

Solution package 1:

Digital infrastructures and
ICT solutions

Working with the MCDA tool

Session Summary

This session focused on the Multi-Criteria Decision Analysis (MCDA) tool for PCEDs, facilitated by Justin Zarb (DKSR). Started with an introduction to the City Energy Analyst (CEA), which is used to generate options for the MCDA. Following the presentation, participants cities—Charleroi, Prague, Budapest, Munich, and Porto—discussed around three questions: why they would or wouldn't use CEA (or similar tools) for PCEDs, how they currently track budget and emissions during planning, and what tools or skills could enhance their effectiveness in reducing emissions.

Resources

Introductory presentation for MCDA by DKSR

Common Challenges

Tracking and reducing building-related emissions is challenging for cities due to lack of common, clearly defined targets, workflows and datasets to coordinate energy use and budgets effectively. Munich is piloting ClimateView to track city-wide emissions but does not track the projected emissions and costs of design projects as design and planning processes are subcontracted. Porto is piloting CitySim Pro which predicts outdoor thermal comfort in addition to energy and emissions. Budapest struggles with data availability and limited resources to update it. Prague emphasised the need for accurate reference values to integrate emissions tracking into their budgeting.

Cities could use tools such as CEA but high setup costs, interoperability concerns, lack of data, and the knowledge and skills to use the tools, are **common barriers**.

Main Takeaways

- A better managed information baseline, e.g., more IOT devices, better disclosure and use of Energy Performance Certificates (EPCs) and tools to track district- to city-wide emissions.
- Citizen tools: help citizens to act as independent agents by providing better information and to encourage contribution to energy databases.
- Systemic solutions: Higher CO2 prices, convincing industrial and commercial players to contribute, funding and sensibilisation initiatives.

Quote

"This CoP provided us with insights and the possibility of adopting the MCDA-CEA tool. This tool is trending worldwide but has some caveats especially when one is starting with it. We believe that this tool has potential beyond the ASCEND project and can result in value which will remain in the city after the project as a whole comes to its end."

-Marek Šmíd, Operátor ICT, Prague

