

Contents lists available at ScienceDirect

Midwifery

journal homepage: www.elsevier.com/locate/midw





Consent practices in midwifery: A survey of UK midwives

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ARTICLE INFO

Keywords: Consent Montgomery Midwives Knowledge Legal Survey

ABSTRACT

Objective: To explore midwives' knowledge and understanding of the law and practice of consent in the post-Montgomery world.

Design: Cross-sectional online survey. Descriptive statistical analysis of midwives' survey responses.

Settings: Social media: Instagram, Facebook and Twitter. Survey distribution was via the UCL Opinio survey platform.

Participants: A total of 402 midwives, surveyed over a four month period between 2nd March and 2nd July 2021. *Measurements*: Knowledge of legal consent, 'sureness' of meeting current legal requirements and competence to gain consent.

Findings: 91% of participants acknowledged correctly that consent must be voluntary. 91% reported that women must be informed of all the risks associated with their care, although 26% reported that women should be informed of some of the risks associated with their care. Most participants were 'sure' that their discussions of consent meet current legal requirements (91%). 21% rated their competence to gain consent as 'excellent', 71% rated themselves as 'very good', whilst 1% rated their competence as 'poor'. Deficiencies in fundamental knowledge of consent were noted in some participants rating themselves highest in 'sureness' of meeting legal requirements and competence to consent.

Key conclusions: Fundamental gaps in midwives' knowledge of legal consent were identified. Participants demonstrated uncertainty regarding the extent of risk disclosure and discussion of alternative care options. Participants generally rated themselves highly in their consenting practices, despite lacking in basic knowledge of legal consent, revealing a discrepancy between midwives' self-perceptions and their actual knowledge. Implications for practice: The overconfidence displayed by some participants is concerning for clinical midwifery practice. Professional education and guidance for midwives on legal consent in keeping with Montgomery is urgently required to ensure that midwives are legally compliant in their consenting practices.

Introduction

Effective patient-centred consent is fundamental to all healthcare and thus, is integral to midwifery practice (Griffith, 2011; Newnham and Kirkham, 2019; Yuill et al., 2020). The process of informed consent is bound by legal and ethical considerations (Marshall, 2000) and midwives have a responsibility to play their part in supporting women in making evidence-based informed choices (Nursing and Midwifery Council, 2019). This is particularly pertinent in relation to recent changes in consent law applicable across the United Kingdom (UK) following the Montgomery v Lanarkshire Health Board Supreme Court ruling in 2015 (Montgomery v Lanarkshire Health Board, 2015) which reflects the increasing ascendancy of patient autonomy.

Mrs. Montgomery was a pregnant woman of small stature with type 1

diabetes and was predicted to be having a 'large' baby. Although Mrs. Montgomery voiced her concerns about giving birth vaginally, her obstetrician failed to inform her of the increased risk of shoulder dystocia in diabetic women. Mrs. Montgomery had a forceps delivery resulting in a prolonged shoulder dystocia. Her son was subsequently born with cerebral palsy. Mrs. Montgomery maintained that she would have opted for a caesarean section had she been informed of the risk of shoulder dystocia (Montgomery v Lanarkshire Health Board, 2015).

The precedent set in *Montgomery* establishes the importance of the patient viewpoint from that of the healthcare professional (Harrison et al., 2018), as whether a risk is deemed material is dependent purely on the perspective of the patient (Nicholls et al., 2021). *Montgomery* details the duty of care to counsel on material risks (Murphy, 2019); with the materiality of a risk being determined according to whether a

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'reasonable person in the patient's position' deems it significant, or if a healthcare professional is or should be aware that a particular patient may deem a risk significant (Montgomery v Lanarkshire Health Board, 2015). Prior to this, sharing of information was at the discretion of the 'reasonable doctor', in accordance with the Bolam test (Sidaway v Board of Governors of the Bethlehem Royal Hospital, 1985).

Montgomery highlights a patient-centred approach to consent and information sharing (Chan et al., 2017), focusing on the disclosure of information that patients would ascribe significance to Farrell and Brazier (2016). Genuine discourse is advocated between healthcare professionals and patients, so that assessment of risk centres around an individual's priorities. Subsequent cases (Spencer v Hillingdon Hospital NHS Trust, 2015; Thefaut v Johnston, 2017; Webster v Burton Hospitals NHS Foundation Trust, 2017) have upheld the precedent set in Montgomery, reflecting increasing patient autonomy and solidifying patient-centric decision-making as a pillar of valid consent.

The Nursing and Midwifery Council (NMC) Standards of Proficiency for Midwives dictate that understanding the significance of informed consent and seeking informed consent are essential midwifery skills (Nursing and Midwifery Council, 2019). Despite this, there is a lack of professional guidance for midwives on obtaining informed consent (Chippington Derrick, 2012) and in research which predates Montgomery, midwives demonstrated limited understanding of their legal accountability in their practice (Kruske et al., 2013). The recommendations arising from Montgomery have widespread repercussions for how midwives approach and facilitate the consent process (Cook, 2016), yet recent research on consent in pregnancy found that knowledge of Montgomery was greater amongst obstetricians compared to midwives (Nicholls et al., 2019). Although some attempt has been made to understand medical practitioners understanding of the consent process (O'Brien et al., 2017), there has been no investigation of midwives knowledge or experiences (Nicholls et al., 2019).

This research aims to explore midwives' knowledge and understanding of the law and practice of consent in the post-*Montgomery* world. It is anticipated that the study results will inform future midwifery education on how midwives can implement consent processes which accord with their legal and professional responsibilities.

Methods

Study design

An exploratory research design was used to collect data on midwives' knowledge of legal consent and self-perceptions of abilities to enact the consent process in clinical practice. A cross-sectional anonymous online survey was developed and administered using the Opinio platform available to University College London (UCL) staff and students. Data collected were both quantitative and qualitative. Ethical approval was obtained from the UCL Research Ethics Committee (Project 19,187/001).

Participants

Participant eligibility criteria included qualification as a midwife, practising as a midwife in the UK and ability to understand and complete the survey in English. A minimum age of 21 was set for participants to account for the youngest possible age of a newly qualified midwife in the UK. The minimum sample size required was calculated as 227 participants in accordance with a power calculation described by Charan and Biswas (2013). Knowledge of consent was used as the primary outcome to determine the sample size. O'Brien et al. (2017) investigated knowledge of consent amongst 245 doctors at a large teaching hospital in the UK, finding that 18% of participants were 'certain' that their consenting process was in accordance with legal requirements. From this, it was assumed that the proportion of midwives that may regard their consenting practice similarly and thus have sufficient knowledge of

consent, would not exceed 18%. This was then used to calculate the minimum sample size required, with a precision of 5% and a type 1 error of 5%.

Survey development

The novel and rapidly evolving nature of the professional issue of consent was reflected in the absence of a validated survey tool. As such, recent literature on the topic of consent was reviewed and informed our survey development. Reviewing the recent literature identified both quantitative and qualitative research regarding healthcare professional knowledge of consent in relation to *Montgomery*. The survey was developed by the supervisory research team, consisting of three clinicians and a women's health researcher, in addition to the advice of a statistician.

Extensive iterative pre-piloting and discussion was undertaken for purposes of reliability and validity. Face validity was established by the research team throughout the development process. Repeated discussion and testing of the survey culminated in various changes being made prior to piloting. Changes were made regarding the question order of the survey and nuances of language used, in order that the questions resonated with the experiences of practising midwives and facilitated authentic responses relevant to their practice.

The survey was piloted to ensure the clarity, survey flow and completion time. Midwives were purposively sampled for the pilot and invited to participate as they varied across the demographic parameters sought in the first section of the survey.

Survey structure

A recent study highlighted a lack of knowledge of *Montgomery* amongst midwives, when compared to their obstetric colleagues (Nicholls et al., 2019). This study additionally determined midwives' lack of clarity regarding information provision and the extent of risk disclosure (Nicholls et al., 2019). The survey items relating to knowledge of legal consent were carefully developed in line with this evidence, and to ascertain midwives current understanding of legal consent, particularly in relation to recent changes in consent law. Dichotomous true or false questions were used to objectively assess participants' knowledge of the detailed requirements of legal consent across 10 dimensions (Chandratilake et al., 2011).

A survey by O'Brien et al. (2017) examined knowledge of consent law in doctors, and participants were asked how certain they were that their consenting process meet current legal requirements. This question was used as the basis for a similar question to ascertain midwives consenting practice. The word 'sure' was used in place of 'certain', to prevent participants being discouraged by the finality associated with the notion of certainty. O'Brien et al.'s survey also provided the reference for our sample size calculation.

Consent discussions facilitated by midwives have been found to lack presentation of alternative care options (Nicholls et al., 2021). Discussions centred around the disclosure of clinical risk, often failing to take into consideration women's preferences in conjunction with the notion of materiality of risk (Nicholls et al., 2021). These findings were considered when constructing the dichotomous true or false questions to establish knowledge of *Montgomery* in the survey.

Three questions were devised to contextualise midwives' discussion of risk in clinical practice, to better understand how midwives approach such discussions in their roles. A further three questions used Likert scales for the assessment of self-perceived competence and confidence in relation to the consenting process. This method of self-assessment has been commonly utilised in research (Ball and Leveritt, 2015) and is considered an appropriate method to effectively distinguish participants' attitudes (Boynton and Greenhalgh, 2004).

The final version of the survey consisted of six domains, with 28 items in total: demographics (8), knowledge of legal consent (5), clinical

practice (9), COVID-19 (3), training (3) and further comments (1). The survey platform enabled a flow logic to be constructed that ensured participants only answered relevant questions based on their previous answers.

Data collection

Participants were recruited via social media between March and July 2021. Two members of the research team promoted the study on their personal social media accounts, specifically Instagram, Facebook and Twitter once access permissions had been granted by the site owners. The study was endorsed by the Royal College of Midwives and the survey link was shared on the Royal College website. The survey link was also shared on the UCL Institute for Women's Health Twitter account and website. Snowball sampling was utilised whereby participants were asked to share the study information with personal and professional contacts. The survey was distributed on the UCL Opinio survey platform (Version 7.12). Participation was voluntary and completely anonymous.

Analysis

This paper reports a subsection of the data collected, focusing primarily on knowledge of legal consent in accordance with the research aim. The demographics section, knowledge of legal consent, 'sureness' of meeting current legal requirements and competence to gain consent comprise the subsection of data reported here. A quantitative data set was provided by Opinio and reviewed using IBM SPSS (Version 27).

Descriptive statistics (percentages and frequencies) were produced for categorical variables. Analysing the individual items capturing midwives' knowledge of consent in relation to their perception of legal requirements and perceived competence to consent permitted more detailed examination of midwives' knowledge of legal consent. Further analysis was performed and descriptive statistics were generated from the data. Where answers were omitted by participants constituting missing data, percentages have been calculated according to the data provided and the total number of responses for each question is clearly stated.

Results

A total of 402 midwives completed the survey. The survey was commenced by 603 participants, amounting to a completion rate of 67%. Seven participants reported that they did not work for the National Health Service (NHS). For ease of comparison, these seven participants were excluded from the analysis. The final sample consists of data from 395 participants who work within the NHS.

Of the 395 participants, 40.6% of participants worked in an intrapartum area, 57% of participants identified as working in an inner city, with the majority working at a work location with an annual birth rate over 4000 births (71.3%). Most participants identified as female (98.7%). Table 1 summarises the participant demographics.

Knowledge of legal consent

Participants (91%) recognised that consent must be voluntary. Participants (91%) also reported that women must be informed of *all* the risks associated with their care, although 26% reported that women should be informed of *some* of the risks associated with their care. When considering discussion of alternative care options, the majority of participants (88%) stated that women should be informed of *all* alternative care options, whereas 30% of participants indicated that women should be informed of *some* alternative care options. Table 2 shows the full results relating to knowledge of legal requirements for obtaining consent.

Table 1 Participant demographics.

		n	%
Years qualified as a midwife	0–4	184	46.6
	5–8	120	30.4
	≥9	91	23.0
	Total	395	100
Current banding	Band 5	39	9.9
	Band 6	225	57.1
	Band 7	106	26.9
	Band 8 or higher	24	6.1
	Total	394	100
Gender	Female (including	390	98.7
	Transgender Female)		
	Male (including Transgender	1	0.3
	Male)		
	Other	2	0.5
	Prefer Not to Say	2	0.5
	Total	395	100
Age (years)	21–24	34	8.6
	25-34	151	38.3
	35–44	102	25.9
	45–54	72	18.3
	≥55	35	8.9
	Total	394	100
Current primary work role	Antenatal Clinic	9	2.3
	Inpatient ward (Antenatal	26	6.6
	and/or Postnatal)		
	Intrapartum Area	159	40.6
	Traditional Community	49	12.5
	Caseload	65	16.6
	Specialist Role	68	17.3
	Senior Management Role	16	4.1
	Total	392	100
Annual birth rate of work location	<4000 births	110	28.7
amidul birdi fate of work location	>4000 births	273	71.3
	Total	383	100
Level of Neonatal Intensive Care	None	8	2.2
Unit of work location	Level 1	36	9.8
Clift of work location	Level 2	131	35.8
	Level 3	191	52.2
	Total	366	100
Location descriptor of work	Inner City	217	57.0
location	Outer Suburb	122	32.0
iocation	Rural	42	
	Rural Total	42 381	11.0 100
	rotar	381	100

Meeting current legal requirements and competence to gain consent

Table 3 depicts how 'sure' participants felt that their discussions with women about consent in clinical practice meet current legal requirements. Most participants were 'sure' that their discussions of consent meet current legal requirements (91%). Of those who were 'unsure' (9%), less than 1% were 'very unsure' whilst 8% were 'a little unsure'. Table 4 shows how participants rated their competence to gain consent from pregnant women. 1 in 5 rated themselves as 'excellent' (21%). 71% considered themselves 'very good' compared to 1% who rated their competence as 'poor'.

Further analysis of knowledge of legal consent

Tables 5 and 6 present further descriptive analysis of knowledge of legal requirements for obtaining consent. These results illustrate similar deficits and ambiguities in midwives' legal knowledge of consent when considered in respect of the variables of 'sureness' of meeting legal requirements and competence to consent. Table 5 displays knowledge of consent in accordance with how 'sure' participants were of meeting legal requirements. Table 6 exhibits knowledge of consent in relation to participants self-reported competence to gain consent. The results demonstrate gaps in knowledge of legal consent across participants who rated themselves highest in terms of 'sureness' and competence.

Table 2Knowledge of legal requirements for obtaining consent.

	True	True		False		ered ctly	Total	Correct Answer (in accordance with the materiality test)
	n	%	n	%	n	%	n	
Consent must be voluntary	360	91.1	35	8.9	360	91.1	395	True
Consent must always be written	17	4.3	376	95.7	376	95.7	393	False
Women must be provided with information on the benefits associated with their care	389	98.7	5	1.3	389	98.7	394	True
Women must be informed of all of the risks associated with their care	359	91.1	35	8.9	35	8.9	394	True
Women must be informed of some of the risks associated with their care	100	25.6	290	74.4	290	74.4	390	False
Women must be informed of all possible risks associated with treatment	351	88.9	44	11.1	44	11.1	395	True
Women must be informed of all alternative care options	346	88.3	46	11.7	46	11.7	392	True
Women must be informed of some alternative care options	116	30.0	271	70.0	271	70.0	387	False
Women may withdraw their consent at any time	393	99.5	2	0.5	393	99.5	395	True
Women's understanding of all information provided should be assessed	381	96.5	14	3.5	381	96.5	395	True

Table 3Meeting current legal requirements.

How sure do you feel that your discussions with women about consent meet current legal requirements?

	n	%	
Very sure	150	37.9	
Fairly sure	210	53.2	
A Little Unsure	32	8.1	
Very Unsure	3	0.8	
Total	395	100	

Table 4 Perceived competence to gain consent.

How would you	rate your	competence to gain consent from a pregnant woman?
	n	%
Excellent	82	20.8
Very good	280	70.9
Poor	5	1.3
I am not sure	28	7.0
Total	395	100

Consent must be voluntary

10% of participants consistently failed to recognise that consent must be voluntary. Deficiencies in fundamental knowledge of consent were noted in some participants rating themselves highest in 'sureness' of meeting legal requirements and competence to consent. 1 in 10 participants who were 'very sure' that their discussions meet legal requirements did not report that consent must be voluntary (Table 5). Amongst those who were 'fairly sure', 9% reported that consent does not need to be voluntary. Contrastingly, 100% of those 'very unsure' noted that consent must be voluntary. This lack of knowledge was also reflected in relation to competence, with 10% who self-rated as excellent and 8% who self-rated as 'very good' reporting that consent does not need to be voluntary (Table 6).

Discussion of all risk versus some risk

5% of participants who were 'very sure' that their consenting practice meets legal requirements noted that women should not be informed of *all* the risks associated with their care (Table 5). 11% of 'fairly sure' participants reported the same. When distinguishing between care and treatment, 5% of those 'very sure' and 12% of those 'fairly sure' reported that women should not be informed of *all* possible risks associated with treatment. However, 20% and 27% of those 'very sure' and 'fairly sure', respectively, stated that women should be informed of *some* of the risks associated with their care. These figures indicate that some participants

within these groups selected that both *all* and *some* of the risks of care should be discussed, demonstrating their uncertainty on this topic. This uncertainty did not translate to the 'very unsure' participants, with 100% of them stating that women should be informed of *all* the risks.

9% of those who considered their competence to be 'excellent' reported that women should not be informed of *all* the risks associated with their care and 22% said women should be informed of *some* of the risks (Table 6). Correspondingly, 10% of those who rated themselves 'very good' thought that woman should be informed of *all* the risks and 27% reported that women should be informed of *some* of the risks associated with their care. Amongst participants who rated their competence to consent as 'poor', there was a discrepancy between risks associated with care and treatment. 100% reported that women should be informed of *all* the risks associated with their care, compared to 60% who stated that women must be informed of *all* the risks associated with treatment.

These results display midwives' uncertainty regarding the difference between disclosing *all* or *some* risks associated with care, even amongst those rating themselves as highly competent in their consenting practice. Differing views are also observed between risk disclosure surrounding care versus treatment, regardless of the perceived competence of midwives.

Discussion of all alternative care options versus some alternative care options

The difficulty distinguishing between *all* versus *some* is further observed in participants' knowledge regarding discussion of alternative care options. 95% of those who were 'very sure' that their consenting practice meets legal requirements recognised that women should be informed of *all* alternative care options, whilst 27% thought that women must be informed of *some* alternative care options (Table 5). As was the case with discussion of risk, these results imply that some participants selected that both *all* and *some* alternative care options should be discussed with women. 100% of 'very unsure' participants noted that women should be informed of *all* options.

These ambiguities are also seen in those rating themselves highly in competence. 7% of 'excellent' participants reported that women must not be informed of *all* alternative care options, as did 13% of 'very good' participants (Table 6). 28% and 32% of 'excellent' and 'very good' participants, respectively stated that women must be informed of *some* alternative care options. This ambiguity was not reflected in participants who perceived their competence as 'poor', with 100% noting that women should be informed of *all* alternative care options.

Table 5Knowledge of legal requirements for obtaining consent and 'sureness' of meeting current legal requirements.

		Very Sure		Fairly Sure		A Li	ttle Unsure	Vei	Very Unsure		
		n	%	n	%	n	%	n	%	n	%
Consent must be voluntary	True	135	90.0	191	91	31	96.9	3	100	360	91.1
	False	15	10.0	19	9	1	3.1	0	100	35	8.9
	Total	150	100	210	100	32	100	3	100	395	100
Consent must always be written	True	6	4.0	11	5.2	0	0	0	0	17	4.3
	False	143	96.0	199	94.8	31	100	3	100	376	95.7
	Total	149	100	210	100	31	100	3	100	393	100
Women must be provided with information on the benefits associated with their care	True	149	99.3	207	98.6	30	96.8	3	100	389	98.7
	False	1	0.7	3	1.4	1	3.2	0	0	5	1.3
	Total	150	100	210	100	31	100	3	100	394	100
Women must be informed of all of the risks associated with their care	True	142	94.7	187	89.0	27	87.1	3	100	359	91.1
	False	8	5.3	23	11.0	4	12.9	0	0	35	8.9
	Total	150	100	210	100	31	100	3	100	394	100
Women must be informed of some of the risks associated with their care	True	30	20.1	56	27.1	14	45.2	0	0	100	25.6
	False	119	79.9	151	72.9	17	54.8	3	0	290	74.4
	Total	149	100	207	100	31	100	3	100	390	100
Women must be informed of all possible risks associated with treatment	True	142	94.7	184	87.6	22	68.8	3	100	351	88.9
	False	8	5.3	26	12.4	10	31.3	0	0	44	11.1
	Total	150	100	210	100	32	100	3	100	395	100
Women must be informed of all alternative care options	True	142	94.7	179	86.1	22	71.0	3	100	346	88.3
	False	8	5.3	29	13.9	9	29.0	0	0	46	11.7
	Total	150	100	208	100	31	100	3	100	392	100
Women must be informed of some alternative care options	True	40	27.0	65	31.7	11	35.5	0	0	116	30.0
	False	108	73.0	140	68.3	20	64.5	3	100	271	70.0
	Total	148	100	205	100	31	100	3	100	387	100
Women may withdraw their consent at any time	True	150	100	208	99.0	32	100	3	100	393	99.5
	False	0	0	2	1.0	0	0	0	0	2	0.5
	Total	150	100	210	100	32	100	3	100	395	100
Women's understanding of all information provided should be assessed	True	145	96.7	203	96.7	31	96.9	2	66.7	381	96.5
	False	5	3.3	7	3.3	1	3.1	1	33.3	14	3.5
	Total	150	100	210	100	32	100	3	100	395	100

 Table 6

 Knowledge of legal requirements for obtaining consent and competence to gain consent.

		Excellent		Very (Good	Poo	r	Unsure		Total	
		n	%	n	%	n	%	n	%	n	%
Consent must be voluntary	True	74	90.2	257	91.8	4	80.0	25	89.3	360	91.1
	False	8	9.8	23	8.2	1	20.0	3	10.7	35	8.9
	Total	82	100	280	100	5	100	28	100	395	100
Consent must always be written	True	5	6.2	9	3.2	0	0	3	11.1	17	4.3
	False	76	93.8	271	96.8	5	100	24	88.9	376	95.7
	Total	81	100	280	100	5	100	27	100	393	100
Women must be provided with information on the benefits associated with their care	True	81	98.8	276	98.6	5	100	27	100	389	98.7
	False	1	1.2	4	1.4	0	0	0	0	5	1.3
	Total	82	100	280	100	5	100	27	100	394	100
Women must be informed of all of the risks associated with their care	True	75	91.5	253	90.4	5	100	26	96.3	359	91.1
	False	7	8.5	27	9.6	0	0	1	3.7	35	8.9
	Total	82	100	280	100	5	100	27	100	394	100
Women must be informed of some of the risks associated with their care	True	18	22.0	74	26.7	2	40.0	6	23.1	100	25.6
	False	64	78.0	203	73.3	3	60.0	20	76.9	290	74.4
	Total	82	100	277	100	5	100	26	100	390	100
Women must be informed of all possible risks associated with treatment	True	78	95.1	243	86.8	3	60.0	27	96.4	351	88.9
	False	4	4.9	37	13.2	2	40.0	1	3.6	44	11.1
	Total	82	100	280	100	5	100	28	100	394	100
Women must be informed of all alternative care options	True	76	92.7	242	87.1	5	100	23	85.2	346	88.3
	False	6	7.3	36	12.9	0	0	4	14.8	46	11.7
	Total	82	100	278	100	5	100	27	100	392	100
Women must be informed of some alternative care options	True	23	28.4	87	31.6	0	0	6	23.1	116	30.0
	False	58	71.6	188	68.4	5	100	20	76.9	271	70.0
	Total	81	100	275	100	5	100	26	100	387	100
Women may withdraw their consent at any time	True	82	100	278	99.3	5	100	28	100	393	99.5
	False	0	0	2	0.7	0	0	0	0	2	0.5
	Total	82	100	280	100	5	100	28	100	395	100
Women's understanding of all information provided should be assessed	True	78	95.1	270	96.4	5	100	28	100	381	96.5
	False	4	4.9	10	3.6	0	0	0	0	14	3.5
	Total	82	100	280	100	5	100	28	100	395	100

Discussion

Main findings

Our findings identified fundamental gaps in midwives' knowledge of consent, inferring that some midwives may ignore the professional standards expected of them regarding informed consent, as stated in the NMC Code (Nursing and Midwifery Council, 2015). Consent must be voluntarily and willingly given, without exertion or inappropriate pressure or influence for it to be considered lawful (National Health Service, 2017; Royal College of Nursing, 2017; General Medical Council, 2020). Despite this, 9% of the midwives surveyed did not recognise that consent must be voluntarily given, confirming that some midwives lack understanding of the essential nature of the 'voluntariness' requirement in obtaining valid consent. This is suggestive of unlawful consent practice, situating this aspect of our findings amongst the wider literature on consent practices in maternity care (Jou et al., 2015; Plested and Kirkham, 2016). Research implies that the requirement for consent to be voluntary is often ignored, detailing women' experiences of coercive measures and pressure exerted by healthcare professionals in order to gain consent (Plested and Kirkham, 2016). Our findings suggest that the midwives who do not recognise that consent must be freely given, may be exerting inappropriate pressure as a means of gaining consent, unaware that they are wrong in doing so.

We found confusion amongst midwives in relation to the communication of risk, particularly regarding the extent of risk disclosure in discussions of consent. It is evident that midwives' individual interpretation of the word 'all' differs, with some perceiving it more loosely as an adverb and some as a determiner, inevitably leading to variations in risk communication. Although midwives have an active role in facilitating informed decision-making (Levy, 2006), the current research displays the uncertainty of midwives when engaging in discussions surrounding risk, reflecting the clinical practicalities of risk disclosure (Leonard and Toner, 2019). The confusion exhibited by some midwives in this study further exposes the uncertainty that persists on how best to approach discussions of risk in clinical settings. This echoes previous research where midwives and obstetricians reported the challenges of judging what individual women deem important, demonstrating uncertainty when striving to provide tailored information (Nicholls et al., 2019) Although Montgomery clarifies the professional responsibility regarding patient-centric discussion of risk (Devaney et al., 2019), this study reveals inconsistencies in midwives' knowledge regarding the extent of risk disclosure, with midwives demonstrating a lack of clarity as to whether risks should be disclosed in full or not.

Amongst those who consider themselves highly competent in matters of consent, there was a lack of clarity on the extent of information to provide to ensure compliance with the law. In conjunction with this, some midwives have a potential misunderstanding of the concept and assessment of 'materiality' as delineated by Montgomery (Montgomery v Lanarkshire Health Board, 2015). Our findings, supported by the wider literature (Plested and Kirkham, 2016; Fay and Yee, 2018; Kennedy et al., 2021; Oelhafen et al., 2021) denote that midwives may not be legally compliant when engaging in discussions of risk. This may be due to lack of understanding of how to meet the requirements outlined by Montgomery, including the requirement for meaningful and comprehensible dialogue centred around the circumstances of the individual (Montgomery v Lanarkshire Health Board, 2015). As recommended by Lamont et al. (2019), caution is needed to prevent violating women's rights to make autonomous decisions in view of the deficits in midwives' knowledge of legal consent.

The knowledge deficits discovered in this research are reflected in other studies examining healthcare professional knowledge of legal consent. In their study, Lamont et al. (2019) reveal that healthcare professionals were unable to correctly identify elements of legal consent. Inadequate knowledge of consent law amongst doctors has been evidenced too, where the majority of participants were uncertain that their

consent practice meet current legal requirements (O'Brien et al., 2017). Recent research of obstetricians and midwives also reveals a knowledge deficit regarding the extent of risk disclosure, with many advocating full risk disclosure, demonstrating their lack of awareness of the impact of consent law in clinical practice (Kennedy et al., 2021), as opposed to discussion of material risks. The legal changes outlined in *Montgomery* govern all healthcare professionals (O'Brien et al., 2017) and the shortcomings in knowledge and understanding across midwifery and obstetrics are extremely concerning. The current study conveys the need for midwives to strengthen their knowledge of consent, echoing calls for midwives to be provided with the educational opportunities to do so (Nicholls et al., 2019).

Midwives self-perceptions

This study determined midwives' self-perceptions of their enactment of the consent process. Midwives rated their perception of their clinical consenting practice ability relating to legal requirements and their competence (knowledge and skills). Most midwives were 'sure' that their discussions of consent meet current legal requirements. Contrastingly, a survey found that only 18% of doctors were 'certain' that their consenting processes meet current legal requirements (O'Brien et al., 2017). Our results detect a discrepancy between midwives' perceptions of their correct knowledge of legal consent and their actual knowledge. The overestimation of knowledge and skills presented in this study corresponds with existing literature, as healthcare professionals across numerous disciplines are notably more likely to overestimate than underestimate their clinical performance (Gude et al., 2018). The self-assurance exhibited by midwives in the current study is concerning, for approximately 1 in 10 midwives who considered themselves 'sure' that their consenting practice meets current legal requirements, lacked knowledge of some of the basic principles of legal consent.

A possible idea that might account for midwives' overestimation of their clinical performance is the idea of 'excessive certainty' or 'judgement overconfidence': the propensity to trust that the knowledge we possess is more correct and complete than it actually is (Galloway, 2015). Less competent clinicians often overestimate their skills, as evidenced by the role of overconfidence in self-assessments of competence (Croskerry and Norman, 2008; Mehdizadeh et al., 2014; Sears et al., 2014). This has ramifications in clinical settings, as the greatest inaccuracies in self-assessment of competence are usually seen among the least proficient clinicians who rate themselves as the most confident (Gude et al., 2017). As observed in our results, research confirms disparities between clinician's self-assessment and their performance pertaining to the skills in question (Gude et al., 2017). This implications for midwifery practice are significant; midwives may believe they are enacting the consent process appropriately when they are in violation of the legal and professional requirements underpinning consent. Furthermore, their confidence means they are naïve to their shortfalls. Not only are the midwives who conveyed the most confidence potentially the least proficient in their skills to consent, but midwives may also lack the capacity and contexts within which to accurately reflect on their

The findings build on previous literature outlining the difficulties encountered in the consent process in both midwifery and obstetric practice (Nicholls et al., 2019; Kennedy et al., 2021, 2021). This study highlights the pressing need for the dissemination of national professional education and guidance tailored to midwifery practice, mirroring requests for specialist training seen in prior literature (Kennedy et al., 2021). Education should involve training in the intricacies of risk discourse (Newnham et al., 2015), the facilitation of informed decision-making and obtaining consent compliant with consent law, as well as how to accurately assess the materiality of risk to an individual woman and the biases and complexities this may entail. Alongside further education for midwives, opportunities for self-reflection should be provided, where examination of personal knowledge and practice

takes place (Plested and Kirkham, 2016), in attempt to combat individual knowledge and skills deficits.

Future work should attempt to bridge the gap between midwives' knowledge and their enactment of the consent process in clinical practice. Previous research has centred around the consent process from women's perspectives (Jou et al., 2015), or through observations of both midwives and obstetricians in clinical settings; (Kennedy et al., 2021; Nicholls et al., 2021) often in the context of obstetric-led environments. Further research ought to focus solely on understanding midwives' consenting practices, confirming the role they play in obtaining consent as the lead autonomous practitioners for women throughout pregnancy (Nursing and Midwifery Council, 2019). High quality direct observational studies are required to ascertain midwives' competence in obtaining consent and engaging in discussions of risk within the realm of midwifery practice. Further exploration of specific discussions of risk regularly facilitated by midwives within the scope of their practice may be beneficial to enhance understanding. Examples of this could include antenatal screening, place of birth and induction of labour.

Strength and limitations

To our knowledge, this is the first study where midwives have been asked about their knowledge and understanding of legal consent in the UK and is the first study to adopt an overtly legal framework within the realms of midwifery practice. This research provides an assessment of the baseline knowledge of legal consent amongst midwives working in the NHS, contributing to the wider literature on consent practices.

This study has several key strengths. Owing to the dissemination via social media, the survey was far-reaching on account of the snowball sampling employed, subsequently eliciting a high response rate (Baltar and Brunet, 2012). The study was additionally endorsed by the Royal College of Midwives and publicised on their website, with the potential to reach midwives nationwide, with all midwives across the UK being eligible to participate. The representation of participants across the demographic parameters of role, pay band and years qualified implies that the sample and therefore the findings, are representative of midwives with varying experience in a range of clinical practice settings. Furthermore, the anonymous nature of the survey enabled participants to provide honest answers, supporting the accuracy of the results. Given that the subject at hand is an important and fast-evolving professional issue, the anonymity enabled candid responses on this sensitive topic not previously researched amongst midwives.

It can be assumed that self-selection bias serves as a limitation in this study, influencing participant knowledge and self-assessments. If this is the case, it could potentially be assumed that the general population of midwives may have poorer knowledge of consent and lower self-estimations of competence. The issues of self-assessment bias and social desirability bias are also applicable. The survey development considered nuances of language with the aim of eliciting meaningful responses relevant to midwifery practice. Although there was thorough pre-piloting, it is inevitable that there will be individual differences in interpretation and quantification that may have impacted understanding and therefore the answers given.

Conclusion

This study examined midwives' knowledge of legal consent and midwives' understanding of how the consent process is enacted in midwifery practice, following the *Montgomery* ruling. Deficiencies in midwives' knowledge of legal consent were revealed and confusion concerning risk disclosure was evident. Despite this, participants reported confidence in their consenting practice on self-assessment. Our findings convey a discrepancy between midwives' actual knowledge of legal consent and their self-perceptions of their knowledge. The shortcomings uncovered in midwives' knowledge of legal consent are of grave concern to midwifery practice. This study highlights that

midwives urgently require further training to ensure that their consent practices are compliant with the law. Our findings necessitate the creation and dissemination of professional guidance and educational opportunities to better midwives' knowledge of legal consent and subsequent consenting practices, as dictated by *Montgomery*.

Ethical approval

Ethical approval was obtained from the UCL Research Ethics Committee (Project 19187/001).

Funding sources

Not applicable.

CRediT authorship contribution statement

Rachel Elf: Methodology, Formal analysis, Investigation, Writing – original draft, Visualization. Jacqueline Nicholls: Conceptualization, Methodology, Writing – review & editing, Supervision. Yanyan Ni: Formal analysis, Data curation. James Harris: Methodology, Supervision. Anne Lanceley: Conceptualization, Methodology, Writing – review & editing, Supervision, Project administration.

Declaration of Competing Interest

None declared.

Acknowledgments

The authors wish to thank the midwives who participated in the study for their time and contributions.

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