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BA Economics Honours | Semester 3 | Calicut University

Agricultural Development in India

Course Code: ECO3MN203 • Module 1

Module I: Agriculture and Economic Development

Agriculture is the historical foundation upon which the Indian economic and social architecture is constructed. While economic modernization naturally reduces agriculture's relative share in aggregate Gross Value Added (GVA), the agrarian sector continues to perform multi-dimensional strategic functions: ensuring national food security, providing primary livelihood to nearly half the workforce, supplying vital wage-goods to control urban inflation, and generating industrial demand.

Unit 1: Role of Agriculture in Indian Economic Development

Development economists (including Simon Kuznets, Arthur Lewis, and Bruce Johnston) have established that an agricultural revolution is an indispensable prerequisite for industrial takeoff:

- **Contribution to National Income:** At independence in 1950–51, agriculture contributed over 54% of India’s GDP. While structural transformation has reduced its GVA share to ~16% in 2023–24, agriculture remains the single largest private enterprise sector in India.
- **Major Source of Livelihood and Employment:** Agriculture employs approximately 44%–45% of India's total workforce. It acts as an economic absorber of last resort, as dramatically evidenced during the COVID-19 pandemic when reverse migrant workers returned to rural family farms.
- **Ensuring National Food Security:** Sustaining food self-sufficiency for 1.4 billion citizens, eliminating reliance on foreign food imports, and supporting the world's largest food security safety net under the National Food Security Act (NFSA).
- **Supply of Raw Materials to Agro-Based Industries:** Cotton and jute for textiles, sugarcane for sugar mills, oilseeds for vanaspati and edible oils, rubber for automotive tires, and fruits/vegetables for expanding food processing sectors.
- **Foreign Exchange Earnings:** Agricultural exports (marine products, non-basmati and basmati rice, spices, sugar, tea, coffee) generate over $50 billion annually, financing critical national imports.

Unit 2 & 3: Structural Features, Progress, and Interdependence

Indian agriculture has progressed from chronic post-colonial deficits to global export leadership, yet retains unique structural characteristics:

- **Preponderance of Small and Marginal Farmers:** Average farm operational holding size has fragmented from 2.28 hectares in 1970–71 to 1.08 hectares today, with marginal and small holdings accounting for over 86% of total operational holdings.
- **Agricultural-Industrial Interdependence:** Agriculture and industry are bound by symbiotic linkages:
  - *Forward Linkages:* Agriculture supplies raw materials and food wage-goods to the industrial sector.
  - *Backward Linkages:* Modern agriculture relies on industrial inputs: chemical fertilizers, pesticides, diesel pump-sets, tractors, combine harvesters, and drip irrigation piping.
  - *Market Linkages:* Rising rural farm incomes generate massive domestic consumer demand for manufactured consumer durables (motorcycles, electronics, textiles, FMCG goods).

Advanced Theoretical Formulations and Empirical Frameworks (Analytical Division 1)

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Empirical Methodology, Identification Strategies, and Econometric Estimation

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Comparative Institutional Analysis, Market Failures, and Policy Governance

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Market Efficiency	Markets clear instantaneously; price mechanism allocates resources optimally without systemic friction.	Markets are prone to structural failures, information asymmetry, and coordination coordination failures.	Targeted regulatory oversight, public investment in infrastructure, and social safety nets.
Behavioral Motivation	Hyper-rational agents maximizing expected utility with complete cognitive computational capacity.	Bounded rationality, behavioral heuristics, loss aversion, and institutional anchoring effects.	Choice architecture, behavioral nudges (NITI Aayog initiatives), and consumer financial protection mandates.
State Intervention	State role restricted to core public goods, contract enforcement, and national defense (minimalist state).	State acts as developmental catalyst, risk-absorber of last resort, and promoter of equitable distribution.	Strategic industrial policy (PLI schemes), counter-cyclical fiscal intervention, and universal public services.
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Comprehensive Empirical Analysis: The Kerala Model and Sub-National Development

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However, contemporary economic analysis also highlights structural challenges confronting this development paradigm: high educated unemployment, fiscal constraints stemming from escalating public debt servicing and pension obligations, and heavy reliance on external remittance inflows from migrant workers in the Persian Gulf. Sustaining this high-welfare equilibrium necessitates transitioning toward a knowledge-driven economy, incentivizing high-tech manufacturing, and mobilizing sustainable sub-national fiscal resources.

Policy Synthesis and Analytical Evaluation

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