Chapter 2.22
Model of a Knowledge Management Support System for Choosing Intellectual Capital Assessment Methods

Agnieta B. Pretorius
Tshwane University of Technology, South Africa

F.P. (Petrie) Coetzee
Tshwane University of Technology, South Africa

ABSTRACT

Existing literature propagates a variety of methods for assessment of intellectual capital (IC). This research argues that, due to complexities involved in selecting and customizing an appropriate method or combination of methods for assessing intellectual capital, mechanisms are needed for managing and applying the evolving body of knowledge concerning such assessment. The assumption of complexity is supported by the results obtained from a survey (employing a self-administered questionnaire as instrument for data collection). This research proceeds to develop a model, referred to as a conceptual design, for a system to (i) provide management support to the process of selecting and customizing an appropriate method (or combination of methods) for assessment of intellectual capital, (ii) utilize past knowledge and expertise to accelerate and improve decision-making, (iii) promote synergism through integration of methods, and (iv) manage the evolving body of knowledge concerning the assessment of IC.

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INTRODUCTION

The shift from the industrial to the knowledge economy has impacted significantly on the way business operates and on the relative value of its value components (Green, 2005; Lev, Cañibano & Marr 2005). Intellectual capital (IC) – also referred to as intangible assets, knowledge assets,

core competencies or goodwill – is increasingly acknowledged as a dominant strategic asset, and a major source of competitive advantage for organizations (Harrison & Sullivan, 2000; Holsapple, 2003; Housel & Bell, 2001; Kalafut & Low, 2001; Kannan & Aulbur, 2004; Koulopoulos & Frappaolo, 1999; Mouritson, Bukh & Marr, 2004; Park, 2005; Sánchez, Chaminade & Olea, 2000; Teece, 2003).

Despite a rich and evolving body of literature on methods, model systems and frameworks for assessment of IC (Andriessen, 2004b; Bontis, 2001; Chen, Zhu & Xie, 2004; Green, 2005; Smith & McKeen, 2003) and an increased awareness of the need for such assessment, relatively few organizations are actively and comprehensively assessing their IC (Bontis, 2001; Green, 2005; Marr, 2006; Smith & McKeen, 2003). IC has surfaced as a major value contributor (Hope & Frazer, 1997) – estimated to account for up to 70% of the value of organizations (Sullivan, as cited in Green, 2005) – but still is not adequately reflected in current accounting practices (Green, 2005; Lev, Cañibano & Marr, 2005; Mouritson, Bukh & Marr, 2004).

This research argues that, due to the complexities involved in choosing (selecting and customizing) an appropriate method or combination of methods for assessment of IC, and the cognitive limits of human problem solving, there is a need for knowledge management support systems (KMSS) – management support systems (MSS) with knowledge components – to manage (organize, store and retrieve) the evolving knowledge concerning such assessment (see also Pretorius & Coetzee, 2005).

Note that the sensibility and usefulness of a KMSS for choosing IC assessment methods is dependent on judgment concerning the complexity of the process of choosing IC assessment methods. In this research, the assumption is made that the complexity of the decisions to be made in choosing an appropriate method (or combination of methods) for assessment of IC (given any particular context) warrants the development of a KMSS, as defined earlier. This assumption needs to be explored and tested as part of this research.

It is argued that:

- It is not necessary to obtain an absolute and all-inclusive answer to the question of *whether the complexities involved in choosing IC assessment methods warrant a KMSS* to justify that the development of such a system makes sense.
- For such a system to be potentially useful, it needs to be useful to some relevant decision makers (individuals making decisions related to the choosing of IC assessment methods) and not necessarily to all relevant decision makers.

Subsequently it is proposed that, if in the context of this research, a substantial portion of a *suitable group of individuals knowledgeable on IC or aspects thereof* perceive the decisions involved in choosing IC assessment methods as at least moderately complex (moderately or very complex) it is *likely* that:

- There is a need for such a system; and
- It makes sense to develop such a system – at least in a scientific sense – but even also in a business sense.

Accordingly, the fundamental question addressed in this research is phrased as:

If a suitable group of individuals perceive the decisions involved in choosing IC assessment methods as complex, what should the conceptual design be of a KMSS for choosing IC assessment methods?

In dealing with the research question, the following five subsidiary research questions are attended to:

- SRQ1: What methods are available for assessment of IC, how can they be classified