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BA Economics Honours | Semester V | Calicut University

Growth Theories in Economics

Course Code: ECO5CJ303 • Module 2

Module II: Understanding Growth Models

Classical and early macroeconomic growth theories laid the foundational framework for analyzing capital accumulation, population dynamics, technological innovation, and dynamic macroeconomic stability.

Unit 5, 6, 7 & 8: Classical and Schumpeterian Growth Perspectives

- **Adam Smith (1776):** Emphasized that economic growth is driven by capital accumulation and the *division of labor*. The division of labor enhances worker dexterity, saves transition time, and encourages mechanization, but is fundamentally bounded by the *extent of the market*.
- **David Ricardo (1817):** Propounded a classical growth model driven by agricultural surplus and capital accumulation. As population expands, cultivation extends to less fertile marginal lands (Diminishing Returns). Agricultural food prices and nominal wages rise, driving down the industrial profit rate. Eventually, profits drop to zero, terminating capital accumulation and driving the economy into a **Stationary State**.
- **Karl Marx (1867):** Viewed capitalist growth as an inherently contradictory, crisis-prone dynamic. Capitalists accumulate surplus value through labor exploitation. Increasing the organic composition of capital (c/v) leads to the **tendency of the rate of profit to fall**, escalating class struggles, creating an industrial reserve army of the unemployed, and precipitating systemic collapse.
- **Joseph Schumpeter (1911):** Positioned the daring **Entrepreneur** as the primary engine of economic dynamism. Entrepreneurs introduce "new combinations" (innovations: new products, production methods, markets, raw material sources, or industrial reorganizations). Schumpeter coined the iconic concept of **Creative Destruction**—the process whereby innovative industrial mutations incessantly revolutionize the economic structure from within, destroying the old and creating the new.

Unit 9: Harrod-Domar Growth Model and the Knife-Edge Problem

Formulated independently by Roy Harrod (1939) and Evsey Domar (1946) to extend Keynesian short-run analysis into dynamic long-run steady growth:

- Assumes a fixed-proportions Leontief production function with zero factor substitutability, constant marginal propensity to save (s), and a constant capital-output ratio ($v = K/Y$).
- **The Fundamental Growth Equation:**

  $$g = \frac{s}{v}$$

  Growth is directly proportional to the national saving rate (s) and inversely proportional to the capital-output ratio (v).
- **The Three Growth Rates (Harrod):**
  1. *Actual Growth Rate (g):* Realized output growth.
  2. *Warranted Growth Rate ($g_w = s/v$):* The growth rate that satisfies entrepreneurs by fully utilizing existing capital capacity.
  3. *Natural Growth Rate ($g_n = n + \lambda$):* The maximum growth rate permitted by population growth (n) and technological progress (λ).

- **Knife-Edge Instability:** Full employment and full capital capacity equilibrium requires $g = g_w = g_n$. Because s, v, and n are determined independently, any slight divergence creates self-reinforcing cumulative disequilibria—either chronic secular depression ($g_w > g_n$) or explosive demand-pull inflation ($g_w < g_n$).

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Comparative Institutional Analysis, Market Failures, and Policy Governance

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Comprehensive Empirical Analysis: The Kerala Model and Sub-National Development

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