

In profound reverence to

Swami Vivekananda

Essays on Digital Business Ecosystems

**SUBMITTED IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR
THE DOCTORAL PROGRAMME IN MANAGEMENT
INDIAN INSTITUTE OF MANAGEMENT INDORE**

BY

SAMRAT BAGCHI (2020FPM18)



THESIS ADVISORY COMMITTEE

PROFESSOR. KAMAL SHARMA [CHAIRPERSON]

PROFESSOR. PRASHANT SALWAN [MEMBER]

PROFESSOR. HARSHAL LOWALEKAR [MEMBER]

Acknowledgement

I would like to begin by expressing my deepest gratitude to my mentor, guide and Thesis Advisory Committee Chair, Prof. Kamal Sharma. This work would not have evolved to its current form without your active engagement and constant guidance. I am forever grateful for your time, patience, encouragement, advise, and for pushing me to think critically.

I take this opportunity to extend my sincere appreciation to Prof. Harshal Lowalekar and Prof. Prashant Salwan, respected members of my Thesis Advisory Committee, for their suggestions, encouragement and advise during my fellowship. I am grateful to the esteemed members of my Thesis Examination Committee, Prof. Prabin Panigrahi, Prof. Amit Karna and Prof. Safal Batra for their time, insights and constructive feedback, which has been invaluable in improving the essays. I also take this opportunity to express my heart felt appreciation for the institute, for providing me with all necessary infrastructure, a safe, engaging and wholesome environment during our stay at the campus. I sincerely acknowledge the contribution of my professors during the coursework, and the DPM office for facilitating all administrative procedures during the program. I am thankful to my program peers, fellow hostel mates, and scholars who have graduated before me, for their camaraderie and companionship during the program.

I am indebted to my family who sacrificed their needs to give priority to my wish of pursuing the doctoral studies. Ma (Smt. Chitra Bagchi), and Baba (Shree Satyakam Bagchi) who unconditionally supported and motivated me during this program. I am thankful to my parents-in-law (Smt. Sabita Banerjee and Late Shree Apurba Banerjee) for their trust in me. Finally, Arundhati, this would not have been possible without you giving me the courage to embark on this journey, and standing by me through out. Your unwavering belief in me, kept me moving forward.

Table of Contents

| | |
|--|----|
| Abstract | 6 |
| Chapter 1: Introduction | 8 |
| 1. Deconstructing Digital Business Ecosystems | 11 |
| 2. Characteristics of DBEs | 16 |
| 3. Challenges of Orchestrating DBEs | 18 |
| 4. Motivation | 20 |
| 5. Thesis Structure | 21 |
| Chapter 2: Strategic Orientations of Incumbent Firms and Digital Business Ecosystem Orchestration | 27 |
| 1. Introduction | 28 |
| 2. Relevant literature | 30 |
| 3. Methodology | 35 |
| 4. Findings | 41 |
| 5. Discussion | 54 |
| 6. Implications | 61 |
| 7. Conclusion | 62 |
| Chapter 3: Engagement Modes during Foreign Involvement through Digital Business Ecosystems | 64 |
| 1. Introduction | 64 |
| 2. Relevant Literature | 67 |
| 3. Methodology | 73 |
| 4. Case Discussion | 77 |
| 5. Analysis | 80 |
| 6. Proposed Framework | 86 |
| 7. Discussions | 90 |

| | |
|---|-----|
| 8. Implications and Limitations | 93 |
| 9. Conclusions | 95 |
| Chapter 4: Digital Business Ecosystems and Shared Value Creation | 96 |
| 1. Introduction | 96 |
| 2. Relevant Literature | 98 |
| 3. Methodology | 104 |
| 4. Case Overview | 110 |
| 5. Value Creation by the DBEs | 112 |
| 7. Discussions | 127 |
| 8. Implications | 129 |
| 9. Conclusion | 131 |
| Chapter 5: Discussions and Conclusions | 133 |
| 1. General Discussion | 133 |
| 2. Opportunities for the incumbent firms | 136 |
| 3. Key differences among the orchestrating firm | 138 |
| 4. Commonalities among the orchestrating firms | 141 |
| 5. Theoretical Contributions | 144 |
| 6. Limitations | 149 |
| 7. Future Research Direction | 149 |
| References | 152 |

Abstract

As organizations increasingly integrate digital technologies into their operations, the traditional boundaries that once defined industries and businesses are becoming blurred, leading to new organizational forms. Digital Business Ecosystems (DBEs) are such socio-technical meta-organizations that leverage the interconnectedness of digital technologies and the interdependencies among the ecosystem members to create a unique value proposition. However, literature on ecosystems mentions that DBE orchestration is fraught with difficulties and often leads to an uncertain future. Further, empirical studies on DBEs orchestrated by incumbent firms in the context of emerging economies are extremely limited.

Against this backdrop, the three essays of this thesis aim to provide an understanding of this novel phenomenon by exploring the *antecedents*, *mechanisms*, and *outcomes* of DBE orchestration through a qualitative analysis. The study gathers data from multiple sources, including semi-structured interviews with senior executives and professionals, primary information from the DBE orchestrating entities, responses received via email, field visits, company archives, online media, press releases, industry analyst reports, and YouTube videos.

The first essay of the thesis investigates the *antecedents*, in the form of strategic orientations (SO), that enable incumbent firms to orchestrate DBEs. The study finds multiple SOs combine to create an aggregate construct, *ecosystem orientation*, a higher-order organizational attribute that differentiates the incumbent firms in terms of their ability to orchestrate DBEs. Further, the study posits that DBE orchestration by ecosystem-oriented firms is positively influenced by environmental dynamism and institutional voids present in the emerging economies.

The second essay on the engagement *mechanism* explores how DBEs could serve as a novel entry mode to facilitate foreign involvement for incumbent multinational entities

(MNEs). Using a paired case design, the study shows that while local embeddedness is required for participation through DBEs, the value appropriation mechanism determines the engagement mode of participating entities. Further, the study presents a framework that categorizes four DBE engagement modes based on the interaction between an organization's degree of local embeddedness and value appropriation capabilities. This study extends current theories of foreign involvement by firms from an ecosystem perspective and provides actionable insights for incumbent MNEs.

The third essay of this thesis explores the creation of shared value as an *outcome* of DBE orchestration. For this essay, the study conducts a multiple-case study of DBEs centered on local clusters and *collectives* from the unorganized sectors. The study empirically illustrates that the presence of *collectives* in a DBE, a *hybrid business model* of the orchestrating firm, and the creation of an *integrated value chain* of the key stakeholders lead to a distinct identity of the ecosystem is associated with the creation of shared value, and is positively influenced by *institutional entrepreneurship* of the orchestrating firm.

By synthesizing insights from the three studies, the thesis attempts to construct a cohesive narrative that addresses critical research gaps and contributes towards an emergent theory of ecosystems through a contextual exploration. The study also has implications for practitioners and policymakers, illustrating the transformative potential of DBEs to foster inclusive growth, engage in boundary-spanning activities, and address socio-economic challenges in emerging economies.

References

- Adegbesan, J. A. (2009). On the origins of competitive advantage: Strategic factor markets and heterogeneous resource complementarity. *Academy of Management Review*, 34(3), 463–475.
- Adner, R. (2017). Ecosystem as structure: An actionable construct for strategy. *Journal of Management*, 43(1), 39–58.
- Adner, R., & Kapoor, R. (2010). Value creation in innovation ecosystems: How the structure of technological interdependence affects firm performance in new technology generations. *Strategic Management Journal*, 31(3), 306–333.
- Agyapong, A., Zamore, S., & Mensah, H. K. (2020). Strategy and performance: Does environmental dynamism matter? *Journal of African Business*, 21(3), 315-337.
- Ahmed, A., Bhatti, S. H., Gölgeci, I., & Arslan, A. (2022). Digital platform capability and organizational agility of emerging market manufacturing SMEs: The mediating role of intellectual capital and the moderating role of environmental dynamism. *Technological Forecasting and Social Change*, 177, 121513.
- Aksoy, C. (2023). Digital business ecosystems: An environment of collaboration, innovation, and value creation in the digital age. *Journal of Business and Trade*, 4(2), 156–180.
- Ambos, T. C., & Tatarinov, K. (2023). Fit for solving the grand challenges? From organization design choices to ecosystem solutions. *Journal of Organization Design*, 1-8.
- Ansari, S., Garud, R., & Kumaraswamy, A. (2016). The disruptor's dilemma: TiVo and the US television ecosystem. *Strategic Management Journal*, 37(9), 1829-1853.
- Asian Development Bank. (September, 2022). Asian Development Outlook: Entrepreneurship in the Digital Age. Available at www.adb.org/sites/default/files/publications/825166
- Astley, W. G. (1984). Toward an appreciation of collective strategy. *Academy of Management Review*, 9(3), 526–535.

- Atuahene-Gima, K., & Ko, A. (2001). An empirical investigation of the effect of market orientation and entrepreneurship orientation alignment on product innovation. *Organization Science*, 12(1), 54-74. doi: 10.1287/orsc.12.1.54.10121
- Autio, E., & Fu, K. (2022). *Digital Framework Conditions and the Productivity Potential of a Country's Entrepreneurial Dynamic: A Study of Selected ADB Member Economies*.
- Autio, E., Mudambi, R., & Yoo, Y. (2021). Digitalization and globalization in a turbulent world: Centrifugal and centripetal forces. *Global Strategy Journal*, 11(1), 3–16.
- Bachmann, N., Tripathi, S., Brunner, M., & Jodlbauer, H. (2022). The contribution of data-driven technologies in achieving the sustainable development goals. *Sustainability*, 14(5), 2497.
- Baker, W. E., & Sinkula, J. M. (2009). The complementary effects of market orientation and entrepreneurial orientation on profitability in small businesses. *Journal of Small Business Management*, 47(4), 443-464.
- Balodi, K. C. (2014). Strategic orientation and organizational forms: an integrative framework. *European Business Review*, 26(2), 188-203.
- Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17(1), 99–120.
- Barney, J. B., Ketchen Jr, D. J., & Wright, M. (2021). Resource-based theory and the value creation framework. *Journal of Management*, 47(7), 1936-1955.
- Baumann, S. (2022). Introduction to the handbook on digital business ecosystems: strategies, platforms, technologies, governance and societal challenges. In *Handbook on Digital Business Ecosystems* (pp. 1–9). Edward Elgar Publishing.
- Bergquist, A. K., & Eriksson, L. (2019). Sober business: Shared value creation between the insurance industry and the temperance movement. *Business History*, 61(2), 322-342.
- Berrone, P., Gelabert, L., Massa-Saluzzo, F., & Rousseau, H. E. (2016). Understanding community dynamics in the study of grand challenges: How nonprofits, institutional actors, and the community fabric interact to influence income inequality. *Academy of Management Journal*, 59(6), 1940-1964.

- Bharadwaj, A., El Sawy, O. A., Pavlou, P. A., & Venkatraman, N. V. (2013). Digital business strategy: toward a next generation of insights. *MIS Quarterly*, 471-482.
- Bhaumik, S. K., Driffield, N., & Zhou, Y. (2016). Country specific advantage, firm specific advantage and multinationality—Sources of competitive advantage in emerging markets: Evidence from the electronics industry in China. *International Business Review*, 25(1), 165–176.)
- Bhuiyan, S. N., Menguc, B., & Bell, S. J. (2005). Just entrepreneurial enough: the moderating effect of entrepreneurship on the relationship between market orientation and performance. *Journal of Business Research*, 58(1), 9-17.
- Blackburn, O., Ritala, P., & Keränen, J. (2023). Digital platforms for the circular economy: exploring meta-organizational orchestration mechanisms. *Organization & Environment*, 36(2), 253-281
- Bogers, M., Sims, J., & West, J. (2019). What is an ecosystem? Incorporating 25 years of ecosystem research. *Academy of Management Proceedings*, Vol. 2019, No. 1, Available at SSRN: <https://ssrn.com/abstract=3437014> or <http://dx.doi.org/10.2139/ssrn.3437014>
- Bowman, C., & Ambrosini, V. (2000). Value creation versus value capture: Towards a coherent definition of value in strategy. *British Journal of Management*, 11(1), 1–15.
- Bridoux, F., & Stoelhorst, J. W. (2022). Stakeholder governance: Solving the collective action problems in joint value creation. *Academy of Management Review*, 47(2), 214-236.
- Briscoe, G., Sadedin, S., & De Wilde, P. (2011). Digital ecosystems: Ecosystem-oriented architectures. *Natural Computing*, 10, 1143–1194.
- Brouthers, K. (2013). A retrospective on institutional, cultural, and transaction cost influences on entry mode choice and performance. *Journal of International Business Studies*, 44 (1): 14–22.

- Brouthers, K. D., & Hennart, J. F. (2007). Boundaries of the firm: Insights from international entry mode research. *Journal of Management*, 33(3), 395–425.
- Brouthers, K. D., Chen, L., Li, S., & Shaheer, N. (2022). Charting new courses to enter foreign markets: Conceptualization, theoretical framework, and research directions on non-traditional entry modes. *Journal of International Business Studies*, 53(9), 2088-2115.
- Bygstad, B., Iden, J., & Ulfsten, A. (2020). Digital business strategies for incumbent firms. How a Scandinavian hotel chain competes with the internet giants. *Scandinavian Journal of Information Systems*, 32(2), 3.
- Caputo, A., Pizzi, S., Pellegrini, M. M., & Dabić, M. (2021). Digitalization and business models: Where are we going? A science map of the field. *Journal of Business Research*, 123, 489-501.
- Carroll, A. B. (1999). Corporate social responsibility: Evolution of a definitional construct. *Business & Society*, 38(3), 268-295.
- Castell, C., Kiefer, J., Schubach, S., Schumann, J. H., Graf-Vlachy, L., & König, A. (2023). Integrating digital platform dynamics into customer orientation research: A systematic review and research agenda. *Journal of Business Research*, 163, 113911.
- Castro, G. D. R., Fernandez, M. C. G., & Colso, A. U. (2021). Unleashing the convergence amid digitalization and sustainability towards pursuing the Sustainable Development Goals (SDGs): A holistic review. *Journal of Cleaner Production*, 280, 122204.
- Cennamo, C., & Santaló, J. (2019). Generativity tension and value creation in platform ecosystems. *Organization Science*, 30(3), 617-641.
- Chadwick, C., Super, J. F., & Kwon, K. (2015). Resource orchestration in practice: CEO emphasis on SHRM, commitment-based HR systems, and firm performance. *Strategic Management Journal*, 36(3), 360–376.

- Chan, H. K., Yee, R. W., Dai, J., & Lim, M. K. (2016). The moderating effect of environmental dynamism on green product innovation and performance. *International Journal of Production Economics*, 181, 384–391.
- Chesbrough, H., Lettl, C., & Ritter, T. (2018). Value creation and value capture in open innovation. *Journal of Product Innovation Management*, 35(6), 930–938.
- Clarysse, B., Wright, M., Bruneel, J., & Mahajan, A. (2014). Creating value in ecosystems: Crossing the chasm between knowledge and business ecosystems. *Research Policy*, 43(7), 1164-1176.
- Cobben, D., Ooms, W., Roijackers, N., & Radziwon, A. (2022). Ecosystem types: A systematic review on boundaries and goals. *Journal of Business Research*, 142, 138-164.
- Corbin, J., & Strauss, A. (2015). *Basics of Qualitative Research* (Vol. 14). Sage.
- Coviello, N., Kano, L., & Liesch, P. W. (2017). Adapting the Uppsala model to a modern world: Macro-context and microfoundations. *Journal of International Business Studies*, 48, 1151-1164.
- Crane, A., Palazzo, G., Spence, L. J., & Matten, D. (2014). Contesting the value of “creating shared value”. *California Management Review*, 56(2), 130-153.
- Creswell, J. W., & Poth, C. N. (2016). *Qualitative inquiry and research design: Choosing among five approaches*. Sage publications
- Cumming, D., Johan, S., Khan, Z., & Meyer, M. (2023). E-commerce policy and international business. *Management International Review*, 63(1), 3–25.
- Dabbous, A., Barakat, K. A., & Kraus, S. (2023). The impact of digitalization on entrepreneurial activity and sustainable competitiveness: A panel data analysis. *Technology in Society*, 73, 102224.
- Dattée, B., Alexy, O., & Autio, E. (2018). Maneuvering in poor visibility: How firms play the ecosystem game when uncertainty is high. *Academy of Management Journal*, 61(2), 466-498

- Davies, I. A., & Chambers, L. (2018). Integrating hybridity and business model theory in sustainable entrepreneurship. *Journal of Cleaner Production*, pp. 177, 378–386.
- Davies, I. A., & Doherty, B. (2019). Balancing a hybrid business model: The search for equilibrium at Cafédirect. *Journal of Business Ethics*, pp. 157, 1043–1066.
- Daymond, J., Knight, E., Rumyantseva, M., & Maguire, S. (2023). Managing ecosystem emergence and evolution: Strategies for ecosystem architects. *Strategic Management Journal*, 44(4), O1-O27.
- Dess, G. G., & Beard, D. W. (1984). Dimensions of organizational task environments. *Administrative Science Quarterly*, 52–73.
- Dewan, S., & Riggins, F. J. (2005). The digital divide: Current and future research directions. *Journal of the Association for Information Systems*, 6(12), 298–337.
- DiMaggio, P. J. (1988). Interest and agency in institutional theory. *Institutional Patterns and Organizations: Culture and Environment*/Ballinger.
- Dunning, J.H. (1993). *Multinational Enterprises and The Global Economy*. Addison-Wesley, New York.
- Eisenhardt, K. M. (1989). Building theories from case study research. *Academy of Management Review*, 14(4), 532-550.
- Eisenhardt, K. M., & Graebner, M. E. (2007). Theory building from cases: Opportunities and challenges. *Academy of Management Journal*, 50(1), 25-32.
- Eisenhardt, K. M., Graebner, M. E., & Sonenshein, S. (2016). Grand challenges and inductive methods: Rigor without rigor mortis. *Academy of Management Journal*, 59(4), 1113-1123.
- Eldor, L. (2020). How collective engagement creates competitive advantage for organizations: A business-level model of shared vision, competitive intensity, and service performance. *Journal of Management Studies*, 57(2), 177–209.
- Figueiredo, P. N., & Brito, K. (2011). *The innovation performance of MNE subsidiaries and local embeddedness: evidence from an emerging economy*. In *Catching Up, Spillovers and*

Innovation Networks in a Schumpeterian Perspective (pp. 171-194). Berlin, Heidelberg: Springer Berlin Heidelberg.

Fombrun, C., & Astley, W., G. (1983). Beyond corporate strategy. *Journal of Business Strategy*, 3(4), 47-54.

Freeman, R. E., Harrison, J. S., & Zyglidopoulos, S. (2018). *Stakeholder theory: Concepts and strategies*. Cambridge University Press.

Futemma, C., Castro, F. D., Silva-Forsberg, M. C., & Ostrom, E. (2002). The emergence and outcomes of collective action: An institutional and ecosystem approach. *Society & Natural Resources*, 15(6), 503-522.

Ganco, M., Kapoor, R., & Lee, G. K. (2020). From rugged landscapes to rugged ecosystems: Structure of interdependencies and firms' innovative search. *Academy of Management Review*, 45(3), 646–674.

Gatignon, A. (2022). Scaling up collaboration for social impact: the governance and design of corporate-nonprofit partnerships. In: *Handbook on the business of sustainability*. Edward Elgar Publishing, Cheltenham UK, pp 501–515

Gatignon, H., & Xuereb, J. M. (1997). Strategic orientation of the firm and new product performance. *Journal of Marketing Research*, 34(1), 77-90.

Gawer, A. (2022). Digital platforms and ecosystems: remarks on the dominant organizational forms of the digital age. *Innovation*, 24(1), 110–124.

Gawer, A., & Bonina, C. (2024). Digital platforms and development: Risks to competition and their regulatory implications in developing countries. *Information and Organization*, 34(3), 100525.

Gawer, A., & Cusumano, M. A. (2002). *Platform leadership: How Intel, Microsoft, and Cisco drive industry innovation* (Vol. 5, pp. 29-30). Boston: Harvard Business School Press.

George, G., Howard-Grenville, J., Joshi, A., & Tihanyi, L. (2016). Understanding and tackling societal grand challenges through management research. *Academy of Management Journal*, 59(6), 1880-1895.

- George, G., Merrill, R. K., Schillebeeckx, S. J. D., (2021). Digital sustainability and entrepreneurship: how digital innovations are helping tackle climate change and sustainable development. *Entrepreneurship Theory and Practice*, 45(5):999–1027.
- Gillani, F., Chatha, K. A., Jajja, M. S. S., & Farooq, S. (2020). Implementation of digital manufacturing technologies: Antecedents and consequences. *International Journal of Production Economics*, 229, 107748.
- Gregori, P., & Holzmann, P. (2020). Digital sustainable entrepreneurship: A business model perspective on embedding digital technologies for social and environmental value creation. *Journal of Cleaner Production*, 272, 122817.
- Grinstein, A. (2008). The relationships between market orientation and alternative strategic orientations: A meta-analysis. *European Journal of Marketing*, 42(1/2), 115-134.
- Gueler, M. S., & Schneider, S. (2021). The resource-based view in business ecosystems: A perspective on the determinants of a valuable resource and capability. *Journal of Business Research*, 133, 158-169.
- Guest, G., Bunce, A., & Johnson, L. (2006). How many interviews are enough? An experiment with data saturation and variability. *Field Methods*, 18(1), 59-82.
- Ha, H., & Chuah, C. P. (2023). Digital economy in Southeast Asia: challenges, opportunities and future development. *Southeast Asia: A Multidisciplinary Journal*, 23. 19-35
- Haj Youssef, M., & Teng, D. (2021). Market entry strategies in the Middle East: unveiling the sponsorship strategy. *International Studies of Management & Organization*, 51(3), 253–275.
- Hakala, H. (2011). Strategic orientations in management literature: Three approaches to understanding the interaction between market, technology, entrepreneurial and learning orientations. *International Journal of Management Reviews*, 13(2), 199–217.
- Hannah, D. P., & Eisenhardt, K. M. (2018). How firms navigate cooperation and competition in nascent ecosystems. *Strategic Management Journal*, 39(12), 3163-3192.

- Hargrave, T. J., & Van de Ven, A. H. (2006). A collective action model of institutional innovation. *Academy of Management Review*, 31(4), 864-888.
- Hart, S. L. (1992). An integrative framework for strategy-making processes. *Academy of Management Review*, 17(2), 327–351.
- Hawley, A. H. (1986). *Human ecology: A theoretical essay*. University of Chicago Press.
- He, Z., & Sun, X. (2023). How do latecomer firms achieve disruptive innovation? A business ecosystem perspective. *International Studies of Management & Organization*, 53(3), 191-216.
- Helfat, C. E., & Raubitschek, R. S. (2018). Dynamic and integrative capabilities for profiting from innovation in digital platform-based ecosystems. *Research Policy*, 47(8), 1391-1399.
- Hennart, J. F. (2022). How much is new in Brouthers et al.'s new foreign entry modes, and do they challenge the transaction cost theory of entry mode choice? *Journal of International Business Studies*, 53(9), 2116-2132.
- Hennart, J. F., & Hl Slangen, A. (2015). Yes, we really do need more entry mode studies! A commentary on Shaver. *Journal of International Business Studies*, 46, 114-122.
- Hilbolling, S., Deken, F., Berends, H., & Tuertscher, P. (2022). Process-based temporal coordination in multiparty collaboration for societal challenges. *Strategic Organization*, 20(1), 135-163.
- Hoskisson, R. E., Eden, L., Lau, C. M., & Wright, M. (2000). Strategy in emerging economies. *Academy of Management Journal*, 43(3), 249–267.
- Hoskisson, R. E., Wright, M., Filatotchev, I., & Peng, M. W. (2013). Emerging multinationals from mid-range economies: The influence of institutions and factor markets. *Journal of Management Studies*, 50(7), 1295-1321.
- Hult, G. T. M., & Ketchen Jr, D. J. (2001). Does market orientation matter?: A test of the relationship between positional advantage and performance. *Strategic Management Journal*, 22(9), 899-906.

- Iansiti M, Levien R. (2004). *The Keystone Advantage: What the New Dynamics of Business Ecosystems Mean for Strategy, Innovation, and Sustainability*. Harvard Business School Press, Boston, MA.
- Ismail, M. H., Khater, M., & Zaki, M. (2017). Digital business transformation and strategy: What do we know so far? *Cambridge Service Alliance*, 10(1), 1–35.
- Jacobides, M. G., Cennamo, C., & Gawer, A. (2018). Towards a Theory of Ecosystems. *Strategic Management Journal*, 39(8), 2255–2276.
- Jacobides, M. G., Knudsen, T., & Augier, M. (2006). Benefiting from innovation: Value creation, value appropriation and the role of industry architectures. *Research Policy*, 35(8), 1200-1221.
- Järvi, K., Almpantopoulou, A., & Ritala, P. (2018). Organization of knowledge ecosystems: Prefigurative and partial forms. *Research Policy*, 47(8), 1523-1537.
- Johanson, J., & Vahlne, J.E. (2009). The Uppsala internationalization process model revisited: From liability of foreignness to liability of outsidership. *Journal of International Business Studies*, 40(9): 1411–1431
- Kane, G. C. (2015). Strategy, not technology, drives digital transformation. *MIT Sloan Management Review and Deloitte University Press*.
- Kang, J., Wang, T., & Ramizo, D. (2021). *The role of technology in business-to-consumer e-commerce: Evidence from Asia*. Asian Development Bank Economics Working Paper Series, (632).
- Kapoor, R. (2018). Ecosystems: broadening the locus of value creation. *Journal of Organization Design*, 7(1), 1–16.
- Kapoor, R., & Agarwal, S. (2017). Sustaining superior performance in business ecosystems: Evidence from application software developers in the iOS and Android smartphone ecosystems. *Organization Science*, 28(3), 531-551.

- Karnebogen, P., Oberländer, A. M., & Rövekamp, P. (2023). Unlocking digital value at the intersection of organizational digital transformation and digital business ecosystems. In *Digitalization and Sustainability* (pp. 77-104). Edward Elgar Publishing.
- Khademi, B. (2020). Ecosystem value creation and capture: A systematic review of literature and potential research opportunities. *Technology Innovation Management Review*, 10(1).
- Khan, L. M. (2016). Amazon's antitrust paradox. *Yale LJ*, 126, 710
- Khanna, T., & Palepu, K. (1999). Policy shocks, market intermediaries, and corporate strategy: The evolution of business groups in Chile and India. *Journal of Economics & Management Strategy*, 8(2), 271-310.
- Khanna, T., & Palepu, K. (2000). Is group affiliation profitable in emerging markets? An analysis of diversified Indian business groups. *The Journal of Finance*, 55(2), 867-891.
- Khizar, H. M. U., Iqbal, J., Khalid, J., & Hameed, Z. (2024). Unlocking the complementary effects of multiple strategic orientations on firm performance: an interplay of entrepreneurial, sustainability and market orientation. *Kybernetes*, 53(6), 1939-1957.
- Kindermann, B., Beutel, S., de Lomana, G. G., Strese, S., Bendig, D., & Brettel, M. (2021). Digital orientation: Conceptualization and operationalization of a new strategic orientation. *European Management Journal*, 39(5), 645-657.
- Kirca, A. H., Jayachandran, S., & Bearden, W. O. (2005). Market orientation: A meta-analytic review and assessment of its antecedents and impact on performance. *Journal of Marketing*, 69(2), 24-41.
- Kohli, A. K., & Jaworski, B. J. (1990). Market orientation: the construct, research propositions, and managerial implications. *Journal of Marketing*, 54(2), 1-18.
- Kopalle, P. K., Kumar, V., & Subramaniam, M. (2020). How legacy firms can embrace the digital ecosystem via digital customer orientation. *Journal of the Academy of Marketing Science*, 48, 114-131.

- Kramer, M. R., & Porter, M. (2011). *Creating Shared Value* (Vol. 17). Boston, MA, USA: FSG.
- Kraus, S., Vonmetz, K., Orlandi, L. B., Zardini, A., & Rossignoli, C. (2023). Digital entrepreneurship: The role of entrepreneurial orientation and digitalization for disruptive innovation. *Technological Forecasting and Social Change*, *193*, 122638.
- Kretschmer, T., Leiponen, A., Schilling, M., & Vasudeva, G. (2022). Platform ecosystems as meta-organizations: Implications for platform strategies. *Strategic Management Journal*, *43*(3), 405-424.
- Krome, M. J., & Pidun, U. (2023). Conceptualization of research themes and directions in business ecosystem strategies: a systematic literature review. *Management Review Quarterly*, *73*(2), 873-920.
- Kullak, F. S., Fehrer, J. A., Baker, J. J., Woratschek, H., & Sam-Cobbah, J. (2022). Shaping market systems for social change in emerging economies. *Industrial Marketing Management*, *100*, 19-35.
- Kurtz, H., Hanelt, A., & Kolbe, L. M. (2021). Exploring strategic orientations in the age of digital transformation: a longitudinal analysis of digital business model patterns. In *Innovation Through Information Systems: Volume III: A Collection of Latest Research on Management Issues* (pp. 183-199). Springer International Publishing.
- Kvale, S. (2009). *Interviews: Learning the Craft of Qualitative Research Interviewing*. Sage.
- Lanzolla, G., & Markides, C. (2021). A business model view of strategy. *Journal of Management Studies*, *58*(2), 540-553.
- Lanzolla, G., Lorenz, A., Miron-Spektor, E., Schilling, M., Solinas, G., & Tucci, C. L. (2020). Digital transformation: What is new if anything? Emerging patterns and management research. *Academy of Management Discoveries*, *6*(3), 341-350.
- Leeuwis, C. (2000). Reconceptualizing participation for sustainable rural development: towards a negotiation approach. *Development and Change*, *31*(5), 931-959.

- Lenkenhoff, K., Wilkens, U., Zheng, M., Süße, T., Kuhlenkötter, B., & Ming, X. (2018). Key challenges of digital business ecosystem development and how to cope with them. *Procedia Cirp*, 73, 167-172.
- Li, J., Chen, L., Yi, J., Mao, J., & Liao, J. (2019). Ecosystem-specific advantages in international digital commerce. *Journal of International Business Studies*, 50(9): 1448-1463
- Li, Y., Cui, L., Wu, L., Lowry, P. B., Kumar, A., & Tan, K. H. (2023). Digitalization and network capability as enablers of business model innovation and sustainability performance: The moderating effect of environmental dynamism. *Journal of Information Technology*.
- Liesch, P.W., Buckley, P.J., Simonin, B.L., & Knight, G. (2012). Organizing the modern firm in the worldwide market for market transactions. *Management International Review*, 52(1): 3–21.
- Lonial, S. C., & Carter, R. E. (2015). The impact of organizational orientations on medium and small firm performance: A resource-based perspective. *Journal of Small Business Management*, 53(1), 94-113.
- Ma, H., & Hou, H. (2021). Ecosystem strategy: who should adopt it and how?. *Organizational Dynamics*, 50(4), 100805.
- Magni, D., Palladino, R., Papa, A., & Cailleba, P. (2022). Exploring the journey of Responsible Business Model Innovation in Asian companies: A review and future research agenda. *Asia Pacific Journal of Management*, 1-30.
- Mair, J., & Reischauer, G. (2017). Capturing the dynamics of the sharing economy: Institutional research on the plural forms and practices of sharing economy organizations. *Technological Forecasting and Social Change*, 125, 11-20.
- Mair, J., Battilana, J., & Cardenas, J. (2012). Organizing for society: A typology of social entrepreneuring models. *Journal of Business Ethics*, 111, 353-373.
- Mann, G., Karanasios, S., & Breidbach, C. F. (2022). Orchestrating the digital transformation of a business ecosystem. *The Journal of Strategic Information Systems*, 31(3), 101733.

- Marquis, C., & Raynard, M. (2015). Institutional strategies in emerging markets. *Academy of Management Annals*, 9(1), 291-335.
- McDonald, R., & Gao, C. (2019). Pivoting isn't enough? Managing strategic reorientation in new ventures. *Organization Science*, 30(6), 1289-1318.
- McGahan, A. M. (2023). The new stakeholder theory on organizational purpose. *Strategy Science*, 8(2), 245-255.
- McIntyre, D., Srinivasan, A., Afuah, A., Gawer, A., & Kretschmer, T. (2021). Multisided platforms as new organizational forms. *Academy of Management Perspectives*, 35(4), 566-583.
- Menghwar, P. S., & Daood, A. (2021). Creating shared value: A systematic review, synthesis and integrative perspective. *International Journal of Management Reviews*, 23(4), 466-485.
- Meyer, K. E., Mudambi, R., & Narula, R. (2011). Multinational enterprises and local contexts: The opportunities and challenges of multiple embeddedness. *Journal of Management Studies*, 48(2), 235–252.
- Meyer, K. E., Li, J., Brouthers, K. D., & Jean, R. J. B. (2023). International business in the digital age: Global strategies in a world of national institutions. *Journal of International Business Studies*, 54(4), 577-598.
- Moore, J. F. (1993). Predators and prey: a new ecology of competition. *Harvard Business Review*, 71(3), 75–86.
- Moore, J. F. (2003). Digital business ecosystems in developing countries: An introduction. *Berkman Center for Internet and Society, Harvard Law School*. <http://cyber.law.harvard.edu/bold/devel03/modules/episodeII.html>.
- Moreno, A. M., & Casillas, J. C. (2008). Entrepreneurial orientation and growth of SMEs: A causal model. *Entrepreneurship Theory and Practice*, 32(3), 507-528.
- Mukhopadhyay, S., & Bouwman, H. (2019). Orchestration and governance in digital platform ecosystems: a literature review and trends. *Digital Policy, Regulation and Governance*, 21(4), 329-351.

- Nachira, F., Dini, P., & Nicolai, A. (2007). *A network of digital business ecosystems for Europe: roots, processes and perspectives*. European Commission, Bruxelles, Introductory Paper, 106, 1-20.
- Nambisan, S. (2018). Architecture vs. ecosystem perspectives: Reflections on digital innovation. *Information and Organization*, 28(2), 104-106.
- Nambisan, S., Zahra, S. A., & Luo, Y. (2019). Global platforms and ecosystems: Implications for international business theories. *Journal of International Business Studies*, 50, 1464-1486.
- Narver, J. C., & Slater, S. F. (1990). The effect of a market orientation on business profitability. *Journal of Marketing*, 54(4), 20-35.
- North, D. (1990). Institutions and their consequences for economic performance. *The Limits of Rationality*, 383–401.
- Nougarahiya, S., Shetty, G., & Mandloi, D. (2021). A review of e-commerce in India: The past, present, and the future. *Research Review International Journal of Multidisciplinary*, 6(03), 12-22.
- Olson, M. (2012). The logic of collective action [1965]. *Contemporary Sociological Theory*, 124, 62-63.
- Oskam, I., Bossink, B., & de Man, A. P. (2021). Valuing value in innovation ecosystems: How cross-sector actors overcome tensions in collaborative sustainable business model development. *Business & Society*, 60(5), 1059-1091.
- Palinkas, L. A., Horwitz, S. M., Green, C. A., Wisdom, J. P., Duan, N., & Hoagwood, K. (2015). Purposeful sampling for qualitative data collection and analysis in mixed method implementation research. *Administration and Policy in Mental Health and Mental Health Services Research*, 42, 533–544.
- Palmié, M., Rügger, S., & Parida, V. (2023). Microfoundations in the strategic management of technology and innovation: Definitions, systematic literature review, integrative framework, and research agenda. *Journal of Business Research*, 154, 113351.

- Pan, S. L., & Zhang, S. (2020). From fighting COVID-19 pandemic to tackling sustainable development goals: An opportunity for responsible information systems research. *International Journal of Information Management*, 55, 102196.
- Pitelis, C. N., & Teece, D. J. (2018). The new MNE: 'Orchestration' theory as envelope of 'Internalisation' theory. *Management International Review*, 58, 523-539.
- Porter, M. E. (1990). The competitive advantage of nations. *Harvard Business Review*, 73, 91.
- Porter, M. E., & Kramer, M. R. (2014). A response to Andrew Crane et al.'s article. *California Management Review*, 56(2), 149-151.
- Prahalad, C. K. (2005). *The Fortune at the Bottom of the Pyramid*. Financial Times/Prentice Hall.
- Prahalad, C. K., & Hammond, A. (2002). Serving the world's poor, profitably. *Harvard Business Review*, 80(9), 48-59.
- Quinton, S., Canhoto, A., Molinillo, S., Pera, R., & Budhathoki, T. (2018). Conceptualising a digital orientation: antecedents of supporting SME performance in the digital economy. *Journal of Strategic Marketing*, 26(5), 427-439.
- Reuter, E. (2022). Hybrid business models in the sharing economy: The role of business model design for managing the environmental paradox. *Business Strategy and the Environment*, 31(2), 603-618.
- Reyes-Gómez, J. D., López, P., & Rialp, J. (2024). The relationship between strategic orientations and firm performance and the role of innovation: a meta-analytic assessment of theoretical models. *International Journal of Entrepreneurial Behavior & Research*.
- Ritala, P., Albareda, L., & Bocken, N. (2021). Value creation and appropriation in economic, social, and environmental domains: Recognizing and resolving the institutionalized asymmetries. *Journal of Cleaner Production*, 290, 125796.

- Ritala, P., Agouridas, V., Assimakopoulos, D., & Gies, O. (2013). Value creation and capture mechanisms in innovation ecosystems: a comparative case study. *International Journal of Technology Management*, 63(3-4), 244-267.
- Ritala, P., Baiyere, A., Hughes, M., & Kraus, S. (2021). Digital strategy implementation: The role of individual entrepreneurial orientation and relational capital. *Technological Forecasting and Social Change*, 171, 120961.
- Ritala, P. (2024). Grand challenges and platform ecosystems: Scaling solutions for wicked ecological and societal problems. *Journal of Product Innovation Management*, 41(2), 168–183.
- Rong, K., Kang, Z., & Williamson, P. J. (2022). Liability of ecosystem integration and internationalisation of digital firms. *Journal of International Management*, 28(4), 100939
- Rong, K., Lin, Y., Li, B., Burström, T., Butel, L., & Yu, J. (2018). Business ecosystem research agenda: more dynamic, more embedded, and more internationalized. *Asian Business & Management*, 17, 167-182.
- Rong, K., Lin, Y., Du, W., & Yang, S. (2024). Business ecosystem-oriented business model in the digital era. *Technology Analysis & Strategic Management*, 36(10), 3082-3099.
- Rugman, A. M. (1985). Multinationals and global competitive strategy. *International Studies of Management & Organization*, 15(2), 08-18.
- Rumelt, R. P. (1984). Towards a strategic theory of the firm. *Competitive Strategic Management*, 26(3), 556-570.
- Saheb, T., & Mamaghani, F. H. (2021). Exploring the Digital Business Ecosystem of Internet of Things in Emerging Economies with a focus on the role of pseudo-private companies. *Australasian Journal of Information Systems*, 25.
- Saldana, J. (2011). *Fundamentals of qualitative research*. Oxford University Press.

- Sangvikar, B., Kolte, A., & Pawar, A. (2019). Competitive strategies for unorganised retail business: understanding structure, operations, and profitability of small mom and pop stores in India. *International Journal on Emerging Technologies*, 10(3), 253-259.
- Sarkar, S., Waldman-Brown, A., & Clegg, S. (2023). A digital ecosystem as an institutional field: curated peer production as a response to institutional voids revealed by COVID-19. *R&D Management*, 53(4), 695-708.
- Schweiger, S. A., Stettler, T. R., Baldauf, A., & Zamudio, C. (2019). The complementarity of strategic orientations: A meta-analytic synthesis and theory extension. *Strategic Management Journal*, 40(11), 1822-1851.
- Senyo, P. K., Liu, K., & Effah, J. (2019). Digital business ecosystem: Literature review and a framework for future research. *International Journal of Information Management*, 47, 52-64.
- Shaheer, N. A., & Li, S. (2020). The CAGE around cyberspace? How digital innovations internationalize in a virtual world. *Journal of Business Venturing*, 35(1), 105892.
- Shvindina, H. (2021). Leadership as a driver for organizational change. *Business Ethics and Leadership*.
- Siggelkow, N. (2007). Persuasion with case studies. *Academy of Management Journal*, 50(1), 20-24.
- Singh, A. K., Chauhan, R., & Dhingra, T. (2024). Engaging firms and populations in ecosystem web: deploying a multi-paradigmatic construct to resolve pluralism in organizational theory. *International Studies of Management & Organization*, 1-33.
- Singh, J. V., Tucker, D. J., & House, R. J. (1986). Organizational legitimacy and the liability of newness. *Administrative Science Quarterly*, 171-193.
- Sirmon, D. G., Hitt, M. A., Ireland, R. D., & Gilbert, B. A. (2011). Resource orchestration to create competitive advantage: Breadth, depth, and life cycle effects. *Journal of Management*, 37(5), 1390–1412.

- Snihur, Y., & Bocken, N. (2022). A call for action: The impact of business model innovation on business ecosystems, society, and planet. *Long Range Planning*, 55(6), 102182.
- Snihur, Y., Zott, C., & Amit, R. (2021). Managing the value appropriation dilemma in business model innovation. *Strategy Science*, 6(1), 22-38.
- Soh, F., & Setia, P. (2022). The impact of dominant IT infrastructure in multi-establishment firms: The moderating role of environmental dynamism. *Journal of the Association for Information Systems*, 23(6), 1603-1633.
- Stallkamp, M., & Schotter, A. P. (2021). Platforms without borders? The international strategies of digital platform firms. *Global Strategy Journal*, 11(1): 58-80.
- Stanley, J., & Briscoe, G. (2010). The ABC of digital business ecosystems. *arXiv preprint arXiv:1005.1899*.
- Stonig, J., Schmid, T., & Müller-Stewens, G. (2022). From product system to ecosystem: How firms adapt to provide an integrated value proposition. *Strategic Management Journal*, 43(9), 1927-1957.
- Stubbs, W., Dahlmann, F., & Raven, R. (2022). The purpose ecosystem and the United Nations sustainable development goals: Interactions among private sector actors and stakeholders. *Journal of Business Ethics*, 180(4), 1097-1112.
- Sun, X., & Zhang, Q. (2021). Building digital incentives for digital customer orientation in platform ecosystems. *Journal of Business Research*, 137, 555–566.
- Suuronen, S., Ukko, J., Eskola, R., Semken, R. S., & Rantanen, H. (2022). A systematic literature review for digital business ecosystems in the manufacturing industry: Prerequisites, challenges, and benefits. *CIRP Journal of Manufacturing Science and Technology*, 37, 414-426.

- Suuronen, S., Ukko, J., Saunila, M., Rantala, T., & Rantanen, H. (2024). The implications of multi-sided platforms in managing digital business ecosystems. *Journal of Business Research*, 175, 114544.
- Tan, C., Dhakal, S., & Ghale, B. (2020). Conceptualising capabilities and value co-creation in a digital business ecosystem (DBE): A systematic literature review. *Journal of Information Systems Engineering and Management*, 5(1).
- Tatarinov, K., Ambos, T. C., & Tschang, F. T. (2023). Scaling digital solutions for wicked problems: Ecosystem versatility. *Journal of International Business Studies*, 54(4), 631-656.
- Teece, D. J. (2007). Explicating dynamic capabilities: the nature and microfoundations of (sustainable) enterprise performance. *Strategic Management Journal*, 28(13), 1319-1350.
- Teece, D. J., & Linden, G. (2017). Business models, value capture, and the digital enterprise. *Journal of Organization Design*, 6(1), 1-14.
- Thomas, L. D., & Autio, E. (2019). *Innovation Ecosystems*. Available at SSRN 3476925.
- Thomas, L. D., & Ritala, P. (2022). Ecosystem legitimacy emergence: A collective action view. *Journal of Management*, 48(3), 515-541.
- Tykkyläinen, S., & Ritala, P. (2021). Business model innovation in social enterprises: An activity system perspective. *Journal of Business Research*, 125, 684-697.
- Van der Borgh, M., Cloudt, M., & Romme, A. G. L. (2012). Value creation by knowledge-based ecosystems: evidence from a field study. *R&D Management*, 42(2), 150-169.
- Varughese, G., & Ostrom, E. (2001). The contested role of heterogeneity in collective action: some evidence from community forestry in Nepal. *World Development*, 29(5), 747-765.
- Venkatraman, N. (1989). The concept of fit in strategy research: Toward verbal and statistical correspondence. *Academy of Management Review*, 14(3), 423-444.
- Verbeke, A., & Hutzschenreuter, T. (2021). The dark side of digital globalization. *Academy of Management Perspectives*, 35(4), 606-621.

- Vial, G. (2021). Understanding digital transformation: A review and a research agenda. *Managing Digital Transformation*, 13-66.
- Viet Nguyen, C., & van den Berg, M. (2014). Informal Credit, Usury, or Support? A Case Study for Vietnam. *The Developing Economies*, 52(2), 154-178.
- Von Krogh, G., Rossi-Lamastra, C., & Haefliger, S. (2012). Phenomenon-based research in management and organisation science: When is it rigorous and does it matter? *Long Range Planning*, 45(4), 277-298.
- Wang, J., Nie, Y., Guo, M., & Liu, H. (2024). Digital orientation and innovation outputs in collaboration networks: inside the black box. *Journal of the Knowledge Economy*, 15(1), 732–750.
- Weining, L., Jingyu, Z., & Yuan, L. (2016). A Study of Transformational Leadership, Strategic Flexibility and Firm Performance: The Moderating Role of Environmental Dynamism. *International Interdisciplinary Business-Economics Advancement Journal*, 1(2).
- Wójcik, P. (2016). How creating shared value differs from corporate social responsibility. *Central European Management Journal*, 24(2), 32-55.
- Wright, M., Filatotchev, I., Hoskisson, R. E., & Peng, M. W. (2005). Strategy research in emerging economies: Challenging the conventional wisdom. *Journal of Management Studies*, 42(1), 1-33
- Yi, J., Li, J., & Chen, L. (2023). Ecosystem social responsibility in international digital commerce. *Journal of International Business Studies*, 54(1), 24-41.
- Yin, R. K. (2009). *Case Study Research: Design and Methods* (Vol. 5). Sage.
- Young, M. N., Tsai, T., Wang, X., Liu, S., & Ahlstrom, D. (2014). Strategy in emerging economies and the theory of the firm. *Asia Pacific Journal of Management*, 31, 331-354.

- Zaheer, S. (1995). Overcoming the liability of foreignness. *Academy of Management Journal*, 38(2), 341-363.
- Zaheer, A., Gözübüyük, R., & Milanov, H. (2010). It's the connections: The network perspective in interorganizational research. *Academy of Management Perspectives*, 24(1), 62-77.
- Zhou, X., Zhang, L., & Su, X. (2022). Entrepreneurial institutional environment and entrepreneurial orientation: The mediating role of entrepreneurial passion. *Frontiers in Psychology*, 13, 840548.
- Zott, C., & Amit, R. (2017). Business model innovation: How to create value in a digital world. *NIM Marketing Intelligence Review*, 9(1), 18-23.

कायेन वाचा मनसेन्द्रियैर्वा।
बुद्ध्यात्मना वा प्रकृतेः स्वभावात्।
करोमि यद्यत्सकलं परस्मै।
नारायणायेति समर्पयामि॥