

AN ANALYSIS OF THE CONCEPT “A CULTURE OF LEARNING”: A MULTI-DISCIPLINARY PERSPECTIVE

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The current importance attributed to the need for a culture of learning would appear to stem from the necessity for people by business and industry with new skill sets that are more effective for dealing with a turbulent global economy and marketplace. As the complexity of the world and the issues confronting communities, government, business and industry have escalated, so the importance of continuous learning has come to the fore in grappling with these complex issues. The role of schools and other academic institutions in establishing the foundation for a culture of learning it is suggested needs to be questioned, as it would appear that in South Africa, not withstanding numerous calls for such a culture, the situation appears to have deteriorated, instead of improving.

With this as background the focus in this paper is on gaining an insight into what constitutes a culture of learning, the economic imperative for the development of such a culture and the means whereby it may be achieved. An important conclusion made is that the assumption of being able to manage the concept culture intentionally is in effect flawed. An alternative complex adaptive systems approach is suggested as a possible solution to the difficulty encountered in engendering a culture of learning in South African institutions.

Key phrases: culture of learning, complex adaptive system, knowledge economy, leaning organisation, organisational culture, and T-shaped people skills

1 INTRODUCTION

“The culture of learning and teaching in higher education means a culture of silent reflection, of deep thought, of curiosity and questioning, of exploration and examination, of thought, search for more questions and more answers, of investigation, of more search and research. Only words that emerge out of these silent activities begin to bring us nearer to an understanding of the matters that we are grappling with as a human species. It is these activities that combine knowledge, new knowledge and the unknown, to produce the understanding and the programmes of action that will enable us to address the miseries of the people and help to make their lives better”.

Mbeki, 1997:2

The introductory quotation and definition attributed to “*a culture of learning*” has relevance not only for higher education and academic institutions, but also for business and industry. All are confronted by an increasingly turbulent world that necessitates a need for what Roodt and Conradie (2003:1) term to be a knowledge-based society to effectively compete on a global level. Abrahams (2003), in claiming that there is a significant degree of contestation around the meaning attributed to the concepts knowledge economy, knowledge-based economy, digital economy and information age, brings the terminological confusion that exists into the spotlight. The researchers simultaneously highlight the linkage that exists between these concepts.

It is suggested that the underpinning foundation is to be found in a culture of learning and as so well stated in the introductory quotation a search for answers. At the very core of the concept is the human element involved, which is deemed to be interwoven in the very fabric of the concept itself. Also contended is that learning and knowledge go hand in hand in finding solutions for the complex issues confronting communities within their institutional settings.

As the complexity of the world and the issues confronting communities, government, business and industry have escalated, so too has the importance of continuous learning come to the fore in grappling with these complex issues. As institutions have become caught up in waves of complex contextual challenges, so the notion of the learning organisation has surfaced within the literature as a means of dealing therewith (Bui & Baruch, 2010:228; Gorelick, 2005:383; Limpibunternng & Johri, 2009:326; Senge, 1990:5; Smith, 2001:1). The learning organisation has in effect been promoted as a way to restructure organisations to meet the challenges of the coming century (Kerka 1995:3). In a similar sense, Loermans (2002:285) states that “*the concept of the learning organization is increasingly relevant to twenty-first century management because of the increasing complexity, uncertainty and rapidity of change in the organizational environment*”. Even more pertinently accelerated change is the *sine qua non* of contemporary society and organisations must therefore transform themselves into

learning organisations, so as to meet all unexpected challenges successfully (Lakomski 2001:68). Former President Mebeki (1997:2) quite pertinently contends that “*during the moments of deep thought and reflection we must come up with answers to the vexing questions of the day*”. Yet Smith (2001:1) acknowledges that “*just what constitutes a learning organization is a matter of some debate*”. Loermans (2002:285) similarly suggests that “*despite considerable philosophical and academic discussion since the time of Plato, organizations still seem to be unclear as to how the concept of organizational learning can improve organizational performance and long-term business viability*”.

It could be concluded from this brief introductory discussion that while the need for a culture of learning is deemed to be important from an institutional perspective, be it business, industry, schools, the academia or some other related community-based institution, there yet appears to be little clarity as to what is meant by the concept and how it may best be realised in practice. Increasing contextual volatility and the need to find new innovative answers for the complex and in many instances intractable problems confronting modern day society will in future place even greater accent on the need for establishing a culture of learning within community-based institutional settings.

With this in mind, a multi-disciplinary literature research was undertaken by the researchers, in an attempt to gain greater clarity as to what constitutes a culture of learning and how it can be realised in practice. The relevance of the study may be determined from Lakomski’s (2001:68) observation that although the issue of organisational learning continues to have wide exposure in the literature; an emphasis on the role of culture is still “*relatively rare in the field*”.

2 CONTEXTUAL COMPLEXITY: A CULTURE OF LEARNING AS A STRATEGIC IMPERATIVE

To claim that the world has become turbulent and subject to complex change would in a sense be stating the obvious. Yet Hamel and Välikangas (2003:52) argue that the world

is becoming turbulent at a rate that exceeds institutions' ability to become more resilient and they suggest that the evidence is all too apparent to see. They claim that innovative renewal must be the natural consequence of an organisation's innate resilience, as today's best practices are manifestly inadequate (Hamel & Välikangas, 2003:54). Not directly stated by the researchers but indirectly insinuated, is the need for institutions to find and learn new ways for dealing with tomorrow's emergent challenges, as what worked yesterday and today may no longer be effective for dealing with tomorrow's challenges. If renewal is to become continuous, rather than episodic and crisis driven, institutions need to embrace a creed that extends beyond flawless execution, one that centres on creating a plethora of new ideas and options as compelling alternatives for dying strategies (Hamel & Välikangas, 2003:53-54). By implication, engendering a sense of resiliency therefore entails learning and exercising new skills and behaviours, which necessitates a culture of learning.

López, Peón and Ordás (2004:93) come to a similar conclusion than Hamel and Välikangas (2003:52), claiming that contemporary institutions, confronted by increasing levels of complexity and globalisation, need to focus on the development of new skills and capabilities for extending their knowledge base. Once again, this implies the need for establishing a culture of learning to acquire and implement the new skills and capabilities. López, *et al.* (2004:93), citing an impressive list of researchers, specifically contend that an institution's ability to learn faster than competitors provides it with a very significant advantage. The successful organisation, it is thus claimed, is one that can rapidly learn, assimilate and transfer new ideas and concepts into meaningful action (López, *et al.*, 2004:93).

Even more pertinently, it is argued that entailed is “*a culture that bases its potential on the desire to improve and learn*” (López, *et al.*, 2004:96). Irving (1999:416) similarly notes that continuous change within society has become the order of the day, as the impact of technology and globalisation grows unabated. As a consequence, individuals will be required to develop a range of skills, competencies a critical understanding of the

emergent world, if they are to manage and transverse these uncertain futures (Irving, 1999:416). Notably, Irving (1999:417) draws attention to the transition from a manufacturing to a services dominant global economy and the skills impact that this has had. The researcher then goes on to motivate the need for a culture of lifelong learning, as the need therefore is gaining in momentum (Irving, 1999:416).

The impact of the emergence of the services era, as reflected on by Irving (1999:417), is also accentuated by a large contingent of contemporary researchers. Research conducted by Chesbrough & Spohrer (2006:36), for instance reflects that nearly 80% of the United States' economic activity relates to a vast array of services. Sheehan (2006:43) similarly concludes that market-based services have become the main driver of economic growth and source of job creation within Organisation for Economic Co-operation and Development (OECD) countries. Wöfl (2005:6) verifies that “*the services sector accounts for about 70% of aggregate production and employment in OECD economies*”. Fitzsimmons and Fitzsimmons (2008:3) also confirm that the migration to the services economy is without doubt global in nature.

The transition from a manufacturing to a services economy inherently incorporates a fundamental change in institutions' skills and knowledge base and consequently the need for accelerated institutional learning. If researchers such as these are correct, the need for a culture of learning to be able to effectively move into the services science era could never be more imperative. Irving (1999:418) suggests that people will “*need to be able to make sense of this new world, and the influences on it, as they decide how to organise their working life ... education, therefore, will need to ensure that it not only prepares young people to engage in a lifetime of learning, but also enables them to view critically the wider economic and social world they inhabit*”.

A dramatically changing marketplace calls for professionals who possess wide strategic skills and profound experience in mastering multifaceted challenges, which in effect

necessitates the need for what is termed to be T-shaped people (Karjalainen, 2008). The following statement by Tim Brown (2005) serves as a case in point in this regard:

“We look for people who are so inquisitive about the world that they're willing to try to do what you do. We call them ‘T-shaped people’ They have a principal skill that describes the vertical leg of the T – they're mechanical engineers or industrial designers. But they are so empathetic that they can branch out into other skills, such as anthropology, and do them as well. They are able to explore insights from many different perspectives and recognize patterns of behavior that point to a universal human need. That's what you're after at this point – patterns that yield ideas.”

It may be indirectly inferred from the statement that creativity and innovation in dealing with what could be described as a turbulent global marketplace requires a new mindset as well as a multi-disciplinary skills base. It could be argued that the underpinning paradigm of such a multi-disciplinary skills base is one necessitating a culture of learning. The people concerned need to be able to effectively interact and communicate with people from diverse disciplines in dealing with the complex and often intractable challenges confronting institutions of today. This contention is substantiated by IFM and IBM's (2008:11) description of T-shaped professionals, namely people *“who are deep problem solvers in their home discipline but also capable of interacting with and understanding specialists from a wide range of disciplines and functional areas”*.

Also described by IFM and IBM (2008:16) as adaptive innovators, T-shaped professionals are argued to *“have strong communication skills across areas of business, technology and social sciences”*. Gaining such a wide disciplinary skills base it is suggested can only be achieved if these professionals have acquired a culture of learning. IFM and IBM (2008:13,16) claim that they have *“the ability to learn and change their knowledge and capabilities over time”* by making use of a host of channels including virtual worlds. Irving's (1999:416) contention that *“individuals will be required to develop a range of skills,*

competencies, and a sense of critical understanding about them-selves, and their world ... so as to transverse uncertain futures”, adds support for what he terms to be a need for a “lifelong learning culture”.

It may be concluded from this rather brief literature review that the need for new skills, knowledge, innovation and expertise, for dealing with the challenges associated with a world of discontinuous and complex change, underpins a significant segment of the contemporary literature, which in turn highlights the need for a culture of lifelong learning. Higher skill levels are increasingly required to cope with the more sophisticated and complex emerging working practices instituted by institutions (Irving, 1999:417). Although the literature tends to reflect reference to the need for institutional learning, Irving (1999: 416) correctly states that individuals or people will be required to develop this range of skills and competencies. Kerka (1995:3), while similarly acknowledging that it is people and not organisations that learn, goes on to stress that a learning organisation promotes a culture of learning, a community of learners, and it insures that individual learning enriches and enhances the institution as an entity.

The question therefore, is one of how best to permeate a culture of learning within the fabric of institutional communities. In the ensuing section, the role of schools, universities and other academic institutions in laying the foundation for a culture of learning will be briefly explored. The underlying contention is that these institutions play a very fundamental role in shaping the mindsets and paradigms that shape peoples’ worldview and consequently influence how they relate to the challenges that come to the fore within institutional settings.

3 LAYING THE FOUNDATION FOR THE ESTABLISHMENT OF A CULTURE OF LEARNING

“Formal education has the potential to focus much more than heretofore on the systematic development of these generic dispositions or habits of mind – and thus to

position itself more effectively as laying firm foundations for lifelong, life-wide and life-deep learning.”

Guy Claxton and Bill Lucas, 2009:11

The above introductory statement assumes that academic institutions, and schools in particular, have the potential to inculcate, what the researchers refer to as “*habits of mind*” that “*underpin a generic and open-minded attitude to learning*” (Claxton & Lucas, 2009:9,11). Citing Ball, Irving (1999:419) similarly argues that the foundation stage is concerned “*with instilling the habit of learning during the compulsory years of schooling*”.

Central to the nurturing of a culture of learning are the mental skills and attitudes young people are encouraged to exercise and develop (Claxton & Lucas, 2009:11). The researchers refer to what they term to be an “*epistemic apprenticeship*” that learners are put through in order to engender what could be deemed a culture of learning (Claxton & Lucas, 2009:11). They go on to define epistemic, in this sense, as “*the nature of thinking, learning and knowing*” (Claxton & Lucas, 2009:11). Suggested therefore is the need to develop an ability to think, learn and know in a 21st century context, described by Claxton and Lucas (2009:14) as “*complex, changing, uncertain and ambiguous*”. The question therefore is one of determining the epistemic mentalities and identities that will enable people to survive and thrive within such a context.

Claxton and Lucas (2009:16) identify eight typical habits of a learning mind, namely curiosity, courage, exploration and investigation, experimentation, reason and discipline, imagination, sociability and reflection. These are briefly explored to gain greater clarity as to what constitutes a foundation of a culture of learning. In so doing, it is noted that there is a definite trend that emerges within the literature, in which the school or academic institution is characterised as constituting a learning organisation and the culture of the institution is deemed to influence or shape the nature of the learning that takes place (Bui & Baruch, 2010:228; Law 1999:66; Lorange, 1996:5; MacNeil & Maclin, 2005:1; Retna & Tee 2006:142).

In an introductory statement to a research report exploring the values and beliefs associated with effective schools engendering a culture of learning, The Hay Group Education (2004:4) make the following insightful statement: “*In the film, The Usual Suspects, the narrator says that the greatest trick the devil pulled was to make us believe that he didn't exist. It is similarly easy to forget that culture pervades our approaches to education*”. Implied is the notion of the institution's culture serving as the invisible hand that plays a very pertinent role in engendering a culture of learning. It may therefore be concluded that the prevailing culture of education institutions has an impact on the mental habits that are nurtured and engrained in learner mindsets within the institutions concerned.

Senge (1990:8) describes mental models as deeply ingrained assumptions, generalisations or even pictures or images that influence how we understand the world and how we take action. Seen in the context of a culture of learning, the mental models learners acquire would influence how they learn and adapt to a changing context of unprecedented change. Pertinently, Senge (1990:8-9) goes on to claim that more often than not people are unaware of their mental models and the effect they have on their behaviour, which implies a need for inner reflection to surface the mental models and hold them to scrutiny. With this in mind, the mental habits of a learning culture, as previously stated, are briefly explored to gain greater clarity thereof.

Claxton and Lucas (2009:14) contend that children are born curious and therefore drawn to learning. “*They wonder about things; how they come to be; how they work. They are open-minded, looking for new interests and perspectives. They like to get below the surface of things, to go deeper in their understanding*”. The description suggests the need for engendering a very specific culture of curiosity, exploration and a search for truth within a school or university context. Einstein is purported to have said that the important thing is never to stop questioning as curiosity has its own reason for existing. It is suggested in this context that the reason could well be to nurture a culture of learning.

Citing Fried, Wilson (2007:35) notes that “*the desire to learn, to discover, to figure something out, and to be able to do something well enough to proclaim it as one’s own must surely be as strong as any impulse in the human soul*”. Wilson (2007:35) goes on to question why so many children dislike school, the very place society created to nourish their minds so that they can experience personal fulfilment and societal contribution. The answer apparently is vested in the culture that exists within the school itself. Wilson (2007:38) asserts that “*key contributors to positive, productive schools are building a culture of learning into the vision and mission of the school and making sure that everyone knows and believes it*”. Also accentuated by the researcher is that relationships and caring are critical elements of such school cultures (Wilson, 2007:39). Insinuated therefore is the notion that caring schools nurture a culture of curiosity and exploration, based on a foundation of sound relationships.

The second habit of mind identified by Claxton and Lucas (2009:14) is that of courage. Confident learners apparently are not afraid of uncertainty and complexity and have the confidence to proclaim that they do not know, which in turn leads to “*lets find out*” and this in turn then brings one back to the first habit of curiosity (Claxton and Lucas, 2009:14). A sense of caring could be seen to resonate with a cultural context that allows learners to make mistakes, be able to bounce back and learn from these mistakes (Wilson, 2007:39). These are aspects Claxton and Lucas (2009:14) associated with the mental toughness or courage underpinning a culture of learning. Hughes and Kritsonis (2006:9) similarly suggest that learning cultures view failed experiments to be an integral part of the learning process. This while Kerka (2005:3) concludes that dialog and enquiry can be perceived as threatening and people are not always rewarded for asking tough questions. This would in itself suggest a need for a culture of human courage. Of pertinence in this regard is the observation by the Hay Group Education (2004:15) that like learning, culture change demands courage; “*courage to both express and permit dissent, to abandon old certainties for the unknown*”.

The third habit Claxton and Lucas (2009:15) refer to is that of exploration and investigation. They claim that such learners are particularly skilled in seeking and gathering information with mindful attention. Hughes and Kritsonis (2006:6) view “*action orientation and experimentation*” as one of the characteristics of a professional learning community. They quite pertinently suggest that “*learning by seeking answers to questions, collaboratively researching new ideas, discovering new methods, and testing and evaluating them are what drives individuals in functioning learning communities*”.

Closely aligned to the third habit is the fourth element, namely experimentation and knowing how to extract optimal learning from experience (Claxton & Lucas, 2009:15). In this sense it in effect entails trying to discover what works in practice by active engagement or doing and learning from the experience. Similarly closely aligned is the notion of learning from failed experimentation.

The fifth quality that contributes to learning prowess is imagination (Claxton & Lucas 2009:15). Peter Senge (1990:9), noted for his research into the practice of learning organisations, contends that when there is a genuine vision people excel and learn. It is difficult to see how vision could come into being without some form of imagination. Imaginative people know how to use the creative test-bed of their own inner worlds to generate and explore possibilities (Claxton & Lucas 2009:15).

It is maintained by the researchers that the creativity of imagination needs to be yoked to the ability to think carefully, rigorously and methodically, resulting in reason and discipline being identified as the sixth element of a culture of learning (Claxton & Lucas, 2009:16).

Reasoning also would imply a need for a sense of reflection, which is cited as being the seventh aspect to be considered by the researchers, as learners need to not only be able to think carefully about the object of their learning, but be able to step back and take stock of the process (Claxton & Lucas, 2009:16). The linkage that exists between these habits of mind is quite evident and they need to be seen in context as an entity that enables a culture of learning to come into being.

The eighth habit of mind is that of sociability, which inherently embodies an element of collaboration in the sharing of ideas for learning to take place (Claxton & Lucas, 2009:16). The shaping and establishing of school culture that supports a culture of learning, as confirmed by MacNeil and Maclin (2005:1) is a negotiated product of sharing sentiments. The culture in effect emerges through the a collaborative learning experience, as well as the sharing of ideas, expectations, values and beliefs between teachers, students, parents and other pertinent role players. Inculcating the habits of mind, referred to above, within learners mindsets, would imply that the school's culture itself needs to be conducive and supportive thereof, which implies a collaborative learning experience in nurturing the mental habits concerned, which in itself resonates with the seventh habit. MacNeil and Maclin's (2005:1) comment that once established the school culture serves as a powerful socialiser of thought has specific relevance in this regard.

From the preceding discussion it may be determined that if schools are to establish an appropriate foundation for a culture of learning, the mental habits briefly explored need to be inculcated within learners' mindsets and this can only take place if the schools specific culture supports such a process and creates a context conducive thereto. From an institutional management perspective, it is argued that it is imperative that a culture of learning be established at school level to form a foundation for organisational learning. In the ensuing section, an analysis of organisational learning or as often termed to be a learning organisation is briefly explored.

Frequently the assumption is made that a foundation of a culture of learning already exists, although as highlighted by Masitsa (2005:205) this may not always be the case in practice. Masitsa (2005:205) claims that the erosion of a learning culture in many South African township schools has taken place and has been a cause of concern for many years and the Department of Education's countless efforts to address the situation has apparently been of little avail. One of the contributing factors according to the researcher is the lack of a positive school context, which creates a culture and climate conducive to teaching and learning (Masitsa, 2005:206).

4 A LEARNING ORGANISATION

“The primary issues in a fast changing complex environment are learning and the learning organization.”

Aksu and Özdemir, 2005:422

The first two issues reflected in the introductory quotation, namely a fast changing and complex environment and learning, have been briefly dealt with in the preceding discussion. In this sense, learning is embodied within the notion of a culture of learning, deemed to be an imperative for the laying of a foundation on which individual and institutional learning can take place. Individual and institutional learning are considered to be inter-woven, as there can be no institutional learning without individual learning taking place. This contention is supported by Wikipedia (2010:3) who views individual learning as being a prerequisite for organisational learning. This leaves the latter element of the learning organisation left to be considered in this section. Aksu and Özdemir (2005:422) in presenting the quoted introductory statement pose the question whether organisations can learn.

The researchers in attempting to answer the question cite Robinson, Clemson and Ketaing as suggesting that “*all organizations are learning organizations*” (Aksu & Özdemir, 2005:422). Smith (2001:1), however, acknowledges that just what constitutes a learning organisation is a matter of some debate. Lakomski (2001:68) similarly contends that what exactly constitutes organisational learning continues to tax the minds of organisational theorists. What constitutes a learning organisation is also brought into contention when Gorelick (2005:383) draws a distinction between *organisational learning* and a *learning organisation*. It could be argued that in practice, a strong linkage exists between the concepts *organisational learning* and *a culture of learning*, as without the latter it is difficult to see how organisational learning can in fact take place. It could be argued therefore that for a learning organisation to exist, it would inherently imply the need for the manifestation of a culture of learning and organisational learning per se to be taking place.

The reference to an organisational setting brings the human element into focus, as it is people as individuals within organisations that learn and not the organisation as a fundamental entity itself. Govender (2009:368) for instance accentuates the fact that organisations learn through individuals who learn, but he acknowledges that individual learning does not necessarily guarantee organisational learning. Wikipedia (2010:3) also contends that summing individual learning is inadequate to model organisational learning.

Adopting a slightly different perspective, Retna and Tee (2006:141) focus on members of the organisation as individuals and collectively being willing in mind and heart to go deeper and broader into the learning process, as being a fundamental premise of the learning organisation. Conner and Clawson (2002:2) in a similar sense accentuate the social collaboration component that takes place within institutions, as an important aspect of the learning process. Organisational learning is inherently a social process that cannot be separated from the context in which it takes place (Serrat, 2009:4). Learning for adults is less about absorbing new information than it is about connecting with people who help put that information in context and suggest alternative means of making sense thereof (Conner & Clawson 2002:2). The social interactive and collaborative aspect involved is deemed by the researchers to be central to the way people learn within institutions and they suggest that it constitutes a pertinent feature of a learning organisation. A key aspect of organisational learning therefore relates to the interaction that takes place among individuals (Wikipedia 2010:4).

López *et al.*, (2004:93,101) conducted a research study to determine the degree to which a collaborative culture at 195 Spanish institutions influenced organisational learning and found that empirical evidence suggested that collaborative cultures influence organisational learning quite extensively. They specifically concluded that a collaborative culture serves as a means to leverage knowledge through organisational learning and considering that individuals are the main subjects of the learning process they therefore need to adopt a sharing position and commit themselves to realising the aims of the

institution concerned (López *et al.*, 2004:101). As a consequence, López *et al.* (2004:101) assert that culture needs to be re-examined in light of the role it plays in managing the overall organisational learning infrastructure. It is argued by López *et al.* (2004:96) that “*culture creates the context for social interaction that determines how knowledge will be used in particular situations*”. Conner and Clawson (2002:2) seemingly agrees in this regard, in stating that “*asking people to learn in isolation or without the timelines of context, which is born of relationships, hinders the organization’s ability to adapt*”.

The definition attributed to a learning organisation by Wikipedia (2010:3-4) captures many of the aspects alluded to in the preceding discussion, namely: “*a learning organization actively creates, captures, transfers and mobilizes knowledge to enable it to adapt to a changing environment*”. In so doing, it accentuates the importance of knowledge creation and transfer as not only being central to institutional learning, but also as being a critical institutional resource for sense and decision making in dealing with contextual conditions of change and the ability to adapt thereto. This clearly brings into consideration organisational learning, through a process of knowledge creation and sharing, as constituting an important element of dealing with modern-day contextual instability, unpredictability and discontinuous change.

It also reflects the difficulties encountered in practice, as tacit knowledge is quite difficult to articulate and convey at an institutional level, as it entails a need to be interpreted and made more explicit taking contextual realities into consideration. This would give credence to Conner and Clawson’s (2002:2) previous assertion that asking people to learn without timelines of context hinders institutional ability to adapt. It also brings into focus the reality that knowledge inherently embodies mental processes of comprehension, understanding and learning that according to Wilson (2002:2) “*go on in the mind and only in the mind, however much they involve interaction with the world outside the mind, and interaction with others*”. This tacit attribute of knowledge and its mental structures necessitates a need for translation into explicit verbal, written or other forms of information, to enable organisational learning to take place by means of an exchange of information.

It is argued that knowledge derived from information can never be the same as the knowledge base from which it originated (Wilson 2002:2). Context and individual mental frames of reference and experience may influence the process, particularly in any group or team based sense-making process. It is this reality that results in different interpretations of the same sources of information and that results in different sense making outcomes within team or group interaction processes. López *et al.* (2004:94) suggest that learning processes in fact define the quality of the knowledge distributed across an institution as well as the effectiveness with which knowledge is put to use. They claim that to leverage knowledge truly, it is necessary to work with the subjective nature of learning and the idiosyncrasies of the people concerned. It is further argued that culture creates the context for social interaction that determines how knowledge is utilised in particular contextual situations (López *et al.*, 2004:101).

It may therefore be inferred from the above discussion that context and culture play a significant role in organisational learning. Cultural attributes serves as a lens or filter that people use in interpreting and responding to issues (Morey & Frangiosa 1998:309). As a result, people from diverse backgrounds and contextual learning experiences will interpret their understanding of events and situations with nuance differences that enrich the group discourse and learning experience. Morey and Frangiosa (1998:309) identified people’s mental models or paradigms as one of six principles underlying different learning predilections leading to effective organisational learning, the other being systems thinking, an ability to challenge assumptions, listening to understand, teaching others and the learning cycle; observe, assess, design, and implement.

In focusing on systems thinking, Morey and Frangiosa (1998:309) warn: *“if we attempt to learn from the outcome of life experience without an understanding of the complex system that created the outcome, we will create false assumptions that will negatively impact on future learning”*. There are apparent linkages between some of these principles and the habits of learning previously alluded to by Claxton and Lucas (2009:16). So for instance, the people concerned need a mindset and curiosity that is able to navigate the exploration

of system complexity and the virtue of sociability in enriching the social discourse of exploration cannot be underestimated.

5 A CULTURE OF LEARNING

Weaving its way through the above discussion like a golden thread is the notion of culture playing a very fundamental role in institutions. It is deemed a culture that is rooted in mental habits acquired within a school context, where the formative foundation for a culture of learning has been laid. The mental skills and attitudes young people are encouraged to acquire and excise are deemed to play a fundamental role in latter life, as they inherently influence their social interactive response in dealing with complex environmental issues encountered in organisational settings.

Another important thread that emerges from the discussion is that of collaboration and joint exploration to find answers for complex questions. Implied is the need for a culture of learning that will support such social collaboration and exploration, engendering a sense of courage and curiosity in finding solutions for complex and often intractable problems confronting institutions and society (Claxton & Lucas, 2009: 15-16; López *et al.*, 2004:96; MacNiel & Maclin, 2005:1). It is deemed a culture that engenders an ability to challenge prevailing assumptions and mental models so often encapsulated in an institution's existing culture (Govender, 2009:368; López *et al.*, 2004:96; Morey & Frangiosa, 1998:309). Pertinently in this regard, quoting Schein, Lakomski (2001:68) suggests that organisational learning implies a need to “*push an organisation beyond its currently held understandings of itself and its ways of dealing with its internal and external reality*”.

It is contended in this paper that the importance of the concept culture stems from the fact that it acts as a perceptual and behavioural determinant and therefore influences how learning at an individual and within an institutional team context takes place. Even more fundamentally, it influences how they respond to contextual uncertainty and change. Organisations as living networks of human interaction and activity, suggests a need for a

social systems construct in dealing with the concept culture. If one were to understand culture as a meaning giving system of society, then it becomes a current and forever evolving force (Lessem & Schieffer 2009:118), which can best be experienced in active engagement or as previously stated by Lakomski (2001:68) in how it deals with its internal and external reality. It is a reality that at best, as previously seen, may be considered to be rather turbulent and subject to unexpected discontinuous change.

A contemporary complex adaptive systems theory approach in dealing with the concept would suggest that it is a naturally evolving living system and the outcome of the culture formation process can therefore not be predicted with any degree of certainty (Bate, 1994:136; Bennet & Bennet, 2004:15). This would support the importance of the role of schools in laying a sound foundation for a future culture of learning.

The more traditional approach is one of assuming that it is possible to actively and intentionally manage the concept to realise a desired or envisioned culture, although it is also acknowledged that in practice it is extremely difficult to achieve (Jaskyte, 2004:154,156; McCormick, 2008:79-83; Trompenaars & Prud'Homme, 2004:171). It is an approach that would assume that executives and managers could nurture a culture of learning in their institutions. Many practitioners apparently have bought into the idea that culture can in fact be managed. Trompenaars and Prud'Homme's (2004:34) suggest that, as a consequence, institutions have spent significant financial resources on consultants brought in to assist them to roll-out a new desired culture. This would be contradicted by a more contemporary complexity theory approach in dealing with the concept, which assumes that culture is an emergent phenomenon and the outcome of any initiatives to engender a culture of learning within an institution cannot be predicted with any degree of certainty. It is suggested that “*culture for the most part develops in an evolutionary unmanaged process*” (McCormick 2008:78).

Adopting a complex adaptive systems approach Snowden (2002a:4) pertinently claims that if cultural interventions are seen as pattern revealing and influencing activities,

institutions will have a far greater degree of success in dealing therewith. Citing Nodoushani, Hawkins (1997:434) in a similar sense articulates a postmodernist view of culture, namely as not constituting a strong unitary meta-narrative, but of celebrating ambiguities and a multiplicity of conflicting views. Researchers who share this more contemporary view of culture are Bennet and Bennet (2004:150) who very specifically assert that culture emerges out of the nonlinear interactions that takes place among individuals and cannot be traced back to a single cause or individual. Emergence is not random, but rather the result of multiple interactions that settle down to internal coherence and patterns (Bennet & Bennet, 2004:151).

The more contemporary picture of the concept culture that emerges from the discussion is that while there is certainly no guarantee that a desired culture of learning will surface from the interactions that emerge, it is yet deemed possible to implement interventions that may lead to desirable behaviour patterns that will engender a culture of learning. Establishing a foundation based on the mental habits identified by Claxton and Lucas (2009:16) through a process of stimulation and interaction with learners from a very early age could go a long way in engendering a culture of learning. At an institutional level, a similar process could be followed in an attempt to influence the formation of mental habits associated with a learning culture.

In so doing it needs to be remembered that researchers such as Snowden (2002a:2) also very pertinent argue that one cannot engineer a desired culture, as it constitutes a patterning of human interactions, which is not susceptible to design principles. Consequently at best by living out these habits in the day-to-day interaction that takes place in the classroom and within institutional settings, some form of behavioural patterns associated a culture of learning may well start to emerge. These patterns need to be monitored and the favourably patterns need to be stabilised, while patterns inhibiting the development of a culture of leaning need to be disrupted (Snowden, 2002b:107). Fard, Rostamy and Taghiloo (2009:49) agree with the view of adopting a social perspective of the formation of a culture of learning. The researchers suggest that “*culture is constantly*

evolving and travels along an infinite continuum in a harmonious learning environment”, one characterised by staff engaging in rituals, passing along corporate myths and stories, and using arcane jargon (Fard et al., 2009:49).

Weeks and Galunic (2003:1309) in researching organisational culture using a meme perspective conclude that “*firms are best thought of as cultures, as social distributions of modes of thought and forms of externalization*”. The researchers use the term meme to refer “*collectively to cultural modes of thought (ideas, beliefs, assumptions, values, interpretative schema, and know-how), to describe culture as a social phenomenon, patterns of symbolic communication and behaviour that are produced as members of the group enact the memes they have acquired as part of the culture*” (Weeks & Galunic, 2003:1309). In essence, therefore, the researchers describe culture as a social phenomenon of patterns of symbolic communication and behaviour that emerge as members of the group enact the memes they have acquired as part of the culture. This would suggest that modes of thought or mental paradigms underpinning a culture of learning enacted within schools or institutional settings could go a long way in establishing a culture of learning.

The theme that materialises from this discourse is one of focusing on the culture formation consequences that stem from the normal social interaction patterns and organisational networking that surface within schools and institutions. It is a theme that Bennet and Bennet (2004:150) endorse, as may be noted from their observation of culture as an emergent phenomenon, namely as “*workers go about their daily business of communicating, solving problems, taking action, and reacting to information from others*”. In this regard, it is also significant to note that the social connotation and its associated complexity are specifically reflected in the politics of negotiation that takes place within institutions (Brown 1995:5).

An important intervention in attempting to nurture a culture of learning could therefore be one of identifying change agents that could shape the negotiations and discussions that take place within institutional settings. When multiple populations of agents are adapting

to each other (as would be the case in culture of learning initiated interventions) the result is a co-evolutionary process the outcome of which is uncertain (Axelrod & Cohen 1999:8). This notwithstanding, while complex systems may be hard to predict, they may also have a good deal of structure and permit improvement by thoughtful intervention (Axelrod & Cohen 1999:8).

What adds to the complexity of these interventions is that most mental representations or mindsets are often deeply embedded below the surface of conscious thought (Pfeffer, 2005:125) and the interventions themselves can raise awareness and stimulate unexpected emotions that certainly complicate the culture transformation process. The translation of the narratives and stories accompanying the interactions that takes place, as a result of the culture interventions, can become misinterpreted giving rise to unintended and unexpected sets of new cultural determinants. In a sense, institutions become interpretation systems of participants who provide meaning for each other via their everyday interactions and negotiations (Browning & Boudès 2005:32). This clearly may be construed to have very pertinent implications in any attempt to nurture a culture of learning, whether in schools or any other institutional setting. In spite of the apparent complexity and difficulty involved, changing the way people think is still the most powerful means to ultimately change behaviour, which in terms of engendering a culture of learning definitely has specific relevance (Pfeffer 2005:125)

It may be concluded from the discussion that nurturing a culture of learning within any institutional setting implies a complex process of intentional interventions directed at surfacing the underpinning cultural attributes, such as values, beliefs, norms and traditions that collectively are instrumental in shaping peoples' mindsets, as they relate to learning. It further implies a need for interventions by change agents, directed at influencing the negotiations and discussions that take place and consequently shape the cultural attributes associated a culture of learning. It needs to be remembered that these interventions may result in culturally determined behavioural patterns that were neither

foreseen nor expected, as even small changes in initial conditions can have dramatic consequences, as a result of the non-linear interactions that take place (Cilliers 1998:4).

As the cultural patterns emerge, they need to be monitored and those that are deemed to foster a culture of learning need to be supported, while an attempt ought to be made to disrupt those that are deemed to be less desirable (Snowden, 2002b:107). In laying the foundation for a culture of learning within a school setting, the accent apparently should therefore be on creating contexts and patterns of discourse that give rise to the cultural attributes associated with a culture of learning. Hopefully once established the behavioural patterns that emerge will engender a mindset that gives rise to a culture of lifelong learning. Within institutional settings, an endeavour then ought to be made to further enhance the development of a culture of learning, through the discourse and negotiations that take place within the institutions concerned.

6 A CONCLUDING SOUTH AFRICAN PERSPECTIVE

“Learning needs to be embedded in the fabric of all work organizations because of its importance to people’s lives. However, this is not an easy concept to achieve and there are many who would argue that it is unattainable. Some critics say that the concept of the learning organization is doomed to failure because its very foundations are flawed.”

Anon, 2004:22

At the launch of the culture of learning and teaching campaign, former South African president Mbeki (1997:1) called upon all stakeholders in education to *“begin working together with the government and the country as a whole to ensure that the culture of learning and teaching is developed in our institutions”*. In so doing, he stressed that establishing a *“culture of learning and teaching in our institutions is indeed a very urgent one”*. A similar call was made by the current South African President, Jacob Zuma (2009a) at the opening of the Congress of South African Trade Unions (COSATU) annual congress, where he very pertinently stated that *“a teacher’s union such as SADTU must*

actively take up broader educational issues such as how to bring back the culture of learning and teaching”. This would apparently suggest that a culture of learning is not universally prevalent within all South African schools and academic institutions.

Addressing church leaders, President Zuma (2009b) also indicated that the government had made education a priority for the next five years and wanted to promote a new culture of effective learning and teaching. He further referred to the role the church has historically played in education, and requested their support in the transformation of education. The difficulty encountered in moving from rallying cries and mere rhetoric of the need for a culture of learning, to making it a reality in South African schools and institutions, could well stem from the fact that, as suggested in the above introductory quotation, its very foundations are flawed (Anon, 204:22).

Specific reference was made in the introduction to the need for a knowledge-based society to effectively compete within a very competitive global economy. Lund (2008:1) in a similar vein argues that “*the world has moved on from the industrial economy of the 1930s and 1940s, when the emphasis was on machinery and processes, and is now firmly in the knowledge economy*” and consequently contends that “*we desperately need to foster a culture of learning and love of knowledge in South Africa*”. Bennet and Bennet (2004:4), citing Drucker, similarly accentuate the importance of the transition to a knowledge economy and the need for knowledge workers. The economic imperative for a culture of learning apparently has its roots firmly rooted in the emergence of an economic landscape where change, uncertainty and complexity dominate (Bennet & Bennet, 2004:4). With this in mind, the call for the nurturing of a culture of learning in South African institutions, as a matter of urgency, by South African political leaders is quite understandable.

Just how such a culture of learning should to be established in practice however, remains an open question, this while the prevailing situation appears to be deteriorating instead of improving. This may clearly be determined from the South African Minister of

Education’s reference to the decline in the 2009 Matric results, from 62% in 2008 to 60% in 2009, and her suggestion that it “*necessitates new strategies at all levels of the system to address the old issue of how we can enhance the culture of learning and teaching in our schools to improve outcomes*” (Motshekga, 2010:1).

The apparent frustration in attempting to nurture a culture of learning in South African schools, academic and business institutions, it could be argued, stems from a lack of understanding as to how such a culture becomes embedded in the social fabric of the institutions concerned. It is therefore argued that the very foundation is flawed and that the traditional culture construct, which assumes that a desired culture can be realised through processes of management, could well be at the very core of the problem (Anon, 2004:1). As a general construct, culture is often defined as “*the way we do things around here*” (Trompenaars and Prud’Homme, 2004:14,15) and that may precisely be where the flaw has its origins, namely in entrenched traditional scientific management thinking and ways of doing things. The contention by Morey and Frangiosa (1998:309) that the “*most important part of systems thinking for learning is the understanding that events are almost always the outcomes of complex interactions*” would apparently add a sense of truth to this contention. An alternative that needs to be considered, in light of the preceding discussion, is if adopting a complex adaptive systems approach might not be more effective.

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