

THE 3RD ANNUAL KOLKATA SUPPLY CHAIN 2023 CONFERENCE

SUPPLY CHAIN TO RESPONSIBLE CHAIN ENVIRONMENTAL SUSTAINABILITY THROUGH SUPPLY CHAINS - THE REALITY CHECK

The 3rd Annual Kolkata Supply Chain 2023 Conference, presented by the ASCP Eastern Region Chapter, took place on June 16th at the Taal Kutir Convention Centre in Kolkata, India. The conference's theme was "Supply Chain to Responsible Chain: Environmental Sustainability through Supply Chains - The Reality Check." The conference aimed to shed light on the importance of incorporating environmental sustainability practices within supply chains and to address the reality of implementing such initiatives. Attendees included supply chain professionals, industry experts, academics, and policymakers. Key speakers at the event shared their insights and experiences, providing valuable perspectives on sustainable supply chain management. They emphasized the need for responsible practices to mitigate supply chains' environmental impact while highlighting the associated challenges and opportunities.

The conference began with a ceremonial start featuring the National anthem and the lighting of the lamp. The first session included inaugural and opening addresses. Mr Dinesh Shastri, Managing Director of TM International Logistics Limited and Chairperson of the Eastern Region, Association of Supply Chain Professionals, delivered the Welcome Address and served as the Session Chair. Following the welcome address, Mr Amitava Bakshi, Chief Procurement Officer of Tata Steel Ltd. and President of the Association of Supply Chain Professionals, delivered the President's Address.

Mr Anshuman Neil Basu, Secretary General of the Association of Supply Chain Professionals gave an overview on the importance of the transition happening in *Supply Chain to be Responsible Chain* and shared insights on the importance of customer delight, timeliness, and responsible chain management in the industry. Mr Anshuman Neil Basu also discussed the significance of ASCP, India's first association for supply chain professionals and how the association aims to promote supply chain and logistics professionals, build their expertise and skills, take policy initiatives, and contribute to the systematic growth of the profession in India. He discussed why on time is what we should focus on rather than *before time* or rather being *late*. Mr Basu also emphasized the significance of individual efforts by all in reducing carbon footprints, such as using public transport systems and other initiatives.

A special address was delivered by the Chief Guest, Mr Debashis Sen, IAS, Chairman of NKDA, and Managing Director of HIDCO. Mr Sen focused on environmental sustainability from a city perspective, highlighting New Town, Kolkata, as a platinum-rated green city. Mr Sen highlighted sustainable practices implemented in New Town, including the presence of dedicated cycle tracks spanning 39 kilometres, app-based bicycle services used by over 500 riders daily, increased usage of e-cycles, melas (fairs) to promote electric vehicle usage by vegetable vendors, mandatory urban farming in new buildings, the installation of charging systems with solar panels, and the ban on plastics, with penalties for non-compliance.

The conference also featured a special address by Dr Tomoyoshi Ogawa from Meiji University, Japan, who served as the Guest of Honour. Dr Ogawa discussed the importance of regional chapters in a diverse country like India, where cities vary in culture, language, and food. He highlighted the significance of incorporating sustainable supply chain practices from Japan into India, considering the similarities in cultural heritage. Dr Ogawa expressed optimism about India's potential to become a global food capital by effectively managing the supply chain, leveraging abundant workforce, skills, and agricultural practices.

These key speakers and their addresses provided valuable insights into responsible chain management, environmental sustainability, and the potential for incorporating sustainable practices into supply chains.

Dr TAS Vijayaraghavan, Professor at XLRI - Jamshedpur and Senior Vice President & Chair of Academic Research & Policies at the Association of Supply Chain Professionals, chaired the second conference session. He discussed the impacts and side effects of the supply chain, highlighting positive examples from companies like Unilever and Patagonia that focus on waste reduction, circular economy practices, collaboration, and sustainable agricultural practices.

Mr Ranjan Kumar Sinha, Chief Group Shipping at Tata Steel Ltd., was the Guest of Honour for this session. He delivered a talk on sustainability in the Maritime Industry, the eighth largest global pollutant responsible for approximately 3% of global emissions. He explained the concept of Scope 1, Scope 2, and Scope 3 emissions. Scope 1 refers to direct emissions from owned or controlled sources; Scope 2 includes indirect emissions from purchased electricity. Scope 3 encompasses all indirect emissions not included in Scopes 1 and 2, such as transportation, waste disposal, and supply chain activities. Mr Sinha emphasized that measuring Scope 3 emissions, which have a broader scope and involve complex calculations, is challenging but essential for a comprehensive understanding of a company's carbon footprint. Regarding decarbonization efforts, Mr Sinha stressed the need for new approaches to achieve the 1.5-degree ambition to restrict global warming to less than 1.5 degrees Celsius from 2018 levels rather than traditional approaches such as adopting electric vehicles, increasing the rail coefficient (proportion of goods transported by rail), and utilizing larger vessel sizes. He discussed the International Maritime Organization's (IMO) regulation to reduce carbon emissions by 2050, focusing on reducing carbon intensity by 40% by 2030 and 70% by 2050. He highlighted the importance of alternative fuels, green energy sources, and collaboration across the value chain to achieve decarbonization goals. Mr Sinha also outlined Tata Steel's policy for carbon net zero by 2045 and their sustainable actions, including using cleaner fuels, rail coefficients, and inland waterways movement. Tata Steel has a policy focused on leadership and governance, aiming for carbon neutrality across the Tata Group by 2045. Tata Steel plans to measure emissions, including Scope 3 emissions, and take sustainable actions such as increasing the usage of cleaner fuels, improving rail coefficients, and promoting inland waterways movement. Mr Sinha highlighted Tata Steel's journey in implementing responsible supply chain practices. He outlined the strategic pillars for achieving carbon neutrality, including developing an alternative fuel portfolio, fostering diverse and agile trials, and collaborating with all stakeholders.

Ms Madhulika Sharma, Vice President & Chief Sustainability Officer at ITC Limited, provided a macro view of why supply chain sustainability has become a global phenomenon. She began by introducing the concept of supply chain sustainability and highlighted that the key drivers in the industry have traditionally been cost optimization and efficiency. However, she emphasized that things have changed due to evolving regulatory requirements, increased investor demands, customer awareness, and supply chain disruptions caused by climate and socio-political reasons. Ms Sharma explained that industries can now leverage carbon negativity to demand product premiums, and regulations demand more action from supply chains. Supply chains have become more complex as the world has become more globalized. She discussed examples such as the COVID-19 pandemic and extreme weather events to illustrate the challenges faced by supply chains. Ms Sharma emphasized the reputational risks industries face concerning environmental and social aspects, citing examples such as water resource strain by Coca-Cola, child labour in the chocolate industry, and concerns over the health and safety of workers in China as in Apple's supply chain. She also highlighted the impact of climate change on supply chain disruptions, including floods, droughts, and crop productivity. Ms Sharma mentioned several regulations and frameworks addressing supply chain sustainability, such as the United Nations' 10 regulatory principles, the United Nations Global Compact framework, the European Union's Green Deal, and SEBI's Business Responsibility and Sustainability Reporting (BRSR) guidelines. She emphasized the importance of policies, codes of conduct, mapping of supply chains, due diligence, and technology adoption in driving sustainable supply chains. Ms Sharma discussed the sustainable supply chain practices of ITC Limited, a leading FMCG company. ITC's supply chain landscape extends deeply upstream and downstream. The company follows responsible sourcing practices and focuses on sustainable manufacturing, packaging, and green logistics. Moving forward, Ms Sharma emphasized

the need to strengthen the use of technology, such as blockchain, in supply chains. She also emphasized incorporating ESG (Environmental, Social, and Governance) aspects and fostering partnerships and collaborations to build capacity and capabilities within the MSME (Micro, Small, and Medium Enterprises) sector.

Brig. A.K. Dutta VSM (Retd.) delivered the keynote address, providing an army logistician's perspective. He gave an overview of the Indian Army and the eco-sensitive locations where it operates. He emphasized the environmental impact of every ton of supplies moved through these regions, which include medical supplies, fuel, ammunition, and rations. Brig. Dutta discussed the peculiarities of the army supply chain, such as extensive inventories, weather and enemy actions considerations, and the challenge of ensuring supplies reach locations where production centres are geographically distant. He highlighted the environmental impact of the army's supply chain, including the significant carbon footprint resulting from the use of diesel in areas without electricity. Brig. Dutta discussed initiatives the army undertook to reduce its carbon footprint, such as the Land Work and Environment Directorate, the adoption of solar power, and exploring green hydrogen contracts. He shared personal examples of sustainability practices, such as his role in transitioning from coal to kerosene and electricity and also as to how a change over to a more efficient system of milk delivery in packets to the Army had a large environmental effect.

Prof. Partha Priya Dutta from IIM-Calcutta delivered a talk on strategic sourcing aligned with environmental sustainability. Strategic sourcing involves making long-term decisions in supplier selections that align with competitive goals. Strategic sourcing is necessary because the world is changing, and governments impose regulatory hurdles to promote environmental sustainability. Examples include the EU border adjustment, which restricts carbon-positive companies, Norway's ban on non-electric vehicles, and the UK passing laws against companies with polluting suppliers. COP 27, held in Egypt, also addressed these issues. The goal stated in the Paris Agreement of restricting temperature increase by 1.5 degrees by 2050 makes strategic sourcing a critical factor in achieving this target. Prof. Dutta discussed the eight sectors with the highest pollutants and mentioned that adopting environmental methods can increase production costs. Collaboration is essential for incorporating environmental goals. It is essential to calculate the carbon footprint size, set ambitious targets, identify hotspots, and redesign products, packaging, and sourcing practices to align strategic sourcing with environmental sustainability. He provided the example of Ford as a company that has redesigned its products and sourcing to align with environmental sustainability.

Prof. Sumanta Basu from IIM-Calcutta talked on Green Supply Chain: Opportunities and Challenges. He reiterated the concepts of Scope 1, Scope 2, and Scope 3 emissions. Scope 1 and 2 emissions are primarily relevant for larger companies, while Scope 3 pertains to micro, small, and medium-sized enterprises (MSMEs). He discussed how the just-in-time approach may need to be more environmentally friendly. Prof. Basu emphasized the importance of circular economy/recycling, material and process efficiency, and reusable power. He highlighted the application of circular economy principles in the garment industry and the need for process efficiency in steel and cement production. However, the cost of implementing these measures should be considered. Reusable power is another aspect, but it may require rare earth elements. Prof. Basu emphasized the need to address the source first and highlighted India and China's significant roles in this context. Process transparency and redesigning processes, people's mindsets, technology, and products are crucial for achieving a green supply chain.

In Session 3, experts emphasized the need for sustainable supply chains in addressing environmental challenges. Discussions revolved around reducing emissions, adopting alternative fuels, and implementing green shipping corridors. The discussion encompassed the challenges and opportunities in the maritime industry, FMCG and the Army, focusing on measuring and reducing Scope 1, 2, and 3 emissions. Tata Steel's commitment to carbon neutrality and ITC Limited's sustainable supply chain practices were also showcased. The session emphasized the need for technology adoption, ESG

integration, and partnerships to build sustainable supply chains, considering regulatory requirements and supply chain disruptions caused by climate and socio-political factors.

Session III was chaired by Mr Debashis Dutta, Director at BG Somadder & Sons and Director & General Secretary of Mohun Bagan Football Club, who discussed the problems faced by small transporters and their workforce. He highlighted the need for government incentives to support the growth of the logistics sector.

Next, Mr Jagadeesh Kunchey, Executive Vice President - Supply Chain & Logistics at ITC Ltd, spoke about building a sustainable supply chain. He explained how ITC has endeavoured to create a sustainable supply chain by implementing various strategies. These included using electric vehicles (EVs) in ITC's operations, their partnerships with working partners and aggregators, and the support provided through long-term contracts. Mr Kunchey also discussed ITC's focus on alternative energy, with 94% of their energy sourced from renewables such as solar and wind. ITC partnered with government organizations to establish inland waterways, which helped minimize distances to markets. Through operational efficiency, they managed to save costs. With close to 150 factories and thousands of distributors, ITC established an effective network. They also classified their partners into different tiers and conducted training programs with incentives. One of the challenges they faced was using larger vehicles for relatively lesser production, resulting in the underutilization of trucks.

Following that, Mr K. Radhakrishnan, Director of StarQuik, a delivery company providing omnichannel delivery to customers, discussed building a sustainable supply chain. He emphasized that human beings live outside the environment, and we care for the weaker sections of society. He highlighted the significance of the grocery business and the challenges faced in the agricultural portion of the supply chain. Approximately 1 lakh products are touched around 4 million times to fulfil customer orders. StarQuik operates in a seamless, errorless, and paperless manner, having saved over 1 billion trees through their paperless approach. They have also implemented face recognition technology for their workers. Digitization has helped them save money, energy, and the environment.

Capt. Ram Iyer, a maritime expert and Vice President of Seahorse Ship Agencies and Representative for India, HA-RO-PA Ports, discussed the maritime sector's contribution to sustainable transportation. He focused on digital innovation leading to added-value port services and accelerating energy and environmental transitions. He highlighted the competitive, decarbonization, digitization, and resilience aspects of HA-RO-PA ports. Capt. Iyer discussed environmental actions HA-RO-PA Port took, such as using alternative fuels, solar conversion, and effective methane utilization. Capt. Iyer emphasized the levers for decarbonization and the concept of a natural green corridor for the supply chain. He also mentioned initiatives like the Plastic Valley project, which involves molecular modification and recycling of PET, and the importance of digital transactions for sustainability. He emphasized the need for efficient and bottleneck-free logistics in achieving sustainability goals.

Lastly, Mr Varun Chopra, Chairman of GEAR India Pvt. Ltd., spoke about transitioning to net-zero emissions through sustainable supply chains. He mentioned that environmental, social, and governance (ESG) factors are a significant phenomenon, with the Indian government supporting net-zero emissions and allocating funds for it in the 2023 budget. Mr Chopra highlighted the impact of every industry on carbon footprint and discussed SEBI's ESG disclosure framework and Key Performance Indicators (KPIs) introduced in April 2023. He mentioned that leading organizations, such as Reliance, Vedanta, Tata, and HUL India, have set ambitious net-zero targets. Mr Chopra emphasized the importance of decarbonizing the supply chain and highlighted the role of material handling equipment (MHE) in achieving sustainability goals. He advocated transitioning from diesel and lead-acid batteries to lithium-ion (Li-ion) MHEs, offering higher safety, quality, and cost-effectiveness. GEAR India Pvt. Ltd. provides Li-ion MHEs that are easily maintained and IP54 rated, and powerful. LifePo4 lithium-ion battery, which has higher safety and quality, is used by Gear.

The speakers emphasized the need for collaboration, innovation, and proactive measures to address environmental challenges and achieve sustainable supply chain practices. By embracing new

technologies, implementing responsible strategies, and incorporating environmental considerations into decision-making processes, organizations can contribute to a greener and more sustainable future.

In Session 4, various speakers shed light on different aspects of sustainable supply chains and the importance of incorporating environmental, social, and ethical considerations. The session highlighted the role of technology, transparency, diversity, and consumer demands in shaping sustainable supply chain practices.

Dr Santanu Roy, Professor & Dean, School of Business & Economy, Adamas University and Executive Committee Member of the Association of Supply Chain Professionals, chaired the session and discussed the feasibility of using blockchain technology for sustainable supply chain sourcing, emphasizing the potential benefits of increased transparency and traceability in ensuring ethical and environmentally responsible sourcing.

Mr Sawood Alam, Founder and Director of OWM Logistics Pvt. Ltd., highlighted the environmental impact of supply chains, particularly the high emissions associated with them. He emphasized the role of technology, including IoT, machine learning, robotics, and AI, in driving supply chain sustainability. He also touched upon concepts like automotive storage and retrieval systems, autonomous electric vehicles, and the transformation of supply chains into responsible chains based on the four pillars of sustainability.

Ms Sarbari Chowdhury, VP, ServicePlace Inc, USA., shared her experiences implementing logistics solutions for social service projects, particularly in challenging regions like the North East. She highlighted using existing technology, such as smartphones, to bring healthcare services to remote areas. She facilitated appointments with doctors by training local individuals and leveraging communication tools like WhatsApp and improved access to medical care. However, she also highlighted the difficulties encountered due to the mindset differences between urban and rural areas and the transportation challenges in underdeveloped regions.

Col. Avijit Nandi, Head- Integrity Risk Management, Investigations & Fraud, Mitkat Advisory, then delved into the significance of ethical buying options for consumers and the role of ESG in supply chain management. He emphasized that consumers increasingly demand transparency, accountability, and responsible practices from companies. The challenges of counterfeit products were highlighted, and he stressed the importance of tracking the entire supply chain to identify the origins of products. While companies strive to become ESG compliant, new problems like ESG fraud have emerged, with businesses losing a significant portion of their earnings to such frauds. Col. Nandi recommended that Indian companies be prepared with ESG-trained professionals to tackle this issue effectively.

Ms Ananya Bhattacharya, Specialist in Gender, Culture & Sustainability; and Director, Contact Base & BanglaNatak.com, Kolkata, focused on ethical supply chains, addressing issues such as labour trafficking, exploitation of women workers, and domestic violence. She emphasized the need for ethical practices in sectors like tea production, where the fair treatment of workers, particularly women, is crucial.

Mr Sudip Mullick, Owner of Balaram Mullick & Radharaman Mullick, presented a special talk on the supply chain of a popular Bengali sweet, the Rosogolla, emphasizing the importance of customer delight and satisfaction. He shared his experiences in making the packaging and production of sweets sustainable and highlighted their commitment to providing equal employment opportunities to women.

Session 4 highlighted the multifaceted aspects of sustainable supply chains, including technology adoption, transparency, diversity, ethical practices, and customer satisfaction. Organizations can contribute to a more sustainable and socially responsible supply chain ecosystem by incorporating these elements.

A Vote of Thanks to express gratitude to the speakers, participants, and organizers for their contributions and efforts in making the event successful followed the session's conclusion. Following

the Vote of Thanks, 'The 3rd Annual Kolkata Supply Chain 2023 Photo Session' took place, allowing participants to capture memories and commemorate the event. To express appreciation to the attendees special complimentary gifts were also distributed.

The Annual Kolkata Supply Chain 2023 Networking Dinner was organized to foster networking and a relaxed atmosphere. Accompanied by live instrumental music, this segment provided a platform for participants to engage in informal conversations, build connections, and further discuss the topics and insights shared during the sessions.

The Annual Kolkata Supply Chain 2023 event was a highly informative and engaging platform focused on sustainable supply chains. The sessions covered a wide range of topics, including strategic sourcing, green supply chain practices, transitioning to net-zero emissions, and the role of technology in supply chain sustainability. Prominent industry leaders, experts, and professionals shared their insights and experiences, highlighting the importance of environmental sustainability, ethical considerations, and social responsibility in supply chain management.

Throughout the event, key takeaways emerged. The need for aligning strategic sourcing with environmental goals was emphasized, considering the regulatory hurdles and global commitments to reduce carbon emissions. Various organizations showcased their efforts in building sustainable supply chains, incorporating alternative energy sources, adopting circular economy principles, and optimizing logistics operations for efficiency.

Environmental sustainability is no longer a choice but a necessity for supply chains. Organizations must proactively embrace sustainable practices to stay competitive, meet consumer expectations, and contribute to a healthier planet. Additionally, the conference emphasized the importance of integrating sustainability metrics into supply chain performance evaluations and incorporating responsible sourcing practices into procurement strategies.

Additionally, the sessions shed light on the significance of incorporating ESG factors into supply chain management, addressing issues such as ethical sourcing, diversity and inclusion, and combating fraud and counterfeit products. The importance of leveraging technology, such as blockchain, IoT, AI, and robotics, was highlighted to drive sustainability and enhance operational efficiency in supply chains.

The event provided a platform for knowledge sharing, networking, and collaboration among industry professionals, fostering an environment of learning and innovation. The networking dinner, photo session, and complimentary gifts further enhanced the participants' experience, encouraging interaction and creating a sense of camaraderie.

Overall, the Annual Kolkata Supply Chain 2023 event catalysed raising awareness and driving action towards sustainable supply chain practices. It showcased the commitment of organizations and individuals to address environmental challenges, promote social responsibility, and create a resilient and inclusive supply chain ecosystem.

The event served as a platform for knowledge exchange, networking, idea generation, and collaboration, encouraging stakeholders to work towards building sustainable supply chains that integrate environmental, social, and economic considerations. The insights gained from the event can guide businesses, policymakers, and stakeholders to develop strategies, adopt best practices, and collaborate towards building a sustainable and responsible supply chain landscape. By embracing sustainability and ethical considerations in supply chain management, we can contribute to a greener future, mitigate environmental risks, and positively impact society as a whole.