Knowledge Management Strategy in Professional Service Firms

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Abstract:

Knowledge management is concerned with knowledge sharing and knowledge creation inorganizations. Knowledge management activities include creation, acquisition, identification,storage, sharing and application of knowledge. Some knowledge management activitiescontribute to exploration (i.e. discovery of new knowledge), while others contribute toexploitation (i.e. application of what is already known). Exploitation refers to solution reuse,while exploration refers to solution innovation. Exploitation leverages existing knowledgethrough the application of pre-established procedures, technologies and policing approaches.Exploration can lead to new investigative approaches and new examination procedures.

Knowledge management is concerned with knowledge sharing and knowledge creation in organizations. Knowledge management activities include creation, acquisition, identification, storage, sharing and application of knowledge (Heisig, 2009). Some knowledge management activities contribute to exploration (i.e., discovery of new knowledge), while others contribute to exploitation (i.e., application of what is already known). Exploitation refers to solution reuse, while exploration refers to solution innovation. Exploitation leverages existing knowledge through the application of pre-established procedures, technologies and policing approaches. Exploration can lead to new investigative approaches and new examination procedures (Durcikova et al., 2011).

Knowledge management efficiency in an organization is dependent on capabilities such as collective skills, abilities and general expertise of the organization (Denford, 2013; Ragab and Arisha, 2013). Expertise in any profession is a hard-won combination of many factors and typically includes advanced knowledge, skills, and abilities developed through years of experience. Within the investigation profession, expert investigators are individuals who possess innate traits and abilities supplemented with knowledge gained through formal training in areas such as forensic accounting and computer forensics, and on-the-job training (Taylor et al., 2013).

Where knowledge deficits exist in private investigations, incomplete information and know-how give rise to uncertainties that obscure prediction and execution. Performance risk and execution risk are lowered through knowledge transfer mechanisms developed to avoid and handle uncertainties. Such knowledge transfer permits knowledge reuse, and the recombination of existing knowledge is an important antecedent of uncertainty resolution (Mitchell, 2006).

Knowledge management strategy focuses on personnel resources, where the knowledge of each investigator as well as the combined knowledge in the investigation team represents resources that are to be explored and exploited for better inquiry work. The knowledge management strategy process includes developing a working definition of knowledge, developing a working definition of knowledge management, doing a knowledge audit, defining knowledge management objectives and strategy approaches, and implementing strategy with quality measures (Chaffey and White, 2011).

However, despite the opportunities presented by knowledge management, its integration to the investigation sector has been somewhat troublesome. Even when the term knowledge management is applied in investigations, it often implies facts-based inquiry rather than knowledge-based inquiry. Facts-based investigation ignores important aspects of knowledge-based investigation, such as interpretation of facts by colleagues, reflection around facts by combining information pieces, and contextual factors that influence the meaning of facts. Too often, facts in terms of numbers and names represent only pieces of a reality that needs to be mapped into a complete picture of knowledge (Luen and Al-Hawamdeh, 2001).

Private investigations represent an interesting and unique field of knowledge management research for several reasons. A possible white-collar crime has occurred, and examiners are to figure out what, how, who and why. It is a puzzle of information pieces that has to be solved. If one piece is missing in a puzzle of thousands of pieces, the crime will never be solved. Second, knowledge cannot be shared freely. Knowledge has to be applied in a sequence of investigative steps, where witnesses and suspects are involved to the extent that the investigation makes progress. Colleagues in the firm and executives in the client organization

do only get to know about a current investigation to the extent that they have a role to play in it. A senior investigating person plays the role of a knowledge manager, who monitors information flows. Only when the private investigation is completed, is knowledge from the case to be shared in the broader field of stakeholders and spectators.

Thus, any discussion regarding the role of knowledge management within the context of private investigations must necessarily begin with an overview of the specific nature of the typical investigating unit. Effective knowledge management is dependent on a knowledge-centred culture, which may or may not exist in different units around the world. For knowledge management to thrive within the investigative context, the organizational environment must be conducive to its success. If knowledge work is regarded as shuffling papers or attending formal meetings, it is little valued and carries no prestige within teams of that kind. Two significant factors that hinder the integration of knowledge management in the inquiry context seem to be the secrecy structure and the competitive nature of many organizations (Dean et al., 2006; Seba and Rowley, 2010; Seba et al., 2011).

The issue of knowledge management in private investigations is not a question of whether or not it might be useful. It is a question of how it can be implemented, which is the contingent approach to management. There is no universal knowledge management strategy. Rather, a strategy is based on the situation in the organization, such as a law firm. Factors that make the investigative context special include power in terms of client board support, active information collection in terms of intelligence, and the need for high-quality information that can serve as evidence in the final report.

Strong knowledge management capabilities require processes that apply resources in particular ways and structures that embody and support distinct values. Distinct values are found in the organizational culture, while organizational structure is the pattern of interactions, coordination, and control that shape behaviour and outcomes.

Knowledge management is dependent on both organizational structure and organizational culture. Structure and culture define the framework within which knowledge management takes place. Barriers to and

enablers of knowledge management in the investigation unit can be found both in the organizational structure and in the organizational culture. This has been the topic of several research studies of detective work. Other research studies have focused on management approaches, intelligence for knowledge and knowledge integration.

Private investigations are heavily dependent on information, intelligence and knowledge. The amount of information an investigator comes in contact with in the course of his or her work is often astounding. With a more proactive and preventive approach to crime identification, detectives have increasingly relied on information and knowledge and associated information technology in terms of knowledge management systems to improve their performance. Accordingly, the management of knowledge is a crucial aspect of investigation work to promote knowledge development and sharing.

Knowledge is indispensable to modern investigations. Investigative ability to create, identify, share and apply knowledge directly affects investigations' competitive advantage (Choi et al., 2010). Of special importance is financial crime knowledge among corporate executives. Investigation and prevention of financial crime requires that board members and executive managers have knowledge about crime categories and motives. Executives need to be knowledgeable about contexts, complexities, and also connections. Bevan and Gitsham (2009) argue that such knowledge can be developed through leadership development programs, whereby the appropriate knowledge and skills are sought when recruiting new talent into the organization, and these knowledge and skills are subsequently built upon through career development planning and succession planning, while ensuring that performance management and incentive systems enable and reward the building and acquisition of such knowledge, and that such knowledge is developed through individual as well as collective competency frameworks.

Collier (2006) argues that effective knowledge management is as important to investigating and preventing crime as it is to any other public or private sector organization in terms of improving performance. Over the past ten years, there has been a shift from a reactive, response-led approach to a proactive, intelligence-led style of law enforcement. In

the UK, Norway, Sweden and many other countries, the intelligence-led approach has been developed into a systematic approach by national criminal intelligence services. The intelligence used in both strategic and tactical assessments is derived from a number of knowledge and information sources, and the production of assessments represents knowledge work as well.

Wilhelmsen (2009) found that "since knowledge and experience often are obtained with great personal and work related costs, the individual or the organization can develop emotional ownership to the information and not be willing to share all they know". However, sharing knowledge in suspected crime cases is vital because misleading or false information can have unfortunate and harmful consequences.

In knowledge collaboration, teams are considered to be an important building block in today's knowledge-based organizations. An important factor affecting team performance is socio-cognitive processes. A key problem underlying the socio-cognitive process in teams is the uneven distributed knowledge among individuals in the team. In particular, Choi et al. (2010) argue that a socio-cognitive structure called the transactive memory system plays a particularly important role in team's ability to leverage team members' knowledge in team performance. A transactive memory system refers to a specialized division of cognitive labour that develops within a team with respect to the encoding, storage, and retrieval of knowledge from different domains. The cognitive labour implies that team members know who knows what and who knows who knows what.

One of the main challenges in managing an organization's knowledge is transferring knowledge from its source to its destination where it is needed. Unlike tangible assets, the investigation unit often does not know if they have access to relevant knowledge and where it potentially is located. Furthermore, they do not know how much it is worth to them, as compared to the value of office buildings (Liu et al., 2010).

Professional Service Firms

Knowledge management is a critical issue in professional service firms (Palte et al, 2011). Human resources determine firm performance

(McClean and Collins, 2011). While knowledge management has become a strategic success factor and differentiator in professional service firms (Hansen et al., 1999), professional service firms are emerging as the typical organization in the knowledge-based economy. Professional service firm is any organization reliant on a workforce with substantial expertise – that is, a definition similar to knowledge-intensive fir or knowledge-based organization (Nordenflycht, 2010). The central characteristic associated with professionals is their mastery of a particular expertise or knowledge base. For professional service firms such as consultants, accountants, auditors, lawyers, architects and engineers, knowledge is a capacity to act.

Nordenflycht (2010) identified three distinctive characteristics of the professional service firm: high knowledge intensity, low capital intensity and a professional workforce. For professional service firms, the main asset is intellectual capital, and they have to seek new ways to leverage their intellectual capital on a continuous basis. The core business of these firms is to provide sophisticated knowledge-based services grounded on the existence of intellectual assets (Swart and Kinnie, 2003).

Lawrence et al. (2012) studied transformations of professional service firms. They examined the roles of episodic and systemic forms of power in radical organizational change. They found that episodic power is able to initiate and energize radical change when it represents a significant break from traditional authority structures and is legitimated through appeals to traditional organizational values. Furthermore, systemic power was found to be able to institutionalize radical change when the systems associated with it are legitimated by the skilled use of language by key actors and then left to operate independently by those actors.

Lawrence et al. (2012) argue that professional service firms have been experiencing both institutional and market pressures that have challenged the traditional partner management style, pushing the firms towards a more business-like managed professional business form. The latter embraces corporate-style governance, a separation of management and professional tasks, more centralized and coordinated decision making, greater functional and professional differentiation, a more elaborate hierarchy, and the introduction of formal control systems.

To create radical change in professional service firms, Lawrence et al. (2012) argue that power is needed. Power is the dimension of a relationship through which behaviour, attitude, or opportunity of an actor is affected by another actor, system, or technology. Episodic power refers to relatively discrete acts of mobilization initiated by self-interested actors. Episodic power exists in its exercise and is expressed in relationships. Systemic power is the form of power that works through routine, ongoing practices and decision processes. The concept of systemic power is rooted in social and cultural systems, rather than in individual actors.

Nordenflycht's (2010) three distinctive characteristics of professional service firms led him to develop an explicit theory of such firms' distinctiveness. First, knowledge intensity is perhaps the most fundamental distinctive characteristic. Knowledge intensity indicates that production of a firm's output relies on a substantial body of complex knowledge. The firm relies on an intellectually skilled workforce. There are two key managerial challenges that result from knowledge intensity:

- Cat herding: One challenge arising from an intellectually skilled workforce is retaining and directing those skilled employees. It requires alternative incentive mechanisms.
- Opaque quality: This refers to situations where the quality of an expert's output is hard for non-experts to evaluate, even after the output is produced and delivered. It requires mechanisms to signal quality.

Next to knowledge intensity is low capital intensity as a characteristic. It indicates that a firm's production does not involve significant amounts of nonhuman assets, such as inventory, factories and equipment, and even intangible nonhuman assets like patents and copyrights. Low capital intensity is not a necessary implication of knowledge intensity, as many companies require both an intellectually skilled workforce and significant nonhuman assets. Examples are hospitals and oil companies.

Final characteristic of professional service firms is a professionalized workforce. A profession is characterized by a particular knowledge base, regulation and control of that knowledge base and its application, as

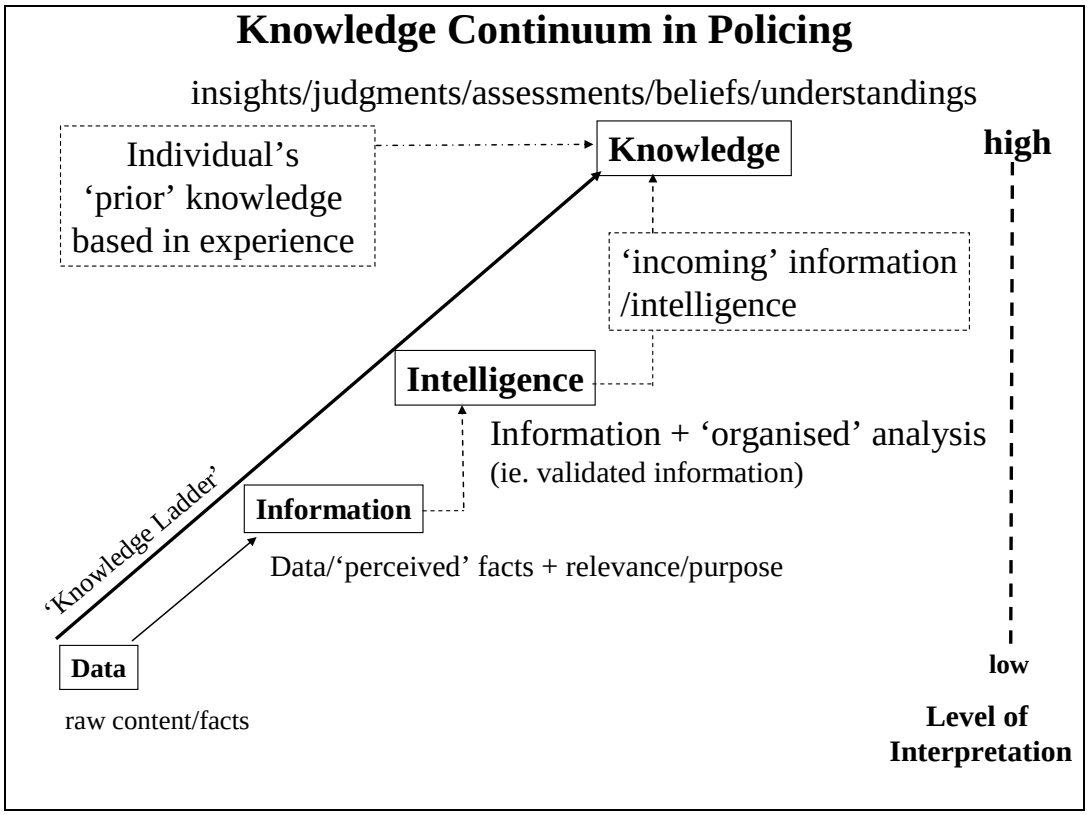
well as ideology, which refers to the professional codes of ethics as well as less explicit norms that define appropriate behavior for professionals.

An additional characteristic of many professional service firms is no outside ownership. Ownership of the firm is allocated exclusively to professionals who work for the firm and not to any outside investors (Nordenflycht, 2010).

Intelligence for Knowledge

Luen and Al-Hawamdeh (2001) found that the amount of information that police officers come into contact within the course of their work is astounding. This and the vast knowledge that police officers need in order to perform their normal duties suggest the need for police officers to be proficient knowledge workers, being able to access, assimilate, and use knowledge effectively to discharge their duties. The same is certainly true for private investigators as well.

While data are numbers and letters without meaning, information is data in a context that makes sense. When combined with interpretation and reflection information becomes knowledge; while knowledge accumulated over time, as learning, is wisdom. In this hierarchical structure we find that intelligence amounts to more than information and less than knowledge. Intelligence is analysed information, as illustrated in the figure. This model was developed by one of the authors, where the challenge was to locate intelligence in the traditional hierarchy of data-information-knowledge.



Hierarchy of investigation and prevention insight expressed as a continuum

The word intelligence can refer to a product, a process, the individual organization that shapes raw data into a finished intelligence product, and also the larger community containing these organizations. The word intelligence also often refers to the military or to agencies like MI5 (The Security Service) or MI6 (Secret Intelligence Service) in the UK. However, in this chapter, intelligence relates to suspicion of criminal actions and is defined as a goal-oriented gathering, systematization and analysis of information (Wilhelmsen, 2009).

Data is considered the raw material from which information develops. As is the case with notes, information is data endowed with relevance and purpose. The same can be said of intelligence: in that it is a form of insight to which some relevance has been attached through an attempt to offer an organized analysis of the information received by a crime analyst/ intelligence officer. Accordingly, on the above continuum, intelligence is placed between information and knowledge as ideally (as argued) intelligence represents a form of validated information.

Information is the lifeblood of an investigation. An investigation goes nowhere if information is not forthcoming concerning an incident. Information is the raw material, which breathes life into an investigation. It comprises ordinary rank and file employees, either working in human resource departments and accounting departments, or sitting at a computer conducting searches, background checks, or more sophisticated crime mapping and intelligence analysis reports and collecting and collating information.

Information and, to a similar extent, intelligence thereby consist of facts and other data which is organized to characterize or profile a particular situation, incident, or crime and the individual or group of individuals presumed to be involved. This organizing of data into meaningful information necessarily involves some level of interpretation of the facts as presented. However, the role of interpretation here in information is relatively minor in comparison to its role in terms of knowledge construction. In this regard, the role of interpretation in intelligence is greater and more explicit than it is in terms of information, but not as extensive as in the making of knowledge.

Knowledge helps one develop relevant meaning to information in intelligence work (Innes and Sheptycki, 2004: 6):

> The distinction between information and intelligence is well established, but can be difficult to grasp. Information consists of bits of data that, when combined and viewed together with relevant background knowledge, may be used to produce intelligence, which informs the actions and decisions of policing organizations.

As implied, knowledge operates at a higher level of abstraction and consists of judgments and assessments based on personal beliefs, truths, and expectations regarding the information received and how it should be analysed, evaluated and synthesized — in short interpreted — so that it may be used and implemented into some form of action.

Characteristics of Knowledge Workers

Private investigators are referred to as knowledge workers. White-collar crime inquiry largely revolves around creation, acquisition,

identification, storage, share and use of knowledge in meaningful ways (Heisig, 2009), so as to identify elements of know-what, know-how, and know-why as it relates to suspicion of white-collar crime. Knowledge management processes in investigations are applied to ensure inquiry personnel are more cognitively sophisticated by promoting the creation of new knowledge and the sharing of existing knowledge.

Knowledge Integration

In knowledge management, the *theory of absorptive capacity* is important. Absorptive capacity is viewed as a dynamic capability of processing knowledge that enhances organizational innovation (Joshi et al. 2010). More specifically, absorptive capacity is an organization's ability to identify, assimilate, transform, and apply valuable external knowledge (Roberts et al., 2012). Through their investigative practice, investigators develop collective knowledge about certain areas of crime, criminals, behaviours and motives. This knowledge base enhances the unit's ability to identify and value both internal and external knowledge. However, sheer exposure to related external knowledge is not sufficient to ensure that the unit will absorb it successfully. The knowledge must be assimilated or transformed into the organization's knowledge base. While a knowledge base enables the associative connections needed for insights into new white-collar crime cases, the organizational assimilation of new knowledge depends more so upon the transfer of knowledge across and within units. Investigators apply their newly absorbed knowledge in a variety of ways, for example, to replenish their knowledge base, to forecast suspect behaviours, to reconfigure existing capabilities, and to create innovative inquiry services.

Access to external knowledge enables the importation of new knowledge coupled with the recombination of existing knowledge. Recombination avoids the inside view, which refers to an insular approach to investigations, where intuition and knowledge of current cases are used to forecast future case outcomes. Bold forecasts are reduced when investigation leaders adopt an outside view, which refers to active search of complementing and contradicting knowledge. The outside view avoids distortion related to historic bias (Mitchell, 2006).

There are three assumptions underlying absorptive capacity (Roberts et al., 2012):

- Absorptive capacity depends on prior related knowledge. Without some prior related knowledge, the investigator will not be able to accurately determine the potential value of external knowledge. This implies that absorptive capacity is domain-specific.
- An organization's absorptive capacity depends on the absorptive capabilities of its individual members. However, it is not simply the sum of its members' absorptive capacities. Rather, it depends on the links between individuals as well. Thus, the organization's absorptive capacity is formed from an overlap in individual members' knowledge across and within units. These overlaps imply that absorptive capacity is unit-specific and case-specific.
- An organization's absorptive capacity is path-dependent. Accumulating absorptive capacity in one period will permit its more efficient accumulation in the next. Likewise, in an uncertain environment, absorptive capacity affects expectation formation, permitting the investigators to predict more accurately the nature and potential of new knowledge. These two features of absorptive capacity – cumulativeness and its effect on expectation formation – imply that its development is path-dependent.

According to Roberts et al. (2012), organizational scholars have viewed absorptive capacity from two general perspectives: as a stock of prior related knowledge and as an ability to understand new knowledge. When viewed as an asset, absorptive capacity is referred to as the level of relevant prior knowledge possessed by the unit. When viewed as ability, absorptive capacity is referred to as the extent to which the unit is able to change according to new knowledge.

Within absorptive capacity Mitchell (2006) stresses the importance of knowledge integration. The knowledge integration process involves social interactions among individuals using internal communication channels for knowledge transfer to arrive at a common perspective for problem solving. Where organizational units hold specialized knowledge, inter-unit linkages are the primary means of transferring knowledge.

Transferring knowledge among experts in the firm is not the only possible approach to knowledge integration. An alternative approach is combination of specialized, differentiated, but complementary knowledge. As the problem of knowledge integration is usually conceived as a consequence of the benefits of specialization, Tell (2011) finds it not surprising that many definitions characterize knowledge integration as a process/activity whereby such specialized knowledge is combined – rather than shared and transferred. This means that when studying and conceptualizing knowledge integration at the level of people and processes, projects and partnerships, and strategies and outcomes, the fundamental problem of knowledge integration lies in understanding the process involving the combination of specialized knowledge bases embodied in individuals. To be successful, a minimum of common knowledge has to be present to enable knowledge integration of completely specialized knowledge.

When integration of knowledge is conceptualized as a combination of expert knowledge, the core argument developed by Söderlund and Bredin (2011) is that knowledge integration depends on the individual actors' abilities to participate in knowledge integration processes and, hence, that the individuals' behaviour and skills are central for the analysis of such processes. It is at this level that different areas of expertise and problem-solving cycles typically are being integrated. This is perhaps especially true for complex crime investigations such as white-collar crime, where expert knowledge of finance, organization, management, psychology, law, communication, and sociology is often needed in a well-integrated process. If knowledge collectivities are playing an increasingly important role for knowledge integration and problem-solving in investigative work, it seems imperative to address how individual investigators relate to less developed groups and new organizational contexts, and how they cope with increasingly higher demands for flexibility and mobility.

Knowledge in Analytical Work

Innes and Sheptycki (2004: 6) argue that intelligence is value added to information:

> The distinction between information and intelligence is well established, but can be difficult to grasp. Information consists of bits of data that, when combined and viewed together with relevant background knowledge, may be used to produce intelligence, which informs the actions and decisions of policing organizations.

As law firms, auditing firms and consulting firms worldwide constantly strive for competitive advantage, major approaches and tools in pursuing their objectives are knowledge management and information technology. The attention for a knowledge-based perspective on organizations has led to much scientific as well as practical interest in organizing firms with the help of knowledge management. As argued by Sastrowardoyo and Metcalfe (2006), the importance of knowledge to organizations has been extensively established in the business and management literature as being the basis of future sustainable competitive advantage. Knowledge is the stock in trade for law firms and other professional service firms.

This chapter applies the knowledge-based view of the firm as its main theoretical perspective. The knowledge-based view is part of the resource-based view of the firm, which views the firm as a collection of productive resources. The knowledge-based view considers knowledge as the critical input in production of legal services in the law firm. Knowledge is the primary source of value of the firm. Based on the assumption of bounded rationality, this view assumes that individuals will never possess identical stocks of knowledge. Since each firm has its unique set of human resources in terms of lawyers as knowledge workers, there will always be knowledge asymmetries between law firms (Dibbern et al., 2008).

KM (KM) is introduced to help companies create, share, and use knowledge effectively. Some knowledge organizations such as law firms have introduced the role of the Chief Knowledge Officer (CKO), which is not so much to provide KM facilities and services as to enable the organization to learn, to innovate and to gain from entrepreneurship. CKOs have to discover and develop law firms' implicit vision of how KM will make a difference.

In this chapter we study law firms as the case of a knowledge organization. The increased efforts in most law firms to improve their KM are related to a number of changes in the legal industry. First, there is a shift from paper-based to electronically based information and documents that lawyers work on. Second, advances in information and communication technology enable storing, transfer and exchange of information electronically, as a supplement to meetings and phone calls. Electronic services available on the Internet make lawyers interact with a number of external service providers electronically rather than interact through internal functions. Globalization of legal services requires law firms locally to act globally for corporate clients that are doing business in several parts of the world.

The drive towards specialization needs to be combined with generalization, where specialists share their understanding with other specialists as well as clients. Merging expertise advice and sometimes translating it into something understandable for the layman is enabled in KM by putting together electronic pieces of text, images, videos and sound tracks.

Strong KM capabilities require processes that apply resources in particular ways and structures that embody and support distinct values. KM capabilities are based on two fundamental assets: people and technology. To the extent a law firm can develop firm-specific resources that are not easily replicable by competitors it can better protect its knowledge investments.

KM is not at all something completely new to law firms. Law firms and lawyers have been doing knowledge work, and KM, ever since legal work first began. In every advice, in every transaction, in every call of a colleague to share an opinion or critique an idea, in every training session, in every practice team meeting, and in every work-related break-room conversation, lawyers have been building and sharing knowledge for centuries. Yet KM has not always been a success in law firms, and KM has become a challenge to firms that had half a dozen employees, while they now have hundreds and even thousands of employees.

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