

Oslo, 27/9 2021

The Q&As from the webinar

Scaling and optimising nature-based solutions in resilient cities

convened by PEER, ICLEI Europe and EurAqua on September 27, 2021

This overview covers those questions not addressed during the oral part of the webinar.

- To Michael: Greetings from Madrid. Many thanks for the presentation. What is the air quality model implemented? What was the spatial resolution achieved? Did the model report any prejudicial effect of the vegetation on air quality (by reducing wind flows)? From Pedro Muradás, mum@idom.com
 - Good questions thank you. Regarding the second one this is a question best posed to specialist air quality colleagues. Stefan Reis at UKCEH Edinburgh can help (srei@ceh.ac.uk). I think bringing knowledge from our assessment of urban heat island mitigation together with the air quality modelling can possibly also aid understanding in terms of wind flow effects
 - Thanks Michael, we are working on the same research lines and we had assessed the UHI in several cities. Let's keep in touch!
- To Michael: How do you balance different impacts such as temperature against access? From John Rose, johnerose@mac.com
 - As mentioned, I think [it is] a valuable subject for discussion. My final slide only really covered the environmental quality aspect. The link to ecosystem services obviously involves a wider set of considerations. More specifically I think this involves estimating for example avoided energy costs (e.g. for air conditioning) and comparing this with for example valuing the health/wellbeing benefits gained from improved recreational opportunity.
- To Michael: Hi Mike, thanks for your very clear presentation and beautiful slides. Do you manage the question of wastewaters?" From Didier Orange, didier.orange@ird.fr
 - Thankyou Didier. Wastewater is an issue primarily accounted for in the process-based water quality model which we typically use (QUESTOR). This typically becomes influential further downstream in a river system where rivers represent mix of urban diffuse pollution (and NBS moderation) with effluent discharges. With such models we can assess the downstream impact of NBS in the context of other pollution sources. We also want to develop simpler methods of assessment to include wastewater influences
- To Michael and Daniela: Do you work with some architects? What is your links with city managers? From Didier Orange didier.orange@ird.fr
 - Michael: This would be very interesting to pursue but we haven't made links yet

- Daniela: Hi Didier, in our NBS projects we work with architects and landscape architects, especially when the NBS is directly related to buildings (green roofs, green walls).
- Middle East is examining NBS as part of their decarbonisation approaches. This is based on existing climatic and biological aspects particularly water resources and biodiversity
- To Michael: Thanks. I did not know QUESTOR. I will go to see. Behind the modeling approach and the design of risk map, did you implement some solutions or trials in few selected and studied local zones? Didier Orange, didier.orange@ird.fr
 - We haven't done this within the DeSCIPHER project. However, I understand some co-authors have been involved with trials in other projects.
 - Thanks Mike, very interesting and hoping to get other opportunities to exchange views.
 - With a great pleasure, I invite you to submit a paper to a Special Issue in Water J. to defend your ideas on NBS advantages to address so many external and internal processes to regreen our cities.
https://www.mdpi.com/journal/water/special_issues/Green_Production_Cities
- To Daniela: Where can we find a study on economic benefits and sustainability business models from NbS? From: Pasquale CAPEZZUTO, pasquale.capezzuto@alice.it
 - Dear Pasquale, thanks for your question. The different projects have been realising studies on financing, governance and business models for NBS. I can mention some here:
 - <https://connectingnature.eu/financing-and-business-models>
 - <https://connectingnature.eu/guidebooks>
 - https://clevercities.eu/fileadmin/user_upload/Resources/D1.1_Theme_2_Green_market_opportunities_EBN_12.2018.pdf
 - https://clevercities.eu/fileadmin/user_upload/Resources/D1.1_Theme_3_finance_urban_regeneration_EBN_12.2018.pdf
 - https://naturvation.eu/sites/default/files/results/content/files/business_model_catalogue.pdf
 - http://growgreenproject.eu/wp-content/uploads/2019/03/Working-Documents_Financing-NBS-in-cities.pdf
 - And I encourage all to join the discussion on the nature-based economy. The consultation for the draft paper is still open:
<https://networknature.eu/Nature-Based-Economy-White-Paper-Consultation>
- To Daniela: Do the various projects consider a financial payback perspective vs alternative non nature based solutions? From John Rose, johnrose@mac.com
 - You mean comparative studies between NBS versus grey infrastructure. Yes, there are comparative studies. The Gorla Maggiore project has for example done this. See more info here: <https://www.regreen-project.eu/wp-content/uploads/GORLA-MAGGIORE-WATER-PARK.pdf>
- To Christina and Daniela: Do you think it is necessary to promote a standard for NBS (like the IUCN's one..) and establish a set of (impact) indicators at a national/European scale, towards an adequate scaling up process (meeting the 2030 Biodiversity strategy objectives)? From Pedro Muradás, pmum@idom.com
 - Daniela: Yes, Pedro, I think this is crucial. The Green City Accord has started putting up minimal indicators for cities to achieve related to urban nature and biodiversity

(and also related to other topics). So, this is more on the practical side. But I also would like to mention the NBS indicator handbook that has been published this year (more than 180 researchers contributed to it):

https://ec.europa.eu/info/news/evaluating-impact-nature-based-solutions-handbook-practitioners-2021-may-06_en

- Still, there is a long road to create NBS standards at the European level. Also considering that there would be quite helpful for decision makers to be able to check out standardised processes.
- Christina: Thanks Daniela! I agree with you, still a long path to walk together... I learned about this publication you shared, it is a good beginning, maybe too "rich" to put in practice at a local (cities teams) level... Congratulatio for your work at ICLEI!
- To Daniela: Are the NBS strategies/models specific to Europe or could be duplicated else where like the Middle east? if yes how feasible is it and what are the channels or entities that could help in doing so? From: Sohaib ALHAJHUSSEIN, sohaib.b.sa@googlemail.com
 - Excellent question. For sure, in all countries we need to apply NBS, maybe more in Africa and Asia due to the demographic pressure and the current rapid development.