Open Track Session Proposal – INCOM 2024 Vienna

Internet of Things for Sustainable Supply Chain Management: Enhancing Efficiency, Collaboration, and Information Sharing

Open Invited Track Code: <mark>99ss4</mark>

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Abstract

Sustainable Supply Chain Management (SSCM), with an emphasis on collaboration and resource exchange, incorporates practices like Design for Environment, Green Purchasing, Product Stewardship, Industrial Symbiosis, along with Reuse, Recycle, and Remanufacturing principles, paving the way for environmentally friendly, resource-efficient, and resilient supply chains. These practices inherently promote the formation of networks among separate entities, aiming for a collective sustainability impact. However, a significant challenge within these networks is achieving effective information sharing, which is crucial for synchronizing sustainable practices and making informed decisions across the supply chain. This special issue focuses on the potential of Internet of Things (IoT) technologies to transform information sharing and collaboration in SSCM, thereby enhancing their efficiency, transparency, and effectiveness.

This special issue seeks to foster a nexus between researchers and practitioners, aiming to advance knowledge on IoT-based information sharing in SSCM. We welcome research papers, case studies, and theoretical perspectives that explore how IoT can enhance resource efficiency, collaboration, and transparency. Through interdisciplinary discussions, we hope to develop a comprehensive understanding of the opportunities, challenges, and best practices in utilizing IoT for information sharing in SSCM.

This special issue invites original research contributions that focus on the following topics, but are not limited to:

- IoT-enabled information platforms for information sharing
- IoT device integration, sensors, Digital Twins, data analytics, and AI for optimal resource utilization
- Real-world applications and case studies on IoT in SSCM for resource matching, collaborative planning, and transparency
- Security and privacy implications of IoT-based information sharing

- Compliance with data protection regulations in IoT-based SSCM
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- Compliance with data protection regulations in IoT-based SSCM
- Scalable IoT architectures and sustainable design principles for growing supply networks
- Environmental footprint and long-term sustainability of IoT applications

Keywords

Sustainable Supply Chain Management, Internet of Things (IoT), Sustainability, Transparency, Information sharing

Important Dates

Deadline for paper submission:	January 31, 2024
Notification of acceptance/rejection:	March 15, 2024
Final paper submission:	April 15, 2024

Submission

For authors guidelines please refer to https://www.ifac-control.org/conferences/author-guide. All manuscripts must be electronically submitted through the PaperPlaza Conference Manuscript Management System at: https://ifac.papercept.net.

Please use the official IFAC instructions and template to prepare your contribution. Regular papers must be between 4 (minimum) and 6 (maximum) pages in the final version. All submission must be written in English.

Submissions details are available on the conference website: https://www.incom2024.org/. **Please submit your contribution online by 31.01.2024**.

The corresponding author submits the paper online (pdf format) as an Open Invited Track paper. Submissions as an invited paper requires the Open Invited Track code: **99ss4**