Phronesis and the Medical Community

Awarding Council	Arts and Humanities Research Council
Award Reference	AH/M006646/1
Location	Health Services Management Centre, University of Birmingham
Funding Start Date	18-05-2015
Funding End Date	17-05-2018

Phronesis in Medical Decision Making: Medical Leadership, Virtue Ethics and Practical Wisdom

Final Report - December 2018

Authors:

Dr Mervyn Conroy

Dr Deborah Biggerstaff

Lt Cdr Alan Brockie RN

Catherine Hale

Dr Richard Knox

Dr Aisha Malik

Dr Chris Turner

Catherine Weir

Abstract

Phronesis (practical wisdom) as a concept is known as the executive virtue – a crucial chair role type decision adjudication skill in medical practice, leadership and many other practice roles. Aristotle and MacIntyre, the two most quoted virtue ethicists, argued that developing *phronesis* as part of practical experience for an individual or peer practice group, can also be part of an educational programme. In fact MacIntyre suggests that we are living in a time after virtue (globally) and there is a need to bring virtuous practice (for all professions and governments) back from the abyss – an abyss that is evidenced by the number of recent and historic practice scandals in e.g. acute care, maternity care, social care, banking, cricket. Given such scandals seem to have rocked arguably trustworthy practices as well as many others a question arises: What are we missing in the education of the professionals involved? MacIntyre's call was clear; he said what was lacking across the board are *moral debating resources* in professional education that allow virtuous practices to be debated and enacted in their decision making. So how do we create a moral debating resource for medical leadership and clinical practice that allows the cultivation of the *phronesis* virtue in particular? The call from the medical ethics literature is to carry out empirical research into medical practice and ethical decision making. Until now empirical work with clinicians or other professions for that matter has been very limited in this area. This three year Arts and Humanities Research Council (AHRC) funded research project addresses this gap by asking the question 'What does *phronesis* mean to the medical community?' The research contribution includes a set of fifteen virtues including *phronesis* and a video series showing a Consultant and GP enacting the virtues gleaned from the participants' stories. The stories include what the participants consider to be both wise and unwise decisions and cover the full decision range for each virtue. So we argue that we have encapsulated the current practical wisdom of 131 participants from the medical community in our research findings. Thus we further argue this initial set of fifteen virtues offers a moral debating resource in the form of the video series and tutor notes for the professional education of doctors internationally and an approach that can also be used in other professions. This theoretical debating resource enables medical schools and CPD programmes to engage their participants in debate about ethical decision making and in a form that can be built on in the context of medical practice (and with other related professions for that matter e.g. nursing, social work and police) So this study is of international interest as it makes a contribution to global medical ethics and has the potential to support ethical decision making in all interrelated health care practices as well as practices outside the health care sector.

Contents   **Page Number**

List of Tables

Appendices

Number		Title
A)Communications	1	Phronesis Events and Publications Log
	2 a,b and c	Workshop 1
	3	Workshop 2
	4	Workshop 3
	5a	Birmingham South Central CCG AGM
	5b	Birmingham South Central CCG PPG Chairs
	6a	Banner 1
	6b	Banner 2
	6c	Banner 3
	7	Festival poster
	8	Focus Group Poster
	9	Abstract for Oxford Health Research Conference
	10	IME Poster Diagram
	11	BAM Workshop plan
	12	RCGP Annual Conference 2018 abstract
B)Consent Forms	1	MDT Observation Consent Form
	2	Participant Observations consent form
	3	Focus Group Consent Form
	4	Interviews - Consent Form
C)Participant Information Sheets	1	PIS - Focus Groups
	2	PIS MDT
	3	PIS - Observations
	4	PIS -Interviews
D)Project Team Organogram	1	Project Team Organogram
E)Research Documents	1a	2015 Ethical Approval Letter
	1b	2017 Ethical Approval Letter
	2	Certificate of Participation
	3	Interview Aide Memoire
F)Stilwell Information	1	Stilwell Student Notes
G)Virtue Ethics Framework	1	2nd Year Framework
	2	Final Year Framework
	3	Foundation Year Framework
	4	Experienced doctors Framework
H) Ethnographic Study	1	Ethnographic Study of a Medical School - findings
	2	Ethnographic Report
I) Engagement events	1	Detailed analysis
J) Kaldjian Analysis	1	Detailed analysis
K) Literature Search Strategy	1	Literature Search Strategy

These appendices can be found in zip files attached to the main document

Acknowledgments:

1.Introduction

'…wisdom is more precious than rubies…' (Proverbs 8:11)

'Knowledge can be communicated, but not wisdom. One can find it, live it, be fortified by it, do wonders through it, but one cannot communicate and teach it.' (Hesse 1951: 97)

'I can only answer the question 'What am I to do?' if I can answer the prior question 'Of what story or stories do I find myself a part?' (MacIntyre 2013: 250)

To date, many researchers within medicine have made the case for a reorientation towards *phronesis* (practical wisdom) in medical education, but little has been undertaken to explore what that might look like. Therefore the overall aim of this study is to explore the ethical dimension of good decision making in the context of medical leadership in order to improve patient care and experience. The quotation examples above position the challenge of this aim: wisdom is highly sought after because of its value; whether it can be taught is contested and stories are critical in the teaching process and deciding what action to take. Virtually all citizens of the world receive care from doctors and have an interest in being treated with dignity and receiving good care, which according to the GMC (2013) is inextricably linked with *phronesis* (practical wisdom) and professional values. This study explored what it means to doctors through their professional careers to cultivate the concept of *phronesis (*practical wisdom) in the midst of navigating the complex world of healthcare in an era of market dominance and user choice. We were interested to see how clinicians make context-dependent, localised and 'good' decisions for the benefit of patients and the wider community. Given recent and historic health and care scandals, a greater emphasis on (initial and continuing) education in appropriate ethics is required; and our study aimed to make a contribution to this. Our primary data has derived from capturing the moral experiences of medical practitioners and students in order to develop a sense of what informs doctors' decision making process. We have also explored the role that *phronesis* plays in this process, and in strengthening / sustaining trust between the medical community and wider health and social care community in which they practice by conducting a series of community focus groups and engagement events. The study includes real world stories of complex ethical decisions and the associated virtue continua to the existing scenarios and other educational resources already available via the GMC and other bodies.

The fourfold aims of the study were first to understand if the concept of *phronesis* (practical wisdom) was apparent and if so was it being transmitted, interpreted and enacted by doctors through medical education and into practice; second to develop a hybrid (social science and arts) methodology to reliably frame *phronesis* in the institutions that participate in the study and which may be used in the study of *phronesis* in other professions (e.g. teachers and lawyers); third to explore if *phronesis* has a role to play in strengthening and sustaining bonds between the medical community and wider community and finally based on the findings produce a moral debating resource that conveys the wisdom from our participants in a way that allows medical students and CPD participants to use it to debate what would be appropriate actions for the decisions they are faced with. It should be noted that *phronesis* for this study is in effect the overarching theoretical frame used to understand and analyse the data collected and was not used in a deductive way.

Little research has previously explored the ways in which the concept of *phronesis* is viewed or indeed cultivated within one professional community. There is an absence of research with medical professionals to explore if and to what extent they accumulate and enact the concept of phronesis within their daily practice. Questions have rarely been asked as to what extent professionals are equipped morally (or otherwise) to navigate a chaotic world of practice rife with competing demands and relationships.

Existing studies have tended to capture practical wisdom within one snapshot, within one organisation or by following one practitioner. In this study three communities of doctors over four time periods were interviewed: at the beginning of formal medical study; the end of formal study; as foundation year doctors; and established medical professionals with 5 or more years' qualified experience. This design offered an opportunity to see *phronesis* developing over time whilst enabling insights into the moral debating resources are accessed and the role of formal education in equipping practitioners for the messy realities of practice.

Using interviews, participant kept diaries and observations with 131 participants across three university medical schools (Birmingham, Nottingham and Warwick), this study explored the extent to which doctors, at different points in their careers, have access to or draw upon moral resources. We were interested to find out what it means to them to make decisions they judge as 'good' for patients; balancing care, compassion, quality, resources capacity, medical outcomes and the wider well-being of the community.

The participants were also involved in creatively shaping an original series of videos that connected to an existing virtual community of health and social care practitioners, patients and the public. The purpose was to engage them in providing an artistic interpretation through

which they see the issues of *phronesis* in their field of practice. The video series created from the findings offers a innovate new approach in professional medical education. It has already been shown to a broad audience of academics, practitioners, patients and policy makers. We have not produced a resource that is saying 'this is how it should be done' –instead our aim has been to convey the modern day wisdom from our participants in the career odyssey of our two characters. This debating resource can be used by medical schools and CPD providers to allow their students and qualified doctors to debate what they feel are the wise ethical actions for their particular contexts and patients. As such, this is not a set of guidelines but a moral debating resource for their professional education which is precisely what MacIntyre says is missing. We are now looking at other healthcare practices and the steps to produce moral debating resources for them to extend the teaching of ethics, public engagement and public trust.

This report begins with a literature review which shows that a considerable theoretical, psychological and philosophical scholarship has started to build around *phronesis* in medicine. However, much of this work has focused on understandings of *phronesis* that we feel perhaps miss the point of why *phronesis* is such an important concept. Thus given the emphasis in theoretical literature on the importance of *phronesis* to best practice, and having situated our own understanding of *phronesis* in the interpretive, reflexive and social realms of academic understanding, there was a need to examine *phronesis* as a developing process in the life of doctors.

Summary of Literature review

The literature review starts by outlining the theoretical work on phronesis with regards to phronesis and medicine, medical ethics, medical education and policy work. It then examines the recent empirical work on phronesis in medicine. Although a large corpus of literature exists in nursing which studies phronesis empirically, there is a dearth of such studies amongst doctors. Those that do study phronesis do so on a small number of cohorts. The section ends by outlining the gaps in the literature that our research set out to address.

Conclusions drawn from the empirical narrative review.

In summary, within the field of medical ethics and in healthcare ethics more generally, *'phronesis'* has become something of a buzzword; with less thought currently being given to how doctors may actually *acquire* the practical skills needed during their training. While a growing body of literature in medical ethics discusses the importance of *phronesis* from a theoretical point of view, very few focus on phronesis amongst doctors and that do either study a small cohort in a particular speciality or a subspecialty for instance Philip and Hall do

so on general practitioners (2013), Brummell et al included 12 emergency consultants in their study (2016) ,Jorden et al included 6colorectal oncologists (2004), Jones et al had 16 medical students as their participants (2017) and Punzi interviewed clinical psychology students (2015). There is one empirical study (Little *et al.*, 2011) which focused on *phronesis* in medical practice on 19 doctors in a medical practice There is , however a growing interest in *phronesis* in nursing (see table 2). In this chapter, we have uncovered the shortage of empirical studies of *phronesis* in medicine on a large cohort/broader scale and have also highlighted the great potential for narrative studies, and a more humanistic or arts-based presentation of findings to shed light on the many theoretical disputes regarding *phronesis* in medicine and how this concept might be better utilised to inform future health care delivery.

The final research highlights from our empirical, narrative review were considered to be the following:

- Although there is evidence that *phronesis* is frequently considered part of a central concept in medical ethics, our search found that it was rare to find papers which studied it from an empirical perspective on a broader scale.

- Much of the relative existing literature we uncovered tended to consider *phronesis* as offering a type of 'catch-all' term for anything that may not be fully understood about medical care and wise judgement.

- Within the literature in the field of nursing, we found evidence of a promising beginning for research in *phronesis.*

- Despite our careful and rigorous approach to searching the available literature, barely any empirical work could be found on the topic of or use of *phronesis* in medicine, although there are plenty of discussion papers on the subject area.

In conclusion, it became very clear that further , and stronger, empirical research on the subject area is needed if we are to increase our understanding of *phronesis* in medicine.

Summary of Methodology and Research Design

There are three main methodology sections. The first is an explanation of the methodology, the second details the research design with methods described in detail and the third explains the process of analysis used in this research.

The methodology developed for this project provides a social science and arts-based hybrid to present the issues of phronesis to medical professionals (or leadership disciplines in any context for that matter) to support better ethical decision-making. The full details of this

approach and contribution to the methodology literature is covered in Conroy et al (2017). The methodology is a significant departure from and extension from previous studies that have conveyed practical wisdom within one case, within one institution or with one research participant.

A narrative approach was chosen as the main methodology for understanding the virtues at play. This approach builds on a growing body of studies (Boje 2001; Czarniawska 1997; Shotter & Cunliffe 2002), all of which emphasise the process of intersubjective exchanges as the continuous construction of meaning in the organisation and for its staff. It also supports MacIntyre's (1981) argument that the best way to understand ethical decision making based on the virtues at play is through stories that involve the storyteller and that they are a part of in some way. For instance something they observe other medical professionals who are part of their practice doing or something they tell us about their own practice. The methodology used is applicable to other professional sectors and disciplines such as care, education, law and business and therefore the research promises much wider benefits. One reason why narratives are crucial to any methodology to study *phronesis* is the integral part they play in socially constructing a subjective reality (Czarniawska 1997) and contributing to the 'meaning pool' (Sherman & Webb 1988) of moral exemplars available (Zagzebski, 2013, 1). It is also clear that from a pedagogical perspective, storytelling has a critical role to play in the assimilation and processing of learning.

Methods used for data collection

We followed three communities of doctors over three time periods:

1. Beginning of formal medical study (2nd year) and end of formal medical study (5th/final year)
2. On placement at the end of formal study (Foundation year), this group was re-interviewed on progression to FY2 and
3. Established medical professionals with 5 years plus qualified experience.

This design (Conroy et al 2015) offered an opportunity to see phronesis developing over time through the participants' narratives whilst enabling insight into what it means to them to access moral resources and in terms of the role of formal education in equipping practitioners for the messy and subjective realities of clinical practice. By exploring what it means to doctors at different points in their careers to have access to, or draw upon moral resources, the study gathered narratives about what they considered were 'good' or 'bad'

decisions for the patient or patients at hand. We hoped to gain insights into what it means to them to balance care, compassion, quality, resources, capacity, medical outcomes and the wider well-being of the community in their decision making.

Primary data were collected using semi-structured interviews. The interviews were lightly structured at first, and started by explaining that we were interested in exploring the participant's experience of involvement in making ethical / wise decisions, whether their own or others they work with, and whether they perceived them to be good / wise or not so good / unwise decisions. Observations of experienced doctors were undertaken during the fieldwork.

Observing participants along with their interviews and e-portfolios / CPD diaries provided context to the participants' development of phronesis (if it occured), which was important when developing the video series. Some participants kept diaries / e-portfolios. These are self-reflexive and were used to provide context and reflections for decisions the diarist made, or decisions they see others making in practice.

Methods used for Analysis

Social science-based analysis was used as a way to reveal themes and extract stories and a serial for the arts-based analysis. The thematic (social science) analysis element used a Framework Approach (Ritchie and Lewis et al, 2010) to yield themes or categories of what doctors find important, typologies of people and events and medical workers' behaviour. Virtue Continuum coding was conducted in NVivo 11Plus. The ultimate goal was to develop a consolidated set of virtues contained in the data that could be used as the basis of the video series and the theoretical analysis. The nature of phronesis was examined through two theoretical lenses - MacIntyre's (1981) virtue ethics and Kaldjian's (2010) medical phronesis. Virtue ethics provides a virtues-goods-practices-institution schema (Moore and Beadle 2006) which comprises a number of theoretical concepts relating to phronesis.

Findings and Analysis

A large number of fragmented virtues were detected in the narrations of the participants. After multiple iterations these were consolidated into fifteen. The 15 virtues are situated along a continuum: pole 1 to pole 2 via a mean. The polar extremes represent an excess or deficiency of each particular virtue respectively. The virtue continuum mapping is useful in understanding where each virtue lies on the continuum, and was used to create a framework of virtues for each cohort. This helps in analysing whether or not a given virtue is present at a specific stage of the doctor's professional career. It also aids exploring which, if any, virtues develop as doctors progress through their professional career and gain experience. It was also useful to see whether some virtues were specific to a particular cohort. There is significant horizontal

and vertical fragmentation in the way virtues are narrated. However, tabulating these in a virtues / cohort table reveals that there are some common virtues that can develop into important theoretical concepts. The observation data also shows many of the same virtues; while the focus group discussions involving patients and the general public not only generate many of the same virtues spoken of as enablers (and / or disablers) to making wise decisions, they also emphasise the importance of informed and involved patients and administrative issues as a hindrance to wise decisions.

In addition, the following central themes run through the data:

1. Fragmentation in virtues;
2. Apprenticeship is missing so lack of cultivation of *phronesis* and perceived lack of support for FY1&2;
3. Challenge of defining the *telos* or purpose: whether better to focus on the individual patient's interests or the wider social context / well-being
4. Litigation protection can distort decision making and related workload, leaving little time to reflect on decisions;
5. Resources; financial, time and staff constraints; and
6. Mixed ideas about how to cultivate *phronesis*.

An important analytical tool used to explore the practice of phronesis in the participants' narratives was Kaldjian's 'five core elements' approach (Kaldjian, 2010):

- Pursuit of worthwhile ends (goals) derived from a concept of human flourishing;
- Accurate perception of concrete circumstances detailing the specific practical situation at hand;
- Commitment to moral principles and virtues that provide a general normative framework;
- Deliberation that integrates ends (goals), concrete circumstances, and moral principles and virtues; and
- Motivation to act in order to achieve the conclusions reached by such deliberation.

Although the data substantiates this framework, the role of motivation is different – it is more central, and again this is work in progress., which was highlighted at the last workshop and is detailed here in Section 4 Findings and Analysis.

Video production

A series of workshops were convened to map out the story boards and characters for the video serial and to link to characters within the wider Stilwell virtual community (http://www.stilwelleducation.com). Once the story boards were agreed, the creative director arranged for a script to be written for each video episode based on our findings (15 virtue continuums and the narratives from our participants relating to each virtue). The coding reports generated from NVivo for each cohort provided the narratives for the scripts. The scripts were reviewed by cohort representatives, the research team and medical educators from each of the partnering institutions. Once the scripts were agreed the film production team, who were well versed in Stilwell productions, co-produced the videos using professional actors and advice from cohort representatives and the researchers

This video series which animates the findings, can be viewed by other researchers and used in educational settings. It was produced to contribute to moving the debate along and provide impact on medical education as rapidly as possible. The series demonstrates a range of practices (identified through the research) and shows maturing medical practitioners gaining a sense of what it means to make good decisions despite the complexity of their roles and the clinical and ethical pressures they experience.

Discussion

This section discusses the findings in light of the literature on virtue ethics and phronesis. It argues that decision-making in complex clinical situations may not be adequately achieved when only rules and guidelines are applied; for they tend to oversimplify the complexity of the clinical situation. Decision making in complex ethical situations is contextually virtuous (Little et al, 2011) and judgement is needed to discern how to act in particular circumstances. Even though the doctor may know which virtues are needed for a particular situation, knowing where to act on each virtue continuum requires an intellectual virtue to discern the right /wise decision / action. This intellectual virtue is phronesis.

Phronesis acts on two levels. Initially, it provides the practical know-how to turn the required virtue into successful action and it then enables the (virtuous) doctor to weigh up the importance of different virtues and competing goals in any given moral situation.

Virtue ethics complements clinical knowledge to allow the right decision to be determined at the right time and for the right reasons; as either on its own would be deficient. Gaining experiential moral knowledge as doctors progress in their practice, potentially through a supported apprenticeship, is important. Exploring the development of virtues as individual

character traits to attain practice excellence substantiates MacIntyre's (1981) argument that virtues are constructed as a communal practice.

Summary of Outcomes

Specific value to other AHRC programmes is expected through the hybrid social science and arts-based methodology (Conroy et al 2018). The project has delivered a return on the AHRC's investment by creating a resource with the potential to impact on the medical and professional education of doctors as a community and to thereby build stronger links between the medical community and the public and rebuild public confidence in the medical profession. The project has generated a wide variety of outcomes from academic publications to community engagement and has begun to generate interest from those responsible for future medical educational policy. The ranges of outcomes have been summarised as:

- Artistic and Creative Products;
- Influence on Policy, Practice, Patients & the Public;
- Engagement activities;
- Collaborations and Partnerships and governance arrangements;
- Research databases, tools and models;
- Wider applicability;
- Further Funding opportunities; and
- Publications.

Summary of Impact

Doctors must demonstrate high level skills in managing complex clinical and ethical decisions, but little is known about **how** they develop these wise decision-making skills. We found that individual doctors and medical students used a combination of a describable process which has been evident from our Kaldjian analysis and a deeper, more nuanced set of 15 virtues or ethical decision components to arrive at wise decisions; including balancing the need to negotiate and have honest / difficult conversations using trust, emotional intelligence, resilience, and reflection. What we found was that *phronesis*, the process of making practically wise decisions, is a skill many experienced doctors demonstrated. We have unpacked the process of *phronesis* to enable some practical steps to be set out which would enable the nurturing of this skill at all stages of medical education, benefiting both future doctors and patients. This has implications for medical education at both undergraduate and postgraduate level, and also for policy makers.

The main output of the project has been the development of an effective educational tool (a Stilwell video series) based on our set of 15 identified virtues. The Stilwell video series and its

accompanying tutor notes adds a validated arts-based moral debating tool, depicting real-life clinical situations, to the existing suite of ethics education and development resources.

Immediate beneficiaries of the project include the general public, medical students and doctors, study participants, allied health care professionals, the NHS, medical schools and Health Education England.

Conclusion

Practical wisdom – or *phronesis* – can help leaders and individual decision makers in medical and other professional contexts make more ethical decisions in at least three ways:

1. An understanding that good and wise decision making for people who consider themselves ethical leaders goes beyond following a set of guidelines or rules, or working out the consequences of their actions, but also requires the ability to discern the relevant virtues with their colleagues.

2. Even when those virtues are discerned (e.g. courage, justice, prudence, etc.), knowing where to act on each virtue continuum (vice to vice via a mean) requires the development of the *phronesis* that can be regarded as the adjudicating or executive virtue.

3. *Phronesis* needs to be cultivated over time to offer a way to balance competing demands, relationships, multiple conflicts and a range of functional goals to find an ethical decision point that will bring good outcomes for their discipline, the professionals who are part of their profession and the people they provide with their services.

The methodology developed is a hybrid original that combines narrative-based interview approaches with an arts and humanities analysis to produce an educational moral debating resource, in the form of a video-based odyssey, plus other accompanying educational resources. This methodology can be used for any discipline inside or outside the healthcare sector to produce an educational resource for that discipline. The end result of this is the video series (6 episodes) which has implications for ethics teaching in the medical curriculum.

2. Literature review: a narrative synthesis investigating the main explicit and implicit theories and debates on *phronesis* and the medical community

We examined the terminology used to describe this topic across a range of bibliographic databases. Subject searches were carried out using both natural language and thesaurus

searching (where available). We also identified and searched by key authors and carried out citation searches to track papers which have cited relevant references. We used an empirical , narrative approach to synthesise evidence of where phronesis can inform medicine and health care.

Leading on from the philosophical discussion regarding how society in general and the medical profession in particular may, or may not, engage more fully with *phronesis* (see Kristjánsson 2015; see also Paton et al , 2107), we turn to consider one of the first requirements needed for this project: a review of the literature in the field. This was undertaken in order that the research team could gain an in-depth understanding of some of the key theoretical and current debates in the field of *phronesis*, as applied to medical education. Accordingly, an in-depth review of the research literature in this field relevant to the topic of *phronesis* was undertaken. We determined to carefully explore the main theoretical and current debates around *phronesis* in the medical profession. Although there is much discussion about the role of *phronesis* or practical wisdom in healthcare, and how it is considered to inform clinicians' duty of care, the exact nature of how *phronesis* supports this process is less clear. We found this somewhat surprising. With the focus on the field of medicine and healthcare, we were interested in learning how we might examine the ethical aspects of 'wise' or good decision-making in healthcare and medical leadership.

Our main research question, therefore, was an exploration of what current research and philosophy might tell us about when, and how, *phronesis* might be incorporated into healthcare delivery if it was to have a more active role in influencing this area. For example, could *phronesis* offer something that might further inform and support development of a larger role for compassion - for instance, to improve patient care and experience (Morris et al, 2016)

Some of the philosophical context of *phronesis* is considered in relation to healthcare before moving on to discuss some of our findings. This is presented as a narrative synthesis of current research literature on the topic of *phronesis*.

Introduction

Doctors' *system of ethics or values* is a perennial concern in health research. (Agledahl *et al.*, 2010; Hurst *et al.*, 2005) What doctors think about right and wrong often drive how they perceive and make clinical decisions (even though this may not be clear on the surface) Because understanding someone's ethical orientation is such a deep and personal matter, requiring careful interpretation in context, studies of doctors (and other health professionals')

ethics or values are frequently carried out from a qualitative perspective. However, as Jordens and Little have noted its workings remain 'an elusive object of study' (Jordens and Little 2004).

What is involved in doctors' ethical decision-making? Three sorts of theories are commonly advanced. According to 'consequentialist' theories, making ethical decisions in medicine is a matter of securing the best possible outcome for a patient (or a group of patients) by weighing up the good and bad consequences that result from any decision, intervention, treatment, policy, etc. According to 'deontological' theories, there are certain rules or principles of medical ethics that the doctor must follow and ethical decision-making in medicine comes down to working out what the principles of medical ethics require the doctor to do. By contrast to these first two theories, 'virtue' theories of medical ethics hold that it is not rules or outcomes that matter so much as that the doctors themselves must show good character or agree the 'virtues' appropriate to medical practice.. On the virtue theory, we may say, the doctor's moral personality or ability to engage in collective moral debate leading to agreeing within their professional community how to practice is what drives them to make ethical decisions in a certain way.

A number of important virtues of the good doctor have been studied in the literature, for example: empathy (Batt-Rawden *et al.*, 2013), care (Leffel *et al.*, 2014, Marcum, 2012), compassion (Haq, 2014); truthfulness (Jackson, 2001) and justice (Carel and Kidd, 2014). This is not to suggest that these *specific* virtues are the most important virtues in medical practice. According to MacIntyre (1981), what exactly the virtues of good character are (in medicine and in other professions) is worked out within professional communities and are refined over time by engaging in moral debate, both within that professional community, and with related professional communities working towards a common purpose. MacIntyre (1981) suggests that each practice and context is unique and therefore only the practitioners themselves can work out what the virtues are for their context and practice based community (Conroy *et al.*, 2012)

However, amongst virtue ethicists who write about medicine, one virtue 'occupies a special place'; this is the virtue of 'practical wisdom'. (Pellegrino and Thomasma, 1993: 83)[1] 'Practical wisdom' (Greek: '*phronesis*') is a central concept in all virtue ethics since Aristotle. For Aristotle, one's moral virtues, like, for instance, one's honesty or courage motivates one to act in a certain way; the honest person, for instance, is motivated to act honestly and the courageous person is motivated to act courageously. However, the motivation to act in a virtuous way is not enough to ensure that one actually does the best thing one can do in an ethically difficult situation – next to good motivation, one also needs the practical intelligence or the practical moral know how to do that thing that is best, all things considered. This practical moral know how, Aristotle calls '*phronesis*'. *Phronesis* is not knowledge of ethical theory, but is the good practical sense that a person needs to know what to do in difficult ethical situations. While it is most often translated as 'practical wisdom' in English, it is often also translated as 'judgement' or 'prudence Virtues secure the rightness in our choice of the end, while phronesis (prudence) "ensures the rightness of the means" to achieve that end (Aristotle,1996: 158).

Starting with the work of Pellegrino and Thomasma (1993), a number of philosophers of medicine have built their conceptions of medical ethics on the concept of *phronesis*. According to Pellegrino and Thomasma, the good doctor is the doctor who can make practically wise judgements in the practice of medicine and, over the last two decades, major book-length studies of virtue in medicine – and the important role that *phronesis* plays – have been offered by, for instance, Montgomery (2006), Kaldjian (2014), and Toon (2014). While a considerable scholarship has started to build around *phronesis* in medicine, this work has been almost entirely theoretical or philosophical. Little effort has been made to study *phronesis* empirically in a medical context[2], or to ask what exactly *phronesis* means to medical practitioners and what it means for them to develop or what it means for *phronesis* to influence or impact on medical practice.

In order to help bring order to thinking about *phronesis* in medicine, we conducted an extensive review of the empirical literature on *phronesis* in the broad field of health care (not only in medicine) (>700 papers scrutinised). This paper reports on our review and synthesis of the literature and offers a suggestion for future empirical research on this important and

---

[1] Indeed, MacIntyre himself also gives *phronesis* a special place in virtue ethics. See MacIntyre, 1967/1998: 48 – 9.

[2] For notable exceptions, see Jordens and Little (2004), Little *et al.* (2011), Conroy *et al.* (2012) and the studies below.

fruitful concept. We begin (in section 2) by outlining why the concept of *phronesis* is important to medicine through a summary of the theoretical work that has been done previously. We then (section 3) describe the methods used to conduct our literature review and summarise what empirical literature we found, before commenting on, and critiquing, the existing work in the literature and proposing a synthesis view(section 4). Finally, we summarise the main gaps in the literature and suggest a future focus for empirical research on *phronesis* in medicine (section 5).

2.2 Phronesis in medical ethics

As we have seen, in Aristotle's system of ethics, simply having moral virtues like honesty, kindness, justice, courage, etc. will not in itself ensure that someone always 'does the right thing'. According to Aristotle, the moral virtues ensure that we aim at the correct goal in moral action, but it still requires a form of practical moral know-how to bring those goals about. This is *phronesis. Phronesis* fulfils two cardinal roles in Aristotle's virtue ethics. Firstly, it completes the moral virtues by providing the practical know-how needed to turn virtue into successful action. Secondly, it enables the moral actor to weigh up the importance of the competing goals that they themselves (or others) may have in any moral situation. (Kristjansson, 2015). MacIntyre (1981) develops Aristotle's thesis on the formation of virtues for any practice such as medicine to include a number of other concepts (Moore and Beadle 2006). These are:

- Virtues: disposition to act in a certain way that enables us to achieve internal goods (includes practical wisdom)
- Internal goods: the excellence of products/services, the perfection and rounding of the individual in the process and good outcomes for the practice beneficiaries, in this case, patients
- External goods: only contingently attached to a practice (e.g. money, status and power) and if given priority over external goods then practice corruption will occur (e.g. Mid Staffordshire Hospital Reviews (Francis, 2013))
- Practice: any coherent and complex form of social activity e.g. medicine, nursing, social work etc.
- Institutions: primarily concerned with producing and distributing external goods
- Narrative quest: search for our purpose (telos) toward individual wellbeing (Eudaimonia)
- Communal narrative quest: arising from a meshing and refinement of practice virtues with other related and integrative practices along with a shared telos of collective wellbeing

A number of medical ethicists appeal to Aristotle's thinking to show that *all* medical judgement (not only judgements about ethical cases) actually have an ethical dimension and that doctors' decision-making quite routinely involves ethical decision-making. Pellegrino and Thomasma hold that many doctors see the making of medical decisions in the best interests of the patient mainly as a scientific matter – that is using scientific evidence to diagnose what a patient's medical problem is and to find out what treatment is most like to 'cure' this problem. By contrast, Pellegrino and Thomasma hold, the doctor must seek what is good for the individual patient and, because different patients are different, what is actually the best treatment for an individual patient is a matter that is not settled by science alone. In all of the clinical decisions they make, doctors must integrate both scientific and moral reasoning and judgement. (Pellegrino and Thomasma, 1993: 90) In the same vein, Montgomery (Montgomery, K. 2006) argues that the traditional way of studying medical decision-making has been to see clinical judgement as a rational process that can be captured in decision rules. By contrast, Montgomery holds that clinical judgement is:

> '…neither a science nor a technical skill (although it puts both to use) but the ability to work out how general rules—scientific principles, clinical guidelines—apply to one particular patient…' (Montgomery, K 2006 p5)

Kaldjian holds that the best model for general clinical judgement is not scientific judgement, but Aristotle's model of *phronesis* as the integration of scientific, instrumental and ethical knowledge in practice. (Kaldjian, L.C. 2010 & 2014) According to Kaldjian, any medical consultation can throw up challenges regarding scientific knowledge, patient preferences and values, the doctor's own moral commitments and society's expectations. Because these challenges all need to be met in one decision that strikes the right balance between them, Kaldjian holds that *all* clinical decision-making calls for the kind of wise practical judgement that Aristotle called '*phronesis*'. (Kaldjian, 2010: 560 – 1, Toon, P 2014) largely agrees, but, in addition, stresses the more intuitive and emotional, rather than rational, character of *phronesis*. Like Montgomery, Toon stresses that this

> '…doesn't mean the virtuous person doesn't think about right and wrong; *phronesis*, practical wisdom is one of the cardinal virtues. But virtue ethics recognises that we are not just thinking machines, weighing up consequences or deciding what duty requires, but people with emotions that colour our experiences and motivate our actions…' (2014: 3)

In their book-length studies of medical virtue ethics, Pellegrino and Thomasma (1993), Montgomery (2006), Kaldjian (2014) and Toon (2014) all give a central role to *phronesis*. Other authors, however, are more cautious, and thus a critical scholarship is beginning to build regarding *phronesis* in medicine. Braude (2012) holds that Aristotle's virtue of *nous* (or 'intuition') plays a more important role in clinical judgement than *phronesis* while Marcum (2012) prioritises the virtue of care. Wareing (2000) and Hoffman (2002) hold that the practice of medicine is better viewed as a form of *techne* (technical knowledge or skill, in Aristotle), rather than *phronesis*, although Kinghorn (2010) disagrees. These arguments relate intimately to debates about values and virtues. Values being about actions or decisions that are of value to an individual (e.g. a patient) or a group of individuals (e.g. those working for a single institution such as a hospital) and virtues being about actions or decisions that are good for society as a whole (*polis)* what was the Athenian city state (Aristotle 1985) *Phronesis* is a virtue and therefore in this context is about practical wise actions or decisions that contribute to the health and well-being of all in society (MacIntyre 1981). The challenge therefore is to understand what *phronesis* currently means to communities of doctors and whether it can be harnessed in a way that can have a wider impact on society via medical education or other means.

It is not the purpose of this paper to summarise the theoretical disputes regarding *phronesis* in medical ethics; Kristjansson (2015) already performs that task admirably. Rather, we argue for the importance of studying *phronesis* in medicine *from an empirical point of view*. Elsewhere (Kotzee, Paton and Conroy, (2017) forthcoming), argue that, in order to understand how *phronesis* shapes good medical practice, empirical studies of the acquisition and use of *phronesis* in medical communities need to be undertaken. In medical ethics today, there is a distinct drive to theorising that which is empirically informed (Christen *et al.*, 2014). In fact, amongst the authors listed above, Montgomery (2006) in particular stresses the importance of real cases as communicated through stories or narratives to understanding all the virtues at play for any one particular group of doctors. Because virtue ethics insists that all virtue consists in the doctor's doing the right thing in a particular situation, it is all but essential to specify the facts of the real context in which someone acts in order to explain how or why a particular action is (or is not) virtuous. Moreover, if MacIntyre (1981) is right that the virtues of any particular professional practice is largely determined by the community of practitioners in that practice, the best way to find out what the virtues associated with a particular practice is, must be to ask those practitioners themselves what they regard as virtuous practice and what not. The quality of the existing theoretical work on *phronesis* notwithstanding, understanding

practical wisdom in medicine calls for empirical investigation in addition to arm-chair theorising.

Thus, as set out in the discussion above, it is considered that *phronesis* has received considerable attention in debates around the virtues of professional practice. However, up to now, we found that much less attention has been paid to *phronesis* as an *applied* concept for the delivery of the practice (i.e. the praxis) of medicine. While we found that much is available about the notion of *phronesis* from a theoretical perspective, the topic appeared to have been much less frequently examined from an empirical perspective. In order to address this apparent gap in the current knowledge base, the main aim of the literature review was therefore to focus on a systematic, narrative, literature review of the main subject databases. The idea was to explore how the concept of *phronesis* may, or may not, be currently being used to inform ethical judgement in medicine and medical education.

2.3 Method

Having reached the consensus that a critical literature review was needed to help provide a thorough and up-to-date understanding of *phronesis* in medicine, the next step was to decide on an appropriate methodological approach. The research team needed to examine how the concept might be more successfully mapped on to, or incorporated, within current healthcare delivery. Therefore a rigorous, and systematic search of the main electronic literature databases was necessary. This work was undertaken by members of the team (AP, DB, BK, MC) in conjunction with consulting specialist subject librarians.

First, the researchers conducted a series of careful scoping subject searches across the main electronic databases (see Table 1 below). To support this strategy, as per established evidence-based research practice (Greenhalgh 2010), we also included additional 'hand-searching' across some of the main identified clinical and academic journals,; where necessary. This gave the researchers opportunity to recover any additional papers from specialist journals, should any be missing from the retrieved searches across the electronic databases.

The outline research question that we wanted to answer for the literature review was:

What empirical, qualitative research on phronesis has been done in the past?

And, following this, a secondary research question was formulated:

How have these studies illuminated the role of phronesis in healthcare practice?

Based on these two questions, a comprehensive literature search was carried out by the Health Services Management Centre library, at the University of Birmingham. The databases Medline, HMIC, Embase, Social Policy and Practice, Social Science Citation Index, ASSIA and Scopus were searched for the following terms (both on their own and combined) as set out below.

DATABASES SEARCHED	Medline; HMIC; Social Policy and Practice; Social Science Citation Index (SSCI); ASSIA; Scopus. A later follow-up search was conducted in PsychInfo.
SEARCH TERMS USED	*Phronesis*; practical wisdom; virtues; medical ethics; ethics, medical; philosophy; medical; codes of ethics; ethics, research; knowledge; qualitative; empirical.

Table 1 Search strategy

2.4 . First stage of the literature search.

The first stage of our database search, using the terms identified above (Table 1) identified a total of 794 journal articles (see Figure 1). During the preliminary scoping stage, abstracts of the 794 papers were examined by the authors, cross-referenced and discussed. After carefully examining the abstracts, debate between reviewers and further scrutiny, these were then sifted and reduced to 178 possible articles. From this group, 43 articles were identified as the most relevant for the project; since these remaining papers were considered to satisfy the criteria of reporting empirical (not merely theoretical) research on *phronesis* that had been undertaken in a healthcare setting. All the remaining 43 articles were then critically appraised and second-read by the authors. This stage led to a final number of 17 studies being identified as specifically relevant to applying *phronesis* in the healthcare setting. Following an additional, third, reading the research team then met again; and during careful discussion decided that a further four studies did not warrant inclusion. This was because either they did not focus on a healthcare context (one study) or did not focus specifically on *phronesis*, but on related concepts in ethics or moral development and had mentioned *phronesis* only in passing (three studies). See Appendix K.

Thus, from a series of sifting sessions and close reading to screen the abstracts, the relevant literature from this first sift was identified. These papers were then double-

Page 24 of 180

reviewed independently by the team to obtain a core group of 14 papers which were found to focus specifically on the topic of *phronesis* in medicine. An additional paper was found to have been published later, after the original search period, thus bringing the final number of empirical papers to 15.

The review team originally worked independently, then met regularly to report on and discuss their findings, and debate the conclusions drawn by the group. Any discrepancies or differences of opinion were debated, and the empirical findings discussed until all of the team members were satisfied with the final selection of papers: all of which reported on those aspects of *phronesis* relevant to healthcare delivery.

2.5 Main empirical findings from conducting the literature review.

The literature review undertaken found evidence of four main, or over-arching, themes. These were identified as:

1) The importance of a narrative based research approach in healthcare.
2) The professional development of *phronesis.*
3) The need for *phronesis* in order to provide good healthcare delivery.
4) *Phronesis* being viewed as a particularly important component in the practice of sound medical practice and good decision-making.

Rather to our surprise, on carefully examining the final selected group of papers, we were somewhat disappointed to discover that empirical work on *phronesis* in medicine was found to be sadly lacking; despite considerable rhetoric surrounding the topic. On the other hand, the use of narrative was found to be highly relevant in nursing studies research which examined *phronesis*. The use and development of *phronesis* in the field of nursing was, by contrast, thought to be important for practical nursing practice; and this attribute was often advanced by being encouraged to learn from colleagues, i.e. the acquiring of practical skills by the handing of knowledge from one person to another. All the papers we reviewed considered that *phronesis* was a necessary component for healthcare delivery. This knowledge was considered a core element in everyday practice and decision-making.

From our careful and thorough review, we came to the conclusion that while *phronesis* is debated in the theoretical work, there remains considerable evidence that a gap is still encountered in current practice. We found that there were many papers which suggest that developing the concept of practical wisdom, or *phronesis*, is necessary and indeed a highly relevant skill for doctors and clinicians to learn how to acquire. While most existing empirical work does reside in the field of nursing, we argue it is now necessary to examine *phronesis* more thoroughly in doctors using in-depth research, and particularly with doctors at different stages of career, as proposed by MacIntyre; with his view that the acquisition of good habits and knowledge is needed in order to live a necessary, or virtuous life.

Thus, this review of current empirical literature on *phronesis* provides an overview, from which we can conclude that, up to now, far too little attention has been given to the actual role for *phronesis* in medical practice. A more rigorous and systematic approach to our understanding of what *phronesis* can offer medicine was found to be lacking. Whilst it is clear that some research has been carried out, very little could be found in the way of empirical studies that could be used to help explain the possible role for *phronesis* in the medical community. This led the research team to develop further questions, and we now turn to discuss these.

2.6 Questions about *phronesis* in medicine.

A number of questions about *phronesis* in medical practice readily suggest themselves to the qualitative health researcher. For example, what does *phronetic* decision-making mean to practitioners of medicine? As we discovered, one of the main disputes in the theoretical literature on the topic is over whether *phronesis* is a virtue that needs to be brought to bear in *all* clinical decision-making; or does it only come into play when there are particular ethical issues at play (i.e. the general versus the specific)?

For example, we considered the question, what do these types of situations appear to mean to the medical practitioners themselves? When they reflect on difficult or challenging decisions made during the course of their medical careers, we wanted to learn more about the extent to which they felt they needed to exercise wise judgement to make such decisions? Moreover, did they experience those difficult decisions as a

form of rational or scientific theorising, or *techne* as Waring (2000) proposes. Or did it appear to them at the time more as a form of experience-based balancing as, for instance, Montgomery (2006) suggests might be the case. Another question we considered was whether *phronesis* is something that healthcare professionals and doctors feel can be grasped and understood in words or conversation, or how otherwise might the concept be communicated? We also wondered if it can only be grasped by the individual in a moment of insight, or does it also appear upon later reflection? Indeed, we also were interested to learn if *phronesis* can be taught, or can it only be absorbed or otherwise developed through practical experience?

Following on from the exploration of theoretical work related to *phronesis* in medicine, the research team began to encounter empirical studies of decision-making in health care that appealed to the capacity for practically wise judgement. This raised the question of what empirical work had been undertaken on *phronesis* in the broad field of healthcare previously, and what those earlier studies showed. To discover this, our review therefore aimed to synthesise the evidence obtained from the literature we had retrieved by adopting a methodological approach (Pope et al., 2007). This was done to help show how the concept of *phronesis* has been used in the past, to aid our understanding of medical ethical decision-making, and then bring this forward to see how this approach might be applied in modern healthcare practice today; drawing on MacIntyre's approach, among others. The literature review therefore set out to self-consciously be as comprehensive in finding contributions as possible, and to be rigorous in reviewing and synthesising the evidence obtained. In the next section, we outline in more detail the methods we used to research and comment on the existing empirical work in the area.

2.7 Consideration of Methodological approach

In health care, the 'gold standard' in Evidence-Based Medicine (EBM) is generally considered to be the evidence obtained from the systematic review, which generally consists of reviewing the findings from randomised controlled trials (RCT) (Greenhalgh, 2010; Howick, 2013). This style of review organises the conclusions of various studies, although more commonly RCTs, on the same topic; evaluates the strength of the available evidence using standardised appraisal tools such as CASP checklists (or similar) to critically appraise the evidence found (Critical Appraisal Skills

Programme). This method helps the researchers to arrive at an overall conclusion regarding what the main, generally quantitative, empirical results are to be reported.

At the start of our review examining the current literature on *phronesis* in healthcare, we considered whether or not it would be feasible to conduct this type of systematic review on the topic. However, on examining the existing body of research, it was clear that current empirical literature on *phronesis* in healthcare is very small; and many of the studies that have been conducted are predominantly qualitative. There was also the issue that many of the research studies used different methods and different reporting of their findings, to such an extent that the results could not be easily combined or merged. More recently however, there has been increasing recognition of the value of synthesising qualitative findings (Biggerstaff, 2012: 182) with the development of newer methodologies for doing this; such as with the Cochrane Qualitative Research Methods Group (Noyes, et al., 2009). The research team members therefore decided to conduct a critical review that was systematic, and also rigorous in the approach we adopted. This is in keeping with some of the more recent work that has been developed in rigorous methods of reviewing literature for fields of study outside scientific and clinical research (McDougall, 2014, 2015), such as informing policy (Gough et al., 2013).

In particular, McDougall's (2015) 'critical interpretive literature review' approach was used as a guide for our review. This approach outlines a six-step process that asks for a specific research question that may be 'answered' by the review, through which the careful generation of theory and argument about the existing literature, both generally as well as more specific findings and arguments, are obtained (McDougall, 2015: 527).

By adopting this approach, the research team finally arrived at a final list of 15 studies that were considered, after careful inspection and close reading, to contain a significant amount of information relating to either *phronesis* or virtuous ethical practice in healthcare delivery. These included those papers that:

(i)   examined to a significant degree *phronesis* as a character trait;
(ii)   in either a medical, nursing, or associated health context; and

(iii)   used empirical methods to try to understand something about *phronesis* in this
           context.

The results of the review of these final 15 studies are set out in the table below (Table 2):

PAPER	PARTICIPANTS	METHODS	BRIEF SUMMARY OF CONCLUSIONS/ RESEARCH OR PHILOSOPHICAL ARGUMENT
Brummell, S., Seymour, J., and Higinbottom, G. (2016) Cardiopulmonary resuscitation decisions in the emergency department: An ethnography of tacit knowledge in practice. *Social Science & Medicine,* 156: 47 - 54	N = 37 across two sites: 13 nurses; 12 doctors; 2 paramedical staff at site one.) Plus 6 nurses and 4 doctors at site two.) Purposive sample based on roles with 11 resuscitation decisions. Two emergency departments North of England (1 suburban, other large metropolitan city)	Ethnographic study over two year period. Involved participant observation of resuscitation attempts; in-depth interviews with staff who had taken part in these attempts. Detailed case studies, reflection, and field notes used for comparative analysis.	Authors found that ED staff across both sites used experience and developed tacit knowledge to construct a typology of categories of cardiac arrest. Tacit knowledge is described as 'hidden and acquired expertise that staff may not even recognise', i.e. that knowledge becomes 'taken for granted'. Authors call such tacit knowledge '*phronesis'* and 'cumulative wisdom'. Authors suggest this knowledge develops due to repeated exposure to dealing with uncertainty in human everyday life.
Cathcart, E.B. and Greenspan, M. (2013). The role of practical wisdom in	91 nurse managers (but only one	Practice articulation – nurse managers wrote and read	Reflection and narrative are an essential part of how practical wisdom is developed in nursing practice.

nurse manager practice: why experience matters. *Journal of nursing management*, 21(7), pp. 964-970.	narrative discussed)	out a narrative of their lived experience in their role.	
Danbjorg, B.D. and Birkelund R. (2011). The practical skills of newly qualified nurses. *Nurses Education Today*, 31, pp. 168-172.	4 nurses	Participant observation and qualitative interviews.	Authors found that nurses have difficulty developing necessary practical & moral skills due to the decrease in practical training. They argue that nurses become nurses by practicing nursing. *Phronesis* is an important part of the character of a nurse, so they need time and space to develop it. *Phronesis* should be developed as it is an important part of good nursing.
Eriksen, K.A., Dahl, H., Karlsson, B. and Arman, M. (2014). Strengthening practical wisdom: mental health workers' learning and development. *Nursing ethics*, 21(6), pp. 707-719.	8 mental health workers	Multi-stage focus groups, phenomenologic al hermeneutical analysis.	Nursing considers practical wisdom as an important part of fulfilling the role of a good nurse. Reflection is an important part of that development, though authors suggest not enough time is given to do this. How *phronesis* is developed is closely linked to the culture it is developed in as well, suggesting *phronesis* is a flexible concept.
Farrington, N., Mandy, F., Richardson, A., and Sartain, S. (2015) Exploring the role of practical nursing wisdom in the care of patients with urinary problems at	12 registered nurses	Guided interviews.	Learning from colleagues is an important part of *phronetic* development. Refers to *phronesis* in medicine as clinical wisdom. *Phronesis* is a combination of 'experiential knowledge and clinical experience'.

the end of life: a qualitative interview study. *Journal of Clinical Nursing.* 24, pp. 2745-2756.			
Jones, E.K., Kittendorf, A.L., Kumagai, A.O. (2017) Creative art and medical student development: a qualitative study. *Medical Education*, 51: 174 – 183.	16 medical students	Art work and use of interviews. Narrative-based undergraduate programme.	Art used to encourage creativity in medical student development. Students worked collaboratively in teams to produce art work based on their conversations with people suffering with chronic illness, and their families. Creating art helped students develop a sense of personal growth and development. Art found to help students reflect on past life experiences. Art aided self-discovery and creativity, skills in collaborative working. Students reflect on the human condition: provides good example of *phronesis* in practice.
Jordens, C. and Little, M. (2004) ' In this scenario, I do this, for these reasons': narrative, genre and ethical reasoning in the clinic, *Social Science and Medicine* 58 (9) 1635 – 45.	10 health professionals in a colorectal cancer clinic (6 doctors, 1 nurses, 1 social worker, 1 clinical psychologist, 1 stomal therapist)	Narrative interviews.	Policy regarding how to treat patients is the 'unfolding of practical wisdom in speech'. By adopting certain working policies, clinicians enact their personal identity.
Little, M., Gordon, J., Markham, P., Rychetnik, L. and Kerridge, I. (2011). Virtuous acts as	19 medical practitioners at Sydney Medical School	Semi-structured narrative interviews.	"Virtue talk" is one way *phronesis* is developed: people discuss memorable virtuous people or incidents. Admiration of virtues is also important for *phronesis.*

			Virtue ethics and *phronesis* appeal to doctors as part of good practice.
practical medical ethics: an empirical study. *Journal of Evaluation in Clinical Practice*, 17, pp. 948-953.			
Marlow, E., Nosek, M., Lee, Y., Young, E., Bautista, A., and Thorbjørn Hansen, F. (2014). Nurses, formerly incarcerated adults and Gadamer: *Phronesis* and the Socratic Dialect. *Nursing Philosophy*, 36: 19-28.	30 nurses and 3 prisoners	A 4 hour class and 2 focus groups.	*Phronesis* guides action, but is not a set of rules. *Phronesis* is not a technical skill that can be taught and mastered but is learned over time and builds through experience.
Myrick, F., Yonge, O., and Billay, D. (2010). Preceptorship and practical wisdom: A process of engaging in authentic nursing practice. *Nurse Education in Practice*, 10, pp. 82-87.	41 nurses and preceptors	Semi-structured interviews.	Practical wisdom is integral and intrinsic to good nursing practice. Preceptorship and reflection are ways nurses develop practical wisdom. Identifies that little research has been done to explore the process of *phronetic* development.
Niemenen, A.L., Mannevaara, B., and Fagerstrom, L. (2011). Advanced practice nurses' scope of practice: a	26 clinical nurse specialists, 8 clinical nurse specialist students	Focus groups.	Examines nursing practice through Aristotle's three-dimensional view of knowledge: episteme, techne and *phronesis*. Suggest nursing competence relies on *phronesis*.

qualitative study of advanced clinical competencies. *Scandinavian Journal of Caring Sciences*, 25, pp. 661-670.			
Phillips, C. and Hall, S. (2013). Nurses and the wise organisation: *techne* and *phronesis* in Australian general practice. *Nursing inquiry*, 20(2), pp. 121-132.	36 practice nurses, 24 GP's and 22 practice managers	Mixed methods approach.	*Phronesis* is an important part of nursing practice and the wise organisation. *Phronesis* is a necessary part of good practice, and virtues should be recognised in nurses.
Punzi, E. (2015). 'These are the things I may never learn from books'. Clinical psychology students' experiences of their development of practical wisdom. *Reflective Practice*, 16(3), pp. 347-360.	7 students	Interviews	Also refers to clinical wisdom. Practical wisdom requires reflection, and developing practical wisdom requires practical learning experiences, which need to start during education and training.
Rief, J.J., Mitchell, G.R, Zickmund, S.L., Bhargava, T.D., Bryce, C.L., Fischer, G.S., Hess, R., Kolb, N.R., Simkin-Silverman, L.R. and McTigue,	50 primary care patients	Interviews.	Authors want to use *phronesis* to develop a theoretical model for patient 'self-management'. Communication is a key element of *phronesis* and *phronetic* development. They argue that *phronesis* does not cause action, but instead connects experience with skills and decision-making as experience is a form of knowledge.

K.M. (2012). Promoting patient *phronesis*: communication patterns in an online lifestyle program coordinated with primary care. *Health Education & Behavior,* 40(3), pp. 311-322.			
Soerensen, D., Frederiksen, K., Thorbjorn, G. and Lomborg, K. (2013). Practical wisdom: A qualitative study of the care and management of non-invasive ventilation patients by experienced intensive care nurses. *Intensive and Critical Care Nursing*, 29, pp. 174-181.	6 nurses	Interviews.	Clinical wisdom is highly valued. Clinical wisdom may be a form of practical wisdom which is highly valued in nursing practice. Authors make the case for *phronesis* having a role in professional development.

Table 2: Results of final review of the literature

2.8 Implications of findings from the literature review.

By employing a holistic approach to reviewing both the qualitative and quantitative modes of enquiry in the final, agreed group of identified papers, the research study team were able to identify four main broad themes which emerged from the critical narrative review. While a variety of perspectives were expressed in the studies reviewed, these 15 articles contained four main, or overarching, themes which were identified in the existing research. These are:

1) The importance of narrative.

2) Developing *phronesis*.

3) The importance of *phronesis* for developing / maintaining good practice in healthcare.

4) *Phronesis* is viewed as being a particularly important component for good medical practice.

We now examine each theme it turn, and consider how *phronesis* has been explored empirically in these studies. The review then turns to consider some of the different areas of research that examine how *phronesis* is developed, and suggest why that development matters to healthcare delivery.

Theme 1: The importance of narrative.

From close examination of the synthesis of the papers we reviewed, the conclusion we arrived at is that empirical work on *phronesis* in clinical medicine alone is woefully underrepresented. In the last five years, the majority of this research has focused on exploring the use of *phronesis* within the context of nursing. Of the 15 articles we identified, nine focused on nurses, nursing practice and nursing studies (Danbjorg et al., 2011; Cathcart et al., 2013; Eriksen et al., 2014; Farrington et al., 2015; Marlow et al., 2014; Myrick et al., 2010; Niemenen et al., 2011; Phillips and Hall, 2013; Sorenson et al., 2013). The participants of the remaining five were split between clinical psychology students (Punzi et al., 2015), patients (Rief et al., 2012) and doctors and other health-professionals (Jordens and Little, 2004; Brummell et al., 2016). Only one study dealt with doctors alone (Little et al., 2011), while a later, additional, paper (Jones, et al., 2017) focused on medical students' development using arts-based practice.

All 15 studies took a qualitative approach, and the majority prioritised narrative as the primary source of obtaining their data. These studies were often found to have employed overlapping methods, usually combining interviews, focus groups, observations and ethnography in a pluralistic way (Frost, 2011). These types of approaches were used to examine the extent to which *phronesis* may be found to be present in participants' clinical practice, in a meta-narrative review approach (Tricco et al., 2016). From these studies it is clear that examining *phronesis* in the healthcare context through a qualitative lens allows for a typology of data to be collected that can help build an accurate picture of the role *phronesis* plays in medicine. We move on now to consider the second main theme, regarding the development of *phronesis* in the clinical setting.

Theme 2: Developing phronesis.

As we have already identified, it is unsurprising that nine of the 15 empirical studies we found in our review were from nursing studies. From our perspective, it appears that many of the studies carried out in nursing are often the 'canary in the mine' for the work needed within medicine. Nursing studies were often found to be leading the way with empirical, qualitative studies of the areas in question. Empirical work on *phronesis* was not found to be any different. The studies the research team reviewed confirmed that *phronesis* was considered to be both present in nursing practice, and thought to be particularly important to their profession or professional identity. In the studies in question, the nurse-authors report on the concept of developing *phronesis* (often called 'practical wisdom' in these studies) through their practice and practical training. Nurses attributed their development of practical wisdom to learning from colleagues in practice (Farrington et al, 2015: 2751), in addition to their own personal experiences of being a nurse (Sorensen et al., 2013: 177). One study, for example, found that nurses valued practical skills over more theoretical knowledge, emphasising the need to develop the skills of nursing through nursing; with one nurse stating 'we become nurses by practicing nursing' (Danborjg and Birkelund, 2011: 170).

If the practical is considered to hold greater value than the theoretical, this may explain why the concept of practical wisdom is so valued in nursing culture. This may be because it represents the combination of formal and informal knowledge that nurses report using use to make decisions in the clinical context, something that in a few studies was referred to specifically as 'clinical wisdom' (see e.g. Farrington et al, 2015: 2746). This is not to say that the nurses in these studies felt that education played little part in the development of *phronesis*, but instead that 'the practical wisdom of experienced nurses […] is an important component of clinical development, and is also important for educating junior nurses' (Sorensen et al., 2013: 179).

Practical wisdom was thus considered to be as much a part of the process of learning to be a nurse as the clinical or theoretical education that nurses receive. Given its importance, it was interesting to note that one study found that the Danish nurses they interviewed felt they could no longer adequately develop the necessary practical and moral skills they felt were necessary; due to a decrease in their practical training, which limited the time and space allowed to develop *phronesis* during their practice (Danbjorg and Birkelund, 2011: 168-170). Many studies concluded that further research was necessary if they were to understand the role practical wisdom plays in professional development for nurses, because practical wisdom was such an important aspect of their profession.

However, less evident from many of the nursing studies examining *phronesis* in practice was the reported developing theme as to why certain settings might be viewed as encouraging the development of *phronesis*, and why others did not. In addition, the terms *phronesis*, practical wisdom, and clinical wisdom were often used as synonyms with little explanation as to what they meant, and why the conflation was appropriate. In some cases it was as if the terms "*phronesis*" or "practical wisdom" were being used as a catch-all term with a variety of unspecified components (Myrick et al., 2010: 83).

There appeared to be much less known about how healthcare practitioners view the terms themselves, and if they identify specifically with the development of *phronesis*, or whether this is a term that is being imposed on a practice that is, in fact, understood by practitioners through different terminology. The use of these terms at times was almost a 'soft touch', as the terminology itself often remained undefined and undeveloped. Despite these unknown aspects of *phronesis*, what remains clear from this scoping review of the literature is that however practical wisdom may be viewed, it is considered very important to the clinical development and day-to-day activities of nurses in actual practice, as well as to clinical or medical practice more generally. Having discussed the second theme of how *phronesis* may be developed in practice, we now turn to consider the third theme - the importance of *phronesis* to good healthcare practice.

Theme 3: The importance of phronesis to good healthcare practice.

Our careful review of the relevant literature, across disciplines, provided a clear sense of how the authors argued for the necessity of *phronesis* in healthcare practice. The important role that *phronesis* plays in practice can be seen in the different definitions that these studies gave to *phronesis*. One study defined *phronesis* as 'knowledge oriented to every day practices and decision-making', arguing that this knowledge is 'gained through practice and tied to activities and reasoning skills that allow individuals to craft good and healthy lives' (Rief et al., 2012: 311). Another defined it as a combination of 'experiential knowledge and clinical experience' (Farrington et al., 2015: 2746). Clinical staff, including specialist nurses in emergency departments in Brummell and colleagues' research, reported that the tacit knowledge and sense of clinical wisdom was only acquired by experience that they could utilise when they needed help to "navigate rapid decisions" (Brummell et al., 2016). The ability to cultivate and use *phronesis* in practice was considered by all the studies reviewed to be an essential part of being a healthcare practitioner. In particular, practical wisdom is valued in medicine for the contribution it makes to the 'professional artistry' of medicine (Eriksen et al, 2014: 708), as it promotes 'reflective ability and moral reasoning'; which are 'two qualities central to the principles of professionalism' (Chalmers et al, 2011: e281).

In these empirical studies, *phronesis* is understood as a way of thinking that enables healthcare professionals to engage in the flexibility of thought and critical reflection that is often needed in professional practice (Eriksen et al., 2014: 709). The concept of *phronesis* as applied in practice recognises healthcare practitioners' 'everyday cognitions and judgments without referring to theory or an application of general rules' (Eriksen et al., 2014: 708), thus acknowledging the contextual quality of patient health care, as residing in society's demands.

Several of the nursing studies reported instances of *phronesis* in practice, arguing for the important role *phronesis* plays in 'good' nursing. Nursing staff often have to rely on using some of the concepts contained in *phronesis* when a solid evidence base is absent, or when they are faced with decisions that have 'previously unexamined assumptions' that the context is forcing them to examine 'on the fly', so to speak (Eriksen et al,, 2014: 708; Farrington et al., 2015: 2753). These types of decisions could be viewed as the product of *phronesis* because they were not solely intuition based, but instead incorporated what evidence-based knowledge the nurses could use in that particular situation, at that particular time (Farrington et al., 2015: 2753).

For example, nurses working with Chronic Obstructive Pulmonary Disease (COPD) patients who needed rapid assistance with non-invasive ventilation reported that they would judge the mask size needed for their patient based not on the time-consuming measurement calculations that were then often found to be wrong, but on their previous experiences with patients with similar facial features (Sorensen et al., 2013). These types of decisions were considered to be examples of *phronesis* 'in-action', as the decisions were made with both evidence-based knowledge (that COPD patients needing non-invasive ventilation need to be given their oxygen quickly, or their health would decline rapidly due to oxygen starvation), and practical knowledge (that the lengthy measuring techniques were not, after their effort, very accurate).

This tacit experiential knowledge was also reported in Brummell et al.'s ethnographic study of two emergency department sites (Brummell et al., 2016). Resuscitation attempts by clinical staff (which included both nurses and doctors), were observed in both sites. 'Thick' descriptions from participants identified that they developed decision categories about when, and for how long, they might attempt resuscitation. Both nursing and medical staff reported that they drew on prior experience to help them quickly identify the actions needed in these different categories, in addition to any theoretical knowledge. Thus, with time, these clinicians were able to develop a deeper and stronger sense of the concept of *phronesis.* Having looked

at these three themes, we turn now to consider theme four: *Phronesis* being viewed as a particularly important component in good medical practice.

Theme 4: Phronesis viewed as being a particularly important component for good medical practice.

All of the papers selected for the final literature review emphasised the importance of the concept of *phronesis* for clinical work. This opinion is contained across the papers, regardless of clinical areas, thus highlighting the significance of *phronesis* within clinical work. In particular, authors of the papers finally selected noted how this type of knowledge had generally been accumulated over time, as they and their participants had learned from their clinical exposure placement; both during training and beyond, once they were trained health professionals. As Elizabeth Punzi (2015) observes, in her in-depth phenomenological study carried out with clinical psychologists, much of the clinical work that was undertaken for the study was found to rely on the use of both practical wisdom in conjunction with theoretical knowledge. Her research therefore examined psychology students' experience of developing practical wisdom. As the title of this article states, much of the necessary knowledge may be 'things I may never learn from books' (Punzi, 2015).

Frederisken and colleagues also consider that *phronesis* is linked to clinical experience, arguing the case that this may be a form of practical wisdom that is highly valued in nursing practice, and also for professional development; both in nursing and also more widely. These authors vigorously support the role *phronesis* plays in professional development, since each nurse who was studied during their nursing care, where they used non-invasive ventilation to nurse acute respiratory patients, demonstrated how they stayed particularly alert to their patient's needs from moment to moment. The authors conclude that some of these complexities exhibited by the experienced nurses in this study conceptualised their abilities to separate the more problematic situations into three inter-related elements, which enhanced nursing care due to the application of elements of *phronesis*. The authors also considered that the knowledge, reasoning and actions used by the experienced nurses may help educate more junior nurses to develop their skills, thus optimising the role *phronesis* has to play in continuing professional development and clinical education (Frederiksen, 2013).

2.9 Discussion.

While the research reported in these studies may have lacked an in-depth explanation of how the particular context studied had specifically promoted the development of *phronesis*, many could list general characteristics that were necessary for the use of *phronesis*. A likely explanation for this phenomenon is that, universally, these studies identified practical

knowledge and experience as an integral part of both developing and using *phronesis* in healthcare and medicine. Other studies focused on specific attributes that their research had found.

For example, Phillips and Hall's (2013: 122-9) paper observed that a 'wise organisation' was needed in order to develop an environment that would encourage *phronesis* in the workplace, where the 'wise organisation' was described as 'one which collects, transfers and integrates individuals' wisdom and uses its own institutional and social processes (e.g. structure, culture, routines) to store and the enact this wisdom.'

In fact, much of the empirically-focused literature we reviewed situated both the development and enactment of *phronesis* firmly within the social context; arguing that *phronesis* needs to be viewed as socially, culturally and institutionally bound since it requires 'attention to values, beliefs, attitudes, assumptions, expectations, feelings and knowledge' of the practitioner (Eriksen et al., 2014: 708; See also Murrell, 2014: 219).

Perhaps because of the emphasis of the social nature of *phronesis*, some studies have argued that *phronesis* contains a communicative element that is considered as needing to be present for *phronesis* to be developed; both through communication *per se*, and then also enacted through communication (Rief et al., 2012: 319; see also Myrick et al., 2010; Punzi et al., 2015). Reflection was considered to be a necessary attribute for *phronesis*, and a theme which many of the authors reported in their studies. These authors argue that, without reflection, *phronesis* can be viewed as offering a difficult concept to develop if health professionals are to flourish and thrive in such an environment (Cathcart et al., 2013; Myrick et al., 2010; Punzi et al., 2015).

Finally, and perhaps as a culmination of the above characteristics, the development of *phronesis* in these papers was often found to occur not just through practice; but through practice in the presence, and with the guidance of exemplars and role models such as senior colleagues who were considered to be virtuous, and also by good medical practitioners (Little et al., 2011; Myrick et al., 2010). This was found to be especially true in the nursing studies where training through preceptorship was considered to offer a significant step in developing *phronesis* in nursing (Myrick et al., 2010).

All the studies reviewed argued the position that cultivating *phronesis*, as well as cultivating an environment where *phronesis* can be developed, was a necessary component of good healthcare. However, one aspect that was often left out of the studies was how to go about the preparation of such an environment so as to ensure the development of *phronesis* in

healthcare practitioners. In one study, Eriksen and his colleagues observe that nurses in particular are currently not given enough time for the reflection necessary for *phronesis* to develop. However, this is only a suggestion within this paper, and was not the main focus of the study (Eriksen et al., 2014: 709).

Another paper argues for greater support to be given to the concept of 'wise organisations', but again more research is needed if recommendations such as these are to be developed and introduced for wider practice (Phillips and Hall, 2013: 122). These studies also identify *phronesis* as being present in practice, however very little of the discussion section is devoted to consider why *phronesis* was present in those different settings to begin with, and what it could offer to these different environments. As a result, the literature does not appear, in its existing scope, to shed much light on how we might begin to foster an environment that promotes *phronesis* in those settings that currently do not. Such points remain unexamined aspects of *phronesis* in medical practice, despite the overwhelming support in the literature for the importance of *phronesis* in good daily medical practice.

What was of interest was that while *phronesis* may often be defined as a central concept in medical ethics and clinical education, much of the literature reviewed was found to contain not very much in the way of empirical findings. We were interested, therefore, in learning more about how *phronesis* was conducted in medicine. Despite initially reviewing 794 papers, which after several screening stages we narrowed down to a core number of 43, and then filtered down to our final selection of 15 papers, we concluded that very little empirical work on *phronesis* in medicine is currently to be found. However, a growing body on *phronesis* does exist within the nursing literature, since this is often linked to the parallel field of compassion.

In the existing research, we did find evidence of *phronesis* being used more as a 'catch-all' term, rather than as a careful consideration of the concepts needed to make good and wise medical decisions. The conclusions we drew are that more high quality, well-designed empirical research on the topic area is needed, and that this current perceived lack of research in this area remains a challenge when reviewing the literature on *phronesis*.

2.10 Directions for Future Research.

We suggest therefore that, while *phronesis* receives a lot of attention in theoretical work in medical ethics, there remains a distinct gap between theory and practice. Many authors suggest that it is particularly important to good medical practice that doctors develop *phronesis*, however, we could only find one study (Little *et al.*, 2011) that attempted to

understand *phronesis* empirically in medicine,[3] although we did find one other study which examined how such knowledge may not currently be 'explicitly articulated' in medicine (Brummell et al., 2016). The empirical work that does exist on *phronesis* in healthcare is mainly drawn from nursing, and while the growth of this scholarship is, of course, entirely commendable; most of this research stops either at:

(1) Research which highlights the general importance of *phronesis* to healthcare ethics and practice, or:

(2) Is written by authors who notice the importance of developing *phronesis* through practice.

To date, therefore, the majority of existing research contains very little specific advice on how to achieve *phronetic* development through practice.

Additionally, the term '*phronesis*' itself deserves more respect amongst the healthcare and academic communities. Contemporary empirical work on *phronesis* has tended to use it at times as a catch-all technical term for wise decision-making and moral reasoning. As a result, very little empirical work has used the conclusions from the data to reflect back on how *phronesis* is understood in practice, and what that means for the different theoretical conceptions of *phronesis*. Work is needed that not only examines *phronesis* in practice, but also how that empirical work can be used to reflect on the efficacy and accuracy of theoretical accounts of *phronesis* in medicine.

In order to further examine and understand the extent to which *phronesis* is present in medical practice, it is necessary to begin filling these gaps in knowledge. In particular, exploring the extent to which doctors develop *phronesis* in their clinical practice is necessary to better understand the role *phronesis* plays in medicine more generally. However it is not enough to ask only if *phronesis* is developed and used, but we must also to begin to examine what it means to medical professionals to develop as well. Previous studies have been situated in the realist, rational, structural, scientific domains (Burril and Morgan, 1987); but not in the social construction domain, which has been demonstrated to offer a clearer understanding of the ethical perspective in healthcare (Conroy 2010). Narratives form part of the 'meaning pool 'in many organisations, along with rhetoric, discourses, documents etc. The meaning pool forms an inter-subjective reality for the participants. It is necessary to tap into that meaning

---

[3] This is not only the situation for the virtue of *phronesis*. Despite the importance of virtue ethics in general to medical ethics, there are very few empirical studies of virtue or character in medicine. For a review, see Kotzee and Ignatowicz, 2016.

pool to gain an understanding of what it means to doctors to make ethically good decisions, potentially using practical wisdom to do so.

To obtain these answers, we argue that it is necessary to conduct in-depth narrative research with doctors at different stages of their careers about their clinical decision-making, and explore whether something like *phronesis* constructs an important part in their clinical-decision making. Areas that we decided needed to be investigated included what doctors' wise clinical judgement means, and whether it includes an ability like *phronesis* (even if they do not call it that, specifically). It needs to be evidenced in a format that helps define what it means to them, for this ability to be manifested in their decision-making, and what it also means to them to interact with other related and integrative practices to develop the knowledge and skill of wise decision-making. Lastly, we need to ask how *phronesis* is currently socially constructed, and can its development be better supported in future through educational and training interventions?

In terms of how these findings are presented, we argue for a greater involvement of other discipline; such as a humanities or arts-based approach. We envisaged this being an '*artistic skyline'* that could be introduced, and where participants will be involved in creatively shaping an original 'soap opera'-style series of video clips. These can then be used to connect to an existing virtual community of health and social care practitioners, patients and the public[4]. The purpose is to engage our participants, across the medical community, in providing an artistic interpretation through which they see the issues of *phronesis* in their practice environment.

The 'odyssey' format, and the way it links to the community, can then offer further opportunities for engagement and educational debate with a broad audience of academics, health and education practitioners, patients, policymakers and other professionals with an interest in the field. The video series, plus other social media elements, offers an innovative, edgy resource to complement the many text based deontological recommendations that have emanated from scandal-driven enquiry reports, such as recent events in the NHS, and from social science-based studies to date.

---

[4] The original 'soap opera' style video series and other social will integrate with an existing virtual community of health and social care practitioners, patients and the public based on a fictional town (Stilwell) in England.

4. Methodology and Research Design

The section begins with an explanation of the methodology (Conroy et al 2018), followed by details of the research design with methods described in detail and ends by explaining the analysis process used.

3.1 Methodology

The literature review above found that phronesis has not been studied across the medical community. Conroy et al's (2012) study has included the medical community in the health and social care community they studied, but research that just focusses on medical consultants and GPs as participants to explore what phronesis means to them in terms of their enactment or observed enactment and they way they would see it best cultivated has not been done to date. The key questions set based on this gap in the literature were:

- What does phronesis (practical wisdom) mean to practitioners?
- To what extent is phronesis cultivated, maintained and moulded over the educational and practice life of doctors in the UK?
- To what extent can phronesis be promoted through educational and practice interventions?

What our literature review found is that *phronetic* analysis of stories about decision making from a whole practice community are missing. The methodology developed for this project provides a social science and arts-based hybrid way of presenting the meaning of phronesis to medical professionals in current practice. The ultimate aim is to an support the cultivation of an optimal ethical decision-making process for medical students or experienced medics on a Continuous Professional Development Programme (CPD programme)).

The aim of the approach is to explore the notion of phronesis developing with one practice community and what educational input prepared them for clinical practice (Conroy et al, 2015). The objective is to study doctors along their career path and understand their claimed access to moral debating resources. To do this the research collected narratives on what 'good' decision making for their patients means to them. Just how they account for balancing the many demands relating to the patients as well as the the wider well-being of the community was the primary focus. The combined artistic component is that we gathered a collection of the participants' narratives and asked a film director and scriptwriter to produce a series of fim episodes that connects to an existing virtual community package of health and social care practitioners, patients and the public. That fictional virtual community is known as Stilwell (city

suburb) with all the health and social care issues associated with a typical town in the UK. The methodology will have wider relevance to other public services e.g. social care and teaching as well as the private sector.

Since the aim is understanding meaning to the participants and then converting that understanding in a way that conveys the virtue ethics of the practice being explored a narrative approach was the starting point. As argued in Conroy et al (2015) the approach has three compatible (in terms of ontology) roots. First we draw on the humanities and virtue ethics neo-Aristotelian philosophy from MacIntyre (1981) who argues that humans are story-telling animals. and our narratives in the stories offer meaning (Bruner 1990). Second is Flyvbjerg et al.'s (2012) social science rooted ethnography of phronesis which will support the context and settings of the narratives for a film production.. Finally from the arts we draw on Schugurensky's (2005) participatory film production methods.

Selecting narrative as the starting point to understanding the ethics of a practice is based on the seminal argument made by MacIntyre (1981) who suggests that narrative operates as a basic human instinct for passing on the ethics of any practice to others in the same or related practices. He suggests humans are storytelling animals and narrative is the 'basic and essential genre for the characterisation of human action' (1981: 187) He further argues that human action is only understandable when the action is related to the intentions (purpose) and contexts (settings) and the ordering of those three creates narrative.   Many researchers have built on this premise for their use of narrative (e.g. Czarniawska 1997; Boje 2001; Shotter & Cunliffe 2002) –The emphasis being on the process of dialogue as a continuous construction of meaning for practice participants in organisations. Czarniawska (1997) argues that narratives play a fundamental part in socially constructing subjective reality which we argue is crucial to any methodology designed to study phronesis. Access to this meaning pool(Sherman & Webb 1988) moral guidance whether this be virtuous or non-virtuous examples of ethical decision making (Zagzebski, 2013 &Schultz and Flasher 2011) is what was sought.

The social construction of reality that stories develop means as Czarniawska argues there are 'consequences of storytelling - for those who tell the stories, and for those who study them' (2004: 41). Somers and Gibson argue   'people are guided to act in certain ways, and not others, on the basis of the projections, expectations, and memories derived from a multiplicity

but ultimately linked repertoire of available social, public and cultural narratives' (1994, 38-39). Reiessman argues 'storytellers interpret the world and the experience in it: they sometimes create moral tales - how the world should be' (Reiessmann, 2005 :1) Boje is clear that storytelling occurs mainly in conversations and therefore 'listeners' are necessary (Boje,1991: 107). Boje supports MacIntyre's argument about humans being storytelling animals and suggests they are the 'preferred sense-making currency' and help us to avoid 'repeating historically bad choices' and furthering 'the repetition of past successes' (Boje, 1991:106). Given the argument that storytelling is a key influencer of decision-making, then we argue that narratives feature as fundamental part of studying phronesis.

In the next section we will outline how studying storytelling empirically can help us better understand the development of phronesis in doctors, and the role it plays in ethical decision-making.

  Interest in studying ethical issues empirically has been growing and is sometimes referred to as 'empirical ethics' (Haimes, 2002; Hope, 1999; FØRDE, 2012; Kon, 2009, 2009 (a)). However, very few studies have been conducted using doctors as participants (Jordens and Little, 2004; Phillips and Hall, 2013).

 From an empirical perspective Conroy et al (2012) used MacIntyre's (1981) virtue ethics to analyse the stories from health and social care communities to construct virtue continuums. The construction showed where on the continuums each story could be positioned (at the polar ends or the mean)- hence Conroy et al (2012) offered a sense of where the concept of *phronesis* featured in the stories What they found at their feedback workshop is that using this presentation of 'virtue continuums' helped the practitioners reflect and reconsider their current practice and where on the continuums they needed to move in order to help them make improvements to their practice decisions. So rather than the practitioners using guidelines or principles, (deontological duties of care) they were able to decide based on their contexts and peculiarities of their cases which of the virtues was relevant and where to move on the continuums to gain better outcomes for their patients.. This supports Dawson's (2010) argument that ethical guidelines can miss the variety of contexts relating to different ethical dilemmas. That is, the particularities of a patient are not taken into account when making treatment / care decisions. Kotzee and Ignatowicz (2015) argue that there is a dearth of empirical studies that explore doctors' ethical decision-making from a virtue ethics perspective. This lack of emphasis of utilising phronesis as the theoretical frame means extant studies have yet to explore the details of practice on the ground related to ethical decision making from the accounts of doctors throughout their careers. In other words studying what practical wisdom means to them in their medical decisions. Here we argue that without the

knowledge of how doctors current decision process compares to the concept of phronesis, it is difficult to cultivate phronesis through education and training, or influence policy in a way that helps doctors cultivate a phronetic approach in their practice.

Conroy (2010) argues for the approach of understanding the practitioners world first as an ethical and sustainable approach to making service improvements change with practitioners. What he found is that stories about their practice may or may not fully reflect the reality of what happened, however, they give an insight into their socially constructed reality in relation to virtue ethics and therefore the decision-making approach of their practice based community. Authors such as Bruner (1999, 2002) and Greenhalgh and Hurwitz (1999) observe, narrative elements of telling stories and the hearing of them provide us, as humans, with an approach by which we can best develop a stronger understanding of the search of meaning in people's lived experience (Biggerstaff, 2014).

The new arts-based addition to the methodology used for this project brings this ethical approach alive by producing a film series of a virtual medical community making decisions, again based on the stories told to the researchers, that is the script were inductively informed. This mirrors in a dynamic way what Conroy et al (2012) offered in terms of a static depiction of the virtue continuums. The film production also features themes and a serial of episodes which Conroy (2010) draws on Czarniawska (1997) for feeding back to practitioners and then helping them develop action plans moving forward. The film series shows the characters developing their phronetic practice due to certain events, and therefore for them, how and why particular decisions have been taken.

In summary, empirical work on phronesis in medicine is underrepresented and derived solely from social science based methodologies (e.g. Little et al 2011, Jorden and Little 2004, Philips and Hall 2013 and Brummell et al 2016). Here we argue for a methodology that brings a recognised social science based narrative and ethnographic approaches together with an arts based participatory film production methodology as an opposite way to study the concept of phronesis in medical decision making. We now explain our hybrid research design and the staged set of methods employed.

.

3.2 Research design

Our staged design can be summarised as:

- 3.2.1 Ethics approval process.
- 3.2.2 Research questions
- 3.2.3 Gaining access to participants (131 Consultants, GPs, FY Drs. and Medical Students).
- 3.2.4 Methods of data collection.
- 3.2.5 Analysis methods (from the set of narratives identified the virtues conveyed through many iterations which led to a consolidated set of fifteen virtues).
- 3.2.6 Video production (Storyboard – from medical students to experienced clinicians, Asked a film director create 6 episodes to convey the 15 virtues.)
- 3.2.7 Patients and the public about *phronesis* and trust.

There is an explanation of our approach for each of the above in the subsections below.

3.2.1 Ethics Approval

The ethics approval for this project was sought at the outset, before data collection commenced, from the University of Birmingham (application No.ERN_15-0172) and it was approved by the Science, Technology, Engineering and Mathematics Ethical Review Committee on 28th September 2015. Ethics approval was also sought from the University of Nottingham (ethics ref. no: L13102015 SoM Birm ERN_15-0172) and the University of Warwick (BRSC ref: REGO 2015-1720). Approval was given on 25th October 2015 and 4th November 2015 from the universities of Nottingham and Warwick, respectively.(See Appendix E1A) Ethics approval was also obtained before commencing observations in the second phase of data collection from the Health Research Authority (IRAS project I.D. 227550). Approval was given on 8th August 2017 (REC reference: 18/HRA/0203). (See appendix E 1b)

3.2.2 Research question

Medical ethics researchers are making the case for a move towards more emphasis on the concept of phronesis as a way to overcome the limitations of using de-ontological approaches (e.g. Kaldjian 2014 & Montgomery 2006) . Extant research has tended to study practical wisdom for one organisation and with one practitioner. A number of iterations of the research question set eventually arrived at the following (Malik 2017) in order to fill the

gap in the existing literature and enable us to study a community of doctors at all stages of the medical career path.

1. What does *phronesis* (practical wisdom) mean to medical students and practitioners?

2. To what extent is *phronesis* cultivated, maintained and moulded over the educational and practice life of doctors in the UK?

3. To what extent can *phronesis* be promoted through educational and practice interventions?

 Secondary questions:

  a. What does an empirical study of *phronesis* within the medical context tell us about theoretical debates in virtue ethics?

 b. Do understandings and enactments of *phronesis* change through medical education, and if yes how?

 c. How much room do doctors in the UK have for exhibiting *phronesis* in their professional practice?

 d. Does *phronesis* play a role in sustaining the community's trust in the medical profession?

 e. Are there enabling factors (e.g. presence of role models) and / or competing forces (e.g. marketisation or bureaucratisation) that influence the extent to which doctors can exhibit *phronesis* in professional practice?'

3.2.3 Participants

For this research communities of doctors were followed over four career stages:

1. Beginning of formal medical study (2nd year), last year of formal studies (5th/final year);
2. On first placement at the end of formal study (Foundation Year). These were interviewed in foundation year one, and then again as they progressed to foundation year two;
3. Doctors in training either as GPs (4 years) or as Consultants (6-8 years)

4. Established medical professionals with 5 years' plus qualified experience Potential participants for interviews were approached through the hospitals and GP surgeries attached to each of the three participating universities, and recruited through an invitation email to participate in the study. A total of 131 were recruited . Eligible doctors were identified with the

help of the academic and administration co-ordinators (who are the Co-I's) at the three participating medical schools and their local NHS Trust hospitals; and thereafter, using a snowball sampling technique, more doctors were approached and invited to participate via emails sent to each. Emails did not reveal who else has been contacted, and all communication between interested potential participants and researchers was treated as confidential. Foundation year doctors and experienced doctors who have been interviewed were asked if they would consent to observations. Those individuals who indicated that they were still interested in participating were provided with the information sheet, and thereafter requested to sign a consent form. Hard copies of the signed consent forms were placed in a locked cabinet in the Health Services Management Centre at University of Birmingham.

3.2.4 Methods of data collection
Our preferred choice of data collection was based on narratives and ethnography. We used the following three methods of data collection: interviews, ethnographic observations and participant kept diaries / e-portfolios. All interviews, observations and e-portfolio notes / diaries were entered into NVivo11 Plus after allocation of a code name / number.

Interviews
The participants were provided with a participant information sheet via email. (See Appendix C.4) Those who participated were also provided with a Certificate of Participation for their portfolios (See Appendix E.2)Those who were willing to participate in the research were approached by the research fellow to arrange a day, time and location which was convenient for the participants; so as not to disrupt their busy schedule and / or patient care delivery. Before commencing the interviews, a consent form was signed and dated by both the participant and the interviewer. The consent form stated that all transcripts of data would be anonymised, however it included a caveat to participants to the effect that standard utilitarian exceptions to confidentiality apply. The consent form also includes the information that the narrative data from these interviews will be used in the production of a video series, albeit with confidentiality maintained. (See Appendix B.4)

Interviews were semi-structured interviews (SSI) and developed from story gathering methods developed in Conroy (2010). Semi-structured interviews typically of 45-60 minutes duration were conducted with 131 participants from across all four cohorts They were used as the primary form of data collection in the study. The interviews were lightly structured at first, starting by explaining our interest in exploring the participant's experience of involvement In the ethical decision-making process; whether they be decisions of their own or those of others they work with. Since story telling influences decision making, as argued above, it became an

important part of our research on phronesis. We also explained that the interviewee, as 'listeners' (Boje, 1991), were interested in whether they perceived the decisions made to be good / wise, or not so good / unwise decisions.

Although a topic guide was prepared (see Appendix E.3), participants were started their accounts wherever and however they wanted. If they did not respond to this open start, the interviewer might prompt with 'It seems difficult for you to start on this subject, would you like to start by talking about the difficulty?'. They were then opportunistically asked about the instances or stories that they subsequently alluded to. If the participant presented facts or offered general accounts, they were invited to give specific examples relating to their account. Experience from previous studies (e.g. Conroy, 2010) shows that for most participants, explanation of the research aims and active listening signals are a suffient prompt for generating stories. Many times, as is usually the case with SSI , the interview built on the participants' responses; and this helped in finding answers to the secondary research questions. The second part of the interview thus helped to gain clarification of context, the characters involved, dilemmas, competing pressures, community response, etc. (Conroy et al 2015)

Participants were asked to recount stories in which:

- They felt they have applied their own practical wisdom to a work situation.
- They felt they could have acted more wisely.
- They had seen a colleague making a particularly wise decision or unwise decision.
- They know of any particularly wise or unwise decisions that they have not experienced directly, but that have influenced their thinking.
- And what they think the characteristics of wise or unwise decisions in medicine might be.

(Conroy et al, 2015)

Observations
In addition to narratives, observations were conducted to add to the richness of data. Ethics approval for this was obtained from the HRA (Malik et al , 2017)Participants who gave permission at the time of interview to being observed were approached and sent an email, along with the participant information sheet for observations, and informed that a member of the research team was available to answer any questions they may have. (See Appendix C.3)Informed consent from all study participants was obtained (See Appendix B.2). In the

second phase of data collection, a selection of experienced practitioners were observed in the multidisciplinary team meetings (MDT) that many attend on a weekly basis. On one occasion however, an experienced doctor was 'shadowed' as well. Observations used an overt non-participant approach and all field notes were taken as unobtrusively as possible.

Before observations commenced, for example in the case of MDT meetings, members of the MDT were provided with an information sheet detailing the purpose of the observation and their consent sought (See Appendix C.2). A consent form was also signed by the experienced doctor (See Appendix B.1). Observing participants along with their interviews and e-portfolios / CPD diaries provided context to the participants' development of *phronesis* (or not), which was important when developing the video series. The observations provided the opportunity to see how these discussions are conducted, what guides them. Analysis of these observations added (or not) to the virtues extracted from the narratives. In addition these observations provided the context for the video series.

Participant kept diaries/ e-portfolios
Some of the study participants were asked to bring, or later send, their e-portfolio reflections to the researchers. Originally we were going to ask our participants to keep diaries about any ethical decisions they experienced, but we later established that some routinely keep e-portfolios where they record their experiences and reflections. The e-portfolios are reflexive and used to provide context and reflections for decisions the diarist makes, or decisions they see others making.. A few e-portfolios were willingly provided by participants and entered into NVivo.

3.2.5 Analysis Methods

Thematic analysis
In order to draw out themes and collect stories for a film based serial an initial social science-based analysis was used. Thematic analysis using the Framework Approach (Ritchie and Lewis, 2010) yielded themes or categories of what doctors found important e.g.typologies of people, events and behaviours. The narratives were read and reread to make the transition from literal meaning to themes related to virtues which were used for generating a virtue continuum. This Virtue Continuum coding was conducted using NVivo 11 Plus. The final set of consolidated virtue continuums contained in the narrative data was converted to a draft storyboard as a basis for the film series. Two theoretical lenses - MacIntyre's (1981) virtue ethics, and Kaldjian's (2010) medical phronesis were used to examine the nature of phronesis in the accounts and then offer suggestions on theoretical developments of phronesis.

Virtue Continuum

According to (Moore and Beadle 2006) MacIntyre's virtue ethics is a virtues-goods-practices-institution schema and comprises of theoretical sub-concepts that can be related to phronesis since this is one of the virtues. Conroy et al (2018: 11) describe these as follows

'Virtues: disposition to act in a certain way that enables us to achieve internal goods (includes wisdom).

- Internal goods: the excellence of products / services and the perfection of the individual in the process.
- External goods: only contingently attached to a practice e.g. money, status and power.
- Practice: any coherent and complex form of social activity e.g. medicine, nursing, social work etc.
- Institutions: primarily concerned with producing and distributing external goods.
- Narrative quest: search for our purpose (telos) towards wellbeing (*Eudaimonia*)
- Communal narrative quest: arising from a meshing of practice virtues and a telos of collective wellbeing.
- The Medical Phronesis lens held alongside virtue ethics helped us to contextualise the notion of *phronesis*.
- An initial output of the analyses has been a virtue continuum mapping of 15 virtues to illustrate *phronesis* enactment across all the data.'

Each interview transcript was allocated a code number / name to anonymise it. Transcripts were read and re-read to identify relevance to the research topic, and a sense of the themes generated was gathered. Coders were allocated transcripts and any new code generated was added to Nvivo. Coding meetings were held once a month to discuss any new theme that appeared, and collapse or expand codes (codes were reviewed and redefined to get clarity and cohesion of themes) with core coders also conducting mini-coding meetings on an ad-hoc basis. A two-stage process of analysis was followed, where an initial text search was conducted and the coding context (broad and / or entire source) was read to ascertain if the text was of relevance to the assigned code. Another method was to read the transcript in full to pick relevant / thematically similar passages and code them at the relevant node.

The interview data was divided into two files - data collected **before** 24 November 2016, and data collected **after** 24 November 2016. This broadly corresponded to phase 1 and phase 2 of data collection respectively. Interviews which had been completed in phase 1 were analysed first, and 25 virtue continuums were initially generated. Three more themes were

later added following other coders' input, to make a total of 28 virtues. At one of the coding meetings (on 22nd March 2017), these 28 virtues were reduced to 10 thematically-related key virtues which were identified as the initial findings to be presented at the 2nd workshop of the project on 6th April 2017. A further 3 emerging virtues were then added, giving 13 virtues in total.

As stated above, phase 1 data generated 13 virtues. Using these 13 virtues, the interviews / data collected during the phase 2 of data collection were analysed and coded using NVivo in May 2017. Although analysis of data was ongoing, interviews were still being conducted during this phase – therefore, parallel analysis and interviews occurred from May 2017 onwards. During this phase of data analysis, 6 new virtues were added (re-analysis of phase 1 data was also conducted to retrospectively search for the presence of these 6 new virtues). As the new data generated more virtue codes, the 13 virtues (from phase 1) expanded to 19 virtues. After multiple researchers had re-read the virtue codes, these were subsequently reduced to 15 virtues. This group of 15 virtues became the final set.

These 15 virtues were placed on a virtue continuum with the mean denoting the virtue, and two poles representing the excess or deficiency of that particular virtue (Table 5) . Extracts from the transcripts / NVivo nodes (which contain stories narrated by the participants) were taken for each of the 15 virtues and word documents prepared. Thus a coding report (the word documents) was generated for each code and were used by the University of Cumbria (UoC) for writing the scripts for the video series.

Although NVivo was a useful data management tool, allowing all the text/s related to a particular virtue to be coded at the respective node, the specific assigning of the text to either the mean or either of the poles was done manually. Reading each story in these code reports helped in assigning it to a specific position, which subsequently helped in populating the virtue ethics framework for each cohort (Appendix G: G.1 to G.4) in addition to being used by the UoC for scriptwriting.

Kaldjian analysis
Since , as argued above, when making treatment /care decisions it is important to be cognizant of the particularities of a patient we used Kaldjian's medical phronesis framework as our second theoretical lens. Kaldjian makes a case for reorientation of *Phronesis* in medical practice (2010) and medical education (2014).Kaldjian's core elements of medical phronesis were used to analyse the narratives to answer one of our questions: How much room do doctors in the UK have for exhibiting phronesis in their professional practice? (Conroy et al, 2015b)

According to Kaldjian (2010: 559), *phronesis* in the context of medicine encompasses:

1.Deriving from the concept of human flourishing it is necessary to pursue worthwhile ends (goals). These goals are both, medical and care related, and must be agreed upon ; otherwise decisions may be dictated by the urgency of the situation, access to available treatments or whatever is considered as routine   practice rather than the longer term goals and underlying clinical realities of the patient involved. Following MacIntyre, Kaldjian considers these "goals are formed through dialogue with clinical peers, families and patients" (Kaldjian, 2010: 559).

2. Accurate perception of concrete circumstances which detail specific practical situation at hand. Rather than compartmentalizing knowing the relevant details, social and medical, of the case is essential to making wise decisions (Kaldjian,2010: 559).

3. Commitment to moral principles and virtues that provide a general normative framework. This core element invites consideration of the relationship between virtues, principles and consequentialism and suggests the ends of wise decision making should be guided and justified by fundamental moral standards. Kaldjian calls this "an overarching frame of reference and says it is integrity centred and places virtue at the centre of normative ethics"(Kaldjian,2010: 559).

4. "Deliberation that integrates ends (goals), concrete circumstances, and moral principles and virtues". This entails prioritizing goals, assessing the available medical data and prioritizing multiple ethical values(Kaldjian,2010: 559).

5. Motivation to act in order to achieve the conclusions reached by such deliberation. This, in view of the fact that there are significant implications of the decision reached there is a need to be motivated to achieve the conclusion reached , regardless of the course of action chosen (Kaldjian,2010: 559).

 Kaldjian's approach to practical wisdom is different from the Virtue Ethics approach that was used for the primary analysis and the Virtue Continuum framework. The Virtue Ethics approach was inductively driven provides a virtues-goods-practices-institution schema while Kaldjian analysis was deductively driven. Since practical wisdom (*phronesis*) "is a cognitive, action-oriented process guided by goal-directed reasoning within a normative ethical framework and spurred on by motivation to act according to the conclusions reached through deliberation" (Kaldjian 2010: 561) Kaldjian framework was used to identify these core elements in the narratives of our participants It could be argued that the virtues (as continuums) could be integrated within Kaldjian's decision

making framework and so is a useful framework for developing a theory (regarding decision-making) from the findings.

Given our methodological arguments about the importance of interviews/narratives for accessing lived experiences of *phronesis*, and the differences between Kaldjian and the Virtue Continuum approach, a thematic analysis was done using Kaldjian's five core elements as our framework. To do this, the following questions were used to explore the data:

1.   Are Kaldjian's five core elements constructed in the narratives?
2.   Are all of them constructed or some and if so which ones?
3.   Do the five elements construct our participants' meanings of practical wisdom, or are there further core elements that could be added from the data?
4.   Reflexive question which came at the end of analysis was: How accurate are Kaldjian's core elements at constructing what participants mean by practical wisdom? (A schematic representation of these five elements can be seen in Fig. 1 in the findings section.)

3.2.6 Video production

Initially a series of workshops were convened to draft out a story board for the film series including anonymised characters based on the stories from the participants. Once the story board was agreed, the film director arranged for scripts to be written for each film episode by drawing on stories from our participants. The aim was to convey all 15 virtue continuums by using participant narratives participants relating to each virtue. The coding reports generated from NVivo for each cohort provided the narratives for the scripts. The scripts were reviewed by participant cohort representatives, the research team and medical educators from each of the three partnering medical schools. Once the scripts were agreed the film production team, produced six episodes that expanded on the original storyboards. Professional actors were used in the series and the PI and a consultant from the research team attended some of the filming to support the production team.

The next stage, the virtual community media production, includes not only a video series but blogs, social media, newspaper pages etc. to create a safe placement virtual community resource as a moral debating resource as a complete educational package. Moving from data and analysis to the video series was an iterative process of the film director sending early cuts to the research team, participant representatives, a hospital consultant and a GP. The early cuts were sent back to the film director with comments via a series of workshops with UoC. After multiple viewings, with the last being held at the final project workshop (PMC final

workshop 2018) where representatives from the GMC and HEE, doctors, clinical academics and health care practitioners commented on the episodes Those comments were sent to the UoC to use as a guide before finalising the recording and editing of the series.

Ethical dilemmas based on participants' narratives are presented in every episode, and provide a focus for each. These will be related to a specific teaching sessions within a 'subject block' in a medical training programme module. For example, the first episode shows two medical students, the main characters, gaining an understanding of what the concept of phronesis means in relation to ethical dilemmas such as the treatment options of a fragile elderly patient and deciding which patients should be offered IVF treatment.   Another episode shows the different stances taken by members of a multidisciplinary team in relation to a family request to discharge a seriously ill patient from hospital and how the doctor arrives at a decision after listening to all sides. By drawing on the particpants' narratives a range of themes and patient stories have been incorporated into the series. A GP and medical consultant are the two main characters and the series shows them developing in their practice based on the stories collected at different stages from medical student all the way through to experienced professional.The idea is for this series to be used in medical school and CPD educational programmes to stimulate ethical debate and allow students and delegates to reflect on their practice decisions in relation to the concept of *phronesis.*

 The latter arts based component of the methodology is aimed at filling the gap in the availability of moral debating resources that MacIntyre (1988, 2009) suggests is missing from all avenues of professional education in society. In this case it is the medical community under the spotlight but any practice-based community could be researched using a similar methodology. . Excerpts from the film series have been piloted and presented at the final project workshop as well as a number conferences (BAM, 2018 and at RCGP, 2018).These included audiences of academics (clinical and leadership), practitioners (medical and from other sectors), patients (representatives and actual) and policymakers (e.g. BMC & RCGP). The feedback was that the methodology had produced an output in the form of the film series that did enable them to debate the morality of their own decision making and therefore had immediate impact.

One view from a participant is that '*the practical stuff comes from the experience, and I think you can't beat that, you know? I'm not sure there would be much to be gained by trying to go through that in a classroom, because you don't get to fully appreciate the situation'* (5th year medical student). The film series does just this conveying the situation, the particularities surrounding the decision process. It therefore offers a new option to medical educators to

help them with cultivation of phronesis with their students. It is a a very different option to the many text-based reports and recommendations that have emerged from scandal enquiries and other mainly social science research studies to date. This methodological approach provides an outcome that will enhance medical ethics education and the ethics training of experienced doctors and has wider applicability to other professions inside and outside healthcare.

3.2.7 Patient participant involvement (PPI).

There were two principal ways in which data from patients and the wider community were collected by the project. The main source of primary data from patients and the wider community were a series of five focus groups run between June and November 2017. In addition, the project also held two engagement events at local hospitals and during these events canvassed the views of passers-by; including patients, carers and visitors. Finally the project has also been committed to patient and public involvement in the design of the research itself, and has therefore included a patient representative on the project steering group. Whilst this has not yielded any specific data which is reported here, it has guided the collection of primary data to address this objective as well as the overall approach of the project itself

Patient and community focus group:

In order to gain their perspective on wise decision making five focus groups were run in various neighbourhoods in Birmingham. Trust was an important virtue that the project explored by exploring how doctors both in -training and experienced perceive the development of this virtue in their practice. Through the conduct of patient focus group we were able to explore this virtue from patients' perspective. This helped understand more about what builds trust between patients and doctors from a patient and community perspective. We were interested to know how trust is first established and what builds and retains trust. The project worked with the community group associated with these groups to convene the focus groups at times and venues convenient for attendees. A poster and banner were produced to help advertise the focus groups (Appendix A.6a and A.8).

Five focus groups were run with a 43 participants in total (Table 3). These were a mix of community and patient groups:

Community groups: the project chose to run two focus groups in an area of Birmingham with a high percentage of residents from Black, Asian and Ethnic Minority communities with one having a specific focus on Asian women.

Patient-specific groups: were a mix of those with an interest in health matters such as Healthwatch volunteers and GP Practice Patient Participation Group Chairs, or those with a specific health condition (Liver patients).

Group	Attendees
Womens Yoga Group –mix of age and ethnicity.	16
Asian Womens exercise group.	14
GP Practice Participation Group Chairs.	5
Volunteers from Healthwatch Birmingham.	3
Hospital Liver Patients Group	5
Total	43

Table -3: Focus groups' participants

Focus Groups were provided with information about the project both in writing and verbally (See Appendices B.3 and C.1). This incorporated the facts that all information would be anonymised, no individual or organisation would be identifiable and all data and recordings would be kept securely and disposed of in line with the University of Birmingham's research guidelines. The quotes set out here identify only the focus group from which the comment originated, based on the numbering of the groups in the table above. Written and informed consent was obtained from all attendees , and all focus groups were audio recorded on portable digital recording hardware.The group discussion were conducted in a semi-structured way, conversational in format, with the following themes covered at each one:

- What do you think helps a Doctor make a wise decision?

- How can we develop or enable wise decision making by Doctors?

- Have we as a society lost trust in Doctors?

- If we have lost trust in our doctors, what could help re-build that trust?

Engagement events:
In addition to the focus groups two engagement events were held for patients, carers and health care professionals in order to enter a dialogue about our research with the local community and local health care professionals. The events were held at two local Birmingham hospitals. Two banners were produced for these events, and the two hospital Trusts also promoted our events. (Appendix A.6b and A.7). Over the 2 days, we spoke to passers-by

about our research, and engaged 85 people in a more in-depth conversation using the topic guide for our patient and community focus groups as set out above. These interviews were written down, capturing people's words where possible. These events provided useful insights for the research, along with some local publicity for our research.

.Of the 85 people interviewed, only 7 identified themselves as patients or carers; the vast majority were Health-Care Professionals (48) or non -clinical staff (16) with other or not stated (14).

The discussion at these events were broadly similar to the more detailed discussions of the five focus groups. The focus groups used different language and examples to those used by medical students and doctors. Nevertheless there was relatively high degree of congruence between the two cohorts. Of the 15 virtues identified by doctors and medical students, 9 match to the attributes or virtues and wider societal and structural factors identified by the PPI focus groups.

As a way to transition the report to the findings the next section presents a summary of the data and analysis part of the research design in relation to the research questions it was designed to answer. The table below (Table 4) shows the primary and secondary objectives (the research questions) of this study, and alongside them are the data used to answer each question plus a very brief summary of the findings which are expanded upon in the next section.

Primary and Secondary Objectives,Data, Analysis and Findings (Conroy et al 2015)	Data	Analysis and Findings
What does phronesis (practical wisdom) mean to practitioners?	Interviews with 131 medical students and doctors. Observation in clinical areas. Participant-kept diaries.	Findings presented as a Virtue Continuum (Table 5) and Video Series: Stilwell Videos.
To what extent is phronesis cultivated, maintained and moulded over the educational and	Medical students and doctors' Interviews and diaries. .	Findings presented as Virtue Ethics Framework for each cohort (Appendix G)

practice life of doctors in the UK?		
To what extent can phronesis be promoted through educational and practice interventions?	The narrative data from the interviews with medical students and doctors..	Production and piloting of Stilwell Video Series. Development of a tool to enable "in action" and "after action" reviews of decision-making based on findings of Virtue Continuum and Kaldjian analysis of the process of decision making. The videos will be piloted at the three partnering medical schools: Birmingham, Nottingham and Warwick and will also be part of the exhibition at the 2018 Royal College of GPs Conference and other 2018 Conferences
Secondary Objectives		
What does an empirical study of phronesis within the medical context tell us about theoretical debates in virtue ethics?	Existing literature.	Findings discussed in the two theory papers: 5. Phronesis as an ideal in professional medical ethics: some preliminary positionings and problematics (Kristjansson, 2015).

		6. Medical Phronesis: What does the term mean theoretically to key authors in the field(Conroy, Kotzee and Kristjansson, 2017)
Do understandings and enactments of phronesis change through medical education, and if yes how?	Interviews from the primary data (in particular the follow-up interview data).	Findings presented in the Virtue Ethics Framework(Appendix G6) and the virtue /cohort table (Table 6)
How much room do doctors in the UK have for exhibiting phronesis in their professional practice?	Analysis of primary data.	Analysis of primary data .using the Kaldjian framework and results presented in the analysis and findings section of this report.
Does phronesis play a role in sustaining the community's trust in the medical profession?	Community Focus Groups and engagement events.	Results presented in the findings section of this report
Are there enabling factors (e.g. presence of role models) and / or competing forces (e.g. marketization or bureaucratisation) that influence the extent to which doctors can exhibit phronesis in professional practice?	Primary data.	Findings presented as themes in the findings section.

Table 4 : Primary and Secondary Objectives, Data, Analysis and Findings

4.Findings and Analysis

The narratives approach suited this study well as they often involved stories about moral exemplars. A number of virtues were revealed which, after multiple iterations were consolidated into 15 virtues. These 15 virtues when placed on a continuum showed us that for each mean position there were stories revealing polar positions also (Pole 1 and pole 2) corresponding to excess and deficiency , respectively. The following section provides the findings from our analysis in a tabulated form and as text.

Virtue Continuum

The key output of the analyses is a virtue continuum mapping (Conroy et al 2012), to illustrate the virtues at play including *phronesis*. The 15 virtues, based on the stories told by participants, were mapped along a continuum (Table 5). This mapping shows that for each virtue, as narrated by the community of practitioners, there is a continuum from vice (excess of the virtue) to vice (deficiency of the virtue) via a mean (virtue). The mean point in each case is arrived at via moral debate with fellow practitioners and collectively works towards wise action.

Virtue	POLE 1 (excess)	MEAN	POLE 2 (deficiency)
1	Doctor decides	Negotiate	Patient decides
2	ALL get treatment	Justice/Fair	Select few get treated
3	Overly trusted	Trust/Integrity/ Confidentiality	No trust
4	Constant litigation worry	Lawful	Ignores legal constraints
5	Constantly seeks guidance from peers and /or professional bodies	Make collaborative decisions /Seek guidance	Self–guided/Does not consult
6	Use own values and beliefs	Culturally competent	Go with patient's values and beliefs only
7	Too involved / over emotional	Interpersonal communication / Emotional intelligence	Distant/Aloof
8	Treat at all cost	Recognising limits to treatment	Limited treatment options considered

9	Constant mentoring overly directive	Approachable /available mentor	No interest in mentorship
10	Trying to cater to all aspects – Arts / humanities science, spiritual ,physical	Balanced approach	Just one approach - e.g. science only
11	Over-analytical (Navel-gazing)	Reflective	Never reflect
12	Foolhardy risk taker	Courage to speak out and have difficult conversations	Avoids conflict
13	Thinking they are bullet-proof	Resilience	Avoidance of any stress
14	Seen it all / know it all / can deal with anything	Phronesis	Applies purely theory or just follows guidelines
15	Obsessed with finances/resources	Resource awareness	No consideration of finite resources

Table 5 : Virtue Continuum: excess to deficiency via the mean.

Each virtue was allocated a number for ease of analysis and tabulation, but not, it must be emphasised, as a value nor giving it a chronological position. A virtue ethic (VE) framework for each of the four cohorts (2nd year students, final year students, foundation year 1 and 2 and experienced doctors) was also prepared, which shows whether the virtues individual participants talk about / narrate fall at either pole or the mean. In this way, the virtue/s practiced / experienced by each cohort can easily be identified at a glance (Table 6).

In what follows, each of the 15 virtues is presented:

1.Negotiate

Most participants regarded negotiating with patients and / or the family when making decisions about treatment or care an essential virtue, and thus converged at the mean of this continuum. This virtue is talked about by most participants, irrespective of whether they were students, early career practitioners or more experienced doctors (Table 4).

The doctor's role is not only to provide suitable and relevant information to enable patients / carers to come to a decision, a negotiator aims to provide expert advice and guidance in the light of clinical facts while also taking patients' views into account

was the preferred position held by most of the interviewees. This definition of informed choice, where the doctor's role is to enter into partnership with the patient and negotiate a treatment plan was described as:

"I guess that would be my approach, just to seek out as many facts as I possibly could on the one hand, and for more… difficult decisions, just talking to the patient and trying to get to know them a bit better and their kind of particular outlook ….. and then possibly based on that, kind of guide them to a decision that I think might suit them better." (B102).

More experienced doctors were also of the view that it is important to converse with patients and have "*a constructive conversation both ways. I've got something to say but let's not jump to a decision now, because that would be wrong." (BX02).* Exchanging information resolves conflicts and enables patients to make an informed choice.

Decisiveness is respected according to some our participants, both by doctors in training and some patients they come into contact with:

"*Sometimes people do respond well actually to someone taking control of the situation, even if it's in a way that you would think would surely be completely inappropriate, but they [the patients] respond well to it." (B112)*

Narrating an episode in which a consultant surgeon became involved with the care of a patient who was refusing feeding, and after discussions came up with a practical solution to move forward, led one trainee to consider that this is "*how I'd like to practice" (B108).*

A few participants considered that it may be important, in fact sometimes essential, that doctors decide on the course of action to be taken in a patient's care. This may be because some patients implicitly seek paternalistic guidance, as they may find decision-making a burden, or rely on the doctor's expertise and knowledge to guide them:

"[O]ften when you ask people, 'What do you want to do? These are your options', they just say, 'You decide doctor. You're the doctor, that's why I've come to you.'" (BX03)

Another participant *'guaranteed'* that '*99.9%'* of patients would say: "*What do you think I should do?" (WX01).* In such circumstances, when making difficult decisions, doctors reported using a form of subjective imaging whereby they would ask themselves "*If it's something that you would do for your child or for your parent, then that means you are making the right decision" (WX01),* as a technique to help make the right decision.

Sometimes persuading patients in their best interest, according to some participants, is necessary, patient autonomy notwithstanding, since:

"[A] patient doesn't understand the severity of the decision they're making, and perhaps only when they've seen people who don't have the procedure done or don't have an operation might they learn… the actual nature of the decision they're making, because we see it, whereas they don't." (WX02).

At times this leads to doctors deciding, contextually, how much information is necessary to give to their patients. Sometimes they might refrain from full disclosure of relevant information to patients. Though this is considered paternalistic, they justified it because it would prevent further distress and sometimes they've:

"[H]ad to couch it a little bit and actually we've reduced the medications by ourselves …. what I couldn't do at the time was say what could happen, because she'd have gone into meltdown." (BX03)

In contrast, some other students and experienced doctors considered that failing to provide full information undermines the trust between doctors and patients and could lead to unwise / wrong decisions:

"….a couple of people had kind of tried to have a conversation with her to kind of like broach the topic…. and then when she was actually told the news, kind of more explicitly, she was completely taken aback and completely surprised by it because people hadn't been frank enough with her" (W207).

"[A] patient refused an operation because…..the patient did say that they felt that not all options were discussed …. and I suppose that affected the trust that the patient had with the doctor." (NX03)

Some doctors, guided by the duty to respect patient autonomy, assume the role of information provider solely and enable patients' decisions to be implemented:

"But, for me, a good decision is one where the patient is the one who essentially makes the decision, or puts forward their wishes, and we then, as the clinicians, allow that decision to come to fruition." (B107)

Others, however, see providing information and asking patients to decide as an abdication of a doctors' duty. There was a sense that decision-making is a burden which should be taken up by doctors, rather than 'imposed' on patients:

"Sometimes, I think we put…patients in a really difficult position. Are we doing shared decision-making, or are we saying 'I'm offloading the responsibility to you and you make that decision.'?" (BX03)

2.Justice/Fairness

There are many "pulls and pushes" that doctors experience in their practice, which impact their decisions. According to one experienced doctor:

"I explain to the juniors, we work in a job where we are pushed by different forces as doctors... So as a decision-maker, we are pushed different ways; we have our organisations pulling from us, we have the patient, we have the family, we have our own knowledge. So these kinds of forces, they are pulling in different directions. Sometimes they are all in the same direction which is good and that makes it easy, but sometimes they are pulling in different directions…" (WX04)

In such circumstances being just and fair was considered an important virtue. Though the spectrum of opinion spreads from a select few getting treatment to everybody getting treated, most considered that fair and equitable distribution of treatment is important. As a result, they would consider whether submitting to a patient's request for a particular treatment / investigation is a) necessary and b) fair to other patients. This is directly influenced by available resources, and its impact on their clinical practice. The aim then is for the doctor to reach a "*shared management*":

*"[T]hat actually is suiting the patient a lot of the time …. but also being resource aware and also suiting the practice's policies." (*NX03)

Communicating with patients on the principle of fair allocation of resources is tricky. Some patients understand, while others find it difficult to accept if they are denied treatment. Patients may feel they are being "wronged" according to one new doctor:

"Well yes, okay, you have to treat everyone fairly, fine. I can't really argue against that. Ironically, the patients who never get there are the probably the ones…. who are very – like I was young and hot blooded, they feel like, 'What do you mean? I don't care if there's budgets, I'm in front of you, I'm sick, you're supposed to look after me' or whatever." (W104)

Some participants thought that selecting patients for treatment based on arbitrary criteria which do not take into account other factors was unfair. Narrating a case discussed amongst their peers of a patient with lung cancer, this student considered it unfair if some patients get the appropriate treatment while others suffering from the same illness may not be able to access the same treatment option:

"…and it did seem really unfair that he was still smoking, had a lobectomy, and the guy that came in before … he couldn't have any operation. If you've had a second chance, surely you should have learnt by now. I think that was the first time I was ever like, 'God, that's really messed up.'" (B205)

It was felt that an important element of justice and fairness was that if one patient is charged for a service, then all ought to be charged the same, according to BX03's

experience as a GP. However this attitude was challenged on the grounds that it is unfair:

"So, where we might charge a fee for somebody to write a letter, because it's not an NHS service, she [the GP] would always say, 'You've got to charge that fee to everybody because then we're fair and we're equitable'. But actually sometimes that person in front of you, you know really can't afford it. So, some of us would have argued that it's not [fair and equitable], but she would say it's too woolly and that it needs to just be all or nothing." (BX03)

3. Trust

The virtue of trust was considered a necessary virtue by many participants. Trust was seen as being enhanced by maintaining confidentiality, and the ability to communicate well. Most doctor–patient interactions are grounded in trust:

"I think we are in a profession where trust underlies almost everything we do ...numerous things that invade people's privacy and invades their sense of self…and I think if there's anything that undermines ….. just is abhorrent." (B108)

However, with practical experience, this was seen as less clear-cut; because *"real-life situations are often a bit muddier and murkier than that." (B506)*. Despite this murkiness, it was seen as important that doctors act with integrity and honesty in *"all parts of your life as well." (BX03)*. Describing a patient who eventually died in prison, when in fact there may have been underlying medical issues which had not been adequately followed up:

"I think the challenge, if we go back to ethics and wisdom, has to be underpinned by the integrity of the practitioners and if people are not 100% - if their integrity is not absolutely squeaky clean or they'll look out for themselves or they'll cover up or - then you're always going to have that problem with human weakness". (BX06)

For another doctor this also meant honestly examining their practice:

"The wisdom must be underpinned by people demonstrating a high level of integrity, and my challenge would be 100% honesty even if mistakes had been made and I think that has been brought out, the need for transparency and honesty…I think this whole area of phronesis, applying wisdom is a dynamic process of continual learning that is underpinned by integrity, honesty and continually learning from those." (BX06)

Breaching confidentiality was described as being a serious ethical dilemma, which could lead to patients' loss of trust in the doctor; and which therefore needed to be

carefully weighed up. There were, however, occasions where confidentiality *had* to be breached. Discussing doctors' appraisals, an experienced doctor confirmed:

"…there are some things which supersede and override confidentiality – which is to do with safety for patients, or a doctor's health." (BX02)

However, breaching confidentiality was seen as an abuse of trust in some situations, for example by those doctors considered to be *"in positions of power and confidence." (B507)*.

Confidentiality was challenged where doctors and other health care professionals held personal views which conflicted with the patient's, or with the care plan they were following:

"…we have these feelings we acknowledge that we don't feel comfortable about, whether we consciously or unconsciously pass judgement on people, but actually we're professionals. That means we maintain patient confidentiality." (BX12)

Withholding information from patients was discussed in the context of what impact this might have on both care at the time, and trust in the long term doctor – patient relationship. Generational shift in recent years on information provision was alluded to by some doctors. Withholding information on a life-limiting diagnosis, for example, may take place in order to prevent immediate distress; but can lead to patients distrusting their doctor. A GP reflected :

"[I]n the past, when ethics was very different, we had a patient who was in her early 30s and she was pregnant for the second time. And the senior partner then, very much of a generation older than me, was looking after her, and she had MS, but the consultant chose not to tell her, and wrote this in a letter, which the GP chose not to discuss with her, so she didn't know what her diagnosis was. And she was pregnant again with her second child, and she had a relapse in the middle and we knew that that was a problem, a potential problem, and one of my colleagues just a bit junior to me had to go and visit her post-natally and explain that we had known about this for years. And we had a big discussion about it, there were four partners at the time, two partners felt that it was appropriate to keep that information from her, and two partners – that was the two older ones, and the two younger ones, myself and this chap, felt that she had a right to know."… So now Monday lunchtime was ring-fenced to "*clear all the issues that are coming through, so that we do have a way of sharing problems with people" (NX02).*

Another young doctor reflected on a "difficult decision" made by a consultant to keep a diagnosis from an elderly capacitous patient with no family around in an unfamiliar hospital:

"…so he had to make the decision I guess, actually, what would be in her best interests in that time for her, to think, 'Do I unintentionally cause her distress or confusion more so than she already is to get this message across?' Personally, I think I would have gone along and told the patient because I don't think that if you're keeping information as serious as a poor prognosis from cancer, I just think it would make it so much more difficult down the line if she did live much longer than they anticipated. 'Oh, well actually, you've got a cancer that we can't actually treat.' It's quite a difficult measure to deliver in any case, but then to have to decide, 'Should I actually tell her or leave her in the dark?' That is quite a difficult decision to make." (B201)

Clarity and structure around confidentiality can also help:

"…so I had a confidentiality agreement, to say they wouldn't breach confidentiality, if they did they could be expelled from the practice. And he [an older GP] said 'do you really think we need this? I think that is just going over the top! The contracts – we work on trust here.' And I was surprised about that, but again it is a generation ago, so perhaps I have been around long enough to be able to see that." (NX02)

Other doctors spoke of the need to maintain the confidentiality and potentially avoid social stigmatisation of patients by withholding information from partners or family, examples given included (i) a young woman whose liver condition may have been exacerbated by her use of the contraceptive pill, but who did not want her mother to know, and therefore on the advice of nursing staff the junior doctor sent the discharge letter direct to the GP and not home with the patient and her family; (ii) a patient who did not want to tell their partner their HIV status, and (iii) patients with mental health problems who did not want partners, family or other agencies involved. One participant felt that this would be ethically justifiable if knowing the truth would do more harm than good: *"…you owe them the truth but then you're not telling a lie if they don't ask."* (B208)

Withholding information can lead to issues of honesty, and can cause further distress to patients later on when the full facts emerge:

"I think that a lot of … doctors … kind of focus on ... making patients happy, whereas for me I guess ...the thing I think is possibly more important than that is being honest with patients; and sometimes you can't do the first if you're going to do the second. […] on my last rotation I was in a respiratory clinic, and there had been a patient who had been on the ward, they'd kind of suspected that she had lung cancer and … a couple of people had kind of tried to have a conversation with her to … like broach the topic, and kind of felt that they'd pretty much told her and prepared her and then when

she was actually told the news.. more explicitly she was completely taken aback and completely surprised by it, because people hadn't been frank enough with her." (W207)

In addition to integrity, confidentiality and honesty, communication was also seen as a key enabler of trust; but approaches to this, and to whether trust is implied or actively planned for, have changed over time:

"What helps trust is clear communication with patients and families, and with timelines which are kept to." (BX05).

One participant (B208) described what they would want as a patient. The two main points were "*trustworthiness*" – meaning to know that their confidentiality was being maintained, and "*a good rapport*", which can be comforting in a distressing situation. Poor dialogue and lack, or absence, of rapport can lead to different choices by patients. An example was offered of a patient who did not go ahead with an important operation, because they felt not all options had been discussed and:

"…the patient, I think, felt that that there wasn't a good level of communication there; and I suppose that affected the trust that the patient had with the doctor." (NX03)

Trust in the doctor enabled patients to confide in them, and so was helpful in reaching an accurate diagnosis.Communication as an enabler of trust was allied to being seen as knowledgeable and authoritative.

"My consultant at the moment is really good, and he's very good at communicating with the patients and they all love him. He's very authoritative, people trust him….. I think it's good to have people trust your opinion. You don't want to be someone who people think is going to make mistakes. You need to, I think, to be confident in your decisions and have the knowledge [and confidence?] to know that you are right." (B109)

Other factors mentioned in relation to trust were cross-cultural issues, and trust in professional colleagues. Trust in colleagues was seen as an enabler of good health care to patients:

"And if I've got assurance that they are doing that to the best of their ability, and I've got absolute confidence in my team, then they will do that as long as it's physically possible. There is a point where actually they can't do any more, but if you've got confidence in them…then you know that you're on firm ground." (BX05)

Different cultural beliefs impact on trust in the health care system. Discussing the way in which rehabilitation can be seen to follow a 'white Anglo-Saxon' model, one experienced doctor explained:

"The Muslim perspective is a more vitalist perspective in terms of – you can have everything that's possible. Whereas I think there's – generally there's mistrust of the NHS that we pull out too soon, and we don't do everything that's possible, and we don't do everything we should be doing etc. but that's compounded by an ethical – a cultural view of life I think….. there is a cultural clash, so there is mistrust that can be on both sides. The only way to get around that is to recognise that there is a difference in view and maintain open dialogue." (BX05)

Discussing their experience of trust in the system of doctor education, one medical student described the belief amongst their British Asian community that the system (in this case the medical school) is "*always out to get you*" and how this stops medical students raising well-being issues.(N507)

Trust can be enhanced when doctors 'go the extra mile'. This is a phrase used by one doctor who had been working for 16 hours on the ward, in recognition that these supererogatory acts help enhance trust:

"…we absolutely got all of our routine work done, saw every other patient. We were able to utilise our resources, but also people were going that extra mile to try and get this patient coordinated, to get this family sorted…. and make sure we didn't miss the slot to get in…. keeping the relatives fully informed, aside of all the clinical technical bits that go with that." (BX10)

4. Lawful

Acting lawfully was another important virtue that emerged quite early in the data. There are experiences where law and duty of care, though essentially compatible, may be irreconcilable:

"…*they might be more defensive in terms of investigating more, doing more tests and actually, that might not be the best approach. You might be doing harm to the patient by putting them through investigations in such a manner.*" (NX03)

'Covering one's back' and the underlying threat of litigation were recurring findings. Awareness of these 'legal pitfalls' prompted doctors to practice defensive medicine since:

"….the legal underlyingness to it I feel is always prevalent." (B111)

A drawback of being constantly obsessed about litigation is that at times, mistakes are not discussed and opportunities to learn are missed:

"I think people try and brush them under the carpet a lot, and the problem is in the NHS there is quite a blame culture, ….. and when something goes wrong and things

weren't quite handled correctly, people get very defensive… because there is a lot of fear about, you know, losing your licence or being called up to disciplinary." (W108)

5.Collaborative decisions / Seeking guidance

Most participants were of the view that the present day clinical paradigm is one where isolated decision-making is neither advisable, nor possible. An approach that seeks to involve all those entrusted with a particular patient's care would allow decisions to be made that are holistic and best tailored to that patient. Guidance is sought from peers, seniors, multidisciplinary teams, nurses and particular professional guidelines. This is corroborated by the field observations made at the different MDT meetings. When making decisions for complex cases, the team members attending these meetings found that the progressive decisions reached and displayed on the whiteboards were useful, as *"they help prioritise and review decisions." (Obs.1)*

Guidelines however, though useful, require contextual interpretation; and so awareness of the context is important. This contextual awareness can be shaped by others who know the patient, such as:

"[T]he nursing staff who cared for the patient throughout, I relied on hugely because actually I was very upset by the whole situation and felt that the burden of the decision was on me. …and even the night sister … just made it more logical, and decision-making more logical. I do rely on my consultants for the ultimate decision quite a lot of the time." (BX01)

Involving members of the MDT help in making care plans for a particular patient, for instance in obs. 2 the roles of the Occupational Therapist (OT), Physiotherapist (PT) and speech therapist are seen to be central to certain patients' treatment as they had the most information regarding them. The registrars and consultant relied on the OT and PT in particular to provide almost the whole of the summary of information. These collaborative discussions become critically important when making 'deprivation of liberty' decisions, and concluding that a patient lacks the mental capacity to make their own care decisions. The observation made it clear that:

"The lead consultant would ask questions and appeared to be kind of taking it all in, cross-referencing information he got with his records on his computer….. More often than not, he would defer to the decisions of the PT and OT…..The nurse had a lot of say as well about how patients were progressing towards their goals." (Obs. 2)

However at another MDT observation (Obs. 3), the discussions were mostly contained amongst the doctors; with barely any input from the rest of the staff.

Most medical students were of the view that it is far better for "not-so-experienced doctors" to defer to people with more experience for their opinion:

"[Y]ou know, bigger decisions, you're not going to want to take that onto yourself, you're going to defer to people that have got the experience." (W203)

Experience places senior doctors in a position where newly trained doctors find it easier (and safer) to seek guidance from and feel reassured. This was observed (Obs. 3) in an Emergency Department environment, when the junior doctor requested a consultant to discuss 'an older patient with complex health and social problems'. Seeking guidance is important in such cases because:

"…[when you are] lower down in the hierarchy, you might think you're just taking bloods, you're doing more menial work; ordering tests, writing discharge summaries, and I feel like maybe in that situation you might put it to your superiors more, rather than taking that ethical decision yourself." (N204)

Similar views were echoed by early career doctors, who find it helps to seek guidance from senior doctors because:

"…. they've probably made that before and they can tell you with experience the outcome and why. And they might come up with ideas as to why your idea might not be the best for that patient." (W101)

At the same time, experienced doctors also seek guidance in challenging cases and appreciate the advice given; for not only does it take the pressure off , it also helps make a better decision because:

"…sometimes that consensus is really useful because you're basically going through the arguments … and again clarifying some of the aspects of it, I think." (BX11)

However, if a doctor excessively seeks guidance, this may have the result of hindering their ability to make independent decisions. By continually deferring to others, they will fail to acquire the requisite professional experience to develop both this vital skill themselves as a medical practitioner, and as a result will tend to "*stall on patients because they're unconfident.*" (WX05)

Another consultant was of similar view. After being approached time and again by a senior trainee, they eventually deliberately held back their advice and let the trainee decide independently; while at the same time remaining close enough to the decision to ensure that there was no compromise in patient safety:

"[A senior trainee] came to me with this incredibly complex case, presented every detail of it to me, and then said, 'Tell me what to do.' And I refused. He got very angry with me. And I said, 'Look, you know, in two months' time, you are going to be the consultant." (NX07)

Although it is good that trainees have ample medical knowledge as well as knowledge of guidelines, it is the lack of practical knowledge which hinders wise decisions. Some

study participants therefore recommended that when doctors engage in interpreting guidelines, they do so contextually. This could mean referring to more experienced doctors to gain insights into wider interpretation of the guidelines in particular circumstances; or to 'read between the lines'. After all, guidelines are designed only to guide practice:

"…so we've got an SHO …. he has very good book knowledge, he's very academic, he knows the guidelines for everything off by heart but he doesn't really have a grasp of the fact that not every patient can be treated as per guidelines. And we've been trying to explain to him that a guideline is just that, it's a guideline, it's not rigid; it's meant to guide your practice….. he's had real issues with not calling for senior support because he feels that he's got a guideline to follow and that he follows it.." (WX05)

6. Culturally competent

Respecting patients' values and beliefs is a virtue which all the cohorts acknowledged as important. Many of the participants said that they consult their colleagues to understand cultural issues and to consider what the right way forward in a particular situation might be. Having said this, there were those who narrated experiences in which the doctor chose to follow their own beliefs and values, rather than those of the patient they were treating. A doctor who experienced a situation where one doctor refused to provide an intervention as it challenged their personal beliefs (and another colleague had to be approached – which inevitably lead to delay in delivering the treatment) considered that:

"it is important to park your own values. You should not allow those values to affect the decision." (BX04)

A 5th Year medical student narrated their experience of a consultation in a sexual health clinic, where the doctor seemed judgemental towards a patient, which took the participant by surprise:

"I think he said something like, 'Are you gay or straight?' or something. Just, like, which is incorrectly phrased? There's far more, like, tactful ways to do it. But he, kind of, shouted at them, so, 'Are you gay?' kind of thing." (B501)

However, most views aligned with what this experienced doctor who said:

"[A] huge part in my decision-making is influenced by I think the patient's values and beliefs, and the family's values and beliefs as well." (BX01)

7.Interpersonal communication / Emotional Intelligence

Good interpersonal communication is another virtue considered commendable by our participants:

"you can be the greatest doctor in the world but if you can't communicate, nobody will do what you say, will they? (BX103)

However, it is equally essential, if not more so that the doctor has the clinical knowledge regarding the disease at hand for:

"you can be a very compassionate person but a useless doctor if you don't know what you're doing." (W207).

A few narrated experiences where there was an apparent lack of interpersonal communication skills displayed by a doctor:

"…the clinician who saw her [the patient] wasn't very communicative and reassuring in his approach to the patient… [the patient] was having a miscarriage, [the clinician] left it at that; left the room, and I was standing there with a very distraught couple… I told the clinician and he said, 'Oh they'll probably figure it out some way along the line'. And wasn't very keen on going back and telling the patients – reassuring them." (W502).

Relating her personal experience, another doctor told how she ha**d** observed**:**

"cancer or serious illness diagnoses delivered very badly…. a consultant has come along and just said it's cancer or you've got some cancer, this is what we're going to do." (WX05)

A similar experience occurred, where a doctor's callous behaviour left an impression on the medical student narrating the episode, so much so that she lost respect for the doctor:

"[the doctor] went and told someone they were going to die. But she had no idea, he literally waltzed in, was like, 'Hi, how are you feeling?' And then it was literally just him being like 'Yeah obviously with you being a lot worse so I just feel like we need to come and tell you that obviously things aren't going well and you're probably going to die in hospital." (W205)

The most commonly held position is where there seems to be an impasse or a clash between the beliefs of the patient and those of the healthcare team, it is important to avoid this escalating into mistrust, therefore:

"The only way to get around that is to recognise that there is a difference in view and maintain open dialogue but be aware that however much you say in open dialogue, there may be a point at which you can't get the message across any further, but where

others coming in and saying the same things but from a different perspective, can be very valuable." (BX05)

This has lead more experienced doctors to give the following advice to junior doctors:

"[W]henever you have a patient that is not straightforward …. a patient that has chronic issues, that has social issues, that is frail, that is elderly, then when you have that or somebody that has either mental health or personality issues, then one of the things that I will do is I sit down, I introduce myself to the patient and then my first question is, "How can I help you?" (WX04)

This, the doctor considered important; because according to him this is how patients become amenable to discussion, and provide information which gives new insights into their illness, and helps make holistic treatment plans. This requires empathetic communication:

"I think you have to, I suppose, temper your objective, rational facts for your decision-making process in a way that comes across as empathetic and sympathetic and looking at a bigger picture view beyond the current situation; and also to help parents to think about things from their baby's view." (BX12).

8. Recognise limits to treatment

Taking the whole picture into consideration before making decisions also requires doctors to realise the limits of their treatment decisions. Most thought that recognising when a treatment is no longer likely to be beneficial is not only important because of resource limitations, but more importantly it can avoid unnecessary treatment which is undoubtedly in the patient's best interest. There are doctors who would treat patients at all costs, because of the pressure they are put under by the family:

"so they [family]wanted absolutely everything done for her; they wanted a bridled NG and she pulled out two or three NG tubes…... so all you were left with was the family demanding unrealistic things." (N103).

There are some instances when doctors themselves are keen to continue treatment either because 'not treating' does not sit well with them, or through fear of litigation / complaints; i.e. practicing defensive medicine:

"[T]here are some consultants that don't like to put people on end of life. It just doesn't sit well with them. They don't like to deal with palliative care and end of life, because their idea is they want to fix." (W101)

By contrast, , there were a few episodes narrated to the research team in which doctors did not discuss with the patient or family all the treatment options that were

available. The participants were of the view that this would lead to erosion of trust in the medical profession, something that would not benefit them, or society:

"The patient did say that they felt that not all options were discussed at that opportunity; because the patient, who enjoys reading extensively about their health, looked at lots of things online and thought that there might have been lots of other options to be discussed that weren't. And so…I suppose that affected the trust that the patient had with the doctor." (NX03)

However most were of the view that it is important to realise that when the harm caused to a patient by a treatment is exceeding the benefits it was intended to provide, and in line with the best interest principle, that treatment ought to stop. Describing an episode involving a patient with hypoxic brain injury following a cardiac arrest, a doctor considered that the cardiologist's recommended medication, although keeping the heart well vascularised, was compromising the patient's quality of life and so thought:

"[T]his is a man with a poor neurological prognosis where if he hasn't got blood pressure that's perfusing his brain, that might actually impact on his alertness and stuff; and so there may come a point where we actually have to say to the cardiologist, 'Actually, we're stopping some of your medication. We accept it may… result in a shorter lifespan, but if it's something that's going to keep his blood pressure at a level that keeps him cerebrally perfused and able to function then he's got quality'. That would have to be a 'best interests' discussion." (BX05)

9. Approachable Mentor

Participants described their experience of mentors, both positive and negative. They spoke of the importance of mentoring, role models and structures which enabled and facilitated good mentorship. A good mentor was variously described as approachable, someone who did not provide solutions but who asked questions, and built the confidence of others. Poor role models were absent and/or unapproachable. There was a perceived impact of mentoring on the quality and safety of care: good mentors demonstrated and ensured that conversations with patients were more inclusive, and that proposed treatment was safe and appropriate. The experience of less approachable mentors was that patients were not always fully included / consented, and that juniors did not always check or get reassurance that their approach was the most effective in that situation.

A good mentor was described as someone who is approachable :

"So, she is really, really empathetic …..She made time to listen to what actually mattered to the patient, and often that wasn't how soon they could have the complex surgery that they needed, but when their partner could visit, or [something] really simple….She was always approachable, but also, I kind of learnt that to be empathetic and caring, you don't have to be a pushover." (BX07)

It was also emphasised that this was a two-way relationship; mentees being willing to ask for help and mentors willing to explore a decision.

"…it's maybe not decision by decision that needs to be covered, it's that moral compass and willingness to explore options and discuss and talk to other people about it and confer, that's I think probably where the education needs to be; it's the willingness to ask for help and to talk things through." (B504)

Some senior doctors were described as aloof or unapproachable, or simply:

"rude and quite obnoxious" (W104) and *"not wanting to make themselves available… would come across as brash and disinterested in wanting to move things forward" (NX03).*

"if you are not approachable and the junior is scared of asking because everything he has received so far is bad temper, then your knowledge is not passed on." (WX02)

This could impact directly on patient care in that:

"Well, you just get on with it but it makes you feel less likely to care about what they say, less likely to call them if you've got a problem, which is a bad thing, less likely to I suppose… well, you just don't enjoy your job as much when you're with those sorts of seniors." (B110, Follow-up)

"…if it is a closed-door policy, even a junior struggling with ethical decisions, why would they turn to their seniors?" (N507)

Mentors also attempted to ensure a blame free environment , an experienced doctor described their approach:

".. the most important thing, is never, never scold them … you could be rigorous, but … never be hard with them. Because one mistake that a lot of our colleagues do, because it's the way we were trained, is being very hard…told off…..that really drops the confidence of anybody to the floor… The best thing is if there has been a mistake or if there has been a wrong decision, just help them to see that by themselves… to analyse their own actions and their own thinking process. And then what I normally do is try to offer them the view of, 'Have you talked to the patient? Have you asked the patient? What do you think is best for the patient? What do you think that the patient wants?' And trying to force them to put on the shoes of the patient or the family, trying to build a bit of those patient wishes and trying to show them how you can… flex the guidelines without being in a risky area. So, to what extent you can be flexing the guidelines and still not be putting the patient at risk." (WX04)

An approachable mentor was described as available but someone who listened and questioned as opposed to being directive and providing immediate answers, but who

also safety netted where needed.   Discussing a patient on their operating list with a perforation:

"…that's the element of just being honest and to talk through with the juniors that, 'This is what's going on in my head and if I can share you my thought processes, even if my thought process is wrong and .. (the) person did not perforate, you at least understood where my thought process was and you're still developing wisdom based on that alone.' So, I think from a knowledge point of view, the first part is not just giving them an answer. So, I think quite commonly you'll get medical students or junior colleagues that are almost – that will present a case to you and expect you to give them an answer, rather than get them to work through it : 'Well talk to me about it, talk to me about what you think it might be …'. So, I think the first part in allowing people to be wise is to make sure that it's not a one way flow of information, that actually the more we talk to each other, both peers and senior colleagues, the more we talk about it, the more we allow ourselves to explore the areas that we're weak at and to recognise our own weaknesses and our own thought processes, that we can all become wiser." (WX09)

There was a balance to be struck between mentor and mentee which partly depended on the level of confidence of the mentee, as this might determine the safety of care provided:

"…you do have a little bit of confidence given by your seniors to do things, so they tend not to scrutinise your actions that much, which is a good thing; but it can also be a bad thing, because you can gain too much confidence in yourself." (WFY203)

"So some of my other colleagues, who have consultant ward-rounds every single day, and every single decision is screened through by the registrar, they tend to not think ahead about discharge planning and things, and they will just carry on from the previous day's plan." (N101)

The relationship between mentor and mentee was seen as critical, and not always easy. One experienced doctor discussed working with an older male from a different cultural background who did not like being supervised by her as a younger female, but who was grappling with the need to make:

"good enough as opposed to perfect judgements." (NX07).

Providing effective mentoring takes time as explained by one early career doctor:

"I think one of the problems with some of my bosses and seniors is …they don't communicate their thought process to the juniors; so they will just say 'This is what we are doing, of course he shouldn't have this.' and you never get into why, and the better teachers are the ones who will take a bit of time to… it's so helpful when you

have those seniors who are… who voice what they're thinking and alk to the team."
(B104) and (B104 Follow-up)

Shadowing and observing senior doctors was seen as helping not only diagnostic and other clinical skills, but also communication skills:

"…but I've just picked up certain phrases from listening to the consultants and the SHOs do it and kind of just gone with those really." (N106)

"I think shadowing is important. Trying to learn something in this session that might be transferable to other areas… try to see how I do things, how I interact with other people and then try to put yourself in my shoes. If you were me, how would you have made that decision?.....I think there are roles for role models, but I think human beings all have flaws, so therefore my experience tells me that it would be a myth if I rely on one person as a role model, or rely on one person for everything. So, my experience tells me that some people inspire me in different aspects." (NX05)

In addition to the attributes of mentors, structural issues were seen as impacting on mentoring and included factors such as doctor numbers, and changes in the organisation of medical training meaning less time and less emotional investment in mentoring:

"I think the pressures from the seniors are fed down now more to the junior tier… as the senior doctors tend to be under more pressure they are probably less able to support the juniors and nurture them, care for them, than perhaps in the past. It doesn't help that our juniors come through for a four month block now, whereas it was six months when I was training and I think that makes a difference because senior doctors, senior nurses see less incentive to invest in them because they're not going to be there as long. So it's almost .. 'Well I'll just get them up to speed and then they'll be gone,' which obviously is a big loss to those individuals and to us. Like morale generally within our department, within our Trust as a whole is pretty patchy.. pretty flaky to be honest." (WX03)

I think they were very stressed, and when I went to them about not knowing what to do with a patient, they, almost, shot me down, and I felt then, I couldn't go back to them about it." (W101, Follow-up)

Some structural changes were welcomed, MDTs and grand rounds were seen as providing:

"…opportunities to discuss difficult cases…[especially where] .. there is a team dynamic which enables that free flow of discussion." (BX05) But there were some specialties: *"Although the structure might be there, the atmosphere might not…"There's so much posturing and, 'I'm cleverer than you' and all the rest of it that actually it becomes a bit counterproductive.." (BX05)*

Along with the restructuring of medical education, a shift to a more consultant-led service and an overall more risk-averse approach has also reduced practical clinical experience for doctors in training:

"As I've gone through my career, some simple things like stitching up an episiotomy I did as a medical student, and they used to call us as medical students when the lady you'd delivered, come do the stitching and then that stopped because it wasn't safe and it went on to being the SHO, the next grade up that was called. And now really even some of the Registrars will come and ask us to watch them stitching up a difficult episiotomy. So, it's drifting towards much more of a consultant delivered service rather than … a consultant led service (BX13)

An Emergency Department consultant's experience and intuition made him suggest not discharging a patient from ED who went on to show a full blown myocardial infarction on his electrocardiogram. But he couldn't explain why he had suggested to the junior doctor not to send him home:

".. sometimes it's clear, and certainly one thing I try to do when I'm on the shop floor and have a case presented, is I try to help people develop their own decision making process by trying to get them to think about what they would do, why they would do it and why they wouldn't do something else, rather than just saying, 'What are you going to do?' But there is still that bit of learned instinct and it's how you fit that together with what you can teach people. And then there's part of experience I think that experience gives you that's difficult to teach, but you can't turn somebody who hasn't seen enough cases into someone who has the experience to make accurate decisions." (WX03, mean)

10.   *Balanced approach*

Keeping a balance between medical and social considerations /needs is an important virtue to many of the participants and a holistic approach is required where doctors bring the practical wisdom, technical and communication skills gained from their past experiences to bear, in order to:

"[A]djust my skillset to the different patient and depending on the presentation and depending on the characteristics of the patient, bear on the case at hand and make a decision…. I would say that is what my experience has given to me. It's not only the knowledge; I have got the knowledge, but the knowledge is one of the skills [along with] the communication, empathy and others." (WX04)

Although there are instances where, the decisions made are *"more formulaic and less wise"* (NFY201) generally the approach needs to be more *"a list of needs rather than a checklist of jobs"*. (NFY 201) One experienced doctor stated this explicitly:

"…we have a holistic view of the whole person, so they're not just a heart that's been damaged with the rest of the body attached to it; we've got to look at the whole picture." (BX05)

Some find that the holistic *management* of a patient with an illness, with all its attendant social, emotional and multi- disciplinary and agency aspects, is more difficult than simply *treating* the patient's physical illness on its own:

"Yes, yes because it is this limitation of ways, it is this difficulty of managing an illness rather than treatment of an illness which is the more interesting bit, the more difficult bit and there are never going to be mathematically accurate answers." (WX06)

Some of the doctors progressing through their early training reflected on their ability to have evolved from making clinical decisions informed by their clinical knowledge, and guidance from either senior doctors or specific guidelines, to making holistic care decisions. This approach is underpinned by their enhanced ability to gather a *"deep understanding of all of the patient's needs"* … that *certainly strengthened when I finished my F1 year." (NFY2-01)*

In the context of seriously ill children, decision-making in conjunction with families was seen as being enabled when doctors are able to:

"…temper your objective, rational facts for your decision-making process in a way that comes across as empathetic and sympathetic, and looking at a bigger picture view beyond the current situation; and also to help parents to think about things from their baby's view." (BX12)

11. Reflective

Reflective practice was generally seen as enabling learning and the development of skills in decision-making. Some focused on the formal mechanisms which enabled reflective practice such as reflective diaries, GP appraisals, significant event analysis and debriefing sessions; while others described less formal sharing of stories. All of these formal and informal reflective processes are about reflection 'on-action', whereas doctors and medical students also spoke about their reflection 'in-action' (reflexive practice) and how this was developing and enabling them to make wise decisions in the moment.

The benefits of reflective and reflexive practice were summed up as:

"I think reflecting on practice is essential… I think it's important in terms of wise decisions, that people realise the basis of wise decisions reflecting in and on practice. I think it's also right that we would tell them… job satisfaction actually, reflect back on what you'd done, your contribution, and how you managed it, including the painful… 'actually it's something I can incorporate in'." (BX02)

Medical students discussed various examples of reflection after an event/ 'on action' and one spoke about the process of reflection itself:

"Yes, definitely. I think there's a lot of reflecting. You have to reflect for our e-portfolios, ..thrilling.., but you do a lot of internal reflection as well. Every time I see a senior and see how they've made a decision, there are some ones where I think 'Yes, I get why they've made that decision', and then a few times, luckily not as many times, I'm like, 'Oh, no, that's a bit of a dodgy decision'…. you pick it up and you think, 'Well, would I have done that myself?'." (W209)

Reflection was seen as a key part of learning:

"I think often, as with many jobs you're very pressured at work and you just sort of get through the day and get to the end of the day, and unless you have the time and the will to think about things then and go on and sort of seek ways to improve your learning and your own decision making or wiseness then you won't improve unless you want to… and it's trying to learn why it went wrong, and what could be done better." (WX11)

One medical student had lingering concerns from her time as a healthcare assistant, and a patient who initially refused a urinary catheter on religious grounds:

"…then I actually still think that the patient's values, I am not sure if we actually respected it well, and I am wondering – and it is something that we are talking about years later, I am still thinking about it today. Did we make the right decision or not?" (N507)

The way in which reflection can be used in a positive way to build practice, rather than leave lingering concerns, was described by both an experienced and a foundation year doctor:

"…you need to be humble enough to review it, to revisit it and to say, 'Okay I may have been doing it wrong, let's review again, let's review what happened, let's review my own process, how I made that decision', and if, after that review you get to the point that you think that you did the best decision, then you need to hold and you need to defend that decision. Because at the end, we are the advocates for the patient, especially if the patient has no capacity." (WX04)

"We definitely share stories and it's probably one of the main ways we either relieve stress or just vent frustrations. And, yeah, a lot of the times can be for advice or for just support, because everyone makes mistakes… speaking to people really does help, because otherwise you would probably end up quite depressed and probably quite neurotic in some ways because you can't be hyper-vigilant all the time; you'll second-guess yourself and that way you will probably end up doing more harm in some ways because you need to be confident and you need to realise when you're 'umming' and 'ahhing' and thinking, 'Okay, either I don't know what I'm doing or I know

what I'm doing and I'm sure of myself'. You need to think about what you know and why you know it, and just work it through from that side of things." (B103)

Reflection in-action, or reflexivity, was seen as a continual and informal process of development:

"I guess mechanisms in place to self-check and self-regulate yourself and maybe that is part of being wise. Like that kind of self-reflection on the spot to say, 'Have I completed everything I need to do?' and to take the time." (W101)

"So, the learning process is that constant, cyclical, 'What have I done? What shall I change about it? How am I going to change about it? How am I going to get better?' forming a plan of how to get better and then trying it and developing again the next time." (WX09)

"…once you notice the dilemma or the situation, I think you should already be reflecting on it. It doesn't have to be in a formal way, reflection is essential to developing as a clinician; so even if it's not going to change the decision you've already made, in some cases it might." (B108, mean)

Observing reflection in-action, a foundation doctor was able to see an anaesthetist in an obstetrics and gynaecology theatre list take a step back where it was becoming unsafe to continue reversing an anaesthetic:

"They made a decision to keep her under anaesthetic to get her back on the operating table. I think that was something that required the anaesthetist, for her to step back from the situation and think actually, 'I shouldn't continue what I'm meant to be doing now', which you might initially think is the best thing to be doing, and to look at the whole picture, taking a step back and change the plan of what she was doing." (W107)

For some there was a concern that debriefs and reviews did not have any lasting impact, or a conflation of these processes with investigations and the apportioning of responsibility or blame. These doctors were on the whole negative about the process of reflective practice, or the feasibility of finding or making time for it. The term 'navel-gazing' was mentioned in two interviews where doctors were reflecting on the value placed on decisiveness; and where reflecting 'on-action' was seen as prevarication:

"You can make all these recommendations at the end of these reviews, but then does anything get done about it? You sometimes wonder if the investigation process is necessary and has to be done. It's always the same factors that come up. Poor communication, poor this. You know, so the same mistakes repeat themselves." (NX07)

"…in a way, I respected his decisiveness for taking a practical course of action and moving things on rather than perhaps [taking] a slightly more navel-gazing approach." (B108)

There was a sense that this attitude was slowly changing, but some doctors were still aware that they may be labelled as 'navel-gazing' for taking time to reflect on a decision:

"I think because I am a little 'navel-gazing' and a bit reflective generally, I think I understand a lot of my processes of how I make decisions. Also how sometimes I might procrastinate about a decision." (BX03)

"I mean we kind of laugh, we're [not] in tree-hugging stuff anymore, this is the practical appraisal. I've been a GP for eighteen years so I remember maybe ten years ago there would've been debates about this, whereas this is the norm now; so your most undemonstrative doctor will still understand it, they understand why reflection is important." (BX02)

Being a reflective and reflexive doctor takes work: some commented on the difficulties of achieving this. A GP appraiser remarked:

"Probably the commonest feedback that I get it tends to be the difference between being reflective and non-reflective…. we meet and have conversations around what's happening with the work, so it tends to be a doctor who just isn't doing the work around being reflective. So in that case … the feedback I'll give is, 'Look, I thought it was great you've written up this but you haven't really reflected on this. Sorry, but go off and do some work and come back and have a chat about what did you really think'. So you're trying to just encourage people to reflect on practice." (BX02)

The pressures of work were seen as detracting from reflective practice. A diary entry highlighted the importance of reflection, but indicated that ward pressures meant there was limited time for reflection: the diarist felt the focus was on learning from mistakes and avoiding investigations. Another diary entry discussed the care of an 80 year old woman admitted to hospital with sepsis of unknown origin, where medical opinion differed, and the doctor had to *"remain objective and not judgmental, and this does require reflective thinking ..the fast pace of patient care in acute medicine, high demand, constraint of capacity and even competencies does put on strain on the services of medical providers. Reflective practices become difficult. This may easily translate into deterioration of services and poor patient outcomes." (WX06)*

Speaking about consultants who did not consult or reflect:

"I think it is a bad doctor that goes and makes rash decisions and is very confident about what they are doing, however much experience they have because I have seen consultants make rather dubious decisions and be very confident and forthright with it and because they are consultants everyone respects their decision and ultimately it is their responsibility….but the really good consultants …it is that knowing your own limitations…that reflective practice and there is a recognition of that in medicine but it doesn't mean everybody does it." (W108)

However, the decisiveness aspect was explained by one senior doctor as necessary in the moment:

"It's interesting because we do debriefs sometimes after difficult resuscitations… people have gone, 'What are we going to do?' And everybody has looked at me and I'm going, 'We're going to do this.'…everybody goes, 'But you looked like you were really sure about it,' and I said, 'You have to be.' You can't – in that situation… you can't do this wavering, you have to go, 'This is what we're going to do,' and then afterwards you can explain it." (WX01)

A dilemma was discussed, where the medical team decided to wait for an ITU consultant to intubate a baby, and weighing up the risks of waiting versus the lack of experience in the team available immediately:

"The baby's heart stopped six times.' What's going to happen to this child? Apparently he did very well. We'd had the debrief… I had all these dilemmas about what decisions I'd made over what would have been the right thing to do. Would it have affected the outcome? And it's funny, because nobody else sees any of those [internal] dilemmas that you go through." (WX01)

Two experienced doctors described the attributes of a reflective and reflexive doctor:

" it's the light and the shade; it's both… being a Sikh background this kind of comes in to a certain extent because I think there's this sense of a good life being just quite balanced in terms of emotions… trying to reign things in a bit. So… being able to just reflect back on what's happened ..circumstances where …'No, I wasn't really up to the mark there', it doesn't even become something I need to feel guilty about; actually it's got its own function which is just to reign me in a bit. The dark alley now, and let us just work the emotions first , and once you've done a little bit of work around that now it's the time to go back and just unpick that particular painful sore and just see, 'What's that got to teach me?'. (BX02)

"… having the ability to imagine yourself in a position that hasn't happened yet, but you can face how would you react… and I tell my juniors all the time is to know yourself. Your internal journey is vital… I'm good at communicating bad news to the patients because I have accepted my own situations and suffering if I was in those situations… if you haven't done an internal journey, you haven't grown in a lot of different aspects, then when you get to that point you could become either paternalistic or not interested, or too technical." (WX04)

12.   Courage to speak out / have difficult conversations.

Having courage to speak out or the confidence to question was seen by most medical students and doctors as related to their own experience, and therefore confidence in their practice. This enables doctors to challenge when they are being asked to do things they consider unsafe or unethical, for example being asked to sign laboratory request forms for intra-operative tissue specimens which had not been labelled at the time they were taken:

"If I was a little bit less confident in my practice, I may have gone along with the registrar -that's a scenario where confidence is putting your foot down." (B105, Follow-up)

"And I think that partly comes from just being a bit older as well, because I can't speak for everyone; but I think at least if I'd been younger, I might have been more easily coerced into actions or making decisions that I wasn't entirely comfortable with." (N104)

Support of colleagues helped doctors and medical students find courage. One foundation year doctor discussed a consultant who was very bold, often stopped active treatment comparatively early and did not communicate well with families or other staff. A group of junior doctors took the decision in this instance to "step out of line", and escalate this issue because of their concerns about safety, and the poor working environment (B109, follow-up). Another spoke of the support of senior nurses when they had the moral courage to call in the critical care outreach team, to assess a deteriorating patient they were worried about, which went against the expressed instructions of their consultant and registrar (W102).

For some, there was also a need to learn appropriate ways to speak up or question decision-making and to 'get around the culture'. This learning enabled the virtue of courage to be put into practice:

"…most of the time, especially on this ward, I just say to the consultant 'This is what I think, do you agree?' Or, 'Why are you doing that, I don't understand why we're changing this?' And like they'll usually explain which is fine so I don't feel bad about challenging them. I wouldn't say I don't think they're wise by changing it, I just want to know why they're doing it. Or I'll say, if I think they've missed something I'll be like, 'Well what about this?' And they'll say, 'Oh, that's fine because of this, this and this'… most of the time it's not even disagree, it's just I don't understand why we're doing this. Didn't we try this two days ago? What's changed? Most of the time it's not disagreement, it's just [that] I don't understand." (N106)

"As a middle grade – you are more involved in a decision – which means you also would be willing to fight if I felt like it was wrong… I feel more comfortable doing it now than I did when I was more junior and that is with any discharge decision though. Experience, the feeling of power, maybe power's the wrong word but the feeling of

being able to challenge authority, others and possibly I'm able to phrase my concerns in a way that causes less dissonance for others as well." WX10, mean)

"…with me, it's always if I think something is going to really detrimentally affect a patient's safety, then I will speak up. But I'll do it more in private, and I tend to phrase it more as a discussion, so 'Why are we doing it this way?' 'What do you think of this instead?' Or, 'Would we not, perhaps, do this?' I'll let them explain to me then, why we wouldn't." (WFY205)

The medical hierarchy, along with experience, played a part in determining whether or how a more junior doctor raised an issue. It was part of that sense that seniority brings experience and therefore that senior doctors know best. A foundation year doctor spoke of a decision to amputate a women's legs to extend her life, and the registrar not agreeing with this decision:

"but it was interesting that he didn't really raise that with the consultant." (B104, follow-up).

Tradition, hierarchy and power were all external factors which made it hard for doctors or medical students to raise concerns, or to challenge; and therefore meant doctors ended up avoiding conflict.

"I think a lot of people will follow the example of seniors, and do it – 'Oh, well, they've done it, so it's okay to do it'… effectively sheep. If you've seen someone do it, or someone's told you to do it, and they've told you to do it, and therefore it's okay, you maybe will do things without questioning them; whereas that's dangerous." (B506)

Junior doctors talked of patients who 'weren't quite right', and trying to escalate, but being told "no it's fine, crack on". One junior doctor reflected:

"…should I have pushed harder at that point? When you're junior, you don't have much experience, you don't know whether you were the important cog in the wheel or it would have happened anyway." (B104, follow-up)

A medical student talked of operating theatre 'camaraderie', which extended to making inappropriate comments about a patient:

"as a medical student, sometimes you can feel very out place and unwelcome in those environments, and obviously sticking your head above the parapet could be seen as risk. The first step or action that you should always take is to try and correct it in the immediate like vicinity… if you can just say to someone, 'Excuse me, I don't think those comments are appropriate.' Obviously, whistleblowing and maintaining patient safety is our priority, and people will be protected if they do that; but I think as a student, you could quite easily be sort of kicked out of the theatre or not allowed in and then be able to justify it for other reasons than having said 'Oh, he's a snitch.'" (B507)

Individual decisions regarding speaking out were also seen as being affected by the seriousness of the issue, or the concern of speaking out against, attitude and approachability of more senior doctors. A good working relationship with more senior colleagues was seen as making it easier to challenge them or raise concerns, in that it does not require the same degree of moral or physical courage:

"So yeah, maybe the relationship between doctors and students, and doctors and doctors, makes you more vocal." (B503)

The seriousness of the situation, and the potential for causing harm or distress to the patient or family, were all noted as factors in determining whether junior doctors or medical students found the courage to voice their concerns. A final-year student was concerned that a patient might have a subarachnoid haemorrhage, and was uncomfortable that the GP was very relaxed about it:

" and I still ended up feeling as though this was a bit of an unresolved… because I didn't feel that I'd got a good, a clear answer from him as to why he wasn't worried… [and so on the advice of her tutor, she spoke to another GP at the practice]. And then afterwards it turned out that the GP I'd sat in with had… in the notes he'd recorded quite inaccurately the history of the complaint and then had recorded some examinations as having taken place that I certainly hadn't done and he certainly hadn't done… that ended up leaving me feeling really uncomfortable. I raised my concerns with the other GPs and said, you know, and they sort of said… 'Oh, it's something that happens, and I'm sure this guy will be fine'. And I'd sort of expected them to take it a bit more seriously and to say, you know, obviously if it's a misdiagnosis we need to look into it. But yeah, I just ended up feeling quite powerless as a student… but going forward it has meant I feel a lot more confident that if I feel in my gut that something's wrong, that it's okay to say I think that something's wrong; and not just to kind of go 'Oh well, the doctor knows best, I'll just kind of agree with them and be quiet'." (N502)

A fifth year student spoke of their disquiet when a patient became distressed about a possible diagnosis of cancer:

"…basically the patient asked, 'Do you think it's cancer?' and the consultant very flippantly said, 'Yeah, maybe.' and just left. And, I was just like, how can you… ethically how can you do that? So, the poor patient was there, really upset, so I went and said to the consultant, it was really difficult because obviously at that point I was a CT1 student, I just said, 'Oh, I'm just a bit worried, the patient looked really upset when you left, have you got any chance to go and maybe talk to them in a bit more detail?' and they were like, 'Oh, no, I'm busy on the ward round.' and I was, 'Well, I think they do look genuinely really upset and if you think about what you have just said, you have maybe said to someone that they have got a really serious disease.' And… eventually they came round and they took, I think one of the nurses with them

as well, and talked to the patient. I found it really hard, I did have another medical student who was on the firm with me, so I just felt better, even just having someone standing next to me, to be like, 'I don't think this is right'… a lot of us will tend to kind of try and bounce it to the F1 who will end up going up that way." (N508)

Concerns regarding the benefits of treatment, and being able to challenge and ask *"what are we trying to achieve here?" (WFY202)*, was seen as a particularly contentious area; for example the benefit of catheterising a dying patient (N108). Discussing a patient with a 'Do Not Attempt Resuscitation' order in place who was admitted to hospital, a first-year foundation doctor tried to challenge the consultant's request to take bloods and cannulate her to deliver antibiotics:

"… having to have other staff members try and kind of hold her arm down… a very distressing situation. But it's hard, because it was left for me to do it and it was an order from a senior. I felt it was unfair on the patient… I just did one attempt, and then I wasn't going to do it again, cause I didn't want to cause her distress; and then the Consultant came round, and I said, 'Look, this is the situation.' Put my opinion, kind of, forward, in as most diplomatic way as I could… tried to put it on the emphasis of 'this is what the family have said'… he was quite dismissive of it, and was like, 'well, you need to put a cannula in, you need to do this'. I was like, I don't feel comfortable doing it, like, I kind of said to him, 'I don't feel comfortable doing this.' And he was like, 'Fine.' And he said, 'I'll do it'. So, he did it… then I was still unhappy about the situation because the family was becoming upset. So, I then found the Registrar, eventually. I think, with the Registrar's input, the consultant agreed… not to do any more." (W101, Follow-up)

For those who spoke about more reluctance, or difficulty in challenging an issue, there was an association with whistleblowing and what this might mean:

"So, for example, with our GP placements, if you see something, you know, there's a line that says you can talk to somebody about it, but it's really hard in practice to do that because I think it gets associated with whistle-blowing. There could perhaps be something where if you've seen something that you don't agree with, you could actually have a conversation with somebody, not to kind of report them but to say, you know, 'Was this right? Wasn't it right? Why do I feel negatively or positively?' Like, however you feel about it." (N509)

There was also a certain perception of those who 'break the rules', in that those who do challenge decisions or instructions are labelled as 'mavericks':

"… this was one of the first cannulas I did, and I was sort of basically instructed to do it and I shouldn't. I didn't do it. I started to do it and I knew at the time that I shouldn't be doing it, and in any case the cannula wasn't in properly anyway so it didn't work, so then the person who was with me sort of took over and the procedure was sort of botched anyway. What I should have said at the beginning of that was 'I'm not happy

to even attempt to do that', and that might have then ended up the situation being different because then no attempt might have been made and then this patient actually might not have been made uncomfortable and all of those things… but I definitely knew I shouldn't have done it. I've always held onto that, because I felt bad about it. I've always thought of myself as being quite a law-abiding person. Even since I was a child, I've hated to break rules and I hate to be told off, so if there's a rule in place I tend to keep to it. And I definitely think that that's just part of my personality, in a sense, and that other people are more... you know, they're sort of, I don't know, mavericks or they're less risk averse perhaps." (N509)

13. Resilience.

Those who mentioned resilience by name spoke of the importance of being aware of their own emotions, and how they may impact on decision-making:

"I think as long as you are aware of your emotions, and that you are slightly fed up and you are not empathetic, that is good. But I have seen other colleagues who just don't care whatsoever, and I think it is good to at least have some insight into your own behaviour and your own thinking, and knowing that that shouldn't necessarily affect your decisions and your proactiveness in doing things. That is one thing I have definitely learnt I think, just get on with it." (B111, Follow-up)

"I think it is difficult. I think sometimes you realise if certain things are going on in your life that are putting stresses on you and everything, you can think actually I'm thinking a bit too analytically and a bit too logically, and I have got that personal tendency that I'm a bit more black and white if I'm significantly stressed. So I think that you've got to have some kind of understanding that you've got your own limits to what you can deal with. And I've had cases in the past, and I know we should be withdrawing treatment on this patient tonight, but I've already talked to three other families today about this and I really can't do another one. And actually going, you know, 'we'll leave it to tomorrow. They're not in any pain. They're not distressed. I know we could do it tonight, but that's enough now'. So you've got your personal insight, yeah." (BX11)

Examples were given of those whose resilience was seen as low, and the impact of this on their decision-making, but very few examples emerged of those seen to be at the opposite pole in the sense of being immune to the stress; or feeling 'bullet proof'. It was felt that when resilience is low and doctors are burnt out, it is harder to make decisions or to have difficult conversations, and in these situations doctors become avoidant. Those seen as having low resilience were described as avoidant, being unable to make a decision and attempting to defer, and this can in turn lead to poorer decisions and subsequent patient outcomes. A foundation year doctor spoke of their experience on their obstetrics and gynaecology rotation, where a birth developed into a higher-risk situation but no one seemed to be able to make a decision:

"…and the whole team were quite stressed and flustered, and there was no clear leadership.. she endured an awful lot of pain and indecisiveness whilst they tried to decide the best way of delivering the baby. It was also complicated by the fact that her English wasn't very good, and nobody really took the time to explain to her what was happening. She was in an awful lot of pain…. they thought, "Oh, we need to do a C-section," and that decision was flipped about, about five times, and it meant that, in the end, they dragged it out with forceps, and… she didn't have any pain relief, nobody had explained to her what was happening. They made cuts to her perineum with scissors, without any pain relief (B504)

Junior doctors often spoke of being left feeling uncomfortable with patients and families if they were upset or confused, after having been seen by a senior doctor, and what to do in that situation. One spoke of a patient miscarrying, and the consultant not wanting to go back to see her:

"'Oh, they'll probably figure it out some way along the line'. And (the consultant) wasn't very keen on going back and telling the patients, reassuring them that sexual intercourse isn't a cause of miscarriage." (W502)

"So that benefit versus harm aspect, I think, is very important, especially from an intensive care point of view because by keeping people alive, you can do a lot of harm for no benefit really; other than your own, sometimes it can just be your own reluctance to have those kind of conversations and that, you know, with relatives." (BX11)

"Well enthusiasm, you have got to be enthusiastic about what you do, and if you are burnt out, again it comes back to first principles, because you can't work at full pressure indefinitely." (NX02)

Conversely, doctors spoke of good will and 'going the extra mile' and the resilience this depended upon; but acknowledged that it does take its toll, and how important it is to try to switch off:

For as long as I've known the health service, there is a huge level of goodwill among staff and if you took that away, the health service would probably fall over tomorrow. And we rely a lot on that, and there's a bit of a barrier that says we shouldn't have to rely on that so heavily. I suppose that's the bit, you know, trying to change at high levels. But there's also the feeling of well, that's fine, we can have discussions, we can talk about things until the cows come home in committee rooms, etc., etc., but, do you know what, on the day job we have to treat what's coming at us, what's coming in front of us. I mean, the resilience within the workforce is huge." (BX10)

"I think that is tough; you have to become quite mentally tough to park things, and offload them at an appropriate time, because otherwise it starts affecting your judgement and decision-making for the next patient. For example, on Friday, where the paediatrician had been on call the whole week, starting at 8.30am and finishing at

8.30pm, and by Friday evening, he was absolutely shattered – and actually, there was a massive queue in ED, but he said, 'I'm too tired to make good decisions about this. I'm going to have to hand over to the night staff, because I can't do them justice.' He said, 'I'm going to have to go.' so he handed over, and let someone fresh have a go, and start fresh, because otherwise... you often feel like you want to help people, and you should want to stay and put in the extra hours, especially in paediatrics when they're very vulnerable people and you want to do the best of them; and that knowledge of, 'Actually, I'm not going to do a good job here,' and being able to step back and say, 'Now, someone else is going to do this job, just as well as I can - probably better, the state I'm in,' I think that's quite good ethical practice." (B506)

"I think I notice it throughout the day if I am just sitting doing a million jobs that I don't want to go and do, and that I would rather just do X, Y, Z first or hand it over. While I am at work I think about it, and I make myself go and do things that I don't really want to do or conversations you don't really want to have with families because it is a lot of work, but you have to. I don't think I ever take it home, I almost purposely always go via the pool, or go for a run as soon as I get home to sort of keep that distance. I always do something before I go home to sleep, to turn my brain off, just to get rid of it." (B111, Follow-up)

In addition to personal coping mechanisms, other enablers of resilience were seen as being team support and communication. Without these, personal resilience suffers. Doctors talked of difficult decisions which had not worked out well. Patient complaints, for instance, and times when they had been overruled on a treatment plan were described as hard to process and needing resilience on their part; but that resilience also stems from being sure at the time that you are doing the best for the patient. One doctor saw that the best way to cope with these difficult times was feeling valued in local teams:

"… that recognition, that camaraderie within a team, I think, is much more important. That's what builds your resilience." (BX10)

The example this doctor gave was of the co-ordination and 'extra mile' required to deal with a difficult road traffic accident, including the high risk transfer of one patient to another hospital:

"So trying to coordinate that sort of activity and that sort of transfer and that risk of transfer is quite a big thing… the retrieval team came in the early hours of the morning, 2 or 3am. I think I was in for 16 hours that day… I think that's when the healthcare system especially just comes really into focus and everything happens. And that's the bit that sometimes people don't see. And when I say people, I mean even people who work within healthcare. So other consultants might not necessarily understand the amount of coordination and the work between different teams that actually goes on, never mind the public perception of it." (BX10)

Stressful situations may not be recognised as such at the time; recognition of stress and its impact on the individual can come later, and so it is important to review and pick this up later. One experienced doctor discussed treating critically ill babies, and decisions regarding whether or not to continue treatment; and spoke of the feeling hour-by-hour of not knowing if the baby will live - *"it's too much adrenaline really."* (BX12).

"Everybody has the inner turmoil because you can see everyone asking 'why are we doing this?' And quite often people, when they're in the situation, don't even recognise what they are, but when you talk about these things a few weeks later and they've had time to reflect and then discuss it, they think well actually, at that time I really felt uncomfortable with that, but I didn't know how to tell anyone. And it probably may have affected the dynamic between how I related to the parents, how I presented facts to them, because I felt I wasn't really entirely comfortable with what they'd done or anything. And again, allowing people to acknowledge that, even in the time, you can say to them actually it is natural how you feel, it's not a problem about it, but what we've got to understand is that we're not the mother, we're not the father… actually, it is about bringing the positive elements out with people, so that then they can kind of decide yes, actually I can still do a good job here." (BX12)

The constant pressures and different demands meant doctors being pushed and pulled in different directions. An experienced doctor, described a patient who could not speak but who they managed to communicate with and to establish that they had capacity and did not wish to have their PEG tube re-inserted. For this doctor a trusted coping mechanism was to keep the patient in the centre:

"… as a decision-maker, we are pushed different ways; we have our organisations pulling from us, we have the patient, we have the family, we have our own knowledge. So these kinds of forces, they are pulling in different directions. I always go first for the patient, and I have always gone first for the patient. Sometimes we don't talk enough to our patients… (WX04)

14.   *Phronesis*

The development of practical wisdom was seen by many medical students and doctors as a process of time and experience. One medical student termed it *"learned experience"* in conveying information and reaching decisions with patients (N203), while a foundation year doctor spoke of it as being a mix of nurture and nature (B104, Follow-up) and for an experienced doctor:

"…some people are inherently wiser, they are really wise people…now, whether that wisdom is inherent or … is simply because that person has walked past that journey ahead of me." (NX05)

A fifth year medical student spoke of a GP weighing up options to ensure confidentiality, and how difficult it is to teach that to medical students, when they do not have as much life experience and haven't been in such difficult situations:

"The GP made that decision very quickly… but they'd got a lot more experience in real-life situations, where things aren't clear-cut… that's where experience helps you… thinking about the potential consequences." (B506)

Another foundation year doctor summed it up succinctly, recollecting a diabetic patient who had lost his wife to cancer and was not taking his insulin - *"I just find medicine's all through experience, really." (WFY 206).*

Experience can, however, lead to ingrained negative behaviours and an assumption that you know it all. A foundation year doctor recounted a difficult birth where there was no pain relief for the mother, and the consultant seemed to show a lack of compassion for the mother in focusing on getting the baby out alive. They concluded that selection of candidates for medical school was critical, and:

"… experience makes you better at making clinical decisions… but not necessarily in terms of ethical decisions… a lot of people get stuck in their ways." (B504)

Assuming that you know it all and following a text book approach can cause a doctor to be caught out:

"You can't make a decision based on what the textbooks say… because if the textbooks say it, you can only say that that's right 99% of the time. There will always be the one case that will catch you out if you treat everybody the same… there's things that are really rare, but they still happen." (WX02)

An experienced doctor highlighted another risk that arises with experience and seniority :

"you may not consider little issues… with experience, you have to be wise as well; or be sensible, and not be arrogant or foolhardy." (BX04).

Similarly, another experienced doctor reflected on a senior consultant who regularly over- ruled on the basis of experience rather than knowledge*:*

*"Because evidence-based medicine tells you something else, but the experience of this doctor was something different, so there i*s*, kind of, a clash between the two, rather than both going forward in a symbiotic relationship…. Which is why I'm wary of saying that wisdom is the most important thing " (NX04)*

For some medical students, *phronesis* seemed to be narrowly defined as diagnostic skills as opposed to the broader process of decision-making (as described by foundation and experienced doctors):

"You know you learn by example, by following what someone else is doing… the art and the science of medicine… you need the clinical knowledge and then you need the experience to know how to apply it and when to apply it… when you get very experienced… people hardly use the knowledge; they use the kind of pattern recognition and diagnose someone kind of walking through the door." (W207)

Another medical student also spoke of consultants with a *"repertoire of patterns"*:

"… so it is very difficult to build up that sort of bank at this point, but by having people telling us stories and then kind of recognising the common traits in these situations, you build your own like portfolio… so in the future, you could hopefully make the same links." (W209)

If wise decision-making is narrowly defined, then there is a danger that its complexity is underestimated; as one experienced doctor explained:

"I don't think we do much talking about decision-making… and the interesting thing about juniors is they underestimate how much knowledge and experience has gone into the decisions." (WX01)

However, experience and 'time served' were not enough to guarantee wise decision-making, and certain other virtues were seen as key to phronetic decisions; particularly being reflective, *"open to insight" (WX04)* and being consultative, '*"it is always questioning what the right thing to do is and … get everybody's views as well as their own. And respect everybody's views. And be approachable as well… people being able to say, 'Are you sure about that, boss, or shall we maybe try this?'" (B110).* Consultation was seen as enabling wise decision making by tempering those inclined to be too bold:

"the majority of us still work in a MDT, sort of, a setting so I think from the patient's perspective by and large it evens out." (BX08)

Phronesis was variously described as the collation of holistic information, both clinical and social, from different sources; and being able to weigh that up against protocols, guidelines, various situations encountered in the past and then getting other

"opinions, other approval, putting the situation to a new pair of eyes, and saying okay this is what I have got here." (B106).

Many found *phronesis* hard to pin down, to define: wise decision-making and the skills employed to reach a wise decision were associated with a sort of gut instinct, what one GP called *"a sixth sense" (NX02),* while another described their recent hospital experience:

"I rarely think about ethics when you're making the decision; I think it becomes part of your working process that you have a gut feeling that summarises your own views and

morals and you do make decisions like the one for CT, that you will make a decision because it's possibly the safest decision at that time, or for patients who at 4am… whereas actually at 10am in the morning you might have made a different decision… your ability to judge the risk or the risks that you're willing to accept at 4am […] may be different than at 10am […] so I think sometimes yes, you admit patients for your benefit." (WX09)

A fifth year had observed a psychiatrist who was good at knowing what normal and stable looked like for his patients, and:

"having that sort of personal relationship and building, you know, and revealing to them a bit of his own character. So, I guess then if that's sort of a practical wisdom that's not something that gets taught, that's just something you have to sort of intuit a bit." (W506)

One impediment to wise decision-making and practising *phronetically* is time, and the need to short-circuit the process by using gut instinct:

"So, your wisdom – I think probably age is where my wisdom comes in the most, because it starts to move away from what the textbooks say, 'This is how it presents' to actually developing that idea, that feel of… the more grey areas of medicine, rather than almost the black and white that medical schools suggest that presentations are… it's complete gestalt, you have nothing… you've got no data, no evidence that you can prove it on but your wisdom is equally saying, 'No, that needs – we need to dig a little bit deeper, we need to do something different for this patient and I can't prove why yet' and you equally know that sometimes that will be wrong." (WX09)

There are also occasions when making a wise decision means deferring the process. Some doctors spoke of the need to 'buy time' to reflect, to await more information, to take advice and thereby avoid making rash decisions, or prevent being unduly influenced by difficult conversations with the patient or family. It was about:

 "being deliberate, going slow; especially when dealing with patients and families from different cultures." (WX06).

A foundation year doctor spoke of how they *"played with time"* in order to get the advice of a dietician on an issue that was a *"bit beyond their depth" (N103).* A final year medical student observed a registrar who bought some time to think, by saying to a distressed patient in labour and her husband that he was going to check on all her results and would come back:

"[He] bought himself some time to think about how to say what he was going to say. It was only with hindsight that I realised that was probably the main reason for doing that, because he knew most of the blood results; but actually, we then went back 10 or 15 minutes later, and what he said was articulated so much better, and just worked

really well – and I think him taking the time to think about what he was going to say, and how he was going to say it, was the main reason that it was done so much better after." (B504)

An experienced doctor recounted a colleague who used a process named:

"'MICLO', which stands for 'Masterly Inactivity with Cat-Like Observation'… because in some situations, inexperienced people would jump in to do things which weren't necessarily the right thing to do, and that sometimes the wisdom is to actually sit back and watch what's going on rather than do that kind of instinctive jump in and do things which actually aren't necessary and not in the long term best interests of the patient." (NX01)

Not taking time can lead to unnecessary escalation of issues as seen on one 5th Year medical student's psychiatry placement:

"The doctor seemed completely jaded. He didn't seem to be putting, you know, commitment or effort into the decision making… a woman was unhappy with the care she was getting, it just escalated, completely unnecessarily, into a full blown argument… I just couldn't believe it… they were fuelling each other; I couldn't believe he just didn't step back and try to see the situation for what it was." (W509)

Without resilience and time, and in the context of limited resources and information, less wise decisions are made. A foundation year doctor observed the difficulties of making an ethical decision around the withdrawal of active treatment, where more time and insight into the patient's baseline and current functioning might have led to an earlier decision on withdrawal. The patient had been admitted at night and:

"… it was much more difficult to get additional information from family members in the middle of the night and the team is also more pushed in terms of staffing at night… you don't necessarily have the time to invest. The patient was transferred to another hospital for an operation but they didn't operate for 24 hours, so actually, they did have the time that they could have done a bit of digging and then changed their mind; but I feel perhaps that element of, 'We've already made the decision we're going to operate, so we're going to operate.'". (N107, Follow-up)

Phronetic decisions were seen as the avoidance of the rigid application of rules and guidelines, what was termed by one experienced doctor as the *"protocolisation of medicine"*. A foundation year doctor described a consultant's decision to not 'red-card' a drug user found injecting heroin in the hospital toilets, who was due a life-saving operation that day : "the rules were applied but also there was some practical wisdom applied " (B104). Similarly:*"… it's the human factors that we want from the doctors, and that's why we can't just use an app on your phone to work out your symptoms." (N102)*

Conversely, one foundation doctor spoke of a patient in unacceptable pain; but how in some specialties compassion fatigue can set in and *"people become accustomed to people in pain." (B504).* Most noted that a balance was needed in the use and interpretation of guidelines and protocols; as suggested by another foundation doctor:

"Even with registrars, nobody's rewarding anybody for being too maverick about things these days. But with people becoming more ill and more complex and having multiple comorbidities… the traditional model of protocol for this, protocol for that, doesn't work when you've got several things going on… Otherwise, you're going to find yourself being told off by the coroner, type of thing." (N105)

"… sometimes people think about ethics in very functional terms… [but] it's very rarely about the black and white, it's much more about asking questions of what is or what could be. It's a good decision, it's a wise decision, it's a balanced decision, a decision that incorporates, it's the head and the heart, it's all of that… the best decision that we could probably make at this time; and equally there's a sense of on-going reflection as well, that it's not necessarily cast in stone." (BX02)

Phronetic decisions were therefore seen as practical and sensible approaches, requiring good communication skills:

"… some trainees… are clearly much more naturally intuitive, perhaps more naturally sensible… we are both quite good with common sense, we're not high-flying academics, but we've got our feet on the ground and we can make a sensible decision." (NX07)

"… you can learn everything about medicine, but if you don't ever practice it you won't develop the confidence or reinforce that knowledge in a way that is practical." (WFY201)

"… where wisdom comes from, it's a lot of thinking back to your past experiences and what you did badly, what you did well and trying to apply that… You've just got to think about in an ideal world what you want to do, and then think how you could possibly get as close to that with what you've got." (B110, Follow-up)

15. Resource awareness.
Linked to the virtue of fair distribution of finite resources, according to most of the participants, was the issue of resource constraints. Some were critical of wasting resources for reasons other than the best interest of the patient. One reason was fear of litigation leading to the practice, or a culture of defensive medicine. Narrating an episode where the consultant shifted an elderly patient to Intensive Therapy Unit (ITU) for non-medical reasons, this participant thought:

"He [the consultant] then overrode that [Do Not Attempt Resuscitation Order] and put that she was for resuscitation… and kept her on ITU until all the family could arrive and say goodbye to her and then we could switch everything off… I think he was trying to take the least litigious route that 'This family are going to complain afterwards, and that's going to be a pain to deal with.' The outcome was never going to be good. Resource-wise, people shouldn't go on to ITU for that reason." (BX03)

"I think it would be useful to be able to go through things that we're likely to see and likely to have problems with, and discuss different decisions. Especially when you think about different availability of medical equipment or beds or things. Then it's quite hard to make decisions, because we really don't see that side of things. (W501)

Some students found it easier to come to decisions using the Principlist Approach. One participant responded how non-maleficence and justice would guide them as to whether or not to allow a patient, who would not respond well to treatment, to occupy a bed in the ITU:

"And then justice in terms of being in ITU, it is a consideration that it uses up a lot of resources for someone to stay there long term and was it really right to just keep her in ITU and see how she progresses knowing that it was very likely that she wouldn't get better. And so in terms of justice it was probably right to just turn off the ventilator and let her die" (W503)

However for this participant, the more overwhelming worry was *"the legal side of things"* and so even if it meant getting some 'extra' interventions completed, or referrals made, would be best:

"… because at least you might waste resources, but you've covered your own back, so justice says it's not right but you've got to account for your own career and that kind of thing, haven't you, and you don't want to bring the patient to that unnecessary harm." (W503)

Similar sentiments but for different reasons were expressed by experienced doctors but where they considered that patient-centred decisions had primacy. They regretted being placed in situations where clinical care is overruled by resource constraints:

"[S]ometimes we are sort of forced to make decisions for the patient based on the resources available, and I think that clinicians should not be in the situation to make those decisions based on the resources… the managers and everybody will say – and the intensivist will say, "No, I think we have used a lot of the resources here, and we are not going anywhere, so I think we have to pull the plug here (BX04).

"Well actually I've only got a limited number of beds, so I'm immediately rationed by what I can do." (WX09)

Some doctors felt that although it is wise to be financially / resource-prudent, there may be times when doctors are pressurised into getting some tests done so as to expedite consultation, or allay their patient's anxiety:

"[H]e's come back and back and back and just won't accept the advice he's been given, so the temptation is that you end up trying to give him something that he shouldn't be having or doesn't need because you just want to get the consultation finished." (W105 FP)

The degree to which cost and other resource considerations impact on decision making may be differ with seniority:

"[T]there's a lot of pressure on treatment decisions to be financially cost-effective, but if I thought the treatment was the right thing, I think that decision for me would be made independent of cost or resource. I think that's probably more of a big deal for more experienced doctors, to be honest." (NFY2-01)

Time constraint is another factor that participants complain leaves them 'firefighting':

"I think we are so pressurised, time-wise and understaffed, that you end up kind of firefighting every day." (WX03)

Time allocation for each patient varies sometimes, depending on whether they are a junior or a senior doctor. Simply having the time to explain things to patients, thus having the ability to make processes *"streamlined in terms of time efficiency" (NX03)* is important.

"… they're quite good at allowing you sort of longer time to see patients… so I think that part of it is good. I don't know about when you, nearer the end of your training or when you've qualified, sort of how much time you actually get to do that, just because of the pressures that GPs are under." (W105)

"I have one look, eyeball, and then go back to the notes for a bit before I actually go and look at them properly so I feel a lot more comfortable just taking my time." (B110, FP)

Virtue per cohort and Virtue ethics framework.

The virtue ethics (VE) framework was produced by cross tabulating the 15 virtues by cohorts in order to show whether the virtues are practiced by one, two or all the cohorts (Table 6). That is, are there any virtues which transcend boundaries between studentship and practice, whereas others develop as doctors progress through their careers. The table shows that some of the virtues transcend these boundaries. These virtues are:

- Negotiate [with patients/carers] while 'doctor decides' or 'patient decides' are at the polar ends (Virtue 1).

- Make collaborative decisions / seeking guidance at the mean, with 'constantly seeks guidance from peers and / or professional bodies' and 'self – guided / does not consult' are the extreme positions; and hence a vice (Virtue 5).

- Culturally competent is a virtue, while 'only using own values and beliefs' and / or 'only going with patient's values and beliefs' are the extreme positions (Virtue 6); and

- Interpersonal communication / being emotionally intelligent is a virtue, as opposed to 'being too involved / over emotional' or 'being distant / aloof' (Virtue 7).

The table also shows that virtues4, 8,9,10 14 and 15 are more common amongst foundation year and experienced doctors. The detailed analysis of virtues by each cohort is provided as Virtue Ethics Frameworks in Appendix G.1 to G.4.

Cohort	V1	V2	V3	V4	V5	V6	V7	V8	V9	V10	V11	V12	V13	V14	V15
2nd yr.	++++	++	+++	+	++++	+++	++++	++	++	+	+	++	+	++	+
5th yr.	++++	++	+++	++	+	++++	++++	+	++	++	+	++++	+	+++	++
FY1	++++	++	+	++	++++	+++	++++	+++	++	++	++++	++	+	++	+
FY2	+++	+	+	+++	++++	+	++++	+++	++++	++++	+	+++	++	+++	+++
Exp.	++++	++	+++	++++	++++	++++	++++	++++	++++	++++	+++	+	+++	++++	++++

Table 6: Virtues /cohort

Legend: Frequency 1-4=+, 4-7=++, 8-9=+++, 10 or more =++++

The VC and VE frameworks both show that collective practical wisdom for a practice community can be brought together in the form of a virtue continuum set for the practice as a whole. These are not down to one individual doctor, although as can be seen from the framework some of the experienced doctors conveyed more of them in their stories. In terms of *phronesis* education, some argue that this can only be learned in practice; however we argue that if these are converted to moral debating resources then students and CPD participants could be better prepared for making wise decisions in their practice.

Virtues identified in the observation data.

The observations showed 10 of the 15 virtues identified in the interview data. These are presented in Table 7 (below):

Virtues identified in observational data				
Virtue	Obs.1	Obs.2	Obs.3	Obs.4
1	The way they do that is to explain all the options and the pros of cons of each one as they see autonomy as important and as recommended by NICE guidance.			*"Dr W was clear and direct in explaining to the patient he would not be going home today. Dr W went out of the resus room and fetched the patient some water, he gave him two very small sips on separate occasions while he was with the patient, and explained why he could not have more".*
2				*"At the same time, the consultant was aware of the priority patients allocated to the 'top tray' and of other patients awaiting results in order to progress their care plans".* Therefore judgement calls had to be made: to treat patients according to the severity of the disease.
4				*"consultant… on the urgent cases in the top tray and on the large computer screen on the wall which showed the bed state: also monitor the number of patients close to breaching national targets… they knew it would pre-empt issues later, and problems for the patient tracker staff, but it was not always a priority."*
5	When familiar issues arise, they know what to do; but when not familiar, they seek	An MDT to discuss 3 patients where the Registrar, Nurse, PT and	*"There is a lot of discussion between the doctors and almost nothing from the*	*"Where a lot of rapid decisions are being made; and where humour, mutual support*

	advice in the form of guidance.	OT gave their input to the consultant and then decided. *"there were concerns about patient and staff safety, restricting a patient's liberty, capacity vs. incapacity, concerns about understanding information.";* *"a lot of searching for consensus."*	*nurses or the therapists …."*	*and compassion were on display".*
7		*"… members of the MDT had an increased level of caring for certain patients based on the levels of concern they exhibited, the length of the discussion, their facial expressions and how they referred to them.";* *"There was no animosity or anger towards difficult patients, even when they were abusive or harassing."*		*"compassion [for patients] was on display".* *"Dr W introduced himself to the patient, spoke to the doctor and then came close to the patient so he could hear him and spoke… what may be happening, and what would happen next. This seemed to enable the patient to speak about his concerns which were when he could go home and the fact that his mouth was very dry. Dr W was clear and direct in explaining to the patient he would not be going home today. Dr W went out of the resus room and fetched the patient some water. He gave him two very small sips on separate occasions while he was with the patient, and explained why he could not have more."*
9				*"Dr W stood or walked the department for the observation, apart from a short discussion when he*

				sat down with a doctor at her suggestion to discuss an older patient with complex health and social problems".
10		Medical and social goal-oriented discussions.		*"… discussion when he sat down with a doctor at her suggestion to discuss an older patient with complex health and social problems."*
11			*"Initially a start in the summary from the registrar, then one of the doctors would interrupt if they had a question. There was a lot of story-sharing from the doctors, a sort of working out their internal thought processes out loud".*	
14			*"This baby didn't have the classic signs of a particular disease, necrotising enterocolitis, but it turned out she had it, and they only found it because the doctors persisted on checking things because her symptoms were odd but consist*	Judgement call should be made to treat patients according to the severity of illness, and for this experience / practical wisdom is required.
15		*"quite a lot of concerns about resource allocation and restrictions."*		A scanner was loaned out to another department. Arrangements were made to support paediatric ED, although the two ED consultants discussed the need to not let this become a pattern.
Manage a busy schedule			+	

Seeking reassurance		+	+	
Earnest in solving problems		+	+	
Get the details of each case	+			
Guidelines are important	+	+	+	
Leadership				+

Table 7 - Virtues identified in observational data

Themes generated from the data.

Modern day medical odysseys always have themes running through them. We have stories (as per the 15 virtues, and we have a serial), and we have identified six clear themes from the findings. This development of themes alongside the stories and the serial ties in with Czarniawska's (1997) narrative dimensions, and Conroy's book (2010).

Six clear themes emerging from the findings:

1.   Fragmentation in virtues.
2.   Apprenticeship missing, so lack of cultivation of *phronesis* and lack of support for FY 1&2.
3.   Which telos / purpose? Patient best interests or wider social well-being?
4.   Litigation protection can distort decision-making, and related workload means little time to reflect on decisions.
5.   Resources; financial, time and staff constraints.
6.   Mixed ideas about how to cultivate *phronesis*: 'it just happens' to 'real life role-play with actual patients'. Story telling is a way of hearing from doctors how they see *phronesis* developing, and is a useful pedagogy.

Fragmentation. The findings show that virtues vary a great deal across the different cohorts and between individuals (see Virtue ethics framework- appendix G). This might mean that each doctor comes up with their own set. The fifteen we have are an amalgamation from the 131 participants we interviewed The exceptions to this are where we have interviewed doctors who work together on one ward - they talk about a 'consensus'. We do however see overlap in the virtues. All of this is unsurprising, given MacIntyre's conclusion that we live in a time 'After Virtue' and the splintered morality of modern day organisations where we are all authors of that fragmentation.

Apprenticeship. Many participants report that there is no longer a way for medical students or junior doctors to gain experience that would help them to develop their practical wisdom. Discontinuity of a wise elder (master craftsperson) in the training of doctors means, who do they turn to when they are feeling like they can't cope? One FY2 doctor was very upset to see so many dead people during their training, and felt unsupported and emotionally drained:

"Yes, I have to just go and carry on as though nothing had happened. It wears you down. I'm 25 years old, I've seen more people die than most people will in their entire lives, but because I'm a doctor, it's 'Well what are you complaining about, you're a doctor?' You go through hell… and no-one cares because you're a doctor" (W108 FP)

Guiding telos / principle. For many, the overarching question is: What is in the best interests of the patient?

"That would have to be a "best interests" discussion." (BX05)

"I think about what is in the best interests of the patient, and what evidence and research suggests is in the best interests of the patient." (NX01)

"… to address the best interests of the patient, not of the carers or family." (NX05)

"It's deemed to not be in a person's best interest to be that paternalistic about their care." (W108, FP)

However, in situations care is complex, resource intensive and with issues of social justice, for example where care needs cross health and social care boundaries , the overarching purpose becomes less clear.   Aristotle and MacIntyre focus on a virtue ethics / phronesis telos as fundamental, and for MacIntyre it should be societal (e.g. a purpose of seeking well-being for all in society), a thought that is also voiced by some of the participants:

"But we took a decision in the best interests of both the patient and for protection of others." (BX06)

"But it is weighing up that person in front of me, the resources that are available for everyone, is this in their best interests?" (BX03)

Litigation protection. This dogs the NHS, following Francis and other scandals. Many argue that we have become a litigious society. The law has been brought to bear on any professional working in the NHS. This means many NHS clinicians spend a lot of time filling in forms and paperwork to

protect themselves from medical negligence claims. Consequently, it means that they have little time for reflection on their decision-making, and it can actually distort decision-making; as what is often at the front of the clinician's thinking will be not what is best for the patient or society, but what will ensure they do not get a claim made against them:

"Definitely the patient's best interest is the first thing you think about. And then the legal implications." (WFY2-06)

Resources constraints. The fact that the NHS is under continuing severe financial pressure, despite the recent funding announcement was an underpinning theme along with implications for time and staff capacity as mentioned by many of the participants.

"I think we are so pressurised, time-wise and understaffed, that you end up kind of firefighting every day." (WX03) s.

Mixed ideas about how to cultivate *phronesis* (practical wisdom) pervade the findings. Some say it is just a natural part of becoming a doctor or consultant, and that you can only learn by doing. At the other end of the spectrum, others suggest real-life role-play with actual patients, so that they can start to be exposed to and learn how to cultivate wise decision-making early in their career. Story-telling is a way of hearing from doctors how they see *phronesis* developing, and is a useful pedagogy.

"Put together a video based on an actual problem that has happened… they should be helpful to get medical students used to thinking in that way …it's not something I was exposed to at medical school." (B102)

Kaldjian analysis 'findings–Phronesis in action.

The Medical Phronesis lens held alongside virtue ethics helped us to contextualise the notion of *phronesis*. The data show that *phronetic* practice is constructed in most participants' narratives / experience, and the name given to it is 'Phronesis In-Action (PIA)' (Fig. 2). The difference is that although motivation is present, it is not the last spoke in the wheel (to achieve the conclusion reached by the deliberative process); but rather the driving force to start the process of 1(pursuit of worthwhile goals),2 (concrete facts|) ,3 (normative framework/virtues)and 4 (integrating all these) (Kaldjian, 2010)
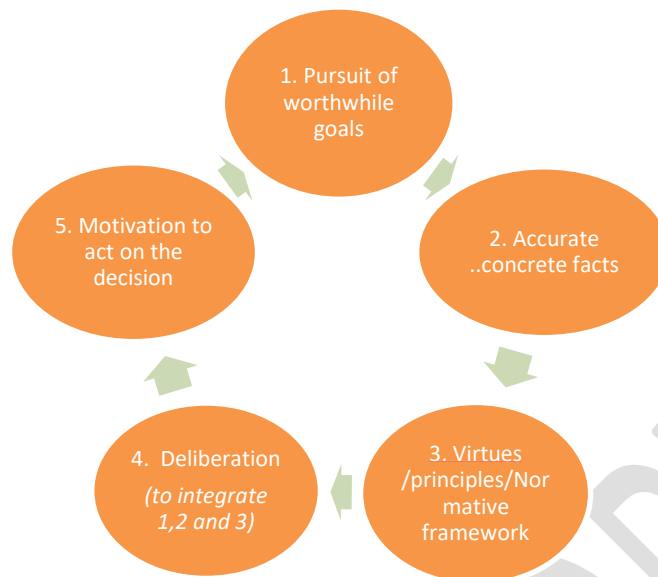
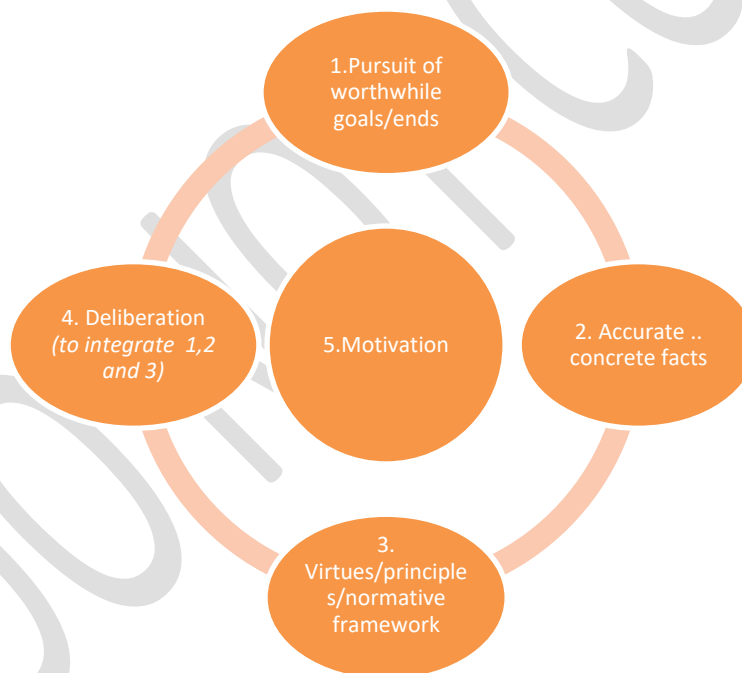Fig. 1: Kaldjian's Five core elements: Normative Framework

Fig. 2: 'Phronesis In-Action'

There is a caveat, however. Kaldjian's five core elements were not used as a basis to formulate specific questions for the interviews. That is, questions regarding goals or concrete/contextual features or the what normative framework used were not explicitly asked. This was , driven by the rationale that no prior assumptions should be made by the project regarding the decision-making process used by doctors .   This inductive approach meant that the Kaldjian framework was only

used after data collection to test the fit with our empirical data. The framework was thus used to analyse narratives /data. Using this framework is important for the following reasons:

1. There is a call to empirically validate whether the various ethical decision-making frameworks are fit for purpose (see Manson, 2012)
2. The present research is on *phronesis*, and to see if the practice is present a *phronesis*-based framework was needed, which Kaldjian provides. Other ethical frameworks are mainly deontology / consequentialism-based.
3. Kaldjian features prominently in *phronesis* literature (Kristjánsson 2014).

The analysis shows that most narratives exhibit '*phronesis* in-action', with motivation playing a slightly different role: motivation initiates the *phronetic* process. Participants narrated that "*goodwill*"; "*passion*" (BX10); "*enthusiasm*" (NX02); "*to do no harm*" (NX08); and "*patient's best interest*" (BX05) were some of the motivating forces. Thus, it appears that motivation is the driving force which drives doctors to use virtues as their guiding principle / force to achieve the goals / ends which are patient–centred. The driving force (motivation) is already there, therefore the doctors go through this exercise of integrating 1(pursuit of worthwhile goals),2 (concrete facts of the case),3.(virtues/normative framework) Appendix J sets out a long excerpt from an interview which shows the participant contextually respected a patient's goal (to do what the patient wanted) so they made time to understand and reach a decision which is not so much guided by their clinical knowledge, which would have been medically right, but by their virtues / ethics of care to make a wise decision for this particular patient.

The following tables summarise the ways in which Kaldjian's five core elements (Kaldjain, 2010) were identified in our empirical data

Table 8   (a) Kaldjian Core Element 1; Pursuit of worthwhile goals

Pursuit of worthwhile ends (goals) derived from a concept of human flourishing	"So when we got to this point I said – I realised that he was not willing to have the feeding and he was willing to stop his feeding because he wanted – he didn't want the PEG reinserted again….. "So when we got to this point I said – I realised that he was not willing to have the feeding and he was willing to stop his feeding because he wanted – he didn't want the PEG reinserted again….. and if he got any infection or any other problem, let him go in peace as he wanted" (WX04)
Pursuit of worthwhile ends (goals) derived from a concept of human flourishing	"keeping the patient's brain perfused so that he is able to function; although it may shorten life there is some quality of life .

	Assessing harms of increasing medication and benefit of reducing it to give the patient some quality of life: "after a hypoxic brain injury but some of it is, in the sense that I've got to do everything I can both medically and from the therapy perspective to optimise his function because that will tell us how far he can rehabilitate and where he's going to go to after hospital"…"But the essential thing is getting him as fit as possible". (BX05).
Pursuit of worthwhile ends (goals) derived from a concept of human flourishing	"But I just felt, in myself, I felt it was inappropriate to keep putting her through, kind of, tests that can make her uncomfortable, and so, what are we really achieving, and so, I went out and I spoke to the Registrar….. He was like, "Yeah, I don't think we should do anything for her." Like, with the discussion with the daughter, and the grandson. I think that was the right thing to do…..

Table 8 (b) Kaldjian Core Element 2 Accurate concrete facts

Accurate perception of concrete circumstances detailing the specific practical situation at hand	"[W]e work in a job where we are pushed by different forces as doctors, as a decision maker let's say, that is what it involves now, yes. So as a decision maker we are pushed different ways; we have our organisations pulling from us, we have the patient, we have the family, we have our own knowledge. So these kinds of forces, they are pulling in different directions. Sometimes they are all in the same direction which is good and that makes it easy in these cases.. but sometimes they are pulling in different directions…. I remember one case, a chap – a young chap, 50s, 55, previous brain injury because of a massive road traffic(?) accident five years ago. He was being cared in a care home, fed through a PEG and everything and he was stable – chronic but stable. He came to the hospital because the PEG has become blocked and then – unable to speak, the patient unable to speak and so I sit down there and the junior was saying, "Yes we are going to book for him an endoscopy to change the PEG and

	everything…. so I came to him and I sat down and I read that the patient was having different problems in the care home, sometimes they were having a bit of – he was having a bit of behavioural – that was a bit difficult, so I sit down and they say, "Oh yes it's a difficult patient…" So I sit down with him and I knew that he wouldn't speak or they have told that he couldn't speak….so he has a perfect understanding of the language, he just hasn't – because of the brain injury and he couldn't speak. So, I started to talk to him and said, "Yes you have this problem" and then I would see as we were having the discussion about the problems with the feeding and the PEG he was – sometimes he was just saying "no" with the head and things, so we came to the point through our conversation, I realised that the patient has capacity, perfect capacity when you take the time to allow him to express and I acknowledged, I tested him for some orientation questions, some things and yes, he'd got capacity…."(WX04)
Accurate perception of concrete circumstances detailing the specific practical situation at hand	"We think a lot in terms of the WHO ICF classification of disability ….so the pathology, impairment, activity limitation, participation limitation and then contextual factors and that really is another way of saying the holistic biopsychosocial model …. We need to understand the biology of what's going on, not just of the brain but also the other organs which impact on that. So what the cardiologists call "blood pressure" is what as a neurologist I call "cerebral perfusion". ……Yes and we see the fluctuations in function that can happen when someone's not got adequate blood pressure" so he's now got a heart that's well vascularised and they put him on a whole load of medication which is - on the evidence of large randomised control trials, will improve his long term outcome from a cardiac and cardio death perspective. But then the practical issue is that he's quite drowsy and his blood pressure is low, so we have a discussion on the ward round

	and I've got a very experienced junior who's almost got to consultant level talking about the – how far do we follow the cardiologist's recommendations of medication which can drop blood pressure as well as keeping you alive forever sort of thing and how far do we say, "Well actually this is a man with a poor neurological prognosis where if he hasn't got blood pressure that's perfusing his brain, that might actually impact on his alertness and stuff?" and so she agreed with me that there may come a point where we actually have to say to the cardiologist, "Actually we're stopping some of your medication. We accept it may, on average, result in a shorter lifespan but if it's something that's going to keep his blood pressure at a level that keeps him cerebrally perfused and able to function then he's got quality" …. "So within the WHO ICF classification there's a very clear definition of what the contextual factors are from personal factors which might be personal expectations etc. Physical structures around the person, like their care givers etc. and also the legal, contextual factors… So what I need to do is try and get him off all the medication that might knock him off centrally, making him drowsy and optimise his health in general to enable his brain to function as well as it possibly can. And then also look at modifying the factors around him, so looking at whether it's too noisy, whether he gets communication in the right way, all those sorts of things. But the essential thing is getting him as fit as possible. (BX05).
Accurate perception of concrete circumstances detailing the specific practical situation at hand	; there was another lady in A and E, I think, who came in and was very elderly. She was nearly 100 years old, and she came in very, very unwell. She'd had, like, a do not resuscitate form, already signed in the community. And I saw her initially, and the Registrar had said go and see her. Put fluids up, trying to bring her blood pressure up, and try and get access for her ,like, venous access etc. So, I went in and I saw her, and she looked … She was very, very unwell, and the daughter was there, and I started, kind of, trying to find a vein on her" (W101 FP).

Table 8 (c) Kaldjian Core Element 3 : virtues, principles , normative framework

Commitment to moral principles and virtue that provide a general normative framework.	" I have always gone first for the patient… even if a patient cannot speak, even if the patient is unconscious I always talk to them; always, even if he's in a coma, I always talk to them because they are in a coma, they cannot tell you if they are listening to you or not, so you never know to some extent how receptive they are. So I came to him, sit down and he was having an awful face like, "Why are you coming here?" and I introduced myself and I said, "I am Dr ……., and you are here because you have this, this, this and this" and then I ask, "How can I help you?" and immediately the patient just looked to me and looked in a, "Why are you asking?" especially because he couldn't speak. And I said, "Yes I know that you cannot speak but I think that we will be able to understand each other, just with you nodding or saying something" and then he starts to nod…"That was his decision, with capacity, after talking to him. So obviously that was a massive, difficult decision to take and the easiest – the easier way would have been, "Okay there's a fallen PEG or a blocked PEG, let's go change it and back to the care home" and the patient probably at the end, reluctantly, will have accepted our pushing force of doing that"(WX04)
Commitment to moral principles and virtue that provide a general normative framework.	"But we have a holistic view of the whole person, so they're not just a heart that's been damaged with the rest of the body attached to it; we've got to look at the whole picture and the cardiologists I've had debates with have always been very happy to take on board that holistic perspective and see the limitations of their treatment and have not had a problem in going off protocol when there's clearly a best interests issue" …."We think a lot in terms of the WHO ICF classification of disability and that's how I frame it to juniors when I'm teaching rehabilitation", . (BX05)

Commitment to moral principles and virtue that provide a general normative framework.	"I saw the daughter, and I started speaking to her, and I said … you know, approached the subject of, like, how much she wanted, kind of, to do for her mum….. . " Like, with the discussion with the daughter, and the grandson. I think that was the right thing to do, because I think it's very easy to think that you have to, kind of, save everybody, and when, actually, you need to, kind of, see people as a whole, and think; what are you trying to achieve, and is it going to cause more distress?" (W101 FP)

Table 8 (d) Kaldjian Core Element 4 : deliberation

Deliberation that integrates ends(goals) , concrete circumstances, and moral principles and virtues	"So I discussed with him, I got to that point and I really get to that information; it took me obviously more than ten minutes and that I have got the time, but I got to that discussion and against the gastro – previously that has followed, the patient, against the GP and probably against part of the guidelines about the feeding – no, he'd got no family this poor chap, he was alone in the world, so against that all I made a decision in partnership with him, acknowledging his capacity and removed the PEG and sent him back to the care home to have food and drink as much as he can…." "by sitting down with him and taking a bit of time and putting in there as well, not so much knowledge but caring, I realised – I got to what the patient really wanted to happen; I respect that and I help him in the best way possible". (WX04)
Deliberation that integrates ends(goals) , concrete circumstances, and moral principles and virtues	"I've got to do everything I can both medically and from the therapy perspective to optimise his function because that will tell us how far he can rehabilitate and where he's going to go to after hospital. Essentially I'm looking at a man that's going nowhere other than a care home for the rest of his life, even though he might have a heart that's going to go on forever and a very limited participation in life in that care home. So what I need to do is try and get him off all the medication that might knock(?) him off centrally, making him drowsy and optimise his health in general to enable his brain to function as well as it

	possibly can. And then also look at modifying the factors around him, so looking at whether it's too noisy, whether he gets communication in the right way, all those sorts of things. But the essential thing is getting him as fit as possible" (BX05).
Deliberation that integrates ends(goals), concrete circumstances, and moral principles and virtues	" I tried to make him see that side of it, and he agreed. He reviewed the patient, and we got the Medical Registrar as well, who came in and saw her, and he was, kind of, the most senior medical person there at that point…" (W101 FP).

Table 8 (e) Kaldjian Core Element 5; motivation

Motivation to act in order to achieve the conclusions reached by such deliberation	"putting in there as well, not so much knowledge but caring, I realised – I got to what the patient really wanted to happen; I respect that and I help him in the best way possible" (WX04)
Motivation to act in order to achieve the conclusions reached by such deliberation	"That would have to be a "best interests" discussion…"(BX05)
Motivation to act in order to achieve the conclusions reached by such deliberation	"is prolonging someone's life for a matter of a few days or a few weeks; is that worth the, kind of, stress and upset of it to put them through?" (W101FP).

There were, however a few stories that lacked *phronesis* and in their narrative, participants classified the decisions taken unwise. When examined closer, these were driven by worry of complaints / litigation, treating patients at all cost, lacking cultural competence and the 'know it all' attitude. An example of this is shown in Appendix J where an interview describes how not communicating the necessary information properly undermines trust, and therefore has an outcome which is not in the best interest of the patient:

Table 9 Kaldjian core elements and unwise decisions

1.Pursuit of worthwhile ends (goals) derived from a concept of human flourishing	Potentially though, this surgeon could have been acting very ethically. He offered this operation, the patient refused so you could say well, he's respected the autonomy because the operation didn't go ahead. He

	might have thought about the benefit to the patient in thinking well, this is the best treatment for her and he might have thought about harm and thought actually no, this is the right treatment for this patient.
2. Accurate perception of concrete circumstances detailing the specific practical situation at hand	"Recently a patient was offered an operation by a surgeon that was clinically the right operation to be offered but the way it was communicated to the patient, they have refused to have the operation. They think it's completely not the right thing for them and actually talking through with the patient, it didn't seem to be that they didn't agree with the clinical rationale behind it.
3. Commitment to moral principles and virtue that provide a general normative framework	"…but the way it was communicated to the patient, they have refused to have the operation….They just didn't like the doctor who spoke to them….., the patient recognises the importance of the operation but won't go ahead with it purely on the basis that they don't like the doctor
4. Deliberation that integrates ends(goals) , concrete circumstances, and moral principles and virtues	-
5. Motivation to act in order to achieve the conclusions reached by such deliberation	-

Comparing the two (Virtue Ethics and Kaldjian) analyses, the virtue ethics analysis differs from Kaldjian's in that:The VE analysis shows how doctors use these virtues, either individually or in varied combinations, in their daily professional practice to make decisions regarding treatment or patient care; not necessarily using a framework to come to a decision and phronesis is one of the virtues, an executive virtue.

How the VE analysis and Kaldjian integrate / cohere is, in order to make a *phronetic* decision, doctors use the virtues exhibited by participants; again either individually or in various combinations (mainly the latter) to make decisions about treatment or patient care. In both instances, the decisions made are not generally global / universal (unless it is a simple decision such as a patient with pneumonia who requires antibiotic treatment and nothing more complex - even here, many times it is tailored to that particular patient's needs; more usually they are a holistic appreciation of each patients' needs and requirements.

Alternatively, the virtues (in the VC) are used in the decision-making process. That is, these *in-situ* virtues are not stand alone entities (inherently valuable though they may be, since virtues are character traits which bring about a good) - they play an integral role in ethical decision-making. Our

participants have demonstrated that they are using them for this purpose. Thus there is a process flow: a *phronemoi* (a practically wise doctor, as opposed to unwise) takes a holistic approach to making decisions and deliberates how goals, concrete / contextual factors, virtues / principles can be integrated so as to enable the doctor to reach a wise decision.

Theoretical development of the concept of *phronesis* derived from the analysis is ongoing. The initial development, as stated earlier, on this is that practitioners can work on a staged process: two- or three-stage process for deciding on the way forward, rather than it being a single-stage decision process where all the virtues are considered simultaneously. This is now being developed into a tool to assist in-action and on-action reflection on decision making which will feature at conference sessions and presentations in Autumn 2018 and then be further refined based on feedback received

Analysis of the community engagement work undertaken.

In addition to interviewing medical students and doctors, the project also collected the views and perspectives of patients regarding wise decision making in order to address the project objective relating to trust in the medical profession.

Patient and community perspectives on wise decision-making

At the heart of the practice of 'doctoring', there is the interaction between a doctor and a patient. The nature of this interaction has a significant bearing on the way in which is a decision is reached concerning that patient's healthcare. Given the importance of this interaction, it was essential for this project to consider the views and perspectives of patients regarding wise decision-making. In addition, there was a second requirement to consider the patient perspective. This second requirement related to the original aims and objectives of the project, which included the issue of trust in the medical profession, and whether or not the development and nurturing of phronesis was one way of building trust between the medical profession and the wider community; including patients. The project aimed to consider if, in the light of various high profile reports on the failings of care, it was possible that *phronesis* could strengthen and sustain the bonds between the medical community and the wider community. For both these reasons, it was therefore important for the project to collect primary data from patients regarding wise decision-making.

Focus Groups were conducted in a semi-structured way, conversational in format, with the following themes covered at each one:

- What do you think helps a Doctor make a wise decision?
- How can we develop or enable wise decision making by Doctors?
- Have we as a society lost trust in Doctors?

- If we have lost trust in our doctors, what could help re-build that trust?

From the five focus groups, narrative led to the identification of a number of common themes as shown in Table 9 below. Most focus groups discussed trust in relation to the doctor-patient relationship, and those factors which enabled or inhibited trust in this context. What enabled trust for these patients were doctors who were:

- Experienced
- Communicators
- Honest
- Culturally competent
- Holistic practitioners
- Ongoing learners
- Resilient

There was some discussion of the impact of wider structural and societal factors which can develop or enable wise decision-making, with one patient commenting:

"… practical wisdom – shouldn't that be part of medicine anyway?" (4)

The three overarching themes identified and specific factors are shown in the following table. This table also compares the findings from the patient and community focus groups with the findings derived from the interviews with doctors and medical students and puts forward some potential policy implications A more detailed discussion of the findings from the patient and community focus groups follows after the table.

Analysis of Focus Group Findings

Themes emerging from Focus Groups	Match to findings from data from doctors and medical students	Policy Implications
1.**Enablers of wise decision making – Doctor specific**		
Experienced / technically competent : • Experience / expertise of the individual practitioner • Life experience		Clinical training with a particular focus on situated learning .
Good Communicator: • Skills in communication • Emotional intelligence • Empathy	Interpersonal communication/ emotional intelligence	Communication Skills training needs a higher profile Recruitment of medical students with empathy and focus on their motivation
Honest: • Honesty and challenge in the doctor / patient relationship • Mutual trust especially in complex and 'watch and wait' situations • Having difficult conversations	Courage to speak out and have difficult conversations Trust/ integrity/ confidentiality	
Culturally competent : • Knowledge of the community they are working in	Culturally competent	Community Placements Training
Holistic practitioner : • Medicine is not a science • Focus on whole person • Psychological as well as physical health	Balanced approach	Society and doctors recognising the limitations of medicine
Ongoing Learner: • Openness to ongoing learning and change • Acceptance of own fallibility		Time and availability of appropriate training
Resilient : • Able to deal with uncertainty and change	Resilient	Peer support and team working
2.**Structures which can develop or enable wise decision making by Doctors or can work against this**		
Guidelines : • Informing patients	Collaborative decisions/ seeks guidance	Accessibility of guidelines to community Positive promotion of guidelines to doctors

• Support doctors to engage in changing their clinical practice		
Administrative issues • Poor administration • Poor continuity of care • Lack of follow- up		Patient-centred administrative systems
Mentorship : • Ongoing support • Requires time • Requires recognition of fallibility	Approachable /available mentor	Organised, funded and ongoing system Possible apprenticeship scheme
3**. Societal Factors**		
Informed and involved patients: • Recognise power dynamic • Patient demand and expectations can be unrealistic • Patients responsibility to address their health needs and issues • Reverence for the professions has been changing		
Pressures of time and funding : • Limitations of time and access • Rationing and the real costs of care, ethics of this, place for these debates. • Impacts on resilience and retention of doctors	Resource awareness	
Litigation, whistleblowing and scandals in health and care: • Fear of litigation , treatment of whistleblowers		

Table 10 - Focus Group Findings

The following provide a more detailed analysis of what focus groups told us about what they perceived as the enablers of wise decision making.

Enablers of wise decision making: doctor-specific

Focus Group members identrified some enablers which were seen as intrinsic to doctors themselves which were :

Experience

The technical competence of doctors was rarely mentioned by focus group participants, but when it was mentioned, it tended to be in the context of a degree of realism about the pressures doctors are under:

"… you take it for granted that they would be professionally qualified and clinical competent and all that." (3)

There was also a focus on the lived experience of doctors and how this impacted on their decision making:

"… so it's down to the experience of the doctor and the background of the doctor. Some doctors come into medicine from a more privileged, naïve perspective. I'm not saying every doctor, but some are not able to apply the practical wisdom, because they don't have the experience. They don't have the life experience." (4)

"We draw medical students from a very narrow strata of society, so there's an inbuilt difficulty." (3)

Communicator

The ability of doctors to communicate, i.e. to use emotional intelligence and empathy to build a rapport with their patients, was referred to as an important enabler of trust by all of the five focus groups. Further, its absence was seen as likely to lead to mistrust and to poor decision-making.

"… trust is important, because you know, how do you get trust? It's not what the doctor gives you - the medicine - it's the communication aspect; understanding what the patient is trying to say. The ten minutes either it can make you trust the doctor… and he or she will know where I am coming from, and that's communication. It's not what he's going to give you, or he's going to make you… it's what he's going to make you feel inside. That's the more important trust, I think, that you get." (4)

"So it's empathy; but I also think it's social skills. A number of doctors I've come across over the last two or three years are technically very good, but not very good at communicating and get very defensive if they're challenged; particularly if you've got someone with multiple health problems." (3)

When talking about how to build trust, there was a focus on communication, empathy and understanding of patients:

"… better social skills I think [are needed], better competence in being able to talk to patients." (3)

"Building a relationship with the patient, gaining their confidence, warm friendly welcome, eye contact - you don't want a doctor who is not acknowledging you; not paying attention to you, communication is the key. It is the doctor-patient relationship." (2)

"… listening for two minutes, understanding what the person is saying." (4)

There was a discussion in one group about selection of medical students needing to incorporate a focus on those with high levels of empathy and emotional intelligence. This was in tandem with a discussion about those professions such as practice nursing, which were seen by some as displaying high levels of technical competence along with real people skills; including the ability to deal with upset and distressed patients and families. One patient mentioned having to ask the pharmacist to get an understanding of what they had been prescribed, and why, and what its possible side effects might be. Another patient was asked by their GP what procedure the hospital consultant had just carried out, and they had to say :

"No idea, he didn't talk to me, he just did something. So you do wonder about the more experienced doctors and their wisdom." (4).

There was concern that :

"the doctors who took notice of everyone and listened to everything, I don't know if many of them exist any more." (4).

The importance of a doctor being able to:

"relate from the heart, [establish] an emotional link… click and understanding with the patient… is it training, or is it an innate thing?" (4).

Skills in communication were seen as important. The ability of doctors to convey complex information succinctly and simply, so that patients are able to process it and to ask questions, was discussed at the PPG Chairs Group; who explained that some doctors are still *"condescending" (5),* and *"Even nowadays doctors often say 'don't worry your little head about that'" (5).* It was also recognised that it was crucial that doctors confirmed if patients had understood the information given to them in a consultation, and if not, were prepared to *"go back to square one" (5)* to try to ensure understanding; and that they were able to *"read the signals" (5)* to pick up whether or not the patient had really understood. This was seen as involving *"a lot of intuition and reading the patients mind." (5).*

Honest

This theme was touched on by all the focus groups, and generated a number of sub themes. A trusting relationship between doctor and patient was one which facilitated open and honest dialogue, even when those conversations were difficult. The ability of doctors to have difficult conversations in an open and honest way with patients was seen as enabling a trusting relationship:

"… the first thing they [doctors] have to do is believe you, that's the first thing isn't it… then we're getting back to mutual trust, aren't we?" (5)

Referring to the evidence of poor care and deaths in the Mid Staffordshire Hospital Enquiry, there was a discussion about how families were relieved to eventually know the truth, but that with a good relationship between surgeon and patient / family it is possible to have these conversations much earlier:

"… if the surgeon had previously had good relationships with the patient - which they try to - I know they don't always have time to, and say 'well it's normally very good, but occasionally sometimes things...'" (5)

The absence of trust and / or the avoidance by doctors of difficult conversations can cause patients or relatives to make their own assumptions about proposed treatment plans. One focus group discussed how decisions to stop active treatment can be interpreted as denial of treatment for particular reasons:

"… the trust might not be there, as the consultant says 'we need to cut off this treatment', even though they know in their hearts and minds that the baby is ill… no one wants their family to suffer… but I have heard 'my dad did not have his cancer treatment because he was black… he could have lived longer… they stopped giving my mum water and food… they were dying, but it's not been explicitly talked about with the family. You need to involve the family." (4)

Placing trust in a doctor was seen as especially difficult, when there is a period of watching and waiting to arrive at a diagnosis or to determine next steps:

"… it's terrifying … where actually a lot of prostate tumours should just stay where they are, and 'watch and wait' is the treatment; but that's quite a terrifying prospect if you're the guy with… and you've got to trust that doctor, it's based on good evidence and the doctor's got your best interest at heart and that is a leap of faith I think, for leaving a tumour inside you." (5)

Some referred to the changes in the way in which doctors are perceived, and the fact that as a profession they may not be a revered as they once were. Referring to visiting a doctor who looked in a book to find out how to treat her, a patient referred to this as a *"turning point"* in how she perceived doctors which *"sort of diminished the myth… that he's a God" (4);* but then caused her to reflect:

"… that's where there was honesty. It's got a double edged sword, hasn't it, really? Honesty and trust: could I put my life in their hands – or my ailment or whatever it is?" (4)

<u>Culturally competent</u>

Knowledge of the community in which they are working was seen by the focus groups as essential to trust and to wise-decision making.

"…a bit more knowledge and awareness about community to contextualise different people within their communities, and understanding how communities work is really important. If as part of their training doctors were able to come to a group like this, so that people talked about their experience of doctors as well as something about empathy, compassion… doctors are revered; but they are also arrogant and [people] don't feel they can communicate with them… coming out to a coffee morning… running community surgeries… talking to someone on their level, a human being who respected them as equal, a big group of people will benefit simultaneously… we need a bit more outreach basically. Maybe as part of their training… a little can go a long way." (1)

"I think everybody should know the area of where they are going… the GP or doctor should know about the area." (4)

"I know it's the elephant in the room. I have heard friends say that they didn't treat their older patients because they were black. And it might be perceived that a doctor might make a decision on the basis of race, class, what that person might contribute… perhaps it needs to be explained better; you know why are we making that decision." (4)

One focus group was clear that doctors' personal views can affect their decision-making, and this was referenced in specific regard to rationing and access to IVF, ITU beds but also in relation to access to contraception and abortion:

"[A] GP's views… colours his judgement… instead of saying 'I can't really advise you because of my religious views, you'll have to go and see another doctor'; they just said 'you're not eligible', or 'we don't do it'." (3)

"… they may have an unconscious bias… they may not have time to implement that practical wisdom, and the unconscious bias could affect that." (4)

Cultural competence can be gleaned from working with communities more closely, or from colleagues. But as one participant noted, doctors:

"… need to be receptive to that, and accept the fact that something different to their style will work, and that can be difficult for some people." (5)

One participant spoke about the way in which *"unconscious bias works both ways"* when discussing how some black, Asian and minority ethnic doctors may be more fearful of making certain decisions; and how they might be viewed by the General Medical Council. A member of the Yoga Group who worked with women in the community had come across doctors who were:

"… quite arrogant in their practice… look down on their patients. So people have gone in with consistent problems, and they've been fobbed off by doctors. Women have come back and said they feel they have nowhere to go, the doctor is not listening to them, they have

been told 'well, it's stress-related', their conditions are being marginalised; some women with language barriers from minority communities." (1)

<u>Holistic Practitioner</u>

This theme came from discussions about the importance of doctors seeing the whole person as a way of building a good rapport and trust in the relationship:

"… sometimes you could go with a symptom, but if it's something else that's happening at home that's really part of it; so if they were more aware of the family dynamics or the lifestyle… that would be helpful." (1)

"You know, when you trust your doctor… overall, she knows my well-being is holistic, everything, and when I have trust, I don't look for medicine… just go there, talk."(4)

"But I think we're gradually realising that they are medical practitioners, not health practitioners, so there's a whole range of things that they can't do; but I don't think it's clearly explained." (3)

For some patients, this was linked to recognition by patients and by doctors of the limitations of doctors:

"… the subject matter expert idea is good, because you can say 'this is what I do, this is what I am trained to do and if you ask me something outside it, I'll have a go but I'm probably no better at it than you are.' It's about openness, and being realistic about what they can and can't do." (3)

"… the human body is the same but different - we're all built the same, but different… what will work for you, won't work for me; so it's difficult for the doctors… to understand that the individual patient might not be receptive biologically to that process, whereas this patient is." (5)

"… so should we be encouraging older people to become doctors? With life experience… learning is on-going; but is it down to lack of life experience, an ability to see medicine from a holistic perspective?" (4)

<u>Ongoing Learner</u>

The need for ongoing learning as an enabler of trust was discussed from the perspective of the attributes of a doctor who wanted to learn, develop and change; as opposed to any discussion of the exact details of any learning or development programme:

"… it's looking forward and not looking back… presenting [change] in a positive light. Nudge Theory and all that stuff… helping you, rather than blaming you… so that's a very important thing I think to change, is our attitude to change." (3)

"It's time and it's also a willingness to say 'I don't know everything', to appear to be fallible, which might be a difficult thing for them to do." (3)

"… if you're interested in looking outside and learning from other people… if you've got quite a closed mind set… then you don't look out, you just look in." (3)

There was an inbuilt recognition and acceptance by most patients that learning involved making mistakes and learning from them:

"There are decisions made that are not right for a patient, but who are we to know? You have to learn." (1)

"… they make mistakes like all of us do; in every situation - all of us make mistakes, but I think at the end of it, they do actually want to make people better." (1)

Resilient

The Patient Participation Group focus group spoke of GPs who had been in the profession for some time, but who were now leaving the profession, and the need for some ongoing support for GPs who for whatever reason are not coping; or are in difficulty. Another spoke about resilience, and how this builds with life experience, but that this might therefore be an issue for newly qualified doctors. The impact of ill health amongst doctors themselves, which might include mental health issues, was seen as impacting on trust by one of the other groups. One of the reasons for this was touched on by a participant in the yoga group:

"I have had experience of nurses and doctors, they are doing their best. I can't fault them, but I actually feared for their well-being… they weren't drinking enough fluids… not having enough breaks, in pain themselves from certain illnesses or whatever and still working far too many hours, and then their health and well-being is in danger, what chance have patients got really of them making all the correct decisions? It's a really dangerous situation." (1)

Structures which can develop or enable wise decision making by Doctors or can work against this.

In addition to enablers which were intrinsic to doctors themselves, what could be seen as micro level factors , the focus group members identified another category of factors which were more structural in nature ie more meso level factors.

Guidelines

Those focus groups which referred to guidelines tended to see them as more than a tool to guide doctors' decisions, but as a means which could enable patients to share in decision-making. Flexibility in the use of guidelines was mentioned, and this was seen as related to knowing the needs and circumstances of patients. Talking of how new guidelines are introduced, two focus group members discussed how guidelines and guidance could be presented positively to doctors:

"There needs to be something that's saying to them 'we've got no guidance on this, on that', without somehow bombarding them to death with emails saying 'do this, do that'… and without it seeming like it's a fault, without it seeming like there's something wrong with them… yes, it's framing it in a positive way." (3)

"…the main thing is for clinicians to equalise their practice to all be operating at the level of the good, and to not have any rogue people. But I think like NICE guidance… so patients can see them, advocates can see them… it makes the chance of something really off, really weird happening." [Abridged] (3)

"… they work both ways, for the GP who hasn't got a lot of time to look up rare conditions and for the patient and family they give some sort of validation that this is a condition, it is diagnosable, treatable to an extent - there are clinical things, tests you should do. So I think they are valuable." (3)

<u>Administrative issues</u>

The Asian Women's exercise group raised a number of issues relating to poor administration in primary and secondary health care services, and the impact this was having on their health, and the health of their families and their trust in the NHS. They were fearful of raising issues for risk of being struck off, while older people were deferential to doctors and accepted whatever was said to them. Lack of follow-up, or the need to continually attend with the same problem, was mentioned:

"… things are not followed up, letters are left on the side at the doctors' not followed up, and results get lost." (2)

"… not having a specific doctor is an issue; one day one, one day another - they don't understand your problem if they are a locum, they don't know your ins and outs… they just prescribe something… Paracetamol." (2)

"I have been bleeding for a month, and I went to the doctor but they couldn't help, and so I went to the hospital and they said 'Why didn't your doctor refer you?' I tried the walk-in centre, they couldn't help. Someone said just drink milk. In the end, the midwife told me I was anaemic, she asked why didn't the doctor help? She phoned for an appointment… why should the nurse be giving us advice? It should be the doctor." (2)

"… she had a lump in her breast, she went to and fro to the nurse then the doctor and was not referred, then the results got lost. It goes in one ear and out the other, and the doctors are not following up on the action needed. Is it because they have other things on their minds? It's frustrating… is it they are not important? Not urgent? But they are…" (2)

"I can't sleep due to shoulder pain. It's been going on two years, but I'm still not sure what it is… it's easier to take my disabled son to hospital than the GP. You hang on the phone for ages as soon as it's 8am, then you are told 'call back next Monday', or I sit and wait till the end of surgery… you go to and fro like a tennis match to the walk-in centre or A&E, and they say you should have gone to your GP, but you can't get in!" (2)

These issues were mentioned by other groups, but by no means as often, which points to the local example of Julian Tudor Hart's Inverse Care Law, where those most in need often receive the poorest quality of and access to care (Hart, J.T 1971). For other focus groups, it was more an issue of how things could be improved. Talking about problems with getting outpatient appointments, and letters going missing, *"the system can undermine the practical wisdom of doctors." (5).*

"… but on the example of blood tests - a quick phone call from the GP saying 'your results are fine', job done, all the anxiety is gone, isn't it, rather than you are thinking 'Am I alright? Have they forgotten to ring me? Has it not got through?'" (5)

Mentorship

All but one of the groups mentioned the positive benefit of appropriately skilled mentors. This was generally qualified in some way by a discussion about the availability of appropriate mentors (skilled experienced senior doctors, with time, and who were prepared to be 'candid about their failures'), and the need for supporting structures. The role of expert patients in medical education was also mentioned (5).

"Being open… to change… GPs work… all day staring at a computer screen, talking to strangers, which is not all that different to teenage boys playing. They get a very narrow view of what the world is, and how it works, and there is very little opportunity to actually talk together as a group; to share experiences. This social aspect which they need from a professional point of view… it's very isolated… there isn't much knitting General Practices together, is there?" (3)

"… the support needs to be there; the training is one thing, but there needs to be some structure that's ongoing." (3)

"… there needs to be some… way… if you don't know as a GP of being able to ask without feeling embarrassed, or defensive, or feeling like a failure… and not setting themselves up on a pedestal to say 'I've got to be perfect'… maybe it's a bit like once you've stopped holding hands [once qualified] it's like the 'P' [new driver plate] on your car once you've learnt to drive." (3)

Societal Factors.
A third group of macro, societal factors were identified durting the analysis

Informed and involved patients

Overall, more informed and involved patients was seen as a positive enabler of wise decision-making, with more informed patients likely to have a more positive experience. However, there were some notes of caution expressed about the degree to which some patients were able to or wanted to be more involved. It was also recognised involving patients in decision-making required a willingness on the part of doctors to do this, and judgements about the degree to which individual patients wanted to be involved. The Yoga group discussed this:

"… patients should be encouraged to take responsibility for their health as well, and they should be made aware of the medications. I strongly believe they should be encouraged to take responsibility for their own health… it's all very well demanding everything. I found when I was going to my doctor with the knowledge of what I am talking about, it is a completely different outcome. But people often have 2 or 3 jobs, so we have to put that into perspective. In the generation of the internet… so you're diagnosing anyway, so when you go to the doctor, the doctor is having to reassure you, 'no you haven't got this, don't worry, we'll do some tests.' You've almost armed yourself because you're not going to get a listening ear from the doctor." (1)

Another group talked about the importance of experience in enabling doctors to discern how much involvement, or choice, each individual patient wanted; and to know that some patients will react: *"that doctor was rubbish, they just want me to decide. What do I know about it?" (5).*

"I went to the senior person, and they said, 'Well, I'm not going to prescribe you anything. You do whatever intervention you've been doing to get yourself out of this depression…. which I thought was brilliant, and that helps to shape your trust level. So the doctor, they have to empathise with you."(4)

"Clinicians with years of experience are willing to involve patients who have a lot of knowledge, particularly patients with chronic conditions like diabetes and haemophilia, who say 'What's your experience been? How can we adjust things to help? Would this work for you?'. So understanding that whilst they may be clinically competent, and very knowledgeable, don't know what it's like to be a patient with a lived condition; and the willingness to involve them and ask for their expertise." (3)

This change was not universally welcomed. Some spoke about rising expectations as a result of societal changes and advances in medicine, but that patient demands were not always enablers of wise decision-making, and that shared decision-making based on honest conversations was important. Some referred to the same faces time and again at GP surgeries with minor ailments.

"We've been taken over by this new society model of how doctors, and the medical training and all that, it's got to fit in with this: 'I've got to self-medicate myself as well, and offer my diagnosis along with theirs.'" (4)

"… some ladies do go, you know, saying 'Oh, I've got a headache', but we don't expect doctors to solve everything."(2)

"… patients have got responsibilities for their condition. In society, we may manifest a great deal of demandingness and expect… but doctors may well know: 'Well, if you behaved in a different way you may not have this medical condition at all'. So in terms of ethics and wisdom… doctors are sometimes put under too much pressure, or too scared to actually challenge us patients, and therefore not able to make the wisest decisions at times. We go in demanding, and thinking we know because we looked it up on Google or whatever, but the doctor has to have… the courage of his convictions." (5)

Pressures of time and funding

Two of the focus groups explored the issue of funding of the NHS, its impact on the capacity of doctors and how this impacted on their time to make complex ethical decisions:

"… that all comes back to the fact that they haven't got the time, there are not enough doctors. Doctors are going to find it hard to do what they want to do, and what they know they should do." (1)

"Ten years ago, when you went to a GP, that GP had a bit of time for the patient; now when you look at GP surgeries, it says 'one appointment, one problem'." (1)

"I think we have lost trust in the system where doctors are part of that system. I think in the society we live, and the time we live in… sometimes people feel that if they have money or if they had money they would get treated better… we're losing it [the NHS], and it's such a shame." (1)

"It's a perfect storm… it's not tenable to keep going the way we are… but… GPs aren't terribly keen on discussing bigger issues." (3)

There was reference to managers, including Chief Executives *"put under pressure to toe the line… with a real bullying culture. People can't speak honestly.",* combined with political *"double speak"*. In terms of GPs:

"… where do you join the two elements together? The business element and the trust element, because members of the public might think they are only in it for the money. Finances are important, but how do you balance finance and people, because it's a people business, isn't it really?" (4)

"I don't know if being a doctor has that kudos any more." (4)

"I think there is a loss of trust in society of people in positions of authority like lawyers, accountants, bankers particularly; and some of that is a good thing." (3)

"… part of my upbringing is you think 'Well, a doctor's a God'; but they're not Gods, really. They're human… I am not sure there is the level of trust I remember as a child." (4)

<u>Litigation, whistleblowing and scandals in health and care</u>

"*I think the media blow problems out of all proportion… all the bad cases… and don't shout from the rafters about the good points, and I think that has probably [been] instigated by dissatisfied patients somewhere along the line. They think, 'Oh, I'm going to make some mischief here…', not necessarily for the reasons of apportioning blame, maybe because 'I can get a bit of money out of it.'" (5)*

"… what most people want to know is, 'What went wrong, and how can you stop it happening again?' So it's the open and honest thing… they need to be open, honest and accountable, and if you can do these three things; a lot of the nonsense [referring to litigation] would be cleared away." (3)

"explaining, understanding it, gives them [patients / families] peace of mind." (5)

On the other hand, *"the media is portraying them as demi-Gods." (4)*

Discussing the way in which the costs of those who need care as a result of medical negligence are covered by the State, whereas those not proven may have identical circumstances and ongoing needs but receive no State assistance, one focus group member saw this as a huge divide which society needed to acknowledge as a moral and ethical issue. Similarly, funding of a referral for help with a diagnosis of anorexia being determined by age, or if over 18 based on a point scoring system, was not seen as *"right"*

(3). Another member of that group felt that on an individual basis, doctors were taking a wider view:

"I think it is a default position with doctors generally to deal with the patient in front of you, and I think that has been changing… but it is the crucial issue for the doctor. You're faced with someone you actually know, and will go on knowing, compared with a whole population of people who you'll probably never see; who may need some sort of care. Now, how do you balance that?" (3)

"… if they could just have admitted from the beginning that there was a mistake, then maybe they wouldn't have gone to litigation." (5)

Discussing whistleblowing, one focus group suggested that *"I think to be honest, most people have looked at it more from a 'how career limiting is it for me' [position]." (3)*

"We don't really get to hear their [the doctors'] side… what the implications are… because what happens to whistleblowers, we all know." (1)

Engagement Events' findings

The analysis of these interviews is shown in appendix I and indicates how analysis of the interviews identified the following broad themes which were seen as helping a doctor make a wise decision. The analysis also indicates broad congruence with the more detailed discussions of the five focus groups.

What helps a Doctor make a wise decision?

- Communication / Listening / Emotional Intelligence.
- Decision-making, Seeking guidance and Support, Mentoring.
- Clinical Knowledge, experience and keeping up-to-date.
- Cultural Competence.
- Time / Workload Pressures.
- Design of training and continuing professional development.
- Personal attributes of doctors.

Of these seven themes, only four were referred to by patients and carers. These were:

Communication/ Listening / Emotional Intelligence

What emerged from these short interviews was the fact that all groups, with the exception only of doctors in training, highlighted communication / listening / emotional intelligence as helping a doctor make a wise decision. For patients and carers, the comments focused on the relationship between the doctor and patient; and the importance that patients were seen

as people. There was quite a focus on the further development of these skills / attributes by the other clinicians (principally nurses and healthcare assistants), by the non-clinicians and others. Poor communication / listening was seen as a factor leading to distrust:

"Communication, new medical students, doctors under pressure with lack of time, difficult if you don't see regular GP."

"See patients as people."

"Relationship with the patient. Established relationships and looking at the past history of the patient."

Decision Making, Seeking guidance and Support, Mentoring

None of these terms were mentioned by the patients and carers, but what was spoken about as being helpful was:

"asking other doctors for help."

Clinical Knowledge, experience and keeping up to date

A patient referred to the importance of being *"up to date with research"*, but otherwise this was not mentioned by patients or carers; perhaps indicating that it is an assumed attribute of all doctors.

Personal Attributes of Doctors

There was mention of the *"ability to weigh things up"*, which might be interpreted as *phronesis* 'in-action'.

How can we develop or enable wise-decision making by doctors?

In response to this question there were again a number of references to development of communication skills, along with a focus on the design of training and support. Patients and carers highlighted communication training and a wide variety of placements as means to enable wise decision-making. Doctors and other health care professionals also included these, but pointed to the negative impact of time pressures on decision-making in clinical practice. For patients and carers, the importance of exposure to different cultures was highlighted:

"Expose them to different situations, different placements, to gain wider idea of community and hospital."

"Get enough chances to relate to what they are doing, people's lifestyles (cities / rural) get / gain more understanding."

"Knowledge of different cultures."

Have we as a society lost trust in Doctors?

Patients, carers and doctors in training were less inclined than other groups to feel that as a society we have lost trust in doctors. Overall, patients and carers were evenly balanced on this question; some said trust had been lost to a degree:

"it has slightly, doctors aren't as open to questions, we are expected to take what they tell us."

"it has, because of poor communication, long words, too quick."

"They are unfriendly now, distant from the patient, and have lost their dignity now."

But others felt that society had not lost trust in doctors, but had instead lost trust in the NHS or in the system as a whole:

"We have lost trust in government - people don't trust NHS system."

"They are doing the best they can, things aren't the doctors' fault."

In summary the five focus groups have demonstrated that trust in doctors is impacted on by a range of factors which operate at range of levels from the the individual , micro level to the structural , meso level and the macro , societal level. In this way trust in doctors is not simply a facet of individual's doctors attributes, experience or wise decision making , it is also impacted upon by broader strucutural and societal factors. There was a high degree of congruence across the focus groups and between the focus groups and the engagement events in the doctor specific enablers of wise decision making. Similarly the two engagement events pointed to the impact of these broader NHS and governmental factors upon trust in the medical profession.

5. Discussion

The particularities of a given case, along with clinical knowledge, are integral to reach a diagnosis and propose a plan of care; giving primacy to the patient's best interest. Science and humanities merge here. So, clinical judgement needs to be integrated with moral reasoning, to make the right decision for *this* patient. This moral reasoning is influenced by the clinician's moral self and the moral collective/virtues of the peer group in any particular practice area- so that they do the "work" well' (Pellegrino and Thomasma, 1993: 90; MacIntyre 1981).

There has been a significant growth in clinical practice guidelines, from 73 in 1990, to 7508 in 2012(Upshur, 2014). In the face of the ever rising tide of ever-closer codification of good medical practice, many clinicians bemoan the loss of their professional autonomy; with practitioners noting the inability of these guidelines to take into account the complexity of caring for patients with multiple comorbidities and within complex contexts (Kotzee, Paton and Conroy, 2016). Rules and guidelines tend to oversimplify the complexity of the clinical situation, making, as stated earlier, patients single-pathology entities rather than the complex multifaceted (medically and socially) humans that they are, requiring a holistic approach to caring for them . The difference between a clinical decision and a clinical-ethical decision is that the latter places the focus on the *person* of the patient (Kaldjian, Weir and Duffy, 2005).

This research explored the development of moral reasoning amongst the medical community. In particular, it examined the meaning of *phronesis* (practical wisdom) from the perspective of 131 medical students and practitioners, and explored its cultivation and development over the educational and practical life of doctors. It has brought to the fore the virtues these medical practitioners consider useful to make ethically wise decisions. The findings underscore the importance of virtue ethics in complementing medical / clinical knowledge to make treatment decisions in a manner that is practically wise, i.e. *phronetic.*

The 15 virtues interpreted from the narratives of the participant (using their language) are thus the *in-situ* virtues, which show the virtues these practitioners consider important to their practice (see Table 5 in the findings section). Negotiating / deliberating with patients / carers, being fair / resource aware, making collaborative decisions in consultation with other health care professionals, being culturally competent, exhibiting emotional intelligence, being

reflective and resilient, recognising limits to treatment and being a holistic practitioner are some of the virtues that pervade the findings. A broader understanding of these virtues shows us that they are not dissimilar to what others identify as virtues in the medical profession. For example, empathy (Batt-Rawden *et al.*, 2013), care (Leffel *et al.*, 2014, Marcum, 2012), compassion (Haq, 2014); truthfulness (Jackson, 2001) and justice (Carel and Kidd, 2014). Pellegrino and Thomasma write about the virtues of compassion, prudence, justice, trust, fortitude, temperance, integrity, respect and benevolence (1993), and Kotzee et al found (from a survey they conducted) that a good doctor is a person who is "fair, honest, kind, a leader, a good team player and a person with good judgement." (Kotzee et al, 2017: 6).

However, what our findings show that the participants experience these virtues on a continuum, excess to deficiency via a mean, rather than a static act/virtue. Thus the Virtue Continuum, in the Aristotelian sense, gives "a general characterization of the virtues" (MacIntyre, 1981:154)Patients' perspectives on the doctor-specific enablers of wise decision-making too align with some virtues extracted from the doctors' narratives: being experienced, technically and culturally competent, a good communicator, a holistic practitioner and resilient. The virtue of honesty underpins trust, a virtue considered important by the doctors too. A trustworthy doctor is one on whom patients can rely, and so tell all symptoms and signs; thus enabling them to reach the correct diagnosis (Goold and Lipkin, 1999). The structural elements that enable (or disable) wise decision-making are related to guidelines, providing mentorship and administrative issues – poor administration hinders wise decisions. Societal factors such as informed and involved patients, resource limitations (time and funding pressures) and litigation also affect wise decisions. The latter two themes are also a part of the findings from the doctors' interviews. This then raises the question: are these virtues woven into the moral tapestry of healthcare, polar extremes notwithstanding (excess to deficiency), and is there a morality internal to medicine? This question, though partially dealt with later in the text, is an ongoing project.

Similar to the argument set forth by Oakley and Cocking (2001), Oakley (2007) and Ivanhoe and Walker (2007) that good character informs good practice; the development of (internalising) these virtues, as part of the participants' character helps them develop into good medical professionals which in turn helps develop a community of practitioners who consider these virtues important to attain "professional excellence" (Shelton, 1999:672). Thus these virtues are constructed as a communal practice (MacIntyre, 1981), rather than solely isolated cases /doctors. Our findings validate Pellegrino and Thomasma's argument that:

"Medicine is at heart a moral community ….; that those who practice it are defacto members of the members of a moral community, bound together by knowledge and ethical precepts; and that, as a result, physicians have collective, as well as individual, moral obligations….(1993: 32)

The virtue continuums show the spectrum of activity for each of the 15 virtues, and an understanding of these amongst the practitioners helps develop practice excellence, akin to Macintyre's thesis (1981). Thus these virtues, though discussed by individual doctors (and hence perhaps a part of their character), are embedded within the practice community of which these doctors are a part, as well. This is supported by the VE framework (Appendix G) in which virtues discussed by each participant from the four cohorts can be seen and the virtue/cohort table (Table 6) further grounds the argument that some of the virtues are practiced by these cohorts as a 'community' .

 Although a large proportion consider the mean as the virtue to possess, the polar extremes may on occasion be considered a required position to take in certain contexts; such as when the patients / carers are too overwhelmed to decide and want the doctor to decide for them, or when doctors decide how and what information to disclose otherwise *"the patient may go into melt down, paternalistic though it may be, otherwise the patient may go 'into meltdown'* "(BX03) or then in case of emergencies when providing lifesaving treatment is imperative.and judgement calls have to be made. It is in these circumstances that the doctor considers all options and decides or helps decide the best course of action for a particular patient. The overarching aim of the participants is to act in the patient's best interest. .Although the "ultimate end is the health of individuals and society", the more immediate end is the health (and wellbeing) of *this* patient (Pellegrino and Thomasma, 1993 :86)(How each goes about it may be different. For example, the findings show that some consider it necessary to help patients decide on the best option based on their (doctor's) experience; others want patients to decide, while yet others consider it important to deliberate / discuss the treatment with the patient / carer.

Since acts are contextually virtuous (Little et al, 2011), judgement is needed to discern how to act in particular circumstances. Our findings show that even when virtues are recognised for that particular practice (e.g. negotiation, reflection, cultural competence, collaboration, recognising limits to treatment etc.), knowing where to act on each virtue continuum (either at the poles or at the mean) requires discernment to act according to the right reason, which is provided by an intellectual virtue and this virtue is what Aristotle termed *phronesis* (MacIntyre 1981). Although a virtuous person / doctor may have a natural disposition to act from the right

intentions, the practical moral competency which *phronesis* provides not only helps determine the right course of action (Conroy, Kotzee and Paton, 2018forthcoming), it *makes* that act virtuous.

The findings show many of the participants consider that technical proficiency, though essential, is by no means the sole attribute of a good doctor. If they lack emotional intelligence, the ability to communicate empathetically, cultural competence, ability to reflect, trustworthiness, fairness and resilience - they seem morally deficient; nor is deficient technical knowledge on the part of the doctor a virtue (Brody and Miller,1998). Thus, our participants consider that, ethically wise decisions are guided by the their *techne* and virtues, including the ability to access and understand patients' values (Thomasma and Pellegrino 1988). Our findings substantiate: "empathic positive communication benefits patients." (Howick, 2018); albeit at the mean rather than the poles (of excess or deficiency) (Bein, 2017). However, external constraints such as resources both financial ('based on the resources available') and time ('pressurised time-wise') also affect communication and decisions made for their patients. Dearth of the said resources 'provide the conditions in which unsafe acts occur' (Vincent et al., 1998), thus affecting patient care. Worry about litigation ('covering myself' / 'legal underlyingness') also has a 'tangible effect' on the decisions made as argued by Hauser et al (1991)and Hood et al (2010). Although the polar positions were considered 'unwise', yet pragmatism prevailed. Public's perception of 'good' medical practice parallels participants'(doctors') views - which then as stated above provide traction to the argument: there is a morality internal to medicine? (see Miller and Brody, 2001 and Brody and Miller 1998)

 Although having knowledge is essential, an equally integral role; both for *techne* and *phronesis,* is the experiential knowledge which doctors gain as they progress through their careers, or from peers / mentors. This is especially true in case of patients who do not fall clearly into a specific category of illness, or have multiple comorbidities; a fact corroborated by the nursing profession (Farrington et al., 2015: 2751; Sorensen et al., 2013: 177; Marlow et al., 2014; Brummell et al., 2016). In fact so important is practical training in the development of phronesis in the nursing profession, that a study on nurses whose practical training was reduced reported that they felt that their moral and practical skills were inadequately developed (Danbjorg and Birkelund, 2011). The role of a moral exemplar is important in virtue ethics, and mentorship is a good way of imparting virtues: 'for an exemplar has taken account of the competing considerations, and reached an all things considered judgement about what is to be done' (Oakley, 2007: 88). This underpins the apprenticeship model of training, which most participants argued for since it appears lacking in present-day training.

The Virtue Ethics frameworks show how these virtues develop through the medical career of these participants.   A theme appears to be fragmentation of virtues, with a large proportion of narratives especially those related to practical aspects of the medical practice (such as knowing limits to treatment, the importance of mentorship etc. see Table ---), reflecting virtues (or vices) being narrated by more experienced doctors, 'perhaps because particulars become known from experience, but a young person lacks experience, since some length of time is needed to produce it' (Aristotle, 1985: 160 [1142a12–16]). However, there are some students and foundation year one doctors who discuss these same virtues, based on either their own experiences or observing others which contribute to these participants acquiring these virtues or knowing at what point on the Virtue Continuum is an act virtuous for this particular patient.

Having said this there are also those virtues (such as negotiating treatment plans, being culturally competent etc. see table 6) which transcend the boundary between studentship and practicing doctors and are discussed by a large proportion of our participants such as negotiating, being culturally competent, seeking guidance, having good interpersonal communicative skills - thus providing cause for optimism concerning the possibility of rational agreement' (Bereford, 1996 :209) on a set of virtues common to the practice - validating both MacIntyre's argument (1981) that all technical decisions within a practice have an ethical dimension embedded within), and Brody and Miller (1998; see also Miller and Brody , 2001), who argue that the discipline of medicine possesses it's own internal morality.

The data show that these virtues are helpful in the decision-making process when deliberating the right course of action with *phronesis* (practical wisdom) playing an important part - a fact argued for by Jordens and Little (2004). First, *phronesis* provides the practical know-how needed to turn the virtue into successful action. Second, *phronesis* enables the *phronemoi* to weigh up the importance of different virtues and competing goals in any given moral situation (Kristjansson, 2015). Thus *Phronesis* is enacted as a 'crucial virtue' which drives one 'to perceive clearly and respond well by engaging concrete circumstances through actions that are aligned with goals worth pursuing in the patients best interests., and using the moral virtues 'to ground the process of deliberation within a larger moral framework' (Kaldjian, 2010:559). According to Aristotle, while moral virtues enables us to achieve the end, prudence *(phronesis)* makes us adopt the right means to the end (1986: 161).Therefore, it seems that both *phronesis* (the intellectual virtue) and virtues of character are interdependent; a virtuous person requires *phronesis* to adapt the moral virtues wisely and make the right decision in *this* particular case and the exercise of *phronesis* requires the virtues of character (Kristjánsson, 2014;2015), while the absence of virtues of character, *phronesis* degenerates

into a capacity whereby means can be linked to any end and not to those that would bring about the good for others (MaCIntyre, 1981).

Both virtue ethics and *phronesis* are important in the caring professions - as argued for by Phillips and Hall (2013) and Little et al (2011). In line with this argument, and using the five core elements of Kaldjian's framework, the '*phronesis* in-action' that is shown in the findings integrates goals, concrete circumstances and virtues to make practically wise decisions, whilst the absence (or excess or deficiency) of these virtues results in unwise decisions – unwise because they were not in the patient's best interest, nor of the community. As the findings show motivation plays a different, though crucial, role: it is the driving force in initiating the process and maintaining the momentum throughout the process. The driving force urges the doctor to integrate the practical elements (goals and concrete circumstances) and the guiding principles (virtues as espoused in the VC) to achieve the 'good' end. Hence virtue ethics and Kaldjian's core elements engage in this *phronetic* process to arrive at a wise (ethical) decision for *this* patient. What our data appear to indicate is that the driving force, motivation, buttresses on, as the participants narrated: "goodwill; passion" (BX10); "enthusiasm" (NX02); "to do no harm" (NX08); "best interest" (BX05). Being reflective is important but it would be more useful if it is "facilitated or debriefed with someone" The *phronetic* process as a tool for teaching as well as continuous professional development both for in- process and after- process debriefing would be useful. This is highlighted in the data: "I think that probably a lot of emphasis is put on us to reflect without that being facilitated or de-briefed with someone" (N107).

To recognise an ethical dilemma and then to find its ethical resolution, irrespective of the epistemological grounding of the ethics, are core elements of ethics teaching - and all ethical decision-making tools work towards that. Having said this, the theoretical bases of most decision making tools are deontology/ principlism or utilitarianism, which are useful, but there are calls for grounding medical ethics in alternative theories (Pellgrino and Thomasma, 1993). The theoretical grounding for the tool we propose is in virtue ethics. The purpose of the video series/ production, and the virtue continuums, is to provide safe placement to medical students and practicing doctors- a requirement corroborated by the data (and presented as a poster at the IME symposium on 'Medical Education after Medical school' in 2017). Similar arguments have been made by others (see Agarwal, 2010; Lewis, Strachan and McKenzie Smith 2012; Armenia et al 2018). Henry et al (2011) showed that observing doctor-patient interaction through video elicitation interviews was useful in improving decision-making, as well as the doctor-patient relationship. Thus our video series,

based on the narratives of the participants, elicit dilemmas / quandaries encountered in a doctor's everyday practice without being intrusive, and jeopardizing patient safety.

6. Outcomes

At the outset, specific value to other AHRC programmes was expected through the hybrid social science and arts-based methodology (Conroy et al 2018). The project has delivered an educational resource in the form of the Stilwell series by following this methodology. This report goes with that resource, along with tutor notes to support the use of the resource in medical schools and CPD programmes. The series has been initially piloted with positive feedback and we have now embarked on a follow on engagement and impact project that will engage with medical schools around the UK and impact on their educational programmes at undergraduate, post graduate and CPD levels. The impact is covered in more detail in the next section but all the outcomes listed here are now contributing and will contribute to that impact. We plan to spread new understandings of the cultivation of *phronesis* in medical communities and its role in rebuilding public trust in the light of many scandals, which will also be of interest to healthcare researchers, educators, practitioners and policymakers.

The project has generated a wide variety of outcomes from academic publications to community engagement, and has already started to generate interest from those responsible for future medical educational policy through the series of workshops and other engagement activities that were an integrated part of the main project. The ranges of outcomes are set out below in the categories requested in the AHRC Research Fish reporting system and an explanation of each one is provided after that:

6.1   Artistic and Creative Products.

6.2   Influence on Policy, Practice, Patients & the Public.

6.3   Engagement activities.

6.4   Collaborations and Partnerships, and governance arrangements.

6.5   Research databases, tools and models.

6.6   Wider applicability.

6.7   Further funding opportunities.

6.8   Publications.

6.1   Artistic and Creative Products.

The project has produced an arts-based safe placement Virtual Community Creative Product, referred to throughout this report as Stilwell for short. This is a film series with accompanying suggested tutor and student notes (Appendix F.1) which has been piloted in two local partner Medical Schools. It uses a virtual community arts-based approach to the analysis of the research data to animate the findings. This involves creating a storyboard from the data, and then converting that to a video series and other social media to convey the findings as a participatory virtual community of doctors to go with the existing (Stilwell) health and social care virtual community. In this way, doctors early on in their training or in CPD can interact in a safe way as though they were in a real placement environment.

It is effectively a 'soap opera' style depiction of the findings to convey some of the stories, themes and serial of ethical decision-making. In the current follow on phase of the project we are working with medical schools across the country to show medical student/s working their way up to experienced Consultant and or GP and what they might encounter along the way. The virtual community product will be an alternative safe placement option for doctors in training who may not get to experience the volume and diversity of practical challenges that many of their predecessors used to because of the change in employment of doctors in training. They will have a chance to see ethical decision-making in embodied action by professional actors, and then debate and discuss in a safe environment what they would do in that situation. It is also appropriate for use in Continuing Professional Development settings.

What this product and intervention consist of is a virtual community representation of the findings to allow doctors in training or in CPD to put themselves in the position of making an ethical decision without risk, and deciding on the appropriate course of action in a safe way. Further debate is also possible without putting any patients at risk.

This arts-based product is complementary to the existing pedagogy of ethics education in most medical schools. Most medical schools now include case-based and small group discussions alongside traditional formal lecture-style delivery. The Stilwell series uses real stories from the project fieldwork and the virtue continuum analysis. It is therefore an up to date and high fidelity authentic depiction of the lived reality of medical students, doctors in training and experienced doctors.

Alongside this video series we are also developing a decision-making tool based on the Kaldjian analysis we have undertaken, which sheds new light on the process of complex

ethical decision-making. This tool, which we hope will be developed by September 2018, will act as an *aide memoire* for clinicians and will be tested out as part of the follow on project.

6.2   Influence on Policy, Practice, Patients & the Public.

The project has had success in engaging policy makers, including the General Medical Council (GMC), the Undergraduate Committee of the Faculty for Medical Leaders in Management and Health Education England. The GMC are in the process of issuing new guidance on consent, and have expressed a wish to place practical tools, such as the Stilwell debating tool, alongside this guidance.

Impact on practice will be determined by the take-up of the Stilwell series and the proposed decision-making tool by medical schools and the medical professions. In October 2018 the project will be highlighted to a symposium of UK Medical Schools meeting at Health Services Management Centre in Birmingham in November the project is presenting a poster and screening the Stilwell series at the Royal College of GPs Annual Conference in November (Appendix A.12).

The initial pilot of the Stilwell series at Warwick Medical School has been positive, the feedback from this was shared at the project's final workshop on 22nd March 2018. The pilot was to a group of doctors on a Masters in Medical Education Degree pathway and led to 'lively debate'. The videos were felt to be a useful resource, which these experienced doctors said they would use in practice. They were seen as presenting realistic scenarios that are encountered in practice, and capable of eliciting several interesting discussion points that can be used in teaching. They were thought to provide a focal point for reflection / exploration of values and ethics with some good discussion points generated from scenarios. The production, including the camera focus on faces showing emotion, was felt to be good; and one participant commented that it "*helped me realise some of my practice mistakes that I make subconsciously".*

The next step will be to extend the pilot to the other partner medical schools, utilising a proposal for future funding to enable a wider national pilot.

For those we have interviewed as part of this project, many of the participants (medical students, junior doctors and experienced doctors) have reported that the interviews provided a space to reflect on their ethical decision-making practice, which they do not normally have a chance to do, and in this way the project has demonstrated early narrative impact. They

said that it was particularly good to understand for themselves the different considerations (virtues) that they took into account before making a decision.

Engagement with patients and the public has been a core part of the project from its inception, and the findings from our patient and public involvement are reported in analysis of community engagement work undertaken in Chapter 4.

6.3 Engagement Activities.

The project has held three workshops since its inception. These workshops have been targeted at medical educationalists, academics, policy makers and clinicians interested in the project. The main focus of the workshops has been firstly sharing the approach of the project and interim findings; and secondly examining how the research findings and the co-produced video series can be widely disseminated and encourage effective utilisation. The workshops are summarised below, and presentations and other materials from the workshops can be found in the appendices A2, A3 and A4.

1. The first workshop was held on 11th June 2015. This half-day workshop was facilitated by the investigators, who introduced the planned study, presented initial findings from the literature review, helped refine key research questions and study design. All three partner medical schools were represented, and related NHS Trusts involved; plus academics and professionals from a range of related disciplines.

2. The second workshop was held on 6th April 2017. The full day workshop focused on sharing the interim findings from the virtue continuums, and in exploring via world café style how the project might engage with and impact on education, practice and policy. All three partner medical schools, University of Cumbria and a number of academics and practising clinicians attended.

3. The final workshop was held on 22nd March 2018. This was a full day workshop with attendees including representatives of the GMC and HEE, along with partner organisations, interested academics and clinicians. The updated findings from the virtue continuums were shared, along with the initial Kaldjian analysis. A banner

displaying the Virtue Continuum as a river was produced (Appendix A.6c) The interim findings from the project were shared. Group discussions were held on methodology, findings and Patient and Public Involvement. The day concluded with a screening of the final draft Stilwell videos along with draft student notes with comments taken from the audience.

In addition to the three workshops, there have been conference presentations (see Events Log in Appendix A1 and papers produced as a means of engagement.

Forthcoming conferences include the British Association of Management 2018. The accepted plan for that conference is a half-day personal development workshop (PDW) open to all at the conference who have an interest in leadership and ethical decision making (see Appendix A.11). It will allow them to bring their ethical dilemmas (theoretical or anonymised real) and be taken through a process that draws on the findings (plus the PIs experience of ethics and leadership decision making) to pilot, debate and receive feedback on the approach offered.
 The project will also be presenting two posters and hosting a stall at RCGP 2018 to screen the Stilwell video series and engage with GPs regarding the ways in which this might be used in GP training and Continuing Professional Development .

The project has also made efforts to engage with medical educationalists and the wider medical community. This has included poster presentations for Birmingham and Nottingham Medical Schools, and a presentation to a Birmingham CCG Annual General Meeting.

The project has also had a focus on patient and public engagement. The findings as they relate to the research aims and objectives are detailed in section 4. The specific activities included: five focus groups and two engagement events at local hospitals in Birmingham.

6.4   Collaborations and Partnerships.

Phronesis and the Medical Community has been a collaborative project from its inception. The team working on the project are shown in the organogram in appendix D.

Members of the Steering Group include each of the formal collaborative partners: medical schools and hospital Trusts of Birmingham, Nottingham and Warwick and Health Education England. There has also been lay and doctor representation, as well as academics and professionals from a range of related disciplines.

The project has a number of collaborative partnership arrangements in place as set out below:

Project Collaborators		
Collaborator	**Collaborating Organisation**	**Contribution**
Dr Hendrick Kotzee	Dept of Education, University of Birmingham	Co-I 2015-17 Director of Medical strand of 'Values and Virtues in the Professions' Project in the Jubilee Centre for Character and Virtues, and brings expertise in applied ethics.
Catherine Hale	Senior Lecturer in Medical Law and Ethics , Medical and Dental School, University of Birmingham (2015-17), 2017 onwards Medical School , University of Warwick	Co- I Expertise in the discipline and teaching of medical ethics and law to both medical students and doctors, within medical schools, post-graduate deaneries and hospital Trusts. Expertise in curriculum design and review, novel teaching methods, teaching management, as well as student engagement. Link with the collaborating medical schools and hospital Trusts: pivotal in gaining commitment from the external partners.
Prof.Kristjan Kristjansson	Professor of Character Education and Virtue Ethics and Director of Research at the Jubilee Centre for Character and Virtues at the University of Birmingham.	Co-I and consultant to the project 2015-16 Advice on literature, theory, instrument design and analysis. Author of six books on virtue ethics, moral development and education and the author of numerous peer-reviewed journal articles. He is an acknowledged expert on neo-Aristotelian approaches to virtue ethics.

Prof. Angus Dawson	Professor of Public Health Ethics and Head of <u>Medicine, Ethics, Society & History</u> (MESH) at University of Birmingham, now Professor of Bioethics and Director of the Centre of Values, Ethics and the Law in Medicine (VELIM) School of Public Health at the University of Sydney, Australia.	Co-I and consultant to the project from . Advice on literature, theory, instrument design and analysis. Interim PI during Dr M Conroy's absence. Extensive publications in medical ethics, long-standing interest in the production of ethical behaviour in health professionals, involved for many years in training members of research ethics committees and teaching ethics to medical students, public health professionals and trainees in the UK and abroad. He is joint Editor-in-Chief of the Journal of Public Health Ethics and is active on the editorial boards of five other ethics journals.
Steve Wood, Michael Mitchell and Sian Owen	University of Cumbria	UoC own and host Stilwell (a virtual community of storylines using a range of media including video). Worked collaboratively with the project team to produce the scripts showing progression of two students from medical school to experienced doctors, based directly on narratives from the research. The medical community video series has been produced using professional film crew and actors and shows insight into the cultivation of *phronesis* through the life of a maturing doctor.
Dr Deborah Biggerstaff	Warwick Medical School, University of Warwick	Co-I from inception of project and Warwick PI. A Chartered Psychologist with extensive expertise in clinical education, novel and innovative teaching delivery and curriculum design across both undergraduate MBChB and postgraduate teaching.. Also experienced in teaching management and leadership for core modules, Masters in Medical Education and

		student engagement.. Member of Steering and Operations Groups. Link with the medical schools and instrumental in educational engagement for WMS e.g. obtaining ethical approval for WMS. Contributor to phronesis project workshops. Piloted Stillwell film episodes in own teaching engagement and feed back from postgraduate students d educators.
Lt Cdr Alan Brockie, Royal Navy	Defence Medical Services, and Honorary Lecturer at University of Birmingham's Medical School and Birmingham City University's Faculty of Health and Life Sciences.	Involved in the project from Jan 2016 , made a Co-I in 2017. Member of the Steering and Operations Groups. Has enabled the participation of military doctors and doctors in training in the project. Carrying out a PhD study that has a strong link to the project. An experienced lecturer to medical students and doctors in medical law and ethics. Also an NMC-registered nurse teacher.
Dr Chris Turner	Consultant in Emergency Medicine, Coventry and Warwickshire NHS Trust.	Co-I since 2017. Member of the Steering Group and key involvement in the dissemination of findings. Became involved with this project through his work in Mid Staffs, particularly around describing where relationships broke down decision-making went awry. He has previously completed work on leadership beliefs of junior doctors, preferred leadership styles in emergency departments and good trauma team leadership.
Dr Richard Knox	Clinical Associate Professor Deputy lead for primary care teaching Co- Director of Professionlism and ethics , School of Medicine	Co-I since inception Member of the Steering Group Key role in sourcing interview participants Key involvement in dissemination of findings to GPs in particular

Prof Phil Begg	Prof of academic innovation at University Hospitals Birmingham and at Royal Orthopaedic Hospital Birmingham	Member of Steering Group and advisor on means of further disseminating research findings and video product within the NHS.
Jo Plumb	Deputy Director of Research Development and Innovation, University Hospitals Birmingham	Member of the Steering Group and advisor on means of further disseminating research findings within the NHS.
Dr Sabeena Jameel	Associate Dean for GP Education, Health Education England, West Midlands	Official partner advising on ways to use the network of National Health Education England in order to disseminate the findings and video product to other post-graduate medical educators.
Dr Christine Johnson		

Table 11 : Project Collaborators

Each school also provided a key individual to be a member of the project's steering group (Ms Catherine Hale, Dr Richard Knox, and Dr Deborah Biggerstaff). These individuals were instrumental in providing access to participants, and in providing insights to the wider team regarding the organisation of medical education in their schools.

Their positioning has allowed some early piloting of video clips by incorporating them directly into existing teaching of ethics, and values-based medical education. This has informed the finalisation of the videos and the student notes to accompany them. It is envisaged that if follow-on funding is secured, this will also allow them to generate a curriculum review of medical ethics and professional values teaching within their own medical schools and make recommendations for modifications or amendments to the existing teaching programmes on the basis of the study's findings.

Access to other doctors and to observational settings was also provided by Lt Com Alan Brockie and Dr Chris Turner, who have also been key members of the project Steering and Operational Groups.

The governance arrangements for the project have also fostered collaboration. The project has been overseen by a Steering Group which has included representative members from

both beneficiaries and collaborators in order to maximise the potential uptake and application of the research. Members of the Steering Group include each of the formal collaborative partners: medical schools and hospital trusts of Birmingham, Nottingham and Warwick and Health Education England; along with a lay representative and doctor representative.

The Steering Group met four times in the first four months, with an initial workshop in order to refine the aims, objectives (with an emphasis on 'pathways to impact' of outputs) and research questions. In addition, throughout the study, the Steering Group has met quarterly, in order to direct and respond to the research. The SG was chaired by the PI, Dr Mervyn Conroy.

There have been three groups which have reported to the Steering Group. These are:

- Operational Group which has met once a month to review progress on each activity and ensure all objectives are being met, which is chaired by the PI,
- Coding Group which has met once a month to analyse the data collected from the fieldwork and produce findings which was chaired jointly by the PI and Aisha Malik.
- Marketing Group which was established in 2017 by Chris Turner, with a focus on disseminating the findings and outputs of the project. The group has employed a series of tools including a Twitter feed, conferences, public engagement events and publications to market the project and engage with media, medical schools, medical practitioners, policymakers, patients and the public. This group was chaired jointly by the PI and Catherine Weir.

6.5   Research databases, tools and models.

The research findings have been analysed using the framework of a virtue continuum (Conroy et al 2012) which has identified virtues, their means and poles. The project's three workshops have demonstrated that the virtue continuum is a helpful way of enabling clinicians and academics to understand connectedness as a set of continuums. Participants talked about complex ethical decision-making, and moving from one pole to another in the development of *phronetic* decision making. It seemed to give them a way of expressing their social reality of connectedness when working in Health and Social Care Communities. Notable by their absence, both in the workshop and feedback seminar, were accounts of sacred / profane or moral / immoral continuums; which are arguably consistent with Macintyre's thesis (1981).

Our research findings, and feedback from our workshops, have been analysed using the theoretical lens afforded by McIntyre; to understand the notion of virtue as a mean growing out of engagement and debate within practices. This has led to the articulation of a set of virtues and a virtue continuum derived directly from our primary data. Using a virtue continuum lens, we mapped stories of connected communities and have shared these at the project workshops to gauge validity and resonance with participants. Within the workshop, we heard examples of practice which countered policy and practice impositions perceived as potentially disruptive of communities by pre-defining the terms of engagement. The focus was the incremental development of working relationships within and across communities, engaging with the learning in communities and seeking to develop a common purpose.

A great deal of interest has been shown in the methodology and the PI, Dr Mervyn Conroy, has been approached by academics from the UK and the US who have asked him to share the methodology so they can replicate the study with medics and nurses in healthcare institutions connected to their universities. That work will be progressed with further research proposals to be developed in parallel with and be informed by the follow on engagement and impact project.

Our methodology and methods, including the virtue continuum model and arts-based virtual community analysis, have already been requested for replication in the US within the medical community by a senior academic in the field at Virginia University.

6.6   Wider applicability.(www.birmingham.ac.uk)

Virtually all citizens of the UK, and some international visitors receive care from doctors in the NHS, and have an interest in being treated with dignity and receiving good care, which is inextricably linked with *phronesis* (practical wisdom) and professional values (Good Medical Practice GMC 2013). This study has explored what it means to doctors through their professional careers to cultivate *phronesis* (practical wisdom) in the midst of navigating the complex world of healthcare in an era of markets and user choice. It has conveyed their accounts of context-dependent, localised and 'good' decisions for patients and the wider community. The project has also explored the role that the concept of *phronesis* plays in strengthening and sustaining trust between the medical community and the wider health and social care community in which they practice.

Given recent health and care scandals in the UK, a greater emphasis on (initial and continuing) education in appropriate ethics and virtues in the NHS has been called for. Therefore, a video series which enacts the findings and which can be viewed by other researchers and used in educational settings has been produced to contribute to the debate, and provide impact on medical education as rapidly as possible. The Stilwell series demonstrates a range of practices (identified through the research) and shows maturing medical practitioners gaining a sense of what it means to make good decisions despite the complexity of their roles and pressures they experience. The specific aims of the study are threefold: first to explore the nature, transmission and enactment of phronesis by doctors through medical education and into practice; second to develop a methodology that combines arts and humanities with social science to reliably understand and convey *phronesis* in the institutions that participate in the study; third to explore the role that *phronesis* plays in strengthening and sustaining bonds between the medical community and the wider community. The methodology developed (described in the methodology section) will be applicable to other sectors, such as care, education, law and business; and therefore the research promises much wider social and economic benefit.

6.7 Further Funding.

Follow-on funding for the PMC project was awarded by the AHRC:

6.7.1 The project has delivered a return on the AHRC's investment by developing a product with the potential to impact on the medical and professional education of doctors as a community, and thereby build stronger links between the medical community and the public and rebuild public confidence in the medical profession. To investigate the impact of the Stilwell virtual safe placement model beyond the three partnering University Medical Schools. We would recruit medical schools across the UK to pilot Stilwell, and investigate its impact both at the pedagogical level, as an approach to teaching and learning, and at the practice-based level in terms of its impact on doctors' practice. We would also involve providers of Continuing Professional Development to investigate the impact on experienced doctors. We have had initial interest from the General Medical Council in terms of resources to support their forthcoming revised guidance on consent, and we would plan to work with them and Health Education England along with other medical

education policymakers, leading practitioners and medical education leading academics. This is believed to have potential for significant social and economic benefit to doctors and to the wider community. An application for follow-on funding has been submitted to AHRC and is awaiting a decision.

6.7.2   International Comparative Study. This has emerged from discussions with interested international academics in the field in Scotland, the US, Canada, Europe and Developing Countries who are interested in replicating the study. This includes a leading academic in the US from University of Virginia, who is very interested in replicating the study at her institute. These academics would replicate the study in their country with support of the UK team. Academics and leading authors in the field would be invited to take part in an initial workshop to work out how best to carry out this type of research.

6.7.3   Community Care. To carry out a UK-based investigation of whether the move to community based health and social care, rather than hospital-based, has an impact on ethical decision-making and the practical wisdom required to make appropriate decisions for patients and the communities they live in.

6.8 Publications.

The project has led to a number of publications, which are either already published or have been accepted for publication. These are listed in the table below.

In addition the project has maintained an up to date presence on the Health Service Management Centre's website (http://www.birmingham.ac.uk/schools/social-policy/ departments/health-services-management-centre/research/projects/2015/phronesis-and-the-medical-community.aspx) and is also active on Twitter: @PhronesisMC. Individual Co-Is also include information on their personal page of their University/ medical school websites.

The project has also contributed to various academic and community based conferences, AGMs and events (see Appendix A1 for a full list of events and publications and A5a, A5b, A9 and A10 for examples.

In addition a small ethnographic study was conducted at Warwick Medical School, spring 2018. This explored the medical students' phronesis journey. Molloy, E. and Biggerstaff, D. L. 2018 (See Appendix H)

Biggerstaff, D.L. Phronesis short story examining practical wisdom in life (work in progress)

Publications

Phronesis as an ideal in professional medical ethics: some preliminary positionings and problematics.

Publication date	10 2015
First Named Author	Kristjánsson K
Other Authors	
Publication Type	Journal Article / Review
Is Published	Yes
Journal	Theoretical medicine and bioethics (V: 36, #: 5, Pg: 299-320)
Publication ID	26387119

Identifiers:

Data Source	PubMed
PubMed ID	26387119
Digital ID	10.1007/s11017-015-9338-4
ISSN (Print)	15730980
ISSN (Digital)	1573-0980
ISSN (Linking)	1386-7415

Towards an Empirically Informed Account of <i>Phronesis</i> in Medicine.

Publication date	2016
First Named Author	Kotzee B
Secondary Authors	Paton A, Conroy M

Empirical Study of Phronesis in Healthcare: a Literature Synthesis Review

---

Medical Phronesis Research: A Social Science and Arts-Based Hybrid Approach

---

Leadership Matters? Finding voice, connection and meaning in the 21st Century

Chapter Pages   10

Chapter Authors   Conroy M, Hale, C, & Turner, C

Identifiers:

Data Source

ISSN (Print)

ISSN (Digital)

ISSN (Linking)

Phronesis in medical ethics: motivation as a pervasive rather than a singular element

Publication date   *Submitted (awaiting response)*

First Named Author   Malik A

Secondary Author   Conroy M, Turner C

Publication Type   Journal article

Data Source

ISSN (Print)

ISSN (Digital)

ISSN (Linking)

Findings From a Study of Phronesis in Medical Leadership Ethics and What They Mean for Wider Leadership Ethics Theory.

Publication date	In progress
First Named Author	Conroy M
Secondary Authors	Malik A, Hale C, Weir C, Brockie A and Turner C.
Publication Type	Journal Paper

Identifiers:

Data Source

ISSN (Print)

ISSN (Digital)

ISSN (Linking)

Wheel of Wisdom and a staged approach

Publication date	2019
First Named Author	Conroy M
Secondary Authors	Malik A, Hale C, Weir C, Brockie A, Turner C.
Publication Type	Journal Paper

Identifiers:

Data Source

ISSN (Print)

ISSN (Digital)

ISSN (Linking)

Medical Phronesis: What does the term mean theoretically to key authors in the field?

Publication date	2017
First Named Author	Conroy M
Secondary Authors	Kotzee B, Kristjansson K

Journal	Theoretical medicine and bioethics
Publication ID	*Submitted and awaiting review*

Identifiers:

Data Source	PubMed
PubMed ID	
Digital ID	
ISSN (Print)	
ISSN (Digital)	
ISSN (Linking)	
Publication Type	Submitted to

Community Engagement and Patient and Public Involvement –case studies in the NHS with a focus on patient and community perspectives on wise decision-making by doctors

Publication date   2019

First Named Author   Weir C,

Secondary Authors   O'Hara, M, Conroy, M. & Begg, P.

Publication Type

Is Published

Journal

Publication ID

7. Impact Summary

Doctors must demonstrate high level skills in managing complex clinical and ethical decisions, but little is known about what it means to them to develop these wise decision-making skills. Doctors make complex clinical and ethical decisions on a daily basis and have a vast (some might say overwhelming) array of guidelines, formularies, processes, and national and local policies to draw upon and consider. However there are few educational or practice-based resources to either facilitate the decision-making process itself, or to review decisions.

The main impact of this project has been to address both of these gaps in knowledge, and to develop some resources to facilitate wise decision-making.
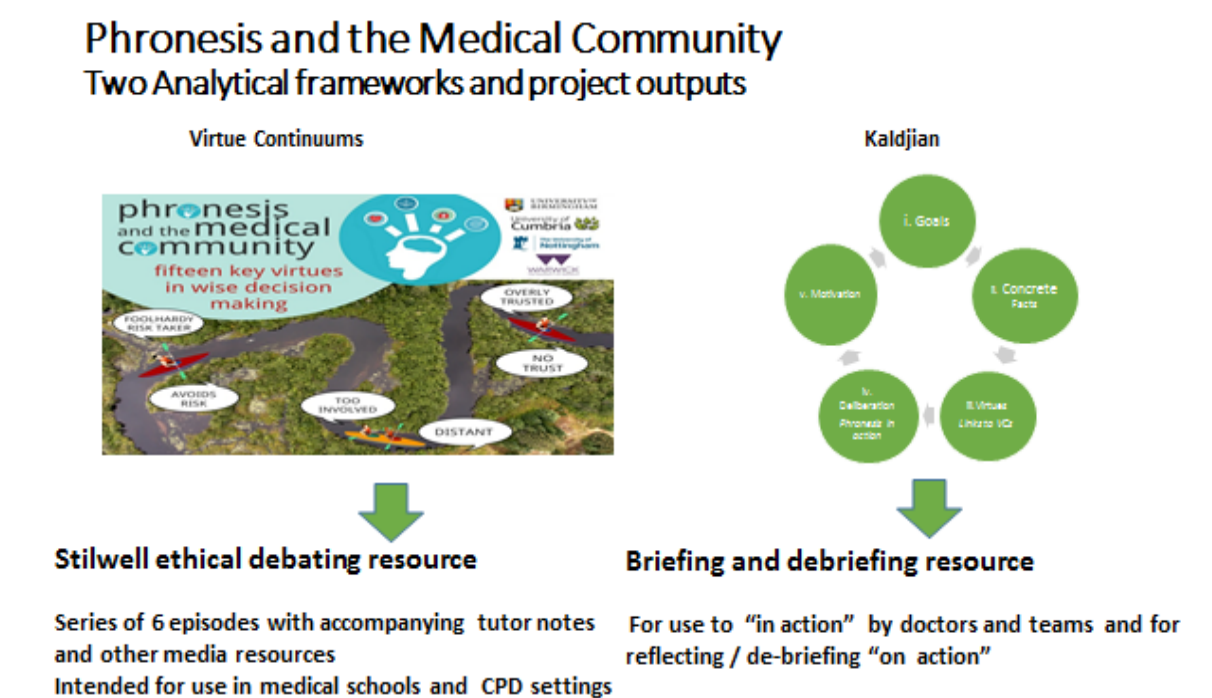
As the first large-scale, empirical study of wisdom development (*phronesis*) in doctors, to our knowledge, we used a hybrid methodology which made no prior assumptions regarding the decision-making process used by doctors. Medical students and doctors narrated their own stories of the development of wise decision-making and these were subjected to analysis through two established frameworks (Conroy et al.'s Virtue Continuum (2012), and Kaldjian (2010) analysis).

We found that individual doctors and medical students constructed in their narratives a combination of a describable process and a deeper, more nuanced set of 15 virtues or ethical decision components to arrive at wise decisions, including the balancing of their need to negotiate and have honest / difficult conversations using trust, emotional intelligence, resilience, and reflection.
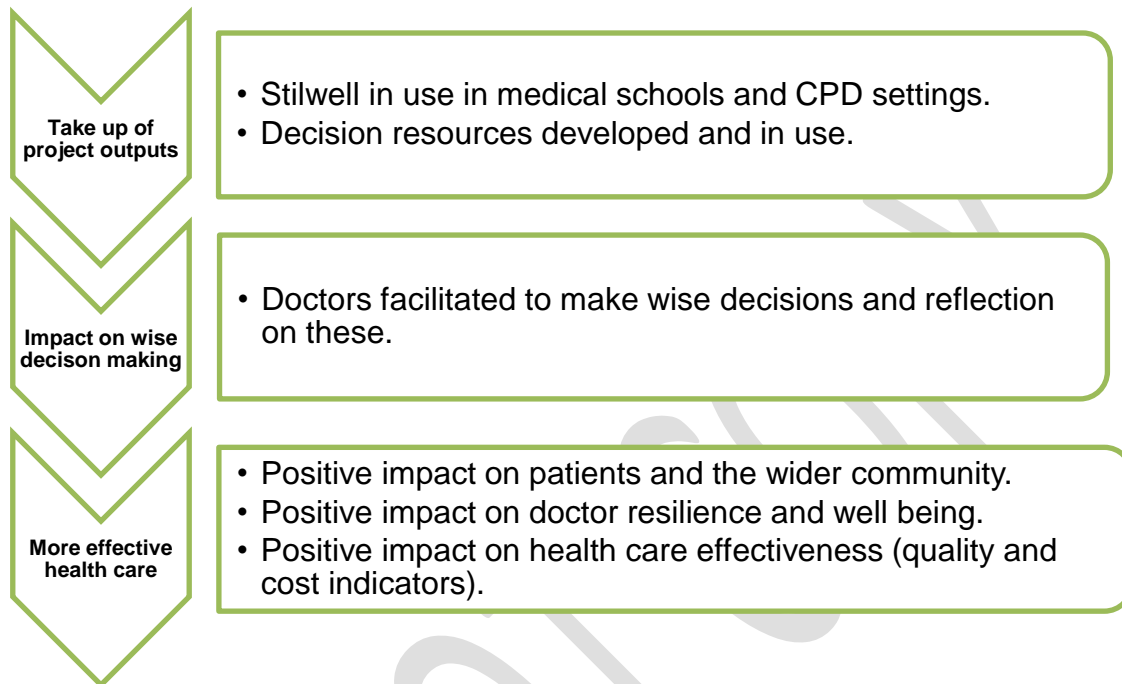
What we found was that *phronesis*, the process of making practically wise decisions, is a concept many experienced doctors narrated. What we have done is to unpack the meaning of *phronesis* to our participants enable some practical steps to be set out which would enable the nurturing of phronesis at all stages of medical education, benefiting both future doctors and patients. This has implications for medical education at both undergraduate and postgraduate level and for policy makers.

The main output of the project has been the development of an effective educational tool (a Stilwell video series) based on our set of 15 identified virtues. The Stilwell video series and its accompanying tutor notes (See Appendix F) adds a validated arts-based moral debating tool, depicting real-life clinical situations, to the existing suite of ethics education and development resources. Its intended use is across undergraduate, post-registration and continuing professional development settings. The series has been piloted with positive feedback and we have now embarked on a follow on engagement and impact project that will engage with medical schools around the UK and impact on their educational programmes at undergraduate, post graduate and CPD levels . The project has therefore delivered a a return on the AHRC's investment by developing a product with the potential to impact on the medical and professional education of doctors as a community, and thereby build stronger links between the medical community and the public and rebuild public confidence in the medical profession. All the outcomes listed above are now contributing and will contribute to that impact.

A second output is the proposed development of a decision-making tool (a briefing and de-briefing resource to reflect "in action" and "on action"). This tool will be based on our later analysis using our second analytical framework; derived from the theoretical work of Kaldjian. This study provides the first empirical testing of Kaldjian's framework by examining the practice of wise decision-making as described by the 131 doctors and medical students participating in our project. It shows what the process means to the participants. Early indications are that this concurs with, and builds on, Kaldjian's hypothesis. The route to these two outputs is shown below:

Phronesis and the Medical Community
Two Analytical frameworks and project outputs

Virtue Continuums

Kaldjian

Stilwell ethical debating resource

Series of 6 episodes with accompanying tutor notes and other media resources
Intended for use in medical schools and CPD settings

Briefing and debriefing resource

For use to "in action" by doctors and teams and for reflecting / de-briefing "on action"

The evidence obtained from asking doctors what it means to them to be making complex ethical decisions involves a series of interlinking virtues (all of which exist in a 'virtue continuum')This has led to the development of the Stilwell video series and the proposed briefing and debriefing resources which we are in the process of developing.. The use of a practical tool to facilitate decision-making and reflection on decision-making, will be to lead to more effective and wise decision-making. This should, in turn, impact on the effectiveness of health services delivery. In addition, these can enhance the health and wellbeing of patients, the community and health care practitioners. The resultant potential social and financial impact of the project, assuming positive uptake of the learning and the educational tools, is therefore projected to offer some significant benefits most obviously to other health care professionals and their clients.

Take up of project outputs
- Stilwell in use in medical schools and CPD settings.
- Decision resources developed and in use.

Impact on wise decison making
- Doctors facilitated to make wise decisions and reflection on these.

More effective health care
- Positive impact on patients and the wider community.
- Positive impact on doctor resilience and well being.
- Positive impact on health care effectiveness (quality and cost indicators).

A secondary impact from the project relates to the inter-disciplinary transferability of the project's core methodology. The methodology developed is applicable to other professional sectors such as care, education, law and business; and therefore promises much wider economic benefit and competitiveness for the UK. The hybrid methodology (Conroy et al., 2017) has for example generated strong interest from an academic in the US who would like to replicate the study with the medical community in the US.

Immediate beneficiaries

1. Patients – The video series and learning resources combined refocus clinical care on 'good action', and the practice of better integrating professional virtues within patient care. As the video series and learning package becomes more widely viewed and disseminated within the profession, the demonstrable link between virtues and good patient care will therefore be increasingly promoted. Francis (2013) makes a direct link between healthcare professionals' values and patient care. However, although both the GMC (2013) and Francis (2013) have hitherto emphasised the importance to patient care and safety of virtues in good professional practice, neither report highlighted the means of *how* to achieve *phronesis* and virtuous professional practice. Our research does, we argue, afford a

significant contribution to the understanding and knowledge of how phronesis is generated. With the video series and learning package, we provide a mechanism that enables the medical community to foster and inculcate virtues within their professional practice; thus offering the medical community resources to bring improved patient clinical outcomes and experience and community well-being.

2. General Public - virtually all citizens of the world receive care from doctors in at some point in their lives; and have an interest in being treated with dignity and compassion and to receive good care, which we have argued, are interests that are inextricably linked with *phronesis* and sound professional values (Good Medical Practice GMC, 2013). Our research and learning resources will now provide both an academic understanding and pragmatic tool that can be used to underpin and bridge the relationship between professional values and good patient care.

3. Medical Students and Doctors – one of the aims of the research was to improve facilitation of the accumulation of practical ethical wisdom and resources for the medical profession to develop professional moral debate based on virtue ethics. For the first time, we have an understanding of *phronesis* means to the medical community; and have created a learning package to support the growth of *phronetic* medical practice. The Stilwell moral debating resource (and the proposed decision-making tool derived from the Kaldjian analysis) has significant potential to support both wise decision-making in the moment, and retrospective nuanced analysis of previous ethical decisions. These *phronesis*-fostering resources have the potential to accelerate and guide the acquisition of ethical wisdom and *phronetic* medical practice for both qualified doctors, and doctors in training.

4. Study participants – the process of interviewing participants has provided them with the scope to reflect upon and discuss their clinical actions, debate implications and alternative ways of acting in a safe environment. Research (Corley, 2001) has indicated that that the process of reflection and discussion for clinicians is associated with greater patient satisfaction and outcomes that lead to greater job satisfaction for clinicians, and reduces stress levels. There is also evidence that doctors become psychologically compromised (Shale, 2012) when the right course of action is unclear or where there are competing ethical demands and the pathway of the virtuous or good doctor is not clear.

5. Allied health care professionals – healthcare in modern hospital settings is delivered by teams, as opposed to isolated and individual doctors. Therefore, doctors' actions and ethical decisions are contextually set within in a particular health care team. As such, doctors and medical students alike can act as good *phronetic* role models as members of multi-

disciplinary teams (typical in the provision of secondary care), improving interaction and influencing the allied health contingent within the membership. Educational resources and 'good doctor' role models can also create the opportunity for any interacting health care professionals to acquire their own practical wisdom, as they emulate and replicate medical professionals' behaviours within the team (Hilli et al., 2013).

6. NHS - the relationship in the NHS between patient outcomes, complaints, medical negligence claims and resulting financial cost to the NHS is acknowledged by the Department of Health (2012, 2014). Many complaints within the NHS are focused on poor, or non-virtuous decisions and attitudes of staff towards their patients (Health Service Ombudsman, 2011). Our research and learning package helps doctors and medical students realign their professional values (that only add value to them or the organisation) to focus on virtues, and therefore can contribute to the improvement of patient experience, clinical outcomes and wider community goods as well as general safety and care within a health system such as the NHS. The Health Service Ombudsman (2011)

acknowledge that better care leads to better clinical outcomes and improved patient experiences

7. Medical Schools and Health Education England – part of the research aims were to improve medical ethics and professional values teaching at both undergraduate and post-graduate level. Internationally medical schools, both for undergraduate and post-graduate level, have little consensus about how medical ethics should be taught and how it should be best taught (Romanell Report, 2015;Hester , 2016), and we are unaware of suitable resources commonly used by the teaching community. Our teaching and decision-making resources enable medical educators to be better able to meet the objectives of the requirements of the medical regulators, government and the Department of Health when teaching the GMC's concept of what makes 'a good doctor'. In particular, the requirements of the GMC in 'Tomorrow's Doctors', the Medical Leadership Competency Framework and post-graduate medical curricula now have new methods to meet the demands and definitions of good medical practice (GMC 2013).

8. Other professional groups - this research offers transferable learning to other equally-affected sectors, especially social care, because some of the information produced and insights we have gained are applicable to other professional environments and groups. This is particularly timely given the crises in public confidence about the professional values and lack of virtuous practice in banking, government, the media, social care, the police, etc. Two examples of early impact are set out below.

Example of impact: pilot of Stilwell at Warwick Medical School.

Towards the end of the project, February, 2018, a small pilot study was undertaken using a sample from the Stillwell film materials at one of the study sites (Warwick Medical School). Postgraduate students, all clinicians, studying on the course on Evidence and Values in Clinical Education, were presented with a sample of some of the 'first cuts' from the film materials. These were presented as a workshop session embedded within the timetabled activities for their Masters in Clinical Education, M Med Ed. After a brief introduction to some of the core concepts underlying the *phronesis* study, the lecturer (DB) showed the class each film unit. The class was given time between each clip and invited to discuss the incident they had just viewed. A lively debate followed each of the film clips. These discussions offered opportunity for the tutor to bring home some of the earlier classroom teaching, especially around current issues in values-based medicine (Fulford, 2008). At the end of this session students, were asked to provide feedback and share their views about the clips. Using a short pro-forma students were asked two main questions:

- Had they found 'anything that was interesting or helpful about the film clips'?
- If they had found "anything unexpected or unusual"?
- Further comments were also invited.

A brief summary of their feedback is provided in Table 12

Stilwell Pilot:Feedback from Students

Anything interesting or helpful?
"Very good clips and played well. How the student developed and gave feedback when he was a GP."
(Clinician, 18 years post-qualification)
"Very poor communication in skills, no empathy, lack of values. It helped me realise some of my practice mistakes that I make subconsciously."
(Clinician, 25 years post-qualification)
"Well-focused clips, well-chosen individual issues portraying a breadth of clinical scenarios and primary / secondary care."
(GP, mentor to undergraduates, 15 years post-qualification)
"Clips present realistic scenarios that are encountered in practice, and elicit several interesting discussion points that can be used in a teaching session. Good length of clips. Good focus point for reflection and exploration of values and ethics."

(Clinician, 2.5 years post-qualification)
"Covered important subjects. Films very natural […] I can see that clips will stimulate debate."
(Medical Specialist Registrar, Clinical Education Fellow, 6 years post-qualification)
Anything unexpected or unusual?
"The patient was not given enough time for breaking bad news!"
(MRCS, education and clinician, 25 years post-qualification)
"I believe it would be unlikely that a trainee spoke up to a consultant, but portraying it this way enhances the learning experience, so no problem."
(GP, undergraduate mentor, 15 years post-qualification)
"Yes, clip flows through different scenarios with a med student as one of the focus (sic), because some med students may have been in similar situations but have not discussed about it / raised the issue e.g. fear of offending their seniors."
(Clinician, Clinical Education Fellow, 2.5 years post-qualification)

Table 12 : Stilwell Pilot: feedback from students . Summary of sample responses from postgraduate students who were presented with sample video clips.

As the data excerpts provided above show (Table 12) students were highly engaged with the discussion generated by the film clips they were presented with. Class discussion around some of the issues involved in the concept of *phronesis*, and how it might develop over time, led to further debate on situations they had encountered from their own clinical experiences. The class conversation then developed into how they had attempted to deal with these experiences and personal or professional challenges at the time. These clips, being quite short, were easy to incorporate with other lecture materials. They were considered to enhance the teaching experience on this occasion, and students were interested to have a part to play in piloting the *phronesis* film materials. The lecturer now intends to retain the finished version of the film excerpts for her course in the future.

Example of impact: Military FY2 re-interview

During the longitudinal phase of the study, one of the researchers re-interviewed the military doctors who were just beginning FY2; having been interviewed 12 months previously as new FY1 doctors. Immediately following their interviews, during the closing conversation (i.e. off-recording), two of the participants told the researcher that they had found their participation in the study very useful in practical terms. Both stated that as they continued to

accumulate clinical experience, they increasingly though back to their discussions with the researcher and felt much more prepared to not only recognise ethical dilemmas in their practice; but also to work pragmatically to resolve them. This preparedness, they reported, included a heightened sense of self-awareness in relation to the decision to be made; and an increased confidence to critically analyse such situations and seek appropriate support.

These positive sequelae of the study were reiterated by another FY2 participant; this time at a military course entirely unrelated to the project. The researcher had just delivered a session to military doctors on the Defence Medical Services' chosen tool to assist with ethical decision-making; the 'Four Quadrants Approach' (MOD, 2012). This doctor thanked the researcher for his interviews 'opening their mind' to the role of practical wisdom in ethical decision-making in medical practice, and that as a peer group of military doctors they now found themselves sharing more and more examples of ethical dilemmas and talking them through. The doctor thought that the tool they had just learned about would be ideal to facilitate this process. These kinds of post-fieldwork revelations by participants highlight the need for a simple, practical tool to help doctors to discuss ethical dilemmas in the clinical environment; one particular aspiration which our proposed follow-on research is well-placed to address.

8. Conclusions and Contributions

In conclusion, we have made the following contributions to the field of medical leadership, ethics and clinical practice education:

1) An understanding that good and wise decision-making by physicians goes beyond following a set of guidelines or rules, or working out only the consequences of their actions; but also requires the ability to discern the relevant virtues to any particular situations with their colleagues.

 2) We present a theoretical mapping of fifteen virtue continuums for the medical community based on the research. The virtue continuums are conveyed in the stories told by the participants and convey the combined wisdom from our participants; what individual doctors, construct into their practice and transmit to others. This mapping showed that for each virtue, as narrated by the community of practitioners, there is a continuum from vice to vice via a mean. What we have subsequently theorised is that there is a mean point in each case, arrived at via moral debate with fellow practitioners which results in collective working towards wise action.

3) *Phronesis* is cultivated over time to offer a way to balance competing demands, relationships, multiple conflicts and a range of functional goals to find an ethical decision point that will bring good outcomes for their discipline, the professionals who are part of their profession community, the people they serve with their services or products and their communities.

4) The Virtue Continuum mapping is underpinned by particularity, working towards wise decisions guided by the executive virtue of *phronesis*. That is, the ability to discern relevant virtues, either in discussion with peers or senior colleagues, helps doctors make ethical / wise decisions for a particular patient. Thus even when virtues are discerned for that particular practice (e.g. negotiation, reflection, cultural competence, collaboration, recognising limits to treatment, etc.) knowing *where* to act on each virtue continuum requires the development of *phronesis;* which can be regarded as the adjudicating or executive virtue.

5) The methodology developed is a hybrid original that combines narrative-based interview approaches with an arts and humanities analysis to produce an educational debating resource in the form of a video-based odyssey, plus other educational resources including tutor notes and a tool to enable pre, in and post action reflection. This methodology can be used for any

professional discipline inside or outside the healthcare sector to produce ethical debating resources for that discipline.

6) The odyssey is made up of six episodes that follow a medical consultant and a general practitioner as they navigate their way from medical school to experienced practice. All the video series scripts are based on findings (narratives) from the research, so the resource brings the findings alive and provides an accessible way of understanding them. The video series provides a moral debating resource for medical schools or in Continuous Professional Development (CPD) environments. The moral debating resource assists medical practitioners in establishing the wise steps to take in ethical decision-making across all the relevant virtues for the situations they encounter in their practices. It also allows them to build on the mapping so they can add other virtues for particular situations or modify the ones we have found.

7) We are currently working on the theoretical development of the *phronesis* concept. The first development in this is that practitioners can work on a two- or three-stage process for deciding on the way forward, rather than it being a single-stage decision process where they have to consider all the virtues at one time. The answer to the question: 'what ought I/ we do in this case?' could be sought by individual doctors by answering in discussion with fellow practitioners. Additionally we have found MacIntyre's thesis associated with virtue ethics for practice based communities to be the most relevant, both in the findings and in the medical ethics literature associated with phronesis, and therefore we argue is the key background resource for practitioners and educators at present.

This is what I/ we would do in this disease/illness is looking towards the 'scientific realm' for an answer. But *this* is what I/we *should* do in *this* particular case; guided by both medical knowledge and their practice virtues shifts the decision from the 'scientific realm' to the 'moral realm of the patient's good' (Kaldjian 2010: 560) and the community's good.

This is now being developed into a decision-making resource or tool to aid 'in-action' and 'on-action' reflection. This has been presented in initial form at various conferences over the last 12 months including the British Academy of Management 2018, Royal College of GPs 2018 and the GMC Faculty of Medical Leadership and Management 2018 conferences. The findings and film series created a lot of interest and the feedback was very positive e.g. we have now been invited to present at GMC head offices in January 2019. We also have been granted a follow on impact and engagement fund by the AHRC to continue the engagement and impact process. Again initial evaluation from a recent workshop attended by practitioners, educators, patients and policy makers was very positive indeed.

References

Aggarwal, R., Mytton, O.T., Derbrew, M*., et al* (2010) Training and simulation for patient safety. *BMJ Quality & Safety* 19 (2): i34-i43.

Agledahl, K., Forde, R. & Wifstad, A. (2010) 'Clinical Essentialising: a qualitative study of doctors medical and moral practice' *Medicine, Health Care and Philosophy* 13 (12), 107 – 11.

Amba, T. A., Baur, V., Molewijk, B. &. Widdershoven, G. A. M. (2010) "Inter-ethics: Towards an Interactive and Interdependent Biooethics". bioe_1810 242..255 Bioethics ,Volume 24 Number 5 pp 242–255. ISSN 0269-9702 (print); 1467-8519 (online) doi:10.1111/j.1467-8519.2010.01810.x

Aristotle (1985) *Nicomachean ethics.* Trans. T. Irwin. Indianapolis: Hackett Publishing.

Aristotle (1986) *Nicomachean ethics.* Trans. Harris Rackham. Wordsworth Classics of World Literature (Ed.) Tom Griffith. Wordsworth Editions Limited, Hertfordshire.

Armenia, S., Thangamathesvaran, L., Caine, A. D., King, N., Kunac, A., & Merchant, A. M. (2018). The Role of High-Fidelity Team-Based Simulation in Acute Care Settings: A Systematic Review. *Surgery journal (New York, N.Y.)*, *4*(3), e136-e151. doi:10.1055/s-0038-1667315

Batt-Rawden, S., Chisolm, M., Anton, B., Flickinger, T. (2013) 'Teaching Empathy to Medical Students: an updated, systematic review'. *Academic Medicine* 88(8):1171 – 7.

Bein, T. (2017) Intensive Care Med 43: 1157. https://doi.org/10.1007/s00134-017-4779-z

Beresford, E.B. (1996) Can phronesis save the life of medical ethics? *Theoretical Medicine* 17 (3): 209-224

Biggerstaff D. L. (2012) "Qualitative Research Methods in Psychology". In: Rossi G Editor. *Psychology - Selected Papers.* Brussels: InTech: 175-206.

Biggerstaff, D. L. (2014) *Never the same as before: Women's experiences after childbirth*. University of Warwick, unpublished thesis.

Boje, D. M. (2001) *Narrative Methods for Organisational and Communication Research*. London: Sage.

Boje, D.M. (1991) The storytelling organization: a study of story performance in an office-supply firm. *Administrative Science Quarterly*, 26, 106–126.

Boudreau, J. D. & Fuks, A. (2015) "The Humanities in Medical Education: Ways of Knowing, Doing and Being." J Med Humanit., 36(4):321-36. doi: 10.1007/s10912-014-9285-5.

Brody, H. and Doukas, D. (2014) "Professionalism: A framework to guide medical education". *Medical Education*, (48)10:980-87. doi: 10.1111/medu.12520.

Brody, H. and Miller, F. (1998) 'The Internal Morality of Medicine : Explication and Application in Managed Care'. *Journal of medicine and philosophy*, Vol.2, No.4 : 384-410.

Brooks, M., (2009) "Medical education and the tyranny of competency". Perspectives in Biology and Medicine, Volume 52, Number 1, pp. 90-102. DOI: 10.1353/pbm.0.0068

Brummell, S., Seymour, J., Higinbottom, G. (2016) " Cardiopulmoary resuscitation decisions in the emergency department: An ethnography of tacit knowledge in practice". Social Science & Medicine, 156: 47 – 54.

Bruner, J. (1990). *Acts of Meaning*. Cambridge, MA: Harvard University Press.

Bruner, J. (1991). The narrative construction of reality. *Critical Inquiry*, 18, 1-21.

Bruner, J. (2002). *Making Stories: Law, Literature, Life*. New York: Farrar, Strauss and Giroux.

Burrell, G. and Morgan, G. (1979). *Sociological Paradigms and Organisational Analysis.* London: Heinmann.

Carel, H.H. and Kidd, I.J. (2014). Epistemic injustice in healthcare: a philosophical analysis *Medicine Health Care and Philosophy* 17 (4), 529 – 40.

Carr, D. and Steutel, J. (2005) Virtue Ethics and Moral Education. ISBN 0-203-97836-6 Master e-book ISBN. London: Routledge

Cathcart, E.B. and Greenspan, M. (2013) "The role of practical wisdom in nurse manager practice: why experience matters". Journal of nursing management, 21(7), pp. 964-970.

Chalmers P, Dunngalvin A, Shorten G. (2011) Reflective ability and moral reasoning in final year medical students: A semi-qualitative cohort study. Medical Teacher, 33(5): e281-e289.

Christen, M., van Schaick, C., Fischer, J., Huppenbauer, M. and Tanner, C. (2014). *Empirically Informed Ethics: morality between facts and norms*. Dordrecht: Springer.

Conroy, M, Clarke, H. & Wilson, L. (2012) Connected Health and Social Care Communities. AHRC.http://www.ahrc.ac.uk/documents/project-reports-and-reviews/connected-communities/connected-health-and-social-care-communities/

Conroy, M. (2010) '*An Ethical Approach to Leading Change: An Alternative and Sustainable Application'* Basingstoke: Palgrave Macmillan

Conroy, M., Hale, C., Kotzee, B., Biggerstaff, D. and Johnson, C. (2015) Research proposal submitted to AHRC: "*Phronesis and the medical community*" https://www.birmingham.ac.uk/schools/social-policy/departments/health-services-management-centre/research/projects/2015/phronesis-and-the-medical-community.aspx

Conroy, M., Kotzee, B., and Paton, A. (2018). "Medical Phronesis Research: A Social Science and Arts Based Hybrid Approach": FEC Forum (accepted and under revision).

Cooke, S., and Carr, D., 2014. "Virtue, Practical Wisdom and Character in Teaching", British Journal of Educational Studies, 62:2, 91-110. DOI: 10.1080/00071005.2014.929632.

Critical Appraisal Skills Programme, Oxford, UK https://casp-uk.net/casp-tools-checklists/ (accessed, 14th May, 2018)

Czarniawska, B. (1997). *Narrating the Organisation: Dramas of Institutional Identity*. Chicago: UCP.

Czarniawska, B. (2004). *Narratives in Social Science Research,* London: Sage.

Danbjorg, B.D. & Birkelund R., (2011) "The practical skills of newly qualified nurses". *Nurses Education Today*, 31, pp. 168-172.

Eriksen, K.A., Dahl, H., Karlsson, B. and Arman, M. (2014) " Strengthening practical wisdom: mental health workers' learning and development". *Nursing Ethics*, 21(6), pp. 707-719.

Farrely, C. & Solum, L. (2007) *Virtue Jurisprudence*. London: Palgrave MacMillan.

Farrington, N., Mandy, F., Richardson, A., & Sartain, S. (2015) "Exploring the role of practical nursing wisdom in the care of patients with urinary problems at the end of life: a qualitative interview study". *Journal of Clinical Nursing*. 24, pp. 2745-2756.

Flyvbjerg, B. (2001) *Making social science matter*. Cambridge: Cambridge University Press.

Flyvbjerg, B., Landman, T., and Schram, S. (Eds). 2012. Real social science: Applied phronesis. Cambridge: Cambridge University Press.

Frost, N. (2011) Qualitative research methods in psychology: combining core approaches.Maidenhead: McGrawHill/ Open University Press.

Fulford, K. W. M. (2008) "*Values-Based Practice: A New Partner to Evidence-Based Practice and A First for Psychiatry?*" Mens Sana Monogr. 2008 Jan-Dec; 6(1): 10–21.doi: 10.4103/0973-1229.40565.

Gabriel, Y. (2000). *Storytelling in Organisations: Facts, Fictions and Fantasies*. London: OUP.

GMC (2013) 'Good Medical Practice'. https://www.gmc-uk.org/ethical-guidance/ethical-guidance-for-doctors/good-medical-practice

Goold, S. D. & Lipkin, M.,(1999) 'The Doctor–Patient Relationship Challenges, Opportunities, and Strategies' *Journal Gen Intern Med.* 1999 Jan; 14 (Suppl 1): S26–S33. doi: 10.1046/j.1525-497.1999.00267.x

Gough, D., Oliver, S., & Thomas, J. (2013). Learning from research: Systematic reviews for informing policy decisions: A quick guide. *The Alliance for Useful Evidence*, 1-38.

Greenhalgh, T. & Hurwitz, B. (2000). *Narrative based medicine: dialogue and discourse in clinical practice*. London: BMJ Books.

Greenhalgh, T. (2010). *How to Read a Paper: the Basics of Evidence-Based Medicine*. (4th ed). Oxford: Wiley-Blackwell, BMJI Books.

Haimes, E. (2002) What can the Social Sciences Contribute to the Study of Ethics? Theoretical, Empirical and Substantive Considerations. *Bioethics,* Volume 16, Issue 2 (Pages 89–113)

Haq, C. (2014) 'Compassion in Medicine' *Family Medicine* 46 (7), 549 – 50.

Hart, J. T. (1971) 'The inverse care law' *The Lancet*, Volume 297 , No 7696 pp405–412

Hauser, M. J., Commons, M. L., Bursztajn, H. J., & Gutheil, T. G. (1991). 'Fear of malpractice liability and its role in clinical decision making'. In T. G. Gutheil, H. J. Bursztajn, A. Brodsky, & V. Alexander (Eds.), *Decision making in psychiatry and the law* (pp. 209-226). Baltimore, MD, US: Williams & Wilkins Co.. http://www.pipatl.org/bibliography/hauser/malpractice.html.

Henry, S.G., Foreman, J.H, & Fetters, M. D. (2011). 'How do you know what Aunt Martha looks like?' A video elicitation study exploring tacit clues in doctor–patient interactions.' *Journal of Evaluation in Clinical Practice* 17 (2011) 933–939. https://doi.org/10.1111/j.1365-2753.2010.01628.x

Hester, M. (2016) *'What is the Future of Ethics Education in Medical Schools?'* Medical education. Available at https://reflectivemeded.org/2016/06/02/what-is-the-future-of-ethics-education-in-medical-schools/

Hilton, S. and Southgate, L. (2007) "Professionalism in Medical Education". *Teaching and Teacher Education: An International Journal of Research and Studies,* v23 n3 p265-279.

Hoffman, B. (2002) Medicine as Practical Wisdom (*Phronesis*) *Poesis and Praxis* 1, 135 – 49.

Hood. L., Fenwick. J., Butt, J. (2010) 'A story of scrutiny and fear: Australian midwives' experiences of an external review of obstetric services, being involved with litigation and the impact on clinical practice'. *Midwifery*. Volume 26, Issue 3, Pages 268–285

Hope, T. (1999) "Empirical medical ethics". *Journal of Medical Ethics*, 25: 219-220.

Howick, J. (2013) *The Philosophy of Evidence-Based Medicine*. Oxford: Wiley-Blackwell, BMJI Books.

Howick, J. (2018) 'A Dose Of Empathy Is All Some Patients Need'. https://www.huffingtonpost.co.uk/entry/a-dose-of-empathy-is-all-some-patients-need_uk_5addfdcfe4b041527e6cc974 and http://www.ox.ac.uk/news/2018-04-20-dose-empathy-may-support-patients-pain#

Hurst, S., Hull, S., DuVal, G. & Danis, M. (2005) 'How Physicians Face Ethical Difficulties: a qualitative analysis. *Journal of Medical Ethics* 31, 7 – 14.

Hutson, J. M. & Myers, N. A. (1999) 'The relationship between ethics and phronesis.' *Pediatric Surgery International*, 15(5-6), pp. 320-322.

Ivanhoe, P. and Walker, R. (2007) *Working Virtue: virtue ethics and contemporary moral problems*. Oxford: Oxford University Press.

Jackson, J. (2002) *Truth, Trust and Medicine*. Routledge: London.

Jones, E. K., Kittendorf, A. L. & Kumagai, A.O. (2017) Creative art and medical student development: a qualitative study. *Medical Education*, 51: 174 – 183.

Jonsen, A., Siegler, A. & Winslade, W. (2010) *Clinical Ethics: a practical approach to ethical decisions in clinical medicine.* New York: McGraw Hill Medical.

Jordens, C. & Little, M. (2004) "In this scenario, I do this, for these reasons': narrative, genre and ethical reasoning in the clinic", *Social Science and Medicine* 58 (9) 1635 – 45.

Kaldjian, L. C. (2010) 'Teaching practical wisdom in medicine through clinical judgment, goals of care, and ethical reasoning.' *Journal of Medical Ethics*, 36(9), pp.558-562.

Kaldjian, L. C. (2014) *Practicing medicine and ethics: Integrating wisdom, conscience, and goals of care*. Cambridge: Cambridge University Press.

Kaldjian, L. C., Weir, R. F. & Duffy, T. P. (2005) A clinician's approach to clinical ethical reasoning. *Journal of General Internal Medicine*. 20:306-11.doi: 10.1111/j.1525-1497.2005.40204.x

Kassam, K-A. (2010) "Practical wisdom and ethical awareness through student experiences of development*" Development in Practice,* 20:2, 205-218, DOI: 10.1080/09614520903564207.

Kinghorn, W. (2010) " Medical Education as Moral Formation: an Aristotelian account of medical professionalism". *Perspectives in Medicine and Biology*, 53(1): 87 – 105. doi: 10.1353/pbm.0.0145.

Kon, A. A. (2009) 'It is Settled: The 'Is' Can (and Should) Inform the 'Ought'!' *American Journal of Bioethics.* 9(6-7): W4–W6. DOI: 10.1080/15265160902966902

Kon, A. A. (2009) 'The Role of Empirical Research in Bioethics'. *American Journal of Bioethics* 9 (6-7):59-65 (2009) . DOI: 10.1080/15265160902874320.

Kotzee, B. & Ignatowicz, A. (2016) 'Measuring "virtue" in Medicine' *Medicine Health Care and Philosophy* 19, 149 – 61.

Kotzee, B., Ignatowicz, A., & Thomas, H. (2017) 'Virtue in Medical Practice: an Exploratory Study'. *HEC forum* (2017) 29:1-19.

Kotzee, B., Paton, A., & Conroy, M. (2016) 'Towards an empirically informed account of Phronesis in Medicine'. *Perspectives in biology and medicine* (Vol. 59, No.: 3: 337-350).

Kristjánsson, K. (2007) *Aristotle, Emotions, and Education.* Aldershot: Ashgate Publishing

Kristjánsson, K. (2014) *Phronesis* and moral education: Treading beyond the truisms. *Theory and Research in Education 12(2)* DOI: 10.1177/1477878514530244

Kristjánsson, K. (2015) "*Phronesis* as an ideal in professional medical ethics: some preliminary positionings and problematics". *Theoretical Medicine and Bioethics*; 36(5): 299-320.

Leffel, G., Oakes Mueller, R., Curlin, F. & Yoon, J. (2015) 'Relevance of the Rationalist-Intuitionist Debate for Ethics and Professionalism in Medical Education'. *Advances in Health Sciences Education*, 20(5): 1371-1383.

Leunissen, M. (2017) "*From Natural Character to Moral Virtue in Aristotle*". New York,OUP; ISBN 978-0-19-060221-5

Lewis, R., Strachan, A. & McKenzie Smith, M. (2018) 'Is High Fidelity Simulation the Most Effective Method for the Development of Non-Technical Skills in Nursing? A Review of the Current Evidence'. *Open Nursing Journal.* 2012; 6: 82–89. doi: [10.2174/1874434601206010082]

Little, M., Gordon, J., Markham, P., Rychetnik, L. & Kerridge, I. (2011) "Virtuous acts as practical medical ethics: an empirical study". *Journal of Evaluation in Clinical Practice*, 17, pp. 948-953.

MacIntyre, A. (1981). *After Virtue.* Notre Dame, Indiana: University of Notre Dame Press.

Malik, A. (2017) "*Phronesis and the medical community: observing doctors making decisions as part of the qualitative research to understand the nature of phronesis (practical wisdom) transmission, interpretation and enactment by doctors through medical education and into practice*". Protocol submitted to Health Research Authority. (IRAS I.D:- 227550)

Malinowski, B. (1961) *Argonauts of Western Pacific: an account of native enterprise and adventure in the Archipelagos of Melanesian New Guinea*. New York:E.P.Dutton &Co.

Manson, H. M. (2012) The development of the CoRE-Values framework as an aid to ethical decision-making, *Medical Teacher*, 34:4, e258-e268, DOI: 10.3109/0142159X.2012.660217

Marcum, J. A. (2012) *The Virtuous Physician: the role of virtue in medicine* Dordrecht: Springer.

Marlow, E., Nosek, M., Lee, Y., Young, E., Bautista, A., & Thorbjørn Hansen, F. (2014) "Nurses, formerly incarcerated adults and Gadamer: Phronesis and the Socratic Dialect". *Nursing Philosophy*, 36: 19-28.

McDougall, R. & Notini, L. (2014) "Overriding parents' medical decisions for their children: a systematic review of normative literature" *Journal of Medical Ethics;* 40: 448 – 452.

McDougall, R. (2013) "Systematic reviews in bioethics: Types, challenges and value". *Journal of Medicine and Philosophy*, 39: 89 – 97.

McDougall, R. (2015) "Reviewing literature in bioethics research: Increasing rigour in non-systematic reviews." *Bioethics*, 29 (7): 525 – 528.

Miller, F. G. & Brody, H. (2001) 'The internal morality of medicine: an evolutionary perspective'. *Journal of Medical Philosophy:* 26(6):581-599.

MOD (2012) *Ministry of Defence, 'Joint Service Publication 999: Clinical Guidelines for Operations:* Section 5, Pathway 7. Version change 3 September.' London:MOD

Moher, D., Liberati, A., Tetzlaff, J. & Altman, D.G. (2009). *P*referred *R*eporting *I*tems for *S*ystematic Reviews and *M*eta-*A*nalyses: The PRISMA Statement. *PLoS Med* 6(7): e1000097. doi:10.1371/journal.pmed1000097

Montgomery, K. (2006) *How doctors think: Clinical judgement and the practice of medicine.* Oxford University Press: Oxford.

Moore, G. and Beadle, R. (2006) 'In search of organisational virtue in business: agents, goods, practices, institutions and environments'. *Organisation Studies,* 27(3): 369-389):

Morris, A., Biggerstaff, D. & Lycett, D. (2016) Capturing whole person care. *Journal of Renal Care*, 42(2): 71–72.

Morris, A., Biggerstaff, D. Krishnan, N., Lycett, D. (2017) Understanding the role of patient and public involvement in renal dieretic research. *Patient Experience Journal,* 4 (2): 23 – 32.

Moss, J. (2011) "Virtue Makes the Goal Right": Virtue and Phronesis in Aristotle's Ethics. *Phronesis* 56.3;204-261.

Murrell, V. S. (2014) The failure of medical education to develop moral reasoning in medical students. *International Journal of Medical Education*, 4(5): 219-225.

Myrick, F., Yonge, O., & Billay, D. (2010) "Preceptorship and practical wisdom: A process of engaging in authentic nursing practice". *Nurse Education in Practice*, 10, pp. 82-87.

Niemenen, A. L., Mannevaara, B., & Fagerstrom, L. (2011) "Advanced practice nurses' scope of practice: a qualitative study of advanced clinical competencies". *Scandinavian Journal of Caring Sciences,* 25, pp. 661-670.

Noyes, J., Popay, J., Pearson, A., Hannes, K., & Booth, A. (2009) The Cochrane Qualitative Research Methods Group. "Qualitative research and Cochrane reviews". In: Higgins J, Green S, editors. *Cochrane Handbook for Systematic Reviews of Interventions.*

Oakley, J. & Cocking, D. (2001) *Virtue Ethics and Professional Roles.* Cambridge University press. ISBN(s) 9780511031960   9780521793056.

Oakley, J. (2007) Virtue theory. In Ashcroft, R., Dawson. A., Draper, H. & McMillan, J. (Eds.) *Principles of Healthcare Ethics* (PP87-91). John Wiley & Sons Ltd.

Paton, A. (2017) "No Longer Handmaiden: The role of social and sociological theory in bioethics". IJFAB. 2017; 10(1): 30-49.

Paton, A., Kotzee, B., Biggerstaff, D. & Conroy, M. (2017) Manuscript. *'Empirical Study of Phronesis in Healthcare: a literature synthesis review'.*

Pearson, G. (2007) "Phronesis as a Mean in the Eudemian Ethics", *Oxford Studies in Ancient Philosophy* 32: 27396.

Pellegrino, E. D. & Thomasma, D. C. (1988) '*For the Patient's Good: a Restoration of Beneficence in Health care* '.Oxford University press, New York.

Pellegrino, E. D. & Thomasma, D. C. (1993) *The Virtues in Medical Practice*. Oxford: OUP.

Phillips, C. & Hall, S. (2013) "Nurses and the wise organisation: techne and phronesis in Australian general practice". *Nursing Inquiry,* 20(2), pp. 121-132.

PMC (2018) *Phronesis and the Medical Community: Final Workshop*, 22nd March, 2017 at HSMC, University of Birmingham.

Polkinghorne, D. (1988). *Narrative Knowing and the Human Sciences*. Albany: University of New York Press.

Punzi, E. (2015) "These are the things I may never learn from books". Clinical psychology students' experiences of their development of practical wisdom. *Reflective Practice*, 16(3), pp. 347-360.

Reidun F. (2012) "How Can Empirical Ethics Improve Medical Practice"? *Cambridge Quarterly of Healthcare Ethics* 21 (4):517-526. https://doi.org/10.1017/S096318011200028X

Reiter-Theil, S. (2012) "What Does Empirical Research Contribute to Medical Ethics?: A Methodological Discussion Using Exemplary Studies." *Cambridge Quarterly of Healthcare Ethics*, Volume 21, Issue 4.October 2012, pp. 425-435. https://doi.org/10.1017/S0963180112000205.

Ricoeur, P. (1981 / 1995). *Hermeneutics and the human sciences*. Trans. & Ed. J. B. Thompson. Cambridge: Cambridge University Press.

Ricoeur, P. (1983-1985). *Time and Narrative* (*Temps et Récit*), 3 vols. trans. McLaughlin, K. and Pellauer, D. Chicago: University of Chicago Press, 40(3): 311-322.

Rief, J. J., Mitchell, G. R., Zickmund, S.L., Bhargava, T.D., Bryce, C.L., Fischer, G.S., Hess, R., Kolb, N.R., Simkin-Silverman, L. R. & McTigue, K. M. (2012) " Promoting patient phronesis: communication patterns in an online lifestyle program coordinated with primary care". *Health Education & Behaviour* 40(3), pp. 311-322.

Riessman, C. K. (2005) 'Exporting Ethics: A Narrative about Narrative Research in South India', *An Interdisciplinary Journal for the Social Study of Health, Illness and Medicine* 9(4): 473–90.

Ritchie, J. & Lewis, J. (2010) *Qualitative research practice: a guide for social science students and researchers.* London: Sage

Romanell Report (2015) 'The Essential Role of Medical Ethics Education in Achieving Professionalism: The Romanell Report'. *Academic Medicine*, Vol. 90, No. 6 / June 2015. Available at:
https://pdfs.semanticscholar.org/e8d2/22cac2960de2169ebc18996276a0abeae634.pdf

Rozmarynowska, K. (2015) "The Ethical Dimension of Practical Wisdom" *Organon F 22* (1) 2015: 34-52.

Russell, D. (2009) *Practical Intelligence and the Virtues* OUP

Schugurensky, D. (2005). "Challenge for Change launched, a participatory media approach to citizenship education". *History of Education. The Ontario Institute for Studies in Education of the University of Toronto* (OISE/UT).

Schultz, D. & Flasher, L. (2011) 'Charles Taylor, Phronesis and medicine: ethics and interpretation in illness narrative', *Journal of Medicine and Philosophy*, vol. 36, no. 4, pp. 394-409.

Self, D. J., Schrader, D.E., Baldwin, D. C. Jr & Wolinsky, F.D. (1993) "The moral development of medical students: a pilot study of the possible influence of medical education". *Medical Education*, 27, 26-34.

Shelton, W. (1999) 'Can virtue be taught?' *Academic Medicine*; 74: 671-674

Sherman, R. R. & Webb, R. B. (1988) *Qualitative Research in Education: Focus and Methods.* Falmer Press: London and New York

Shotter, J. and Cunliffe, A. L. (2002). Managers as Practical Authors. In D. Holman and R. Thorpe (Eds.), *Management and Language: Managers as Practical Authors.* London: Sage.

Soerensen, D., Frederiksen, K., Thorbjorn, G. & Lomborg, K. (2013) "Practical wisdom: A qualitative study of the care and management of non-invasive ventilation patients by experienced intensive care nurses". *Intensive and Critical Care Nursing*, 29, pp. 174-181.

Somers, M. R. & Gibson, G.D. (1994) "Reclaiming the Epistemological 'Other': Narrative and the Social Constitution of Identity" In Calhoun, C. (ed.), *Social Theory and the Politics of Identity.* Oxford UK & Cambridge USA: Blackwell, 37-99.

Sturdy, A. and Grey, C. (2003). Beneath and beyond organizational change management: exploring alternatives. *Organization*, 10(4): 651-662

Svenaeus, F. (2014) "Empathy as a necessary condition of phronesis: a line of thought for medical ethics". *Medical Health Care Philosophy*,17(2):293-9. doi: 10.1007/s11019-013-9487-z.

Toon, P. (2014) *A Flourishing Practice?* London: Royal College of General Practitioners.

Tricco, A.C., Soobiah, C., Antony, J., Cogo, E., MacDonald, H., Lillie, E., Tran, J., D'Souza, J., Hui. W., Perrier, L., Welch, V., Horsley. T., Straus, S. E. & Kastner, M. (2016). A scoping review identifies multiple emerging knowledge synthesis methods, but few studies operationalize the methods. *Journal of Clinical Epidemiology,* 73: 19 – 28.

Tricco, A.C., Soobiah, C., Antony, J., Cogo, E., MacDonald, H., Lillie, E., Tran, J., D'Souza, J., Hui, W., Perrier, L., Welch, V., Horsley, T., Straus, S. E., Kastner, M. (2016). A scoping

review identifies multiple emerging knowledge synthesis methods, but few studies operationalize the methods. *Journal of Clinical Epidemiology,* 73: 19 – 28.

Tyreman, S. (2000) 'Promoting critical thinking in health care: Phronesis and criticality.' *Medicine, Health Care and Philosophy*, 3(2), pp.117-124.

Upsur, R. (1998) 'Do Clinical Guidelines still make sense '. *Ann of Family Med* 12 (3):202-03.

Vincent. C., Taylor-Adams, S. & Stanhope, N. (1998) 'Framework for analysing risk and safety in clinical medicine'. *BMJ,* 316(7138): 1154–1157.

Waring, D. 2000. 'Why the Practice of Medicine is not a Phronetic Activity', *Theoretical Medicine and Bioethics* 21 (2), 139 – 51

Zagzebski, L. (2013). Moral exemplars in theory and practice. *Theory and Research in Education* 11(2):193-206