Introduction

In addition to the rising importance of knowledge work (Nonaka, 1994), one of the most profound ongoing changes in organizations is the flattening of hierarchical bureaucratic structures in favour of teams and team-based arrangements (Child & Rodrigues, 2003; Peltokorpi, 2012). Unlike stable, rigid bureaucracies, flexible project-based organizations are ideal for consumer-focused knowledge creation and to manage cross-functional experience, product complexity, and technological uncertainty (Hobday, 2000). Despite the benefits, scholars have also identified problems with project-based organizations in terms of locating and sharing knowledge across projects and organization-wide learning because of loose connections among project teams and challenges in creating a balance between short-term project objectives and the long-term organizational learning (Prencipe & Tell, 2001).

To efficiently manage organizational knowledge processes (including the creation, retention, and sharing of knowledge), the knowledge governance literature maintains that project-based structures need to be aligned with appropriate governance mechanisms (Grandori, 1997, 2001; Foss, 2007, 2009; Foss, Husted, & Michailova, 2010). While providing important insights of why and how governance mechanisms motivate individual employees to contribute to knowledge processes, knowledge governance scholars often build their arguments on the behavioral assumptions of organizational economics (OE) (Williamson, 1985), especially to bounded rationality and opportunism, and focus only on ‘hard’ governance dimensions, such as compensation systems. Yet, knowledge processes are also dependent on individual voluntary contributions (Frost, Österloh & Weibel, 2010). Adopting the view of benevolent and intrinsically motivated individuals, the knowledge management literature emphasizes the importance of ‘soft’ trust, community-based aspects in organizational knowledge processes (Kogut & Zander, 1992; Nonaka, 1994; Peltokorpi, Nonaka, & Kodama, 2007; Spender,
Because both of these perspectives are equally important, I argue in this chapter that a more balanced account of knowledge processes in project-based organizations can be created by integrating the ‘hard’ dimensions of the knowledge governance literature with the ‘soft’ dimensions in the knowledge management (KM) literature.

The rest of this chapter is structured as follows. In the next section, I discuss basic features of project-based organizations and draw on the KM and knowledge governance literatures for an illustrative set of governance mechanisms that support knowledge processes in knowledge-intensive, project-based organizations. By the KM literature, I refer to publications describing organizations as knowledge creating communities (see Nonaka & Peltokorpi, 2006, for a review). Such descriptions are apparent especially in the knowledge-based views of the firm (e.g., Kogut & Zander, 1992). I then describe the method and the functioning of knowledge governance through a case study at a Japanese project-based organization, Mayekawa Manufacturing Ltd. I finish this chapter by discussing the contributions and limitations of the case study.

Project-based organizations

Project-based organizations (PBOs) consist of a variety of organizational forms that involve the creation of temporary systems for the performance of project tasks (Sydow, Lindqvist, & DeFillippi, 2004). Within a pure PBO, projects embody most, if not all, of the business functions normally carried out in departments of functional and matrix organizations. In PBOs, a project is also the primary mechanism for creating, responding to, and executing new business opportunities (Hobday, 2000). Projects include individuals working cooperatively together toward a common goal, within an established time frame and budget, to produce identifiable deliverables (Henrie & Sousa-Poza, 2005). Projects are often narrow, involving a specific, well-defined product and one or a few customers. Customers are often closely and directly engaged in projects because projects are critical to their business functioning, performance and profitability. Unlike the matrix structure, project networks can stretch beyond the boundaries of the firm, but do not dissolve fully into the market (Sydow et al., 2004). Instead, projects can take volatile positions in between, so that they allow for both short-term flexibility and long-term stability in allocating and coordinating human resources. The heavy reliance on projects suggests that a high degree of authority and responsibility is given to project teams in PBOs.

PBOs have distinctive advantages. For example, structural flexibility facilitates the timely, accurate allocation of physical and human resources to projects. Project-based structures further circumvent traditional barriers to organizational change and facilitate design optimization by enabling design cycles to be carried out effectively and efficiently by reducing the number