

OUTPUT FACT SHEET

Pilot actions

Version 3

Project index number and acronym	CE 1226 AWAIR
Output number and title	O.T2.1 - Pilot actions for mitigation and adaptation to SAPEs
Investment number and title (if applicable)	WP Investment n. 2 - Air quality monitoring system in Katowice
Responsible partner (PP name and number)	PP05 UMK, Katowice City Hall
Project website	https://www.interreg-central.eu/Content.Node/AWAIR/AWAIR.html
Delivery date	02.2021

Summary description of the pilot action (including investment, if applicable) explaining its experimental nature, demonstration character and transnational added value

The aim of the pilot action is to build an air quality monitoring system for the city of Katowice. The system consists of 127 sensors and 154 screens and a dedicated website. The system is designed to raise the residents awareness of the air quality in their surroundings and to show the distribution of pollutants in the city, which will allow for the development of more effective measures related to the reduction of pollutant emissions and indicate areas requiring special control by the Municipal Guard. The system was developed by an external contractor selected in the tender procedure. The construction of the system started in September 2018 and was completed a year later. The system is now fully operational.

The second part of the pilot action is smaller air quality monitoring system in selected schools in Katowice. The system consist of 9 measurement stations located in 3 selected buildings: school, preschool and nursery. The system is designed to measure pollutants inside buildings and develop new instructions how to manage during bad air quality inside and outside.

Please present what the pilot action is about by addressing the following guiding questions:

NUTS region(s) concerned by the pilot action (relevant NUTS level)

PL22A Katowicki (City of Katowice)

Investment costs (EUR), if applicable

Pilot action 1:

Total cost: 136 839,3 EUR

Project documentation: 8558,11 EUR

Sensor delivery, assembly and configuration: 74204,91 EUR

Screens delivery, assembly and configuration : 24122,86 EUR

Website and software documentation: 6775,17 EUR

Data gathering and visualization system: 17615,44 EUR

Concept for system integration with KISMIA system and services: 5562,77 EUR

Pilot action 2:

Measurement station delivery, assembly and configuration, project documentation: 28 107,65 EUR

Expected impact and benefits of the pilot action for the concerned territory and target groups and leverage of additional funds (if applicable)

The creation of the air quality monitoring system contributed to increasing the inhabitants awareness of the air quality in the region, city and its immediate surroundings. The system also supports the Municipal Guard, which can intensify activities in the most problematic areas of the city. Due to the creation of new information points in neighboring cities, is planned further development of the system to the entire metropolis.

The indoor air quality monitoring system can be used in every type of building especially with large groups of people from vulnerable groups. System can help improving air quality in buildings by f.e installing air purifiers or modernizing ventilation system.

Sustainability of the pilot action results and transferability to other territories and stakeholders

It is planned further expansion the system and information points in the form of screens with information on air quality throughout the metropolis. Due to the fact that the system is scalable and the city owns the copyrights to the software and source codes, it is possible to further develop the software with new functionalities. The system was also used for the ZONE project related to the inventory of heat sources in the Murcki district, where high measurements of PM10 concentration coincide with residential buildings with dominant coal-based boilers.

The second pilot action is under analysis what is the best way to improve air quality inside buildings. The results will define the best model to applicate in other public education buildings.

If applicable, contribution to/ compliance with:

- relevant regulatory requirements
- sustainable development - environmental effects. In case of risk of negative effects, mitigation measures introduced
- horizontal principles such as equal opportunities and non-discrimination

Both pilot action one and two are complied with the regulatory requirements in Poland for public procurement process. The installed devices meets all the technical requirements that were described in public procurement documentation.

The pilot actions have no negative environmental effects and no negative impacts on sustainable development.

Pilot actions do not apply for horizontal principles such as equal opportunities and non-discrimination

References to relevant deliverables (e.g. pilot action report, studies), investment factsheet and web-links

If applicable, additional documentation, pictures or images to be provided as annex

Most related deliverables are:

2.2.5 (DSS System) <https://www.interreg-central.eu/Content.Node/AWAIR/O.T.2.4-DSS-UMK-Final.pdf>

2.2.4 (forecasting system) <https://www.interreg-central.eu/Content.Node/AWAIR/O.T2.3-UMK-forecasting-Final.pdf>

2.2.6 assessment of effectiveness for M&A <https://www.interreg-central.eu/Content.Node/AWAIR/KATOWICE-operational-plans.pdf>

2.2.8 (joint pilot action in schools),

3.1.2, 3.1.3 trainings for stakeholders. <https://www.interreg-central.eu/Content.Node/AWAIR/Output-factsheet-OT3.3-Stakeh-UMK-final.pdf>

<https://www.interreg-central.eu/Content.Node/AWAIR/Output-factsheet-OT3.3-Admin-UMK-final.pdf>

Pictures: added below





