BOOK OF ABSTRACTS
INNOVISION 2025
THE INDO-EUROPEAN MANAGEMENT CONFERENCE

«Shaping the future of business: Innovision, Sustainability, and inclusive Growth »

OCTOBER 11, 2025

HYBRID

- Dr. Oumaima OMARI HARAKE
- Prof. Dr. M.F HARAKE
- Dr. Sudhanshu BHATT

InnoVision

The Indo-European Management Conference

First Edition 2025

Edited by

Dr. Oumaima OMARI HARAKE

Prof. Dr. M.F. HARAKE

Dr. Sudhanshu BHATT

ISBN : 978-93-344-3054-7

Edited by

Dr. Oumaima OMARI HARAKE

Laboratoire CEREGE (France)

MESOS Business School (France)

Prof. Dr. M.F. HARAKE

MESOS Business School (France)

GBSB Global Business School (Spain / Malta)

Laboratoire CEREGE (France)

Dr. Sudhanshu BHATT

Sanjivani University (India)

Published in India by Sanjivani University

(Officially registered with the Raja Rammohun Roy National Agency for ISBN, Ministry of Education, Government of India)

ISBN: 978-93-344-3054-7

Brief Contents

ISBN : 978-93-344-3054-7

Editorial

InnoVision – The Indo-European Management Conference, was conceived as a meeting point for those who seek to understand and shape the profound transformations that are reconfiguring organizations and societies today. The conference title itself brings together "innovation" and "vision". It signals a double ambition to study innovation as a social, organizational, and technological phenomenon, and to collectively imagine alternative futures in contexts marked by uncertainty, crises, and rapid change. This edition continues that ambition by convening researchers, practitioners, and policy-makers from Europe, India, and beyond who share the conviction that rigorous inquiry can and should contribute to more just, sustainable, and resilient forms of development.

This edition convened more than seventy participants representing thirty-five nationalities and spanning multiple time zones, reflecting its genuinely international character and scholarly reach. The Indo-European Management Conference was hosted by Sanjivani University and co-organized by MESOS Business School and GBSB Global Business School, whose collaboration was essential in fostering this transnational academic dialogue.

In many public debates, innovation is still framed in narrow economic or technological terms, often understood as a driver of competitiveness, productivity, or disruption. The experience of recent years, however, has made clear that such views are insufficient. Health crises, climate emergencies, geopolitical tensions, social inequalities, and the transformations of work and care all reveal that innovation is never neutral. It redistributes risks and opportunities, reshapes institutions, and alters power relations. This volume invites readers to interrogate innovation as a deeply political and ethical process. Who decides which problems deserve innovative solutions? How are benefits and burdens distributed? What forms of accountability and participation should accompany innovation in both public and private spheres?

ISBN : 978-93-344-3054-7

The contributions gathered here address these questions from a wide range of theoretical and methodological perspectives. They include qualitative and ethnographic studies of organizational change, large-scale quantitative analyses of financial and social performance, conceptual and critical essays that reframe familiar issues, and design-oriented work that proposes new tools, frameworks, and instruments.

Taken together, they illuminate how innovation is enacted, negotiated, and sometimes resisted across diverse sectors including finance and entrepreneurship, health and education, manufacturing and digital platforms, public policy and humanitarian action.

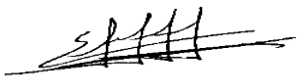
Interdisciplinarity is one of the hallmarks of InnoVision. The conference explicitly encourages dialogue across management and organization studies, public administration, economics, sociology, political science, information systems, engineering, and design research. This intellectual pluralism is not a decorative add-on. It stems from the recognition that complex societal challenges such as digitalization, ecological transition, demographic shifts, and institutional fragility cannot be understood through a single lens. By crossing disciplinary boundaries and combining methodological traditions, the contributions assembled here offer richer and more nuanced accounts of how innovation unfolds in practice.

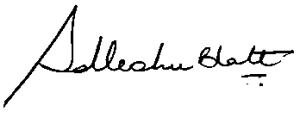
Several cross-cutting themes emerge across the tracks. One concerns the governance of innovation, including the rules, procedures, and devices through which projects are selected, financed, monitored, and evaluated in both public and private organizations. Another centers on everyday practice and explores how managers, employees, entrepreneurs, citizens, and users appropriate, adapt, or contest new technologies and organizational arrangements. A third theme foregrounds inequalities and asks whether innovation strategies reproduce or challenge existing hierarchies based on gender, geography, profession, or socio-economic status. Finally, many contributions engage directly with the ethical and political stakes of data, digital infrastructures, artificial intelligence, and algorithmic decision-making, highlighting their potential for inclusion and sustainability while also acknowledging the new forms of opacity, dependence, and exclusion they can generate.

ISBN : 978-93-344-3054-7

This book of abstracts is intended for multiple audiences. For academics, it offers a snapshot of current debates and emerging research trajectories around innovation and transformation. For practitioners and policy-makers, it provides analytically grounded insights that can inform strategic choices, organizational design, and public policy. For early-career researchers and doctoral candidates, InnoVision aims to be a supportive environment in which ideas can be tested, critiqued, and enriched through constructive dialogue and Indo-European collaboration.

The realization of this conference and of the present volume is a collective endeavor. The organizers warmly thank all authors for their trust and for sharing their ongoing work, as well as the reviewers and members of the scientific committee for their attentive and demanding evaluations. The institutional and financial partners whose support has been crucial in sustaining this initiative also deserve recognition. We hope that the reflections assembled under the banner of InnoVision will nourish critical discussion, foster lasting collaborations across regions and disciplines, and encourage research and practice that remain attentive to both the promises and the ambivalences of innovation. May this conference be not only a venue for presenting results but also a laboratory for shared imagination that helps us envision and enact more inclusive, sustainable, and reflexive futures.





Dr. Oumaima OMARI HARAKE **Prof. Dr. M.F. HARAKE** **Dr. Sudhanshu BHATT**

ISBN : 978-93-344-3054-7

Conference Organizing & Scientific Leadership

Chief Patrons

- **Shri Nitinrao S. Kolhe**: Chairman, Sanjivani Rural Education Society, India
- **Shri Amit Kolhe**: President, Sanjivani University, India
- **Prof. Dr. Jean-Michel Viola**: Dean & General Manager, MESOS Business School, France
- **Prof. Dr. Wiktor Patena**: Head of Institution & President, GBSB Global Business School, Malta / Spain

Patrons

- **Prof. Dr. A. G. Thakur**: Vice Chancellor, Sanjivani University, India
- **Prof. Dr. M. F. Harake**: Assistant General Manager & Dean of Academic Affairs, MESOS Business School, France, Manager, GBSB Global Business School Research Center, Malta / Spain

Convenor

- **Sudhanshu Bhatt**: Director – University Relations, Sanjivani University, India
- **Amol Dhakane**: Registrar, Sanjivani University, India
- **Prof. Dr. Hind Naaman**: Head of Studies & Academic Operations, GBSB Global Business School, Malta / Spain
- **Prof. Dr. Behnoush Kangarlou**: Senior Faculty, GBSB Global Business School, Malta / Spain
- **Dr. Oumaima Omari Harake**: Researcher, CEREGE Research Laboratory, Université de Poitiers, France
- **Dr. Kiran N. Wakchaure**: Director of Projects, Sanjivani University, India

ISBN : 978-93-344-3054-7

General Committee Chairs

- **Prof. Dr. Vinod Ramchandra Malkar**: Dean, School of Commerce & Management (SCM), Sanjivani University, India
- **Prof. Dr. Kavitha Rani Paramasivan**: Dean, School of Engineering & Technology (SET), Sanjivani University, India
- **Dr. Sarita Pawar**: Dean, School of Pharmaceutical Sciences (SPS), Sanjivani University, India
- **Dr. Samadhan Dahikar**: Dean, School of Science & Computing (SSC), Sanjivani University, India

Organizing Committee Chairs

- **Dhananjay Kumbhar**: Director, Training & Placement, Sanjivani University, India

Heads of Departments – Sanjivani University

- **Dr. Mahendra Bhatu Gawali** – CSE
- **Dr. Ajit Ashok Muzumdar** – CS
- **Dr. Vengatesan K** – AIDS
- **Dr. Devyani Swapnil Jadhav** – AIML
- **Dr. Bharat K** – MBA
- **Dr. Tanaya Patil** – BBA
- **Harshal Dayma** – Commerce
- **Yogesh Sopan Modhe** – BCA / MCA

Publication Chair

- **Dr. P. William**: Director, R&D, Sanjivani University, India

Organizing Committee – Volunteers

- **Dr. Olayemi Funmilayo Dickson**: National Centre for Technology Management (NACETEM), Nigeria
- **Kayla Kim Sampson**: GBSB Global Business School
- **Vidya Gorakh Jagtap**: Sanjivani University
- **Shrawani Ravindra Gaikwad**: Sanjivani University
- **Shejal Somnath Kshirsagar**: Sanjivani University
- **Chaitali Sandip Jadhav**: Sanjivani University
- **Mitali Nitin Abnave**: Sanjivani University
- **Siddhi Amol Gangarde**: Sanjivani University
- **Kalyani Rajesh Kadam**: Sanjivani University

ISBN : 978-93-344-3054-7

Scientific Committee Members

- **Aalok Kumar** : IIM Visakhapatnam, India
- **Ajay Manrai** : Alfred Lerner College of Business & Economics, University of Delaware, USA
- **Ajaykumar Thakur** : Sanjivani University, India
- **Alain Daou** : American University of Beirut – Mediterraneo (Cyprus)
- **Alexander Pelov**: IMT Atlantique, France
- **Alidou Ouedraogo**: University of Moncton, Canada & MESOS Business School, France
- **Amitabh Anand** : Excelia Business School, France
- **Anand Jhawar**: IMT Ghaziabad, India
- **Behnoush Kangarlou**: GBSB Global Business School, Spain
- **Destan Kirimhan**: American University of Sharjah, UAE
- **Dikhita Das**: UPES, India
- **Dr. P. William**: Director R&D, Sanjivani University, India; Adjunct Faculty, Victorian Institute of Technology, Australia; Research Affiliate, Amity University, UAE
- **Emmanuel Mogaji**: Keele University, UK
- **Faizan Ali**: University of Galway, Ireland
- **Fidelma Ibili**: Dr. Hilla Limann Technical University, Ghana
- **George Kassar**: Ascencia Business School, France
- **Hind Naaman**: GBSB Global Business School, Spain
- **Jean-Michel Viola**: MESOS Business School, France
- **Juliana Vassileva**: New Bulgarian University, Bulgaria
- **Jun Hwa (Jacky) Cheah**: Norwich Business School, University of East Anglia, UK
- **Li Huang**: Hofstra University, USA
- **M. F. Harake**: MESOS Business School, France & GBSB Global Business School, Malta / Spain
- **Mahamoud Moustapha** – University of Djibouti, Djibouti & MESOS Business School, France

ISBN : 978-93-344-3054-7

- **Mujtaba M. Momin**: American University of the Middle East, Kuwait
- **Musarrat Shaheen**: IMT Hyderabad, India
- **Olayemi Funmilayo Dickson**: National Centre for Technology Management, Nigeria
- **Oumaima Omari Harake**:Université de Poitiers, France
- **Payal Kumar**: Indian School of Hospitality (ISH), India
- **Raj Agnihotri**: Ivy College of Business, Iowa State University, USA
- **Ritesh K. Patel**: Sanjivani Group of Institutes, India
- **Rodolphe Pauvert**: Université de Poitiers, France
- **Sakshi Kathuria**: Fortune Institute of International Business, India
- **Samuel Akintomide Ajayi**: Nigerian Building and Road Research Institute, Nigeria
- **Sanjeev Varshney**: XLRI Xavier School of Management, Jamshedpur, India
- **Shiv K. Tripathi**: BSBI Berlin School of Business and Innovation, Germany
- **Shubho Chakraborty**: Rennes School of Business, France
- **Simeon Stevenson Turay**: Fourah Bay College, University of Sierra Leone
- **Sourabh Arora**: IIT Roorkee, India
- **Sudhanshu Bhatt**: Sanjivani University, India & MESOS Business School, France
- **Sujo Thomas**: Ahmedabad University, India
- **Tanvi Kothari**: San Jose State University, USA
- **Valérie Lehmann**: UQAM, Canada & MESOS Business School, France
- **Vidy Potdar**: Curtin University, Australia
- **Viral G. Bhatt**: Karnavati University, Gujarat, India
- **Wiktor Patena**: GBSB Global Business School, Spain
- **Yann Duzert**: MESOS Business School, France

ISBN : 978-93-344-3054-7

Introduction to InnoVision: *The Indo-European Management Conference*

InnoVision - *Indo-European Management Conference* has been established as a forum for high-level dialogue among researchers, practitioners, and policy-makers who seek to understand and engage with the profound transformations currently reshaping organizations and societies. Situated at the intersection of European and Indian perspectives, the conference offers a distinctive platform for examining how innovation in its organizational, technological, and social dimensions reconfigures managerial practices, institutional arrangements, and modes of value creation across diverse contexts.

Rooted in a strong Indo-European partnership, InnoVision places particular emphasis on comparative inquiry and cross-cultural exchange. It invites contributions that explore how institutional traditions, regulatory frameworks, and socio-economic environments shape the design, implementation, and evaluation of innovative practices. By convening scholars and professionals from both regions, the conference aims to stimulate shared learning, question established assumptions and assess both the transferability and the limits of so-called best practices in management and public policy.

InnoVision was hosted by Sanjivani University (India) and co-organized by MESOS Business School (France) and GBSB Global Business School (Spain, Malta, and Online), whose collaboration was essential in fostering this transnational academic dialogue.

The conference encompasses a wide spectrum of themes related to innovation and transformation, including digitalization and artificial intelligence, sustainability and ecological transition, public sector innovation, entrepreneurial ecosystems, evolving forms of work and employment, and the governance of inter-organizational collaborations.

Its sessions are designed to promote constructive debate, methodological pluralism, and the confrontation of diverse theoretical perspectives. Particular attention is devoted to empirical studies grounded in rigorous fieldwork as well as to conceptual contributions that propose innovative frameworks for understanding change in complex environments.

ISBN : 978-93-344-3054-7

InnoVision also positions itself as an enabling environment for early-career researchers and doctoral candidates. Dedicated sessions and tailored formats provide opportunities for constructive feedback, scholarly exchange, and the development of long-term Indo-European research collaborations. Practitioners and decision-makers are equally encouraged to share their experiences, thereby enriching academic dialogue with situated expertise and practical insights.

This book of abstracts reflects the intellectual breadth and international scope that characterize *the InnoVision - Indo-European Management Conference*. It offers readers an overview of the questions, methods, and empirical terrains that structure contemporary research on innovation and management. Beyond documenting the contributions presented during the conference, it serves as a resource intended to inspire future research projects, comparative analyses, and collaborative initiatives at the intersection of European and Indian perspectives on organizational and managerial change.

ISBN : 978-93-344-3054-7

Partner Journals and Publication Opportunities

The InnoVision – Indo European Management Conference is supported by a set of partner journals that share its commitment to high-quality, internationally oriented scholarship in management and the social sciences. These journals provide important avenues for disseminating research on innovation, organizational transformation, governance, and global managerial challenges in both public and private sectors.

Among these partners is the *Journal of Business, Ethics and Society* (JBES), an interdisciplinary, double-blind peer-reviewed journal published by BML Munjal University. JBES focuses on the intersection of business, ethics, and societal well-being, welcoming theoretical and empirical contributions on corporate social responsibility, social entrepreneurship, power dynamics, and ethical challenges arising from contemporary crises. Its open-access policy and absence of publication fees reflect its mission to foster inclusive global knowledge sharing.

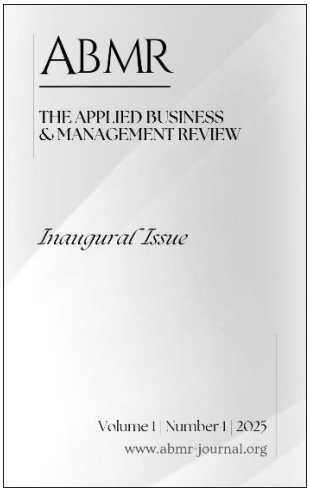
The *Applied Business & Management Review* complements this perspective through its orientation toward applied, practice-relevant research in management. The journal publishes empirical studies, theoretical analyses, reflective essays, and trend-focused commentaries that offer actionable insights for managers and organizations. With dedicated sections for research articles and managerial perspectives, it provides a platform for multidisciplinary and interdisciplinary work that connects academic inquiry with real-world decision-making. It follows a biannual publication schedule, maintains an open-access model without processing charges, and evaluates submissions through a rigorous peer-review process.

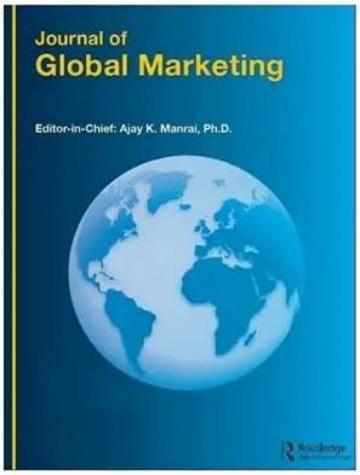
The *Journal of Global Marketing*, published by Taylor & Francis, contributes a global and international marketing lens to this partnership. The journal is recognized for advancing research on marketing strategies, consumer behavior, cross-cultural dynamics, and the impact of emerging technologies on global markets. It encourages submissions addressing international marketing challenges in both developed and emerging economies and maintains a high standard of scholarly rigor through its anonymous peer-review process.

ISBN : 978-93-344-3054-7

Through these partnerships, authors presenting at InnoVision are encouraged to develop extended versions of their communications for potential submission to the associated journals. Each manuscript will undergo the respective journal's independent peer-review procedures, ensuring scientific integrity and adherence to disciplinary standards.

The collaboration between InnoVision and its partner journals aims to increase the visibility of the research showcased at the conference and to deepen Indo-European academic dialogue. It also supports the emergence of comparative, cross-cultural, and interdisciplinary studies that address contemporary challenges in management, governance, and organizational change from diverse global perspectives.





ISBN : 978-93-344-3054-7

Meet the Editors

Dr. Oumaima OMARI HARAKE
Researcher at Laboratoire CEREGE (France)
Assistant Professor Mesos Business School (France)
Co-Editor, Applied Business & Management Review (ABMR)
Email: omarioumaima466@gmail.com

Dr. Oumaima OMARI HARAKE is a researcher in management sciences at the University of Poitiers (France), specializing in public management and health systems. She teaches in various higher education institutions in France and internationally, notably in Spain, Togo, and Morocco. Her research focuses on the use and appropriation of management and governance instruments such as performance measurement and project-based management, within health systems, particularly during crises like the COVID-19 pandemic. She is involved in several collaborative projects on public–private partnerships, post-crisis health governance, and the integration of artificial intelligence in health organizations in post-conflict contexts.

ISBN : 978-93-344-3054-7

Prof. Dr. M.F. HARAKE
Full Professor
AGM & Dean of Academic Affairs at Mesos Business School (France)
Manager of the GBSB Global Research Center (Spain / Malta)
Associate Researcher at Laboratoire CEREGE (France)
Editor-in-Chief, Applied Business & Management Review (ABMR)
Email: mfharake@mesos-bs.com
mohamed.harake@faculty.gbsb.global

Prof. Dr. M. F. HARAKE is a management professor based in France. He currently serves as the Assistant General Manager and Dean of Academic Affairs at MESOS Business School (France). In addition, he is the Manager of the Research Center at GBSB Global Business School (Malta). He is also affiliated as an Associate Research Fellow at the CEREGE Research Laboratory, University of Poitiers (France). Prof. Harake is the Editor-in-Chief of Applied Business & Management Review (ABMR). His research interests include Post-Conflict Public Management, Crisis and Urgent Operations Management, Humanitarian Logistics, and Project Management in Unstable Environments. His academic and professional contributions focus on bridging strategic theory with high-impact practical execution, especially in volatile and complex contexts.

ISBN : 978-93-344-3054-7

Dr. Sudhanshu BHATT
Professor at Sanjivani University
Director of University Relations
Email: directorrelations@sanjivani.edu.in

Sudhanshu BHATT serves as the Director of University Relations at Sanjivani University, Kopargaon, Maharashtra, India, bringing over fifteen years of substantial experience spanning academia and industry. He also holds appointments as an Affiliate Professor at MESOS Business School, France, and as Director of Partnerships and Collaborations at the Transformative Transportation Services Design Initiative (TRATSEDI), United Kingdom. An alumnus of Rennes School of Business, France, where he earned his MBA, he is actively engaged in scholarly research with publications in international case repositories and reputed peer-reviewed journals. Beyond his academic contributions, he has spearheaded institutional internationalization, academic diplomacy, and cross-border collaboration initiatives across Europe and Asia.

ISBN : 978-93-344-3054-7

Track 1. Business Innovation, Strategy, and Transformation

Track 1 brings together contributions that explore how organizations design, implement, and govern innovation strategies in a rapidly evolving economic and technological environment. From digital financial inclusion and AI-enabled recruitment to new business models for e-commerce, the papers in this track show that innovation is not merely about adopting new tools; it is about rethinking value creation, organizational capabilities, and stakeholder relationships. E-payment systems, AI-driven workforce transformation, and management accounting for innovation all exemplify how strategy and technology intersect to reshape competitive landscapes and internal governance.

A common thread running through the track is the need to align technological experimentation with social responsibility and long-term strategic vision. The authors examine how small and medium enterprises, emerging markets, and capital market infrastructures navigate uncertainty while leveraging digital tools for growth and resilience. They address questions such as: How can companies harness artificial intelligence without undermining human judgment or exacerbating inequalities? How do content quality and personalization influence consumer engagement in new e-marketplaces? How can strategic purpose be operationalized through governance mechanisms that support agility rather than rigidity?

Taken together, the contributions to Track 1 invite managers, entrepreneurs, and policy-makers to approach innovation as a systemic endeavor. They highlight the importance of integrating financial, technological, and human dimensions into coherent strategies that are robust in the face of crises and nimble enough to seize emerging opportunities.

ISBN : 978-93-344-3054-7

The Role of E-payment Systems on E-commerce Adoption in SMEs in Afghanistan

Baryalai Baryal

Ph.D. Student

Postgraduate, Graduate School of Economics and Management

Ural Federal University named after the first President of Russia B.N. Yeltsin Yekaterinburg, Russia

baryalai.eco@gmail.com

Belyaeva Zhanna S.

PhD, Associate Professor

Department of Management and Interdisciplinary Studies

Graduate School of Economics and Management

Ural Federal University named after the first President of Russia B.N. Yeltsin Yekaterinburg, Russia

Abstract

In most developing countries, E-commerce adoption among small and medium-sized enterprises (SMEs) experience great challenges because of the lack of infrastructure, the limited access of technology, and the effectiveness of electronic payments. The e-commerce landscape in Afghanistan is very complex, a country known for its entrepreneurial resiliency as well as institutional problems. this study investigates the role of e-payment system in shaping the trajectory of e-commerce adoption among Afghan SMEs, offering insights into the factors that influence their incorporation into business practices.

The study adopts a mixed-method design, which involves data from the SMEs owners throw a survey and qualitative interviews from the financial service providers.

ISBN : 978-93-344-3054-7

The methodology will allow understanding the perception, the adoption, and the use of digital payment solutions in the environment of Afghan SMEs in a comprehensive manner. Results show that e-payment systems offer SMEs opportunities to grow their markets and simplify their transactions, however a number of challenges hinder their widespread adoption. The most important of these obstacles include trust issues, digital literacy, and barriers of infrastructural constraints.

A large percentage of Afghan SMEs use cash on delivery (COD) as their major mode of transaction. This can be explained by the fact that there is a lack of trust about the electronic payment systems that are considered to be insecure or unreliable (Ahmad and Noor, 2023). This dependency on COD limits the possibility of e-commerce to grow due to it restrict the capacity of businesses to interact with the customer in a more effective and timely manner. It has been found that the perception of security is a significant factor in the adoption of e-payment systems; most SMEs are unwilling to adopt digital solutions because of security concerns related to fraud and data privacy breaches (Mohammed and Zaman, 2020). This has been compounded by the fact that there are still some issues in regards to the financial infrastructure of Afghanistan which is still in its early stages and is not as stable as it needs to be to facilitate massive electronic transactions.

Another major constraint to adoption of e-payment systems by the Afghan SMEs is digital literacy. The lack of skills to use digital payment solutions properly among many business owner and their worker makes them less competitive in their adoption of e-commerce (Rahimi, 2019). This barrier could be reduced through training programs that improve digital skills so that SMEs can use the full potential of the e-payment solutions. According to research by Omar (2022), special educational programs can make a substantial positive contribution to the level of digital literacy and, consequently, to the increased involvement of the population in the e-commerce platform.

Another factor that makes further complicate the e-commerce situation in Afghanistan is the infrastructural constraints. E-payment systems cannot operate efficiently without reliable internet connectivity, and, therefore, e-commerce cannot succeed (World Bank, 2023). Nevertheless, Afghanistan still faces a high number of areas with unreliable connectivity, and this limits the adoption and use of digital payment solutions (UNCTAD, 2022).

ISBN : 978-93-344-3054-7

The lack of reliable infrastructure that supports e-commerce is not only the problem that impacts the capacity of SMEs to conduct the online transactions but also the consumer confidence in online transactions.

Furthermore, the study also shows that there are many examples of adaptation among Afghanistan SMEs despite their difficulties. Certain companies have already used mobile money systems to access clients outside their physical borders and this is an indication of a digital transition that is likely to go wider. As an example, the introduction of mobile money service like M-Paisa has helped businesses connect with those customers in isolated locations, which is an example that can be emulated elsewhere (Gul & Rahman, 2021). The adaptations provide a picture of how e-payment systems can be used in difficult environments to spur innovation and economic growth.

This study will add a contextual understanding of barriers to Afghanistan by contextualizing the country experience on the global discussion on digital economies because it provides actionable recommendations to policymakers, fintech providers, and entrepreneurs. The issue of SMEs adopting the e-payment systems is an important one that needs to be addressed to create a dynamic e-commerce environment. The policymakers should also focus on the creation of effective regulatory mechanisms that would increase trust and security in online deals (Aslam, 2022). These frameworks must aim to protect the consumers and at the same time motivate the businesses to embrace new payment options.

Through collaboration between SMEs and fintech companies, specific solutions can be developed to address the needs of the Afghan businesses to create an inclusive digital economy (Khan and Ahmed, 2023). Through collaboration, the stakeholders can create payment systems that are not only secure but also accessible and easy to use by SMEs who have different levels of technological advances.

Finally, this article contends that improving e-payment ecosystems is more than just a technology update; it is a vital enabler of equitable economic growth and resilience in fragile settings. E-payment systems can empower SMEs, enhance the creation of jobs, and lead to the general economic stability in Afghanistan by streamlining transactions, expanding access to the market, etc.

ISBN : 978-93-344-3054-7

The incorporation of e-payment systems into SMEs' business practices could operate as a catalyst for greater economic development, allowing these entities to negotiate the complexity of the modern marketplace more efficiently.

To conclude, there are challenges and opportunities associated with the adoption of e-payment systems in the SMEs in Afghanistan. Although the problem of trust, digital literacy and infrastructure still plays a major role in hindering progress, the prospects of growth and innovation are high. Through these obstacles, it is possible to make Afghanistan a pathway to a stronger e-commerce ecosystem that contributes to economic resilience and inclusivity by working together through specific interventions.

Keywords: *E-payment systems; E-commerce adoption; SMEs in Afghanistan; Digital literacy; Trust and security; Infrastructure constraints; Mobile money solutions; Digital economy development.*

ISBN : 978-93-344-3054-7

Beyond Boundaries: Redefining Entrepreneurship and Innovation Ecosystems for Sustainable & Inclusive Growth in the Digital Era

Dr. Archana P.V

Assistant Professor,Department of Management Studies

LEAD College, Palakkad, Kerala, India

archana.pv@lead.ac.in

Mr. Arjun K P

Assistant Professor , Department of Master of Computer Applications

LEAD College, Palakkad, Kerala, India

arjun.kollath@lead.ac.in

Dr. Megha P M

Head LEAD- Business Incubator

LEAD College, Palakkad, Kerala, India

dr.megha@lead.ac.in

Abstract

The global entrepreneurship landscape is undergoing unprecedented transformation, driven by digital innovation, sustainability imperatives, and the pursuit of inclusive growth. This comprehensive study analyzes contemporary trends in entrepreneurship and startup ecosystems, examining how digital transformation and sustainability have emerged as core business imperatives. Through systematic analysis of global data from 2019- 2025, we investigate emerging business models, collaborative networks, and their impact on inclusive growth across diverse regions. Our research reveals that 49% of potential entrepreneurs now cite fear of failure as a primary barrier, up from 44% in 2019, while over 50% of entrepreneurs prioritize sustainability over profit maximization.

ISBN : 978-93-344-3054-7

The study encompasses funding patterns, technological adoption rates, and policy frameworks that shape modern innovative ecosystems. Key findings indicate that venture capital investment reached $337 billion globally in 2024, with artificial intelligence capturing 19% of total funding through billion-dollar rounds.

We provide evidence-based recommendations for policymakers, entrepreneurs, and ecosystem builders to foster resilient, diverse, and future-ready innovation communities. This research contributes to understanding how entrepreneurial ecosystems can be restructured to address contemporary challenges while promoting sustainable and inclusive economic development.

Keywords: Entrepreneurship*, Innovation Ecosystems, Digital Transformation, Sustainability, Inclusive Growth, Venture Capital, Startup Funding*

ISBN : 978-93-344-3054-7

AI and Digital Inclusion: Multi-Channel Growth Strategies for Early-Stage eCommerce

Elie Sarkis

PhD Candidate, GBSB Global Business School

elie.sarkis@student.gbsb.global

Abstract

The rapid digital transformation of global markets has changed the ways that businesses may compete to innovate as well as operate. Durable customer acquisition represents a critical challenge confronting nascent eCommerce startups. These ventures confront exceptionally challenging landscapes. Big enterprises and modest firms frequently require large resources, advanced acumen, and wide-ranging infrastructure that conventional expansion strategies require. Artificial Intelligence (AI) critically enables digital inclusion because it lowers these barriers, whilst it provides access to data-driven, scalable, affordable strategies that large enterprises exclusively had within.

This paper explores the contribution of AI to digital entrepreneurship plus its acquisition of customers in early-stage eCommerce. The study examines how startups adopt AI tools throughout multiple digital channels. AI is helpful to business innovation as well as inclusion and also calculated agility, as the study highlights. AI's capacity to create growth opportunities along with inclusive economic development is demonstrated by the focus on emerging markets, notably a Dubai eCommerce brand's early-stage case study.

More academics increasingly do explore the subject of AI's intersection within digital marketing. This crossroads justifies the increased focus. Studies stress AI's potential for personalizing customer adventures as well as optimizing ad performance in addition to improving predictive analytics regarding consumer behavior. Likewise, literature on digital entrepreneurship highlights how agility with innovation matters. The adoption of technology also does matter when startups sustain their competitiveness Gaps, at this moment, still do remain unaddressed. Most prior studies center on big corporations or established eCommerce firms since they neglect distinct obstacles nascent startups encounter.

ISBN : 978-93-344-3054-7

AI's contribution toward digital inclusion has not been sufficiently examined, particularly in enabling smaller businesses in emerging markets to compete with established players, second. Third, the researchers explored the adoption of AI in marketing functions such as content creation or automation. Yet, they have paid little attention to how AI allows multi-channel plans that merge social media, search engines, and chat platforms in one growth model.

By addressing these gaps, this study helps people toward understanding how AI transforms marketing performance and makes digital entrepreneurship inclusive and accessible.

This research uses an embedded single-case study because it closely examines an eCommerce brand launching in Dubai. The case examines the nature of the implementation of AI tools across the scope of digital channels and also multiple functions. The goal was for improved customer acquisition performance now.

Data sources include metrics showing campaign performance like Return on Ad Spend, Cost per Acquisition, click-through rates, observations noting AI integration into workflows, also analysis engaging customers across channels. Because the study stresses depth, contextual understanding, and practical perceptions relevant to startups and emerging-market ecosystems, the study follows principles of interpretive case research.

Startups use digital technologies for growth creating a subtle view so this methodology fits well with dynamics of AI adoption in a resource-constrained environment.

The analysis of the case shows that AI increases digital inclusion plus entrepreneurship within early-stage eCommerce through four key pathways:

Across channels, startups use AI tools to rapidly test and optimize campaigns. These tools do also allow for startups to scale campaigns without them requiring wide-ranging teams or budgets. Startups stay agile within competitive digital ecosystems via predictive analytics plus machine learning models supporting adjustments for ad targeting along with creative optimization.

To gain customers effectively, companies do increasingly need them to be present across social media, search engines, and the conversational platforms. For these multiple digital touchpoints, companies are required to be present.

ISBN : 978-93-344-3054-7

AI eases this integration for it automates content creation as well as streamlines ad management also provides cross-channel perceptions. The case shows how AI-powered systems reduced inefficiencies, and with them, they ensured consistent brand communication as they maximized reach and relevance.

AI makes tools previously for larger corporations accessible via lowered technical as well as financial barriers to advanced marketing strategies. Startups with limited budgets and human capital can be implementing advanced strategies for the targeting and personalization and the engagement. As this levels the playing field in digital markets, early-stage firms are empowered for competing effectively.

Beyond marketing, adopting AI influenced other functions critical to eCommerce growth, for AI chatbots offer customer service with automated responses, recommend products, then forecast inventory. This total integration allowed scaling with better efficiency and provided service like seasoned companies. Customer acquisition with retention were simultaneously improved.

This study underscores just how AI enables technology along with driving inclusion in digital entrepreneurship. AI means a planned resource for new eCommerce startups more than growth's marketing tool across various functions and channels. AI fosters digital inclusion because it lowers entry barriers so that startups can access advanced strategies as they compete globally to contribute to broader economic innovation.

The theory contributes now by a linking of AI and digital entrepreneurship and also digital inclusion within a single framework. The schema stresses firm client procurement. The practical contribution offers up a roadmap that ensures both competitiveness and sustainability for startups in emerging markets to integrate AI effectively across channels.

As digital economies expand, then the implications become even more pronounced. These implications extend far beyond individual firms. Digital inclusion powered by AI, can reshape entrepreneurial ecosystems with innovation in underserved markets, also advance sustainable futures that align with global development goals.

ISBN : 978-93-344-3054-7

Keywords: *AI and digital inclusion; early-stage eCommerce; multi-channel marketing; customer acquisition; AI-driven growth strategies; digital entrepreneurship; emerging markets; marketing automation.*

ISBN : 978-93-344-3054-7

Investors Perception towards SEBI Proposed New Framework Regarding SMEs IPO

Mr. Hem Chandra Bhatt

Research Scholar

Department of Management Studies

Sir J. C. Bose Technical Campus, Bhimtal

drhemchandrabhatt@gmail.com

Prof. Amit Joshi

Professor and Head

Department of Management Studies

Sir J. C. Bose Technical Campus, Bhimtal

amitjoshiaj@gmail.com

Abstract

The current study has tries to analyse the investor's perception on the proposed regulatory framework of the SEBI regarding SMEs initial public offering in India. Both primary and secondary data has been used in the study and consists of a sample of 242 respondents. The perception of the investors has been measured by using nine factors. More than thirty variables have been identified for the same. Such identified factors and variables are connected to the proposed regulatory framework of the SEBI. The study discloses that every studied variable have a positive association with the relative factor. The research has also divulged that the investors have a positive response to the proposed regulatory framework. The study utilized the factor analysis technique. For reliability test Cronbach's alpha has been utilized.

Keywords: *Perception, Initial Public Offering, Factor Analysis, Primary Data, SEBI*

ISBN : 978-93-344-3054-7

Evolving Demands of New E-Marketplaces: Redefining Consumer Behavior, Technology, and Business Models

Kalpana K

Research Scholar

VELS Institute of Science, Technology and Advanced Studies (VISTAS), Pallavaram, Chennai 600117

Kalpanaanu77@gmail.com

Dr. Jayasree Krishnan

Director

Department of Management and Commerce

VELS Institute of Science, Technology and Advanced Studies (VISTAS), Pallavaram, Chennai 600117

jayasree.krishnan@gmail.com

Abstract

With a few exceptions, these dynamics have developed an economy worldwide, environmental challenges, social inequalities, and technological disruptions, forcing a biphasic change in the design, operation, and means of sustaining growth of businesses. This study falls within the framework of sustainability-business transformation, positioning the idea of how organizations can design and adopt models that increase industry competitiveness while also engendering inclusive growth opportunities for all stakeholders into the broader theme. Past strategies to achieve business growth grew from a need for efficiency and profit, but current dynamics have demanded approaches for embedding Environmental, Social, and Governance (ESG) considerations into the core of organizational activities.

ISBN : 978-93-344-3054-7

Sustainability is no longer just a side issue but a matter of strategic importance for resilience, stakeholder trust, and societal wellbeing.

This paper conceptualizes sustainability-driven business transformation rendering it multilateral in nature, involving innovation, responsible leadership, engagement with stakeholders, and adaptive supply-chain strategies; it is developed with two lists of case studies from multinational corporations, Small and Medium Enterprises, and emerging start-up ecosystems that identify critical enablers.

Constructing another theory of inclusive growth meddling much with equity, participation, and shared value creation, this study points in those directions. Different from the classical growth theorizing models that at times put emphasis on a gross, large-scale development occurring in only certain sectors of society, inclusive growth chooses to stress the integration of exclusionary stakeholders, who could be employees, local community members, or consumers of varied socio-economic backgrounds into value-creation processes. Meanwhile, the paper maintains that inclusive business models existing along sustainability strategies create a systemic resilience able to oppose the outright assaults from climate change, global health emergencies, and economic disruptions. Theories like TAM and UTAUT shed light on how consumers accept and bring about change within the digital platform. Consumers wonder about seamless, personalized, and secure online experiences. Sustainability and ethically sourced products becoming influencing factors while buying in line with Maslow's hierarchy of needs (self-actualization through ethical consumption). Trust and transparency backed by data protection become key enablers for long-term loyalty. consumer culture theory (CCT) explains how e-marketplaces construct social identity and hence collective consumption behavior by way of social commerce and community-mediated platforms. Methodologically, with a certain welter of literature on sustainability, policy analysis, and organizational case studies, the research is able to give a substantive empirical base on global surveys and performance measures. The research investigates how the enterprises in divergent sectors are conducting the sustainability-related transformation processes and the extent to which these transformations are associated with financial, social, and environmental impacts.

ISBN : 978-93-344-3054-7

The study concludes by formulating a holistic framework for future design of e-marketplaces, with integrations along the lines of consumer-centricity, technological agility, and sustainable business models. It argues that modern-day needs put forth by an ever-changing digital marketplace cannot be served in isolation but require joint efforts from business entities, regulators, and consumers. It is, therefore, the very rethinking of consumer behavior, strategic use of technology, and business model reconfiguration that ultimately will form the foundation of a resilient, inclusive, and sustainable e-marketplace design in this digital world.

Keywords: *Sustainability, Business Transformation, Inclusive Growth, ESG, Innovation, Circular Economy, Resilience.*

ISBN : 978-93-344-3054-7

AI-Driven Workforce Transformation in Cape Town's Manufacturing SMEs: Navigating Strategic Challenges and Opportunities in a Post-Crisis Economy

Kayla Kim SAMPSON

GBSB Global Business School

kayla.sampson@student.gbsb.global

Abstract

Technological disruption is reshaping economies worldwide, creating both challenges and opportunities for sustainable growth. In post-crisis contexts such as South Africa, high unemployment, persistent skills shortages, and a widening digital divide place particular strain on small and medium-sized enterprises (SMEs) (Muhammad et al., 2025). Within Cape Town's clothing manufacturing sector, an under-researched yet critical contributor to local employment, th integration of Artificial Intelligence (AI) emerges as a potential driver of innovation, resilience, and inclusive workforce development (Babashahi et al., 2024).

This study investigates how AI-driven training and development can transform SMEs by addressing barriers to digital adoption, enhancing workforce performance, and fostering long-term sustainability. Specifically, it seeks to: (1) identify challenges that hinder SMEs in adopting AI-based training solutions; (2) evaluate the influence of AI-driven learning on employee skills and organizational performance; and (3) propose a practical framework to guide SMEs in navigating digital transformation while promoting inclusivity and equity.

While existing literature has largely focused on developed economies and large-scale industries, this research foregrounds the unique realities of SMEs in an emerging economy. Many firms remain uncertain about the return on investment and fear job displacement, while lacking guidance on how to implement AI-based solutions effectively (Kitsios and Kamariotou, 2021). This study addresses that gap by offering context-specific strategies tailored to the needs of South African SMEs, emphasizing digital inclusion and workforce empowerment.

ISBN : 978-93-344-3054-7

The research design employs qualitative multi-case studies across eight to ten SMEs in Cape Town, drawing on semi-structured interviews with SME owners, managers, HR practitioners, AI training experts, and policymakers.

Observations and secondary data complement these insights, with thematic analysis used to identify patterns and build a nuanced understanding of adoption dynamics. The analysis is informed by the Diffusion of Innovations theory, Andersen & Andersen's organizational change model, and the ADDIE model for evaluating training design and impact.

Findings will contribute both theoretically and practically. At a theoretical level, the study extends established models of innovation adoption and workforce transformation to the context of SMEs in developing economies. At a practical level, it will deliver an actionable strategic framework that SMEs can apply to integrate AI into training and development processes, enabling skills upgrading, productivity growth, and long-term competitiveness.

By situating its analysis in the clothing manufacturing sector of Cape Town, this study provides a grounded perspective on how AI can help SMEs overcome systemic barriers and thrive in post-crisis environments. It highlights digital inclusion as a critical pathway for sustainable innovation, offering insights relevant to policymakers, educators, and business leaders committed to building future-ready workforces.

Keywords: *AI-driven training, SMEs, workforce transformation, digital inclusion, South African manufacturing*

ISBN : 978-93-344-3054-7

HR Assessment Using AI

Miss. Chavan Sandhya

Department of AIML, Sanjivani University, Kopargaon

sc3094152@gmail.com

Miss. Gaikwad Payal,

Department of AIML, Sanjivani University, Kopargaon

Miss. Shelke Supriya

Department of AIML, Sanjivani University, Kopargaon

Miss. Bhaladand Vaishnavi

Department of AIML, Sanjivani University, Kopargaon

Abstract

This will enable a more effective way to shortlist submitted candidate CVs from a large number of applicants, providing a consistent and fair CV rating policy, which can be legally justified. system will rank the experience and key skills required for a selected task position. Then system will rank the CVs based on the resume details, student hobbies, strengths, weaknesses, or system conducts 15 to 16 questions for personality prediction, experience, and other key skills which are required for a particular job profile. This system will help the HR department to easily shortlist the candidate based on the CV ranking policy. This system will focus not only on qualification and experience but also on other important aspects which are +required for a particular job position. This system will help the human resource department to select the right candidate for a particular task profile which in turn provides an professional staff for the employer. Candidate here will register him/herself with all details. Candidate can also fill an online form in that resume details, hobbies, strengths, weakness, or 15 to 16 analysis questions. After completing this, the system shortlists top candidates and auto-mails them. It also presents the work done result of the employee to the supervisor who evaluates the top employees based on work efficiency.HR adds criteria like personality required, roles, and responsibilities, and the system examines automatically if candidates fit these criteria.

ISBN : 978-93-344-3054-7

The system conducts a personality prediction test analyzing Openness (O), Conscientiousness (C), Extraversion (E) Agreeableness (A) and Neuroticism (N).

Finally, it offers the results of the candidates to the recruiter.AI technologies offer significant opportunities to improve HR functions, finding the right information with lower costs in less time, and securely, building momentum step by step, starting with recruitment.

Keywords: *AI-based HR assessment; automated CV ranking; personality prediction; recruitment automation; candidate shortlisting; HR analytics; skill matching; AI in human resources.*

ISBN : 978-93-344-3054-7

Analysis of the efficacy of content quality and personalisation over content frequency on the performance of E-Commerce outfits: A case study of the E-Commerce eco-system in Ibadan, Nigeria.

Oluseyi Ajayi

Department of Marketing and Consumer Studies

Faculty of Economics and Management Sciences

University of Ibadan

seyican.doit@gmail.com / oluseyi.ajayi@ui.edu.ng

Kelechi Emma Chikezie

Department of Executive and Entrepreneurship Education

University of Ibadan School of Business

University of Ibadan

kelechiechikezie@gmail.com

Uche L. Ozoh

Department of Marketing and Consumer Studies

Faculty of Economics and Management Sciences

University of Ibadan

Uchelilian28@gmail.com

Abstract

Content marketing is the creation and distribution of relevant, valuable brand-related content to customers, as well as other target groups, such as job seekers, employees, or investors, through digital platforms or print media to drive strategic business objectives. Compared with traditional marketing, which is used to persuade a population segment to take a specific action, content marketing focuses on adding value to their lives, such as educating, solving problems, entertaining, or informing rational decisions. Content marketing has therefore gained prominent globally as it is used to advertise products. The Advertisement of products, either goods or services, have in recent times, undergone ground-breaking transformations.

ISBN : 978-93-344-3054-7

What was once predominantly a feature of television and radio stations, newspapers and magazines have now migrated to the world wide web; the internet.

This dissemination of valuable information on products via the internet, designed to attract, engage and retain customers, referred to as content marketing has become a major if not the major means of advertisement employed by businesses and persons with investments soaring globally. Content marketing strategies utilised by businesses include content frequency which refers to how often posts are made, content personalisation which refers to the crafting of social media posts to suit the individual preferences of potential customers and content quality which refers to the relevancy and overall value of posts. This study aims to assess the efficacy of these three strategies in the determination of the outcome of e-commerce performance using the Ibadan e-commerce eco-system as a reference point. This study utilised a self-administered Likert-scale survey as a data collection instrument to investigate content marketing strategies, start-up outcomes, and the influencing factors associated with these elements. The data collection process took place over four weeks. A total of 362 respondents participated in the study, which utilized regression and correlation analysis via SPSS to analyze the data. The demographic results shows that Ibadan e-commerce start-up ecosystem is predominantly driven by young adults in their late twenties to mid-thirties, also, majority of respondents are relatively new to the industry, which may influence their perceptions of content marketing strategies, and the distribution indicated that the data captures insights from both strategic decision-makers and key operational personnel. The findings revealed that content quality significantly and positively affects start-up performance ($B = 0.220$, $\beta = 0.316$, $p < .001$). Additionally, the correlation analysis reported a moderate, statistically significant relationship between content quality and start-up performance ($r = .349$, $p < .001$). High-quality content, characterized by clarity, relevance, accuracy, and value, not only attracts customers but also fosters trust and credibility (Holliman & Rowley, 2014). This result aligns with earlier findings by Lee and Hong (2016), who demonstrated that content quality is a critical factor in building brand reputation and increasing customer retention. Given that e-commerce operates in a highly competitive and content-saturated environment, start-ups that consistently produce well-crafted and informative content are more likely to stand out and achieve better performance metrics, including sales growth, brand loyalty, and customer acquisition.

ISBN : 978-93-344-3054-7

Also, the findings shows that content personalization has a significant and positive influence on start-up performance (B = 0.241, β = 0.305, p < .001). This finding confirms the hypothesis that tailoring content to customer preferences contributes meaningfully to business success.

Content personalization enhances customer experience, builds brand loyalty, and encourages repeat engagement (Chaffey & Smith, 2017). It reflects the shift toward customer-centric marketing, where businesses leverage data analytics to deliver personalized messages and product recommendations (Kumar et al., 2013). This study's findings support the view that personalization fosters deeper customer relationships and drives performance, particularly in the dynamic e-commerce space. The result also aligns with Statista (2023), which reported that 80% of consumers are more likely to purchase from a brand that offers personalized experiences. Likewise, the analysis revealed that content quality significantly and positively affects start-up performance (B = 0.220, β = 0.316, p < .001).

Additionally, the correlation analysis reported a moderate, statistically significant relationship between content quality and start-up performance (r = .349, p < .001). High-quality content, characterized by clarity, relevance, accuracy, and value, not only attracts customers but also fosters trust and credibility (Holliman & Rowley, 2014). This result aligns with earlier findings by Lee and Hong (2016), who demonstrated that content quality is a critical factor in building brand reputation and increasing customer retention. Given that e-commerce operates in a highly competitive and content-saturated environment, start-ups that consistently produce well-crafted and informative content are more likely to stand out and achieve better performance metrics, including sales growth, brand loyalty, and customer acquisition. The study recommends that Start-ups should invest in technologies and strategies that allow them to personalize content for their target audiences. By leveraging customer data, such as preferences, behavior, and demographics, start-ups can tailor their content to meet customer needs, thereby improving engagement, customer loyalty, and ultimately, performance. Also, rather than emphasizing the quantity of content posted, start-ups should prioritize producing high-quality, relevant, and informative content. This will help to build credibility, trust, and long-term relationships with customers, leading to enhanced performance in the marketplace. The findings of our research have certain practical implications for managerial, business, and policy considerations.

ISBN : 978-93-344-3054-7

In an emerging economy like Ibadan, Nigeria, this study establishes that content personalization and content quality are vital predictors of start-up performance in the Ibadan e-commerce sector, while content frequency alone is insufficient. These findings provide critical insights for start-up founders and marketers seeking to optimize their content marketing strategies to drive performance. Therefore, start-ups in the Ibadan metropolis can benefit from focusing on content that is personalized to target audiences and of high quality to build customer trust and engagement.

Keywords: *Content quality; content personalization; content frequency; e-commerce performance; digital marketing strategies; start-up ecosystem in Ibadan; customer engagement; content marketing effectiveness.*

ISBN : 978-93-344-3054-7

Artificial Intelligence in Human Resource Management: Balancing Data-Driven Insights and Human Judgment in Performance Evaluation

Dr. George Kassar

Ascencia Business School, France

gkassar@ascencia-bs.com

Abstract

The rapid adoption of artificial intelligence (AI) across industries has transformed organizational practices, with human resource management (HRM) being one of the most active areas of experimentation. From recruitment to performance evaluation, AI has promised efficiency, scalability, and objectivity.

In recent years, this trend has accelerated with the expansion of affordable and easily accessible AI tools that have entered the market following the success of OpenAI's ChatGPT and other large language model–based generative systems. These technologies have lowered the barriers to adoption, enabling not only large corporations but also small and medium-sized enterprises to integrate AI into their operations.

The democratization of AI has intensified its strategic relevance within many business functions, namely in HRM: organizations can now deploy advanced tools for recruitment and performance evaluation at scale and at relatively low cost. As a result, AI is no longer a niche or experimental asset but a mainstream driver of business innovation and strategic transformation.

Despite ongoing debate and criticism, relatively significant progress has been achieved in recruitment processes, where algorithms can efficiently screen thousands of applications. This technological advance has contributed to the democratization of hiring process by streamlining access to candidates' profiles and optimizing efficiency in preliminary selection stages.

By contrast, the application of AI in performance management raises challenges that extend well beyond technical considerations. Performance assessment involves subjective and relational dimensions, such as creativity, collaboration, behavioral growth, and contextual factors. These factors may resist reduction to simple standardized metrics.

ISBN : 978-93-344-3054-7

Overreliance on algorithmic systems risks narrowing performance to what can be quantified, leading employees to "game the system" rather than focus on meaningful outcomes. Moreover, automated evaluations may undermine trust, generate perceptions of unfairness, and erode morale, particularly when employees feel reduced to data points rather than recognized as individuals.

Cases from early adopters highlight that, in the absence of managerial interpretation, algorithmic monitoring can foster stress, disengagement, and a climate of suspicion rather than improvement.

This paper argues that AI can contribute positively to HRM and organizational transformation only if integrated with human judgment, ethical safeguards, and transparent governance. The role of managers remains irreplaceable in contextualizing algorithmic outputs, recognizing invisible contributions, and maintaining the relational dimension of performance evaluation.

This paper adopts a conceptual and critical review approach, drawing on existing literature and documented organizational practices to analyze the role of AI in performance management and provide a comprehensive assessment of current practices and their implications for business innovation and strategy.

Keywords: *AI in HRM; performance evaluation; data-driven decision-making; human judgment; algorithmic fairness; organizational transformation; ethical HR practices; AI–human collaboration.*

ISBN : 978-93-344-3054-7

AI - Driven Automated Security Testing for Web and Mobile application

Mr.Pankaj Ashok Dhakate

PhD Sacholar

pankajdhakate11@gmail.com

Suraj Baburao Pawar

Student

pawarsuraj9900@gmail.com

Abhishek Ishwarsinh Shengar

Student

abhishekshengar@gmail.com

Yogeshwar Nandu Mojad

Student

yogeshwar11m@gmail.com

Tejas Rajendra Shende

Student

tejas056shende@gmail.com

Abstract

The rapid evolution of digital ecosystems has dramatically reshaped the ways in which individuals, organizations, and governments interact with technology. Web and mobile applications now form the foundation of critical services such as online banking, e-commerce, digital healthcare, e-governance, and cloud-based collaboration. While these applications have enhanced efficiency and convenience across sectors, they have also become repositories of sensitive personal, financial, and healthcare information. This dual role of enabling services and safeguarding data has elevated application security to one of the most pressing challenges of the digital age.

ISBN : 978-93-344-3054-7

The widespread reliance on such applications has expanded the attack surface for malicious actors, leading to a growing number of data breaches, account takeovers, ransomware incidents, and exploitation of application-layer vulnerabilities.

Cyber adversaries continue to innovate, employing increasingly sophisticated attack techniques that exploit weaknesses in application logic, authentication mechanisms, and misconfigurations. Reports from industry experts consistently show that the majority of modern cyberattacks are directed at web and mobile application layers rather than at traditional network infrastructure. These realities underscore the urgency of implementing robust, adaptive, and intelligent approaches to application security testing.

Conventional methods of application security assurance—such as manual penetration testing, static code analysis, and periodic vulnerability assessments—offer important insights but are increasingly inadequate in today's agile development landscape. Manual penetration testing remains invaluable for uncovering complex, context-specific flaws, yet it is resource-intensive, expensive, and constrained by the availability of skilled experts. Static code analysis tools can identify certain classes of issues but lack the capability to capture dynamic runtime behaviors that are exploited in practice. Automated scanners have provided some relief, yet they suffer from critical drawbacks such as excessive false positives, poor contextual prioritization, and limited adaptability to emerging attack vectors. Moreover, traditional approaches often operate in silos and are poorly integrated with modern DevOps workflows, creating friction in environments where rapid and continuous software delivery has become the norm. The rise of DevSecOps, which emphasizes embedding security into every phase of the software development lifecycle, requires testing solutions that are not only accurate and efficient but also continuous, automated, and compatible with CI/CD pipelines.

The research presented here addresses this gap by proposing and developing an AI-driven automated security testing framework tailored for both web and mobile applications. The vision of the framework is to combine the scalability of automated vulnerability scanners with the intelligence of AI-based analysis, thereby reducing false positives, improving prioritization, and delivering actionable insights. The system is designed to serve both technical users, such as security analysts and developers, and non-technical stakeholders, such as project managers, by providing results that are both technically rigorous and easily interpretable.

ISBN : 978-93-344-3054-7

The framework is also lightweight and API-driven, ensuring seamless integration with existing development pipelines and supporting the principle of "shift-left" security, where vulnerabilities are identified and remediated early in the lifecycle.

The framework follows a layered architecture. At its core, it leverages the OWASP Zed Attack Proxy (ZAP), an established open-source dynamic application security testing tool capable of identifying common yet critical vulnerabilities such as SQL injection, cross-site scripting, authentication flaws, and misconfigurations. ZAP is deployed in daemon mode to allow full programmatic control via its REST API, enabling automation of scan initiation, progress monitoring, and results retrieval. A backend service, implemented in Python using Flask and alternatively tested in Node.js with Express, acts as the orchestrator. It provides endpoints for initiating scans, retrieving results, and maintaining a history of scans for longitudinal analysis.

The backend is also responsible for invoking the AI-driven analysis module, which represents the novel contribution of this research.

The AI-driven module processes raw scanner outputs to enhance their accuracy and relevance. It employs filtering techniques to remove duplicate or redundant alerts, reclassifies findings into categories of high, medium, and low severity, and generates contextual remediation recommendations. By doing so, it reduces the overwhelming number of alerts that are typical of unprocessed scanner outputs and helps teams focus their attention on the most critical vulnerabilities. This not only improves the reliability of assessments but also mitigates analyst fatigue. To complement this intelligence, a React.js and Tailwind CSS-based dashboard was developed to provide a user-friendly interface. Through the dashboard, users can initiate scans by entering target URLs, monitor scan progress in real time, and visualize results through interactive charts, severity distributions, and detailed reports. The dashboard further includes historical tracking capabilities that enable organizations to monitor recurring vulnerabilities, measure the effectiveness of patches, and plan long-term security strategies.

The system was validated using deliberately vulnerable test environments such as Damn Vulnerable Web Application (DVWA), OWASP Juice Shop, and TestPHP.vulnweb.com. These testbeds provide realistic attack scenarios in safe, controlled environments.

ISBN : 978-93-344-3054-7

Experiments demonstrated that the framework could complete scans of medium-sized applications—typically consisting of twenty to thirty pages—within an average of five to seven minutes, a performance level suitable for integration into CI/CD pipelines. Critical vulnerabilities including SQL injection, cross-site scripting, broken authentication, insecure direct object references, and security misconfigurations were consistently identified across the test environments, confirming the reliability of the detection engine. More importantly, the AI-driven analysis reduced false positives by approximately twenty to twenty-five percent compared to raw ZAP outputs, thus enhancing the practical utility of the results. The React-based dashboard was shown to be highly effective in improving usability, as non-technical stakeholders were able to quickly grasp the severity and distribution of vulnerabilities, facilitating better communication and decision-making between security and development teams.

The implications of these findings are significant. The framework demonstrates that integrating AI-driven intelligence into automated security testing pipelines can meaningfully enhance both accuracy and efficiency. By embedding such a system into DevSecOps workflows, organizations can reduce costs associated with manual testing, shorten the time required to detect and remediate vulnerabilities, and improve overall security posture. The use of open-source tools further makes the approach cost-effective and accessible, while the dashboard ensures usability across diverse user groups. This balance of automation, intelligence, and usability represents a step forward in addressing the long-standing limitations of traditional security testing methods.

In conclusion, the research establishes that AI-driven automated security testing frameworks can provide a scalable, accurate, and actionable approach to safeguarding web and mobile applications. The contributions of this work can be summarized as threefold: the automation of repetitive testing tasks, the application of AI to reduce false positives and prioritize risks, and the delivery of user-friendly, actionable insights through intuitive visualization. Future work will extend the framework's capabilities in several directions. One area of focus will be enhancing support for mobile application runtime testing, including analysis of permissions, API calls, and platform-specific vulnerabilities.

ISBN : 978-93-344-3054-7

Another avenue involves the integration of advanced machine learning models trained on large-scale vulnerability datasets to predict emerging threats and zero-day vulnerabilities. The deployment of the framework as a cloud-based Software-as-a-Service (SaaS) platform will also be explored, with the goal of offering organizations scalable, on-demand security testing solutions. Finally, incorporating explainable AI techniques will improve transparency, enabling security teams to understand the reasoning behind the system's classifications and prioritizations. Together, these advancements will ensure that security testing evolves in tandem with the growing sophistication of cyber threats, making web and mobile applications more resilient and secure in the face of an ever-changing digital landscape.

Keywords: *AI-Driven Security Testing, Automated Vulnerability Analysis, Web Application Security, Mobile Application Security, False Positive Reduction, OWASP ZAP, DevSecOps, Continuous Security*

ISBN : 978-93-344-3054-7

Digital Financial Inclusion and Household Economic Well-Being in India

Sandhya Kalale Srinivas
Christ University
sandhya.srinivas@christuniversity.in

Abstract

The study examines the role of digital economic inclusion (DFI) in improving the economic well-being of Indian families, with the main emphasis on the media's support and mediation role. DFI has changed access to financial services by taking advantage of digital platforms, including mobile banking, digital wallet, and Aadhaar accounts. However, the success of the government's initiatives, such as Pradhan Mantri Jan Dhan Yojana (PMJDY) and Unified Payment Interfaces (UPI), promotes financial literacy and digital use. The study aims to analyze the effect of DFI on important economic practices such as savings, investment, and dependence on formal financial services, and determine how the government's support affects these results. A quantitative function is used, which has examination data from both urban and rural houses in India. Statistical analysis, reliability, remorse, correlation, testing of KMOs and Bartlett's, including T-tests and arbitration models, will be used to determine the direct and indirect effects of DFI on domestic economic stability. Governments and financial institutions are estimated to help develop more successful efforts for digital inclusion. The purpose of the study is to bridge the existing intervals and contribute to a more uniform economic ecosystem in India by examining the slices between DFI, state support, and family-economic behavior.

Keywords: *Digital Financial Inclusion, Government Support, and Initiatives (PMJDY, UPI, Aadhaar-linked Banking, Digital Wallets, etc.), Indian Households' Financial Behaviors (Saving and Investment), Financial Literacy.*

ISBN : 978-93-344-3054-7

Enabling Business Innovation Through Management Accounting - A Preliminary Study

Ms. Suzanne Wallbank

GBSB Global Business School

suzanne.wallbank@student.gbsb.global

Dr. Alessandra Theuma

Higher Colleges of Technology, UAE

stheuma@hct.ac.ae

Abstract

Innovation has long been recognised as a critical success factor and is regarded as an enabler of competitive advantage and driver of organisational performance (Drucker, 1985; Huang, 2023; Porter, 1990; Schumpeter, 1934; Tidd & Bessant, 2020). Organisations strive to leverage both financial and non-financial information to foster innovation and support strategic decision-making (Ombai et al., 2024). Within this shifting landscape the role of the management accountant has evolved beyond cost determination and control to include forward-looking activities that contribute towards strategy formulation and implementation (Coombs et al., 2005).

Research on how management accountants actively enable innovation remains limited, particularly in small, resource-constrained environments, such as Maltese manufacturing firms. These firms often face challenges related to economies of scale, access to capital and the agility to compete internationally. Understanding how management accounting practices can be mobilised to facilitate innovation in such settings is, therefore, critical.

This preliminary study investigates how the management accountant's function contributes to business innovation processes. Initial findings offer insights into how accounting practices can support organisations and transform ideas into actionable strategies with practical implications.

The Resource Based View (RBV) positions organisational resources and capabilities as central to sustaining competitive advantage (Barney, 1991). Within this perspective, the management accounting function can be understood as a strategic resource that enables firms to mobilise information, evaluate opportunities, and manage risks in support of innovation.

ISBN : 978-93-344-3054-7

The emphasis on 'dynamic capabilities' highlights the importance of not only possessing resources, but reconfiguring them to rapidly respond to changing environments (Teece, 2007).

The Diffusion of Innovations (DOI) theory complements the RBV of the firm by examining how new technologies and innovative practices are adopted within organisations (Rogers, 1962). DOI provides insight into ways management accountants act as mediators of innovation adoption. Together, RBV and DOI frame accountants both as strategic resources and agents of adoption.

The preliminary study explores the evolving role of management accountants in enabling business innovation within Maltese manufacturing organisations. Specifically, it:

1. Examines how management accounting practices contribute to the development and implementation of innovation strategies;
2. Identifies the tools and techniques employed by management accountants to support innovative outcomes;
3. Provides preliminary evidence of how management accountants act as strategic partners in fostering organisational transformation and innovation.

The study adopts a qualitative exploratory design to investigate how management accountants enable innovation within Maltese manufacturing firms. Guided by an interpretivist philosophy, data was collected through semi-structured interviews carried out with management accountants. This approach allows respondents to share their perceptions and experiences related to the tools and practices which are adopted to support innovation outcomes within organisations (Creswell & Poth, 2018). Six participants were selected using purposive and snowball sampling, based on criteria such as company size and industry segment (Stratton, 2024). Data was analysed using thematic analysis, supported by NVivo software to identify recurring patterns and themes. The analysis involved iterative coding, moving from open to thematic categories.

ISBN : 978-93-344-3054-7

Participant ID	Industry Sector	Number of Employees	Job Title	Years of Experience	Involvement in Innovation Initiatives
Participant 1	Food and beverage	800	Finance manager	12	High – actively involved in new product costing and budgeting
Participant 2	Electronics	350	Senior management accountant	12	Moderate – supports process improvement projects
Participant 3	Plastics and Packaging	400	Senior accountant	7	High – strategic role in technology adoption
Participant 4	Pharmaceuticals	500	Financial controller	10	Moderate – involved in resource allocation decisions
Participant 5	Toys	900	Management accountant	5	Low – limited to reporting functions
Participant 6	Furniture	80	Finance manager	4	High – contributes to sustainability innovation projects

Table 1: Descriptive statistics of the interviewees

The findings show that management accountants in Maltese manufacturing firms play a critical strategic role. They contribute to organisational decision-making by aligning financial insights with innovation goals. Evidence suggests that accountants act as internal advisers who help managers evaluate opportunities, balance risks and support the implementation of new ideas. “We used to be more reactive - like, reporting numbers after decisions were made. Now, we’re expected to be more proactive” (Participant 1). This illustrates the proactive dimension of their role in shaping innovation.

The study highlights that accounting tools such as budgeting systems, forecasting techniques, and performance metrics are being adapted to fit the needs of innovation projects. For example, traditional budgets are reconfigured to allow for experimentation and flexibility, while forecasting is used to assess the viability of new initiatives. These practices enable organisations to allocate scarce resources more effectively while still pursuing innovation. “We help by analysing the costs and benefits of new projects, securing funding where needed, and making sure we have the right KPIs” (Participant 4). This reflects how core management accounting tools are adapted in innovation contexts demonstrating support for responsiveness and renewal.

Early insights also show that management accountants play a role in mediating how innovative practices and technologies are adopted within SMEs. Interpreted through DOI theory, accountants act as change agents, shaping the diffusion of new ideas across the firm.

ISBN : 978-93-344-3054-7

This emphasises their role not only in financial stewardship but also as enablers of organisational transformation. “Whenever we introduce a new system, we make sure employees understand why the change is happening and… how it benefits them. For example, when we implemented automated inventory tracking, there was some pushback… but over time, the resistance faded” (Participant 5). This highlights how management accountants act as agents of change by reducing uncertainty and dealing with resistance to change, thereby facilitating the adoption of innovative practices.

The understanding gained has broader implications and highlights the importance of integrating the management accountant into innovation processes. These findings stress the need for equipping accountants with innovation-oriented skills. The study contributes to theory by showing how RBV and DOI frame accountants as resources and facilitators of adoption.

This study establishes a solid foundation for more extensive research on the mechanisms through which management accountants contribute to organisational innovation with potential future research related to how accounting functions contribute to the diffusion of innovative practices in resource-constrained environments.

Overall, the research shows that management accountants in Maltese firms act as strategic partners by adapting tools and facilitating adoption, extending their role beyond stewardship. Interpreted through the RBV, management accountants emerge as valuable organisational resources, while the DOI perspective highlights their role as internal facilitators of adoption.

These insights emphasise the importance of equipping management accountants with innovation-oriented skills and embedding them in strategic processes. The study lays important groundwork for future research into how accounting functions contribute to innovation and competitiveness in resource-constrained environments.

Keywords: *Innovation, Organisational Transformation, Strategic Decision-Making, Management Accounting, Resource-Based View, Diffusion of Innovations.*

ISBN : 978-93-344-3054-7

A Conceptual Framework of IT Recruitment and Sustainable Futures: Artificial Intelligence in Human Resource Management.

T. Kayalvizhiroja

Vels Institute of Science, Technology, and Advanced Studies

kayalvizhirojaphd@gmail.com

Dr. Jayasree Krishnan

Vels Institute of Science, Technology, and Advanced Studies

directormba@vistas.ac.in

Abstract

The Information Technology (IT) industry is one of the most competitive fields in contemporary recruitment, where companies in both developed and developing countries are grappling with extreme challenges in accessing and maintaining talented employees. As business practices are moving very fast with digital transformation, IT professionals have become increasingly in demand at a rate that surpasses their supply, leading to global talent shortages and accelerated employee turnover. Manual screening, personal networking, and subjective recruiting are traditional methods that have been increasingly criticized as inefficient, lacking in transparency, and open to bias. In this respect, the importance of recruitment has not only transformed into a strategic need but also into a tactical issue, since the capacity to obtain suitable talent has a direct connection to the sustainability of the organization and its long-term competitiveness. To overcome these problems, Human Resource Management (HRM) has resorted more to Artificial Intelligence (AI) as a disruptive technology that can change the recruiting process. AI-powered systems have strengths, such as automated operations to handle repetitive processes, i.e., resume processing, scheduling interviews, predictive analytics to identify the fit between candidates and jobs, and explainable decision-making to improve fairness and trust. The introduction of AI in IT recruitment has thus been identified to not only bring about efficiency in operations but also to enhance diversity of the workforce, fairness, and sustainable HRM practices.

ISBN : 978-93-344-3054-7

This theoretical work creates a framework for how AI-powered recruitment systems can turn IT recruiting processes into processes that can contribute to long-term organizational sustainability. Conducting a literature synthesis of HRM, AI adoption, and sustainability literature, the framework identifies four main AI capabilities in the recruitment process, such as efficiency, quality of hire, bias reduction, and transparency. The AI feature of reducing time-to-hire and administrative expenses contributes to efficiency, whereas the quality of hire is maximized thanks to the data-driven matching of competencies of a candidate to job specifications.

Reduction of bias is one of the core benefits, and as AI can help reduce the effects of human unconscious bias, it leads to diversity and inclusiveness within the workforce. Explainable AI models also create trust between recruiters and applicants because they ensure transparency, which explains how decisions related to hiring are formed. However, such results are not predetermined. The framework has found the following to be the key mediating variables: recruiter trust, organizational preparedness, and perception of fairness by the candidate. Recruiters should view AI as a supplement, not a threat to their professional functions. Organizations need to be digitally mature and have leadership willing to embrace AI, and the applicants need to sense that AI-based recruitment processes are just transparent and respectful. These socio-technical relations highlight that the adoption of AI does not simply represent a process of technological change, but a cultural and governance change that instills within the organization and its culture.

It is also highlighted in the extended abstract that short-term efficiency gains are valuable, but the real worth of AI in recruiting is how it contributes to long-term sustainability in business. The recruitment process can be enhanced with the help of AI, which can provide higher accuracy in the person-job fit and thereby decrease the turnover and the expenses that it involves. It also promotes the diversification of the workforce by reducing bias, meeting the wider social agenda, including the Sustainable Development Goals (SDGs), and improving the organizational reputation as a socially responsible employer.

ISBN : 978-93-344-3054-7

Moreover, the implementation of AI can be used to drive strategic alignment, encompassing the principles of sustainability in the talent management practices and place the organization in the position of competitive advantage in an ever-more digital economy that prioritizes inclusivity, transparency, and ethical accountability.

The paper makes various contributions to the literature by offering this coherent conceptual framework. To begin with, it combines the fragmented knowledge of HRM, AI, and sustainability research into a consistent model that describes how recruitment practices can be technologically sophisticated and socially accountable at the same time. Second, it emphasizes the role of mediating variables, the perception of trust, readiness, and fairness in predicting the results of AI adoption, and organizations should keep in mind that the use of technology does not allow achieving fairness and sustainability on its own. Third, it theorizes the concept of AI recruitment as belonging to a socio-technical system, in which the human, organizational, and technological aspects need to be aligned to achieve transformative results. The given framework promotes future empirical studies to confirm and place these relationships within the context of various industries and regions, exploring the role of differences in organizational culture, digital infrastructure, and the state of labor markets in influencing the success of AI-based recruitment.

Finally, the abstract suggests that AI in recruitment cannot be regarded as a means of operational optimization but rather as the source of business change. Conscientious application of AI can create trust, inclusiveness, and transparency, and promote sustainability in the workforce in the long term.

In the case of the IT industry, where talent demand still surpasses the supply, AI-based hiring provides an opportunity for the organization to be competitive, resilient, and socially responsible. The study emphasizes how AI can influence the future of hiring by repacking it as a strategic and sustainable process, and the future of the workforce in general.

Keywords: *Artificial Intelligence, HRM, IT Recruitment, Efficiency, Transparency, Bias Reduction, Sustainable HRM, Business Transformation*

ISBN : 978-93-344-3054-7

Strategic Purpose as Governance-in-Use: Operationalizing Foresight, Formalization, and Digital Rails for Agility in Capital Market Infrastructure

Ulrica Burden

GBSB Global Research Centre

ulrica.burden@student.gbsb.global

Abstract

1. Introduction

Considering increasingly volatile regulatory environments and heightened institutional demands for transparency and accountability, the articulation of strategic purpose must evolve from abstract rhetoric to embedded governance infrastructure. This study proposes a falsifiable theory of strategic purpose conceptualized as governance-in-use, operationalized through three interlocking mechanisms: Foresight Quality Structures (FQS), Governance Formalization (GF), and Digital Rails Infrastructure (DRI). Grounded in the literatures on dynamic capabilities, scenario planning, and algorithmic accountability, this framework is tested across multiple real-world cases in capital market infrastructure. Using a hybrid methodology, mechanism coding and interrupted time series (ITS) regression, the study explores how governance architectures influence Strategic Innovation Throughput (SIT), thereby contributing a novel mechanism-based explanation of purpose enactment.

Strategic purpose, here, is treated as a system of traceable and contestable routines, embedded in foresight processes, formalized decision rights, and telemetry-aware digital systems. This conceptualization responds to a growing scholarly concern regarding the limitations of disclosure-led or culturally anchored governance models in managing complexity, reversibility, and compliance in financial systems.

The proposed theory posits that the joint presence of FQS, GF, and DRI mechanisms predicts a reduced declaration-enactment gap (DEG), increased purpose alignment index (PAI), and higher SIT, with greater agility and operational scale.

ISBN : 978-93-344-3054-7

2. Literature Review and Theoretical Framework

Existing literature increasingly challenges the sufficiency of governance models based on intent, culture, or disclosure alone, particularly under the structural complexity and technological demands of contemporary finance (Aguilera et al., 2008; Clarke, 2020). This study draws on three theoretical domains to construct its conceptual model.

First, dynamic capabilities theory underpins Governance Formalization (GF), treating it as a firm-level ability to structure decision rights, incentive alignment, and escalation pathways in a way that supports strategic responsiveness (Teece, 2007; Zollo & Winter, 2002).

Second, Foresight Quality Structures (FQS) are grounded in scenario-based foresight theory, emphasizing scenario diversity, leading indicators, and reversibility as design features enabling organizations to anticipate and respond to environmental uncertainty (Schoemaker, 1995; Ramirez & Wilkinson, 2016).

Third, the concept of Digital Rails Infrastructure (DRI) draws from literature on telemetry ethics and algorithmic accountability (Mitchell et al., 2019; NIST, 2023). DRI incorporates features such as policy-as-code, lineage tracking, rollback systems, and telemetry-enabled KPIs to make governance not only declarative but also computationally enforceable and auditable.

This theory asserts that co-presence of FQS, GF, and DRI yields a consistent pattern of reduced DEG, increased PAI, and enhanced SIT, with added reductions in cycle time (CT). This joint empirical pattern provides falsifiability: alternative models privileging transparency, incentives, or culture lack the explanatory power to replicate the full outcome set.

Moderators such as institutional stringency, environmental volatility, and telemetry maturity are introduced to account for variance in outcome strength and observability (Scott, 2014; Ansell & Gash, 2008). The framework thus contributes to the literature on strategic governance by bridging institutional theory, dynamic capabilities, and digital infrastructure into a portable model for operationalizing purpose.

ISBN : 978-93-344-3054-7

3. Methodology

This study adopts a critical-realist epistemology, recognizing that governance mechanisms are embedded within socio-technical systems yet observable through publicly available artifacts. The research design follows a hybrid abductive-to-deductive logic, combining qualitative mechanism coding with quantitative Interrupted Time Series (ITS) regression analysis to explore the relationship between governance design and strategic innovation throughput (SIT).

Five case studies were purposively selected based on the following criteria:

A publicly dated go-live or pilot event signalling a governance-related intervention. Availability of at least one operational performance indicator plausibly influenced by governance mechanisms (assets under management [AUM]). Citable documentation presents one or more mechanisms; Foresight Quality Structures (FQS), Governance Formalization (GF), and Digital Rails Infrastructure (DRI).

A structured coding rubric was applied independently by two raters to assess mechanism presence. Quantitatively, ITS regression was used to evaluate level and slope changes in Franklin Templeton's AUM around the May 2025 intervention date. Placebo regressions and window sensitivity analyses supported internal validity.

Meta-inference from non-telemetry cases was employed to assess explanatory consistency of the mechanisms across diverse governance contexts.

A key limitation is the lack of consistent real-time telemetry across cases, which constrains direct observation of declaration–enactment gaps (DEG) and purpose alignment (PAI). However, triangulated evidence from multiple cases enhances robustness. The study relies solely on public data and required no ethical review.

4. Anticipated Results and Preliminary Insights

Preliminary results from ITS regression suggest a statistically significant increase in Franklin's AUM following the May 2025 governance intervention, consistent with the model's prediction of SIT growth under GF and DRI conditions. Placebo regressions produce no spurious effects, reinforcing causal plausibility.

ISBN : 978-93-344-3054-7

Mechanism-only cases such as DTCC Smart NAV and the DTCC-Citi PoC reinforce internal model coherence. Although lacking operational telemetry, these cases substantiate the architectural preconditions theorized to influence SIT. The DASCP Pilot, which shows strong alignment with all three mechanisms, further supports the model's cross-contextual applicability.

Collectively, these cases suggest that mechanism-dense architectures, particularly those working in environments with strong institutional and telemetry accountability, are likely to prove reduced DEG, increased PAI, and accelerated SIT. These insights offer promising avenues for refining the model and extending its application in adjacent domains, such as ESG and AI governance.

5. Practical and Theoretical Implications

Practically, this research provides a replicable blueprint for governance reform in financial institutions. The mechanism model enables regulators and practitioners to evaluate governance not only in terms of disclosure or compliance but in terms of executable design.

Theoretically, the paper advances the conversation on strategic purpose by offering a falsifiable, empirically grounded alternative to cultural or intent-based governance narratives. It contributes a portable and scalable model applicable to high-complexity, regulated environments.

6. Originality and Innovation

This study proposes a novel governance model that specifies the routines and infrastructures necessary to operationalize strategic purpose. It introduces telemetry ethics, scenario foresight, and governance formalization into a falsifiable theory confirmed through mixed methods and real-world applications.

By illustrating how strategic alignment and innovation throughput can be engineered via integrated governance mechanisms, the study bridges academic theory and institutional practice.

ISBN : 978-93-344-3054-7

7. Conclusion and Future Research

This paper conceptualizes strategic purpose as a set of interdependent, operationally embedded mechanisms. It demonstrates that the co-presence of foresight, formalization, and digital infrastructure mechanisms predicts a unique outcome pattern across purpose alignment and innovation performance.

Future research should prioritize telemetry availability and real-time observation of the declaration-enactment gap (DEG and purpose alignment index (PAI), test the framework in adjacent sectors, examining policy implications for cross-border digital governance regimes.

Keywords: *Strategic Governance, Foresight Mechanisms, Governance Formalization, Digital Infrastructure, Strategic Innovation, Interrupted Time Series Analysis.*

ISBN : 978-93-344-3054-7

The Future of Value: Designing Agile Ecosystems through Disruptive Innovation: 'A Conceptual, Theory-Building Systematic Review Focused on Emerging Markets.'

Ulrica Burden

GBSB Global Business School

ulrica.burden@student.gbsb.global

Abstract

Introduction

This study sits within Business Management, at the intersection of digital strategy, ecosystem orchestration, and technology governance in emerging markets. The practical problem is persistent: unreliable data, low institutional trust, and high coordination costs undermine digital entrepreneurship and strategic agility, particularly for SMEs and underserved users. Current deployments of blockchain, decentralized oracle networks, AI, and privacy-enhancing techniques are often siloed, leaving day-to-day decision rights, data veracity, and privacy trade-offs unresolved.

The objective is to develop and justify a layered, co-designed governance architecture, the Quad-Trust Stack (QTS) and an auditable measurement toolkit (AES+) that together translate "trust primitives" into ecosystem outcomes: agility, legitimacy, inclusion, and sustainability.

The literature lacks an integrated, testable account that links ledgers, oracles, AI–human decision rights, and privacy by design to measurable ecosystem agility. The scope is a theory-building synthesis based on a preregistered systematic literature review. The guiding questions are how these layers should be jointly designed to reduce coordination costs and increase agility, and which indicators can render their effects comparable across contexts.

2. Literature Review and Theoretical Framework

Strategy and ecosystem research shows that shared standards, credible governance, and orchestrated interfaces lower verification and coordination costs and enable reconfiguration across firms, yet empirical measures of ecosystem-level agility remain underspecified and often default to firm-level proxies (Jacobides, Cennamo, & Gawer, 2018; Teece, 2007). Blockchain

ISBN : 978-93-344-3054-7

scholarship clarifies ledger integrity, immutability, provenance, and "rule of code" and the promise of programmable compliance, but frequently assumes reliable inputs and devotes less attention to how off-chain facts are credibly attested and brought on-chain, the so-called oracle problem (De Filippi & Wright, 2018; Iansiti & Lakhani, 2017; Caldarelli, 2022).

Recent work suggests that strengthening oracle governance, source diversity, cryptographic attestation, and dispute resolution is a precondition for trustworthy automation, especially in low-trust settings (Caldarelli, 2025).

AI governance has matured around ethical principles, yet organizations struggle to translate them into operational decision rights that vary by risk: explanation sufficiency, calibrated autonomy, and enforceable human override and appeal (Floridi et al., 2018; Jobin, Ienca, & Vayena, 2019; Doshi-Velez & Kim, 2017). Technology-acceptance research further indicates that perceptions of control, transparency, and fairness shape adoption, elevating explainability and human agency from "nice-to-have" to central design constraints (Venkatesh et al., 2003; Venkatesh, Thong, & Xu, 2012).

In parallel, privacy-by-design and privacy-enhancing technologies (PETs) are well theorized, yet managerial practice often treats privacy as compliance cost rather than a capability that broadens participation and responsible data reuse, an especially costly misconception where trust is fragile (Cavoukian, 2011; Kergroach & Héritier, 2025).

These strands reveal five gaps: ledgers without robust oracles risk immutably recording misinformation (Caldarelli, 2022); principle-led AI governance lacks enforceable thresholds and appeals (Floridi et al., 2018; Doshi-Velez & Kim, 2017); ecosystem agility is conflated with firm performance (Jacobides et al., 2018; Teece, 2007); privacy is under-integrated as a strategic enabler (Cavoukian, 2011); and incentive design central to coordinating distributed contributors remains an afterthought despite evidence that market design and token microstructure shape participation and reliability (Catalini & Gans, 2016; Schär, 2021).

ISBN : 978-93-344-3054-7

To address these gaps, the study advances the Quad-Trust Stack (QTS), a layered governance architecture comprising Integrity (provenance, policy-as-code), Veracity (multi-source oracles with attestation and on-chain dispute resolution), Legitimacy (risk-tiered autonomy, explanation thresholds, meaningful human appeal), and Confidentiality (selective disclosure, minimization, PETs) (De Filippi & Wright, 2018; Caldarelli, 2022; Floridi et al., 2018; Cavoukian, 2011).

QTS is anchored in Dynamic Capabilities (ecosystem sensing, seizing, reconfiguring), Service-Dominant Logic (value co-creation via interoperable interfaces), Institutional Theory (embedding legitimacy and compliance in technical rails), and UTAUT/TAM (adoption shaped by perceived control and trust) (Teece, 2007; Vargo & Lusch, 2004; DiMaggio & Powell, 1983; Venkatesh et al., 2003, 2012). The framework extends current understanding from single-technology fixes to testable, layered complementarities suited to emerging-market constraints and evolving policy expectations (OECD, 2025; Shukla et al., 2024; Asongu & Odhiambo, 2019).

3. Methodology

The study adopts a pragmatic, critical-realist philosophy and uses abductive theory-building. A preregistered systematic literature review (2015–2025) synthesizes peer-reviewed work on blockchain/ledgers, oracle networks and data pipelines, AI-human decision systems, and privacy-by-design with organizational relevance to emerging markets. Searches span Scopus, Web of Science, ABI/INFORM, EBSCO, IEEE Xplore, ACM, ScienceDirect, SpringerLink, and Emerald, augmented by citation chaining. Inclusion requires clear governance implications for at least one QTS layer; editorials and purely algorithmic papers without managerial content are excluded. Dual screening targets Cohen's $\kappa \geq .80$.

A structured codebook records lenses, constructs, mechanisms, and moderators, such as regulatory stringency, data interdependence, liquidity/fees, digital literacy. Where available, constructs are captured as anchored ordinals (0–3) or proportions; missingness is logged without imputation. Analysis proceeds through thematic synthesis to surface mechanisms and gaps, rival-explanation tests contrasting QTS with ledger-only or centralized-lake baselines, and sensitivity checks by year, technology cohort, and sector.

ISBN : 978-93-344-3054-7

Ethical considerations center on transparent reporting, reproducible coding, and cautious claims; no human subjects are involved.

4. Anticipated Results and Preliminary Insights

The synthesis is expected to show that oracle governance is the least developed yet most consequential layer for credible automation in low-trust settings, producing an "oracle centrality" effect: marginal gains in source diversity, attestation density, and dispute handling outweigh additional ledger decentralization. AI-human governance appears effective only when explanation sufficiency is risk-aligned and human override/appeal is operational, not merely aspirational. Privacy-by-default likely increases participation and responsible reuse, especially for SMEs, reframing privacy as capability rather than a constraint.

Ecosystem agility should be better captured by AES+ indicators that track cross-firm reconfiguration (agility surface and rollback latency) than by firm-bound proxies.

Collectively, these patterns are expected to support propositions that jointly implemented QTS layers and yield super-additive improvements in agility, legitimacy, and inclusion, moderated by liquidity, fee structures, and regulatory clarity.

5. Practical and Theoretical Implications

For managers and policymakers, QTS provides a sequenced blueprint: standardize schemas and lineage; deploy multi-source oracles with attestation and disputes; encode obligations as policy-as-code; adopt risk-tiered explainability with human appeal; implement privacy-by-default; and align incentives optionally tokenized to reward reliability and stewardship.

AES+ aims to enable benchmarking across sectors and over time, spotlighting bottlenecks that limit ecosystem agility.

Immediate applications include financial services, agriculture value chains, health supply chains, and public procurement, where verification costs and trust failures are high. Theoretically, the study advances a falsifiable, layered design theory that integrates strategy, institutional, and adoption lenses and translates governance ideals into measurable constructs, inviting quasi-experimental and comparative evaluation.

ISBN : 978-93-344-3054-7

6. Originality and Innovation

This study shifts from single-technology adoption to layered governance complementarities, elevates oracle governance to first-class status, and reframes privacy as a participation-enabling capability. It introduces a compact, auditable scorecard for ecosystem-level agility and integrates tokenized incentives as mediator and moderator of trust-to-outcome pathways. Timeliness stems from accelerating regulatory expectations for auditable digital systems and the need for credible, inclusive transformation in resource-constrained settings.

7. Conclusion and Future Research

This research proposes the Quad-Trust Stack and AES+ to co-design blockchain, oracles, AI–human decision rights, and privacy for trustworthy, agile ecosystems in emerging markets. Future work should standardize sector-specific oracle practices, calibrate explanation thresholds by risk class, scale PETs, and study token market microstructure under liquidity and fee shocks.

Keywords: *Digital entrepreneurship; ecosystem strategy; strategic agility; blockchain governance; decentralized oracles; AI–human governance; explainability; privacy-by-design; privacy-enhancing technologies; tokenized incentives; inclusion; emerging markets.*

ISBN : 978-93-344-3054-7

Track 2. Sustainability, ESG, and Responsible Leadership

Track 2 is devoted to the intertwined challenges of sustainability, ESG (Environmental, Social, and Governance) performance, and responsible leadership. The contributions collectively demonstrate that questions of environmental impact, social justice, and corporate governance are no longer peripheral to business: they increasingly define legitimacy, access to capital, and the capacity to attract and retain talent. Studies of ESG-conscious consumer behavior, environmental accounting, and CSR expenditure shed light on how organizations translate sustainability commitments into measurable practices and outcomes.

Beyond reporting and metrics, the track emphasizes the human and organizational dynamics of responsible leadership. Papers on technostress in hybrid work environments, gender diversity on corporate boards, and sustainability in universities show that digital transformation and ESG agendas are deeply intertwined. Leaders are called upon to navigate trade-offs between short-term performance and long-term stewardship, between efficiency and employee well-being, and between local realities and global expectations.

The contributions in Track 2 underscore that sustainability cannot be reduced to compliance or branding. It requires rethinking decision-making structures, investment priorities, and everyday work practices. By engaging with contexts as diverse as Nigerian listed firms, BRICS+ universities, and emerging-economy consumers, this track proposes nuanced perspectives on the possibilities and limits of ESG-driven transformation and on the kind of leadership needed to move from isolated initiatives to systemic change.

ISBN : 978-93-344-3054-7

ESG Concious purchases in an emerging economy – a theory of planned behaviour approach

Onewo Theophilus Tobi Eshiozemoghie

PhD student (Management)

Ural Federal University named after the first President of Russia B.N.Yeltsin, Yekaterinburg, Russian Federation

tonevo@urfu.me

Zhanna Sergeevna Belyaeva,

PhD, Associate professor, GSEM Academic Director

Ural Federal University named after the first President of Russia B.N.Yeltsin, Yekaterinburg, Russian Federation

zh.s.belyaeva@urfu.ru

Abstract

The consideration of Environmental, Social, and Governance (ESG) factors in consumer purchase decisions is emerging as a defining trend nowadays. This is due to increased customer awareness of climate change, social inequality, and governance issues. Hence, consumers increasingly seek products and services that both align with their values and contribute to sustainable development goals. This study investigates the factors influencing Environmental, Social, and Governance (ESG) purchase behaviour through the lens of the Theory of Planned Behaviour (TPB). As sustainability concerns increasingly drive consumer decision-making, understanding the motivating mechanisms influencing ESG-conscious purchasing becomes crucial for businesses and other stakeholders. This research examines specifically how attitudes toward ESG products, subjective norms, and perceived behavioural control influence purchase intentions and subsequent behaviour. The methodology of the research involved using a quantitative approach. Purposive sampling technique was used to get data from 362 customers of Unilever plc. in Nigeria. Descriptive statistics and structural equation modelling were used to analyse the primary data.

ISBN : 978-93-344-3054-7

The study findings show that attitudes toward ESG products is the strongest predictor of purchase intentions ($\beta = .52$, $p < .001$), followed by perceived behavioral control ($\beta = .24$, $p < .001$), while subjective norms show a moderate influence ($\beta = .19$, $p < .01$). The study also analysed the moderating effect of demographic factors (including age, income, education, and gender) on the ESG-Purchase behaviour relationship. This study makes important theoretical contributions to understanding ESG purchase behaviour by applying the Theory of Planned Behaviour to the ESG purchasing context. Furthermore, the findings provide valuable insights for businesses, regulatory agencies, policy makers, and marketers while also contributing to the growing literature on sustainable consumption behaviour.

Keywords: *ESG, sustainable consumption, Theory of Planned Behaviour, consumer behaviour, environmental attitudes, purchase intention*

ISBN : 978-93-344-3054-7

Environmental Accounting and Financial Performance of Listed Non-financial Companies in Nigeria.

OWORU, Oyefemi Olympus

Department of Accounting, Federal University of Agriculture Abeokuta, FUNAAB

oworuoo@funaab.edu.ng

OYEDELE, Ola Olusegun

Department of Entrepreneurship, Federal University of Agriculture Abeokuta, FUNAAB

oyedeleoo@funaab.edu.ng

OLANREWAJU, Adesina Ganiu

Department of Accounting, Babcock University

siwaju@gmail.com

Abstract

This study investigates the impact of environmental accounting on the financial performance of non-financial firms listed on the Nigerian Exchange Group (NGX) between 2019 and 2023, offering a disaggregated assessment of three components energy cost, security cost, and health and safety cost and their relationship with profitability and efficiency indicators such as return on assets (ROA), net profit margin (NPM), and return on capital employed (ROCE). Anchored on stakeholder theory, the research recognizes that corporate responsibility now extends beyond shareholders to encompass wider groups such as employees, communities, regulators, and investors, who increasingly demand accountability for environmental consequences. In the Nigerian context, where environmental degradation, weak infrastructure, and economic instability intersect with corporate sustainability challenges, environmental accounting is both a compliance mechanism and a potential strategic tool. Despite its global prominence, the practice in Nigeria remains underdeveloped, inconsistently applied, and inadequately disclosed, particularly outside the oil and gas sector. This gap limits the capacity of stakeholders to evaluate firms' environmental performance and undermines the alignment of corporate practices with global sustainability objectives.

ISBN : 978-93-344-3054-7

The research builds on a growing body of literature that underscores the complex relationship between environmental disclosures and firm outcomes. While some studies have documented positive effects of environmental accounting on financial performance, others reveal weak or even negative relationships, particularly where environmental costs are compliance-driven or where resource allocations to remediation and security erode profitability. Most prior studies in Nigeria have focused heavily on the oil and gas or cement sectors, often treating environmental accounting as a composite construct without disaggregating costs into specific categories.

An ex post facto research design was employed, reflecting the study's reliance on historical secondary data drawn from audited annual financial reports of firms that disclosed relevant environmental accounting information between 2019 and 2023. From a population of 112 non-financial firms listed on the Nigerian Exchange Group, purposive sampling yielded 45 companies across multiple sectors, including consumer goods, healthcare, agriculture, and industrials, which consistently reported environmental expenditures during the study period. Panel least squares regression was applied to the data, which comprised 211 firm-year observations, with energy, security, and health and safety costs as independent variables, financial performance indicators as dependent variables, and firm size (proxied by the natural logarithm of total assets) as a control variable.

The descriptive statistics indicated moderate variability across firms in environmental expenditures, with energy, security, and health and safety costs displaying strong positive correlations with one another, suggesting that firms adopting sustainability strategies tend to invest in multiple dimensions simultaneously. The regression results indicate that environmental accounting costs exert limited influence on financial performance among Nigerian non-financial firms. Security cost emerged as the only significant predictor, showing a negative relationship with return on assets ($t = –2.09$, $p = 0.038$), suggesting that heightened security expenditures undermine asset profitability in an environment marked by operational risks. By contrast, energy cost ($t = 0.31$, $p = 0.757$) and health and safety cost ($t = 1.44$, $p = 0.153$) displayed positive but insignificant effects on ROA, while firm size was also insignificant ($t = 1.14$, $p = 0.255$). For net profit margin, none of the variables, including energy ($t = 0.17$, $p = 0.868$), security ($t = –0.16$, $p = 0.875$), or health and safety ($t = 0.04$, $p = 0.969$), demonstrated statistical significance.

ISBN : 978-93-344-3054-7

Similarly, return on capital employed showed no meaningful associations with environmental costs. Overall, environmental expenditures appear driven more by compliance and risk management than short-term financial gains.

The findings highlight three important insights. First, not all categories of environmental costs have equal implications for financial outcomes, and disaggregation is necessary to reveal their distinct effects. The negative impact of security costs contrasts with the neutral effects of energy and health and safety expenditures, underscoring the importance of distinguishing between compliance-driven and productivity-enhancing investments. Second, environmental expenditures in Nigeria's non-financial sector appear to be motivated more by compliance, risk mitigation, and reputational considerations than by immediate financial returns. This observation aligns with prior research suggesting that the benefits of environmental investments are often lagged, accruing over longer horizons rather than within the short-term profitability metrics captured in this study. Third, the weak explanatory power of the models indicates that broader macroeconomic and institutional variables such as inflation, regulatory enforcement, infrastructure deficits, and investor expectations play more decisive roles in shaping financial outcomes than environmental spending alone.

The study contributes to the literature by offering one of the few empirically grounded analyses of environmental accounting in Nigeria's broader non-financial sector, moving beyond the oil and gas industry to examine a wider set of firms. By focusing on recent data (2019–2023), it captures contemporary dynamics in corporate disclosure and sustainability practices, offering greater relevance to current debates. Importantly, it provides evidence that while environmental accounting practices are increasingly visible, their financial justification remains weak in the short term. Nevertheless, the disaggregated approach demonstrates that some categories of spending, such as energy efficiency and workplace safety, hold potential for long-term value creation, even if immediate effects are not measurable.

In conclusion, the findings suggest that environmental accounting in Nigeria's non-financial firms has limited short-term financial benefits, with only security costs exerting a statistically significant, albeit negative, influence on profitability.

ISBN : 978-93-344-3054-7

The results underscore the need for firms to adopt a long-term orientation when evaluating environmental expenditures, recognizing that such investments may enhance resilience, reputation, and stakeholder trust over time even if immediate returns are absent. The study recommends that policymakers and regulators should strengthen standardized environmental reporting frameworks, enforce disclosure requirements, and provide incentives such as tax benefits or green financing mechanisms to encourage firms to internalize environmental costs strategically rather than reactively. Firms, in turn, must optimize their security spending by leveraging cost-effective technologies and collaborations while deepening commitments to energy efficiency and health and safety initiatives that support sustainable growth. Although environmental accounting in Nigeria has yet to demonstrate strong short-term financial outcomes, it remains indispensable for promoting transparency, accountability, and sustainable development in an economy where corporate environmental footprints and societal expectations are increasingly intertwined.

Keywords: *Environmental accounting; financial performance; non-financial firms; Nigeria; sustainability reporting; environmental costs; ROA and profitability; corporate accountability.*

ISBN : 978-93-344-3054-7

Community-Centric IoT Healthcare Ecosystem for Rural Health Monitoring and Early Warning

Nitin Chopde

Mentor:School of Engineering & Technology, Sanjivani University, Kopargaon-423601.

Pragati Tuwar

School of Engineering & Technology, Sanjivani University, Kopargaon-423601.

pragatituwar97@gmail.com

Pranav Borade

pranavpborade17@gmail.com

School of Engineering & Technology, Sanjivani University, Kopargaon-423601.

Vrushabh Gite

vrushabhgite867@gmail.com

School of Engineering & Technology, Sanjivani University, Kopargaon-423601.

Vaishnavi Mukhekar

mukhekarvaishnavi975@gmail.com

School of Engineering & Technology, Sanjivani University, Kopargaon-423601.

Abstract

The intersection of healthcare and the Internet of Things (IoT) has opened a transformative path toward equitable, accessible, and preventive care. Yet, most IoT-enabled healthcare models remain urban-centric, infrastructure-heavy, and difficult to scale in remote or underserved regions. This research introduces a novel framework for a Community-Centric IoT Health Ecosystem designed specifically for rural and resource-limited populations, where timely medical support and disease awareness remain critical challenges.

ISBN : 978-93-344-3054-7

The proposed system integrates wearable biosensors, environmental monitoring nodes, and edge-enabled community hubs into a single collaborative network. Unlike conventional IoT healthcare systems that prioritize individualized monitoring, our approach emphasizes collective health intelligence—capturing not only personal vitals such as heart rate, temperature, and oxygen saturation, but also community-level risk factors such as water quality, air quality, and vector-borne disease indicators. The real innovation lies in the system's dual-layer intelligence: localized, low-power analytics at the edge for immediate alerts even in low-connectivity areas, and cloud-based predictive modeling that aggregates anonymized data across villages to identify emerging health trends.

To ensure inclusivity, the platform employs affordable, solar-powered IoT kits that can be maintained by trained community volunteers rather than specialized technicians. A voice-assisted multilingual interface bridges the literacy and digital divide, allowing users to receive health updates, preventive care suggestions, and emergency instructions in their native languages. Further, the system integrates with telemedicine portals, enabling doctors in urban hospitals to view aggregated dashboards and intervene remotely when early warning signals indicate outbreaks or critical health deviations.

The research contributes a socio-technical innovation by re-imagining IoT healthcare not as a patient-to-hospital pipeline but as a community resilience framework. Beyond individual well-being, the system builds collective immunity intelligence: for example, detecting a sudden rise in gastrointestinal complaints linked to contaminated water can trigger both household-level interventions and policy-level responses. By fusing medical data with environmental signals, the solution anticipates threats such as seasonal epidemics, malnutrition-related complications, or air-pollution-driven respiratory illnesses.

From a technical perspective, the model introduces a layered data governance structure that balances privacy with usability. Data ownership remains with the community; personal identifiers are stripped at the node level before aggregation. Lightweight encryption ensures compliance with health data ethics while still allowing researchers and policymakers to extract meaningful insights. To address network limitations, the design adopts delay-tolerant networking and adaptive data compression, enabling devices to synchronize opportunistically without continuous internet.

ISBN : 978-93-344-3054-7

The expected impacts are multidimensional. For patients, it reduces hospital dependency by enabling preventive self-care and early diagnosis. For communities, it nurtures collective awareness and preparedness, reducing panic during outbreaks. For healthcare systems, it lowers the burden on tertiary hospitals by filtering cases that can be managed locally. And for policymakers, it creates a real-time rural health map, turning invisible populations into visible data points that can inform targeted interventions.

This research therefore positions IoT healthcare as a community-empowering ecosystem rather than a technology-driven commodity. The novelty lies not only in the technical configuration but also in the redefinition of healthcare delivery for rural settings—where collective resilience, frugality, and inclusivity are as important as diagnostic accuracy. By situating IoT within the social fabric of communities, the model transforms health monitoring from a reactive service into a proactive, preventive, and participatory movement.

In conclusion, this work contributes to both theory and practice by proposing an IoT-enabled early warning and community health intelligence system that bridges the gap between isolated rural populations and modern healthcare resources. It emphasizes sustainability through low-cost hardware, reliability through hybrid edge-cloud processing, and humanization through accessible design. More than a technology prototype, it is a blueprint for equitable digital health ecosystems that honor diversity, empower local ownership, and safeguard future generations from preventable health crises.

Keywords: *IoT healthcare; rural health monitoring; community-centric systems; early warning detection; wearable biosensors; edge–cloud architecture; digital health inclusion; environmental health analytics.*

ISBN : 978-93-344-3054-7

Water And Waste Management System Using IOT

Pranjal Gawali

Sanjivani University, Kopargaon

Pradnya Mhaske

Sanjivani University, Kopargaon

Sakshi Zinjurde

Sanjivani University, Kopargaon

Suhani Pawar

Sanjivani University, Kopargaon

Abstract

In today's recent time India is increases with most population one of the countries with the most population. Has population increase waste through various modes also increases. Waste which comes from many sources is very harmful for human creatures as well as for animals. As we all know, IOT (Internet of Things) as an emerged transformative technology with various functions and ideas .

As Iot is main domain in water and waste management. it acts has best application for this system. This abstract presents a comprehensive overview of how Iot can be used for the reduction in waste management, reduce resource wastage and improve efficiency. Water is one of the most essential resources for life, yet its management remains inefficient in many parts of the world. Similarly, waste generation is increasing rapidly due to urbanization area and industrial growth, leading to serious environmental and health concerns. To manage this situation the methods of managing these resources are often manual, reactive, and lack real-time data, which results in delayed responses to issues like leakage, contamination, overflow, and improper disposal. Wastewater management is a mechanism that is used to extract and refine pollutants from wastewater or drainage that can be recycled to the water supply with minimal environmental effects.

ISBN : 978-93-344-3054-7

New methods and techniques are required to ensure safe and smart wastewater management systems in smart cities because of the present deteriorating environmental state. Wireless sensor networks and the Internet of Things (IoT) represent promising wastewater treatment technologies. The elaborated literature survey formulates a conceptual framework with an Internet of Things (IoT)-based wastewater management system in smart cities (IoT-WMS) using blockchain technology.

Blockchain technology is now being used to store information to develop an incentive model for encouraging the reuse of wastewater.

These sensors are connected to microcontrollers and transmit data to cloud platforms via wireless communication protocols like Wi-Fi. The data collected can be visualized on dashboards and analyzed using machine learning algorithms to detect this the predict failures and optimize water usage. For example, smart water meters can track consumption patterns and help in detecting leaks, while automated irrigation systems can adjust watering schedules based on soil moisture and weather conditions. In waste management, IoT enables smart equipped application are used with ultrasonic sensors to measure the fill level of garbage containers. This application can send alerts to municipal authorities when they are full, ensuring timely collection and applications overflow. GPS modules can be integrated into waste collection vehicles to optimize routes and reduce fuel consumption. Additionally, the tags can be used to track hazardous waste and ensure proper disposal. IoT also facilitates segregation of waste at source by using smart sorting systems that identify and separate recyclable materials. One of the key advantages of IoT in water and waste management is real-time monitoring. This allows authorities to respond quickly to emergencies such as pipe bursts, contamination, or illegal dumping. It also helps in maintaining transparency and accountability, as data can be shared with stakeholders including government agencies, NGOs, and citizens. Moreover, predictive analytics can be used to forecast demand, plan maintenance schedules, and allocate resources more efficiently. However, implementing IoT in water and waste management is not without challenges. Sensor accuracy, energy consumption, data security, and network reliability are some of the technical issues that need to be addressed. There is also a need for interdisciplinary collaboration between engineers, environmental scientists, urban planners, and policymakers to design systems that are both technically feasible and socially acceptable.

ISBN : 978-93-344-3054-7

Cost is another factor, especially in developing countries where budget constraints may limit the adoption of advanced technologies.

Despite these challenges, the potential benefits of IoT in this domain are immense. It aligns with the goals of smart cities and sustainable development by promoting efficient resource utilization, reducing environmental impact, and improving the quality of life.

As a student, working on this project has given me hands-on experience with sensors, microcontrollers, cloud platforms, and data analytics. It has also deepened my understanding of the environmental issues we face and the role technology can play in solving them.

Wastewater treatment is a fairly new practice although drainage systems were built long before the nineteenth century. Before this time, “night soil” was placed in buckets along streets and workers emptied them into “honeywagon” tanks. This was sent to rural areas and disposed off over agricultural lands. In the nineteenth century, flush toilets led to an increase in the volume of waste for these agricultural lands. Due to this transporting challenge, cities began to use drainage and storm sewers to convey wastewater into waterbodies against the recommendation of Edwin Chadwick in 1842 that “rain to the river

and sewage to the soil”. The discharge of waste into water courses led to gross pollution and health problems for downstream users. In 1842, an English engineer named Lindley built the first “modern” sewerage system for wastewater carriage in Hamburg, Germany. The improvement of the Lindley system is basically in improved materials and the inclusion of manholes and sewer appurtenances the Lindley principles are still upheld today. Treatment of wastewater became apparent only after the assimilative capacity of the waterbodies was exceeded and health problems became intolerable. Between the late 1800s and early 1900s, various options were tried until 1920, the processes we have today were tried. Its design was, however, empirical until midcentury. Centralized wastewater systems were designed and encouraged. The cost of wastewater treatment is borne by communities discharging into the plant. Depending on its source, wastewater has peculiar characteristics. Industrial wastewater with characteristics of municipal or domestic wastewater can be discharged together. Industrial wastewater may require some pretreatment if it must be discharged with domestic wastewater.

ISBN : 978-93-344-3054-7

The characteristics of wastewater vary from industry to industry and therefore would have different treatment process for example a cocoa processing company may have a skimming tank in its preliminary treatment stage to handle for instance spilt cocoa butter while a beverage plant may skip this in the design. In general, the contaminants in wastewater are categorized into physical, chemical and biological.

Keywords: *IoT-based water management; smart waste management; wireless sensor networks; real-time monitoring; wastewater treatment; blockchain-enabled tracking; environmental sustainability; smart city solutions.*

ISBN : 978-93-344-3054-7

Board Gender Diversity, Marketing Budgets, and ESG Governance: Implications for Dividend Payout Policy in Indian Consumer Discretionary Firms

Rajat Mehrotra

Research Scholar, Department of Management, Birla Institute of Technology and Science, Pilani campus, Pilani, India

Saurabh Chadha

Associate Professor, Department of Management, Birla Institute of Technology and Science, Pilani campus, Pilani, India

Abstract

This study investigates how board gender diversity influences marketing budgets and dividend payout policy through the lens of ESG governance in Indian consumer discretionary firms. Using a panel dataset of 305 firms listed on the Bombay Stock Exchange (BSE) Consumer Discretionary Index between March 2015 and March 2024, the analysis captures a decade of significant regulatory reforms, economic shocks, and growing investor focus on sustainability. Panel regression methods were employed, beginning with Ordinary Least Squares (OLS) and extending to Two-Stage Least Squares (2SLS) and the Generalized Method of Moments (GMM) to address endogeneity, with Tobin's Q incorporated to capture firm value effects. Model reliability was ensured using diagnostic tests such as the Wald test, Hansen J-test, Breusch-Pagan, and AR(2).

The findings indicate that greater gender diversity on corporate boards is positively associated with higher allocations to marketing budgets, reflecting a stronger stakeholder orientation and ESG-driven oversight. However, such increases in marketing expenditure reduce short-term dividend payouts, underscoring a trade-off between reinvestment in brand development and immediate shareholder returns. Importantly, profitability and firm value mitigate this effect, enabling firms to sustain both marketing-driven growth and dividend consistency. The results suggest that governance quality, enhanced through gender-inclusive boards, improves investor confidence and aligns dividend decisions with long-term sustainability goals.

ISBN : 978-93-344-3054-7

This study is among the first to link board gender diversity, ESG governance, marketing budgets, and dividend policy in emerging markets. By bridging global marketing and finance, it demonstrates how inclusive governance practices reshape both operational strategies and payout decisions. This research extends dividend policy literature by incorporating board diversity, ESG governance, and marketing expenditure into a unified framework. It provides theoretical and practical contributions for managers balancing stakeholder and shareholder interests, for investors assessing dividend stability, and for policymakers seeking to strengthen governance reforms in emerging markets.

Keywords: *Board Gender Diversity; ESG Governance; Dividend Policy; Marketing Budget; Corporate Governance; Emerging Markets*

ISBN : 978-93-344-3054-7

The Predictors of Workplace Technostress in Hybrid Work Environment: Insights from a Meta-Analytic Study for Employee Sustainability

Ramadoss Aksshaya

Research Scholar, Department of Management, VELS Institute of Science, Technology and Advanced Studies (VISTAS), Pallavaram, Chennai 600117

aksshram@yahoo.co.in

Dr. Jayasree Krishnan

Director, Department of Management and Commerce, VELS Institute of Science, Technology and Advanced Studies (VISTAS), Pallavaram, Chennai 600117

jayasreephdvels@gmail.com

Abstract

Rapid digital transformation and the evolving nature of work paved the rise of hybrid work models and impacted the way organizations operate. Specifically, the Information Technology (IT) industry has underwent humongous change driven by continuous innovation and shifting demands of workforce adaptability. The emergence of hybrid work has transformed the dynamics of work and workforce offering numerous opportunities accompanied by challenges such as autonomy paradox which leads to over work, blurred boundaries between work and personal life and social isolation. Thus, understanding the nature of work and workforce and providing the technology that enables hybrid work environment is vital. The paradigm of work is currently more reliant and focussed on technology than human asset resulting in technostress, a form of workplace stress associated with extended and over usage of information and communication technologies which negatively influences employee well-being and is a huge challenge for employee sustainability. This relatively new phenomenon has become a new challenge in organizations and a focal point of discussion in management research due to its potential detrimental effects on employee's health, performance, work satisfaction, organizational citizenship behaviour and ultimately overall organizational effectiveness.

ISBN : 978-93-344-3054-7

Lot of research articles have proposed technostress as an important predictor of employee well-being, as it creates anxiety, stress and musculoskeletal problems in employees working in hybrid work. Drawing insights from Tarafdar et al. (2007) technostress framework, various studies illustrate technostress into five dimensions which comprise techno-invasion, techno-overload, techno-complexity, techno-uncertainty and techno-insecurity. This five-factor model of technostress creators has been widely used to study the nuances and intricacies of workplace technostress. Techno overload is experienced when employees are expected to be always available online and technologies forcing them to work faster, multitask and work for prolonged hours. Techno-invasion happens when the boundaries of work and personal life is blurred due to technology resulting in work-life imbalance causing work-family conflicts. Techno-insecurity is the fear of loss of job and replacement experienced by employees due to technological advancement such as AI, automation and more technologically skilled employees. Techno-complexity refers to the continuous learning and upskilling required to sustain in the organization. It also refers to the complexities of using new ICT, which makes the employees question their own competency. Techno-uncertainty refers the feeling of ambiguity due to the constant changes and rapid upgradation of ICT causing stress and anxiety among employees. The effects of these techno-stressors are intensified by other persisting challenges in hybrid work such as work overload, extended working hours, social isolation and work-family imbalance. When an employee experiences all these, they perceive their work environment to be challenging and it has a negative impact on their overall well-being and performance. Employees eventually display burnout, anxiety, low morale, poor self-esteem, dissatisfaction, diminished commitment and performance. The biggest concern is there exists limited research which has explored interventions to lessen the adverse impacts of technostress in the context of hybrid model. To identify all eligible studies addressing antecedents of workplace technostress, we conducted a meta-analysis comprising peer-reviewed articles, scholarly articles, empirical and conceptual studies on technostress through a systematic literature search in Scopus, Web of Science, and PsycINFO. The search was conducted in these databases using keywords “technostress”, “workplace”, “techno-overload”, “techno-invasion”, “techno-complexity”, “organization”, “techno-uncertainty” and “techno-insecurity”.

ISBN : 978-93-344-3054-7

The search was limited to articles which were published in English only. The search resulted in 631 articles, out of which 284 articles were excluded based on the subject irrelevance found in the abstract. Out of the remaining 347 articles, 189 articles were excluded due to redundancy and in many of the studies as only the word 'technostress' was mentioned but the studies didn't measure workplace technostress or any dimension of technostress. After a full review of the remaining 158 articles, 126 articles were excluded resulting in 32 articles which met our criteria and was used to analyse the various dimensions of workplace technostress. Studies and research suggest that technostress is directly linked to digital overload, work overload, social isolation, digital fatigue and role conflict and indirectly influenced by demographic factors such as age, gender, tenure and self-efficacy. Drawing insights from various research work, we identify that emerging technologies offers transformative opportunities combined with challenges and these opportunities need to be implemented strategically and ethically. Technostress and its ripple effects can prove to be a significant threat to employee well-being and organizational effectiveness in the long run if not managed wisely at the initial stages. Organizations are experimenting, adopting multiple approaches and implementing different solutions to find out what works best for both employees and the business in hybrid work. Findings highlight that while individual's technology self-efficacy and work environment influence vulnerability to technostress, organizational mindful practices is equally a crucial strategy that organizations need to employ to reduce the negative impact of technostress. Hence, our study recommends developing, and implementing targeted interventions such as the upskilling of employees, mindful organizational practices such defined worktime, right to disconnect and no-email policy and integrating tech capabilities with human-centered practices can enhance overall well-being, and boost organizational performance. Besides the provision of IT training and support, organizations should address technology challenges, develop digital literacy and develop a strong IT support team to assist employees in understanding new applications and systems better. In the context of hybrid work, it is essential to deploy regular surveys to understand the attitude of employees and assess level of technostress to formulate and integrate coping strategies. It is imperative for hybrid organizations to prioritize and support employee wellbeing by implementing policies, training programs and wellness programs, as advancement of technology is not the end goal but is an enabler and amplifier of human potential supported by inclusive and healthy work practices.

ISBN : 978-93-344-3054-7

Organizations need to invest in building an inclusive and healthy hybrid work environment that reduces burnout, turnover and technostress and nurtures employee sustainability which is ensuring and enabling employees to sustain their engagement, performance and well-being in the long run despite the workplace and technological demands and changes.

Keywords: *Technostress; hybrid work environment; employee sustainability; digital overload; techno-stressors; workplace well-being; ICT-induced stress; organizational interventions.*

ISBN : 978-93-344-3054-7

Driving sustainable leadership: ESG and digital transformation in BRICS+ universities

Saira, Saira

Ph.D. Student

Postgraduate, Graduate School of Economics and Management

Ural Federal University named after the first President of Russia B.N. Yeltsin Yekaterinburg, Russia

Saira@urfu.ru

Zhanna S. Belyaeva

PhD, Associate Professor

School of Management and Interdisciplinary Studies

Graduate School of Economics and Management

Ural Federal University named after the first President of Russia B.N. Yeltsin Yekaterinburg, Russia

zh.s.belyaeva@urfu.ru

Abstract

Higher education Institutions are increasingly recognised as the key driver of sustainability and sustainable leadership, yet the environmental, social and governance (ESG) practices have been underexplored. The sustainability initiatives in higher education have had limited attention in recent years (Akudugu & Ogwu, 2024; Alharthi, Alharthi, & Alharthi, 2019); few of the studies have discussed about ESG practices and social innovation and digital transformation to cultivate sustainable leadership within the universities, specifically across the BRICS+ countries. Existing literature highlights the importance of information technology adoption and digitalisation in enhancing the performance of institutions (Abdelhakim et al., 2022; Islam et al., 2023), where the limited research has examined the role of ESG practices as drivers for leadership and innovation in an academic context.

ISBN : 978-93-344-3054-7

This study addresses these gaps in the literature by examining the relationship between ESG practices, social innovation, digital transformation and sustainable leadership by providing the insights to integrate sustainability policies to achieve inclusive, ethical and innovation-driven governance.

University ESG practices adopt environmental stewardship, social justice, and open governance and encourage the same practices as having the advantage of supporting energy conservation, the involvement of students in society's well-being, open decision-making, and institutional policy congruence with stakeholders' demand. ESG practices not only create an institutional accountability platform but also a platform with a favorable environment for Sustainable Innovation. Sustainable Innovation is the capacity of institutions to develop new solutions in the resolution of environmental and social problems and incorporating sustainability into research, programming, and partnerships. Innovations range from the adoption of green campus initiatives and circular stewardship of resources to the inclusion of sustainability course work and research agendas. Through the alignment of academic goals and social and environmental goals, universities demonstrate the capability of Sustainable Innovation to generate stakeholders' long-term value.

Digital Transformation refers to application of newer technology in learning, governance, and administration for achieving maximum functional efficiency, transparency, and decision-making process. Deployment of its technologies facilitates the ease with which universities can organize administrative tasks, facilitate student-faculty member interaction, and solicit cooperation from outside stakeholders. Through monitoring adherence to ESG standards and evaluating the outcomes of sustainability projects, digital technologies also assist data-driven decision-making. University students' adoption of digital technology may be hampered by a number of factors, including a lack of resources, resistance, and a lack of digital literacy. By overcoming these challenges, academic institutions can investigate digital transformation as one of the key components of sustainable innovation and sustainable leadership.

Sustainable leadership means using ESG to drive innovation and digital usage that leads to government models that are fair, involve all stakeholders, and are moral. Through ESG practices, college administrators may assist their institutions achieve long-term sustainability objectives and encourage social responsibility and accountability.

ISBN : 978-93-344-3054-7

New technology and innovative tactics strengthen governance ethics and strategic decision-making. To ensure long-term development, organisations need sustainable innovation, digital transformation, and sustainable leadership. Universities may create global and national environmental sustainability standards, according to this agreement. It follows UN Sustainable Development Goals (SDGs) and global sustainability paradigms.

To empirically investigate the relationships between the variables, a quantitative survey-based research methodology was proposed. Data were collected from the faculty and administrators from BRICS+ countries' universities. ESG practices, social innovation, digital transformation and sustainable leadership are measured by using a validated five-point Likert scale. Structural Equation Modelling (SEM) was utilised to investigate the direct influence of ESG practices on SI, DT, and SL, along with the mediating effects of SI and DT. Institutional characteristics, including size, representation, and digital infrastructure, serve as control variables to enable comparative analysis across diverse cultural environments within institutions for necessary adjustments. The method yields empirical evidence regarding institutional readiness and resource accessibility that affect ESG adoption.

Prior studies indicate that ESG practices produce beneficial effects in Digital Transformation and Sustainable Innovation, thereby strengthening Sustainable Leadership by integrating sustainability values into institutional governance and decision-making. Sustainability, robustness, and stakeholder trust improve at universities that apply ESG principles, digital technologies, and new ideas. ESG policies, technological readiness, and leadership skills vary widely across BRICS+ nations. These variances stem from culture, legislation, and resources. These new concepts demonstrate that context-sensitive techniques help higher education institutions innovate and become more sustainable.

This research connects Sustainable Innovation, Digital Transformation, ESG, and Sustainable Leadership into a unified framework to advance theory. This reveals what we don't know about ESG in innovation and how leadership influences institutional governance and decision-making. In practice, the findings offer university administrators directives for formulating ESG-driven innovation initiatives, leveraging digital technology to enhance governance and operational efficiency, and cultivating Sustainable Leadership.

ISBN : 978-93-344-3054-7

Policymakers can also gain insights in creating models that make it easier for higher education systems to adopt ESG, go digital, and innovate. By allowing innovation, technology, and ESG to work together, institutional behaviour can be aligned with sustainable goals, which will maximize benefits for both academics and society.

Sustainable Innovation and Digital Transformation that lead to ESG behaviour are important factors in Sustainable Leadership in BRICS+ universities. With e-adoption, innovation, and governance alignment, the research extends pragmatic policy suggestions to policymakers and university managers to enhance ethical leadership and sustainability. More research is required to empirically validate the proposed model, analyze mediating or moderating variables such as organizational culture or stakeholder involvement, and provide generalized advice on applying ESG-based leadership and innovation in different higher education settings. The findings of the research are expected to build capacity for universities in instilling the values of sustainability among administrative and academic roles, through digitalization, and support ethical and inclusive modes of leadership practice to enable national and international agendas for sustainability.

Keywords: *ESG practices; sustainable leadership; digital transformation; social innovation; BRICS+ universities; higher education governance; sustainability initiatives; ethical institutional development.*

ISBN : 978-93-344-3054-7

Water Quality and Level Monitoring System: Real time Detection Of Biological Hazards.

Thombare Sakshi Santosh

Sanjivani University.

thombaresakshi500@gmail.com

Kadam Bhagyashri Vitthal

Sanjivani University.

bhagyashrik083@gmail.com

Thombare Avinash Chandrakant

Sanjivani University.

Thombareavinash368@gmail.com

Satalkar Shreyash Prashant

Sanjivani University.

shreyashsatalkar@gmail.com

Jadhav Jay Somnath

Sanjivani University.

jayjadhav1805@gmail.com

Abstract

Water is vital for life, and its quality affects public health, agriculture, and industry. However, pollution and environmental changes threaten water bodies, leading to biological hazards like bacteria, viruses, and harmful algal blooms. This study introduces a Water Quality and Level Monitoring System designed to provide real-time detection of these biological hazards. The system integrates advanced sensor technology, data analytics, and wireless communication to continuously assess water conditions.

ISBN : 978-93-344-3054-7

It monitors critical water quality parameters such as temperature, pH, turbidity, dissolved oxygen, and the presence of biological contaminants like Escherichia coli (E. coli) and cyanobacteria. Sensors are strategically placed in various water sources, including reservoirs, lakes, and water supply systems, ensuring comprehensive coverage.

Collected data is transmitted wirelessly to a cloud-based platform, where it is processed and analyzed using artificial intelligence and machine learning algorithms. Predictive analytics forecast contamination trends and alert authorities if water quality deviates from acceptable standards.a key innovation of this project is its integration with the Internet of Things (IoT), enabling real-time data visualization through a user-friendly web and mobile interface. This platform allows users, including water management authorities and the general public, to access up-to-date information on water quality and levels. Automated notifications and early warning systems are implemented to mitigate health risks and ensure timely intervention in hazardous conditions. The system also incorporates energy-efficient components to enhance sustainability and ensure continuous operation in remote areas. Solar powered sensors and low-power communication modules reduce maintenance costs and extend the lifespan of the monitoring infrastructure. Additionally, the system is designed to be scalable, allowing for easy expansion to cover larger geographic areas and integrate with existing water management frameworks .This research addresses water contamination and resource management challenges through an intelligent and automated approach. By providing real-time insights into water quality and level fluctuations, the system contributes to environmental protection, public health, and disaster resilience.

The collected data serves as a valuable resource for policymakers, researchers, and environmental organizations, fostering better decision-making and long-term sustainability efforts.in conclusion, the Water Quality and Level Monitoring System offers a transformative solution for proactive water management. Its real-time monitoring capabilities, AI-driven analysis, and IoT integration provide a robust framework for detecting and mitigating biological hazards in water sources. Future research will focus on enhancing sensor sensitivity, expanding the range of detectable contaminants, and optimizing data processing algorithms to further improve system accuracy and reliability.

ISBN : 978-93-344-3054-7

Implementing such a system has the potential to revolutionize water safety monitoring and contribute significantly to global efforts in ensuring clean and safe water for all.

Keywords: *Water quality monitoring; biological hazard detection; IoT-based water systems; real-time sensing; AI and machine learning analytics; environmental monitoring; water level tracking; public health protection.*

ISBN : 978-93-344-3054-7

Corporate social responsibility expenditure and financial performance of firms in Nigeria

Titilope Esther OLOREDE

Graduate School of Economics and Management,

Ural Federal University (Yekaterinburg, Russia)

tolorede@yahoo.com

Rohdiyat Olaitan BELLO

Department of Accounting,

Osun State University, Osun State, Nigeria

bellorohdiyat@gmail.com

Abstract

Manufacturing, mining and other industrial companies engaged in large scale industrial activities happen to be major beneficiaries of raw materials as well as facilities and infrastructures which in turn have long-lasting implications and consequences for the physical and environment landscape. Therefore, to change narrative, these firms must come together, not just as profit making inclined entities but to also intervene and support the government for environmental sustainability and economic development. Corporate Social Responsibility (CSR) has been argued to be one of the measures adopted by companies of various industries to enhance their financial performance because it gives them popular status in their host community, helps sustain their relevance, and increases profit. Stakeholders' theory represents a fundamental framework that emphasizes the importance of considering the interests of all stakeholders affected by a company's actions and decisions. However, incurring firms fund into CSR is not always welcoming to shareholders and so may choose not to engage in such activities if these do not positively benefit their economic interest. The cement industry holds significant economic importance, given its extensive and diverse supply chain, contributing 5.4% to global GDP and 7.7% to global employment.

ISBN : 978-93-344-3054-7

It is also one of the largest manufacturing sectors in Nigeria. Manufactured majorly from limestone, cement is often mixed into concrete to provide housing, roads and pipes supplying water to communities. States situated in central Nigeria happen to have the major deposit of limestone. This makes the cement industry a significant sector to examine the effect of CSR expenditure on firm performance. Therefore, cement companies exploiting these lands and their resources such as Dangote on the Obajana plant in Kogi State are looked up to for supporting development of the host community through CSR. The population of the study consists of the quoted cement companies in Nigeria, this study focused specifically on Dangote cement, Lafarge cement and BUA cement industries in Nigeria. The study employed secondary data sourced from the annual report of the selected quoted cement industries for the period of nine years (9) from the year 2014-2022, data were collected on CSR expenditure (donations, community empowerment, societal and environmental expenditures) and firm performance (return on assets, return on capital employed, net profit margin). The findings from the regression results showed that there was a significant and positive relationship between SEE and ROCE ($p< 0.05$), also a positive and significant relationship between ROA and DON ($p< 0.05$), and a positive and significant relationship between CEE and NPM ($p< 0.05$). The study concludes that corporate social responsibility has a crucial role in improving financial performance in the Nigerian cement manufacturing industry. Cement manufacturing companies in Nigeria should aim to promote sustainable development in their operations. This involves minimizing the impact of their activities on the environment and engaging in environmentally friendly practices. They should also implement ethical business practices, promote responsible governance, and government can support these activities by creating policies that promote sustainable development in the manufacturing sector. This study contributes to the body of knowledge in identifying CSR activities and responsible practices as well as fostering socially responsible businesses in Nigeria.

Keywords: *Corporate social responsibility; financial performance; Nigerian cement industry; stakeholder theory; CSR expenditure; firm profitability; sustainable development; environmental responsibility.*

ISBN : 978-93-344-3054-7

Indigenous Knowledge Systems and Sustainable Learning: North East India Perspectives

Dr. Indranil Bose
Associate Dean and Professor, School of Business
Adamas University, Kolkata, West Bengal, India
Email: sentindranil72@gmail.com

Dr. Madhurima Dasgupta
Post Doctorate Research Fellow
Abo-Akademi University, Turku, Finland
Email: madhurima.dasgupta2@gmail.com

Northeast India is inhabited by more than 200 indigenous communities, which make up 68% of the nation's total tribal population. This study investigates how the incorporation of Traditional Ecological Knowledge (TEK) into formal education can mitigate issues related to cultural erosion, environmental degradation, and educational alienation faced by indigenous learners. By utilizing insights from policy changes, empirical data collected from 2020 to 2024, and an international comparative framework, the analysis indicates that students belonging to these minority tribal communities experience a dropout rate that is 23% higher than the national average, primarily due to cultural disconnections within mainstream curricula. Notably, pilot programs that integrate TEK have demonstrated a 40% increase in student engagement and a 25% decrease in dropout rates, highlighting the transformative potential of education that is sensitive to cultural contexts. The paper concludes with data-driven recommendations for the integration of TEK throughout Northeast India's educational framework, with the goal of fostering an educational environment that is inclusive, sustainable, and culturally rooted.

Keywords: *Traditional Ecological Knowledge (TEK), Sustainable Learning, Northeast India, Education*

ISBN : 978-93-344-3054-7

Track 3. Entrepreneurship, Start-Ups, and Innovation Ecosystems

Track 3 turns the spotlight on entrepreneurial actors and the ecosystems that support or hinder them. The papers investigate how start-ups and entrepreneurial ventures navigate digital transformation, global trade, and climate-related risks, often in environments characterized by institutional uncertainty and resource constraints. By examining the role of artificial intelligence in reshaping e-commerce and global trade, as well as tools for climate change prediction, the track highlights both the opportunities and the responsibilities facing new ventures in a world of overlapping crises.

Entrepreneurship is presented here not only as a driver of economic growth but also as a potential lever for social and ecological innovation. The contributions explore how ecosystems comprising investors, regulators, incubators, universities, and communities can foster more inclusive and sustainable forms of entrepreneurship. They invite us to consider which kinds of ventures are encouraged, which forms of value are recognized, and how emerging technologies can be mobilized to address, rather than deepen, existing inequalities.

By connecting micro-level entrepreneurial strategies with broader ecosystem dynamics and public policies, Track 3 provides a rich picture of the conditions under which innovation ecosystems can contribute to sustainable and inclusive development.

ISBN : 978-93-344-3054-7

The Role of Artificial Intelligence in Transforming Global Trade and E-Commerce

Tanaya Sant

Sanjivani University

Shraddha Kalange

Sanjivani University

Abstract

The increasing scale of cross-border e-commerce has reshaped global trade dynamics, introducing both vast opportunities and complex challenges for businesses worldwide.

Artificial Intelligence (AI) has emerged as a transformative force, revolutionizing the ways in which international firms manage logistics, predict consumer demand, personalize experiences, and secure digital transactions. This paper explores how AI-driven technologies are redefining global trade systems and enabling both multinational corporations (MNCs) and small and medium enterprises (SMEs) to compete more effectively in international markets.

The study focuses on AI applications in four critical areas supply chain optimization, predictive analytics, personalized marketing, and digital payment security. Using examples from leading global players such as Amazon, Alibaba, and Shopify, the paper analyzes how AI-based systems enhance efficiency, transparency, and customer engagement across borders.

In terms of scope, the analysis covers major global e-commerce hubs including the United States, China, and the European Union, along with growing digital market such as India and Southeast Asia. The research draws on recent industry reports and academic studies to assess the measurable impact of AI adoption such as reductions in logistics costs by 15–25%, forecast accuracy improvements up to 35%, and fraud detection rates exceeding 90% accuracy through machine learning algorithms.

AI-driven supply chain systems are identified as key enablers of sustainable and resilient trade networks. Machine learning models predict disruptions, optimize delivery routes, and reduce carbon emissions through smart logistics planning.

ISBN : 978-93-344-3054-7

Similarly, predictive analytics allows companies to analyse large-scale market data, anticipate regional demand, and align product distribution with consumer behaviour. These data-driven strategies significantly reduce waste, inventory costs, and delivery delays, leading to improved operational performance.

Another major contribution of AI lies in personalized marketing and cross-cultural consumer engagement. Natural Language Processing (NLP) enables platforms to analyse linguistic and cultural nuances, ensuring that promotional content resonates with diverse global audiences. AI-based recommendation systems, like those used by Netflix and Amazon, increase conversion rates by up to 30% while strengthening brand loyalty.

Furthermore, AI enhances digital payment security through real-time fraud detection systems that monitor global transactions for anomalies. These systems not only reduce cybercrime but also build trust in international e-commerce ecosystems, where secure and transparent payments are crucial for market growth.

The paper also highlights how AI fosters global inclusivity by empowering SMEs with low-cost tools for digital marketing, logistics, and customer analytics. Cloud-based AI solutions democratize access to global markets, enabling smaller businesses from developing regions to expand internationally.

In conclusion, Artificial Intelligence is not merely a technological advancement ,it represents a paradigm shift in how global commerce functions. By integrating AI into supply chain systems, market forecasting, personalization, and payment security, businesses can achieve greater sustainability, inclusivity, and competitiveness. The paper argues that as AI continues to evolve ,especially when integrated with block chain and the Internet of Things (IoT),it will drive a new era of intelligent, transparent, and equitable international trade.

Keywords: *Artificial Intelligence, Global Trade, E-Commerce, Predictive Analytics,Supply Chain,International Business*

ISBN : 978-93-344-3054-7

Climate Change Prediction System

Sonawane Tushar Dattu

Sanjivani University

tushardsonawane0@gmail.com

Nikam Aditya Sandip

Sanjivani University

nikamaditya739@gmail.com

Satre Pratik Sarangdhar

Sanjivani University

satrepratik2004@gmail.com

Abstract

Climate change hits hard these days. It messes with the environment and farming, plus industries and everyday life for folks everywhere. Things like more greenhouse gases, cutting down trees too much, using up resources fast, and cities growing quick all lead to weird weather, the planet heating up, and wild stuff like floods or dry spells and big storms. Old school climate models rely on tough math equations and eat up tons of computer power, so they are not always easy to work with. But now with AI picking up speed and all this huge climate data out there, machine learning looks like a solid bet for guessing future climate stuff better. This whole project is about building a system to predict climate change, using machine learning on old data to guess temps and rain, and give out info that helps with planning and choices. The setup pulls in free climate data, you know, things like temps, how humid it is, CO2 amounts, rain falls, and even ocean vibes.

First off, they clean that data up and get it ready, so the guesses come out right. They try out different machine learning tricks, stuff like regression or support vector machines, random forests, and those neural networks. Some special ones, like ARIMA and LSTM, handle time stuff well, so they predict how climate shifts over months or years, say seasonal heat or wet patterns. To make it stronger, they mix a few models together sometimes.

ISBN : 978-93-344-3054-7

They built it to be easy for people to use. It crunches numbers behind the scenes, but then spits out clear visuals, graphs and charts, heat maps too. You pick an area or plug in some details, and it hands you forecasts in a straightforward way.

That helps researchers, people in government, farmers, and groups handling disasters or keeping the environment safe. One big plus with machine learning here is it improves as more data rolls in. Not like the old models stuck on just equations, this adapts to fresh info, even pulls in real time from satellites, weather spots, sensors. It spots patterns in the data that people might miss, which turns it into a real powerhouse for figuring out climate shifts. From this project, they expect sharper guesses for short term and long haul on climate, plus spotting key drivers of change, and solid ideas for what to do next. Farmers might plan crops based on rain forecasts energy outfits could gear up for power needs from temp changes. Bigger picture, governments and non-profits craft better policies on climate, plans for disasters, projects for lasting green stuff. Thing is, this shows machine learning as a fresh way to tackle climate change. Looking at old data and nailing predictions, the system aids planning, getting ready, building sustainable ways. Sure, hurdles like skimpy data, tricky models, heavy computing pop up, but it points to mixing tech, science on environment, and policy to handle it. Adds to climate info field too, steps toward a tougher, greener tomorrow.

Keywords: *Climate change prediction; machine learning models; climate analytics; temperature and rainfall forecasting; time-series modeling (LSTM/ARIMA); environmental data analysis; AI for climate resilience; sustainable planning.*

ISBN : 978-93-344-3054-7

Track 4. Global Business, Culture, and Public Policy

Track 4 brings into focus the interfaces between global business, cultural diversity, and public policy. The papers traverse topics such as biometric technologies in organizational contexts, youth unemployment and gig work, public attitudes toward primary health care, and assistive technologies such as sign language conversion systems. Taken together, they show that business practices and public policies are deeply embedded in cultural norms, institutional histories, and the everyday experiences of citizens and workers.

Several contributions address the changing nature of work, particularly for younger generations navigating precarious labor markets and platform-mediated employment. Others explore how public perceptions of health services evolve, and how technology can act as a bridge or a barrier to inclusion for people with diverse communication needs. Throughout the track, the authors emphasize that innovation cannot be detached from questions of legitimacy, trust, and social cohesion.

By weaving together perspectives from management, public policy, and the social sciences, Track 4 underscores the importance of culturally sensitive and context-aware approaches to global business and governance. It invites readers to consider how policies and organizational strategies can be designed in ways that respect local realities while responding to transnational challenges.

ISBN : 978-93-344-3054-7

Fingerprint attendence system

Om Bhokare

Second year student, Department of AIML, Sanjivani University,Kopargaon,Maharashtra,

India

ombhokare11@gmail.com

Dr. Devyani Jadhav

Head of Department(AI-ML),Sanjivani University, Kopargaon ,Maharashtra,

India

hodaiml@sanjivani.edu.in

Prof. Rudrani Ingle

Lecturer (AI-ML), Sanjivani University, AKopargaon ,Maharashtra,

India

rudraniingle2020@gmail.com

Abstract

Taking attendance manually in classrooms has been a common practice for years, but it comes with a lot of problems. It takes up valuable class time, teachers can make mistakes, and sometimes students even cheat the system by having friends mark them present when they're not actually there. These issues make it hard for schools to keep reliable and accurate attendance records. To solve this, we're proposing a Fingerprint Attendance System that uses biometric technology to track student attendance in a more secure and efficient way. Biometric systems identify people based on unique physical traits—like their fingerprints. Fingerprints are especially useful because they're unique to each person, don't change over time, and are easy to scan. Students register their fingerprints once, and every time they enter the classroom, they scan their finger. The system checks their fingerprint against the stored data, and if it matches, their attendance is automatically marked and saved digitally.

ISBN : 978-93-344-3054-7

This has a lot of benefits. First, it saves time for teachers, who no longer have to take attendance manually. Second, the attendance data is stored safely in digital form, so it can't be lost or tampered with. Third, it's really easy to access and can be connected to other school systems like academic records or performance reports.

By automating the process, we're not just saving time—we're also making the system fairer and more reliable. Since fingerprints can't be faked easily, this method stops students from marking attendance for each other. It helps maintain the honesty of records that can affect grades, scholarships, or even whether a student is allowed to take exams. Plus, schools can use this data to better understand student behavoir like who's regularly late or missing classes. Teachers and administrators can then use that information to support students who might be struggling. Any system that uses personal data has to be handled carefully. That's why we also focus on protecting privacy by storing the data securely, encrypting it, and only giving access to the right people. The system can also be expanded in the future, whether it's used across multiple campuses or combined with other security features like facial recognition. In short, this Fingerprint Attendance System is a smart, modern solution that replaces outdated manual processes. It helps schools run more efficiently, makes attendance tracking more accurate, and creates a more honest and accountable classroom environment for everyone.

Keywords: *Fingerprint attendance system; biometric authentication; automated attendance tracking; student identity verification; digital record management; educational technology; anti-proxy attendance; secure data handling.*

ISBN : 978-93-344-3054-7

Youth Unemployment and Gig Work: A Bibliometric and Thematic Review

Ms.Kakali Parial,

Research Scholar,

Department of Economics,

Dr K N Modi University, Newai, Rajasthan 304021, India

Dr. Kirti

Assistant professor

Faculty of management & business studies.

Dr. K. N. Modi University. Newai, Rajasthan 304021, India

Abstract

This study presents a synthesis of research on youth unemployment and gig work by combining a thematic literature review with bibliometric analysis. Using the biblioshiny package in R programming study identified trends in this research area, hidden themes, and research gaps through the records collected from the Scopus database covering the years 1985 to 2025. Findings indicate a significant rise in the research area during the year 2024. Thematic mapping reveals that while topics like employment, mental health, and COVID-19 are well-developed and central, emerging areas such as entrepreneurship and youth in developing regions remain underexplored. Co-word and factorial analyses show a strong conceptual interlink between demographic, structural, and policy-related aspects of youth labour. Through K-means clustering using Python programming, five core themes were identified: 1. Precarious employment and Career Insecurity, 2. Entrepreneurship challenges, 3. Pandemic Impact, 4 General Labour Issues, and 5. Education-Employment Nexus. These insights suggest that while employment remains the dominant concern, the discourse is broadening to include psychological well-being, informal work, and the structural reforms needed to support youth. The study concludes by proposing future research directions to improve youth labour outcomes through targeted education, inclusive policy, and structural support systems.

ISBN : 978-93-344-3054-7

Study Background

Youth unemployment has long been a global concern, deeply rooted in both historical and structural economic shifts especially after covid 19 outbreak.As labour markets have progressed through de-industrialization, disruptive innovation , technological disruption, and globalization, youth have increasingly encountered unstable employment lines characterized by underemployment and informality. In many contexts, including both developed and developing countries, the rise of the gig economy has further complicated traditional understandings of employment security, career progression, and professional identity. This study conceptually explores youth unemployment through a thematic and bibliometric review of academic literature. Using the research works collected from the Scopus database, K-means clustering was applied in Python to identify key thematic areas. Based on these clusters, the study presents five major themes related to employment challenges.

Thematic Literature Review

To structure the literature and identify hidden themes, a preliminary data-driven clustering using the K-means algorithm was conducted using Python programming. This unsupervised machine learning technique grouped the collected Scopus records into five distinct thematic clusters based on the co-occurrence patterns of keywords. These clusters serve as the foundation for the thematic review that follows.

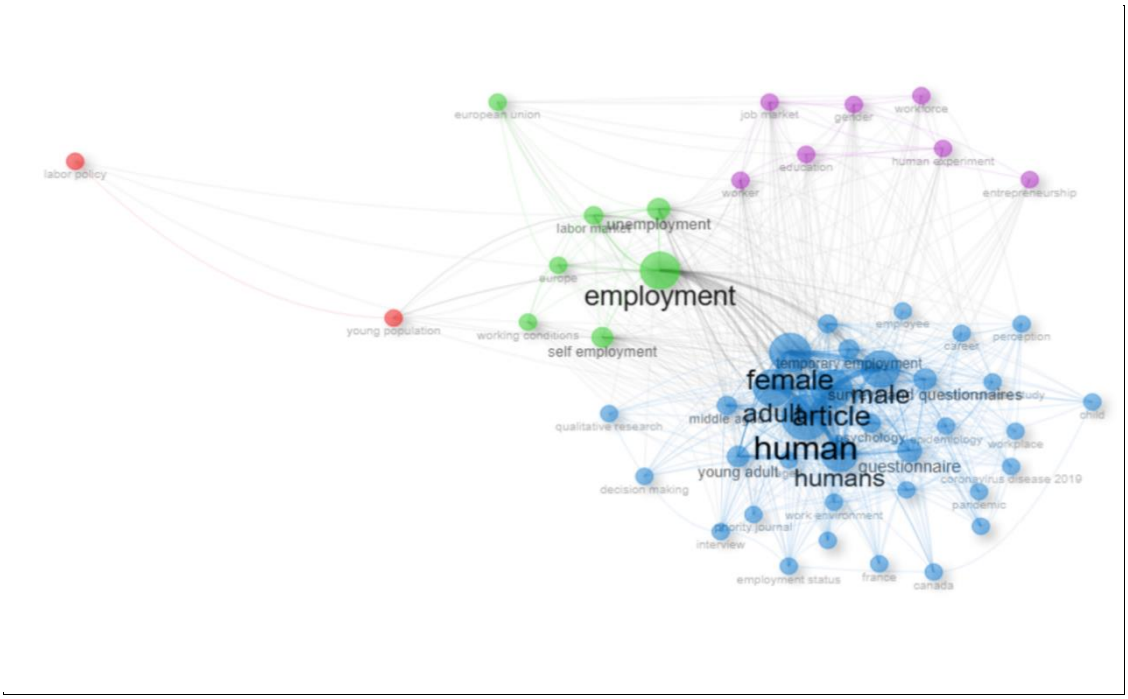
Table 1 Themes idenfied using K Means Clustering:

Theme	Name of the Theme	Top Keywords
1	Precarious Employment and Career Insecurity	Precarious, work, workers, career, insecurity
2	Youth Unemployment and Entrepreneurial Gateways	Youth, unemployment, entrepreneurship, health, market
3	Temporary Work and Pandemic Impact	Temporary, workers, employment, pandemic, young
4	General Youth Employment and Labour Issues	Employment, youth, young, work, labour
5	Education-Employment Nexus	Students, young, unemployment, education, people

Source: Author's Own Work (Themes generated using Python K-means clustering)

ISBN : 978-93-344-3054-7

Fig.1 Visualization of the clustered co-word network.

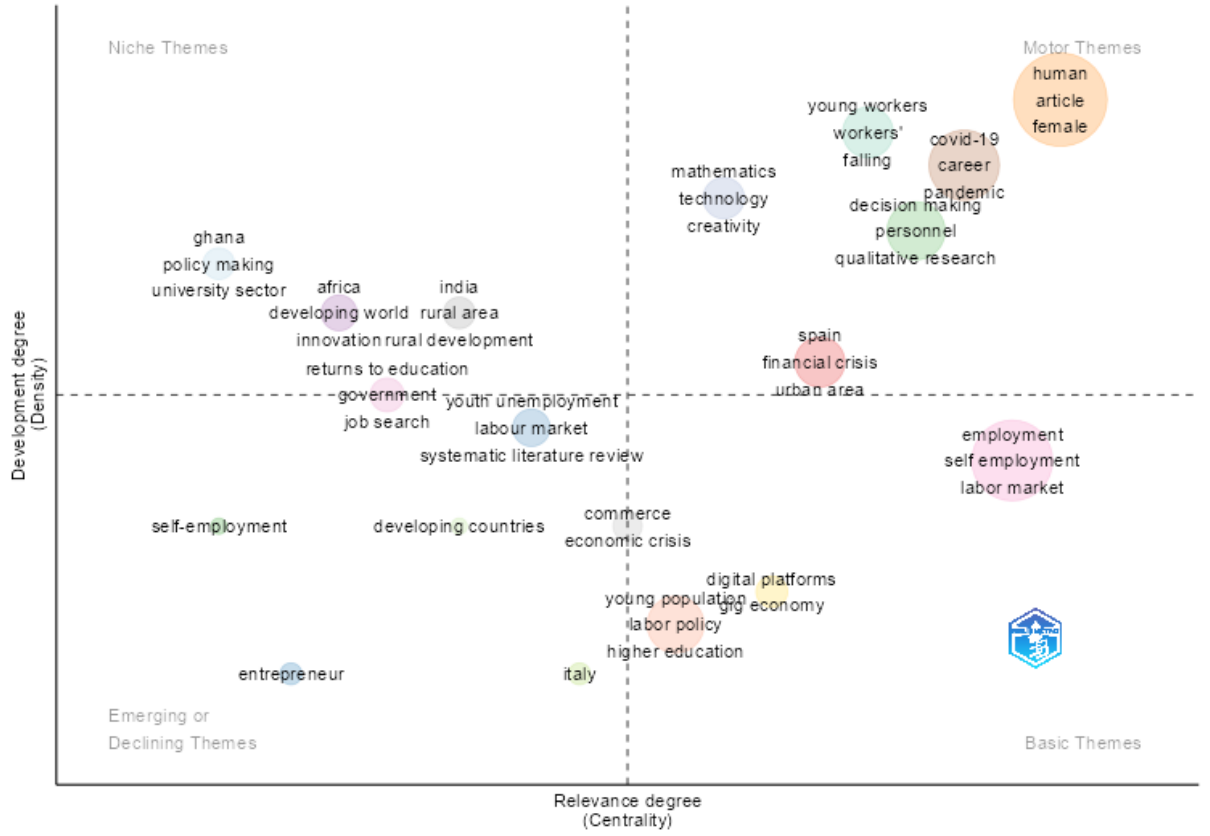


Source: Author's analysis using Biblioshiny (Bibliometrix R package; Aria & Cuccurullo, 2017).

The co-word network reveals four major thematic clusters. Cluster 2 is the most densely populated, covering demographic and psychosocial terms like "female," "mental health," and "young adult", with "human" holding the highest PageRank (0.067). Cluster 3 centres on labour-related terms, with "employment" showing high centrality and betweenness, indicating it bridges various subthemes. Cluster 4 focuses on workforce and education terms, while Cluster 1 includes policy-relevant nodes like "young population" and "labour policy". High-betweenness keywords such as "human" and "employment" play a pivotal role in connecting interdisciplinary topics across the field. (See Table 5 Fig.9)

ISBN : 978-93-344-3054-7

Fig.2 Thematic Map (Four Quadrants)

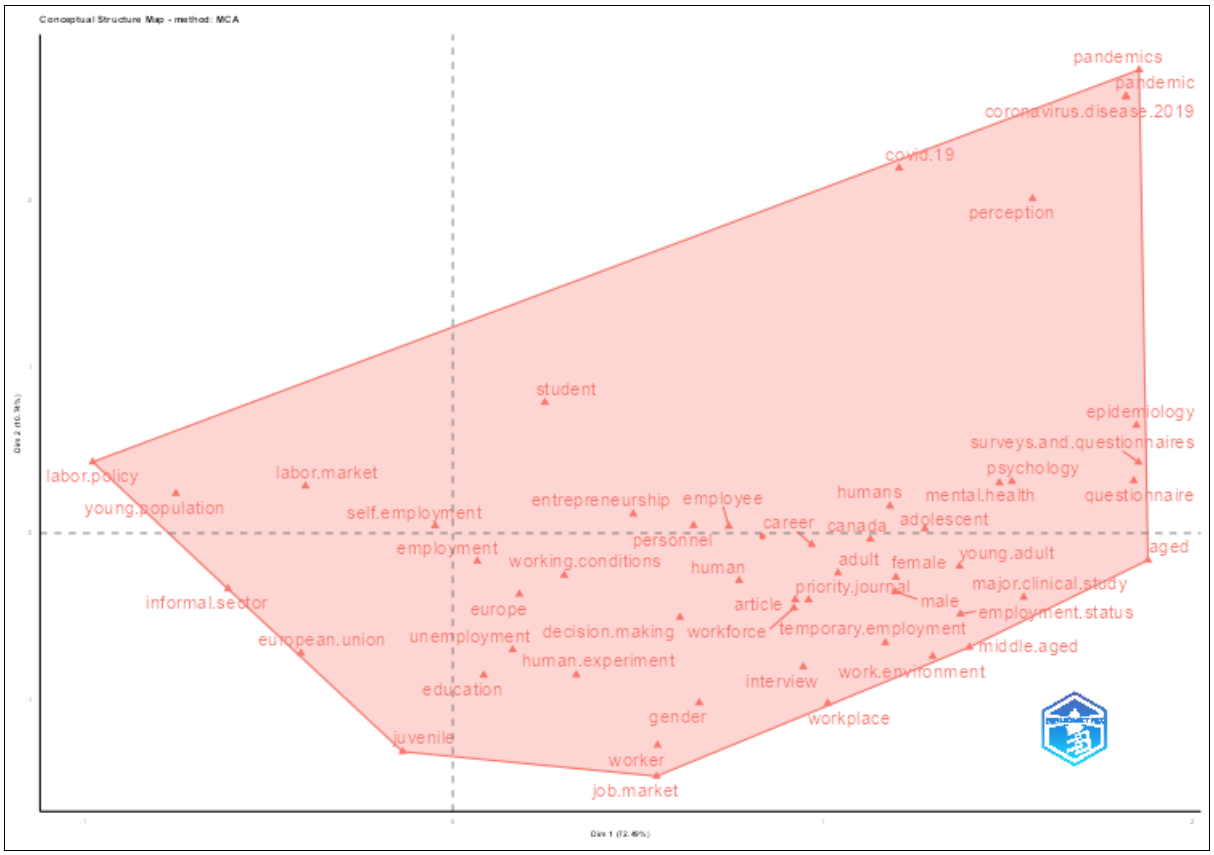


Source: Author's analysis using Biblioshiny (Bibliometrix R package; Aria & Cuccurullo, 2017).

The thematic map shows four distinct themes as quadrants. Motor themes such as humans, COVID-19, and decision-making are both conceptually well-developed and central to the field, indicating mature and influential areas of research. In contrast, niche themes like young workers, Africa, mathematics, and Ghana show high internal development but low centrality, suggesting they are specialized or context-specific with limited broader influence. Basic and transversal themes, including employment, Spain, and the young population, are central to the field but less developed, indicating foundational or widely relevant topics that require further exploration. The emerging or declining themes, such as entrepreneurship, self-employment, Italy, and developing countries, show low centrality and low density, suggesting these areas are either at an early stage of development or losing traction in the academic discourse. (See Fig.10)

ISBN : 978-93-344-3054-7

Fig.3 Factorial -Multiple Correspondence Analysis (MCA) of keywords



Source: Author's analysis using Biblioshiny (Bibliometrix R package; Aria & Cuccurullo, 2017).

The K-means clustering of the published records using Python programming brought five distinctive themes, which is a unique finding and a data-driven mapping of the literature which providing five themes. Theme 1 highlights the impact of precarious employment on youth, particularly early-career professionals, academicians, researchers, and service industry workers. Theme 2 illustrates that while entrepreneurship is often promoted as a solution to youth unemployment, it cannot compensate for the absence of decent jobs without structural support. Theme 3 emphasizes how the COVID-19 pandemic outbreak has worsened the existing labour market vulnerabilities, disproportionately affecting youth in temporary work. Themes 4 and 5 resonate with the long-standing concerns around the mismatch between education systems and labour market demands.

ISBN : 978-93-344-3054-7

Future Research Questions

The study calls for stronger collaborations between academics, policymakers, and industry to build a more equitable and future-ready youth workforce.

RQ1: How does the experience of precarious work vary across sectors (e.g., academia, service, gig economy) and among different demographic groups?

RQ2: To what extent does entrepreneurship education improve employment outcomes for youth in structurally disadvantaged contexts?

RQ3: How effective are experiential approaches, such as internships, mentorship, and project-based learning, in enhancing youth entrepreneurship and employability?

RQ4: How can the school and university curriculum be restructured to align more effectively with labour market needs?

RQ5: What roles do vocational and entrepreneurial training programs play in bridging the gap between education and employment for youth?

RQ6: What types of inclusive policy interventions can reduce employment-related inequalities among marginalized youth populations?

Conclusion

This study highlights the increasing complexity of youth unemployment and the evolving dynamics of platform workers. By combining bibliometric analysis with thematic clustering, it offers a structured overview of existing knowledge and emerging patterns in research on youth unemployment and gig workers. The rise in precarious employment, limited access to structural support for entrepreneurship, and the gap between education and job market demands are significant concerns worldwide.

Keywords: *Youth unemployment; gig work; bibliometric analysis; thematic review; K-means clustering; labor market challenges; precarious employment; education–employment mismatch.*

ISBN : 978-93-344-3054-7

Changing public attitudes toward primary health care centres: a study of awareness and services in ahmednagar district

Dipti L. Urhe

Sanjivani University, Kopargaon

diptiurhe77@gmail.com

Ajinkya M. Kadam

Sanjivani University, Kopargaon

ajinkyakadam3434@gmail.com

Purva A. Chaudhari

Sanjivani University, Kopargaon

purvachaudhari223@gmail.com

Parvej R. Shaikh

Sanjivani University, Kopargaon

parvejshaikh89886@gmail.com

Shivtej S. Nirmal

Sanjivani University, Kopargaon

shivtejnirmal02@gmail.com

Dr. K. Bharath

Department of MBA – MESOS

Sanjivani University, Kopargaon

Abstract

Primary Health Care Centres (PHCs) form the backbone of India's public health delivery system, especially in rural and semi-urban areas where access to specialized care remains

ISBN : 978-93-344-3054-7

limited. This study, titled "Changing Public Attitudes Toward Primary Health Care Centres: A Study of Awareness and Services in Ahmednagar District", seeks to examine the awareness, perception, and utilization patterns of the general public with respect to the services provided by PHCs. The research was conducted across multiple blocks of Ahmednagar district, Maharashtra, with a focus on identifying how people view the range of services offered, the ease of accessibility, and the differences in utilization based on socio-demographic factors such as age and gender.

Data were collected through structured interviews and questionnaires administered to patients, attendants, and members of the general public visiting selected PHCs. The services studied included maternal and child healthcare, immunization programs, outpatient care, preventive and promotive health measures, disease surveillance, and health awareness campaigns. Special attention was paid to understanding how individuals perceived the relevance and adequacy of these services, the extent to which they were aware of available provisions, and the challenges faced in accessing them.

The findings indicate a clear shift in public attitudes toward PHCs compared to the pre-COVID period. While earlier, PHCs were often perceived as limited-function institutions catering only to basic needs, the pandemic acted as a turning point by highlighting their role in disease prevention, vaccination drives, and emergency response. In the post-pandemic period, people have begun to acknowledge PHCs as reliable and accessible health units capable of providing a wide range of preventive and curative services. The "orbit loop" of PHC reach, when compared to the pre-COVID phase, has expanded considerably, with a noticeable increase in both footfall and public trust.

Age and gender variations were also observed in the study. Elderly respondents tended to value PHCs more for accessibility and affordability, while younger groups, though aware of PHC services, were often more critical about infrastructural and technological limitations. Women, particularly those from rural blocks, expressed higher levels of satisfaction with maternal and child healthcare facilities and immunization services, though some concerns were raised regarding waiting times and privacy. Men, on the other hand, focused more on outpatient and general medical services.

ISBN : 978-93-344-3054-7

Despite these positive changes in perception and increased reach, challenges remain. Issues of staff shortages, limited diagnostic facilities, and infrastructural constraints continue to hinder optimal service delivery. However, the general sentiment emerging from the study is that PHCs are now seen as “first responders” for healthcare needs, and their importance in maintaining community health is better recognized.

The study concludes that PHCs in Ahmednagar district have gained renewed significance in the eyes of the public, and their services are perceived as both valuable and necessary. To sustain this positive attitude and further enhance utilization, it is imperative for policymakers and health administrators to invest in strengthening PHC infrastructure, ensuring adequate human resources, and enhancing awareness campaigns. The results demonstrate that when adequately supported, PHCs not only improve health outcomes but also strengthen trust between communities and the public health system.

Keywords: *Primary Health Care Centres, Public Awareness, Public Attitude, Healthcare Services, Ahmednagar District, Accessibility, Service Utilization*

ISBN : 978-93-344-3054-7

Sign Language Conversion to Text and Speech using Live Feed

Miss.Satalkar Shrushti

Department of AIML,Sanjivani University

Mst.Unde Sarvesh

Department of AIML,Sanjivani University

Mst. Tekale Prathamesh

Department of AIML,Sanjivani University

Mst. Wable Kartik

Department of AIML,Sanjivani University

Abstract

Sign language is crucial for communication within the deaf and mute people. To help eliminate the barriers between sign language users and those who do not know the language, we propose an innovative real-time sign language detection system that works with normal web cameras. This system is designed to recognize sign language gestures that are performed in front of the camera and translate them into both speech and text that appears on the screen. The method optimized for using camera includes computer vision approaches and natural language processing techniques track the hand and face movement patterns and detect particular motion patterns relating to certain gestures. The next step involves machine learning where the already known gestures/motions could correspond to particular words in the sign language. The recognized gestures are then mapped to a predefined sign language dictionary, where each gesture corresponds to a specific word or phrase. This mapping is achieved using machine learning algorithms, which have been trained on a large dataset of sign language gesture to identify patterns and map gestures to their corresponding textual representations. Once the gestures are mapped to text, the system generates speech output. This system features two types of output: audio for the immediate interpretation of speech and text displayed on the screen for supplementary visual support. The components improve access for users of the system and for sign language communicators increase its effectiveness in addressing the problem.

ISBN : 978-93-344-3054-7

The technology can be installed in web cameras and other devices with integrated cameras with application in business centers, education activities, healthcare facilities, and other settings improving interactions among users of sign language.

The synthesized speech provides an auditory representation of the sign language, enabling individuals who are not familiar with sign language to understand and respond to the communicated messages. The development of this real- time sign language conversion system has the potential to bridge the communication gap between individuals who use sign language and those who do not.

By providing an efficient and accurate conversion of sign language into text and speech, this project aims to empower individuals with hearing impairments to communicate more effectively and inclusively in various social and professional settings.

Keywords: *Sign,system,healthcare,education,machine learning,barrier removal*

ISBN : 978-93-344-3054-7

Comparative Study on Health Sector Financing: Insights from Primary Healthcare Centres Across Maharashtra, Uttar Pradesh, Bihar, Madhya Pradesh, and Gujarat

Dipti L. Urhe

Department of MBA – MESOS Sanjivani University, Kopargaon, India

Ajinkya M. Kadam

Department of MBA – MESOS Sanjivani University, Kopargaon, India

Purva A. Chaudhari

Department of MBA – MESOS Sanjivani University, Kopargaon, India

Parvej R. Shaikh

Department of MBA – MESOS Sanjivani University, Kopargaon, India

Shivtej S. Nirmal

Department of MBA – MESOS Sanjivani University, Kopargaon, India

Dr. K. Bharat

Department of MBA – MESOS Sanjivani University, Kopargaon, India

Abstract

The financing of the health sector plays a pivotal role in determining the accessibility, efficiency, and quality of healthcare services, particularly in a country as diverse and populous as India. Primary Healthcare Centres (PHCs) serve as the foundation of the Indian healthcare delivery system, acting as the first point of contact for rural and semi-urban populations. Despite their crucial role, the adequacy and efficiency of financial allocation to PHCs vary widely across states, reflecting disparities in governance, fiscal priorities, and socio-economic conditions.

This study undertakes a comparative analysis of health sector financing with a special focus on PHCs across five major Indian states—Maharashtra, Uttar Pradesh, Bihar, Madhya Pradesh, and Gujarat.

ISBN : 978-93-344-3054-7

These states were selected owing to their demographic size, economic diversity, and significant differences in healthcare outcomes. The research examines the extent of financial contributions made by state governments, the nature of expenditure on PHC infrastructure, workforce, and service delivery, and the efficiency with which allocated resources are utilized.

Methodologically, the study employs a mixed-methods approach. Secondary data from state health budgets, National Health Mission (NHM) reports, and government expenditure statements were analysed to assess trends in health financing. Key performance indicators such as per capita health expenditure, proportion of budget allocation to PHCs, and utilization ratios were compared across the five states. To complement this, qualitative insights were drawn from policy documents and relevant literature to contextualize the quantitative findings.

Preliminary findings suggest notable inter-state disparities. Maharashtra and Gujarat demonstrate relatively higher per capita health spending on PHCs, reflecting stronger fiscal prioritization, whereas states like Bihar and Uttar Pradesh struggle with both inadequate allocation and underutilization of funds. Madhya Pradesh reflects a mixed picture, with increasing allocations but persistent gaps in fund absorption capacity. Across all states, challenges such as delayed fund disbursement, shortage of trained medical personnel, and infrastructure constraints weaken the effective translation of financial resources into improved healthcare outcomes.

The analysis further highlights that financing strategies alone are insufficient unless coupled with robust monitoring, accountability frameworks, and efficient utilization mechanisms. For example, while Maharashtra shows better financial commitment, issues of urban-rural imbalance in PHC functioning persist. Conversely, in Bihar and Uttar Pradesh, systemic inefficiencies dilute the limited financial inputs, resulting in poor service delivery at the grassroots. The comparative dimension of the study underscores how fiscal prioritization, institutional capacity, and governance quality collectively shape the impact of health financing at the primary care level.

In conclusion, the study argues that strengthening PHC financing in India requires not only increasing financial allocations but also enhancing transparency, accountability, and absorptive capacity at the state level.

ISBN : 978-93-344-3054-7

By drawing insights from five diverse states, the research provides evidence that can inform policymakers in designing state specific as well as national strategies to improve the financial sustainability of PHCs. Strengthening PHCs through targeted financial reforms holds the potential to reduce healthcare inequities, promote preventive care, and improve health outcomes for millions, thereby aligning with India's long-term vision of universal health coverage.

Keywords: *Health Sector Financing, Primary Healthcare Centres, Comparative Study, State Health Budgets, India*

ISBN : 978-93-344-3054-7

Track 5. Supply Chains, Operations, and Economic Intelligence

Track 5 investigates how supply chains and operations are being transformed by digitalization, artificial intelligence, and the growing emphasis on circularity. Contributions on generative AI for circular supply chain design and for simulating economic shocks illustrate a broader movement toward data-driven and anticipatory approaches to operations management. In a world shaped by climate disruptions, geopolitical tensions, and volatile markets, the capacity to model scenarios, anticipate disruptions, and design more resilient and sustainable supply networks has become a strategic necessity.

The track also highlights the importance of integrating environmental and social considerations into supply chain decisions. Circular economy principles, responsible sourcing practices, and evolving stakeholder expectations increasingly shape how firms design products, select partners, and manage flows of materials, information, and capital. Economic intelligence, understood as the systematic collection and analysis of data to inform strategic decisions, emerges as a crucial capability for managing complexity and uncertainty.

By bridging technical tools such as generative AI with strategic and ethical questions about resilience and sustainability, Track 5 offers valuable insights for scholars and practitioners seeking to rethink operations and supply chains in turbulent times.

ISBN : 978-93-344-3054-7

Generative AI for Designing Circular Economy Supply Chains

Samarth Nagare

Sanjivani University

samnagare8@gmail.com

Sarthak Rahane

Sanjivani University

srthakrahane@gmail.com

Sumit Wagh

Sanjivani University

sw2400315@gmail.com

Anant Pagar

Sanjivani University

anantpagar127@gmail.com

Abstract

In the past few years, one of the key issues in international business operations, especially in supply chain management, has been sustainability. Conventional supply chains are linear in nature—take, make, use, and dispose—which result in quick draining of resources, huge energy consumption, and enormous wastage. To solve these issues, the circular economy has come forward as a revolutionary model focusing on reuse, recycling, refurbishment, and remanufacturing to seal material loops and lengthen product lifecycles. Concurrently, Generative Artificial Intelligence (AI) has gained attention as a revolutionary technology with the capability of designing, simulating, and optimizing intricate systems. The intersection of generative AI and circular economy supply chains has tremendous potential to redefine how industries obtain both competitiveness and sustainability.

ISBN : 978-93-344-3054-7

Generative AI is so much more powerful in that it does not just analyze data but also creates possibilities through generating design options and simulating what-ifs. In circular supply chains, it can be used across various places. First, AI can aid in the design of sustainable products by developing models that are optimized for modularity, recyclability, and minimized material consumption. Second, it optimizes reverse logistics by finding optimal routes and collection points for the return of products to producers to be recycled or remanufactured. Third, AI supports material flow analysis and substitution plans and proposes substitute materials that are sustainable, scarce, and environmentally friendly. Fourth, it facilitates demand forecasting, enabling companies to avoid overproduction and waste, particularly in perishable sectors like food or in rapidly changing industries like electronics. Last but not least, generative AI can simulate scenarios, experimenting with supply chain robustness against disruptions like shortages of resources, more stringent environmental regulations, or climate-related perils.

The advantages of using generative AI in designing circular supply chains are numerous. On the ecological side, it minimizes carbon footprint, waste production, and dependency on virgin materials. On the economic side, it helps businesses save on costs through material recovery and reuse while creating new opportunities for imaginative business models like leasing, product-as-a-service, and sharing platforms. It also increases resilience so that supply chains can better survive global crises and market volatility. In addition, consumers increasingly care about sustainability, and supply chain transparency through AI further builds trust and reputation.Nonetheless, there are issues. Generative AI needs enormous quantities of good-quality data relating to materials, logistics, and waste streams. Implementation is frequently expensive, especially for small and medium-sized businesses.

There are also ethical and regulatory issues, with AI-driven decisions having to be consistent with sustainability legislation, labor regulations, and equitable trade practices. Additionally, AI systems' energy usage raises questions about their own environmental footprint should they not be fuelled by renewable sources.In the future, the use of generative AI in circular supply chains will increase. It will be combined with IoT sensors and blockchain to offer real-time monitoring and more transparency. The creation of digital twins—computer models of supply chains—will enable organizations to test circular approaches in virtual environments before applying them.

ISBN : 978-93-344-3054-7

Governments can also use AI for devising and reward systems that incentivize the adoption of circular economy.In summary, generative AI provides a revolutionary way of designing supply chains that are not only cost-effective but also environmentally friendly and socially sustainable. As much as there are challenges in areas of data, cost, and ethics, its capacity to create sustainable systems, minimize waste, and enhance resilience positions it as a key facilitator of the circular economy. Through embracing generative AI, industries can become closer to attaining global sustainability objectives at the same time that they are competitive in an increasingly environmentally conscious market.

Keywords: *Generative AI; circular economy; sustainable supply chains; reverse logistics; material flow optimization; digital twins; AI-driven sustainability; resource efficiency.*

ISBN : 978-93-344-3054-7

Generative AI for simulating economic shocks on supply chains

Shrawani Gaikwad

Affiliation: AIDS, School of Engineering and Technology (SET), Sanjivani University

shravani1gaikwad@gmail.com

Abstract

In today's interconnected global economy, supply chains face increasing risks from economic shocks, including sudden demand surges, raw material shortages, geopolitical conflicts, and financial market fluctuations. Such disruptions can trigger failures across complex networks, leading to operational delays, financial losses, and reputational damage. For example, during the COVID-19 pandemic, minor issues with individual suppliers in key industries caused production delays lasting weeks and resulted in billions in losses worldwide. Traditional forecasting methods rely on historical data and linear assumptions, which often overlook non-linear relationships. As a result, organizations may be inadequately prepared for such challenges. This research proposes using Generative Artificial Intelligence (AI) to simulate economic shocks and strengthen supply chain resilience. The study utilizes generative models, such as Variational Autoencoders (VAEs) and Generative Adversarial Networks (GANs), to create realistic synthetic scenarios of economic disruptions, including rare and extreme events. Unlike standard predictive models, Generative AI allows exploration of previously unseen scenarios, helping to uncover systemic vulnerabilities. Multi-tiered supply chain networks-including suppliers, manufacturers, distributors, and retailers-are modeled alongside critical factors such as lead times, inventory levels, production capacities, transportation limits, and market demand fluctuations. This approach captures the ripple effects of shocks across interconnected systems. The methodology follows a structured four-step process. First, supply chain networks are mapped to identify critical nodes and dependencies. Second, diverse economic shock scenarios are generated using generative AI, simulating both likely and unlikely events. Third, the spread of disruptions through the network is simulated to measure operational, financial, and service-level impacts. Finally, strategies for resilience are developed, including alternative sourcing, flexible inventory allocation, and optimized logistics routing to mitigate cascading risks.

ISBN : 978-93-344-3054-7

Early simulations indicate that even a 5% disruption at a crucial supplier can lead to 30-40% delays downstream, underscoring the importance of AI-driven, scenario-based planning. This research makes a unique contribution by integrating Generative AI with supply chain analytics, forming a proactive and predictive framework for risk management and strategic decision-making. Additionally, it equips policymakers and researchers with tools to model systemic economic risks, anticipate disruptions, and design mitigation strategies. Organizations applying this framework can maintain operational continuity, improve resource efficiency, and sustain competitiveness in volatile markets. By identifying critical vulnerabilities and stress-testing networks under extreme conditions, the approach provides actionable insights for long-term planning and policy development. In conclusion, Generative AI transforms supply chain risk management from a reactive to a predictive and proactive approach, enabling organizations to anticipate disruptions, enhance resilience, and optimize decision-making in uncertain environments. By combining AI-driven simulations, real-world scenario analysis, and data-based risk evaluation, this research establishes a new benchmark for supply chain resilience and economic intelligence. The findings highlight the transformative potential of generative AI in helping organizations and policymakers prepare for, respond to, and mitigate economic shocks, ensuring adaptive and future-ready supply chains. Keywords: Generative AI, Supply Chain Resilience, Economic Shocks, Risk Simulation, Predictive Analytics, Operational Optimization, Systemic Vulnerability.

Keywords: *Generative AI; economic shock simulation; supply chain resilience; systemic vulnerability; risk modeling; predictive analytics; scenario generation; operational disruption analysis.*

ISBN : 978-93-344-3054-7

Transforming Transport Services Under Crisis Institutional Rebuilding, Innovation, and Sustainability in Ukraine's War Economy

Prof. Dr. M.F. HARAKE

MESOS Business School (France) / GBSB Global Business School (Malta)

mfharake@mesos-bs.com

Abstract

Transport services are critical infrastructures that connect markets, support economic development, and ensure access to essential goods. Yet, they are also among the most vulnerable systems when conflict or crisis disrupts institutional stability. The war in Ukraine has generated one of the most profound transport and logistics crises in recent history. The Russian invasion in February 2022 blocked Black Sea ports, damaged rail and road networks, and stranded millions of tons of grain and other commodities. These disruptions cascaded across the global economy, particularly destabilizing food security in import-dependent regions such as Africa and the Middle East (UNCTAD, 2023).

This chapter investigates how transport service innovation, institutional rebuilding, and international cooperation enabled Ukraine to sustain essential trade flows despite systemic disruptions. It focuses on three interrelated themes : sustainability, inclusivity, and technology, and argues that transformative transport services emerge through a combination of governance reform, digital innovation, and multi-stakeholder partnerships. The Ukrainian case is presented not only as a crisis response but as a model for how transport systems worldwide can adapt to systemic shocks.

ISBN : 978-93-344-3054-7

Study design/methodology/approach

The study employs a qualitative case study approach (Yin, 2017), positioning Ukraine as an "extreme case" of transport disruption and resilience under conflict. Evidence is triangulated from institutional reports (IMF, 2023; World Bank, 2024), international organizations (UNCTAD 2023; WTO, 2023), and policy documents (European Commission, 2023).

Trade and logistics data from Ukrainian government agencies and the UN's Black Sea Grain Initiative monitoring provide empirical grounding. Secondary academic sources on supply chain resilience and transport innovation (Christopher & Peck, 2004; Ivanov & Dolgui, 2020) enrich the theoretical lens.

The analysis integrates institutional theory (North, 1990; Acemoglu & Robinson, 2012), which emphasizes the role of governance and rules in shaping economic performance, with resilience theory (Holling, 1973), which frames adaptation under systemic stress. It also draws on literature in transport and logistics innovation, emphasizing sustainability, inclusivity, and technology adoption as dimensions of transformative services.

Findings

1. Sustainability and transport resilience

The blockade of Ukraine's Black Sea ports, through which 90% of grain exports traditionally flowed, forced a rapid reconfiguration of transport services. Rerouting commodities via rail, road, and river corridors to EU states such as Poland, Romania, and the Baltic countries increased costs and carbon emissions, presenting a short-term sustainability challenge (World Bank, 2024). Yet this crisis-driven adaptation also accelerated long-term investment in multimodal transport infrastructure and green corridors, supported by the European Union's "Solidarity Lanes" initiative (European Commission, 2023). This illustrates a paradox: while conflict undermines sustainability goals by increasing resource intensity, it can also catalyze institutional investment in more resilient, and ultimately greener, transport systems.

ISBN : 978-93-344-3054-7

2. Inclusivity and equitable access

The Black Sea Grain Initiative, brokered by the United Nations and Turkey between July 2022 and July 2023, facilitated the export of over 32 million tons of grain and other foodstuffs from Ukrainian ports. A significant share of these exports reached food-insecure regions in Africa and the Middle East (FAO, 2023). This initiative highlighted the inclusive dimension of transport services: ensuring equitable access to essential goods for vulnerable populations in global markets. By framing food exports as a humanitarian necessity, the initiative underscored how transport innovation under crisis is not only a technical challenge but also a matter of global justice and social responsibility.

3. Technology and digital transformation

Technology played a decisive role in sustaining transport operations during the conflict. Ukrainian authorities implemented digital customs clearance, electronic freight tracking, and satellite monitoring to facilitate rapid cross-border coordination (WTO, 2023). Economic intelligence platforms provided predictive analytics that allowed exporters to anticipate port attacks, reroute cargo, and diversify supply corridors (Choi et al., 2018). These innovations represent a broader trend toward the digitization of transport services, where real-time data and artificial intelligence support resilience in disrupted environments. Importantly, these technologies also enhance transparency and reduce opportunities for corruption, thereby strengthening institutional trust.

4. Institutional rebuilding and public–private partnerships

Institutional cooperation was central to the reconfiguration of Ukraine's transport services. The EU's Solidarity Lanes initiative mobilized governments, railway operators, and private logistics firms to create alternative export routes, moving millions of tons of goods across land and river corridors (European Commission, 2023). These efforts were complemented by donor-financed infrastructure investments and credit facilities for exporters. By embedding public–private partnerships within a broader institutional rebuilding framework, Ukraine demonstrated how collaborative governance can transform disrupted transport systems into resilient, adaptive networks.

ISBN : 978-93-344-3054-7

5. Global lessons for transformative transport services

Ukraine's experience offers three broader lessons. First, sustainability cannot be an afterthought: while crises may temporarily increase environmental costs, institutional rebuilding should integrate green transport innovations from the outset. Second, inclusivity in transport is not merely about efficiency but about ensuring equitable access to essential goods, particularly for vulnerable global populations. Third, technology adoption is indispensable in modern transport services, providing the intelligence needed to navigate systemic risks. Together, these dimensions demonstrate how transformative transport innovation requires aligning institutional reform, stakeholder collaboration, and technological integration.

Originality/value

This study contributes to the theme of the edited volume by demonstrating how transformative transport services emerge under crisis through sustainability, inclusivity, and technology.

- Theoretically, it extends institutional and resilience frameworks into transport innovation, emphasizing the interplay between governance, technology, and social responsibility.
- Empirically, Ukraine provides robust evidence: a GDP contraction of 29% in 2022, 32 million tons of grain exported under the Black Sea Grain Initiative, and billions of euros invested in alternative transport corridors (World Bank, 2024; UNCTAD, 2023).
- Practically, the findings highlight actionable lessons: for policymakers, the importance of embedding green, inclusive, and digital principles into transport reforms; for firms, the need to adopt digital tracking, certification, and multimodal strategies to sustain resilience.

Ultimately, Ukraine demonstrates that transport crises can catalyze transformative innovation, reshaping systems to be more sustainable, inclusive, and technologically advanced. Its experience offers a forward-looking model for other fragile or disrupted transport systems worldwide.

ISBN : 978-93-344-3054-7

Keywords: *Ukraine; transport services; supply chain resilience; sustainability; inclusivity; technology; institutional rebuilding; logistics innovation; Black Sea Grain Initiative; public–private partnerships*

ISBN : 978-93-344-3054-7

The Need for Corporate Purpose and Responsible Leadership: An Agri Supply Chain Overview of Seed to Shelf in India

Dr. Srilalitha Girija Sagi,

directormdp@sanjivani.edu.in

Abstract

The purpose of corporate and responsible leadership is to make sure that the business orientation is not overly influenced by financial gains alone. A seed-to-shelf agri market model necessitates corporate purpose and responsible leadership to address sustainability issues, transparency, and farmer empowerment challenges across the agricultural value chain of India and the world. This research paper aims to explore the areas of sustainability, business models for resource management, market access for small-scale farmers, and sustainable practices, from seed production to final product delivery, to meet the growing demands of consumers and regulatory requirements for ethical and responsible food supply chain systems. This paper aims to study the ethical and regulatory challenges of GMOs and the product category of the Ready–to–Eat sector as a case study of corporate purpose and responsible leadership.

Keywords: *Purpose, Sustainability, ESG, and Inclusive Growth*

ISBN : 978-93-344-3054-7

Decoding the Risk-Return Paradigm: A Panel Data Analysis of Indian Equity Funds for Sustainable Investment Strategy

CMA Jayraj Javheri
Sanjivani University, Kopargaon, Maharashtra, India
jayrajjavheri@gmail.com

Dr. Ravindra Gawali
Amrutvahini Institute of Management, Business & Administration, Sangamner, Maharashtra,
ravindragawali974@gmail.com

Abstract

This study investigates the risk-return characteristics of Indian equity mutual funds, focusing on Small-cap, Mid-cap, and Large-cap categories. The study investigates whether small-cap funds provide higher returns and whether their risk-adjusted performance is different from that of other fund types using Kruskal–Wallis non-parametric tests for risk (Standard Deviation, Beta) and risk-adjusted returns (Sharpe and Treynor ratios) and a random-effects panel regression for annual returns. . With assets under management (AUM) expected to reach ₹54.5 trillion in 2024 (AMFI, 2024), the mutual fund sector in India is still under-penetrated, with less than 10% of households making direct investments. For sustainable financial inclusion, it is therefore essential to comprehend fund efficiency. The findings show that while systematic risk (beta) is statistically indistinguishable between categories, small- and mid-cap funds produce substantially higher absolute returns than large-cap funds, albeit at the expense of increased volatility. Crucially, there is little variation in risk-adjusted returns, confirming that increased volatility does not always translate into efficiency gains.

Keywords: *Small-cap funds, Risk-return tradeoff, Panel data regression, Kruskal–Wallis test, Sharpe ratio, Treynor ratio, Indian mutual funds*

ISBN : 978-93-344-3054-7

Track 6. Crisis, Conflict, and Resilience in Business

Track 6 addresses innovation and management in contexts marked by crisis, conflict, and institutional fragility. The papers examine financial resilience, marketing and institutional rebuilding in crisis environments, and tensions between public and private health providers during the COVID-19 pandemic. They show that crises are not only moments of disruption but also opportunities for reconfiguring institutions, rethinking business models, and renegotiating relations between public and private actors.

The contributions emphasize that resilience is not merely a technical property of systems but a political and organizational process. It involves choices about whose interests are prioritized, which risks are deemed acceptable, and how resources and responsibilities are distributed. Case studies from war-affected transport systems, post-crisis economies, and contested health systems illustrate how actors experiment with new governance arrangements, hybrid partnerships, and innovative forms of coordination under severe constraints.

By bringing together research on financial systems, marketing, public health, and institutional rebuilding, Track 6 invites readers to reflect on what it means to pursue innovation in fragile and conflict-affected settings. It underscores the need for approaches that are sensitive to local histories and power dynamics, and that place human security and dignity at the center of resilience strategies.

ISBN : 978-93-344-3054-7

Mapping the Landscape of Financial Resilience Research

Ananya Banik

The Assam Royal Global University

ananyabanik2001@gmail.com

Dr. Rajdeep Nag,

The Assam Royal Global University

Rajdeep.nag@rgi.edu.in

Dr. Pinak Deb

Barak Valley Engineering College

drpinakdeb.28@gmail.com

Abstract

Through the years, Financial Resilience (FR) has surfaced as a fundament of economic stability, yet its theoretical confines remain fragmented across varied scholarly trajectories. This article seeks to chart the intellectual structure of FR research by mapping its development, thematic foci and research frontiers. It adopts a four-tired bibliometric review protocol on a dataset of 366 Scopus indexed articles (2010-2025) using PRISMA guidelines. Performance analysis, science mapping and network analysis was performed with the help of VOSviewer and Bibliometrix (R package). Further, content analysis enhanced these techniques to comprehend thematic clusters and future research avenues. Findings reveals that FR scholarship accelerated post 2008 Global Financial Crisis (GFC) and COVID-19 pandemic.

Networks disclose fragmented collaboration with Western dominance, thus limiting the focus on Global South perspectives and intersectional vulnerabilities. This study falls under one of the exclusive research that combines a Systematic Literature Review (SLR) with bibliometric and content analysis. In addition to methodological novelty, it proposes a FR Pyramid situating the Economy at the apex, thereby offering an integrative lens for future research and policy making.

ISBN : 978-93-344-3054-7

Keywords: *Financial resilience, Resilience, Systematic Literature Review, Bibliometric analysis, Content analysis, Research mapping*

ISBN : 978-93-344-3054-7

From Disruption to Renewal: Institutional Rebuilding and Global Marketing Resilience in Crisis Environments

Prof. Dr. M.F. HARAKE

MESOS Business School (France) / GBSB Global Business School (Malta)

mfharake@mesos-bs.com

Abstract

Crises and conflicts destabilize not only economic systems but also the institutional frameworks that underpin global markets, consumer trust, and business legitimacy. Lebanon exemplifies such turbulence: since 2019, the country has faced overlapping crises including financial collapse, the 2020 Beirut port explosion, and recurring governance failures. These disruptions weakened consumer trust, reduced export sophistication, and undermined global buyer confidence. Yet, amid collapse, firms, diaspora communities, and international partners have engaged in adaptive strategies to rebuild institutions, restore trust, and reconnect to global markets.

This paper argues that institutional rebuilding is a first-order determinant of global marketing resilience, shaping not only firm survival but also consumer behavior, diaspora demand, and brand legitimacy. By focusing on Lebanon, the study illustrates how governance reform, regulatory innovation, and multi-stakeholder collaboration intersect with marketing signals such as certification, branding of authenticity, and diaspora loyalty to restore consumer trust and reestablish competitiveness. Lebanon is treated as an "extreme case" (Yin, 2017), whose lessons generalize to fragile and emerging markets worldwide.

Study design/methodology/approach

The research employs a qualitative case study design (Yin, 2017) to examine the Lebanese context of institutional collapse and renewal. Data were triangulated from multiple sources:

- Macro-institutional reports: World Bank's Lebanon Economic Monitor (World Bank, 2025); the Reform, Recovery and Reconstruction Framework (World Bank et al., 2020); Harvard Growth Lab policy analyses (Hausmann, 2023).

ISBN : 978-93-344-3054-7

- Sectoral/export studies: Revealed Comparative Advantage analysis of Lebanon's exports (Atallah et al., 2023); trade portals (Lebtrade, 2025).
- Consumer and marketing perspectives: International standards for Lebanese exports (U.S. Department of Commerce, 2024; International Labour Organization, 2025); diaspora consumer behavior (World Bank Data, 2023).

The analysis applies theory-informed pattern matching, linking institutional dynamics (governance, regulation, partnerships) to marketing outcomes: export access, consumer trust, brand authenticity, and diaspora demand. The study integrates institutional economics (North, 1990; Robinson & Acemoglu, 2012), resilience theory (Holling, 1973), and Consumer Culture Theory (Arnould & Thompson, 2005) to frame results in marketing terms.

Findings

The Lebanese case demonstrates five pathways through which institutional rebuilding shapes marketing resilience:

1. Governance reform and consumer trust. Governance failures since 2019 led to a collapse in consumer confidence, constraining brand credibility (Makdissi et al., 2025). Limited reforms (e.g., central bank auditing standards in earlier decades) temporarily restored trust, underscoring governance's role in legitimizing marketing signals (North, 1990; Robinson & Acemoglu, 2012).
2. Regulatory innovation and quality signaling. Firms compensated for weak domestic institutions by adopting international certifications (ISO, Fairtrade, organic, geographical indications). In wine and olive oil, these certifications became vital signals of quality and authenticity abroad (Lebtrade, 2025; International Labour Organization, 2025). Lebanese wine exports totaled $17 million in 2020, with nearly half of production exported, illustrating reliance on compliance with EU standards (Lebtrade, 2025).

ISBN : 978-93-344-3054-7

3. Public–private partnerships and resilience branding. The 3RF framework mobilized government, civil society, and firms to rebuild institutions after the Beirut explosion (World Bank et al., 2020). Firms leveraged these efforts to construct brand narratives emphasizing solidarity and resilience values increasingly important to global consumers (Porter & Kramer, 2011).
4. Diaspora consumer behavior. Remittances represented 30% of GDP in 2023 (World Bank Data, 2023). Diaspora communities not only sustained domestic demand but also promoted Lebanese brands abroad, reinforcing perceptions of authenticity. Diaspora loyalty exemplifies Consumer Culture Theory (Arnould & Thompson, 2005): products serve as cultural identity markers, embedding marketing resilience within cultural consumption patterns.
5. Entrepreneurship and humanitarian innovation. Entrepreneurs in renewable energy, healthcare, and education transformed humanitarian needs into market opportunities, using marketing strategies that highlighted reliability and social value. Family firms employed responsible leadership to preserve brand trust during institutional collapse (Maak & Pless, 2006).

These findings demonstrate that marketing resilience is not just a firm capability but an emergent property of institutional ecosystems (Holling, 1973). Firms that engaged in institutional rebuilding through certification, branding, and partnerships maintained legitimacy in global markets, while those dependent on fragile institutions experienced reputational decline.

Originality/value

This study makes three contributions:

1. Theoretical. It extends institutional economics into international marketing by specifying how governance, regulation, and partnerships shape global marketing outcomes. By integrating resilience theory with consumer culture theory, it highlights consumer trust, diaspora loyalty, and authenticity perceptions as vital to resilience.

ISBN : 978-93-344-3054-7

2. Empirical. Lebanon illustrates measurable impacts: GDP contraction of 38% (2019–2023), remittances of 30%+ GDP (2023), $17M wine exports (2020), and documented declines in export sophistication (Atallah et al., 2023). These data anchor theory in marketing realities.

3. Practical. For firms, the study recommends investing in international certifications, leveraging diaspora networks, and embedding resilience narratives into branding. For policymakers, it emphasizes institutional reforms that build trust, transparency, and market-enabling standards.

Ultimately, Lebanon is framed as an extreme case whose lessons generalize to fragile and emerging markets, demonstrating that institutional rebuilding is inseparable from global marketing resilience.

Keywords: *Institutional rebuilding; Global marketing resilience; Lebanon; Governance reform; Consumer trust; Diaspora marketing; Brand authenticity; Emerging markets*

ISBN : 978-93-344-3054-7

Tensions Between Public and Private Hospitals in Morocco During Covid-19

Oumaima OMARI HARAKE

University of Poitiers, Laboratoire CEREGE "UR13564"

oomari01@poitiers.iae-france.fr

Abstract

Context

The COVID-19 pandemic exposed vulnerabilities and tensions between public hospitals and private clinics in Morocco. The Moroccan healthcare system already suffered from a lack of complementarity between the public and private sectors, resulting in inequitable funding and fragmented services. For example, although public hospitals provide about 83% of care, they receive only approximately 42% of health expenditures, with the rest spent in the private sector. These structural imbalances complicated the management of the health crisis, particularly in terms of coordination and resource sharing.

Methodology

A fictitious qualitative case study was conducted involving two Moroccan healthcare facilities (one public and one private) to analyze collaboration and tension dynamics during the pandemic. This hypothetical study involved simulated semi-structured interviews with health executives and care providers in each facility, combined with an analysis of official documents (Ministry of Health reports, WHO guidelines) and existing studies. This methodological approach, while simulated, draws on trends documented in the literature and preserves the anonymity of the organizations studied.

Results

The analysis highlights several critical issues. Initially, the absence of formal public-private coordination mechanisms led to a fragmented response. Public hospitals, quickly saturated, faced the influx of patients alone, whereas many private clinics remained underutilized at the beginning of the crisis.

ISBN : 978-93-344-3054-7

Once the Ministry of Health authorized the private sector to participate in the care of COVID-19 patients, divergences emerged regarding treatment protocols and costs.

Testimonies indicate friction over the sharing of resources (ICU beds, ventilators) and overbilling practices in some private clinics, despite state-imposed regulated tariffs. Three private clinics were sanctioned for abusive pricing practices, such as demanding exorbitant guarantee checks and were compelled to reimburse patients who were improperly charged. At the same time, public hospitals struggling with chronic staff and resource shortages, had difficulty providing an optimal level of care for all patients, exacerbating inequalities in access. It became apparent that the most disadvantaged patients, reliant on the public system, bore the brunt of capacity and supply limitations, whereas private facilities prioritized patients able to afford expensive care, deepening a two-tiered access to healthcare.

Conclusion

The COVID-19 crisis served as a catalyst that brought public-private tensions to the forefront and underscores the imperative of strengthening cooperation between these two pillars of Morocco's healthcare system. Lessons from this study suggest that better shared governance is necessary to enhance health system resilience. Key recommendations include establishing clear coordination protocols between the public and private sectors, pooling critical resources (infrastructure, equipment, and personnel), and strictly regulating the costs of care during emergency situations. A more structured public-private partnership founded on trust and complementarity would enable more equitable and effective patient care during future health crises. By institutionalizing consultation and resource-sharing mechanisms between public and private hospitals now, Morocco would lay the groundwork for a more integrated, solidarity-based health system capable of facing the challenges ahead.

Keywords: *Health, Covid-19, Public hospitals, Private hospitals, Tensions, Morocco*

ISBN : 978-93-344-3054-7

Rebuilding Resilience: A Socio-Economic Digital Twin Framework for Inclusive Post-Conflict Urban Reconstruction

Divij Kulkarni

Abstract

The global challenge of post-conflict reconstruction is frequently hampered by a critical flaw: the tendency to recreate or even exacerbate the pre-existing socio-economic inequalities that may have fueled the instability in the first place. Traditional reconstruction models, while focusing on physical infrastructure, often fail to address the complex human dynamics that determine long-term peace and resilience. This paper directly addresses this gap by proposing a novel framework for the core themes of Track 6: Crisis, Conflict, and Resilience in Business. We introduce a visionary, AI-powered solution designed to guide policymakers towards a more equitable and sustainable rebuilding process. The proposed solution is a Socio-Economic Digital Twin, a high-fidelity, agent-based simulation framework designed to model a given post-conflict urban environment. This framework moves beyond the current capabilities of engineering-focused digital twins, which primarily model physical infrastructure, by integrating a sophisticated simulation of the city's human landscape. Millions of AI agents, representing individuals and households, are programmed with realistic economic needs, social biases, and behavioral patterns derived from available demographic and socio-economic data. This creates a virtual "policy sandbox" where government authorities, international aid organizations, and private sector stakeholders can test and visualize the complex, second-order consequences of their reconstruction strategies before implementation. For instance, planners can ask crucial counterfactual questions: What is the long-term impact on social cohesion and economic disparity if we prioritize mixed-income housing versus segregated rebuilding? Which infrastructure projects will generate the most equitable distribution of employment opportunities across different community groups? By simulating the emergent behavior of the city's population in response to different policy levers, the digital twin can reveal potential unintended consequences, such as the formation of new social ghettos, the rise of black markets, or the inefficient allocation of aid.

ISBN : 978-93-344-3054-7

The primary contribution of this research is the synthesis of three distinct fields—urban digital twins, computational social science, and AI-driven policy making—into a single, cohesive framework. Its novelty lies in shifting the optimization goal from pure efficiency to a primary focus on inclusive growth and social resilience.

This directly aligns with the InnoVision 2025 conference theme of Shaping the Future of Business through Innovation, Sustainability, and Inclusive Growth. By providing a tool to de-risk and refine reconstruction efforts, this framework offers a tangible pathway to not just rebuild cities, but to rebuild them better, creating more equitable, resilient, and peaceful societies.

Keywords: *Socio-Economic Digital Twin, Post-Conflict Reconstruction, Inclusive Urban Resilience, AI-Driven Policy Simulation, Inequality Mitigation*

ISBN : 978-93-344-3054-7

From Automation to Human-Centric Resilience: Industry 5.0 HR Strategies in Indian IT Companies

Dr. Abhijeet Dawle
Assistant Professor, SVKM's NMIMS, MPSTME, Shirpur, Dist. Dhule, Maharashtra, India.
Research Scholar, Sankalchand Patel University, Visnagar, Gujarat, India
abhijeetdawle@gmail.com

Dr. Pradeep Kumar Mishra
Associate Professor, Faculty of Management Studies, Sankalchand Patel University, Visnagar, Gujarat, India

Dr. Jitendra Sharma
Professor & Dean, Sankalchand Patel College of Engineering, Faculty of Management Studies, Sankalchand Patel University, Visnagar, Gujarat, India

Abstract

The move from Industry 4.0 to Industry 5.0 is, therefore, a paradigm shift in thinking about interdependence between technology, work, and human capacity. While Industry 4.0 encourages efficiency and standardization through technology, Industry 5.0 places humans, not technology, at the forefront of industrial and organizational development. Industry 5.0 encourages resilience, sustainability, and humane approaches to technology integration. The move to Industry 5.0 assumes added relevance in the context of the Indian IT industry, which has emerged as one of the global leaders in software development and IT services. The initial success and buzz created by automation, cloud computing, and AI and, more recently, by global events such as pandemics, cyber threats, and skills shortage deficits in new technologies and AI, as well as hybrid and remote work arrangements, demonstrate that overdependence solely on efficiency and technological integration creates systemic weaknesses in industries, including IT, globally and specifically in emerging markets like India. Industry 5.0, therefore, assumes added relevance with its role in providing leadership and strategic direction towards increased human-technology collaboration and improved organizational resilience.

ISBN : 978-93-344-3054-7

This research paper is an integration of key findings of various analyses and research reports published in between 2019-2025 and sourced from various reputed research firms, including NASSCOM, NITI Aayog, and Mckinsey & Company, International Labor Organization, European Commission, and Reuters, analyzing different aspects of Human Resource Management in IT organizations in India, with an objective of applying Industry 5.0 principles into IT organizations in India.

Industry 5.0, as proposed by the European Commission, progresses along three pillars that are primarily based on human-centric design, sustainability, and resilience. Coming to its application in the Indian scenario, human-centric resilience would mean the capacity of an individual firm to buffer its potential threats, along with simultaneously producing value, without harming its human assets. The organizational threats in terms of inequitable graduate employability, attrition in specialized skills, organizational dependencies, and demands from customers and shareholders regarding responsible AI and sustainable business practices make it imperative to achieve resilience in HR strategies. The need of the hour for Indian IT firms is to move from automation to responsible AI and humane design.

One of the major themes evident from the above-mentioned literature review is that technical skills are becoming outdated at a fast pace, and there is a discrepancy between academic output and employable skills. The NASSCOM publication of 2024 and the report by ILO in 2023 emphasize flexible and modular approaches to skilling, such as micro-credentialing and stackable learning approaches. The existing academic and technology industry ecosystem has started to move along skills and not degrees. Skill orchestrators and not job roles, respectively, have become crucial in designing resilient organizations against technology uncertainties.

The next significant theme is cooperation between humans and AI. The Indian IT industry has led the world in consuming generative AI technologies, automation engines, NLP analytics, and ML models. Though such technologies enhance productivity, they can be problematic from governance and ethics points of view. The NITI Aayog Responsible AI documents of 2018 and 2021 provide significant insights into AI governance and can be referred to by human resource professionals in formulating responsible AI strategies regarding HR-related matters such as recruitment, performance, and productivity.

ISBN : 978-93-344-3054-7

The hybrid workplace phenomenon emerged as another defining characteristic of the shape of the IT industry after the pandemic in India. NASSCOM (2024) points out that hybrid approaches, although formulated primarily as a response to crisis conditions, are now mainstream and long-term organizational strategies. The role of HR professionals has emerged as critical in making such distributed workers collaborative, providing equal opportunities, and strengthening cybersecurity.

Reuters (2024) further cites talent diversification and making talent searches decentralized, with organizations moving to tier-2 cities, thereby lowering business risks and improving talent retention.

Employee wellbeing, identified as a core pillar of organizational sustainability, is documented across multiple industry studies. Indian IT companies have begun investing in mental health support, burnout-prevention tools, fatigue monitoring systems, and training for managers to promote psychological safety. Wellbeing is now seen not merely as a welfare initiative but as foundational infrastructure that boosts resilience, creativity, and long-term performance. Human-centricity under Industry 5.0 therefore requires HR to design work environments that proactively safeguard dignity, autonomy, and cognitive health.

Responsible AI and data stewardship are yet another dimension of the Industry 5.0-aligned HR strategy. With AI integrated into the core of company operations, ethical and regulatory demands from clients and governments are increasing. Indian IT Companies operating globally are required to comply both with national directives as well as international standards of ethics. The human resources departments in those organisations have a pivotal role in rolling out the fairness audits, risk assessments, clear AI use policies, and principles on minimising data. Building trust into digital systems is critical for enhancing both the employee experience and customer relationships.

It also elevates resilience to the level of ecosystems and social responsibility in the reframing of Industry 5.0. NASSCOM (2024) brings to the fore initiatives around inclusive skilling, mentorship programmes, return-to-work for women and community-level digital education initiatives. Reuters records sub regional growth that energizes local economies, and alleviates migration-induced strains. These measures demonstrate the Industry 5.0 focus on creating value for society and portray Indian IT firms as agents of inclusive and sustainable growth, for which there is great demand.

ISBN : 978-93-344-3054-7

The literature-based study indicates a number of converging themes that constitute a strategic HR architecture for Industry 5.0 in Indian IT: a shifting focus from job roles to dynamic skills portfolios; a human-AI complementarity; well-being as a strategic resource; responsible AI governance in HR systems; and regionally sensitive workforce architectures based on tier-2 and tier-3 growth. Together, these shifts embody the broader Industry 5.0 narrative of balancing technological progress with human-centric values.

Indian IT HR leadership was to be deeply affected by that. First: human-centric firms achieve a competitive advantage in attracting—and keeping—hard-to-find digital talent.

Secondly, global customers are beginning to judge their vendors more on resilience, ESG-driven AI, and wellness-based HR, making HR a source of business credibility. Third, partnerships with government and education bolster national talent pools and align business imperatives with societal progress. Aligning with NITI Aayog's Responsible AI principles further adds to credibility, policy adherence and long-term strategic viability.

Industry 5.0 offers a transformative space for Indian IT firms to redeem their human-technology nexus. Emerging literature clearly identifies HR as the linchpin of this transformation - advocating for employability, ethical AI, human wellness and ecosystem resiliency. Technological sophistication will not be the only determinant of the future of Indian IT; it will be influenced by the sector's commitment to human-centric values, inclusivity and adaptive resilience. By adopting these values, Indian IT companies will be able to build sustainable, future-ready organizations that can deal with the challenges of an ever-changing digital world.

Keywords: *Industry 5.0; Human-centric resilience; HR strategies; Indian IT sector; Responsible AI; Human–AI collaboration; Sustainable HRM; Digital transformation*

ISBN : 978-93-344-3054-7

Author Index

ISBN : 978-93-344-3054-7

ISBN : 978-93-344-3054-7

Index of Contents

ISBN : 978-93-344-3054-7

ISBN : 978-93-344-3054-7

ISBN : 978-93-344-3054-7

Edited by

- Dr. Oumaima OMARI HARAKE
- Prof. Dr. M.F HARAKE
- Dr. Sudhanshu BHATT

ISBN : 978-93-344-3054-7