

Zero Emission city model

ZEC 모델

5. 에너지 계획

	Messestadt Riem 도시/1년 gesamt pro Jahr	Messestadt Riem 1인당/1년 pro Person und Jahr
2003년 총 CO2 배출량		
CO ₂ -Emissionen 2003 gesamt		
davon Wärmeerzeugung 난방	4.413 t	1,47 t
davon Stromverbrauch 전기	3.471 t	1,15 t

Datenquelle und -stand: Einwohner nach Daten des Statistischen Amtes LHM (Hauptwohnsitz, 31.12.2003), CO₂-Verbrauch nach Daten der Stadtwerke München GmbH (Energienmenge und CO₂-Emissionsfaktor)

- [현재] 1인당 CO2 배출량 / 1년 = 5,25t
- [독일전체] 1인당 CO2 배출량 / 1년 = 10,2t
- [산업시설 포함] 1인당 CO2 배출량 / 1년 = 12,5t

- 현재(2004~) 지역(난방) 공급을 위한 설비 건설 중
: CO2 배출 3000 - 3500t/년 감축예정
- 태양열 시설 추가 예정
: CO2 배출 감축량 증가 예정

제 3 주 제

저탄소녹색도시 재생전략과 실천 방안

조세환 (한양대학교 교수)

Green Urban Regeneration

for Lower Co2 Emissions & Green Growth



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I. Introduction

1. Low Emission of Co2 & Green Growth



Is That All ? for Green Urban Regeneration

2. The Changes of Era



3. The Key Words of Info-Creation Society

- 1) Experience Economy
- 2) Flows and Process
- 3) Change & Evolution
- 4) Flexibility & Uncertainty
- 5) Sustainability, Well-being, Hybrid & Convergence
- 6) Imagination
- 7) Value Planning & Design

II. The New Types of Urbanization of Info-Creation Society

World Urban Populations
• the beginning of 20 c

- : 10%
- 2000 yr : 50%
- 2025 yr : 65%

Urbanization

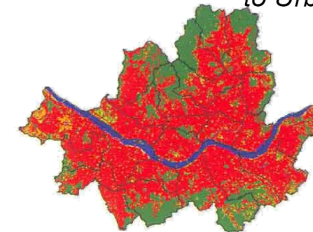
? Urbanization ratio
in Korea



20^c

21^c

Transition from New Town
to Urban Regeneration



Urban Ideal =



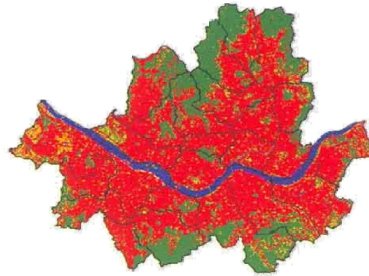
Urban Ideal =

1998

City = World

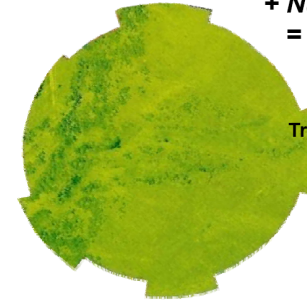


Mega City



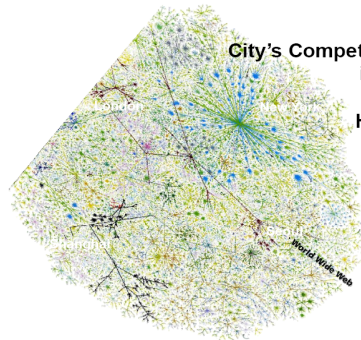
Sustainable City :

*A Place of Order of Nature(Ecology)
+ Nature as Culture + Urban
= Smart Growth*



New Recycling Energy : Solar. Wind etc.
Traffic System : Pedestrian & Bicycle Way etc.
Green & Eco-Network : Roof & Wall Garden
Water Recycling
Bio -Diversity : Biotope etc.

Global City : Network Society

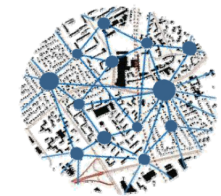


City's Competency Depends on the Role of City
in the Context of Global City Network

Hub & Node are Powers of City
: New York . Tokyo. Hong kong. London

Seoul ?

Process City : Space of Flow



*Changing
Contour map of city*

In the context of Income & Expenditure , Flows of Money, Information, Media etc.

Emergence of New types of Land Uses :

post-industrial site : Removed and void site
: Brown Field & Landfill etc.



Hybrid City :

A Place of Hybrid Urban Life : Working+ Residential
+ Commercial +Well-Being+ Leisure and recreation
+Culture +**Nature(Green)**
: 24 hours of one day life



Park City

: Ecology + culture + Communities
+ Landscape + Identity + Brand + Value

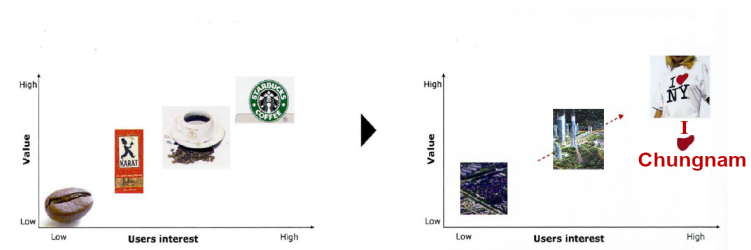


Brand City :

Causing Economical, Social, Environmental Value

Coffee : not for a drink,
but for experience s

City : not merely living in,
but experiencing Brand



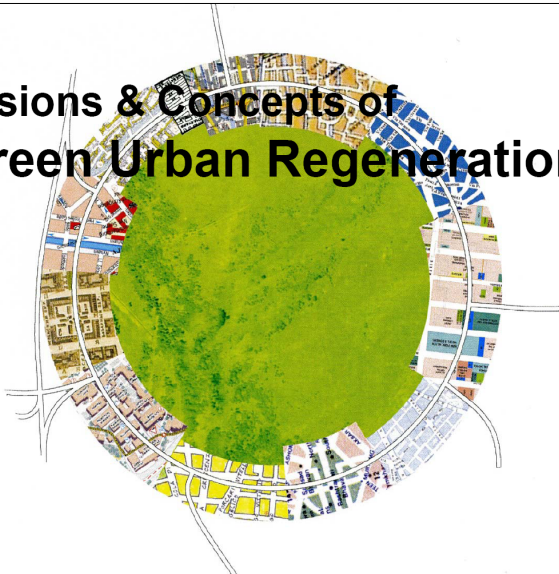
Dubai



1. *Ubiquitous Green : Not Divided & Isolated, but Convergent with City*



III. Visions & Concepts of Green Urban Regeneration



Vision Slogan :

***U-Park City,
Chungnam***

2. Ecological Operation with Naturalness

: Urban Climate, Energy & Water Circulation.
Biodiversity etc.



3. Landscape with Arts



4. Cultural Place with Social Activities

: Leisure/Recreation. Exhibition. Well-Being



5. Making Communities with Urban Life



IV. Strategies for Green Urban Regeneration

1. A Transfer of Urban Surface to Ecological Surface



needed to guarantee Open Space & System of Green
needed to regulate Coverage Ratio, instead of height of Building
needed to secure Green Coverage of Roof, Wall, Parking Lots
etc.

2. A Transfer of Ecological Surface to Cultural Surface



3. Transfer of Urban Infra Structure to Landscape Infra Structure



4. Hybridization of Land Uses

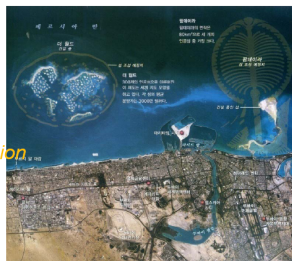
: Mixed & Solid Land Use



5. Valueplanning by Imagineering

Imagineering = Image + Engineering
= construction of image

Green
Hybrid
Culture
Leisure & Recreation
Shopping



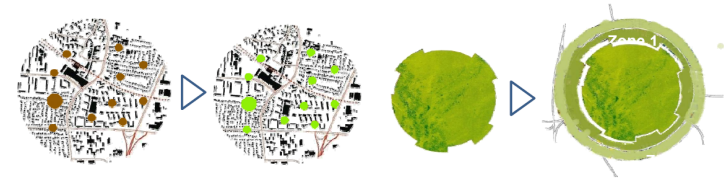
Vertical Surface
Structures
Flow + Process
Land Use
Horizon Surface



Urban Experience – Identity – Brand - Hub & Node in Networks

7. Transfer of Post- Industrial Site

, Abandoned Railroad Site, Void Site, etc. to **Park**



- A Strategic Center for a Recovering of Urban Ecology , Culture instead of Housing, Commercial alone etc.
- The regulations Needed to Secure Peripheral Green Space around the Site by introduction of the maximum Coverage Ratio

8. Regeneration of Urban River & Streams

as a Ecological Surface , Cultural Surface with Convergent Land Use



River as a Corridor for Division



River is an Urban Surface



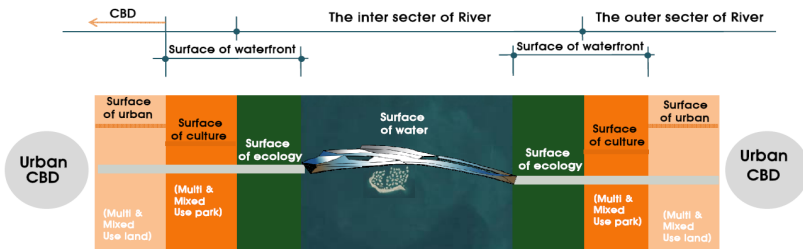
Recovering Ecological Surface



Convergence of each side of Cultural Surface

- The Vehicle Road of each side of River would be Rejected
- Each side of River would be a Strategic Base for Cultural Convergence of Green and Park, Residence, Business, Commerce,
- A River would be a Surface for Cultural Convergence by means of Islands , Bridges etc.. These would be a Landmark of City

8. Ideal Model of Urban Waterfront of River & Streams



10. Introduction of Strategic Plan & Hybrid of Professions



- The Hybrid of URBAN, ARCHITECTURE & LANDSCAPE ARCHITECTURE would be required
- An Transition from Master Plan to Strategic Plan , from Form & OBJ. Design to Strategic Design & Process Design

9. Regeneration of CBD & Residential Area



V. Cases of Green Urban Regeneration

Landscaping Moved Site with Park



Landscaping Buildings with Green + Art



Landscaping Residential Site with Green + Art



Landscaping Roof with Green + Art



Buildings with Solar Pannels



Landscaping Infra Structures with Park



CBD Regeneration with Botanical Garde



Santo domingo

Landscaping Brown Fields with Park

: Disturbed Sites of Wastes



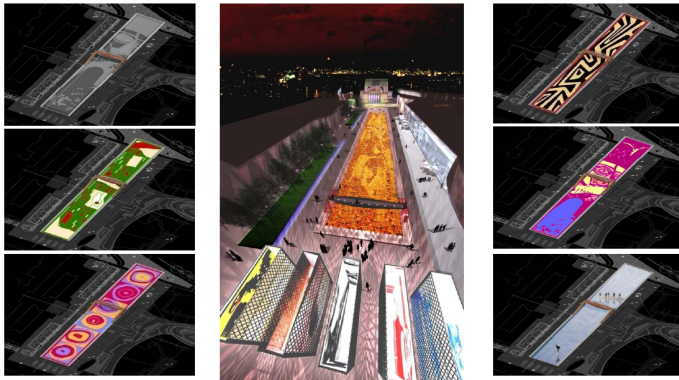
Urban Infra Landscaping



Landscaping Ally with Garden



Landscaping Urban Infra with Program



Landscaping the Area of under Bridge with Ecological Garden



Landscaping Street with Furniture & Park



Landscaping Green Belt with Park



*Landscaping Artificial Structure with
Green + Art*



VI. Conclusions

- *Green Regeneration is a new Vision & Urban Ideal of the 21c.*
- *There are variety of ways & strategies to reach green urban regeneration*
- *The Wide Range of reformation of Law & Regulation about Land Use , Architecture etc. would be done Preferably.*
- *‘U-Park City’ may be a preferable Slogan for Park & Green Policy of Chungnam Province*

memo