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Paving a Green Transition

A New Social Contract Amid West Asia Crisis

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Foreword

Erik Solheim

Former Norwegian Minister of Environment and International Development; Former Executive Director, UN Environment Programme; President, Europe-Asia Centre

There are moments when a geopolitical crisis and a climate crisis collide in ways that force us to rethink everything we assumed about the architecture of global development. The West Asia crisis is one such moment- and this policy brief from IPE Global's Climate Change and Sustainability Practice is one of the most honest and practically grounded responses on how India can respond.

I have spent much of the past decade arguing that India is not merely a participant in the global climate story;it is one of its principal authors. India has already crossed 52% non-fossil electricity capacity and is racing towards 500 gigawatts of clean energy- not because the world asked it to, but because it understood, better than most, that energy sovereignty and climate ambition are two expressions of the same strategic logic. The West Asia crisis has now made that logic visible to everyone.

This policy brief, which outlines a pathway for economic realignment and recovery across the agriculture, industry, and energy sectors, demonstrates a refreshing and strategic perspective. Rather than viewing the ongoing geopolitical disruptions merely as a short-term welfare or energy security challenge, the authors have framed the crisis as a catalyst for structural transformation and long-term economic resilience. The recommendations-including the deployment of 50,000 megawatt of solar-powered irrigation systems in remittance-dependent agricultural districts, the creation of 15 lakh green jobs through accelerated clean energy and industrial transition investments, the establishment of a dedicated green finance window for debarbonization of micro, small and medium size enterprises. Industrial competitiveness is critical and the use of aggregated renewable energy demand mechanisms will be strengthened in domestic energy markets to reduce import dependenc. This reflect a forward-looking vision that goes well beyond conventional crisis response measures.

These are not simply emergency interventions designed to cushion the impacts of external shocks. Rather, they represent a strategic roadmap for converting energy vulnerability into energy sovereignty, fostering industrial competitiveness, enhancing rural resilience, and accelerating India's transition towards a low-carbon and climate-resilient economy. In doing so, the brief positions the current crisis not as a constraint, but as a unique opportunity to fast-track the country's green transition and strengthen long-term economic security. This brings me to Norway and India; a partnership which I believe represents one of the most pragmatic models for climate cooperation available to the world today. Norway pairs financial depth, sovereign wealth, and decades of responsible energy resource management with India's extraordinary scale, ambition, and institutional momentum. Norwegian companies are already deeply involved in offshore wind, hydropower, and maritime decarbonisation, fields directly relevant to India's transition. Norway's sovereign wealth fund carries the financial firepower to catalyse exactly the kind of green transition finance, agricultural resilience investments, and decarbonisation initiatives, and distributed renewable energy deployment that this issue brief recommends. What is needed is the institutional bridge-and organisations like IPE Global are precisely that bridge.

Prime Minister Modi wants India to modernise; to modernise very, very fast- but he does not want India to westernise. That distinction matters enormously for how we design climate partnerships. The solutions in this brief are Indian solutions, grounded in Indian institutional realities, not imported templates. Norway's role is not to partner, to cofinance, and to learn as much as it contributes.

The authors have not simply described a crisis. They have mapped a pathway through it.

In a world where multilateral climate architecture is fraying and bilateral partnerships must carry more weight, the India-Norway relationship- and the intellectual work of organisations like IPE Global - offers the kind of pragmatic, evidence-based hope that our moment demands.

I commend this publication to policymakers, funders, and practitioners across the world.

Foreword

Ashwajit Singh
Founder and Managing Director, IPE Global

India stands at a defining moment in its development journey today. As the world grapples with escalating climate risks, geopolitical uncertainties, and shifting economic realities, the choices we make today will determine not only our environmental future but also our economic resilience, social equity, and global competitiveness.

Recent developments have reinforced this urgency. The ongoing instability in West Asia has brought forth the vulnerabilities associated with energy import dependence, supply-chain disruptions, and resource insecurity, highlighting how deeply interconnected global events are with national development priorities. More importantly, it underscores the need for India to build a more resilient, self-reliant, and future-ready economy - one that can withstand external shocks while advancing sustainable growth. As India charts its path forward, there is a unique opportunity to strengthen economic security, accelerate the green transition, and create a development model that is both sustainable and globally competitive.

As an Indian organisation echoing the voice of Global South, IPE Global believes that meaningful change occurs when policy ambition is translated into on-ground action. The UN Sustainable Development Goals (SDGs) remind us that climate resilience, economic growth, poverty reduction, energy access, food security, sustainable consumption and production, and social inclusion are deeply interconnected. Addressing them effectively requires integrated solutions that bridge sectors, institutions, and stakeholders.

Against the backdrop, this policy brief, *"Paving a Green Transition: A New Social Contract Amid the West Asia Crisis,"* compellingly demonstrates how the challenges exposed by the ongoing crisis can serve as a catalyst for transformative action, presenting India with a unique opportunity to accelerate its transition towards a more resilient, sustainable, and self-reliant economy. The recommendations presented herein demonstrate that climate action is not merely an environmental obligation - it is a pathway to economic transformation, energy sovereignty, livelihood security, and long-term prosperity.

Importantly, the brief moves beyond articulating the case for change and offers a practical roadmap for achieving it. Not only does it emphasise on convergence, but also illustrates how existing policies, institutions, and investments can be aligned to create millions of green jobs, strengthen rural livelihoods, enhance industrial competitiveness, and accelerate India's low-carbon transition.

Translating ambition into action requires both vision and rigor, and I would like to sincerely acknowledge the Climate Change and Sustainability (CCS) team at IPE Global, along with the authors and contributors of this study, for bringing together this timely and insightful brief. Through a thoughtful blend of rigorous analysis and implementation-focused perspectives, they have developed a compelling case for climate action as a driver of economic resilience, energy security, and sustainable development.

As India advances towards its net-zero commitments and broader development aspirations, the need for bold leadership, innovative financing, institutional convergence, and collaborative partnerships will be even greater. We hope this policy brief contributes meaningfully to the ongoing policy discourse and catalyses collective action across sectors and stakeholders. The choices we make today will shape not only our response to current challenges but also India's ability to emerge as a global leader in sustainable, resilient, and inclusive development for generations to come.

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Abbreviations

AIF	Agriculture Infrastructure Fund
APEDA	Agricultural and Processed Food Products Export Development Authority
AVCDP	Agricultural Value Chain Decarbonization Programme
BEE	Bureau of Energy Efficiency
BIS	Bureau of Indian Standards
CBAM	Carbon Border Adjustment Mechanism (European Union)
CCU	Carbon Capture and Utilization
CCTS	Carbon Credit Trading Scheme
CGTMSE	Credit Guarantee Fund Trust for Micro and Small Enterprises
CRAM	Climate-Resilient Agriculture Mission
DPIIT	Department for Promotion of Industry and Internal Trade
e-NAM	Electronic National Agriculture Market
EGAP	Emergency Grid Acceleration Programme
ESG	Environmental, Social, and Governance
ETS	Emissions Trading System
EU	European Union
FAME	Faster Adoption and Manufacturing of (Hybrid &) Electric Vehicles
FAO	Food and Agriculture Organization
FICCI	Federation of Indian Chambers of Commerce & Industry
FME	Formalisation of Micro Food Processing Enterprises
FPO	Farmer Producer Organisation
GACC	Green Agricultural Credit Certificate
GCF	Green Climate Fund
GDP	Gross Domestic Product
GHPO	Green Hydrogen Purchase Obligation
ICAR	Indian Council of Agricultural Research
IEA	International Energy Agency
IEEFA	Institute for Energy Economics and Financial Analysis
IFC	International Finance Corporation
IMD	India Meteorological Department
IRENA	International Renewable Energy Agency
ITMO	Internationally Transferred Mitigation Outcomes
KCC	Kisan Credit Card
KT	Kilo Tonnes
KVK	Krishi Vigyan Kendra
LULUCF	Land Use, Land-Use Change, and Forestry
MEA	Ministry of External Affairs
MMT	Million Metric Tonnes
MNRE	Ministry of New and Renewable Energy
MoEFCC	Ministry of Environment, Forest and Climate Change
MoPNG	Ministry of Petroleum and Natural Gas
MRV	Monitoring, Reporting, and Verification
MSME	Micro, Small, and Medium Enterprises
MT	Million Tonnes
MT CO_2e	Million Tonnes of Carbon Dioxide Equivalent
MUDRA	Micro Units Development and Refinance Agency

MW	Megawatt
NABARD	National Bank for Agriculture and Rural Development
NAFCC	National Adaptation Fund for Climate Change
NAPCC	National Action Plan on Climate Change
NARF	National Agricultural Resilience Fund
NbS	Nature-based Solutions
NDC	Nationally Determined Contributions
NEAM	National Energy Efficiency Acceleration Mission
NFSM	National Food Security Mission
NGHM	National Green Hydrogen Mission
NIC	National Industrial Corridor
NITI Aayog	National Institution for Transforming India
NMEEE	National Mission for Enhanced Energy Efficiency
NMITLI	New Millennium Indian Technology Leadership Initiative
NMSA	National Mission for Sustainable Agriculture
NPA	Non-Performing Asset
NSDC	National Skill Development Corporation
O&M	Operations and Maintenance
PAT	Perform, Achieve and Trade
PIB	Press Information Bureau
PKVY	Paramparagat Krishi Vikas Yojana
PLI	Production Linked Incentive
PM-KISAN	Pradhan Mantri Kisan Samman Nidhi
PM-KUSUM	Pradhan Mantri Kisan Urja Suraksha evam Utthan Mahabhiyan
PM-PRANAM	PM Programme for Restoration, Awareness, Nourishment and Amelioration of Mother Earth
PMKSY	Pradhan Mantri Krishi Sinchayee Yojana
PPA	Power Purchase Agreement
PSL	Priority Sector Lending
PV	Photovoltaic
R&D	Research and Development
RBI	Reserve Bank of India
RDSS	Revamped Distribution Sector Scheme
RE	Renewable Energy
RIDF	Rural Infrastructure Development Fund
RISE	Regulatory Indicators for Sustainable Energy
SATAT	Sustainable Alternative Towards Affordable Transportation
SBI	State Bank of India
SDRF	State Disaster Response Fund
SEBI	Securities and Exchange Board of India
SHANTI Act	Strategic Holistic Advancement for Nuclear Technology and Innovation Act
SIDBI	Small Industries Development Bank of India
SIGHT	Strategic Interventions for Green Hydrogen Transition
sqm	Square Metres
UDYAM	MSME Registration Portal
UNIDO	United Nations Industrial Development Organization
VGF	Viability Gap Funding
VLE	Village Level Entrepreneur
WRI	World Resources Institute
ZBNF	Zero Budget Natural Farming
ZED	Zero Defect Zero Effect (Certification)

Executive Summary

India stands at a crucial economic and geopolitical inflection point. The ongoing instability in West Asia has exposed the structural vulnerabilities of India's import dependent energy sector and agriculture sector's reliance on imported fuel and fertiliser inputs precisely at a moment when the country must accelerate its transition toward a resilient, low-carbon economy. Rising crude oil prices, disruptions to fertilizer and energy supply chains, inflationary pressures, climate-induced agricultural losses, and tightening global carbon trade regimes such as the European Union's Carbon Border Adjustment Mechanism (CBAM) together present a dual challenge for India, i.e., protecting economic stability while simultaneously accelerating green growth and climate resilience.

This issue brief argues that India does not face a shortage of policy ambition or institutional architecture. Rather, the central challenge lies in fragmentation. India already possesses an extensive ecosystem of schemes and policy instruments, including PM-KUSUM, the National Green Hydrogen Mission, Production Linked Incentives (PLI), the Carbon Credit Trading Scheme, PM Pranam, RDSS, Agri Stack, and multiple adaptation and industrial transition frameworks. However, these initiatives continue to operate in silos, limiting their transformational impact. The report hence proposes a sectoral convergence across Agriculture, Energy, and Industry to unlock the full economic, employment, and climate potential of India's existing policy ecosystem.

The report identifies 30 implementation-ready policy recommendations capable of generating approximately 35 million green jobs by 2047, mobilising a ₹4 to 5 lakh crore funding cushion within existing scheme architectures, and supporting the emergence of a USD 15 trillion green economy by 2070. Importantly, the report frames India's green transition not as a climate obligation alone, but as a strategic economic response to geopolitical volatility, industrial competitiveness risks, energy security concerns, and long-term developmental resilience.

> **West Asia crisis puts 10–12 million Indian livelihoods at risk across the agriculture, energy, and industry sectors**

The agriculture sector recommendations focus on transforming India's rural economy into a climate-resilient and energy-producing system. Key recommendations include reframing PM-KUSUM into a "Farmer-as-Energy-Producer" programme, enabling farmers to generate and sell surplus solar power to DISCOMs through prosumer models. This intervention alone could create 15 lakh green jobs, improve farmer incomes by ₹25,000–40,000 annually, and contribute up to 50,000 MW of Agri-solar capacity while reducing approximately 70 MT CO_2 equivalent annually.

The report also recommends the establishment of a unified Climate-Resilient Agriculture Mission (CRAM) by converging existing schemes/sub-schemes such as NFSM, NMSA, and NAFCC into single climate-risk architecture supported by Agri Stack, IMD forecasts, and climate-resilient seed systems. Additional recommendations include scaling natural farming to 50 million hectares through carbon market integration, establishing Agri-carbon methodologies under the CCTS, deploying digital agriculture systems using AI-enabled advisory platforms, and reforming agricultural credit systems to incentivize climate-smart farming. Collectively, the agriculture recommendations are projected to generate 6 to 7 million green jobs, reduce fertilizer dependence, improve groundwater management, strengthen food security, and create substantial new income and revenue streams through carbon markets and renewable energy participation.

The Energy sector recommendations position clean energy expansion as both an economic necessity and a national security imperative. The report highlights that India's renewable energy ambitions are constrained less by generation capacity and more by grid integration, storage infrastructure and technology, financing limitations, and industrial demand creation. To address these gaps, this report proposes an Emergency Grid Acceleration Programme to support the 500 GW renewable energy target through large-scale transmission upgrades, battery energy storage systems, smart grid deployment, and renewable energy evacuation infrastructure. The report estimates that achieving the 500 GW target could generate 3.4 million jobs, avoid 700 MT CO_2 equivalent annually, and reduce India's dependence on imported fossil fuels.

The report further recommends accelerating the National Green Hydrogen Mission through mandatory Green Hydrogen Purchase Obligations, hydrogen valleys, and international export partnerships with countries such as Germany, Japan, and South Korea. These measures are expected to mobilize up to INR 8 lakh crore in investment while creating 1.5 to 2 million jobs across the hydrogen value chain. The energy recommendations also include scaling India's solar manufacturing ecosystem from 65 GW to 200 GW through integrated PLI reforms, strengthening nuclear energy deployment under the SHANTI Act, creating a Smart Grid and Storage National Programme, and establishing an Indian Climate Finance Architecture capable of addressing India's USD 170 billion annual climate finance gap. Together, these measures aim to create 5 to 8 million clean energy jobs, improve energy sovereignty, strengthen industrial competitiveness, and establish the financial architecture required for India's net-zero transition.

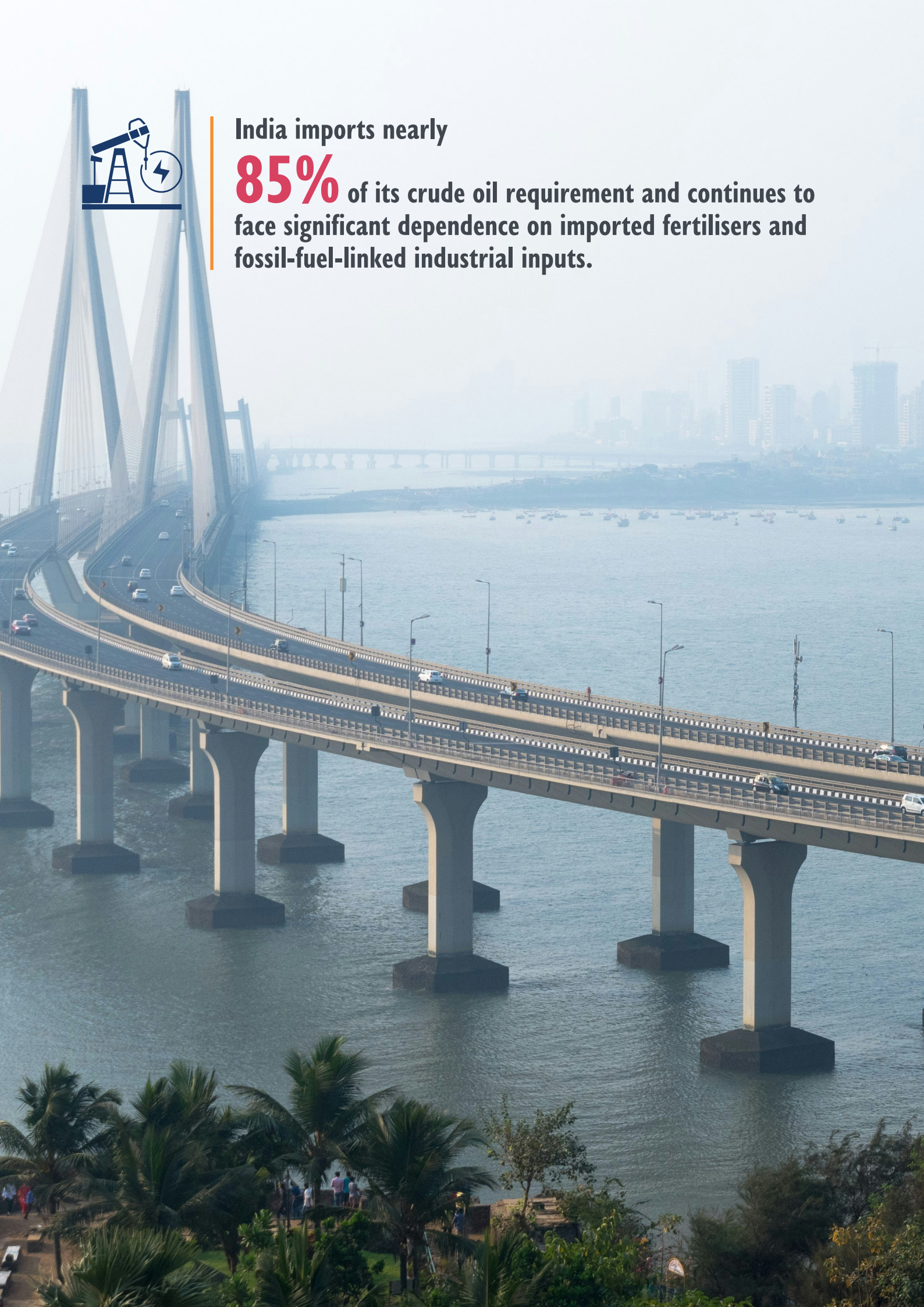
Through a green transition pathway suggested in the brief, has the potential to generate 35 million green jobs by 2047, contributing to a net-zero economy valued at USD 15 trillion.

The Industrial sector recommendations focus on preventing India's manufacturing base from becoming carbon-locked and globally uncompetitive in the face of tightening carbon trade regulations. A major recommendation is the establishment of a National Green Steel Mission to decarbonize India's 140 MT steel sector through green hydrogen-based direct reduced iron (DRI), scrap recycling expansion, and mandatory green procurement policies. The report estimates that these measures could preserve India's USD 8 billion steel export market from CBAM-related risks while avoiding approximately 55 MT CO_2e annually.

The report also proposes a recalibration of India's Production Linked Incentive schemes to reward green manufacturing, energy efficiency, and emissions reductions rather than production volumes alone. Additional interventions include a comprehensive MSME Green Transformation Mission providing concessional finance, green certification support, rooftop solar deployment, and energy auditing for India's 63 million MSMEs. These reforms are intended to safeguard India's export competitiveness, support industrial decarbonization, and generate over 20 million green industrial jobs through EV manufacturing, green supply chains, renewable integration, and industrial transition pathways.

Across all three sectors, the report emphasizes that India's transition challenge is fundamentally institutional rather than technological. The necessary schemes, policies, and financing channels already exist. The primary requirement is convergence that integrates agriculture, energy, finance, industrial policy, climate adaptation, and infrastructure planning into a coherent national green growth framework. The report therefore frames the "new social contract" not as a crisis-response mechanism, but as a strategic restructuring of India's development architecture around resilience, energy sovereignty, industrial competitiveness, climate security, and employment generation.

Consequently, the report argues that the cost of delays in action now exceeds the cost of transition. India's green transition is presented not merely as an environmental imperative, but as the foundation for long-term economic resilience, geopolitical stability, rural prosperity, and sustainable agriculture and industrial growth in an increasingly climate-constrained global economy.



India imports nearly

85% of its crude oil requirement and continues to face significant dependence on imported fertilisers and fossil-fuel-linked industrial inputs.

References

1. Government of India, Ministry of Finance. *Budget at a Glance 2025–2026*. New Delhi: Government of India, 2025. PDF
2. Government of India, Ministry of Environment, Forest and Climate Change. *India's Nationally Determined Contribution (NDC) 2031–2035 under the Paris Agreement*. New Delhi: Government of India, 2026. PDF
3. Government of India, Ministry of Environment, Forest and Climate Change. *India's Long-Term Low Emission Development Strategy (LT-LEDS)*. New Delhi: Government of India, 2022. PDF
4. Government of India, Prime Minister's Council on Climate Change. *National Action Plan on Climate Change*. New Delhi: Government of India, 2008. PDF
5. Government of India, Ministry of New and Renewable Energy. *Comprehensive Guidelines for Implementation of Pradhan Mantri Kisan Urja Suraksha evam Utthaan Mahabhiyan (PM-KUSUM) Scheme*. New Delhi: Government of India, 2024. Official Guidelines
6. Government of India, Department of Agriculture and Farmers Welfare. *Agriculture Infrastructure Fund: Scheme Guidelines*. New Delhi: Ministry of Agriculture and Farmers Welfare, 2020. PDF
7. International Energy Agency. *India Oil Market Report*. Paris: International Energy Agency. Executive Summary
8. The Indian Express. "India's Reliance on Imported Crude Oil at Record High of 87.3% in FY23." *The Indian Express*, April 30, 2023. Article
9. Skill Council for Green Jobs**.** *Annual Report FY 2024–25*. New Delhi: Skill Council for Green Jobs, 2025. PDF
10. Government of India, Ministry of New and Renewable Energy. *National Green Hydrogen Mission*. New Delhi: Government of India, 2023. PDF
11. Government of India, Ministry of Steel. *Greening the Steel Sector in India: Roadmap and Action Plan*. New Delhi: Government of India, 2025. PDF
12. Government of India, Prime Minister's Office. *Cabinet Approves the PM Dhan-Dhaanya Krishi Yojana*. New Delhi: Government of India, 2025. Official Release
13. Government of India, Ministry of Agriculture and Farmers Welfare, Department of Agriculture and Farmers Welfare. *Revised Operational Guidelines of Paramparagat Krishi Vikas Yojana (PKVY)*. New Delhi: Government of India, 2023. PDF
14. Government of India, Ministry of Power. *Operational Guidelines for Scheme for Viability Gap Funding for Development of Battery Energy Storage Systems*. New Delhi: Government of India, 2024. PDF
15. Government of India, NITI Aayog. *Harnessing Green Hydrogen Opportunities for Deep Decarbonisation in India*. New Delhi: Government of India, 2022. PDF
16. Government of India, Ministry of Mines. *National Critical Mineral Mission (NCMM)*. New Delhi: Government of India, 2025. PDF
17. Government of India, Ministry of Finance. *Economic Survey 2025–2026, Chapter 10: Environment and Climate Change – Building a Resilient, Competitive and Development-Driven India*. New Delhi: Government of India, 2026. PDF
18. Government of India, Ministry of Agriculture and Farmers Welfare, Department of Agriculture and Farmers Welfare. *Operational Guidelines for the Digital Agriculture Mission*. New Delhi: Government of India, 2024. PDF
19. Government of India, Ministry of New and Renewable Energy. *Scheme Guidelines for Implementation of Strategic Interventions for Green Hydrogen Transition (SIGHT) Programme – Component I: Incentive Scheme for Electrolyser Manufacturing*. New Delhi: Government of India, 2024. PDF
20. Government of India, Press Information Bureau. *[Title of the Press Note]*. New Delhi: Government of India, 2025. Official Release
21. International Carbon Action Partnership (ICAP). *India: Compliance Carbon Market (CCTS) – ETS Factsheet*. Berlin: International Carbon Action Partnership, 2026. PDF
22. Government of India, Press Information Bureau. *[Title of the Press Release]*. New Delhi: Government of India, 2024. Official Release
23. Government of India, Press Information Bureau. *Agricultural Infrastructure Fund (AIF) Scheme*. New Delhi: Government of India, 2024. PDF

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