# AN INVESTIGATION OF EPISTEMOLOGICAL CONCEPT OF PRACTICAL KNOWLEDGE WITHIN SERVICE ORGANIZATION

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#### **ABSTRACT**

The literature of knowledge and practice is both extensive and rapidly growing. While this is a positive situation within which to understand the idea of practical knowledge, but there is still confusion regarding the role and complementary, and/or contradiction of the concept and theories. There are three shortcomings have been identified. First, there is no agreement has yet been reached about which theory of practice is best used in which specific situation despite the existence of many theories of practice(Argyris & Schön, 1978; Bourdieu, 1977; Garfinkel, 1967; Giddens, 1984; Raelin, 2000). Second, even though there are many practice types, there is still no agreement as to which theory of practice is congruent with what types of practice. Finally, while important work has been undertaken within the area of practical knowledge in terms of the related concepts and theories for both nursing and management, no communication of practical knowledge has occurred between these fields. Hence, the goal of this paper is to close these gaps and to propose a better understanding of the main conceptual dimensions and concepts of practical knowledge. The analysis of the literatures have come out with the idea that practical knowledge is derived from years of experience, without reference to whether the person has formal or informal theoretical knowledge. It also appears that practical knowledge is dependent on a specific context, and resulted by mixing or combining knowledge with practice and the action elements. Thus, practical knowledge also brings together the explicit and the tacit practice dimensions into the epistemological concept (Polanyi, 1966, 1983). To conclude, practical knowledge is a knowledgeable action skill that is deep-rooted in the mind and physical body, and practiced in everyday life of an individual, in a specific situation.

Keywords: knowledge, practice, explicit knowledge, tacit knowledge, practical knowledge, nursing

#### 1.0 Introduction

The general notion of practical knowledge was inspired by a number of theoretical sources, for example; Dewey's (1938) view of the dialectical relationship of theory and practice; Polanyi's (1958, 1966) conception of personal knowledge and tacit knowledge; the insight of phenomenological sociology into the way that 'everyday knowledge' structures our unexamined reality (e.g., Schutz & Luckmann, 1974);

ethnomethodological work (e.g., Cicourel, 1964; Garfinkel, 1967) that focuses on the way that social reality is shaped, by linguistic usage, in particular; and the role of purpose, feelings and values in cognition, as noted by the psychological theorists (Elbaz, 1981). Further, Polanyi (1962) postulated that practical knowledge comprises a form of wisdom. Such wisdom is viewed as an individual possession, embodied in action, but not expressed in the rules of action, and unconsciously transmitted from the master to the apprenticeship. According to Carr (2004), practical knowledge is based on the assumption of Greek *practical philosophy*, which aims to develop the kind of context-based practical reasoning that is employed in the conduct of a wide range of morally informed human activities. Nevertheless, the generalizability of practical knowledge is a contentious issue. For example, Schwab (1970) has argued that the practical decision is specific to its situation and cannot be applied to the future cases.

#### 2.0 Literature Review

### 2.1 Management perspective

From the literature present it seems that the various concepts of practical knowledge share some common features, such as action, practice, experience, tacit knowledge, know-how rather than know-what, and relevance to everyday life activities. However there is no consensus about the definition of practical knowledge, mainly because of the diverse fields in which it is being researched (i.e. philosophy, psychology, sociology, management and organizational learning). The various concepts show some overlap, convergence and divergence in terms of the meaning, resulting in a sense of confusion in the literature. For example the concept of *practical thinking* by Scribner (1986) has the same idea as the concept of *practical knowledge* by Carr (2004). The authors agree that practical knowledge is a form of action that is embedded in people's mind, and is related to human daily activities that function to achieve the goals of those activities. Other concepts, however, do not match with the concept of *personal practical knowledge* (Clandinin, 1985), because this concept has similar ideas to *common knowledge* (Dixon, 2000) and *deep smart* (Leonard-Barton & Swap, 2005). Further, practical knowledge was found in practice, generated from the people's narratives of experience, and carried the element of know-how rather than know-what. Dixon (2000) also confirmed that common knowledge is also generated internally by talented employees in the act of accomplishing the organization's task.

Even so, Leonard-Barton and Swap's (2005) concept of deep smart overlaps with the concept of *procedural knowledge* introduced by Anderson (1982) and the concept of *practical intelligent* introduced by Wagner and Sternberg (1985). Indeed, these three concepts claim that practical knowledge has the element of tacit knowledge. Further, tacit knowledge is learnt in everyday life that usually and is not taught, nor often verbalized; however, it is shaped by belief and social forces. According to Wagner and Sternberg (1985), tacit knowledge includes knowing what to say to whom, knowing when to say it, and knowing how to say it for maximum effect (Sternberg et al., 2000). Additionally, although deep smart cannot be attained through formal education alone, it can be deliberately nourished and grown with dedication, or transferred or recreated.

Two other knowledge concepts introduced by Argyris (2003) and by Goodfellow (2002) are *actionable knowledge* and *professional knowledge*, respectively. Both types of knowledge involve skills that are

performed or translated into practice, mentally and physically. In addition, Goodfellow (2002) postulates that professional knowledge is constituted by the objective and subjective. Some new elements in practical knowledge, for example from Polanyi (1962), confirm that practical knowledge has to be a knowledge which is transferable between the expert and novices. For Argyris (2003) practical knowledge is connected with action research, rooted from the element of understanding, and intervening from the individual level. Table 2.1 summarizes the nine key concepts that are associated with practical knowledge.

**Table 2.1: Practical knowledge related concepts** 

	Concept	Author/s	Epistemological concept
1.	Practical knowledge	Polanyi (1962)	<ul><li>Individual action</li><li>Transmitted from expert to novice</li></ul>
		Carr (2004)	<ul><li>Context-based practical</li><li>Human activities</li></ul>
		Giddens (1979, 1984)	<ul><li>Knowledge of social institutions</li><li>Practical consciousness</li></ul>
2.	Practical intelligent	Wagner and Sternberg (1990)	<ul><li>Tacit knowledge</li><li>Learnt informally in the workplace</li></ul>
		Albrecht (2007)	<ul> <li>Ability to cope with the challenge and opportunity</li> <li>Influences day-to-day organization's skills and maintains social relationship</li> </ul>
3.	Practical thinking	Scribner (1986)	<ul><li>Mind in action</li><li>Activities of daily life</li></ul>
4.	Procedural knowledge	Anderson (1982)	<ul><li>Doing skills (mentally and physically)</li><li>Tacit knowledge</li></ul>
5.	Personal practical knowledge	Clandinin (1985)	• Knowledge with experiences
6.	Common knowledge	Dixon (2000)	<ul> <li>Generated from experience</li> <li>Linked to action</li> <li>Know-how rather than know-what</li> </ul>

	Concept	Author/s	Epistemological concept
7.	Actionable knowledge	Argyris (2003)	<ul> <li>A descriptive of knowledge translated into practice</li> <li>Element of understanding and intervening</li> </ul>
			<ul> <li>Connected to action research</li> </ul>
8.	Professional knowledge	Goodfellow (2002)	<ul> <li>Objective knowledge</li> <li>Subjective knowledge</li> <li>Skills performed in practice</li> <li>Knowing that and knowing how</li> </ul>
9.	Deep smart	Leonard-Barton and Swap (2005)	<ul> <li>Become expert through experiences</li> <li>Drawn from tacit knowledge</li> <li>Shaped by beliefs and social forces</li> <li>Know-how more than know-what</li> </ul>

Source: Azizan (2012)

## 2.2 Nursing perspective

The nursing literature on practical knowledge, on the other hand, appears to complement the above discussion on the concept of practical knowledge. As mentioned in Chapter One, the nursing literature on practical knowledge has evolved in parallel with the management literature. Thus, it provides a discussion of a range of concepts that are helpful in describing, explaining and analysing the different types of knowledge relevant to nursing practice. The literature review of practical nursing knowledge has identified six common concepts: personal knowledge, empirical knowledge, propositional knowledge, aesthetic knowledge, ethical knowledge, and reflexive knowledge. For this reason the current study includes an examination of the various concepts of practical knowledge from the nursing literature to avoid bias and confusion.

Carper (1978) revealed the ways of knowing in nursing by explaining and emphasizing four patterns of knowing: empirical, ethical, aesthetic and personal. Empirical knowledge is gained through systematic investigations, observations and testing; it is embedded within the positivist paradigm. Knowledge from other disciplines concerned with people has developed an empirical knowledge, which is explored by psychologists, sociologists, physiologists, and others. Such knowledge is also important and relevant to the field of nursing. Thus the transition of knowledge that nurses use from other disciplines are reflected upon and evolve into perspectives that of knowledge that are unique to nursing (Berragan, 1998).

Meanwhile, ethical knowledge is related to moral issues and the need to make judgements in a given situation. Inevitably, these implications influence the way we live but also our practice; for this reason an

awareness of ethical and moral issues can make a significant contribution to practice, especially nursing practice. The relevance of ethical knowledge in nursing practice is highlighted by the Australian Nursing Council, which provides guidance through the *Code of Professional Conduct for Nurses in Australia* (Australia Nursing Council, 2003). The code is concerned with the action of nursing and is often linked with discussions surrounding the art of nursing (referred to as aesthetic knowledge) (Johnson, 1994; Katims, 1993). This type of knowledge involves perception, understanding and empathy, and acknowledges the value of the everyday experiences lived by individuals. It is also linked to intuitive actions (Berragan, 1998).

Carper's (1978) fourth pattern of knowing in nursing is that of personal knowledge. Personal knowledge is of extreme importance to all areas of nursing practice. For example, in specific clinical situations, such as caring for a patient who is dying, personal knowledge is an implicit and essential element in everything that is done for that patient (Berragan, 1998). Such nursing care is enhanced by self-awareness and the nurse's ability to realize and recognize their mortality. Therefore, the personal knowledge and opportunity to reflect upon personal feelings which (although not always directly communicable to others) enables nurses to recognize the most personal aspects of the situation and respond to the needs of the dying patient.

In a study by Higgs, Titchen and Nevilee (2001) three types of nursing knowledge were described in relation to the nature of practical knowledge in the health profession, namely: propositional theoretical/scientific knowledge; professional craft knowledge or knowing how to do something; and personal knowledge about oneself as a person, and in relationship with others. Propositional knowledge is both formal and explicit, and is expressed in propositional statements. This form of knowledge is derived through research and/or scholarship. Professional craft knowledge and personal knowledge are both tacit and embedded in the practice itself, or in who the person is. Cervero (1992) describes professional craft knowledge as a repertoire of examples, images, practical principles, scenarios or rules of thumb that have been developed through prior experiences. Thus, professional craft knowledge comprises general knowledge (gained from health professional practice experience about patients) and context at a particular time. Further, professional craft knowledge can be expressed in propositional statements, but there is no attempt to generalize beyond the individual's group of colleagues' own practice. Last, but not least, personal knowledge is accrued from life's experiences, and relates to knowledge about an individual's need for dignity, independence and meaning. Such personal knowledge, of a more general nature, tends to be uniquely conceptualized from the collective knowledge held by the community and culture within which the individual has been brought up. However, personal knowledge can be more consciously acquired by reflecting upon one's knowing, being, doing, and feeling in each unique situation.

Mantzoukas and Jasper (2008) reported that there are five types of nursing knowledge that guide their care of hospitalized patients, namely: personal practice knowledge, theoretical knowledge, procedural knowledge, ward cultural knowledge, and reflexive knowledge. Identifying such types of knowledge can help nurses to explicate their role, status and future development as a health professional. Personal practice knowledge is, thus, defined as person-specific, which is acquired and grasped in a moment of interaction with each patient and develops via the dialectical relationship that is created between each patient and their nurse. Theoretical knowledge differs from personal knowledge in the manner in which it is acquired, and in the way in which it is conceptualized. Therefore, theoretical knowledge is acquired in the formal settings of nursing schools, or is learned from books, scientific journals and lectures. For this reason, nurses memorize, absorb and embody this type of knowledge, conceptualizing it as indispensable

knowledge that all nurses need to possess. Importantly, theoretical knowledge is understood as normative, explanatory and factual, providing quantifiable and measureable information about practice.

In contrast, procedural knowledge relates to the recognition of patterns of practice that nurses have seen in the past therefore, able to reiterate. However, nurses find it difficult to explain this knowledge, which: is rooted in 'doing', proceeds in an unconscious fashion; is limited to specific incidences and contexts; is rapidly and effortlessly used; and is highly operational in everyday complex situations. In addition, procedural knowledge is an automatic and unconscious doing. It is for this reason that nurses are unable to explain precisely why they are practising as they are. It is, therefore, assumed that this type of knowledge has elements of tacit knowledge. Ward cultural knowledge, on the other hand can be codified, with nurses becoming familiar with the various written and unwritten norms and rules of the ward. The kernel of ward cultural knowledge is embedded in the phrase 'getting the work performed'. As a result, nursing professional become 'jugglers' in their attempt to complete as many tasks as possible. Indeed, the ward-specific knowledge functions, primarily, at an unconscious level and is significantly focused on the doing of activities, rather than on cognitively elaborating on these activities. Lastly, reflexive knowledge is, in part, an amalgamation of the previous four types of knowledge and, in part, a dynamic force that guides and alters practitioners' actions in practice. Hence, this knowledge allows nurses to quickly and accurately identify the types of knowledge required for specific situations; it also requires a certain amount of developed experience that will enable nurses to conduct a series of activities both quickly and efficiently. However when these activities do not meet the needs of a specific patient, or do not leading to the expected outcomes, the nurse consciously reflects on the actions taken and derives new conclusions regarding their nursing action.

#### 3.0 Result

The findings from the above studies share six common concepts, which also parallel the concept of practical knowledge from the management literature (see Table 3.1). For example, *personal knowledge* in the nursing literature shares a common feature with Clandinin's (1985) concept of personal practical knowledge, which is imbued with all the experiences that make up a person's being. Such knowledge is found in practice, whereby the knowledge is generated from the experiential and is based on the narrative of experience. *Empirical, professional, procedural* and *ward cultural knowledge* can be grouped together. The group shares a common feature from management literature, namely: the concept of procedural knowledge (Anderson, 1982), common knowledge (Dixon, 2000), professional knowledge (Goodfellow, 2002), and deep smart knowledge (Leonard-Barton & Swap, 2005). These knowledge types are drawn from tacit knowledge, which has an element of know-how rather than know-what. At the same time, *aesthetic knowledge* parallels the concept of practical knowledge, described by Carr (2004), and practical thinking, identified by Scribner (1986); all are relevant to the activities of everyday life in the workplace. Nevertheless, there are three types of knowledge that are specific to nursing practice: *propositional/theoretical knowledge*, *ethical knowledge* and *reflexive knowledge*; such knowledge has its own ideology and does not parallel any concept of practical knowledge in the management literature.

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	ble 3.1: Types of knowled Types of nursing	Author/s	Concept
	knowledge		
1.	Personal knowledge	Carper (1978); Higgs et al. (2001); Mantzoukas and Jasper (2008)	<ul> <li>Nurse self-awareness to patient illness</li> <li>Consciously being, doing and feeling in unique situations</li> </ul>
2.	Empirical / professional / procedural / ward cultural knowledge	Carper (1978); Higgs et al. (2001); Mantzoukas and Jasper (2008)	<ul> <li>Knowledge from other disciplines gained through investigation, observation and testing</li> <li>Tacit and embedded in person</li> <li>Rules of thumb developed through experiences in specific contexts</li> </ul>
3.	Propositional / theoretical knowledge	Higgs et al. (2001); Mantzoukas and Jasper (2008)	<ul> <li>Formal and explicit</li> <li>Acquired in formal settings</li> <li>Learnt from books, journals and lectures</li> </ul>
4.	Aesthetic knowledge	Carper (1978)	<ul> <li>Involves perception, understanding and empathy in everyday routines</li> </ul>
5.	Ethical knowledge	Carper (1978)	<ul> <li>Relates to moral issues in decision making</li> </ul>
6.	Reflexive knowledge	Mantzoukas and Jasper (2008)	<ul> <li>Allows nurses to identify the types of knowledge required for specific situations</li> </ul>

Source: Azizan (2012)

## 4.0 Conclusion

In the management and nursing literature, various concepts of practical knowledge and their definitions have been introduced. This has resulted in some confusion and difficulty in the development of any agreement about the concept of practical knowledge. While the nursing literature is related to some concepts found in management practical knowledge, it has been assumed that such knowledge has been

specifically adjusted and adapted for the nursing environment. However, in terms of the current study, the researcher hypothesises that practical knowledge is derived from years of experience, without reference to whether the person has formal or informal theoretical knowledge. Consequently, it appears that knowledge is dependent on a specific context, and when the knowledge mixed up or combined with practice and the action elements. Thus, practical knowledge also brings together the explicit and the tacit practice elements (Polanyi, 1966, 1983). In brief, practical knowledge is a knowledgeable action skill that is deep-rooted in the mind and body, and is practised in the everyday life of the individual, in a specific situation.

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