The Nexus of Agriculture and Environment

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Agriculture affects and impacts climate change. Agriculture is crucial to economic prosperity but has serious environmental impact. Pollution, soil, water, and air contamination are major environmental consequences of agriculture. The ecology has suffered greatly from industrial agriculture, creating concerns about the food supply. Due to its environmental impact, agriculture will struggle to supply rising demand in the next decades. Global warming threatens to undermine many natural processes that support contemporary agriculture [6]. However, modern agriculture contributes to the sustainability dilemma [6]. Agriculture's complex links to the global economy, human communities, and biodiversity make it a crucial conservation frontier. Resource sustainability is becoming more important. Thus, knowing the relationship between direct and indirect environmental consequences and agriculture sector links is crucial. Identifying the underlying inter- and intra-sectoral sources of the agriculture sector's significant environmental consequences will help policymakers create fair and effective policies.

India's economy relies on agriculture. Most vital sector of Indian economy. Agriculture contributes for 19.9% of India's GDP and 45.5% of its workforce. In 2018, 51.09% of land was used for agriculture. Agriculture affects and impacts climate change. Agriculture is crucial to economic prosperity but has serious environmental impacts. Pollution, soil, water, and air contamination are major environmental consequences of agriculture. The ecology has suffered greatly from industrial agriculture, creating concerns about the food supply. Due to its environmental impact, agriculture will struggle to supply rising demand in the next decades. Global warming threatens to undermine many natural processes that support contemporary agriculture. However, modern agriculture contributes to the sustainability dilemma. Agriculture is one of the world's most important conservation frontiers because to its complex links to the global economy, human communities, and biodiversity. Resource sustainability is becoming more important. Thus, knowing the relationship between direct and indirect environmental consequences and agriculture sector links is crucial. Identifying the underlying inter- and intra-sectoral sources of the agriculture sector's significant environmental consequences will help policymakers create fair and effective policies.

All of these variables suggest that India's agricultural sector has a large environmental impact due to its economic size and resource use. India's agriculture sector's direct and indirect environmental effect would expand due to population expansion and agricultural industrial product demand. Estimating and comprehending direct and indirect environmental impacts is necessary to target them. Understanding the direct and indirect environmental repercussions and intermediary industrial links that cause them may help India reduce its agriculture sector's environmental problems. Which can sustain India's agriculture.

Government organizations, international entities, and scholars report on the environmental implications of various nations' agriculture sectors, but industrial links that cause environmental impacts are rarely reported. Reliance on inputs and outputs between sectors and industries is called sectoral (industrial) interconnections. The classical multiplier and HEM are used to estimate industrial–environmental links. The HEM is better than the standard multiplier since it isolates a sector from an economy and measures its economic or environmental impact by comparing values before and after removal [13]. Traditional or HEM methods have concentrated on carbon, pollution, energy, and water links across nations, regions, or towns. Under both conventional multiplier and HEM techniques, the relationship between intermediate sectoral or industrial environmental links and direct and indirect environmental impacts is rarely

quantified. Thus, intermediate industrial links are not characterized by their direct or indirect sectoral or industry implications in the literature. The direct environmental impact of a target sector's production is defined in this study. Our target sector, India's agriculture sector, has a direct environmental impact due to downstream purchases and internal use of its output. Consumption of raw materials, semi-finished items, utilities, and miscellaneous services by a target industry has an indirect environmental impact. Naturally, a target sector's imports from upstream sectors and reimports cause indirect environmental impact. All of these variables suggest that India's agricultural sector has a large environmental impact due to its economic size and resource use. As population grows and agricultural industrial product demand rises, India's agriculture sector's direct and indirect environmental effect will increase. Estimating and comprehending direct and indirect environmental impacts is necessary to target them. Understanding the direct and indirect environmental repercussions and intermediary industrial links that cause them may help India reduce its agriculture sector's environmental problems. Which can sustain India's agriculture.

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I hope this issue's contents help you critically examine the agriculture-environment interaction.

Volume 5 Issue 4 November 2023