

Theory Outline

I. Review of Production Theory

- A. Diminishing Marginal Utility
- B. Cost Curves and the Production Function
- C. Profit Maximization and the Cost Curve
- D. Values of Marginal Product
- E. Budget Constraints with Multiple Inputs
- F. Summary of this Review

II. Multi-dimensional Hyperbolae and Economic Science

- A. The Hyperbola Monograph
 - 1. Hyperbolic Descriptions of Technical Indifference
 - 2. The Polynomial Factoring Problem
 - 3. Budget Constraints and the Expansion Path
 - 4. The Total Cost Curve

5. The Household Cost Curve
6. Three Approaches to Optimality
7. β , θ , and ζ
8. Calibrating the Multi-dimensional Hyperbola

B. Masurable Utility

1. An Empirical Study
 - a. Primitive Data and Transformations
 - b. Calculations and Results
2. The Definition of a Pseudoscience

C. Why the Hyperbola?

1. Spanning the Realm of Technical Potential
2. Nature's Use of Number

III. The Stability of Economic Systems - a Neoclassical View

A. A General Matrix Structure

1. Prospective Sector and Commodity Definitions
2. Prospective Definitions for Rival Economic Systems

B. General Equilibrium Prices

C. Equilibrium in a Dynamic Context

D. General Economic Optima

IV. A Dynamic for Economics

A. Numerical Methods

B. The Idea of Mathematical Delay

1. First Order Delays
2. Higher Order Delays

C. Physical Flows in the Economic System

1. A Dynamic Hypothesis
2. Discourse on the Turnover Fraction
 - a. The Variability of a Generic Good J
 - b. A Household Sector's V_L
 - c. V_0 : the Velocity of Value
3. The Circuit of Physical Flows
4. Commodity Markets
5. Control of Physical Adjustments
6. Global Supply and Demand

D. Household Sectors' Dynamics

1. Labor, Leisure, and the I/O Structure
2. Households' Place in the Utility Matrix
3. Utility and Labor Markets

V. Price Determination

A. Supply and Demand Schedules

1. Marginal Costs and the Supply Schedule
2. Marginal Values and the Demand Schedule
3. Inference of the Equilibrium Price

B. Does Value Exist?

1. Value and Money
2. The Value Problem
3. Absolute Commodity Values

C. Interest Rates of the Economies K

1. A Sector IK's Optimal Profit
2. An Industrial Sector's Return Rate
3. National Interest Rates and Global Stasis

D. Monetary Flows and the Financial State

1. Financial Intermediation and the Capital Account
2. Savings: A Circuit of Funds for Investment
3. Intermediation, the Investment Term, and Leverage
4. Capitalism's Destructive Singularity

E. Currency Valuation

1. The Marginal Value Equations
2. Money's Marginal Value

VI. Conceptual Recapitulation

VII. Algorithmic Recapitulation