Land Use Planning and Land Management Policies, Instruments and Techniques

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• Land is a capital good!

• Land can be bought and sold.

• The value (price) of land is derived from the value of its use (residential, industrial, commercial, public, agricultural).

• The market value (price of land) is derived from its location in relation to accessibility and availability of infrastructure & services (comparative advantages).
Some generally accepted views and postulations:

1. Rising demand
   - Conversion rural-urban

2. Expansion of total area
   - Higher economic values in central city

3. Higher values of land
   - Increases pressure for economy in land use
   - Increasing densities in central areas
Some generally accepted views and postulations:

4. Lengthy procedures for land transfer and cumbersome process for approving land development
   - Higher premium/land rent to be paid by users and benefiting owners

5. Inadequate institutional and legal frameworks
   - Increases demand that pushes market values of land upwards

6. Cumbersome institutional, legal and political contexts
   - Invasion of land, illegal subdivisions, pirate developments
   - Scarcity of serviced land
   - Excessive land prices
Different forms of Land Tenure affecting urban growth patterns!

Exclusive rights of use and disposition of land

Roman law

Public ownership

Islamic Waqf
- non-alienation
- limited use

No well-defined rights
- Tribal customs
- Customary practices
- Squatters

Legal forms: freehold ________________ leasehold

Security of Tenure
The Need for Government Intervention

Variety of Objectives of LAND POLICIES

- Equity
- Efficiency

• Appropriate supply
• Harmony of urban spatial structures
• Equity
• Distribution of population
• Distribution of activities
• Environmental control

The question is how to reconcile these objectives and the instruments of land management?
URBAN LAND POLICY: Government objectives

To protect the urban & natural environment
To gear infrastructure investments with development
To maintain and enhance property values
To provide poor families with access to land and neutralise land speculation

OBJECTIVES

Policy Tools
Master plans
Land use zoning ordinances
Land parcelling regulations
Building codes
Land management tools: land sharing; land banking; land readjustment; TDR-transfer of development rights; land registration.

Institutions
Land Development Agencies
Land Registration Offices
Land Cadastre
Land Banking Units
Land Management & Control Agency
Urban Land Operations Units
LAND: input to housing & urban development

Increasing prices not leading to increased supply due to common market speculation for high profits resulting in vacancy

Supply is fixed, inelastic but land-use expandable

Land is immobile and inflexible: each parcel is unique.

Total supply is fixed then increasing demand increases prices. This may produce inflationary pressure on prices.

Essential for human activities

Rights attached to land is called “TENURE” that expresses ownership, control and use

TENURE forms directly affect the urban economy via mortgages, tax revenue, market transactions

Social, economic and political values affect TENURE systems.
## The cross-sector character of Housing

<table>
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<th>LAND</th>
<th>LOCATION</th>
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<tbody>
<tr>
<td>LOCATION VALUE</td>
<td>VALUE</td>
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<td>ACCESSIBILITY</td>
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<tr>
<td>LEGAL STATUS</td>
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| INFRASTRUCTURE  | WATER, ELECTRICITY, |
|                 | SEWERAGE, DRAINAGE, ROADS |
|                 | COMMUNITY SERVICES, |
|                 | TRANSPORTATION       |

<table>
<thead>
<tr>
<th>LOCATION</th>
<th>EMPLOYMENT OPPORTUNITIES</th>
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<td>INCOME OPPORTUNITIES</td>
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Housing involves social welfare and reflects rise in the social & economic status.
ACTORS AND MOTIVATIONS TOWARDS LAND

**POLITICIANS:** platform of social justice versus maintenance of pillar a society based on individual & private property

**ARCHITECTS:** landscape qualities of sites

**INDIVIDUAL:** asset, privacy, security, base for production & activities

**ENGINEERS:** structural qualities (stability, erosion, permeability...)

**PLANNERS:** mosaic requiring conformity to norms and development control

**Environmentalist**
Land conversion and loss of green fields, factor of sustainable development

**ECONOMIST:** a factor of production whose price is defined by supply/demand

**AGRICULTURALIST:** assesses land on basis of soil suitability, water resources and location for productivity

**DEVELOPERS:** objects of investment to create new values through activities and use of land

**LAWYERS:** physical dimension to which individual and collective rights are attached
FORMAL / PLANNED
LAND DEVELOPMENT PROCESS

Based on Paul Baross

Final Price/Value paid by final occupants

Private developers profiting
Land owners benefiting

Building Construction

Supply Secondary Infrastructure Services

Recapture land price increase by taxes; final sale to occupants

Detailed designs

Land Parcelling; selling out large parcels for development (Private & Public)

Infrastructure investment

Government decides & publicises; values increase; speculation starts

Based on Paul Baross

Fringe Land
Rural Land
Vacant Land

Land Zoning

Trunk Infrastructure Provision

Land Consolidation

Planning Design

Infrastructure investment

Government investing in Infrastructure

Formal intervention
I. Land Assembling

II. Planning

III. Infrastructure Provision

IV. Construction

V. Occupation

Based on Paul Baross
INFORMAL / UNPLANNED LAND DEVELOPMENT PROCESS

VACANT LAND

COMMERCIAL LAND SUBDIVISION OR LAND INVASION

BUILDING TEMPORARY OCCUPANCY

TRUNK INFRASTRUCTURE PROVISION

DENSIFFICATION OBIP

ON-SITE INFRASTRUCTURE SUPPLY

INDIVIDUAL CONNECTIONS

PEOPLE STARTS BUILDING, PRESSURE, MOBILISATION, RECOGNITION, SERVICES

PLANNING DESIGN

REGULARISATION LEGALISATION

GOVERNMENT INTERVENTION

INFORMAL LAND DELIVERY

AUTONOMOUS DEVELOPMENT

SITES WITHOUT SERVICES
INFORMAL / UNPLANNED
LAND DEVELOPMENT PROCESS

Based on Paul Baross

I. Land Invasion/land holding
II. Building & Densification
III. Infrastructure Provision
IV. Planning
V. Legalisation

Government Intervention

Regularisation
Legalisation

Planning Design

On-site Infrastructure Supply

Trunk Infrastructure Provision

Building Temporary Occupancy

Commercial Land Subdivision or Land Invasion

VACANT LAND

Autonomous development

Sites without services
Formal × Informal
FAVELAS:

• Squatter settlements and most common feature in all Brazilian Cities.
• Gradual or eruptive process of land invasion.
• On derelict land.
• Public land (but also private land).
• Land not appropriate for human settlement: hills, flood prone sites, poor infrastructure and public services.
Illegal subdivision in Campo Grande
• Bairro Aurora - 448 plots - 2240 inhabitants
Illegal subdivision in Guaratiba called Jardim Maravilha - 11,754 plots (1720 are occupied) - 5527 inhabitants
Land Use Planning Instruments

Zoning Ordinances: Municipal decrees, laws, norms.

Land Use Norms: Linked to master plans;

Planning Guidelines: Linked to City Planning Ordinances

Land Parcelling Norms: Linked to National norms

Building Permits: Applied city-wide by municipalities

Development Applications: Requests by individuals/firms/developers

Development Permits: Approvals/concessions by municipalities
Land Management Instruments

**ADMINISTRATION**
- Land expropriation
- Pre-emption right
- Compulsory Replotting
- Cadastre
- Land Information System-LIS

**MANAGEMENT**
- Land Bank
- Land Pooling
- Land Readjustment
- Land lease
- TRD-Transfer Develop.Rights

**TAXATION**
- Real estate property taxes
- Land transfer duties
- Development charges
- Betterment & servicing charges
LAND RE-ADJUSTMENT

Privately owned undeveloped / ‘unserviced’ land

Market price = x

Land Developed / serviced by Municipality

Land returned to original owner

Market price = x
LAND RE-ADJUSTMENT

A municipal government or other public agency declares privately owned land that is about to be developed as a land readjustment project!

1. Municipality prepares site plan (in co-operation with owner)
2. Municipality assesses market value of raw land
3. Municipality calculates the percentage of land required for physical services: roads, infrastructure, water, sewerage, etc.
4. Municipality deducts from total parcel a percentage of land with sufficient improvement value to recover costs of the services;
5. Municipality returns the remainder of land to original owner.
6. Owner’s land has increased in value because of infrastructure investments
7. Municipality sells its share of the improved land to recover costs of service provision