

Project #Circularity / Project #Complexity, Policy Paper §6: Framework for ad-hoc Experimentation Missions aimed at Circularity in Urban Habitats



Framework for ad-hoc Experimentation Missions aimed at Circularity in Urban
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The following paper would conceptualize the circular economy missions as externalization of EU's domestic order, as well as an attempt to create decentralized governance of trade flows for solving unsustainable telecouplings, for sustainability communication, countering carbon leakage, seeking justice along supply chains and solving sovereign debt unsustainability through offsetting it for investments in natural capital.

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Experimentation framework



Decentralized, polyarchic experiments would seek indicators and explore the relationship between:

- City expansions and Emission certificates, peri-Urbanism as a way of dealing with the past
- Creating Urban Forests and Vertical Gardens as a way to internalize global debt
- Recycling Electric Cars and the Usage of Batteries for Low-carbon urban transitions
- Open method of coordination, liquid democracy and block chain contracts
- Externalization of domestic legal and policy orders, fiscal governance of debt and unsustainability
- Externalizing good governance and anti-corruption in resource governance schemes (fossil and non-fossil), food sovereignty and virtual water as a foundation of a healthy society
- Reflexive learning through a network of foundations for policy expertise

Circular Economy Missions by now

The global neoliberal take (resources) – make (products) – dispose (waste) paradigm has brought unprecedented levels of overconsumption and damage to the ecological stability of the earth that includes negative repercussions on the overall liveability of the planet. Waste enters our bodies through marine litter or the usage of plastics in drinking water, through contaminated soil into our food, as well as through the air we breathe in, as we oftentimes have to incinerate it to create energy.

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The European Union has projected itself as a multi-faceted, multi-level, interdisciplinary policy-making machinery that engages in hybrid multilateral actions, one of the most peculiar ones is the Circular Economy Missions that already took place in Chile, China, Colombia, South Africa. In September 2017, a further one will be taking place in New Delhi, India. Besides adjusting global trade in agricultural goods imported from one place to be used elsewhere for feedstock or upscaling without considering the negative effects on the environment, these missions are aiming to promote and facilitate trade in sustainable goods, foster circular and sustainable enterprises and provide a forum for sharing and upscaling solutions.



Thus, albeit academically, the circular economy has been premised within the de-growth paradigm, in reality the missions aim to foster economic growth based on green goods and sustainable energy. Thus, with US and China positioning themselves as the world's largest producers of electrified cars and storage batteries and possibly engaging in trade wars, the EU is trying to capitalize on the proliferation of its trade regime through a network of sustainable enterprises and initiatives.

From a governance perspective, besides this form of a region-to-country cooperation, one of the best ways to foster further networks would be the expansion of the already existing city networks (ICLEI, Covenant of Mayors, Committee of Regions), which could function as a stepping stone towards practice and expertise sharing, e.g. via a Labs Method that reduces the scale of Circular Economy Missions, in view of multiplication of the efforts for inclusive planning for circularity.

What would a circular city entail though?



Towards Circular Urban Habitats: Initial Thoughts

Cities are a juncture of human activity, material exchanges, capital accumulation and produce a number of outputs. Their most essential parts are road and railway infrastructure, housing, small to medium sized service spots, manufacturing and industry.

Information and guidance on existing rules are an integral part of communicating the functioning of a circular city. These can take up the form of conceptual graphics explaining the flows of resources, commodity costs, as well as opportunities for re-usage of resources.

The usage of land in a city is essential to creating a functional, liveable and stimulating environment that improves living conditions, material efficiency and creativity for establishing new ventures. Land could take the form of ecologically sustainable green spaces that serve as an example of urban gardening that improves food security, electrification landmarks, such as photovoltaic installations that store power for mobile phones and electric bikes, large scale depots for end-of-life interior, clothing and other material belongings that are transformed into repair and upscale facilities, where people create furniture, electronic equipment or engage in crafts and arts, etc.

Due to the overt production of plastics with limited use in most world cities and their relative small size, large scale usage of plastics, such as their compression for the creation of flat and durable pavement, which can be used for paving tertiary and rural routes at a limited price has prevailed in the circularity approaches. The sequestration

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of different land usages and the protection of coastal waters and estuaries against climate induced force majeure is a further potential usage of wastes.

Excessive food waste could be dumped in sites at critical junctions of the city, where there are plentiful of restaurants and working spaces, and be collected daily to create nutritious compost for the gradual reforestation that lead to the creation of green belts around the city limits, which also serve as natural bio-habitats, as well as open space sports and leisure centres. On the other side of the problematic, the increasing pressures on food insecurity mean that peri-urban and urban farming of food in cities could foster the return to traditional livelihoods, while reducing carbon pressure.

Farming in the developing world could benefit from regenerative agriculture practices, such as crop rotation, usage of the shared economy to foster the wider use of technical capital, such as plough machinery, as well as ICT tools that enable knowledge sharing and facilitate supply chains via mobile phone apps, as well as optimization of the care for agriculture through sensors that sense change in the soil, the weather and guide robotized solutions based on e.g. drones. Naturally, all these should be part of the leasing society, which fosters continuous repairs for the provision of monthly installments, while the product ownership remains in the hands of the producer.

Polyarchic Experimentation

While the missions could serve as tools to identify existing production capacities and potential needs for sustainable goods, the city networks could further enhance these by regionalizing the approach and making it easier for certain areas to specialize, while taking note of the existing knowledge base and human capital. Naturally, the

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deliberation of a rich and inclusive version of the circularity paradigm, presented together with cost-efficient scalable examples must be combined with inclusive rationalities aimed at informing policy makers via co-production of futures that is sensitive to multi-level hierarchies and socio-natural scales, takes account of the maximizing impact of venues and allows for epistemic governance of stakeholders networks that lets them reorganize in view of redefining and utilizing value chains.

