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Chapter 7

A KM-Enabled Architecture for Collaborative Systems

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Driven by the collaborative technology, COllaborative SYstems (COSY) facilitate information management in the organizations. In face of the dynamic and information-overloaded age, knowledge management (KM) has been recognized as an effective solution in the past few years. Thus, merging the force of COSY and KM will be very promising in increasing the competitive advantages of the organizations.
This paper proposes a KM-enabled architecture for COSY. Some research issues related with KM in the new architecture are discussed. It is shown from applying the architecture to a virtual global business company that the architecture could support and integrate COSY and KM effectively.

INTRODUCTION

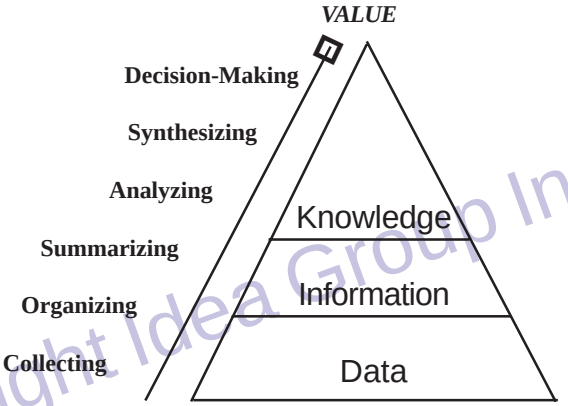
With the commercialization of the collaborative systems and the popularity of Internet, COllaborative SYstems (COSY) facilitate information management in the organizations. In essence, COSY provide an environment for information collection, exchanging, and sharing, etc. They break the physical barrier of "distance" or even "time" concerning asynchronous systems and create a virtual collaborative environment. However, pure collaboration can't tackle the problem of information overload. Concerning the overwhelming information repositories remain untapped, knowledge management (KM) has been recognized as an effective solution to make sense out of the collected information. How to merge the force of COSY and KM is an emerging issue to explore. It is essential to create, organize and discover knowledge and allow it to thrive and grow across the entire

enterprise or organization. In this paper, we are going to design a KM-enabled architecture for COSY.

KNOWLEDGE MANAGEMENT AND COLLABORATIVE SYSTEMS

Knowledge and Knowledge Management (KM)

Figure 1: Knowledge & Knowledge Management (IME, 1998)



The relation between knowledge and KM has been illustrated in Figure 1. From large amount of data to concise knowledge, its value is gradually added along the KM process on the upper-left arrow. Up to date, KM has been approached from different perspectives in the discipline of business management:

- Activity view: KM consists of activities focused on gaining knowledge from its own experience and from the experience of others by an organization, and on the judicious application of that knowledge to fulfill the mission of the organization (Wenig, 1996).
- Asset view: KM is an audit of "intellectual assets" that highlights unique sources, critical functions and potential bottlenecks that hinder knowledge flows to the point of use (Grey, 1996).
- Process view: KM is a systematic process for acquiring, creating, synthesizing, sharing and using information, insights and experiences to achieve organizational goals (Andersen Consulting, 1996).

Apparently, one of the primary goals of these views is to make knowledge accessible and reusable to the enterprise.

COSY

Faced with the dispersion of expert knowledge as well as the increasing turnover rate of qualified personnel, many organizations are turning to COSY to foster