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Please cite this paper as: T. Laine, T. Korhonen and P. Suomala, The dynamics of repairing multi-project control practice: a project governance viewpoint, International Journal of Project Management, <https://doi.org/10.1016/j.ijproman.2020.06.010>

## **The dynamics of repairing management control practice for multi-project new product development**

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### **Purpose**

It is critical that management is purposeful for each project in their operational context with interdependencies and synergies between projects (Verma & Sinha, 2002; Aubry et al. 2007; Meskendahl, 2010; Martinsuo, 2013; Teller et al., 2012; Unger et al., 2014; Martinsuo and Hoverfält, 2018). However, currently, there is too little knowledge on practices and the role actors in multi-project management (Clegg et al., 2018; Vuorinen and Martinsuo, 2018), to control such interdependencies and synergies. Especially, research is called for to understand how discursive practices among actors influence multi-project management (Clegg et al., 2018).

Drawing from this background, this paper uniquely uses the concepts of *enabling formalization* and *enabling control* (Adler and Borys, 1996; Ahrens and Chapman, 2004), to understand multi-project management practices as interplay between different-level actors within organizations. While existing research shows that, in the multi-project management context, managers aim to reduce uncertainties and ambiguities by basing their decisions on facts, constructed and elaborated upon among actors (Laine et al., 2016a; 2016b), particularly, this paper provides new insights on repairing management control practice in the multi-project new product development (NPD) context. Thereby, the paper provides new understanding on “micro-level issues dealing with multi-project management in a dynamic context” (the Special Issue call’s text). Moreover, and perhaps more importantly, the paper unveils the interlinkages between those micro-level issues and the broader multi-project management control that enables strategy enactment.

### **Theoretical background**

Theoretically, the paper draws from enabling control literature to further knowledge on multi-project management. Recent studies on control for NPD have emphasized more active, dynamic and supportive role of NPD control (e.g., Jørgensen and Messner, 2010; Moll, 2015; Curtis and Sweeney, 2017). For example, better quality and lower costs can be simultaneously required from an NPD project which creates tension and requires thorough understanding of purposeful multi-project control mechanisms (Davila and Wouters, 2007; Laine et al., 2016a). At the micro-level, individual actors and actor groups need to deal with those tensions, when performing tasks within multi-project NPD.

However, current knowledge has largely disregarded the role of actors (such as of those involved in project management) serving as interpreters or even mediators in the process of making a centralized control system work at different levels (Barrett et al., 2005; Cruz et al., 2011). For example, actors at different levels can provide project impact estimates and set boundaries (Van der Meer-Kooistra & Scapens, 2015). Particularly in the NPD context, recent research has pinpointed project managers’ key role of being mediators of control and directed

research toward focusing on these managers' perceptions of being in and under control (Tervala et al., 2017).

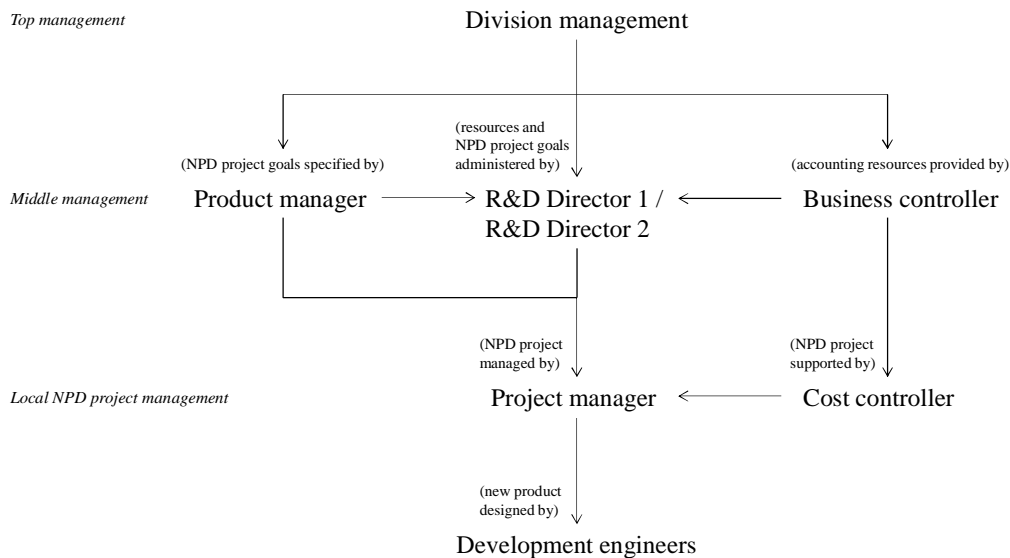
In all, the paper examines the enabling management control practice that would actually support the realization of the objectives set for multi-project NPD, and in particular, support the different managerial actors involved (Wouters and Roijmans, 2011). Academic research does not adequately cover the dynamics and interplay between different managerial levels in creating a well-functioning management control system for multi-project NPD, featuring the possibility of repairing dysfunctional control practices (Ahrens and Chapman, 2004; Chapman and Kihn, 2009; Englund and Gerdin, 2015). Consequently, our research question is: *why and how can actors repair multi-project management control system practices in NPD?*

### Methodology

We will answer our research question based on an in-depth, longitudinal case study of a large, multinational machinery manufacturing company. This case study began with identifying the shortcomings of previous project management control practices (2009-). After that, new forms of control practices were developed as a response to those needs (2010–2011). Finally, the repair of control practices at different levels, including the centralized management control system was witnessed, to understand multi-project management (2012–2014). Empirical data were collected from up to 130 documented project meetings, workshops, and other interactions, and were qualitatively analyzed to identify critical steps in multi-project control practice repair.

### Findings

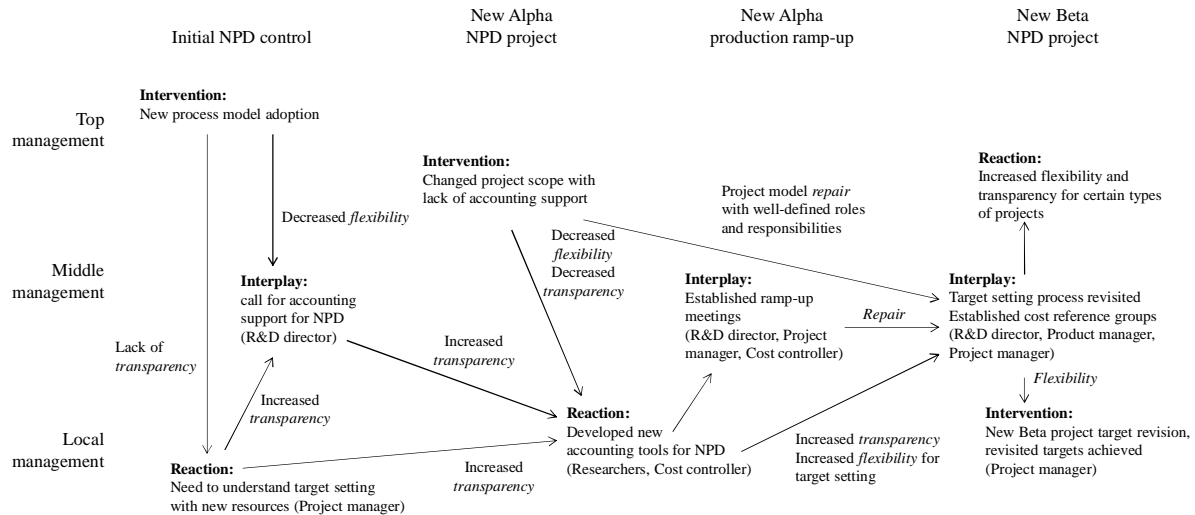
In the case study, the local accounting development led to a broad repair of the centralized NPD control system. The paper uniquely reports a longitudinal accounting/control system repair towards more enabling control, as multi-level interplay within the case organization (see Figure 1).



**Figure 1.** A schematic organizational chart of NPD personnel in the company.

By employing the notion of interplay, we seek to identify and examine the joint and individual actions taken by top management, middle management and local management to overcome the challenges faced in the control system enactment, which led into repairing the project control system in our case study. In such a process, the middle managers may not only initiate/facilitate

the local project control development, but also communicate the implications of such development to the top management level, repairing multi-project management as well. Local project management and middle management thus play a crucial role in fostering the interplay required for a repair, and consequently for a changed enactment multi-project control for NPD (see Figure 2).



**Figure 2.** Interplay between the centralized control system and local accounting development.

## Contribution

First, we contribute to the literature on multi-project management (e.g., Verma & Sinha, 2002; Martinsuo, 2013; Teller et al., 2012; Unger et al., 2014; Clegg et al., 2018; Martinsuo and Hoverfält, 2018). In particular, we elaborate on how the repair effort, as multi-level interplay, shapes local project control between projects (Alpha and Beta) and permanently changes the understanding and use of global control systems in subsequent multi-project NPD activities (Verma & Sinha, 2002; Aubry et al. 2007; Meskendahl, 2010; Laine et al., 2016a; 2016b;). The paper identifies the mechanisms of the repair process, including the prerequisites, actors involved, process phases and consequences (Vuorinen and Martinsuo, 2018) of a joint repair effort. Different-level managers shape and direct the repair process via intervention and reaction, and thus influence the control system development (Laine et al., 2016b). Second, we contribute to the literature on enabling formalizations and enabling control in NPD (e.g., Jørgensen and Messner, 2009; Jordan and Messner, 2012; Englund and Gerdin, 2015) by showing how *repairing* a multi-project control system can lead to a positive perception about control within the NPD organization, resolving tensions inherent.

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