SOCIAL TRANSITION ROADMAP

Building inclusive communities by reconnecting citizens to resources at the local level

The industrial age profoundly shaped how societies interact with resources such as minerals, fuels, food, construction materials or water. Industrial growth relied heavily on the over-consumption of such resources, thereby often causing significant environmental damages. At the same time, industrial growth lifted millions of people out of poverty and provided a growing urban population with employment opportunities and increased access to consumer goods and services.

Deindustrialization, in turn, has had a significant impact on cities that relied on industrial growth for their overall social development. The Alliance cities have recognized the challenge of reorienting their economic model in a way that benefits both people and the environment.

The potential synergies between environmental concerns and social considerations are particularly visible when it comes to resource consumption at the local level. This roadmap therefore looks at how Alliance cities implemented strategies that changed the way resources are consumed and managed in order to protect the environment and benefit the local population. The roadmap explores the question of access to sustainable resources, awareness of the impacts linked to everyday consumption and employment opportunities generated by resource management at the local level.

Each initiative outlined in this roadmap delivers tangible benefits for local communities and especially for vulnerable social groups. These initiatives also seek to reconnect local economies with the environment during production, consumption and disposal to ensure negative impacts are minimized. In that way, they demonstrate that environmental, social and economic concerns can be mutually reinforcing when cities are intentional about designing projects that play on these synergies.

PATHWAYS



LOCAL PRODUCTION

Incentivize the local production of sustainable resources and enabling equitable access



COLLABORATIVE CONSUMPTION

Support local collaborative consumption initiatives that stimulate a sense of place



RESOURCEFUL JOBS

Use untapped resources to create job and training opportunities locally





One of the avenues industrial legacy cities can use to ensure resources are managed and accessed in an equitable and sustainable manner is to localize their production. Producing locally not only uncovers the direct impacts of production by making them more visible and traceable but also creates levers to redesign how resources are distributed spatially. This is especially relevant in the context of industrial legacy cities, where the lack of geographic access to sustainable resources is often a result of the spatial inequalities brought about by deindustrialization.

Along with geographic considerations, financial and cultural barriers also prevent an equitable access to locally produced sustainable resources. Creating favorable market conditions for local producers to thrive and designing financial incentives for consumers to buy local are often needed to ensure financial difficulties don't impair the local production of sustainable resources. Finally, a lack of awareness on the positive environmental, social and economic benefits of local production may deter consumers from favoring local options.

To better understand how industrial legacy cities can incentivize the local production of sustainable resources and enable equitable access, this chapter looks at strategies to address the challenge of food deserts. These urban areas, where residents have limited access to affordable and nutritious food, are often located in former industrialized parts of the city, making them a prime illustration of the impacts of legacy infrastructures and urban planning on resources access. The complementary strategies Alliance cities and districts have pursued help to incentivize the local production of healthy and affordable foods by addressing the geographical, financial and cultural obstacles that disconnect residents from local, sustainable food products.

City of Pittsburgh: Turning vacant lots into productive assets



Pittsburgh's deindustrialization left the city with 27,000 vacant lots. While the city has begun to grow in population again and is taking steps to redevelop neighborhoods of very low market demand, a significant number of properties are likely to remain vacant for the foreseeable future. These vacant lots can compromise quality of life for residents. Meanwhile, their maintenance is estimated to cost Pittsburgh \$3-4 million per year.

Urban farm managed by the United Somali Bantu of Greater Pittsburgh. © City of Pittsburgh Launched in 2015, Pittsburgh's Vacant Lot Toolkit is an implementation initiative of the city's Open Space Plan. Designed with community stakeholders, open space specialists and the finance, public works and sustainability departments of the city, the toolkit includes a streamlined process to temporarily and permanently reuse vacant lots for food, flower, or rain gardens. It is accompanied by numerous online resources and trainings on key considerations such as site selection, planning, budget and maintenance.

Through the Adopt-a-Lot program, the city has been supporting local projects in more direct ways, for instance by providing initial labor and maintenance for larger-scale projects - such as the redevelopment of a long abandoned baseball field into a community farm by the non-profit organization Grow Pittsburgh. The department of city planning has also been working with the forestry department to collect discarded wood chips and donate them to community groups to help enrich the soils of the adopted lots.

Another project developed under the Adopt-a-Lot program is a market stand managed by a Somali Bantu refugee community. Many Somali refugees living in Pittsburgh are former farmers and the transition to the "Steel City" has been difficult. Most of them reside in public housing complexes and face poverty. Thanks to the Adopt-a-Lot program, a community of Bantu is now farming on 15 lots (equivalent to three quarters of an acre) and is able to sell their produce in Perry South neighborhood, one of Pittsburgh's largest food deserts.

With over 130 vacant lots "adopted" to date, the program has been successful and helped to address the challenge of food deserts and provide livelihoods to disadvantaged communities. Key to its success is the ability of the Adopta-Lot program to constantly evolve and adapt to community needs.

City of Cincinnati: A token system for low-income households to access locally produced sustainable food

Cincinnati's Green Plan underlines the necessity to design food systems that can mitigate and adapt to climate change and ensure the long-term availability of food resources. One of its core strategies is to facilitate a shift to more local and plant-based diets. Yet for the 18.5%⁷ of Cincinnati residents who are food insecure, the price of local organic produce represents a major obstacle to developing more sustainable food consumption patterns.

At the Hamilton county level, 62% of families are considered income-eligible for federal Supplemental Nutrition Assistance Program (SNAP). The Produce Perks Program was developed to build on SNAP and ensure that vulnerable groups in the Hamilton County have access to sustainable and healthy foods. This program allows residents on SNAP to earn a one-dollar token for fruits and vegetables for each dollar they spend on produce, allowing up to an additional ten dollars to be spent on these food items daily.

The program is not limited to grocery stores and allows for Produce Perks tokens to be spent at participating farmers markets and Community Supported Agriculture programs. This creates a stronger market for local food producers to sell their products, which is especially important in food deserts where the additional revenue from nutrition incentives may allow a farmer's market to operate.

^{7.} City of Cincinnati (2018) 2018 Green Cincinnati Plan. Retrieved March 2019 from https://www.cincinnati-oh.gov/oes/assets/File/2018%20Green%20Cincinnati%20Plan(1).pdf

Produce Perks was developed through a combination of federal and philanthropic funding and was highly beneficial to local farmers. 73.9% of participating farmers reported increased revenue after joining the program.

Produce Perks has been growing steadily since its launch in 2014 and the City of Cincinnati is working with local food organizations to expand the number of food distribution points throughout the city by 25% each year for the next five years. Beyond keeping money in the local economy and developing green jobs in the food sector, the program is providing tangible health and monetary benefits to the county's most vulnerable residents and helping the City of Cincinnati achieve its goal to ensure convenient access to healthy, affordable foods to 100% of the citizens.





The Produce Perks Program allows residents on SNAP to earn a one-dollar token for each dollar they spend on fruits and vegetables. © Produce Perks Midwest



COLLABORATIVE CONSUMPTION

Collaborative consumption has gained momentum in recent years as a way to save people money while cultivating social links. Collaborative consumption can refer to initiatives that extend a product's life span through communitybased repairs and reuse or ones that pool resources in a common platform, allowing for people to lease them instead of owning them. In both cases, they have the potential to nurture a more cohesive society.

Repair workshops are examples of such initiatives. "Dare to Repair" workshops are flourishing in many industrial legacy cities and districts. They are community events, where individuals can bring broken items (lamps, vacuums, toys, etc.) to repair cafes and have expert volunteer "fixers" try to repair the item alongside them for free.

The City of Dortmund hosts yearly the "Trash Up!" festival and other collaborative consumption events aiming at extending the life span of products and shifting individual consumption to more sustainable patterns. These events go beyond raising awareness and aim at empowering residents to think differently about how they interact with materials in their everyday life.

Collaborative consumption spans a wide variety of initiatives. When driven by local communities and supported by local authorities, these low cost programs have the potential to reconcile industrial legacies with a new economy that builds on cohesion and collaboration. Industrial legacy cities can then build on this community momentum to support effective placemaking and the codesign of neighborhood revitalization plans.

City of Buffalo: From sharing tools to constructing together

Bordering the University of Buffalo's South Campus in the north of the city, the University Heights is a dynamic neighborhood that has seen incredible changes over its lifetime. The highly walkable, diverse, and affordable neighborhood has begun to experience the neglect and disinvestment common to older urban neighborhoods in industrial legacy cities. Low-to-moderate households and students renting properties in the neighborhood often face improper housing conditions and absentee landlordism. In 2011, the experience of a local student renting from a negligent landlord spurred the creation of the University Heights Tool Library. This non-profit program was set up to lend tools out to community members to help them maintain and fix-up their homes and gardens - a time investment that some tenants were then able to financially deduct from their rent.

The Tool Library received a majority of its seed funding through the City of Buffalo's Community Development Block Grant. The city has been a sustaining sponsor of the initiative ever since while revenue continues to be generated through membership dues. In addition to having loaned out over 17,000 tools since 2015, the Tool Library has been evolving from a physical space for individuals to rent tools to a social space, the Tool Library Community Laboratory (CoLab).

From planting trees and building community gardens, to boarding up buildings and painting public art, the CoLab sponsors and facilitates community initiatives that enhance the quality of life within the University Heights. The CoLab works with residents, property owners, block clubs, university staff and students, business owners and elected officials in order to coordinate and develop resources and responsibilities within the community. As an example, the CoLab was instrumental in bringing key stakeholders together to help turn an underutilized rail corridor into a multi-use recreational green space as part of a Rails to Trails project.



Buffalo's "34 & More" initiative, which aims at increasing the city's recycling rate and reducing waste, regularly engages with the CoLab. The facility hosts various events in support of the initiative, including Dare to Repair Cafes throughout the year which are sponsored by the city and advertised by the Mayor of Buffalo himself.

Started as a collaborative consumption initiative, the Tool Library has become a lever of change in University Heights. It is also a platform for the city to support community-based initiatives and to scale its own projects related to resources consumption.

North Buffalo Rails to Trails. © University Heights Collaborative



RESOURCEFUL JOBS

From the rainwater that enters the sewage system to the single-use minerals and metals used in the construction industry, a profusion of valuable resources ends up being wasted at the local level. In industrial legacy cities as in other localities, vulnerable communities are adversely impacted by the linear management of resources, in which waste is part of production processes and ultimately ends up being discarded in ecosystems, landfills or burnt. Oftentimes, waste incineration takes place close to poorer neighborhoods, which already house a disproportionate number of other polluting facilities and legacies from the city's industrial past.

Letting valuable resources go to waste is also a missed opportunity to provide people with much needed job and training opportunities. In legacy cities, unemployment is not necessarily attributable primarily to a lack of jobs. Rather, unemployment often stems from a set of factors combing higher rates of poverty and lower levels of educational attainment than in other cities.

By rethinking how resources are managed locally, cities can support employment opportunities for the most disadvantaged groups while taking full responsibility over the waste and pollution they produce. Furthermore, each step a community takes towards reuse and recycling means more private expenditure on supplies and services, and more money circulating in the local economy through spending and tax payments. Finally, managing resources in a more regenerative manner is also a way to revitalize neglected neighborhoods and ecosystems, as demonstrated by the City of Essen's "New Ways to the Water" program. The experiences of Baltimore and Essen show that environmental, social and economic benefits are maximized when the city identifies high potential resources flows locally and deliberately targets most vulnerable groups when designing programs to better manage these flows.

City of Baltimore: Creating wealth from waste



The Waste-To-Wealth Program aims to grow businesses in Baltimore while reducing the city's overall waste. By supporting businesses that are making products out of valuable materials captured from the waste stream, the city aims at creating jobs to support the expected growth in population. The program is designed to achieve this by targeting three high-value waste streams: Construction and demolition waste, food waste and wood waste. Camp Small, Baltimore's collection facility for removed and downed trees on public land. © City of Baltimore





Construction and demolition materials account for more than 40% of Baltimore's solid waste. In order to create entry-level construction jobs and reduce demolition waste, Baltimore City Housing and the Office of Sustainability have teamed up to make deconstruction a component of housing demolition contracts to salvage and recycle building materials from homes slated for demolition and sell reprocessed materials. The city has been working with two nonprofits, Details Deconstruction and Brick+Board, which hire people with criminal records or facing difficulties finding employment and prepare them for jobs in the construction industry. Since 2014, there have been about 200 deconstructions in the city where over 185 individuals have been employed and more than 1.2 million bricks and 425,000 board feet of lumber have been salvaged.

Other Waste-to-Wealth projects include a variety of community composting activities, such as the Filbert Street Garden, a space dedicated to promoting urban agriculture and providing educational opportunities in Curtis Bay, a district with a legacy of environmental contamination and high unemployment. In 2016, the Filbert Street Garden joined forced with the Institute for Local Self-Reliance and the Chesapeake Center for Youth Development to create the Baltimore Compost Collective, a food scrap pickup and composting service. This composting program provides employment and mentoring to local youths year round.

Finally, Baltimore's City Recreation and Parks' Forestry Division and the Office of Sustainability started the Camp Small Zero Waste Initiative in 2016. This initiative sorts and distributes the variety of wood products at Camp Small - the local collection facility for removed and downed trees on public land. Repurposed wood is now used on construction sites, sold to local businesses, incorporated in a new recreational center as well as used in soil remediation activities.

City of Essen: New Ways to the Water and to increase employment



Flowing through the Ruhr area in Germany's North Rhine-Westphalia, the Emscher River carries the legacy of the many industries that used to populate its shores. Long considered as Germany's dirtiest river, the Emscher served as an open sewer for industrial and household wastewater and its groundwater levels were severely impacted by extensive mining. Since the early 1990s, efforts to restore the Emscher to its natural state have been making headway,

Rainwater catchment systems in Segeroth Park, Essen. © City of Essen with the Emschergenossenschaft, Germany's biggest public water board located in Essen, investing massively in remodeling the River and building decentralized wastewater treatment plants.

In 2005, the Emschergenossenschaft, Essen and the 16 other cities neighboring the Emscher set the common goal to decouple 15% of storm water runoff from the sewage system before 2020. The water is then redirected to catchment areas of the river in order to restore groundwater levels.

The City of Essen built on this regional momentum to design the "New Ways to the Water" program, which aims at developing green space and renaturing the Emscher and its tributaries. At the same time, a core component of the program is to provide employment opportunities to the long-term unemployed in the city, increasing the value of real estate and triggering investments in areas that have suffered heavily from deindustrialization. Storm water collection projects have been implemented on the rooftops of the Assmanweg residential quarter as well as around different municipal facilities in the northern part of the city, where deindustrialization took its strongest toll. Another dimension of the program is the creation of new water routes between the Ruhr River in the south of the City and the Emscher in the North to ensure inhabitants have access to a green space within a 500 meters radius. These new water routes are depicted in green in the map below.



© City of Essen

By preventing a key resource from being wasted, the city was able to revitalize an entire neighborhood, create direct and indirect jobs and guarantee access to a healthy and green living environment to its residents.

"New Ways to the Water" was implemented through public-private partnerships between the City of Essen, the Emschergenossenschaft, local job and training centers and housing companies. Municipal and regional subsidies were leveraged to create employment and offer trainings.

In the long-term, the program has demonstrated its ability to balance upfront costs by triggering local investments and down-scaling the need for future sewer systems while at the same time creating jobs and training opportunities for residents facing barriers to employment.

