

# Chapter 15

## Frameworks for the Benchmarking of Digital and Knowledge Management Best Practice in SME and Organizations

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### ABSTRACT

*The paper discusses the impact of IT/ICT on society by analyzing the effects it has on subjects and organizations. The recent proposal of frameworks for digital competence assessment and the construction of suitable instruments helping students in the acquisition of this competence are the main reason for the transfer to Small and Medium Enterprises (SMEs). In this paper, the author compares knowledge phenomena in subjects with the strategies of knowledge management in the organizations. A framework for benchmarking best practices in SME and organizations is also given on the basis of the results obtained in virtual campuses. The author presents instruments for the acquisition of further information from all stakeholders, and possible interventions toward the improvement of digital processes in SMEs and organizations are discussed.*

### INTRODUCTION

It is well known that the spreading of computing, computer networks and especially the Internet have produced a revolution in our way of living during the last forty years; they have also deeply transformed our intrapersonal and interpersonal

relations and have highly influenced the structure and management of processes in corporate and organizations.

As regards mankind it is today evident the need for a new literacy, named digital literacy, letting people be the citizens of the knowledge society. Its most accepted definition is as follows: "Digital Literacy is the awareness, attitude and ability of individuals to appropriately use digital

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tools and facilities to identify, access, manage, integrate, evaluate, analyse and synthesize digital resources, construct new knowledge, create media expressions, and communicate with others, in the context of specific life situations, in order to enable constructive social action; and to reflect upon this process” (Martin, 2005).

In the meanwhile the attention of research and institutions has focused on how people use digital resources and processes, more than on what they must know and be able to do with technologies. This new approach to the analysis of the impact of new technologies on mankind led to concentrate on the concept of competence and on the active involvement of the subjects in their interaction with digital equipments, without forgetting their representations of reality, their knowledge and skills (Le Boterf, 1990).

On this side the European Commission issued in 2005 the Recommendation on key competences for lifelong learning and stated the features of the digital competence, the fourth among them (Commission of the European Parliament, 2005). For the European Commission the digital competence is based on the confident and critical use of Information Society Technology (IST) for work, leisure and communication and is underpinned by basic skills in ICT: that is the use of computers to retrieve, assess, store, produce, present and exchange information, and to communicate and participate in collaborative networks via the Internet.

The above issues led to the definition of suitable strategies to help students develop sound digital competence. Among them the proposal of a framework for digital competence assessment must be remarked (Cartelli et al., 2010); although all the features of the framework reported in Figure 1 still need to be defined in its details, the results obtained until now from the answers to the questionnaire built under the guidelines of the framework confirm the hypothesized model.

Evolutionary phenomena for the description of the impact of digital equipments on human

beings and activities can be easily detected also in corporate and organizations; it is well known in fact that computers, networks and the Internet deeply modified production and organization processes.

On the above bases, starting from the ‘90s, the main ideas of knowledge management were given (Wiig, 1993) and they aimed at storing, describing, retrieving and communicating data and information. In this first phase, called first generation knowledge management, the information technology was the key factor for the success of a firm, due to its ability in the capture, management and communication of organizational knowledge.

The second phase of knowledge management has focused on the sharing, within the organization, of the professional knowledge that each subject builds up, and on the construction of communities (i.e., especially to communities of practices). They are considered the key factor for organizational growth and corporate/organization success.

The main problem with the planning and use of knowledge management strategies is the relevant amount of funds and resources which limit their presence and use to big industries and organizations.

It is well known, on the contrary, that most part of work force and human capital can be found in small and medium corporate and organizations (i.e., Small and Medium Enterprises, with a number of employees between 25 and 500 persons, as reported in the *Recommendation 2003/361/EC: SME Definition*).

As a consequence the following questions ask for an answer:

Is it possible to define strategies to be shared among SME to let them access the knowledge management resources needed in the global market and in today society?

Is there any connection between the problem of digital competence assessment in students, and more generally in individuals, and the SME and organizations “competence” in the

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