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Cognition and Different Modes of Capability Development

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Abstract

The purpose of this study is to examine cognitive micro-foundations of dynamic capabilities by confronting it with three modes: developing capability, replacing capability and evolving capability. The dynamic capability literature has acknowledged the cognitive and behavioral process underpinning capabilities but has not analyzed in depth how cognitive perspective influences the formation of capabilities. One gap in the literature targeted by this research was the need to analyze how incumbent firms engage in different phases of capability development while navigating cognitive challenges. To this end this paper reconstructs the case of emission control technology development and exploits how the cognitive perspective is linked to the different modes of capability. I use the extended case study method to examine whether and how cognitive perspective affects an established firm to alter its resources base with different modes on capability development.

COGNITIVE MICRO-FOUNDATIONS OF DEVELOPING CAPABILITIES: AUTOMOTIVE EMISSION CONTROL TECHNOLOGY DEVELOPMENT

ABSTRACT

The purpose of this study is to examine the cognitive micro-foundations of dynamic capabilities by considering three modes of developing capabilities: combining capabilities, replacing capabilities and evolving capabilities. While the literature on dynamic capability acknowledges the cognitive and behavioral process of developing capabilities, research on the cognitive perspective that influences the formation of capabilities is sparse. This paper attempts to fill this gap by analyzing how incumbent firms engage in different phases of capability development while navigating through cognitive challenges. The context of the theory development is automotive emission control technology. This study contributes to the dynamic capability literature by highlighting how the cognitive aspects affect the way in which capability development takes place in different modes.