**Understanding research**

**1 Philosophy in midwifery**

**Rebecca Baker**

Midwife, and Associate Lecturer in Midwifery at University of Suffolk

**Sam Chenery-Morris**

Midwife, Nurse Adult and Child, and Associate Professor at University of Suffolk

*Understanding research* is a series of articles aimed at dispelling the myths around research theories and practices, and exploring just what is meant by the different terminologies encountered when reading and using research articles. Every alternate month we explore different aspects of research to make this knowledge accessible and relevant. It forms part of the *Evidence series*, and aims to help midwives understand, use and engage with research, and consider how research matters to their practice.

**The big words**

Research terminology can be off-putting to the practising midwife, but understanding research is a vital part of what we do. *The Code* (Nursing and Midwifery Council [NMC] 2018) requires us to practise using the best available evidence and always in the best interests of our clients, so this knowledge is very relevant. This article explains what these seemingly complicated words mean and how they apply to midwifery theory and practice knowledge, and introduces the principles of this research series.

**Philosophy**

While car-sharing on the way to work with a consultant midwife friend, we observed thick fog that obscured everything outside the margins of the road we were on. I was in a provocative mood, having attended an amazing conference the day before, where the philosophy of what it means to be a midwife was presented in the most entertaining way. This, and the start of a module for third-year student midwives in the next week, reignited my interest in philosophy. I therefore playfully questioned whether the world as we knew it, every day on our commute to work, still existed. Of course we *knew* it still existed: it was a normal Thursday and not an episode of some science fiction series. This caused us to think about how questioning in this way illuminates the nature of knowledge.

How do we ‘know’ things? Philosophical questions are supposed to make us think. If there is thick fog and we cannot see the world, how can we know it still exists? The reason we know the world still exists is due to epistemological knowledge. Epistemology is the study of the nature of knowledge. It’s more complex than this article can convey, and further references will be offered at the end, but for the time being, think about how you might prove the world still exists, on a foggy day, even if you can’t see it. What methods would you use to help prove this and other philosophical questions?

**Theories**

I frequently use theories – which are simply someone’s ideas – in class as a midwifery teacher, to explain such questions. One theory I particularly like helps to explain what exists in the human world and how we, as humans (and specifically nurses) acquire knowledge about it. I know nurses are not synonymous with midwives, but I do think there is some relevance of this nursing theory to midwifery knowledge. Carper’s (1978) *Fundamental patterns of knowing in nursing* suggests there is empirical, aesthetic, personal and ethicalal knowledge. Initially, the first two words might seem daunting, but you are probably aware of the discussion around whether midwifery (and nursing) are sciences or arts, or a combination of the two. If you are a student midwife, consider what your degree in midwifery is classified as: is it a Bachelor of Science (BSc) or Bachelor of Arts (BA)? Most midwifery degrees, to my knowledge, have adopted the term BSc, meaning many teach them more as sciences than arts. Yet there is a place for both forms of knowledge, and this is reflected in Carper’s theory in the terms ‘empirical’ and ‘aesthetic’ knowledge.

***Empirical knowledge***

Empirical knowledge is most often understood as scientific knowledge. What counts as scientific knowledge can and will be contested in this series (*See also* Chenery-Morris 2012). Let us think about the BSc and what types of scientific knowledge you need to know. I am sure if I asked you to list ‘the sciences’ you would agree that, of them, biology is necessary for midwifery. This is supported by the new draft standards of proficiency for midwives (NMC 2019), suggesting midwives need knowledge and understanding of anatomy, physiology, genetics, epigenetics and genomics in a range of topics, from adolescence to pregnancy, through birth to breastfeeding and beyond. However, the new and current standards (NMC 2009; 2019) also expect midwives to understand the social context of people’s lives. Another term for this might be sociology or psycho-sociological concepts. I think this is scientific knowledge, too, but some people would differentiate between scientific knowledge of the natural world and that of the social. They would say that they are not the same. This may need some explaining, so here goes.

I can remember an experiment from primary school that helped differentiate between natural and social world sciences. I planted a broad bean seed in soil in a see-through plastic cup, with the seed near the edge so that I could see it grow. We were encouraged to place the cup on the school windowsill, and it was watered daily. The amount of water, warmth from the sunlight and amount of sun were largely uniform for all our plants and almost all of them grew, as expected. When planted out in the school garden some weeks later, most of them produced baby broad beans. This experiment demonstrated that the natural world had an order: with the right conditions, a seed would grow into a healthy plant and reproduce.

The social world, however, is different from the natural world. I am sure you can understand why one could not experiment with humans in the same way as the seed. The ingredients seeds need to thrive – soil, light, warmth and water – are all measurable and predictable. With humans, we can all, I expect, give examples of siblings or twins who have grown up in similar environments (houses with the same parents; offered the same food, heat and light; attended the same school; perhaps even had the same teachers), yet the individuals have developed entirely differently. Humans do not conform to the rules of the natural world: the ingredients do not affect individuals in the same ways. The seeds did not have conscious thought and, as such, there are apparently no social relationships in the bean world. The human, social world is different.

One could, then, logically argue that, if humans behave differently from plants, scientists need to study these two worlds from different approaches. The methods will both be scientific, but they will require different methodologies. These will be explored further, but first we need to consider aesthetics, personal knowledge and ethics.

***Aesthetic knowledge***

Aesthetic knowledge is the *art* of midwifery (or nursing): how something is enacted. I am sure you can all think of examples where the *way* someone said something to you made you question *what* they said. For example, you may ask a colleague for help and, although they say that they don’t mind helping you, *how* they say it tells you something else. This is aesthetic knowledge. You know, from the look on their face, the feeling their reaction has on your senses and the way they answer, that they *do* mind helping. In midwifery, aesthetic knowledge is having an awareness of the whole situation. It is important to be sensitive to the way women react to what you say, and how you respond, to help put them at ease and inform them of their choices in a woman-centred approach; tailoring the care you offer to their unique circumstances. Aesthetic knowledge is related to personal knowledge and ethical knowledge.

***Personal knowledge***

If you know the woman you are caring for, perhaps through a continuity-of-care model or caseload, you may find it easier to offer her care that you know fits with her preferences and what she thinks is important. This is personal care, whereby you can offer choices and information relevant and particular to that person. It relates to knowing yourself, so you can ‘walk in their shoes’ or imagine what is important to them. You need empathy with the other person’s experience to be able to do this.

***Ethical knowledge***

Ethical knowledge is that which derives from moral questions. What is the right choice in this situation or what is morally acceptable here? These patterns of knowledge do not operate in isolation, but midwives (and nurses) use them to varying degrees in each situation or setting to inform the decisions and care offered to their client. I offer this long preamble about the use of theories and will return to these again in a theoretical/ conceptual frameworks article, but to understand how these elements fit together, they needed a brief introduction here.

**Ontology – the nature of being**

Before we explore the methodologies, let us consider further what it means to be either a bean or a human being. This is ontology, defined as the nature of being. As said above, we have no evidence yet that a bean can think. I presume it does not make meanings from its relationships with other beans; it may have grown in the same pod, but this is seemingly coincidental to their existence. A human, on the other hand, has the capacity to interpret meaning even from a silence or a sigh. With humans, it is not just *what* is said that conveys meaning, but *how* something is said that has a potential impact on that interpretation. It is this experience of being – or becoming – or categories of being, such as being a woman, a mother, a midwife, a student midwife, that is studied in ontological philosophy: what does it mean to be any of these things? Of course an individual may be more than one of these categories; they are not mutually exclusive. In fact, in many ways, we cannot separate out being a woman from our other roles, identities or existences. Note also that the experience of being changes over time, and is not a static thing. Being and becoming are processes that change according to experience. Being on a first placement feels very different from returning to the same placement in the final year. You might have a great relationship with a woman in your care and feel you are becoming a midwife. The very next day you do not connect with a different woman and this has a profound effect on your sense of self and being; this nature of being is both individual and contextual. It depends on so many factors.

Let me explain a little further: you attend a fabulous party, conference, clinical shift or teaching session (the event does not really matter); you are really excited by the event and tell your mother, friend, lover and/or lecturer about it. What you tell each person about the event is likely to differ slightly, depending on your relationship with them and your personal knowledge of their interests, and you are therefore more likely to share slightly different perspectives of the same event with different people. This leads to the ontological question: What can be said to exist? Does the experience you described to your mother exist more than the experience you shared with your friend, or do both interpretations of the event exist equally? Is there only one reality of the event or do multiple realities exist? The essence of the stories you tell others is that you enjoyed the event, but how and why you experienced enjoyment may have various meanings for those to whom you describe your experience.

**Methodologies. How we find things out**

The above discussions all lead to the ‘methodologies’. If the social world and natural world are experienced differently, there will be different ways – or methodologies – to study or research phenomena. Phenomenon is another complicated word with a simple meaning: it means a fact, situation, event or experience that can be observed and, potentially, studied. The way that the fact, situation or experience is studied or researched will depend on the philosophy, epistemology and ontology of the phenomenon, and how it is interpreted by the researcher. Is the phenomenon a fact that can be measured, or an experience that can be described and explored but not measured? The methodology is dependent upon whether one truth alone is possible or whether there are many realities that can co-exist. It relates to whether the natural or the social world is being studied: for example, whether a new antibiotic needs to be researched, or women’s experiences are the focus of the study.

**Why this matters**

It matters because all of us have a philosophy of how we practise, and a set of beliefs about how the world works. We strive to be the best that we can be, and research can and does help us to do this. It is our tool to improve practice. As midwives, we strive to see the world through the eyes of our clients, and also to be the eyes, for them, on the worlds of science, evidence and medicine. We are the portal and the gateway into research as applied to their experience of childbearing. So this kind of knowledge matters to us and to those we care for.

This series will explain more, in due course, about how research works. In the meantime, keep reading, thinking and applying your personal knowledge and experience to studies you read: decide whether they resonate with your experience or not. Below are some further resources that will be of use in anticipating and interpreting the articles in this series. **TPM**

**Further resources**

Chenery-Morris S (2012). ‘Empirics: one way of knowing’. Essentially MIDIRS, 3(6): 47-49.

<https://www.midirs.org/essentially-midirs-june-2012-volume-3-number-6/>

Guiver D (2004). ‘The epistemological foundation of midwife-led care that facilitates normal birth’. Evidence-Based Midwifery, 2(1): 28-34.

<https://www.researchgate.net/publication/288194005_The_epistemological_foundation_of_midwife-led_care_that_facilitates_normal_birth>

Hunter L (2008). ‘A hermeneutic phenomenological analysis of midwives’ ways of knowing during childbirth’. Midwifery 24(4): p 405-415. <https://www.sciencedirect.com/science/article/pii/S0266613807000794>

Walsh D (2013). ‘The ontology of childbirth’. British Journal of Midwifery, 14(10): 662.

<https://www.magonlinelibrary.com/doi/pdf/10.12968/bjom.2006.14.11.22254>

Walsh D and Evans K (2014). ‘Critical realism: an important theoretical perspective for midwifery research’. Midwifery, 30: e1-e6.

[https://www.midwiferyjournal.com/article/S0266-6138(13)00282-9/pdf](https://www.midwiferyjournal.com/article/S0266-6138%2813%2900282-9/pdf)

**References**

Carper B (1978). ‘Fundamental patterns of knowing in nursing’. Advances in Nursing Science, 1(1): 13-23.

Chenery-Morris S (2012). ‘Empirics: one way of knowing’. Essentially MIDIRS, 3(6): 47-49.

NMC (2009). Standards for pre-registration midwifery education, London: NMC.

NMC (2018). The Code. Professional standards of practice and behaviour for nurses, midwives and nursing associates, London: NMC.

NMC (2019). Future midwife: standards of proficiency for midwives (draft), London: NMC.