Chapter 16

Managing Knowledge for Strategic Advantage in the Virtual Organisation

Janice M. Burn and Colin Ash
Edith Cowan University, Australia

This chapter looks at the virtual organisation and suggests that the basic concepts of virtual management are so poorly understood that there are likely to be very few such organisations gaining strategic advantage from their virtuality. The authors begin by providing some clear definitions of virtual organisations and different models of virtuality which can exist within the electronic market. Degrees of virtuality can be seriously constrained by the extent to which organisations have preexisting linkages in the marketplace and the extent to which these can be substituted by virtual ones, but also by the intensity of virtual linkages which support the virtual model. Six virtual models are proposed within a dynamic framework of change. In order to realise strategic advantage, virtual organisations must align their virtual culture with the virtual model for structural alignment. This paper further proposes a model for virtual organisational change which identifies the factors internal to the virtual organisation that need to be managed. Critical to this is the role of knowledge management. The authors develop this concept within a framework of virtual organising and relate this to organisations using ERP in an Internet environment. Specific examples will be used relating such developments to organisations employing SAP and illustrating strategic advantage.

Previously Published in Knowledge Management and Virtual Organizations edited by Yogesh Malhotra, Copyright © 2000, Idea Group Publishing.
This chapter appears in the book, Intelligent Support Systems: Knowledge Management by Vijayan Sugumaran.
Copyright © 2002, IRM Press, an imprint of Idea Group Inc.
Virtual organisations are very much in vogue but there is very little empirical research to show how “virtuality” can provide a strategic advantage to organisations. There is even less guidance provided with respect to the management of change in organisations that embrace some degree of virtuality by leveraging their competencies through effective use of information and communication technologies (ICT). It could be argued that there is a degree of virtuality in all organisations but at what point does this present a conflict between control and adaptability? Is there a continuum along which organisations can position themselves in the electronic marketplace according to their needs for flexibility and fast responsiveness as opposed to stability and sustained momentum? To what extent should the organisation manage knowledge both within and without the organisation to realise a virtual work environment?

While there may be general agreement with regard to the advantages of flexibility, the extent to which virtuality offers flexibility and the advantages which this will bring to a corporation have yet to be measured. There is an assumption that an organisation that invests in as little infrastructure as possible will be more responsive to a changing marketplace and more likely to attain global competitive advantage, but this ignores the very real power which large integrated organisations can bring to the market in terms of sustained innovation over the longer term (Chesbrough and Teece, 1996). Proponents of the virtual organisation also tend to underestimate the force of virtual links. Bonds which bind a virtual organisation together may strongly inhibit flexibility and change rather than nurture the concept of the opportunistic virtual organisation (Goldman, Nagel and Preiss, 1995). Aldridge (1998), suggests that it is no accident that the pioneers of electronic commerce fall into three categories:

- Start-ups, organisations with no existing investment or legacy systems to protect;
- Technology companies with a vested interest in building the channel to market products and services;
- Media companies, attracted by low set-up costs and immediate distribution of news and information.

When is a virtual organisation really virtual? One definition would suggest that organisations are virtual when producing work deliverables across different locations, at differing work cycles, and across cultures (Gray and Igbaria, 1996; Palmer and Speier, 1998). Another suggests that the single
Particle Swarm Optimization Algorithm as a Tool for Profiling from Predictive Data Mining Models
www.igi-global.com/chapter/particle-swarm-optimization-algorithm-as-a-tool-for-profiling-from-predictive-data-mining-models/131258?camid=4v1a