

SYKE Urban Zone project

Urban zones - pathways for the future

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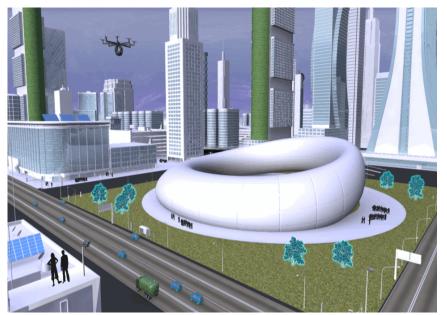
www.urban3.net

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- 2. Taking Urban Zone thinking into the future
- 3. Putting it together:
 Urban 3.0
 applications,
 multi-level, multisector
- 4. Toolkit: practical ways to explore & create the urban future

The past

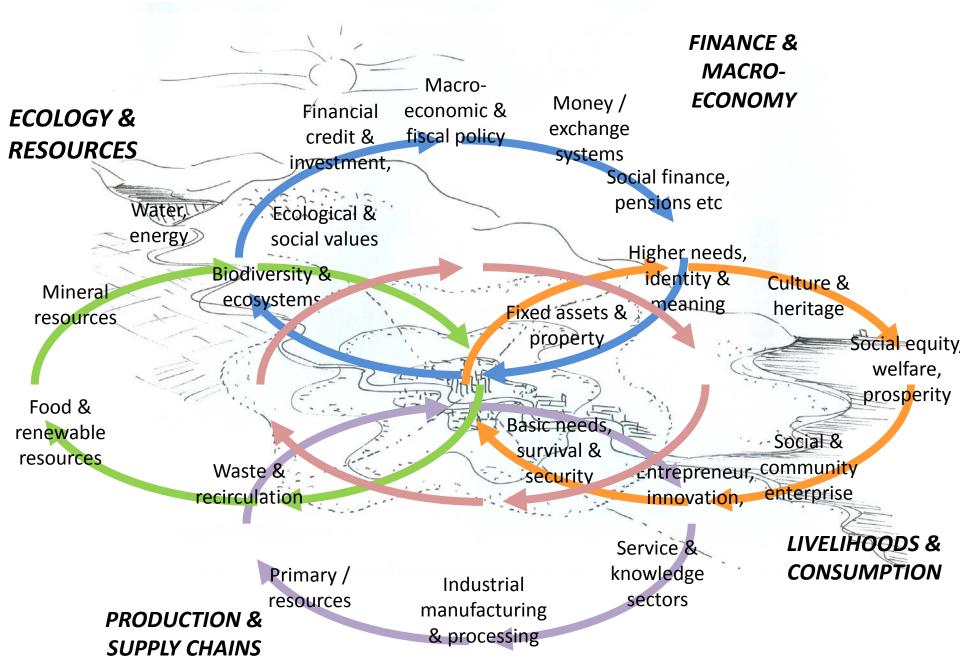




Behind the Urban Zone idea – cities for humans...



Mapping the inter-connected city-region



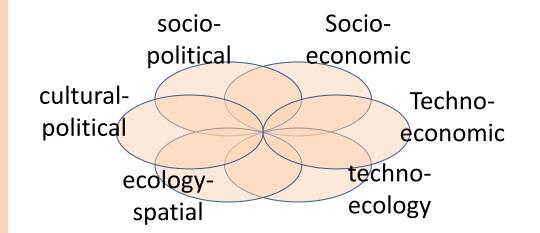
Creative synergy & urban intelligence

- Most urban problems are complex & inter-connected
- But most policy is simple and not well connected.
- Enterprise / business / finance drives urban activities & its problems: but is responsible only for profit.
- We are not well skilled in bringing together ecological, social, cultural values
- We have to find ways for our environment-resource systems (energy, water, waste etc) to learn & think



Creative synergy & urban intelligence

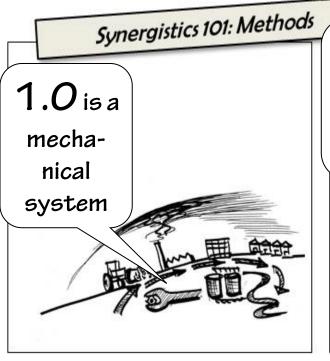
- We call this learning & thinking, "policy intelligence".
- It puts together the economic, social, cultural, political, technology, ecological etc
- The best way is to look for the inter-connections & synergies between.... So we call it synergistic
- There are methods & tools which can help...
- Synergistic mapping & design
- Synergy foresight
- Synergy planning....etc





Co-evolution of cities

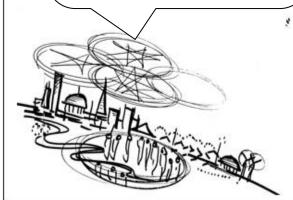
At the core is the idea of "synergistic coevolution": it's as easy as "1-2-3"



2.0 is a biological system - a jungle of winner takes all



3.0 is more about human synergy, social learning & shared intelligence



'Clever city':

Clever like the engineering of a car, with one main objective

'Smart City':

Smart like a road network which adapts to change

'Wise City':

Wise like someone who can think, learn, collaborate, create ideas & strategies

INTERNATIONAL COMPARISONS

- Norway: Cities of the Future
- China: National New-type Urbanisation Plan
- Poland: Legislating for a New Urban Landscape
- Uganda: Managing urban growth to 2025
- Brazil: An evolving national approach to cities
- Australia: Our Cities, Our Future—A National Urban Policy
- European Union: Cities of Tomorrow
- Committee of Regions: Urban governance program
- UK future of cities programme

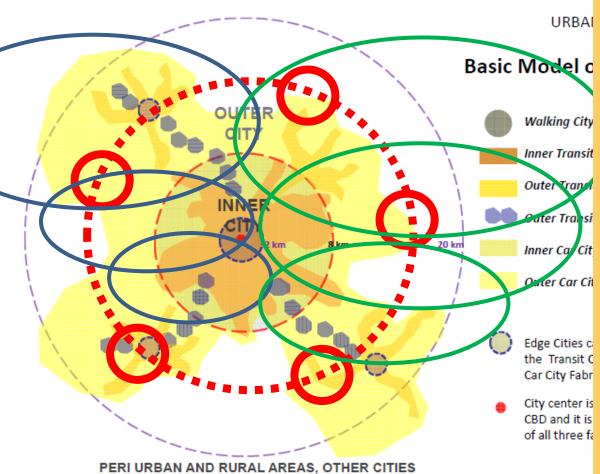
- London Infrastructure Plan 2050
- Strategic Metropolitan
 Plan for Barcelona Vision
 2020
- Sydney 2054
- New York City Region: 'Fragile Success'
- Metro Vancouver 2040
- The Singapore Concept Plan
- Fiber City: Tokyo 2050
- Greater Manchester 2040

2) Taking Urban Zone thinking into the future



URBAN ZONES – SOCIAL / ECONOMIC ZONES

First explore the inter-connections between the spatial urban form 'types / models', and social & economic types / models.



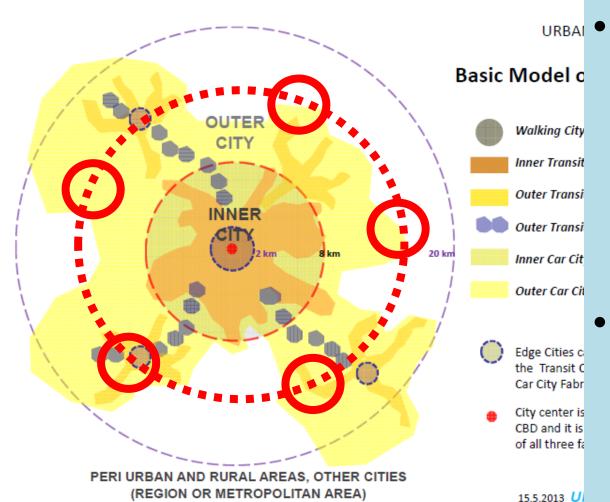
(REGION OR METROPOLITAN AREA)

- Social / lifestyle types:
 'slow' localized lifestyles
 & socialities: 'medium'
 urban centred lifestyles &
 socialities: 'fast'
 globalized high mobility
 lifestyles & socialities
- Economic / employment types: 'slow' localized activity cycles: 'medium' urban centred activities: 'fast' globalized high mobility activity cycles.
- These are interconnected: we find that 'fast' people need slow experiences, that 'medium' activities depend on global 'fast' systems, etc.

15.5.2013 UF Leo Kosonen

URBAN ZONES - NATURE OF CHANGE - GROWTH OR WHAT??

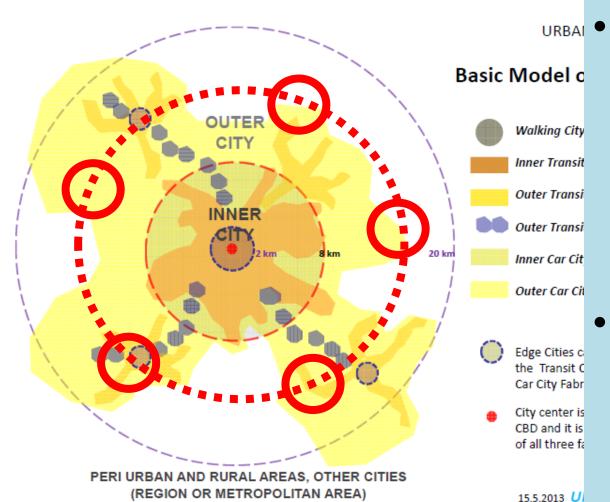
Second, we look at the underlying dynamics or 'spatial development logic', drawing on the synergistic model:



- Linear model: simple growth in all directions, with available technology
- Adaptive model: deregulated, sprawlenterprise model: walking areas are isolated enclaves: public trans is underfunded & uncoordinated: auto systems dominate
- Synergistic model: positive interconnections & value generation between slow/medium/fast urban structures:

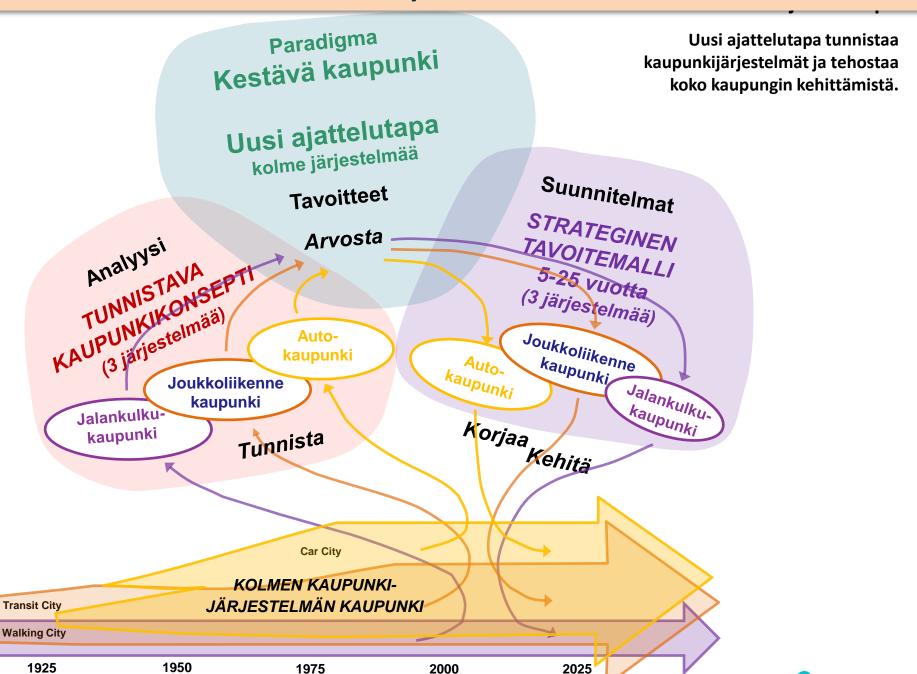
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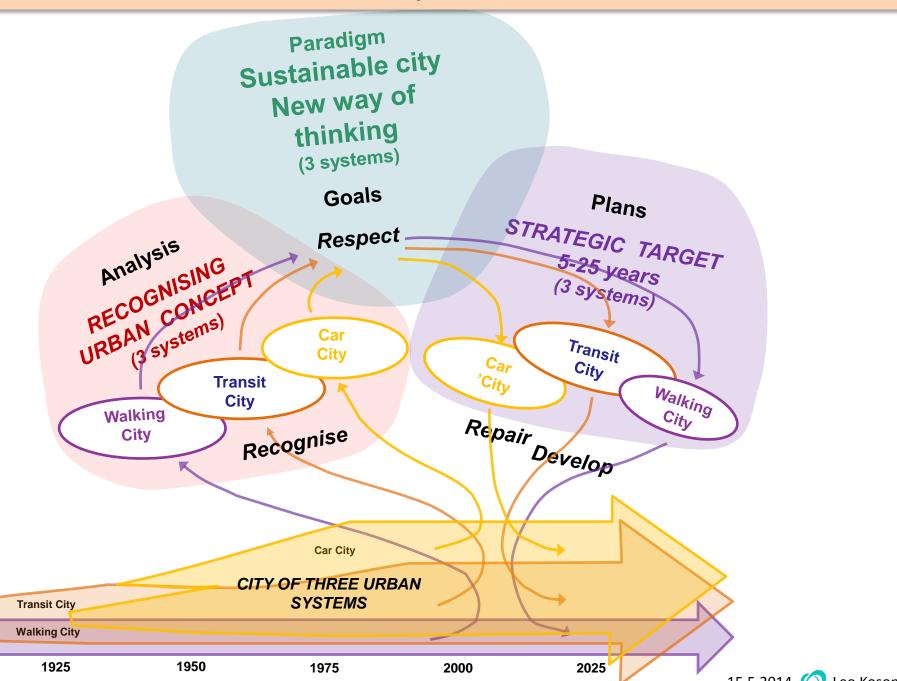


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URBAN ZONES - SOCIAL / ECONOMIC ZONES: ANALYSIS



URBAN ZONES – SOCIAL / ECONOMIC ZONES: PATHWAYS



Prospects for the Urban Zone concept

- Third, we explore the potential of each type for inter-connections with the others in terms of physical urban structures: with social / economic linkages
- City scale: car-transit park & ride
- Neighbourhood scale: green / bus / shopping street locations
- Street scale: integration of cars & people

	Slow speed	Medium speed	High speed	Global
Direct speed	Walking / cycling	public transport	Auto	Aero
Urban mobility effect	Auto	Cycle	Public transport	
Urban Accessibil ity	Public transport	Car	Cycle	Skype

Prospects for the Urban Zone concept

 Finally the question of process - how to plan & achieve a city-region with optimum balance of types 1,2, 3?

- Here we look for value added synergies between different actors:
- capacity for learning & collaboration, and the building of shared intelligence:
- the combined 'pathways', strategic directions and enabling actions for each of these.

URBAN-ENVIRONMENT ZONE: PRIORITY MAPPING

Figure 1.1: Multiple Deprivation within the Northwest (IMD Data Source ODPM, 2004)

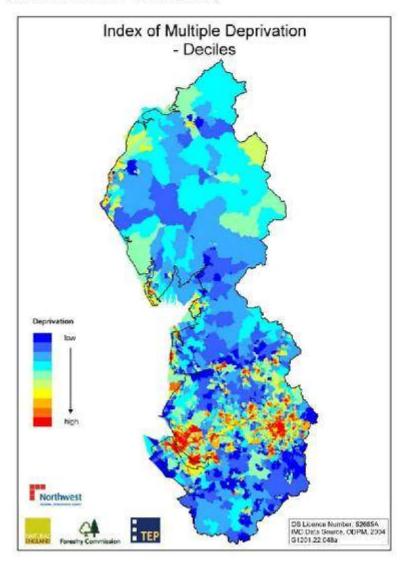
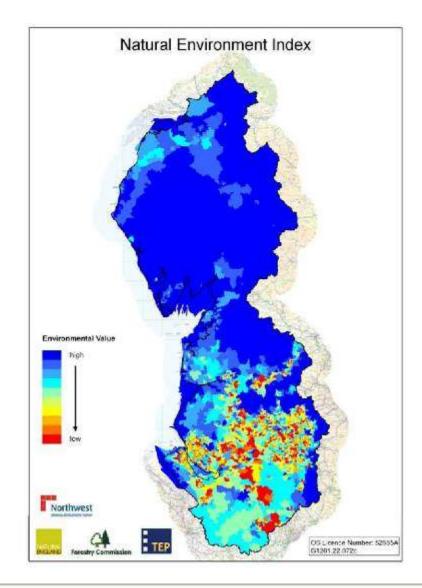
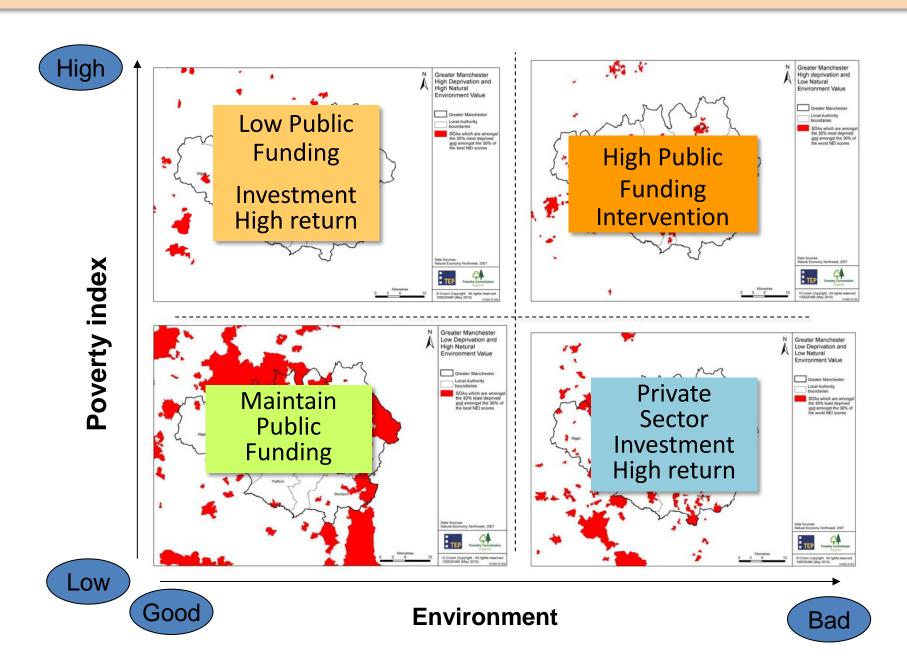


Figure 1.2: The Natural Environment Index

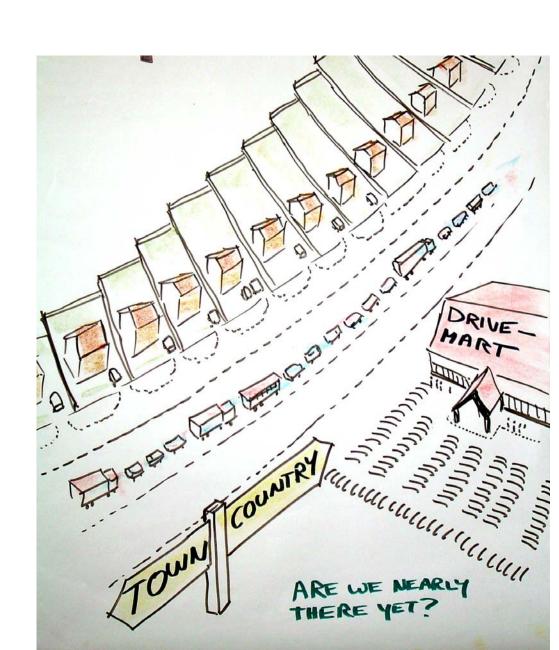


URBAN-ENVIRONMENT ZONE: INVESTMENT PRIORITY



A1 – high growth scenario ('hyper-tech')

- rapid economic growth, global population peaks in mid-century,new efficient technologies. Energy prices decline, new renewable energy & nuclear.
- rapid acceleration of digital / social technology which transforms home and work.
- Urban / peri-urban issues small 'polycentric' towns and cities - new transport technologies, expansion of commuting distances, peri-urbanisation and 'metropolitan-isation' of rural areas on a massive scale.



Rural-urban-region

AREA TYPES

Protected natural areas, combined with sustainable resource management

Outer peri-urban areas, with diversified land-based activities

Inner peri-urban areas, with diversified landscapebased settlements

'Green belt' or similar spatial development policy, with multifunctional landscape diversity

'green city belt' - areas of diversified open space with local food & natural habitats

'Coastal belt', wetlands / floodplains, estuaries, climatic buffer zones

'Farm belt' - areas of intensive $^{\mathrm{access}}$ between country & agriculture with access to local markets

LINKAGES

Governance structures which link & coordinate municipalities in the Rural **Urban Region**

Ecosystems services linkages, for water, soil, climate, food, forest, visitors etc

Economic & investment linkages to sustain & enhance the ecosystem services

Strategic scale green infrastructure which connects urban & rural along natural features

Social urban-rural linkages to enable low impact

city

CITY-REGION: TYPE (A)

Globalized development dynamic, with sub-optimal city-region governance & planning:

Result – 'urban sprawl'

CITY-REGION: TYPE (B)

Balanced development dynamic with strategic city-region governance & planning:

Result – 'social city-region'

'Aerotropolis' with distributed lowdensity peri-urban development

'Archipelago' of globalized business parks / science parks / logistics / retail parks / health & education campuses

Outward push & sprawlof mono-functional landuses: displacement of local diversity & resilience

Widening social & economic divisions & exclusion zones

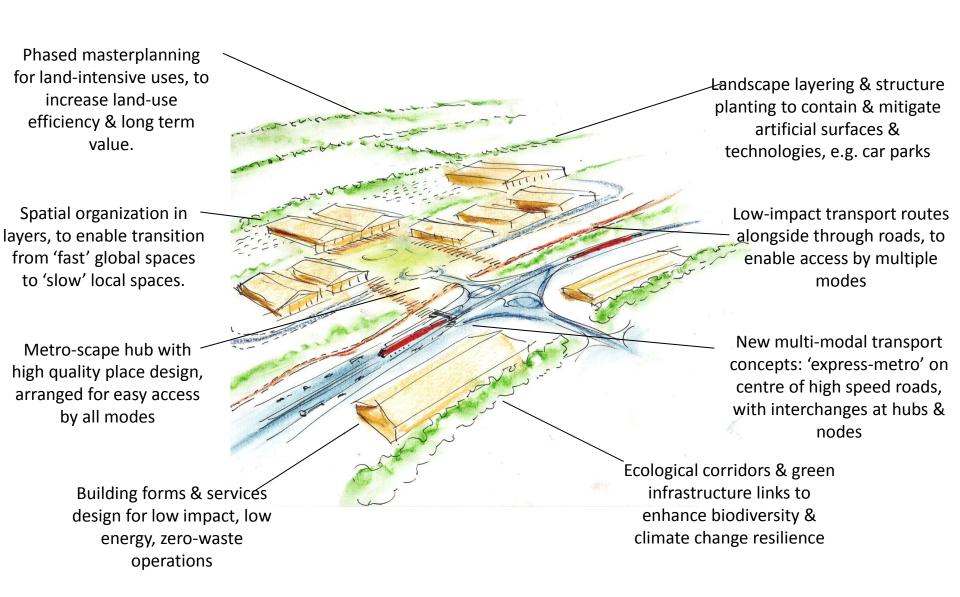
Car dependency, traffic congestion, vulnerability to climate change & fossil fuel shortage

Linking global to local economic capital & investment flows, to enhance ecosystem services & rural-urban links Spatial organization with clusters & families of settlement forms, to enable higher densities, values & quality of life

Integration of green /
grey / gold types of
infrastructure to enable
sustainable urban
metabolism for the
whole city-region

Regeneration of diversity & resilience in local economies & communities, to enhance social inclusion

Enterprise, leisure, retail parks



Housing & settlement retro-fit

COMMUTER SETTLEMENT

Typical problems - monofunctional housing subdivisions, transient population, isolated from services, dependent on car travel

Integrated model - gradual re-building of social economy networks between residents & service providers:

Integrated responsive transport: open access green infrastructure & biodiversity: local food cultivation: mutual aid for children & elderly etc.

Typical problems - large land take, high footprint per capita, dependent on car travel, socially exclusive

SCATTERED HOUSING

Integrated model - adjust policy & local taxes to encourage links with local community & economy: green infrastructure & low impact environmental systems

MARKET TOWN

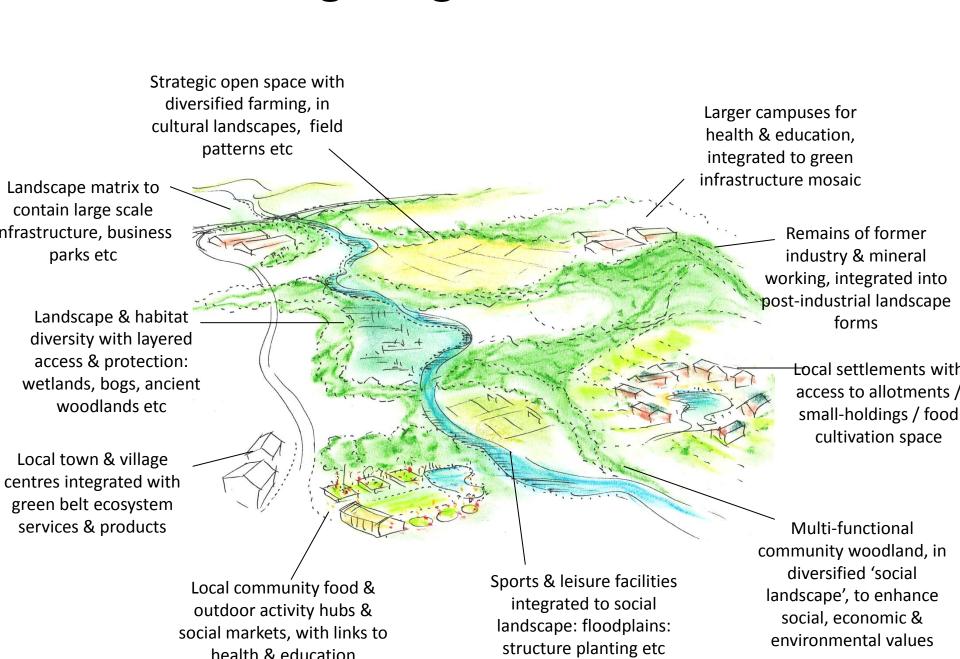
Typical problems - declining industries: distance from employment: rapid social change: car dependency: environmental degradation

Integrated model – regenerate self-organizing local social economy & community enterprise: market place as hub



Promote knowledge based industries, environmental & visitor economy, local & niche food cultivation.

Urban fringe & green infrastructure



Rural settlements & ecosystems

Development policy balanced between the needs of a globalizing city-region, and the local community

Social linkages between urban / peri-urban / rural, with exchanges of workers, visitors, students, residents & special groups.

Variegated landscape forms & habitats, building resilience to climate change, flood protection etc

Low-impact transport systems, with integrated rail & / responsive bus / taxi systems.

New economic development combines visitor / leisure: farm & forestry: ecosystem services: knowledge based industries Economic investment & exchange structures, to maintain & enhance the ecosystem services linking urban & rural

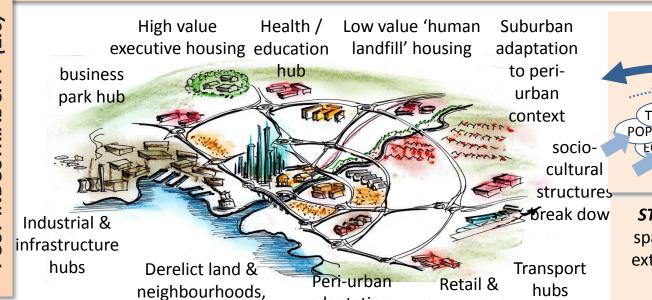
Natural resource management, coordinated with cityregion environmental systems, in energy, water, waste etc

Eco-system services exchange & reciprocal links: e.g. water & flood protection: carbon & biomass: energy & minerals:

Diversified communitybased farming, with local & organic food systems, farmer's markets etc.

3) Putting it together: Urban 3.0 applications, multi-level, multi-sector





adaptation,

garden centres etc

STRUCTURAL FORCES:

TRAN SERV

JOBS

ECON

spatial structure grows: extractive power grows: sprawl, pollution, obsolescence grow

Population growth:
migration: household size reduces, housing demand grows

Urban mobility growth:
vehicle technology:
urban water & energy
resource growth
business growth
& specialization

Industrial &
infrastructure

gaps in urban fabric

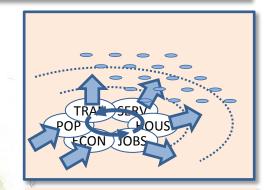
Historic city core on river mouth: civic quarter & railway: merchant district

growth

merchant & Ur
professional ho
district: inner marke
quality suburbs loc

Urban fringe
horticulture
market gardens fo

leisure hub



STRUCTURAL FORCES:

Direct population growth & economic growth >> rapid expansion of industry, housing, water / energy, services, transport etc

SPATIAL DEVELOPMENT 3.0

Peri-urban hubs start to build a diverse economic & social base Green Belt /
Eco-belt landuse & resource
management
policy

Collaborative links & exchanges between area types & settlements

Networked rural economic developmen t policy

STRUCTURAL FORCES & PATTERNS:

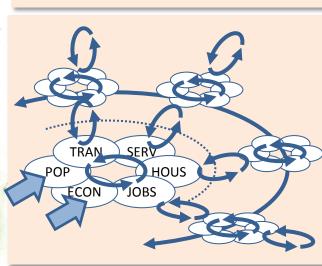
Satellite centres & settlements are multifunctional, diverse, dynamic:

Spatial linkages & balancing loops between growth & decline



Ecological balances & cycles at cityregion & local scale

New peri-urban labour market choices & new peri-rural economic systems



PRINCIPLES of SYNERGISTIC SPATIAL DEVELOPMENT:

Multi-functional land-use & urban-rural linkages:

Multi-level spatial structures & forms

Multi-sector diversity of enterprise for economic, social, ecological value added

Multi-actor learning & intelligence in governance

RURAL-URBAN REGION 3.0

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URBAN STRUCTURE & MOBILITY 3.0

ADAPTIVE '2.0' AUTOMOTIVE CITY

SYNERGISTIC '3.0' MULTI-MODAL CITY

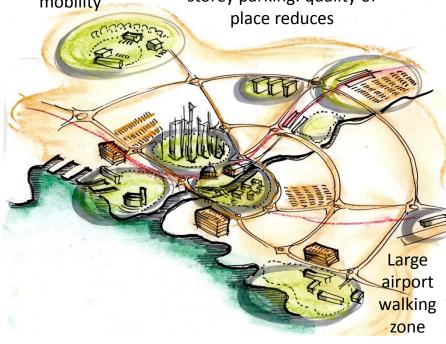
Urban space expands to mono-functional sprawl: 'fast logic' is the dominant system of auto-areo-mobility

Mono functional nodes expand at interchanges: road network & parking space grow with multistorey parking: quality of

Connected walking / cycling networks generate local level multi-functional activity mesh

Transit nodes generate multi-functional activity & hubs for new urban growth centres

Urban activity & spatial structure matures, enriches & diversifies, to multifunction multi-value patterns

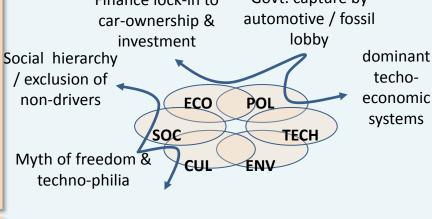


Integrated system with fixed radial routes, flexible orbital routes, responsive local networks, social media intermediation

Adaptive-extractive model: space extensive, deregulated enterprise: walking areas are isolated enclaves: transit systems are under-funded & uncoordinated: auto systems generate most wealth, power, cultural value.

Synergistic model: positive inter-connections & value generation between slow/medium/fast urban structures: inter-connection of slow areas via continuous GBI infrastructure

EXTRACTIVE '2.0' AUTOMOTIVE CITY SYNERGISTIC '3.0' MULTI-MODAL CITY Govt. capture by **UPSTREAM: SYNDROMES** Integrated policy Finance lock-in to Financial de-locking by automotive / fossil for liveable places integrated travel cost car-ownership & lobby & streets & enterprise models investment Interdominant Social hierarchy connecting 'socio-tech' Inclusion by



SYNDROMES

UPSTREAM:

URBAN STRUCTURE

Urban activity space

expands & sprawls,

to serve only 'fast

logic' & the

dominant systems of



socio-

with stress

URBAN STRUCTURE

DOWNSTREAM: METABOLISM

FAST

SLOW



multi-mobility

Culture of

liveability &

multifunctional selforganization: with value chains for different modes & speeds Diversity of modes enables value generation between different activities, locations, urban structures

Function

hubs

Hinter-

land

Centres

Intensive

areas

Extensive

areas

ECO

CUL

soc

Inter-city/

national

Virtual

Auto-

Transit /

bus

Walk /

bike

mobile ST

POL

TECH

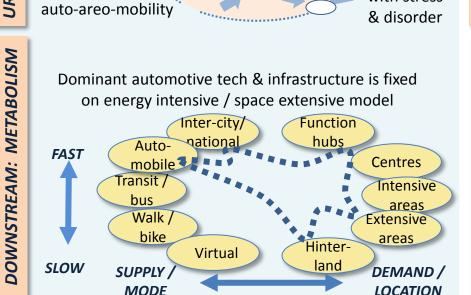
alternative

systems

Low carbon / low

impact tech & modes

Peri-urban



SOCIAL CITY: NEIGHBOURHOOD SCALE

SOCIAL CITY: NEIGHBOURHOODS 3.0

LINEAR-ADAPTIVE MODEL

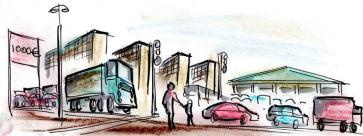
SYNERGISTIC MODEL & PATHWAYS

Mono-functional landuses on large plots: little or no local linkages & value connections

Peripheral deprived

housing estate / project

School block
surrounded by concrete
yard & security fence



Traffic & commercial infrastructure dominates: crossing the road is risky

Multi-functional land-uses & activities, on diverse land parcels: many linkages & local value connections

reduce large housing blocks: inserts human scale street level housing

New market place with spaces for small local traders

Traffic intersection redesigned around public space: through traffic is



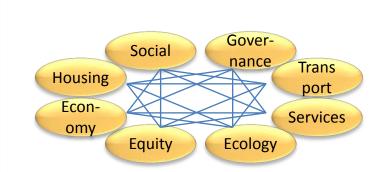
Human scale, biodiversity, street life, small enterprises, traffic calm spaces

LINEAR-ADAPTIVE MODEL

Peripheral deprived Inner city transient housing estate / project neighbourhood Gover-Social nance Trans Housing port Econ-**Services** omy Ecology Equity Affluent outer suburb

FACTORS OF SOCIAL VALUE

SYNERGISTIC MODEL & PATHWAYS



Housing & property tenure blocks initiatives

Spatial structure promotes exclusion Service gaps lead to exclusion

URBAN FORM

ACTORS & RELATIONS

collaborative schemes

Spaces for creative

events & enterprises

Tenure structure enables

promotes public realm & diversity

Spatial structure

Service location enables inclusion & reciprocity

CIVIL ACTORS

Infrastructure / users Community / person Governance / citizens Pub. service \users Landowner Jusers

Typical local relations:

divided, alienated,

exclusive

SOCIAL ACTORS Young / elderly Male / female Resident / incomer

Minority / majority Richer / poorer

Employer / worker Creditor / debtor Owner / entrepreneur Landlord / tenant Services / customer

CIVIL ACTORS

Vibrant local scene, creative & participative: street parties & cleanup events

Typical local relations:

collaborative, reciprocal,

equitable, inclusive

SOCIAL ACTORS Collaborative &

reciprocal links between young /old, rich /poor etc

ECONOMIC ACTORS

Youth work in local shops: businesses know their clients: landlords & investors are local

ECONOMIC ACTORS

ECOLOGICAL CITY: CLIMATE PROOFING

ECONOMIC CITY

LINEAR CHANGE - 'INDUSTRIAL CITY' ("1.0")

Cultural heritage Lack of all kinds legacy obsolete & disused of innovation

Governance failure & corruption

Dysfunctional public services can't cope

Civil society corruption & stagnation

socio-

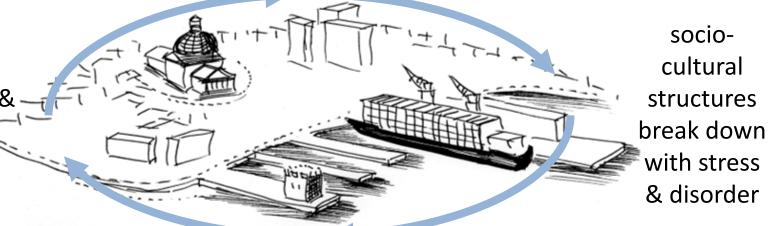
cultural

structures

with stress

& disorder

Underinvestment & marginal ization



Shipping & fishing goes to container depots,

Obsolete infrastructure & spatial structure organized labour breaks down, skills obsolete

Local fish stocks & energy sources run down

ADAPTIVE CHANGE - 'POST-INDUSTRIAL CITY ("2.0")

Lack of social / ecological innovation

profits are
exported
with
minimum
local value
added
shifts to
externally
financed high

value service

tourism

heritage sold as tourist commodity

governance capture & expropriation

Public services vulnerable to global shocks

Incentives for extractive leisure activity

Socio- cultural patterns broken / in flux, communities are vulnerable

regeneration only in tourist hotspots

Shipping replaced with tourist cruises

Hybrid infrastructure & spatial structure

Fragmented workers in new services sectors,

SYNERGISTIC CHANGE - 'WISE-CITY' ("3.0")

heritage is a Social, economic, multi-valent ecological community asset innovation

economic valueadded is returned to city & region

Revitalized public services

responsive to local needs: space for creative enterprise

Reinvestment
& recirculation
of multivalent
capital

tech

Social patterns are re-invented for greater resilience

more diversified, innovative, knowledge-based

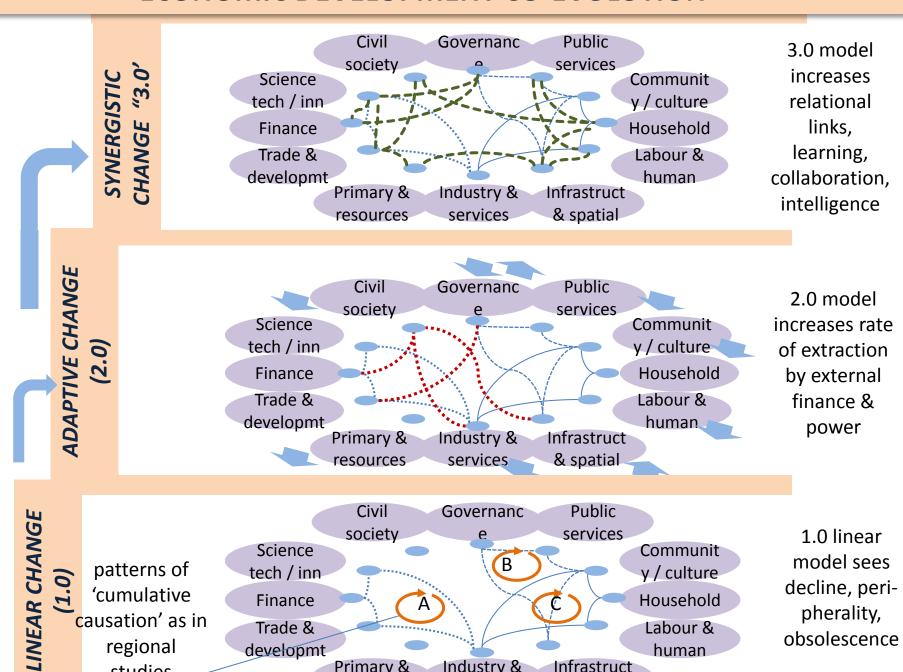
Local fish stocks diversified, ecoconserved & tourism, rejuvenated research, high-

Creative urban design links communities & marine

resources

New pathways for human resource development

ECONOMIC DEVELOPMENT CO-EVOLUTION



Industry &

regional

studies

developmt

Primary &

obsolescence

human

Infrastruct

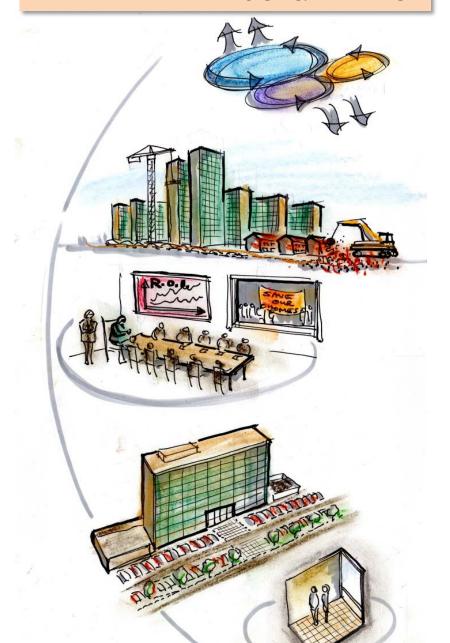
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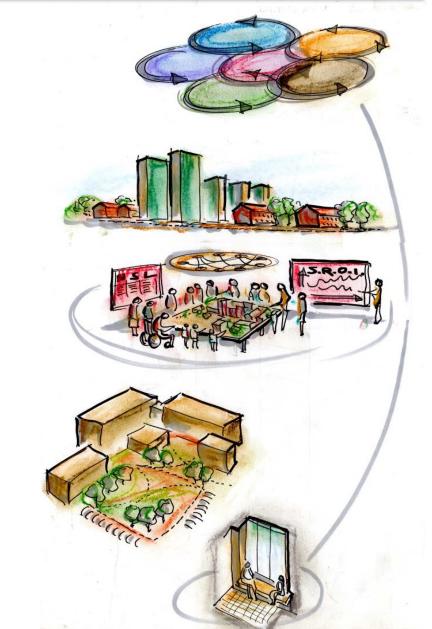


CITY-PROCESS: URBAN PLANNING & DESIGN 3.0

LINEAR - ADAPTIVE DESIGN & PLANNING

SYNERGISTIC DESIGN & PLANNING





scarce

SYNERGIES

8

ACTORS: GAPS

NIMTO ('Not **Outputs:** In My Term hi-value Of Office') projects

E/valuation:

SYNERGISTIC "3.0" MODELS

Feedback:

E/valuation:

Discourse:

Policy

objectives: open continuous & combination synergistic of hard & soft & participative, development multi-level to enable covalue-gen / intelligence regen **Outcomes:** Planning powers & continuous Processes: resources: enabling Outputs: real value relational pro-active & multi-valent gen / regen portfolio communities collaborative

Incentives Media only Starved & for hi-value looks for not in the Local **Incentives** projects stories **NGOs** loop for hi-value Govern not in projects/fees Civic & Public ance the loop society service Finance is Profes-Social / short term sions comm **Finance** profit Social & devt seeking hh Resourc Private / land hh **Private Busines** Constru Infraland-'Public' is ction s & serv struct owners bid **Firms** not in the Local firms Utilities get up price outsource loop not in the no feedskills & loop back suppliers

narrow &

procedural

Incentives for Media part Incentives Social shared valueof value for real Local infrastgen / regen loop **NGOs** value-gen/ ructure enable regen Govern-Civic & **Public** social ance Finance society service Profes-Social / fabric includes sions comm local **Finance** Social mutual & & devt quity stake Resourc Private / land Constru Busines Land-Public is Infraction s & serv owners empowstruct Firms in-Utilities Local firms include ered & source local part of are part of local mobilized skills & collateral negotiabusiness supplies tion case

URBAN PLANNING & FORESIGHT

Complex & multi-functional

PROBLEM TYPE

Simple & mono-functional

'Synergistic Foresight' (3.0) model): explores the opportunities in human thinking, learning, creating, collaborating

'Foresight' planning
(2.0 model): explores
alternatives within
the current system
Technical urban

planning (1.0 model): objectives are fixed, the question is where to put the houses?

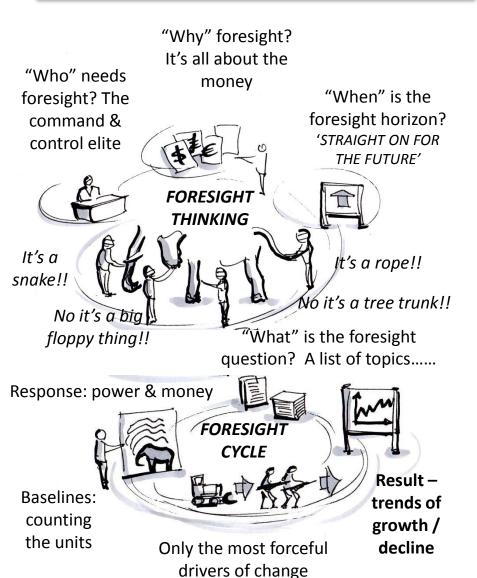
Linear change

DYNAMIC OF CHANGE

Co-evolution change & emergence of new structures

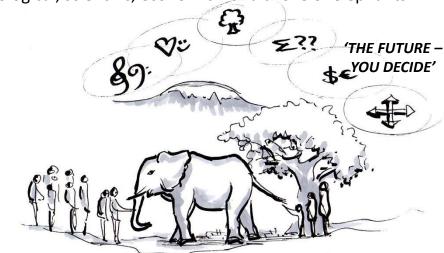
URBAN FORESIGHT: FROM SMART TO WISE

LINEAR-ADAPTIVE '1-2.0' MODEL

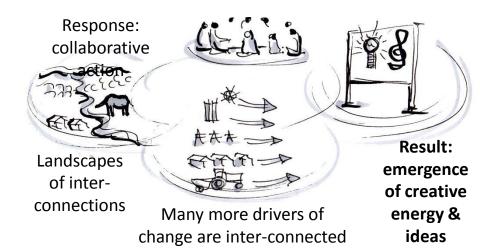


SYNERGISTIC '3.0' MODEL

"Why" foresight – many reasons – cultural, social, ecological, scientific, economic... and a love of elephants....



If we can take off the blindfolds, & see the reality together, we can think ahead together, & act together...



TOOLKITS: SYNERGY FORESIGHT CYCLE

More detail on www.urban3.net

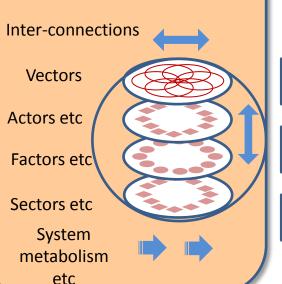
Then we can talk about the 'process'.... Here we have the cycle of 'Synergy Foresight', with 4 main stages of mapping & design.

(1-2-3): LANDSCAPE / SYSTEM MAPPING: (who / what is involved, how does the system work / not work?) Inter-connections

Multi-level change: as uncertainties, possibilities

(4-5-6): SCENARIO / CHANGE MAPPING:

(**Divergence:** what are the drivers of change, trends & alternatives?



D E F

CYCLE OF

MAPPING &

DESIGN

—

2.0 3.0 New synergies & inter-connections

New learning & thinking loops

New system models & transitions

(7-8-9): SYNERGY / INNOVATION DESIGN:

(10-11-12): STRATEGY / PATHWAY / ROAD-MAPPING:

(Convergence: what to do next / soon /

later: and who to do it??

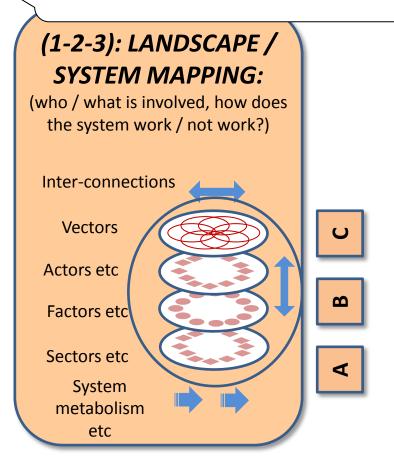
Multi-level change: as responses & actions

(Emergence: what creative visions & opportunities for synergy & collaboration?)

TOOLKITS: LANDSCAPE MAPPING

More detail on www.urban3.net

First is the most important – exploring the landscape – what is our problem? Where is the boundary? What can we do now or another day?



- Scope the issues & problems:
- Explore the 'actors' & their inter-connections
- Mapping of 'domains'
 (e.g. economic, social,
 environmental values &
 value systems etc)
- Explore the 'metabolism' of the system we are working with.... (i.e. what is this city / town for? What is its main purpose??

TOOLKITS: LANDSCAPE MAPPING

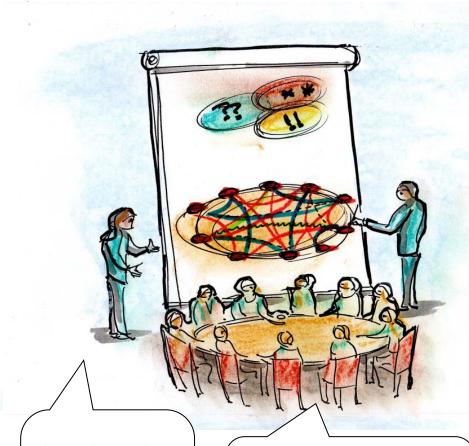
SCOPING & DELIBERATION

MAPPING OF ACTORS & RELATIONS



To start —let's draw the problem with the 'actors' ('stakeholders'). Most problems are messy & complex. But where to draw the boundaries?

Hmmm. Let's draw easy boundaries for now & leave the others for later



Ok... so then we discuss who is talking to who??
Who does not trust the other one? Etc...

This is all about power — not only in politics, but the power of money, ideas, cultures

TOOLKITS: LANDSCAPE MAPPING

MAPPING OF DOMAINS

MAPPING OF METABOLISM



Ok — it seems like there's not one city but many — so let's talk around smaller tables

Then we can draw a map of tables, each with a different kind of logic — social, economic, cultural, technology etc

Make sure there's

a table with

coffee.. And

maybe some

wine

Then it gets more real, like this typical city — money is made at the top — the city goes around — waste & pollution is dumped at the bottom — what could be more normal?

Actually it's like a game which goes around & around

TOOLKITS 2: CHANGE MAPPING

More detail on www.urban3.net

Then we can talk about the forces of change: from outside & from inside.

These will point not to one future but many possibilities

Multi-level change: as uncertainties, possibilities

(4-5-6): SCENARIO / CHANGE MAPPING:

(**Divergence:** what are the drivers of change, trends & alternatives?

D

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F

- Look at 'Drivers of change'
- Analyse the 'dynamics of change'
- Explore alternative scenarios for the future

CHANGE MAPPING EXAMPLE: '21 DRIVERS OF CHANGE' **Demographic change:**

SOCIAL & **COMMUNITY**

Digital revolution

Globalization

Industry & technology

Economic restructuring

Work & livelihood

Global climate &

Local environment

Energy & low carbon

Transport & communications

Inequality trends

Health & lifestyle

TECHNOLOGY &

a

INFRASTRUCTURE

ECONOMIC &

EMPLOYMENT

ENVIRONMENT &

RESOURCES

b

a

b

a

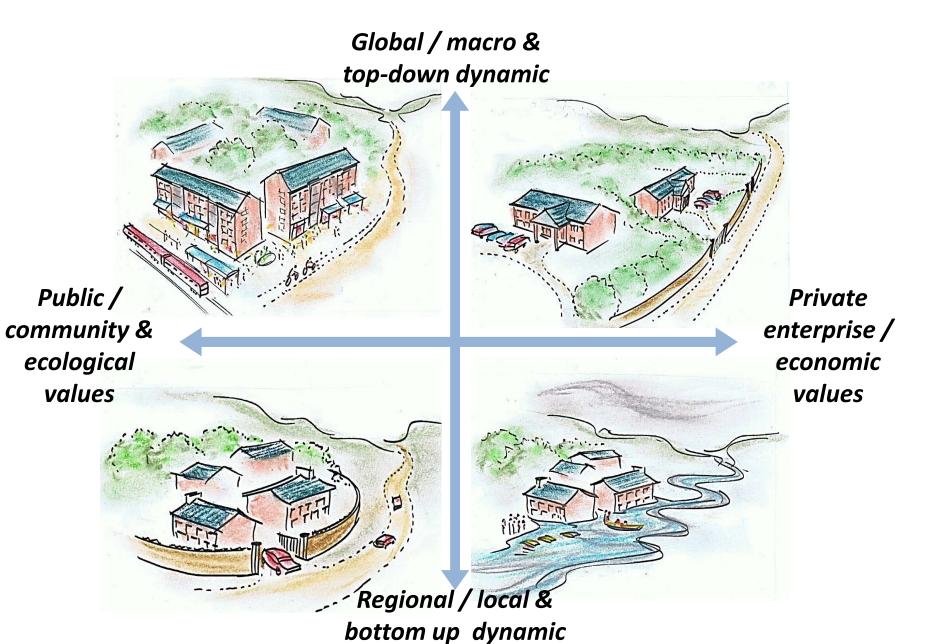
b

As from www.gm2040.com

CHANGE MAPPING EXAMPLE: 21 DRIVERS OF CHANGE					
5	POLICY & GOVERN		As from www.gm2040.com		
а		Multi-level governance			
b		Private-public balance			
С		Trust in govt / society			
6	CULTURE, VALUES				
а		Lifestyles & well-being			
b		Migration & diversity			
C		Education & skills			
7	CITIES				
а		North-south & regional	Growth / "overheating" of London and		
		balance	Southeast: potential responses e.g. new regional		
			distribution: continued rural migration &		
			shrinking of older industrial areas.		
b		Urban development &	Continued growth of GM centre / HE / airport		
		regeneration	axis: decline in town centres & polarization of		
			urban areas: potential responses in new forms of		
			area & local regeneration:		
С		Housing & community	Growing housing stress, supply / demand market		
			failures: transient neighbourhoods &		
			communities: potential responses in new forms		

CHANGE MAPPING: SCENARIO FRAMEWORK

Based on PLUREL (2011) and on IPCC 'SRES' 2001. Image © Joe Ravetz



CHANGE MAPPING: SCENARIO FRAMEWORK

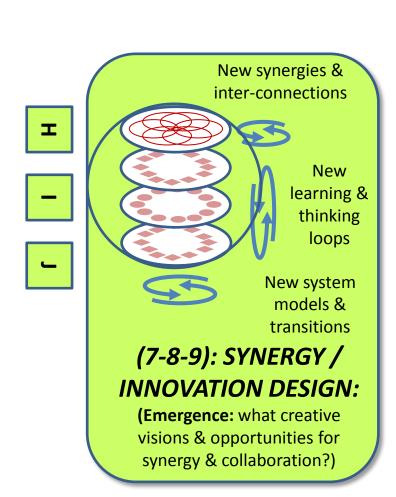
	'GLOBAL	LOCAL	'GLOBAL	LOCAL
	ENTERPRISE'	ENTERPRISE'	COMMUNITY'	COMMUNITY'
IPCC labels	A1	A2	B1	B2
Economic,	Private firms,	Private firms,	Social enterprise,	Social enterprise,
employment	global labour	local labour	global activities:	local activities:
	market: High	market:	Medium growth	Low economic
	economic growth	Medium growth	(2%)	growth <1%
	>3%	(2%)		
Environment,	ESS degradation	exploitation &	conservation of	Conservation of
resources	& pollution:	privatization of	ESS & public	ESS with
	Rapid climate	ESS:	access:	privatization:
	change	Rapid climate	moderate climate	moderate climate
		change	change	change
Urban / spatial	Car-based urban	Localized rural	Intensive large	Intensive small
development	sprawl, with	development	scale urban form	scale urban form,
	sealed buildings:	with low-tech	with sealed	with low-tech
	Counter-	buildings: sprawl	buildings:	eco-buildings:
	urbanization	and sub-	Re-urbanization	De-centralization.
		urbanization		

TOOLKITS 3: SYNERGY MAPPING

At the heart of the process is the 'synergy' – new ideas, possbilities, opportunities etc. But its also important to think about synergistic problems, conflicts etc

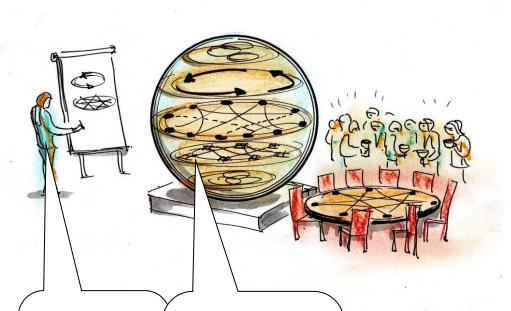
More detail on www.urban3.net

- Look for 'Linear 1.0' opportunities for change (+/-)
- Look for 'Adaptive
 2.0' opportunities for change (+/-)
- Look for 'Synergistic
 3.0' opportunities for change (+/-)



TOOLKITS 3: CO-EVOLUTION

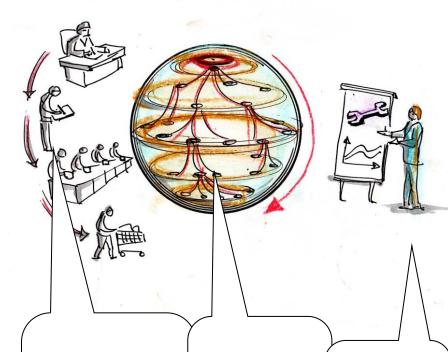
PUTTING IT TOGETHER



Finally — we can put it together.. A 'football' is an image which helps to think about interconnections We can see the different layers of the city — economic, social, technical etc - & how they connect or not

Time for some more coffee... maybe some wine??

"LINEAR 1.0" EMERGENCE



Now it gets serious. Is our city a top-down machine, where the leaders give orders, & we can only buy what is produced?

We can draw maps of hierarchies: the city is run by 2-3 people with not enough information

The city looks like a tool to fix a machine (nothing wrong with that..)

TOOLKITS 3: CO-EVOLUTION

"ADAPTIVE / EXTRACTIVE 2.0" EMERGENCE

"SYNERGISTIC 3.0" EMERGENCE



This is more realistic — the city is where the rich make & take the money: workers work: we dump the waste & the losers of society

Interesting if we draw this as a big shark eating the little fish... Actually sharks are quite clever. So the map shows 'islands of intelligence' which adapt & manage & eat the smaller fish

So is there an alternative to 'big fish eat little fish'? What if they all get along together?

Really, humans are not just like fish. See the mapping here—each layer of economic, social, technical etc, is a hub of learning, thinking, collaborating, creating

I think this brain is bigger than mine!!

TOOLKITS 4: PATHWAY / ROAD-MAPPING

More detail on www.urban3.net

Finally we converge towards the practical action plan, with real people, resources, places & times

- Mapping of 'pathways' of combined opportunities / actions
- Road-mapping of objectives / resources / actions through time
- Strategy / policy / project mapping

M L K

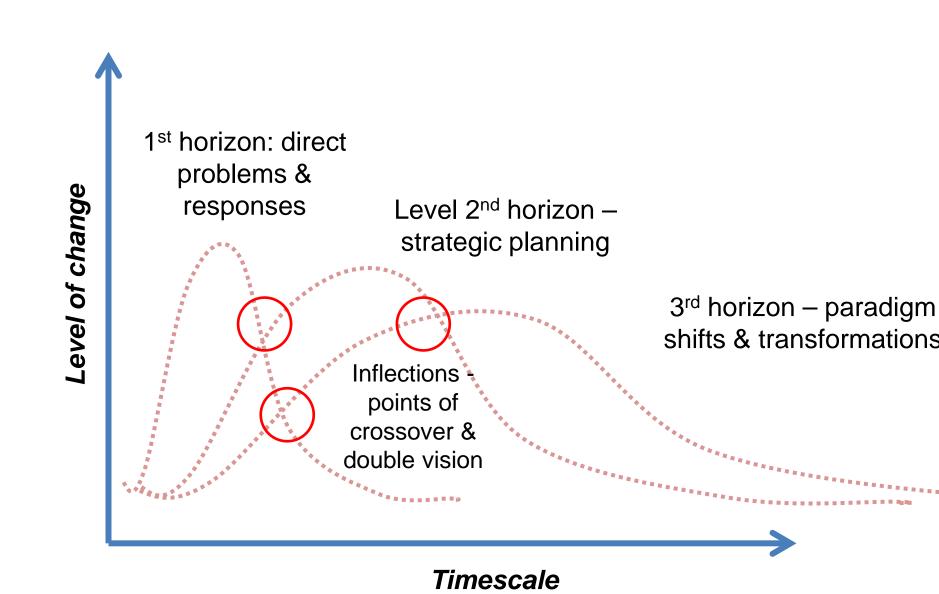
(10-11-12): STRATEGY / PATHWAY / ROAD-MAPPING:

(Convergence: what to do next / soon /

later: and who to do it??

Multi-level change: as responses & actions

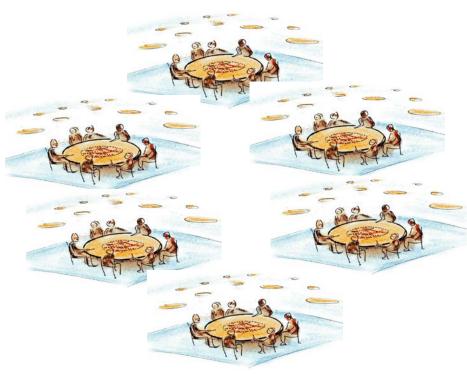
TOOLKITS 4: STRATEGY / ROAD-MAPPING: 3 HORIZONS



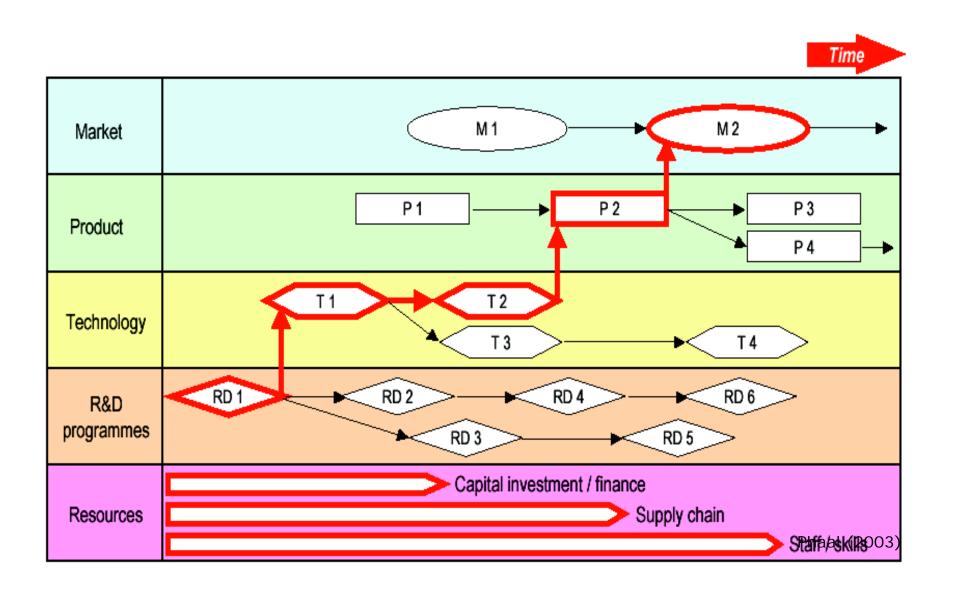
TOOLKITS 4: BRINGING ACTORS TOGETHER



Urban actors in discussion, in different sectors & departments



TOOLKITS 4: ROADMAP STRUCTURE



Evaluation template

		1.0-2.0 THINKING	Eval	3.0 THINKING	Eval
A	Linking actors	Actors are mobilized via structures of power & ideology		Actors mobilized via structures of collaboration & intelligence	
В	Linking values	dominant value systems are prioritized & reinforced		Diversity of value systems are included & linked	
С	Social domains	Social & community structures are enhanced & extended		Social & community structures are transformed & evolved.	
D	Technical	Tech. systems are mono-functional & capacity for disempowerment		Tech. systems are multi- functional & empowering for all	
Е	Economic	Econ. & finance are materialist, extractive, monopolistic		Econ. & finance are diverse, repropriative, multi-stakeholder	
F	Environment	Env. actions are localized, selective, externalizing		Env. actions link local-global, circular, inclusive, internalizing	
G	Policy/ governance	Pol. systems based on hierarchy, alienation, expropriation,		Pol. systems: consensus, inclusion, empowerment,	
Н	Cultural	Cult. patterns reinforce conflict & alienation		Cult.patterns enable diversity, self-determination	
I	Urban-spatial	Spatial structures enable regimes of alienation & disempowerment		Spatial structures enable repropriation & empowerment	

Indicators template: City Intelligence Index (Ci2)

	INFORMATICS:	PROBLEM SOLVING CAPACITY	CREATIVE CAPACITY	SYNERGY / INNOVATION / COLLABORATION	STRATEGIC CAPACITY
cognitive funtions	Data, knowledge, memory, computation	Horizontal / vertical system functions	Divergent thinking functions	Emergent thinking functions	Convergent thinking functions
SOCIAL DOMAIN	Social knowledge, formal & tacit	Needs / resources allocations	Social imaginaries	Social innovation	Social strategy & mobilization
		Social equality / redistribution:			
TECHNICAL	Technical info & inter-operability	System design & management	Technology design space	Technology innovation	Tech strategy & deployment
ECONOMIC	Business information, transparency	Markets, supply chains, investment	economic entrepreneurship space	Economic systems innovation	Integrated econ prosperity
ENVIRON MENT	Environment informatics				
POLITICAL	Policy knowledge, formal & tacit	Care & welfare	Space for alternative politics		
		Democracy index	transparency index		
URBAN	Spatial informatics				

TOOLKITS 4: PLANNING & GOVERNANCE TRANSITION

- Showing a transition from 'linear' command & control mode of planning, to a more relational "planning 3.0".
- This is not new, but happens in many situations, where creative network action is required.
- From:
 "Mediation of space –making of place"
- To:
 "coordination
 of space &
 cultivation of
 place"

From - "linear space planning"

Policy:
hierarchical &
technocratic:

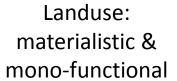
Regulation system:

1-way flow:

(+ occasional

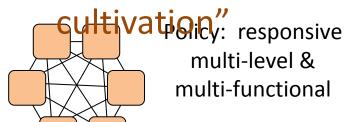
elections)

Public: fragmented & passive

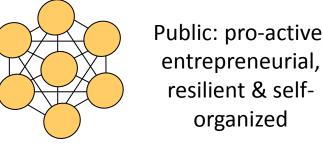


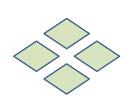


"synergistic place-



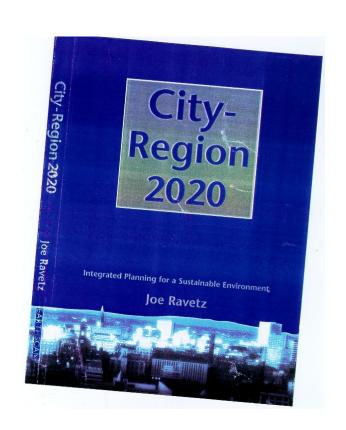
co-production of shared intelligence



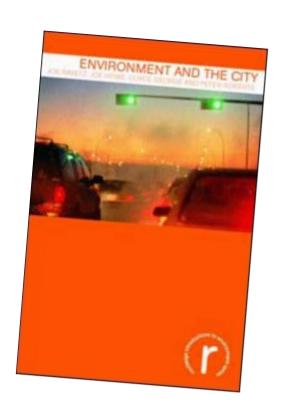


Landuse: relational & multifunctional

Thinking in progress



"World's largest feasibility study" – linking spatial, economy, environment, society, governance.



"Environment and the City" - critical perspectives on the urban environment around the world Urban 3.0

Pathways for shared intelligence for the One Planet century

"strategic thinking from local to global" – shared intelligence for the relational economy

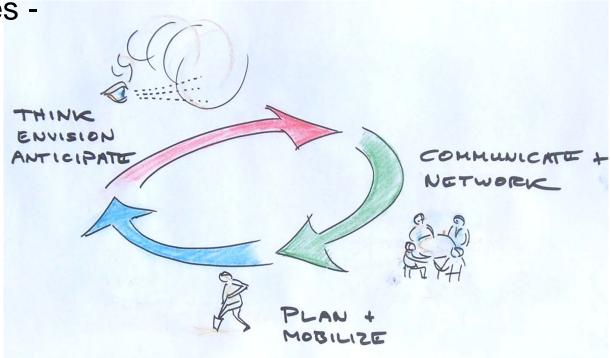
Afterword: The game of city governance

Practical tools: how to explore & create the 'urban future'



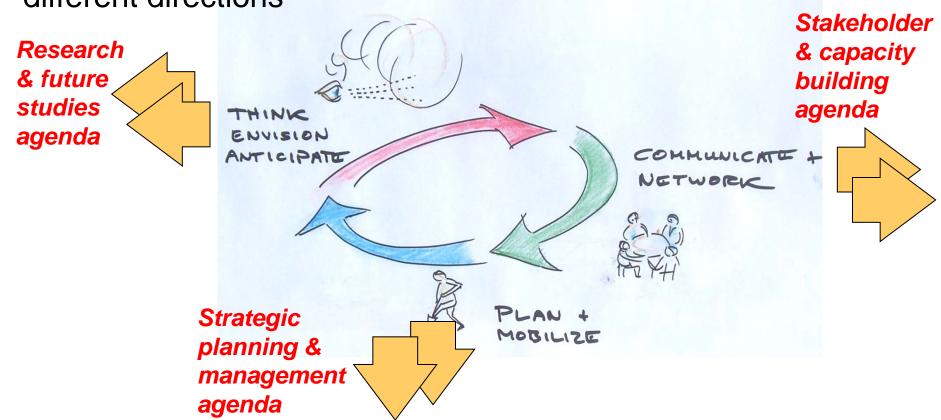
Foresight & the urban case

Foresight can be seen as a cycle of about 3 stages -



Foresight & the urban case

But in the urban case, these are often pulling in different directions



Urban foresight types: global

	Futures dimension	Stakeholder dimension	Policy dimension
Global inter- governmental	Exploratory focus	Mediated at the global level	Strong linkage to sponsor agencies
Global sectoral / technology projects	Technical & modelling focus	Sector / technology community	Input to policy process
Global interest group	Exploratory & visioning focus	Broader community	Linkage to NGO agendas
Global research network	Broad research focus	Research user community	To be identified
Global media / communicatio ns	Visioning approach	Creative / communication s focus	Aspirational focus

Urban foresight types: European

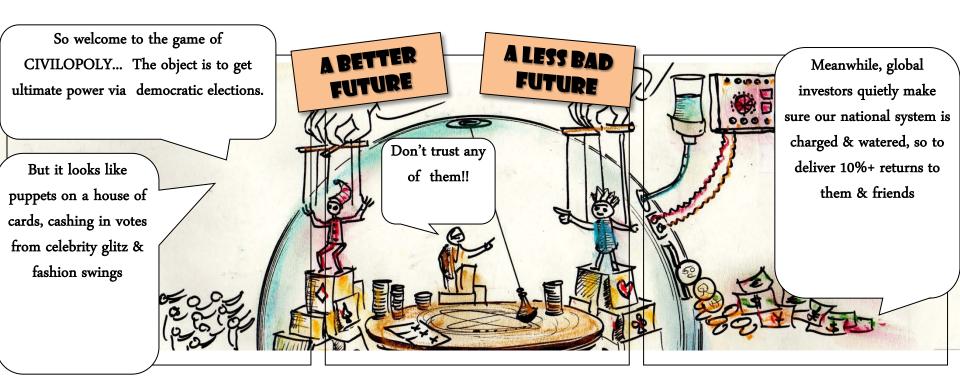
	Futures dimension	Stakeholder dimension	Policy dimension
EU research projects	Various: methodology development: technical & modelling	To be identified	EU / MS policy focus
EU Policy Roadmaps	Normative policy goal focus	EU civil society	EU / MS policy focus
EU agency / sectoral thematic	Technical & modelling focus	'story & simulation' approach	Agency policy focus
EU civil society programmes	Various	Active members / stakeholder links	Policy lobby focus

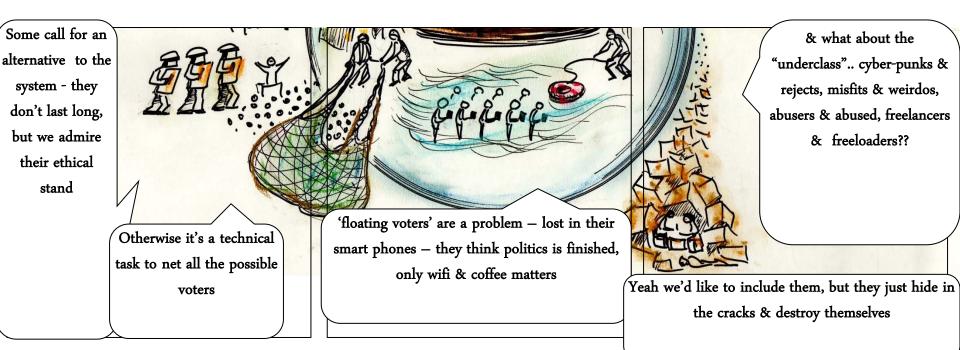
Urban foresight types: national / local

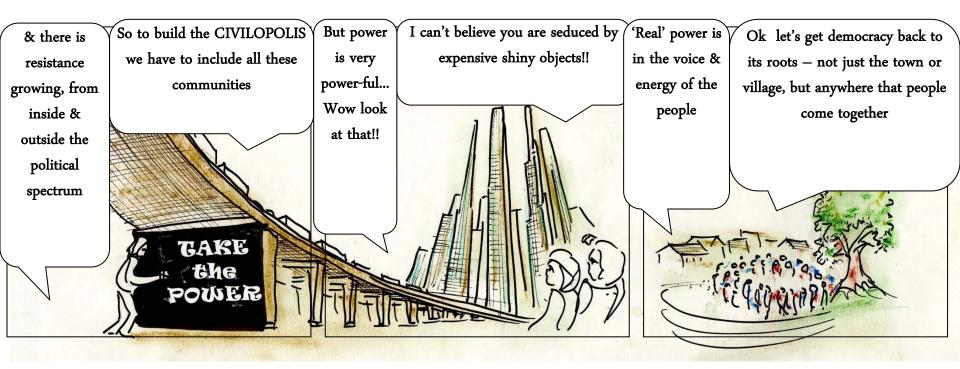
	Futures dimension	Stakeholder dimension	Policy dimension
National foresight examples	Various: methodology development: technical & modelling	National stakeholders	Policy innovation approach
National research programmes:	Various: methodology development: technical & modelling	National stakeholders	Policy innovation approach
National / territorial level	normative / technical	National stakeholders	Policy lobby focus
Local / city examples	Normative / technical	Local stakeholders	Policy lobby focus



After a while I We worked with G-TEC and the we kept the symbols of Greetings I'm Aisha. I grew We worked for positive change, got to be mayor, others, thinking that any system would democratic politics, up in an African township. but instead there was more then a UN be better than this chaos while the real business Things were rough, but there terror & instability delegate shifted to elsewhere was hope in the streets





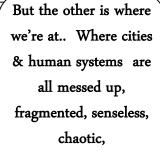


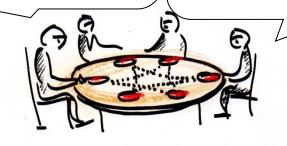
Synergistics 101: beyond sustainability

But there's new things.. So to get beyond Well they've been But it's not in a straight We see the Earth the impasse of working on that one line, it's evolutionary. To hanging in space. We "sustain-ability", we for 3000 years. live in 'sustainable cities', know we have complex need to look at humans have to learn & talk brains with multiple how humans really together. It's not a technical intelligences work fix or even a 'plan' it's about community it's about aspirations, There are so most of us are confused like a beautiful garden many directions & need a crowd to seen through a & levels to walk follow doorway on Like a changing labyrinth so we need a map

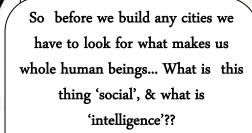
So there's two different tracks here. One is about 'creative synergy & social intelligence'

Ok so we all look for patterns of collaboration, & learn how to do it better





& chaos isn't just 'out there' but 'in here' Look at this social media thing — who can say where it's going?



Then we can start again with some building blocks

