



Managing tacit knowledge in the corporate environment: communities of practice

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1 Introduction

The fact that the world of business is being shaped by the accelerating speed of change and that the ability to adapt has become crucial is nothing new, but the acknowledgment of the increasing impact of knowledge as a primary driver of economic growth still needs to be addressed by many organizations.

Although there has been a growing recognition that people form an important part of an organization's assets, knowledge has only recently joined the ranks in being seen as a driver of economic growth. As early as 1963, Drucker had the following to say: 'More and more, the productivity of knowledge is going to become, for a country, an industry, or a company, the determining competitiveness factor' (*Knowledge management: classic...2000:261*). It is necessary to be aware of the important role both information and knowledge play in the competitive advantage an organization has over its adversaries. As soon as management has acknowledged that information and knowledge is an important resource and an asset central to the success of the organization, the concept of capitalising on company knowledge can be addressed. 'Capitalizing on company knowledge means considering certain knowledge used and produced by the company as a storehouse of riches and drawing from these riches interest that contributes to increasing the company's capital' (*Knowledge management: classic...2000:263*).

'Knowledge management should be something eagerly accepted by leaders, it should be incredibly easy to sell. Yet Knowledge Management appears at a time when most organizations are battered and bruised by fads, by investments in too many organizational change efforts that have not delivered what they promised' (*Knowledge management: classic...2000:3*).

The solution to the challenge of managing knowledge is sometimes erroneously seen as a technological one. Technology is, at best, one of the tools or enablers used in the knowledge management process. Nickols (2000:1) aptly states: 'Although it is true that technology can enable and support a wide variety of KM initiatives, KM should not be equated with technology. People create and apply knowledge.'

Another misconception is that knowledge is, or has to be, explicit, a material 'thing' or substance, which has to be engineered, produced, measured, catalogued, warehoused, traded and shipped. It has been widely accepted that if it cannot be measured and a value assigned to it, it cannot be an asset (Joia 2000:68). Tacit knowledge is learnt by experience, is simply what one 'knows' and is often communicated indirectly.

As organizations discover the value of knowledge they realize that their intellectual capital and knowledge resources should be strategically managed. Although unconsciously producing and acting upon knowledge on a daily basis, knowledge management is a relatively new concept for many organizations. One of the reasons is the nature of tacit knowledge, which is difficult to harness and is not seen as a revenue-earning product or commodity.

Ways of capturing and sharing organizational knowledge, need to be identified and implemented to address the problem. There are many different techniques and practices that can be applied for the capturing and sharing of organizational knowledge. Taking into account the importance of context, customization and the specific corporate environment, it was decided to do a case study where a community of practice (COP) would be implemented in an organization. It must, however, be noted that knowledge management does not consist of separate projects (of which a COP is but one) and should be integrated throughout an organization.

Questions that arise and need to be answered include the following:

- What is a community of practice (COP)?
- How can it be cultivated in an organization within the corporate environment?
- How successful is a COP in capturing and sharing organizational knowledge (especially tacit) and creating an awareness of the value of knowledge to employees in an organization?

The relevant theories with regard to COPs have been highlighted, applied in practice and their success evaluated. It is hoped that the lessons learnt in this way will assist in alleviating at least some of the uncertainty that organizations in the corporate environment experience where knowledge management is concerned and to serve as a model for the implementation of a COP.

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2 Methodology

The method of gathering data used for the theoretical component of the research took the form of a literature study and was done to form the necessary background in order to be able

to address the identified problem.

A case study was done where the theoretical concepts were applied in a specific organization and included the following data collecting methods:

- Interviews based on a semi-structured questionnaire conducted with management during the planning and evaluation stages and with participating staff during the evaluation of the COP.
- Studying the relevant documents of the organization.
- An analysis and evaluation after the COP had been in operation for a reasonable period of time.

The research was confined to the area of the corporate environment in South Africa where the important role that knowledge plays as a driver of economic growth in the world today is not always evident. Global trends and practices were, however, taken note of in the literature study.

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3 Communities of practice (COP)

Organizations often fail to recognize that knowledge is created and shared through social interaction between people. These interpersonal relationships form a pattern and are referred to as *social innovation capital* or *social capital* (McElroy 2002:30). It is in communities that 'individuals develop the capacity to create, refine, share and eventually apply knowledge – knowledge that makes an individual a valuable organizational resource' (Thomas 2002). Although these communities are mainly self-organizational, there needs to be a certain measure of facilitation, encouragement and management in the manner in which knowledge is created, shared and applied, even if it is only to ensure a supportive environment.

Wenger and Lave first coined the term 'communities of practice' in 1991. 'A Community of Practice (COP) is a group of people who share an interest in something, let us say a problem they face regularly in their work or in their life, and come together to develop knowledge to set up a practice around that topic. A COP is different from a team because it is defined by a topic of interest, not by a task it has to accomplish. It has an identity' (Neves 2001:1).

De Bruijn (2001) developed the following definition: 'A Community of Practice is an informally bound group of peers who have a real need to know what the others know, share knowledge and develop a common practice or approach to the field, thereby embodying a store of knowledge.'

A COP is formed to share what is known about some aspects of the work and to learn from each other. Groups that have similar goals or interests benefit from sharing best practices, past experiences, insights and knowledge.

Many organizations in the corporate environment have come to recognise the importance of COP in their success. Xerox, Exxon, IBM and many more are among the list of companies actively encouraging COPs in their organizations.

The *characteristics* of a COP include the following (Wenger 1998; TFPL 1999; De Bruijn 2001): It tends to be an informal entity and membership is determined by participation rather than position; a COP develops around an issue or problem that is of importance to that group of people; it differs from a team, which is task-driven, in that it exists to further knowledge and learning on a specific topic of mutual interest; and its lifespan is determined by the

members – it carries on as long as they feel they are benefiting from participation.

As stated by Abell and Oxbrow (2001), learning takes place, and more specifically collective learning, which leads to the collective memory of the group. Newcomers are initiated far more rapidly into an organization as know-how and experience (tacit knowledge) are shared. While sharing practices, people start thinking more creatively about routine ways of doing things. New ideas, best practices, etc. come about. Specialists in their field could be invited to share their knowledge with the COP at intervals and when appropriate. In this way, the organization is able to keep up with new developments in its field.

The role of management is a supportive one only. They are responsible for providing the infrastructure, as well as the necessary encouragement. Authors such as Wenger (2002) and White (2002), during a symposium at the University of Pretoria, made mention of the important role trust and a culture of sharing plays in the success of a COP. Management needs to be actively involved in ensuring this important prerequisite for success.

Often, communities will be found to already exist, but they need to be nurtured and provided with a 'space' in which to function. As Nickols (2000) points out, COPs are not new, they have been in existence for a long time. It is only the term that is relatively new.

Membership need not be confined to one COP only. They may overlap and members may be from cross-functional teams, or even from external sources such as customers and suppliers. As is stated by authors such as Wenger (1998) and De Bruijn (2001), it must be kept in mind that members share a common purpose, a shared domain or interest. But, there does need to be 'practice', colleagues must be committed to jointly develop better practices. Membership should ideally be based on participation and not on official status, as long as a common purpose or interest exists (context is important).

According to authors such as Wenger (1998), De Bruijn (2001) and Nickols (2000), there are different types of COPs. Self-organizing and sponsored COPs are identified. The first is more voluntary and informal in nature, while the second is initiated and supported by management. Self-organizing COPs are adaptable and can evolve into the sponsored type as their value to the organization becomes apparent. Wenger (1998) also distinguishes between external and internal COPs. This means that clients and suppliers, for instance, can also contribute. Supporting technologies include telephones, fax machines, video conferencing and e-mail. The Internet has opened new avenues in regard to the facilitation of COPs, and geographical distance has become immaterial. An important aspect pertaining to virtual COPs is that the face-to-face, personal interaction element should not be forgotten. Members should ideally meet a few times a year in person, as socialization is part of a COP and increases participation.

A COP naturally proceeds through certain *stages* of development. De Bruijn (2001) includes the following in a typical life cycle: committing, the start-up (setting the purpose, identifying and recruiting members and defining their roles), operating (sharing knowledge), growth, sustenance, winding and shutting down (if and when the purpose is fulfilled).

Committing includes aspects such as conceptualization and planning. Liaising with the management of an organization to define the issues at stake, obtaining their support, assessing the context and gaining insight into the business environment and strategies are crucial to the success of the COP. 'At the strategic and planning level the predominant skills are those relating to knowledge of the business, its processes and sector. An understanding of the complex knowledge and information that underpins the organization is becoming increasingly important. This understanding must include the creation and flow of knowledge within the organization' (TFPL, 1999:66).

Abell and Oxbrow (2001) emphasise the importance of explaining the relevant concepts such as information, knowledge (especially tacit) and intellectual capital to the decision makers and to ensure that their value to the overall performance of the company is understood.

Establishing where the existing knowledge currently resides, and which type is critical to the organization, is equally important. A decision on the format must also be taken at this stage. If a virtual COP is chosen, the IT infrastructure must meet the requirements.

At this stage, reference needs to be made to the human resource models. Although participation in a COP is seen to be informal and not forced, it may be more successful if incentives and recognition are initially instituted until the benefits of a COP become apparent to the members. Other forms of recognition and incentives could include co-branding, where a member's name is used, for example, 'Dave's checklist'. Peer recognition should not be underestimated (Wenger 1998; De Bruijn 2001). Time must be allocated for participation.

The *start-up* stage includes the recruitment of the members and a coordinator. Wenger (1998) suggests an enthusiastic, well-respected person, not necessarily in senior management. The purpose of the COP needs to be defined and shared with all potential participants. A decision must be made on a suitable topic with which to start a discussion.

The *operating* stage is where knowledge is shared by members, and this is where the process becomes self-organizing. The coordinator is responsible for creating the structure and retaining the focus of the discussions.

The *growth* and *sustenance* flow naturally as enthusiasm and interest grow and any initial reservations are overcome.

Winding and *closing down* do not necessarily follow unless the purpose of the COP has been met, or the reasons for its existence have become irrelevant.

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4 Case study

The case study was done at a large distribution organization in the corporate sector that had no previous history of any formal knowledge management. Operating in a highly competitive environment, with the pressure of retaining its position as the leader in its field, intellectual capital and knowledge management were unknown entities at the time.

One of the objectives of the implementation of a COP was to find a way of successfully capturing and sharing organizational knowledge (especially tacit). For the performance to be measured, a questionnaire was devised to evaluate the impact and to identify the benefits and problems encountered. Any knowledge management project needs to result in achieving something positive and be relative to the organization's goals and objectives (Nickols, 2000). Another objective was to create an awareness of the value of knowledge to employees in an organization.

The case study included the planning, implementation and evaluation of a COP as one process of knowledge management, while highlighting the fact that knowledge management does not actually consist of separate projects, but is integrated throughout the organization. The reason for choosing to cultivate a COP as the first knowledge management activity in the specific organization, was the speed with which an impact can be made, the high success rate and the relatively low cost of implementation, as this acts as encouragement for the wider implementation of knowledge management. Internationally acclaimed authors on the

subject of COPs, Wenger (2002) and White (2002), highlighted these benefits during a symposium at the University of Pretoria.

During preliminary interviews with the management of the organization, it was discovered that the problem of ignorance concerning knowledge management was greater than anticipated. At the root of the problem lies the uncertainty and confusion about what intellectual capital and knowledge management actually are, and the terms such as 'intangible' or 'tacit' knowledge, which are equally foreign concepts to many executives in such companies (McElroy 2002:30. Joia 2000:69). Clarifying the relevant terms is crucial to the success of any knowledge management activity.

4.1 Steps for planning and implementation

In accordance with De Bruijn's first stage in the COP life cycle, *conceptualization* and *planning* needed to take place. Included were the following: liaising with the management of the company to define the issues at stake, obtaining their support and enthusiasm, assessing the context and gaining insight into the company's business environment.

It was also necessary to obtain documentation of a wide variety to establish what the goals, business processes, etc. of the organization entailed. As was found in the literature, gaining insight into the specific context was of the utmost importance before the actual implementation could take place.

The different steps are discussed in more detail:

An *interview* was held with the CEO and other stakeholders. This was necessary to explain the concepts at hand to the decisionmakers in the company. It was crucial to the success of the project that the value of intellectual assets in the overall performance and competitive advantage of the company was understood by top management and that, although not previously articulated or recognized, these assets existed and formed an integral part of the organization.

Against the theoretical background, it was clear that the basic concepts had to be defined and elucidated. This included definitions of information, knowledge, knowledge management, intellectual capital, COPs and what constituted a learning organization.

Ardichvili, Page and Wentling (2003:66) view this as an important step in changing the attitude in an organization in such a way that it becomes susceptible to the acceptance and cooperation needed for successful knowledge management. If there were a prevailing culture of competition and a reluctance to share knowledge, a COP might have struggled to be of much value.

An equally important step was the *assessment* of the company in order to gain the necessary background and insight into the organizational environment.

At that stage, it became necessary to ascertain what the organization's business mission and strategy were, so as to align the initial knowledge management process to them.

The different processes and services were studied, as were the structures and roles. The company consisted of well-functioning, autonomous business units spread throughout the country and it was for this reason (distance) that it was decided to establish a virtual COP. Twenty-nine unit managers were identified to take part in the pilot COP.

To facilitate a virtual COP, an assessment of the existing information technology

infrastructure was done. Information was gained on the IT infrastructure, access to intranet, Internet, e-mail services, and databases and the use of computer programs. It was found that the existing intranet could be used, with a separate discussion group set up for the specific COP.

Establishing what type of knowledge was critical to the organization was important. Examples in this case were capturing idea-generating processes, product-related know-how, strategy, customer knowledge and competitor intelligence. The existing knowledge was found in databases, documents and people.

Identifying the strengths and weaknesses was also helpful in the planning stage, as these could be utilized and focussed on. An example of a weakness was the impact of the geographical distances on the communication structures and the resulting feeling of isolation some units experienced.

After the planning phase had been completed, the *implementation* followed. This included the setting up and activating of the discussion group via the e-mail system by the technology/systems division, as was recommended in the literature.

The staff members of the various units earmarked for the proposed COP were informed as to what the concept entailed, what the objectives were, the potential benefits to members, that it was not compulsory, that the members should take ownership and contribute and that rewards and incentives would, at a later stage, be instituted for participation and sharing of constructive ideas, etc. This was done by the CEO to demonstrate the strategic importance and that top management endorsed knowledge management.

A coordinator of the COP was identified. The characteristics of a successful coordinator include that he or she be a well-respected person, even though not necessarily in senior management, enthusiastic, grasping the important role of knowledge within an organization, someone not afraid of change and, in the case of a virtual COP, someone technologically adept. The coordinator has to oversee the discussions in such a way that the focus always remains on the business aspect.

In this case, work on adapting the human resource models and structures to include the sharing of knowledge in performance appraisal systems was started, as suggested by Wenger (1998) and De Bruijn (2001). As this constituted a lengthy process, changes were not made in time for inclusion in the case study. Although not imperative, it would encourage participation.

Member support had to be enlisted. According to Ardichvili, Page and Wentling (2003), cooperation and contribution are more forthcoming if members are involved in the development process. For this reason, contributions for naming the COP were solicited. The COP's coordinator was introduced and took over at this stage.

As Wenger (1998) suggests, a suitable topic was identified to begin a discussion. It had to be interesting, relevant, and an aspect which constituted a problem in the workplace, something people could relate to. The potential effects of the impending new regulations on road transport, and more specifically, on the organization itself, was decided upon.

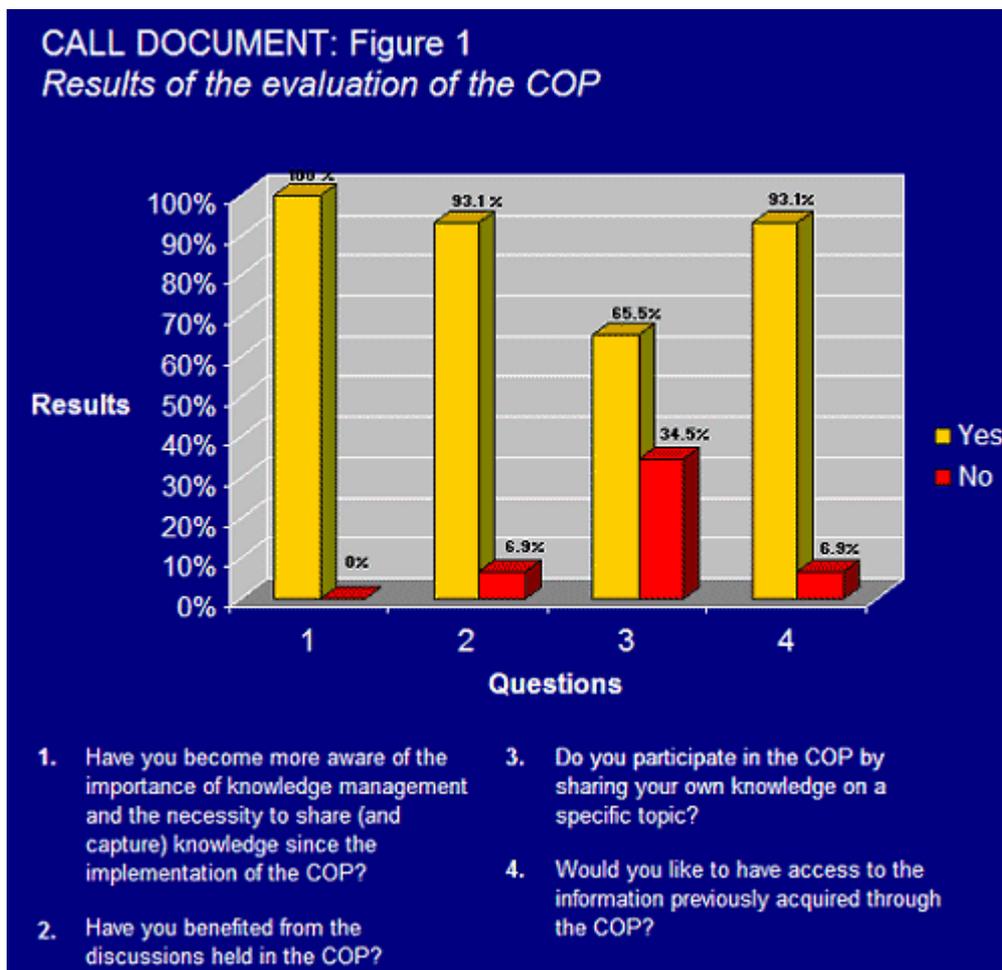
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5 Evaluation and analysis of the results

After the COP had been in practice for a period of five months within the specific organization, an evaluation was done to ascertain the measure of success achieved in reaching the objectives.

A [semi-structured questionnaire](#) (see [Appendix 1](#)) was devised for the interviews which were conducted with the 29 participating unit managers. This was done telephonically due to the distances involved. During the introduction to the interview, the purpose and scope of the research was explained, as well as the fact that anonymity was guaranteed. The answers to the questions were needed to assist in the evaluation of the success of a COP in capturing and sharing organizational knowledge (especially tacit) and in creating an awareness of the value that knowledge had to employees in the organization. The results of the evaluation of the COP are indicated in Figure 1.

Figure 1 Results of the evaluation of the COP



As was anticipated, the answer to the *first* question on becoming more aware of the importance of knowledge management and the necessity to share (and capture) knowledge, was 'Yes'. One hundred per cent of the participants answered in the affirmative. This was considered a significant breakthrough as it meant a certain 'mindset' had been created.

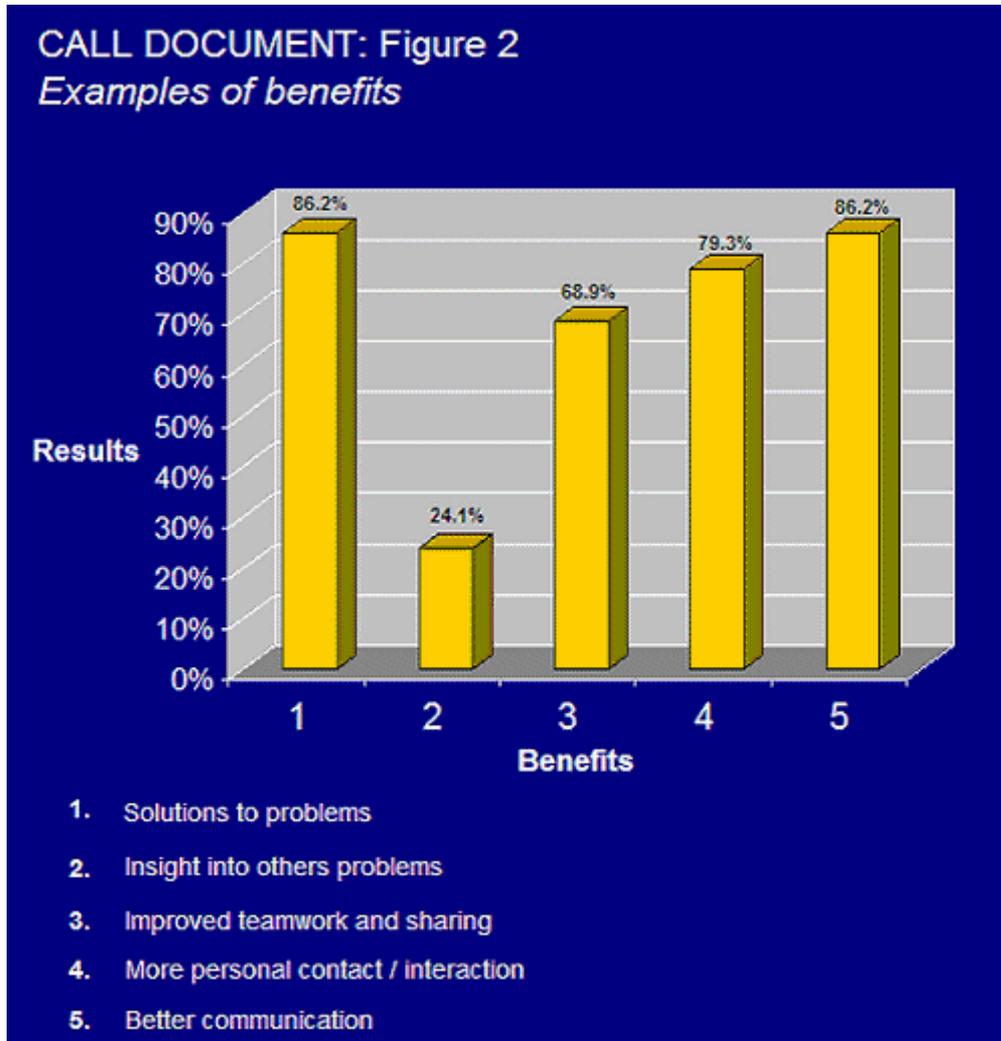
The subsequent questions were of great importance to assist management in future planning. Question *two* enquired about the benefits, if any. Of the respondents, 93,1% felt they had in fact, *benefited* from the discussions in the COP, even if they had not participated. Examples were required and included:

- finding solutions to problems much faster = 86,2%

- more personal contact and interaction = 79,3%
- improved teamwork and sharing = 68,9%.

Other examples included aspects such as gaining more insight into the problems of others (24,1%) and better communication (86,2%). The examples cited are reflected in Figure 2.

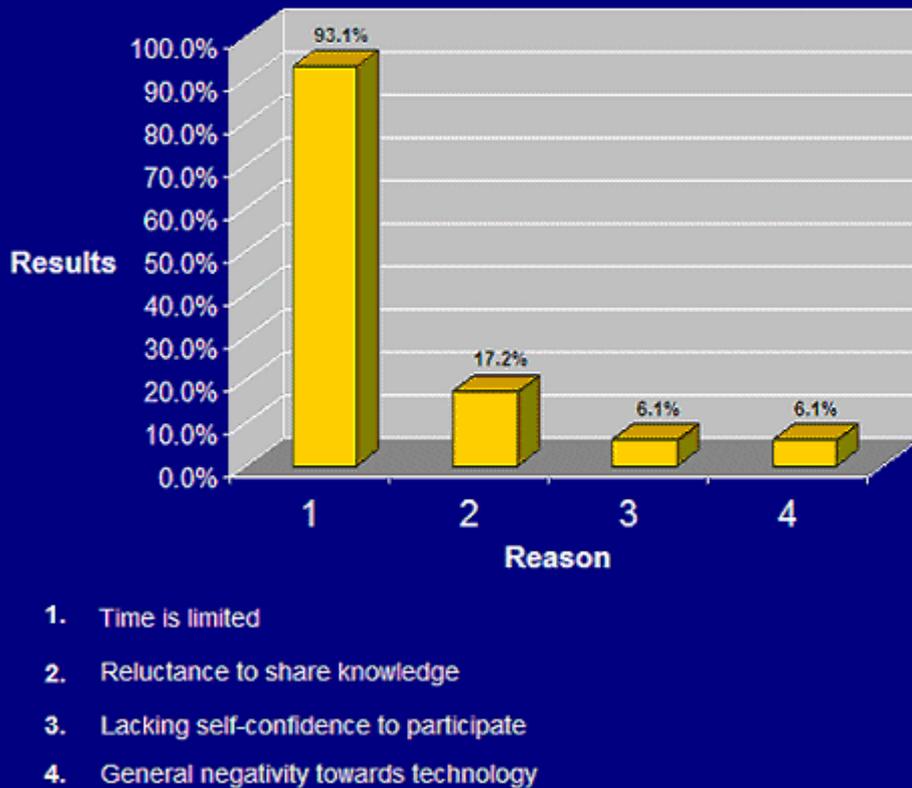
Figure 2 Examples of benefits experienced



The *third* question was in actual fact crucial to knowledge-sharing within an organization. It had to do with the culture of the organization, what the measure of trust was and whether employees placed what was best for the company at a premium. The question was included to measure *participation* and obtain the reasons for non-participation. Management found the knowledge gained from this question invaluable to future planning. A total of 65,5% of the respondents participated in the COP, while 34,5% did not. Reasons for non-participation were asked for and the biggest problem cited was that of time limits. In fact, 93,1% experienced the problem. Those reluctant to share their knowledge with others constituted 17,2%. A small percentage (6,1%) cited a lack of confidence (especially newcomers) and others experienced an adversity towards technology (6,1%). The reasons for not actively participating are shown in Figure 3.

Figure 3 Reasons for non-participation

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Reasons for non-participation



In answer to question *four*, 93,1% expressed interest in having access to previously discussed topics, that is, some form of archiving. As motivation it was felt time could be saved, specialists in specific fields identified and lists of contact persons could be compiled. This correlated with the literature.

Question *five* asked for suggestions on how to encourage participation. A total of 72,5% were in favour of some form of recognition or reward, while 27,5% felt it best to include participation in the structures for performance management evaluation.

Generally, respondents were found to be cooperative and mostly positive about the experience. Initially, as a result of work pressure and time limitations, membership of the COP was perceived as adding even more to their workload. At the time of the evaluation process, however, an overwhelming majority of the respondents were very positive (93,1%) and indicated that they wanted the COP to continue, although not all felt comfortable about sharing their own knowledge with others.

At this stage, an interview was held with top management and feedback given. The results were required to determine whether further knowledge management practices would be introduced throughout the organization.

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6 Conclusion

The new business environment is characterized by radical and continuous change and the

pressures of remaining competitive are so great that time cannot be wasted on all kinds of fads. Any new initiative needs to be aligned to the strategic business of an organization. It must be seen as adding value to the overall competency of the company. The objectives of the case study in which a COP was planned, implemented and evaluated were to find a way of successfully capturing and sharing organizational knowledge (especially tacit) and to create an awareness of the value of knowledge to employees. If the aim of the research was to be achieved, the theories found in the literature needed to be applied and put to the test specifically in the corporate environment, as this was where a certain measure of ignorance still existed. This was done and a model for the implementation of a COP was created. Uncertainty of the value that knowledge had for the organization was dispelled and the importance of managing it was highlighted.

In view of the answers to the questions put to the respondents during the semi-structured interviews and the reaction of the top management of the targeted company to these, it is concluded that the objectives were successfully reached. The COP contributed to the successful capturing and sharing of organizational knowledge and employees became more aware of the value of knowledge.

The management team echoed the words of Bob Hiebeler (in Malhotra 2001): 'To me, this is the essence of knowledge sharing. It's all about contribution, it's all about the respect for others' opinions and views, it's all about a good facilitation and synthesis process, it's all about the distribution of lessons learned from this knowledge process, and it's all about access to packaged knowledge and key insights that become the starting points for individual learning.'

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