that the information had been provided.

> *I think as well asking later in that pregnancy, when you've met with that woman three, four maybe five times, she's trusting you and she has built a relationship with you and she feels that she can tell you a thing confidently and not worry about it.* Midwife 7

To communicate clearly, effectively and compassionately, midwives believed that the discussion needs to be held in a non-confrontational way. Ensuring that women feel comfortable with disclosing alcohol use without being stigmatised was key and midwives did not want to come across as being judgemental. They therefore promoted an open conversation style and suggested that building a relationship takes time. A barrier to having a conversation, however, was the perception that women do not disclose if they are drinking.

> *So, non-disclosure is the biggest [thing] because I think they're just so frightened. I don't know why but, you know, I don't think they want to have a bleak picture painted on them, even if they are drinking on a minimal scale.* Midwife 8

An issue in delivering the recommendation about abstinence was unintended exposure before pregnancy recognition, something many of the midwives reported was common. This therefore required midwives to communicate the Guidelines differently, to alleviate anxiety in women.

> *I would give them the same information, you would maybe couch that a wee bit different and say 'there is nothing we can do about that now, you had a drink at that point and from now I would advise you, you know, the advice is the same to not drink during pregnancy, it is unlikely that you have caused any great harm but if you are worried about the amount you were drinking we'll note that down and then speak to your obstetrician or your GP about that'.* Midwife 2

None of the participants reported lacking confidence or finding it difficult to discuss alcohol with pregnant women. However, there was a sense that other midwives might and some of

the interviewees suggested a number of reasons why that might be. They felt that lacking confidence in the Guidelines, concern about affecting the relationship, wanting to avoid discomfort of a difficult conversation, or, not having places to refer women if they need further support might be a barrier to other midwives.

> *Maybe [they] just feel a bit uncomfortable about it and maybe not too sure about the guidance themselves and maybe not enough places to signpost women to if they do find out that they are still drinking heavily. Maybe they don't want [them] to feel guilty as well.* Midwife 6

Strategies in addressing alcohol use

The key finding in this theme was that while the ways in which alcohol is assessed and addressed seems to vary across the UK, even between regions or localities due to local initiatives, there was a sense that individualised care and tailoring was needed to meet women's needs. Individualised approaches were discussed within the context of very time-limited appointments that restricts in how much detail topics can be discussed; *"It's… a big one, time constraints, how much time you can actually spend on a specific topic"* (Midwife 8). If alcohol was not perceived as an issue, midwives felt that they need to prioritise other issues which were more pressing.

In several localities where midwives worked there was ongoing work to audit the recording of alcohol and drug use. The way alcohol was assessed varied; while some used a screening tool in person during appointments some sent a questionnaire out to women ahead of appointments. Some talked about the use of validated screening tools to assess women's drinking, and AUDIT-C was specifically mentioned and administered in different ways (in person or on paper prior to the booking appointment).

> *The way it (AUDIT-C) was introduced was the women were posted it out before they arrived for their booking. So, they had… they were able to fill it out and hand it in to… at the reception at the antenatal clinic* Midwife 8

> *We are only currently implementing a new tool for assessing alcohol use during pregnancy so it's always been a bit subjective in the past […] I think it will help midwives to report alcohol use more accurately because the AUDIT-C has clearly the units on the tool* Midwife 3

Several midwives had undertaken training in brief interventions or motivational interviewing, which was how they worked with delivering the advice. However, a specific strategy to engage women in a discussion about current drinking was to ask about pre-pregnancy drinking and how alcohol fitted into women's lives. A few midwives also described asking questions to the woman's partner, but that was not something that was common across the sample. However, several midwives discussed that exploring social support would be important in order to support the woman, as midwives recognised the importance of exploring related factors supporting or making it more difficult for women to abstain from alcohol.

Discussion

In this study we explored how the Guidelines were implemented across the UK in a convenience sample of midwives. We found an overall commitment from midwives to advise pregnant women to abstain from alcohol during pregnancy, though midwives were not familiar with the Guidelines. It therefore appears that the publication of these recommendations in 2016 was not widely publicised by the Government to ensure that the professionals who ought to implement them were informed. This is a particularly important observation as the relevant clinical guidelines that midwives use were not updated simultaneously, which was highlighted by midwives in the current study. It was also clear that the approach to discussing alcohol with pregnant women varies across the four nations.

Limited awareness of the Guidelines is not isolated to professionals but also includes the general population. A survey of 972 drinkers in the UK, conducted shortly before and after the revised Guidelines were published, showed that 71% were aware that the Guidelines had changed, however only 8% could accurately state their content (21). The opposite was evident in our study, as midwives knew the content of the Guidelines relating to pregnant women, but not their source. Better promotion to both professionals and the general public may lead to less confusion about changes from previous guidelines, which midwives thought may be an issue. Reiteration of the Guidelines from multiple sources would also support midwives in their discussions with women.

We have previously reported on the range of approaches from midwives advising alcohol abstinence to pregnant women (17), as have other UK-based studies (22,23). The lack of uniform ways of addressing alcohol leads to difficulties in fully understanding the scale of the problem of alcohol use during pregnancy in the UK, as well as how to best address it. International guidelines recommend that antenatal care uses a validated screening tool to assess women (24). While we found that screening tools were used to some extent, midwives' concerns with eliciting information on whether or not women are consuming alcohol focused on a trusted relationship and building rapport. Previous studies have reported that midwives prefer to have a conversation without necessarily using the structure of formal screening (12,25). Qualitative research from Australia has also shown that midwives felt that a casual and more conversational style assessment helps with discussing sensitive topics (26). However, we know little about what the most effective approaches are to preventing harm from alcohol exposure during pregnancy in the UK and different strategies need to be documented and evaluated to inform future intervention development.

In this paper we demonstrated how midwives focus on the interpersonal factors in the interaction with women as important in discussing alcohol, in particular to develop a trusting relationship. A review of practitioner barriers for screening for alcohol in antenatal care identified that many barriers relate to the interpersonal relationship and attitudes of practitioners (insufficient rapport; discomfort; assumptions about women's alcohol use; women not being honest; uncertainty of evidence; guilt, shame and anxiety) (27). This was reflected in our findings, as insufficient rapport, shame and anxiety were noted as reasons why women might not disclose their alcohol use or midwives not asking women about it. However, midwives' potential reluctance to ask about alcohol due to discomfort was discussed in relation to how other midwives might feel, rather than the participants themselves. Further research is needed on the views of midwives who may feel less comfortable asking questions about alcohol to understand the reasons for the views in

order to tailor strategies to support diverse midwifery practice behaviours. This should also address the possibility of conflicting information from other health professionals, as mentioned by one participant in the current study, and any assumptions midwives may have about characteristics of women who drink (such as age or education).

Midwives therefore acknowledged that building a relationship over time was an important strategy. This is not isolated to alcohol, but also to other health behaviours such as diet. A study of midwives' approaches to discussing diet and weight also indicated that midwives felt women are more receptive to advice as a relationship develops over time. Furthermore, midwives acknowledged finding a balance between providing information and being sensitive to women without alienating them (28). Adapting to women and providing individualised care were core to midwives' views and values in the current study and aligns with a midwifery-led continuity of care model, which has been evidenced to improve pregnancy and birth outcomes (29). Our findings indicate that midwives may feel enabled to address alcohol when the model of care promotes continuity of carer, which aligns with the focus on public health within antenatal care that has been strongly promoted in the UK over the last couple of years (30). These findings, however, need to be considered within the context of early intervention to prevent alcohol exposure since no safe threshold or safe time period to consume alcohol has been identified from the current evidence.

Strengths and limitations

This is the first study to evaluate the implementation of the Guidelines among UK midwives. The study design was underpinned by a robust theoretical framework specifically relating to implementation of interventions or guidelines among health professionals. The value of a theoretical approach is two-fold in this context. Such an approach is likely to mitigate any cognitive bias in participant responses (e.g. automatic responses) thus giving us more robust data set and offers us the opportunity to design theoretically informed implementation interventions to address barriers to guideline adoption as recommended by the Medical Research Council guidelines for complex interventions (31). The study was also designed and underpinned by findings from a large national survey of midwives. We had representation from midwives across the UK that provided views on how there may be differences within the devolved nations.

A number of limitations should be acknowledged. This sample was a convenience sample mainly comprising of midwives contacted through the authors' networks and snowball sampling, which due to difficulties in recruiting also included midwives who expressed interest but worked in research or educational roles and had not undertaken bookings recently. This involved carrying out one focus group and one interview with participants known to one of the researchers. Due to difficulties in arranging focus groups, both interviews and focus groups were conducted by different members of the research team at the participants convenience. While all team members were involved in developing the data collection tools, differences in engagement from different researchers may have impacted on the data collected. While we deemed it appropriate to analyse focus group and interview data together, individual opinions expressed in focus groups are within the context of a group discussion and may differ from how individuals would have expressed themselves in an interview setting. Our sample as a result included several midwives who had not recently conducted booking appointments with women. In many areas, midwives were already involved in work around improving recording of alcohol or various activities

relating to Fetal Alcohol Spectrum Disorder (FASD) prevention or were in specialist roles, meaning the sample is likely to be biased towards those with a direct interest in the topic and may experience fewer or different barriers to midwives working in areas where improvement work has not been undertaken. Further research is needed that includes a more diverse sample of midwives to explore a wider range of views that may impact on midwifery practice behaviours.

Conclusions

Midwives were supportive of the abstinence advice in the Guidelines but the different timing of changes from various professional bodies means there has been conflicting recommendations in circulation since they were introduced. Key to midwives is delivering care that supports a trusting relationship, but time constraints and wider pressures influence how alcohol interventions can be delivered. Future research should explore how practice-based interventions can best address systemic and interpersonal factors to support health professionals to implement the Guidelines, and ensure that women are provided sufficient information and support to change unhealthy behaviours. The UK Government should consider how to strengthen communication of the Guidelines to ensure they are promoted to the general public and also align with professional guidance and standards to ensure professionals are aware of them.

Funding

This research was funded by the Institute for Alcohol Studies.

Authors information

Author 1 led the development of the study; obtained funding; led recruitment, data collection and analysis; and drafted the manuscript. Author 2 supported development of the study and data collection tools, recruited participants, collected data, undertook data analysis, and commented on the draft paper. Author 3 supported the development of the study and data collection tools, provided guidance on behavioural theory, collected data, and commented on the draft paper. Author 4 supported the development of the study, collected data, and supported drafting of the paper. All authors commented on the final version of the manuscript.

Declaration of Competing Interest

The author(s) declare that they have no competing interests.

Acknowledgements

The authors are grateful to all midwives who took part in this study and stakeholders who supported recruitment.

References

1. Popova S, Lange S, Probst C, Gmel G, Rehm J. Estimation of national, regional, and global prevalence of alcohol use during pregnancy and fetal alcohol syndrome: a systematic review and meta-analysis. Lancet Glob Heal. 2017; 5(3): E290-E299. Available from: https://doi.org/10.1016/S2214-109X(17)30021-9
2. Mamluk L, Edwards HB, Savović J, Leach V, Jones T, Moore THM, et al. Low alcohol consumption and pregnancy and childhood outcomes: time to change guidelines indicating apparently "safe" levels of alcohol during pregnancy? A systematic review and meta-analyses. BMJ Open. 2017; 7(7):e015410. Available from: http://dx.doi.org/10.1136/bmjopen-2016-015410
3. O'Leary CM, Heuzenroeder L, Elliott EJ, Bower C. A review of policies on alcohol use during pregnancy in Australia and other English-speaking countries. Med J Aust. 2007;186(9):466–71. doi: 10.5694/j.1326-5377.2007.tb00999.x
4. Department of Health. Sensible Drinking - The Report of an Inter-Departmental Working Group London: Department of Health; 1995. Available from: http://www.ias.org.uk/uploads/pdf/Consumption docs/dh_4084702.pdf
5. Department of Health. Safe, Sensible, Social - The next steps in the National Alcohol Strategy. London: Department of Health; 2007. Available from: https://webarchive.nationalarchives.gov.uk/20130123192107/http://www.dh.gov.uk/en/Publicationsandstatistics/Publications/PublicationsPolicyAndGuidance/DH_075218
6. National Institute for Health and Care Excellence. NICE Guideline 62 - Antenatal care for uncomplicated pregnancies. 2008 [cited 2020 Jul 23]. Available from: https://www.nice.org.uk/guidance/cg6
7. Department of Health. UK Chief Medical Officers' Low Risk Alcohol Guidelines. London: Department of Health; 2016. Available from: https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/545937/UK_CMOs__report.pdf
8. NHS Health Scotland. Ready Steady Baby! Your Complete Guide To Pregnancy, Birth And Parenthood. Edinburgh: NHS Scotland; 2010.
9. Reid E, McStay P. Development of an alcohol liaison midwifery service in a health Trust in Northern Ireland. Br J Midwifery. 2018;26(3):158–63. Available from: http://www.magonlinelibrary.com/doi/10.12968/bjom.2018.26.3.158
10. Brown R, Trickey H. Devising and communicating public health alcohol guidance for expectant and new mothers: a scoping report. Cardiff/London: Alcohol Change UK; 2018. Available from: https://s3.eu-west-2.amazonaws.com/files.alcoholchange.org.uk/documents/FinalReport_0151.1-1.pdf?mtime=20181110141216&focal=none
11. Kesmodel US, Kesmodel PS. Alcohol in Pregnancy: Attitudes, Knowledge, and Information Practice Among Midwives in Denmark 2000 to 2009. Alcohol Clin Exp Res. 2011;35(12):2226–30. Available from: http://dx.doi.org/10.1111/j.1530-0277.2011.01572.x
12. Schölin L, Fitzgerald N. The conversation matters: a qualitative study exploring the implementation of alcohol screening and brief interventions in antenatal care in Scotland. BMC Pregnancy Childbirth. 2019;19(1):316. Available from:

https://doi.org/10.1186/s12884-019-2431-3
13. Crawford-Williams F, Steen M, Esterman A, Fielder A, Mikocka-Walus A. “If you can have one glass of wine now and then, why are you denying that to a woman with no evidence”: Knowledge and practices of health professionals concerning alcohol consumption during pregnancy. Women Birth. 2015;28(4):329–35. Available from: https://doi.org/10.1016/j.wombi.2015.04.003
14. van der Wulp NY, Hoving C, de Vries H. A qualitative investigation of alcohol use advice during pregnancy: experiences of Dutch midwives, pregnant women and their partners. Midwifery. 2013;29(11):e89-98. Available from: https://doi.org/10.1016/j.midw.2012.11.014
15. Jones S, Telenta J, Shorten A, Johnson K. Midwives and pregnant women talk about alcohol: what advice do we give and what do they receive? Midwifery. 2011;27(4):489–96. Available from: https://doi.org/10.1016/j.midw.2010.03.009
16. [Name deleted to maintain integrity of the peer review process]
17. [Name deleted to maintain integrity of the peer review process]
18. Guest G, Bunce A, Johnson L. How Many Interviews Are Enough?: An Experiment with Data Saturation and Variability. Field methods [Internet]. 2006;18(1):59–82. Available from: https://doi.org/10.1177/1525822X05279903
19. Michie S, Johnston M, Abraham C, Lawton R, Parker D, Walker A, et al. Making psychological theory useful for implementing evidence based practice: a consensus approach. Qual Saf Health Care. 2005;14(1):26–33. Available from: http://dx.doi.org/10.1136/qshc.2004.011155
20 Braun V, Clarke V. Using thematic analysis in psychology, Qualitative Research in Psychology, 2006;3:2, 77-01, doi: 10.1191/1478088706qp063oa
21. Rosenberg G, Bauld L, Hooper L, Buykx P, Holmes J, Vohra J. New national alcohol guidelines in the UK: public awareness, understanding and behavioural intentions. J Public Health. 2018;40(3):549–56. Available from: https://doi.org/10.1093/pubmed/fdx126
22. Howlett H, Mackenzie S, Strehle E-M, Rankin J, Gray WK. A Survey of Health Care Professionals’ Knowledge and Experience of Foetal Alcohol Spectrum Disorder and Alcohol Use in Pregnancy. Clin Med Insights Reprod Heal. 2019;13:1-10. Available from: https://doi.org/10.1177%2F1179558119838872
23. Winstone AM, Verity C. Antenatal alcohol exposure: An East Anglian study of midwives’ knowledge and practice. Br J Midwifery. 2015;23(3):180–6. Available from: https://doi.org/10.12968/bjom.2015.23.3.180
24. World Health Organization. Guidelines for the identification and management of substance use and substance use disorders in pregnancy. Geneva: World Health Organization; 2014. Available from: https://www.who.int/publications/i/item/9789241548731
25. Wangberg SC. Norwegian midwives’ use of screening for and brief interventions on alcohol use in pregnancy. Sex Reprod Healthc. 2015;6(3):186–90. Available from: https://doi.org/10.1016/j.srhc.2015.03.001
26. Whitehead R, O’Callaghan F, Gamble J, Reid N. Contextual Influences Experienced by Queensland Midwives: A Qualitative Study Focusing on Alcohol and Other Substance Use During Pregnancy. Int J Childbirth. 2019;9(2):80–91. Available from: https://doi.org/10.1891/2156-5287.9.2.80
27. Oni HT, Buultjens M, Abdel-Latif ME, Islam MM. Barriers to screening pregnant

women for alcohol or other drugs: A narrative synthesis. Women and Birth. 2019;32:479–86. Available from: https://doi.org/10.1016/j.wombi.2018.11.009
28. Wennberg AL, Hamberg K, Hörnsten Å. Midwives' strategies in challenging dietary and weight counselling situations. Sex Reprod Healthc. 2014;5(3):107–12. Available from: https://doi.org/10.1016/j.srhc.2014.07.001
29. Sandall J, Soltani H, Gates S, Shennan A, Devane D. Midwife-led continuity models versus other models of care for childbearing women. Cochrane Database of Systematic Reviews. 2016 [cited 2020 Jul 18]. Available from: https://doi.org/10.1002/14651858.CD004667.pub5
30. Royal College of Midwives. Stepping up to Public Health: A new maternity model for women and families, midwives and maternity support workers. London: Royal College of Midwives. 2017. Available from: https://www.rcm.org.uk/media/3165/stepping-up-to-public-health.pdf
31. Craig P, Dieppe P, Macintyre S, Mitchie S, Nazareth I, Petticrew M. Developing and evaluating complex interventions: The new Medical Research Council guidance. Vol. 337, BMJ. 2008; 337: a1665. Available from: https://doi.org/10.1136/bmj.a1655