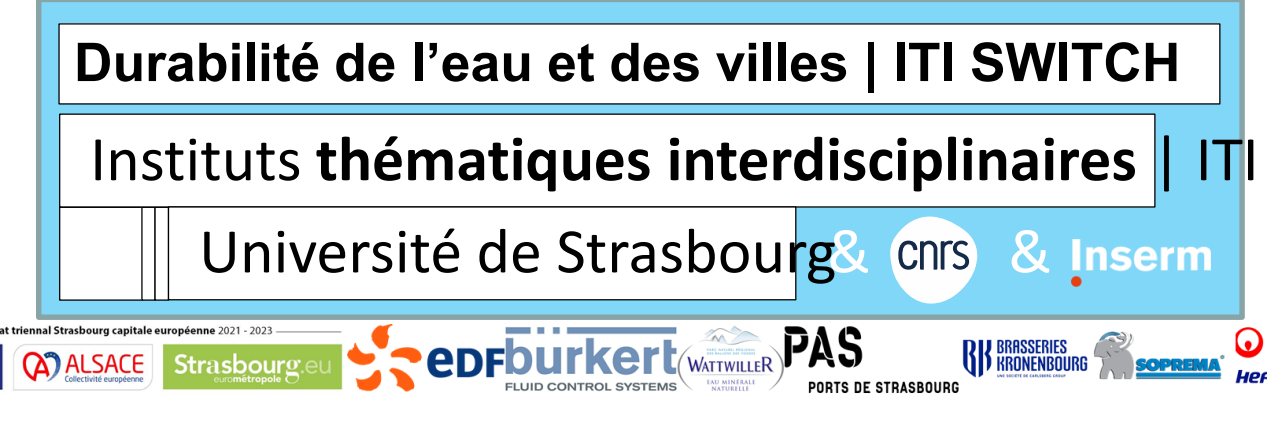


River Culture in the City: how wild can/should we get?

La culture fluviale dans la ville : quel 'degré de sauvagitude' ?

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NATURAL DYNAMICS AND URBAN HARDENING

Urban design aims to create pleasant, efficient, and long-term, low-risk life conditions for citizens. Nature is wild and dynamic, it undergoes a permanent turnover of matter and a patchy re-organization of space. Urbanism has homogenized wild space and stilled rhythmic dynamics, and thereby changed the conditions for many life-supporting ecosystem functions within and outside cities.

To change this, wildness and wilderness need to be restored in cities. Balancing between human needs for safety and nature's needs for having dynamic space for, ecosystem functions, biodiversity, succession and evolution is a big challenge.



Historical defensive structures in City of Briançon: not much room left for functioning ecosystems. Photo: KM Wantzen



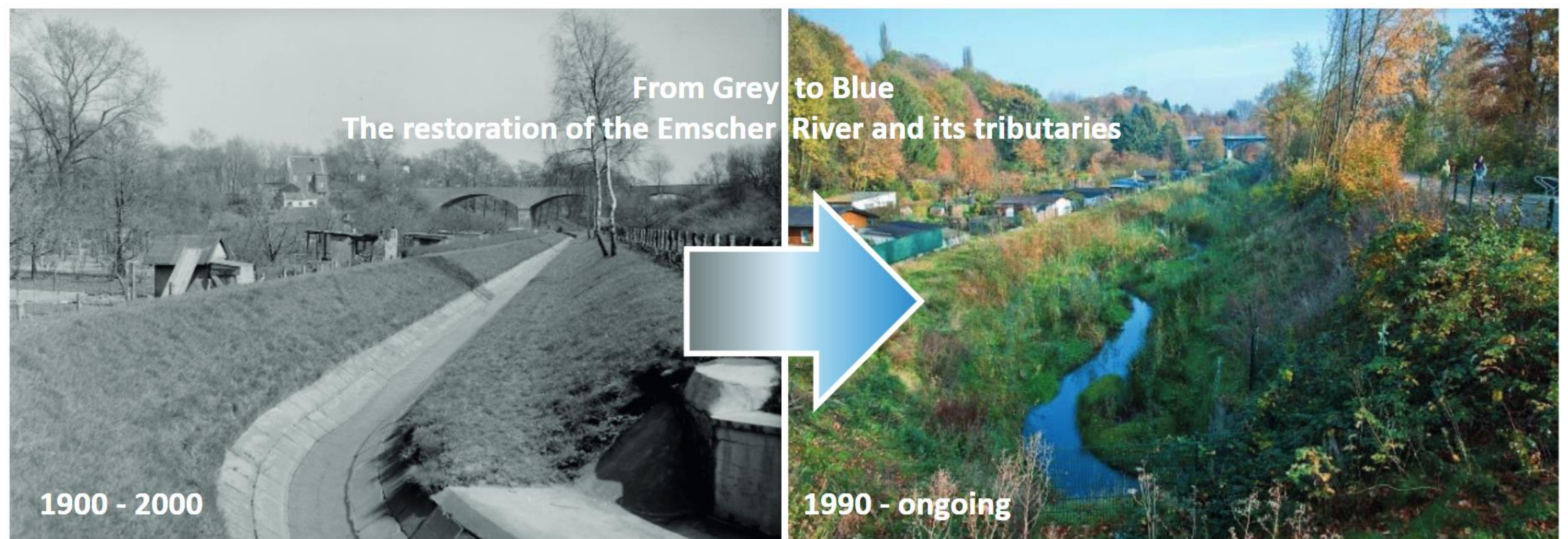
Gota fría Valencia Oct. 2024: 490 mm/3h, 95 dead: Foto: Manaura Quintero / DER SPIEGEL

CATHARSIS EFFECTS THROUGH CLIMATE CHANGE?

While most citizens are indolent or remain resilient against scientists' predictions about future life conditions, the current critical events (e.g., the frequently occurring extreme drought/heat/flood events, previously known as "millennial events") may have a cathartic effect and set the stage for a new value system that is better adapted to nature. Real estate prices fall in urban high-risk zones where Re-insurers refuse to cover damage. The big question is whether this change of mind-sets will come early enough to prepare cities adequately to the bio-climate-water crisis.

POSITIVE EXAMPLES: CHANGE IS POSSIBLE

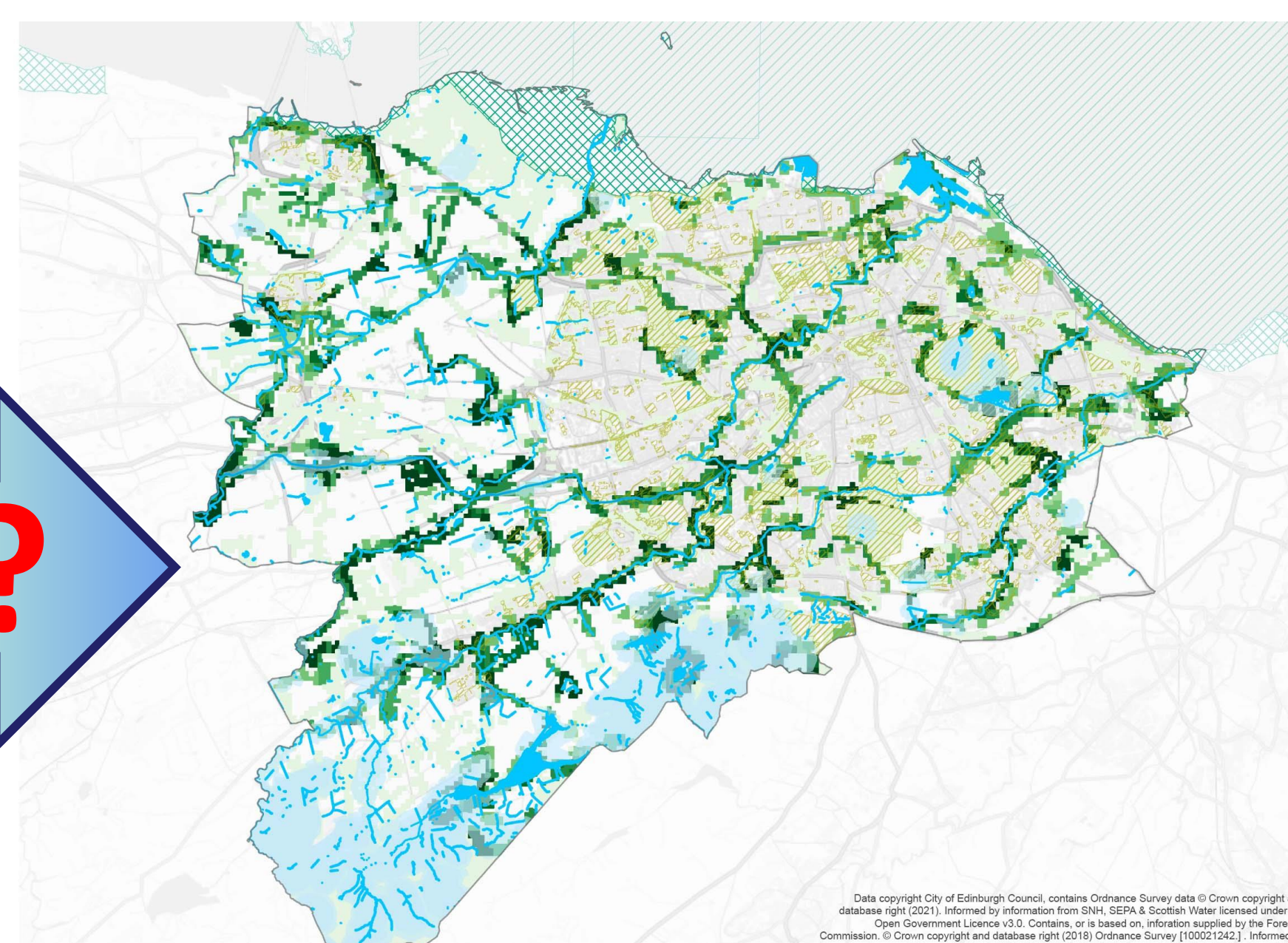
In many places of the world, people have begun to change urban design according to nature's (and their own!) needs, e.g., by stream daylighting, designing ecological riverfront and human-nature-encounter sites, de-novo creation of urban waterbodies, habitat restoration, transformation of roads/parking grounds into parks (e.g., Paris!) and the establishment of eco-social justice along and across the catchment. There are individual, local, examples. But is this sufficient?



The Ruhrgebiet used to be one of the most polluted and concrete-covered areas in Germany, which has currently been changed. Photo by the EmscherGenossenschaft, courtesy by N. Gerner
See this and further examples from Munich, Paris, and Venice in the River Culture Book (flashcode for free download below)



https://www.teflair.org/wp-content/uploads/2018/08/Destruction-of-Paris-during-implementation-of-the-Haussmann-plan - Image-credit-BnF.jpg



https://www.landscapeinstitute.org/blog/mapping-the-vision-for-a-beautiful-sustainable-city/

HOW MUCH "ECO-HAUSSMANN" DO WE NEED (... AND CAN WE COMMUNICATE)?

In the 19th century, Baron de Haussmann has drastically changed the the City of Paris (for various reasons...). Today, climate change requires a similar structural re-design for many metropolises. This is an opportunity to restore blue-green networks in cities, establishing socio-ecological synergies. Our current axiology gives a higher value to built heritage over the requirements of people and nature. How to change the citizens' minds?

FURTHER READING:

- Cao, Y., Chen, W.Y. & Wantzen, K.M. (2023). *Human-river relationships in Chinese cities: evidence from highly educated water museum visitors*. Urban Ecosystems. <https://doi.org/10.1007/s11252-023-01441-w>.
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- Wantzen, K. M. (2022). *River culture: How socio-ecological linkages to the rhythm of the waters develop, how they are lost, and how they can be regained*. The Geographical Journal, 00, 1–16. DOI: <https://doi.org/10.1111/geoj.12476>.
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- Wantzen, K. M., Piednoir, T., Tan, C., Cao, Y., Vazha, A., Kari, G. G., Lagerström, M., Gerner, N., Sommerhäuser, M. (2022) *Back to the surface – a review on daylighting urban streams in Europe and Asia*, Frontiers in Ecology and Evolution <https://doi.org/10.3389/fevo.2022.838794>
- Zingraff-Hamed, A., Bala, R., Bonnefond, M., Bonthoux, S., Cao, Y., Greulich, S., Legay, N., Robert, A., José Serrano, J., Tharme, R., Vazha, A. and Wantzen, K.M. (2021). *Human-River Encounter Sites: looking for harmony between humans and nature in cities*. Sustainability, 13, 2864 <https://doi.org/10.3390/su13052864>

MOOC: "Des rivières et des villes" (Rivers and cities), with contributions i.a. by K.M. Wantzen and A. Zingraff-Hamed): <https://h2olyon.universite-lyon.fr/sitefrancais/formations/mooc-e-learning-des-rivieres-et-des-villes-195483.kjsp>

River Culture Book
(free download)



Global Questionnaire:
How would you like your river?

