



▶ by **Joseph W. Harder**, Adjunct Associate, Professor of Business Administration, Darden School of Business, University of Virginia



▶ by **Peter J. Robertson**, Associate Professor, School of Policy, Planning and Development, University of Southern California, Los Angeles, CA

Environmental forces in the early part of the 21st century have pressured organisations to de-bureaucratise, primarily so that they can become more flexible, adaptive, and innovative in the fast-paced, hyper-competitive world of the new global economy (D’Aveni, 1994; Mohrman & Cummings, 1989; Peters, 1987). It is our contention that the environmental conditions confronting global society at the beginning of the 21st century are generating a need for significant adaptation in the basic form of the organisation “species.”

The premise that organisations change in response to environmental conditions is well-established in organisation theory. Resource dependence theorists (Pfeffer & Salancik, 1978; Aldrich, 1979) point out that managerial actions are shaped by organisational dependencies on environmental actors for strategic resources. Institutional theorists (DiMaggio and Powell, 1983; Meyer & Rowan, 1977; Scott, 2001) explain how organisations strive to maintain their legitimacy by adopting structures and practices compatible with the demands and expectations of the institutional environment. And evolutionary theorists (Baum & Singh, 1994; Hannan & Freeman, 1989) focus on how populations of organisations undergo changes in form as a result of shifts in their environments, adapting in ways that provide a better fit with new environmental conditions. From this perspective, we view the change processes that have been occurring over the last fifty years – planned and unplanned – as conducive to, and laying the groundwork for, the emergence of a new organisational form.

We argue that a new “living system” form of organisation will need to supplant

the “machine” model reflected in the traditional bureaucratic form (Weber, 1946) and its myriad manifestations in order for organisations to thrive in the post-modern, post-industrial era. While organisational researchers long ago identified the distinction between mechanistic and organic forms of organisation (Burns & Stalker, 1961; Lawrence & Lorsch, 1967), organic organisations to date have by and large maintained the basic structure of a bureaucratic hierarchy. More recently,

The notion of an organisation as a living being can serve to guide proactive efforts to change, develop, and improve organisations

however, Morgan (1997) made a distinction between viewing organisations as machines and as living systems, Tracy (1989) outlined the characteristics of a living organisation, de Geus (1997) discussed the idea of a living company, Miles, Snow, Mathews, Miles, & Coleman, (1997) developed the notion of a cellular organisation, and Hansen (1995) addressed the wisdom of ecological thinking in business. Recognition of the power and value of a living systems perspective appears to be growing, including in the popular business press (e.g., Petzinger, 1999; Muoio, 2000; Webber, 2001). We believe that it is a very timely and useful perspective with which

to understand the nature and character of organisational systems. Furthermore, we believe that the notion of an organisation as a living being can serve to guide proactive efforts to change, develop, and improve organisations as they continue to evolve towards a more complex future (cf. Cook, 2000).

The Nature of Living Systems

Petzinger (1999) points out that there is a paradigm shift happening in the business world, consistent with a body of research findings referred to as the “new science” (Marion, 1999; Wheatley, 2001). Beginning with findings in quantum physics that undermined the mechanical assumptions of classical physics, and augmented by subsequent work in fields such as chemistry, biology, systems dynamics, ecology, environmental sciences, and chaos theory, the area of complexity science emerged to investigate the essential qualities of complex adaptive systems. New science descriptions of core characteristics shared by all living systems (cf. Capra, 1996) provide intriguing insights regarding how organisations—conceived as living beings – might function more effectively in the new global, information economy.

Interconnected

First, living systems are interconnected, which means that the defining qualities of a given system are the relationships among the various parts of the system. The reductionistic tendency of traditional science, grounded in a mechanistic model of the universe, has been to study a system’s parts in order to understand more fully the essence of the system as a whole. This mechanistic