Application for the Tutorial on the Economics of Digitization

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1 Academic Details

I am a third-year Ph.D. candidate in the Krannert School of Management at Purdue University. I have recently completed the Ph.D. qualifying exam in the Information Systems area. I have completed a minor in Strategic Management and I will complete a Masters in Economics by May 2020. The coursework in the Ph.D. program includes graduate courses in microeconomics, game theory, econometrics, and experimental economics. Before joining the Ph.D. program in 2017, I worked for Cummins Inc., a global diesel-engine company, for 5 years. I have completed Bachelors in Engineering in Mechanical Engineering in 2006 from Pune University and a full-time

MBA in 2012 from Purdue University. I have also worked as a senior software engineer at Infosys Limited for 4 years. I am currently an instructor for MGMT 382, an undergraduate-level course on Information Systems, at Purdue University. The course aims to explain the strategic value of technology to different industries. I plan to complete my Ph.D. program by May 2022.

2 Research Interest

My research interest is influenced by my profession experience. As a project leader in Cummins Inc, I led the digital platform implementation efforts for a 100-year-old manufacturing firm. My research interest lies at the intersection of digitization and strategic management. I am specifically interested in the strategic choices of industrial firms and interactions on digital platforms. I am currently working on 2 projects with the faculty from Information Systems and Strategic Management area at Purdue University.

2.1 Platform Interactions

My first project involves evaluation of the participants' behavior in the online marketplaces. We study the role played by anonymity in the online marketplaces and its effect on the willingness of the participants to modify their transaction surplus. We also study the interactive effect of level of awareness of the transacting parties and quality uncertainty on the transaction efficiency of the online platforms using laboratory experiments and analytical model. We see that the efficiency is higher for the intermediate

awareness level and the sellers compensate for the quality of the products being sold. The work has implications for the designers of the online marketplaces. The research paper is ready to be submitted to the journal by end of November 2019.

2.2 M&A of Digital Firms

Digital transformation involves using digital technologies to retool business models and processes to make them more efficient or effective. For large, legacy enterprises, digital transformation projects often provide a means to compete with nimbler, digital-only rivals Worldwide spending on the technologies and services that enable the digital transformation of business practices, products, and organizations was more than $1.1 trillion in 2018, an increase of 16.8 % over the $958 billion spent in 2017. While some of the companies are trying to transform the business models organically, others have decided to acquire the necessary technology and skills through mergers and acquisitions (MA) activity. In 2018, nearly one-third of companies logging MA activity described themselves as traditional companies acquiring digital companies or assets. In this research, we plan to study, empirically, the mergers and acquisitions activity related to the digital transformation of the businesses - digital merger and acquisition (DMA). Specifically, we will address 1. The factors affecting the likelihood of a technology startup being acquired by a traditional firm 2. Impact of the DMA on the innovation trajectory of the acquiring firm post-integration