

Knowledge management routines as a source of organisational inertia: the case of Japanese corporate restructuring

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Abstract

Some part of a firm's competitive advantage stems from the efficiency and effectiveness with which its management routines, communication and co-ordination mechanisms support the development, deployment and leveraging of knowledge to exploit opportunities as they arise.

The literature focusing on 'integrative capabilities' looks at *how* and *how well* firms combine specialist knowledge that is necessarily fragmented and distributed around and beyond the firm for particular business processes. Previous studies by this author have focused on integrative capabilities for managing innovation, including product and process development and routines used to strategically 'value' and direct knowledge flows between central R&D units and near-market business units in a range of large manufacturing firms.¹

Along with Teece's (1998) dynamic capabilities approach 'knowledge assets' are seen to encompass not just 'stocks' and 'flows' of knowledge which make the firm distinctive and underpin competitive advantage, but also the routines for handling knowledge which underpin sustained organisational differences.

This paper builds on the above studies to propose that integrative capabilities are dependent on specific organisational routines that can be a significant source of inertia in firms as they attempt to restructure and adapt to changing competitive environments. The original concept of routines established by Nelson and Winter (1982; Winter, 1987), viewing routines both as a source of competitive advantage and a central source of 'path-dependency' within a Schumpeterian or evolutionary perspective is adopted and developed.²

This theoretical basis is used to reflect on the current restructuring taking place in Japanese firms, further developing detailed case studies collected in the abovementioned project. It is acknowledged that strong social networks and mechanisms for 'trading social capital', internally and externally, underpin the ways in which tacit knowledge is shared in and between Japanese firms. This in turn contributes to Japanese firms' strengths in managing certain kinds of innovation. As these firms restructure in response to changes in their competitive environment one of the most important sources of inertia lies in the 'embeddedness' of the (social) networks and practices that they use to manage knowledge (drawing on Lam, 1997). Existing connections, with preferred suppliers and customers within *keiretsu* structures, and close relationships with R&D partners, for example retard these firms' strategic flexibility. Internal network connections and knowledge-sharing routines between specialist departments, such as central R&D, business units and manufacturing plants have also evolved on the basis of social networks, created for example through job-rotation practices. Again, while these contribute to advantageous innovation management practices at one level, they also create inertia in the face of pressures to restructure.

To a certain extent the findings challenge Nonaka's well-known account of the comparative strengths of Japanese firms in knowledge management (Kusunoki et al., 1998; Nonaka and Takeuchi, 1995). The British firms involved in this comparative study, including ICI, British Steel, BT and BAE, have far more experience of radical organisational restructuring and it is argued that they have evolved a responsiveness that has enhanced their competitive advantage in dynamic competitive environments. The 'malleability' of knowledge management routines, it is argued, supports this level of responsiveness.

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¹ The original research was funded under the UK ESRC (Economic and Social Research Council) Innovation Programme. The project, 'The Innovative Management of Innovation in UK Companies' (Fransman, Collinson and Williams; 1995-1998), compared leading Japanese and British firms in the telecoms, chemicals, steel and aerospace industries. The study mapped and compared the routines, management roles and systems for coordinating knowledge for managing R&D and both product and process innovation (see the bibliography attached). The research has since been updated with further analysis of ongoing changes in the participating companies.

² The paper draws on the long history of analysis in this field, from Alfred Marshall, Frederick Hayek, Edith Penrose, Cyert and March, Polanyi and Arrow, whose work on learning and the valuation and utilisation of knowledge complements more recent knowledge management studies. Alongside these the evolutionary approach typified by Metcalfe's and Coombs' studies on innovation provide a strong foundation for understanding sources of organisational inertia (and what Leonard-Barton terms 'core rigidities'). There are also parallels with 'belief lock-in' in the strategy literature and the idea of 'competence traps'.