

Development of a real-time information and monitoring system to support the risk assessment of nanomaterials under REACH

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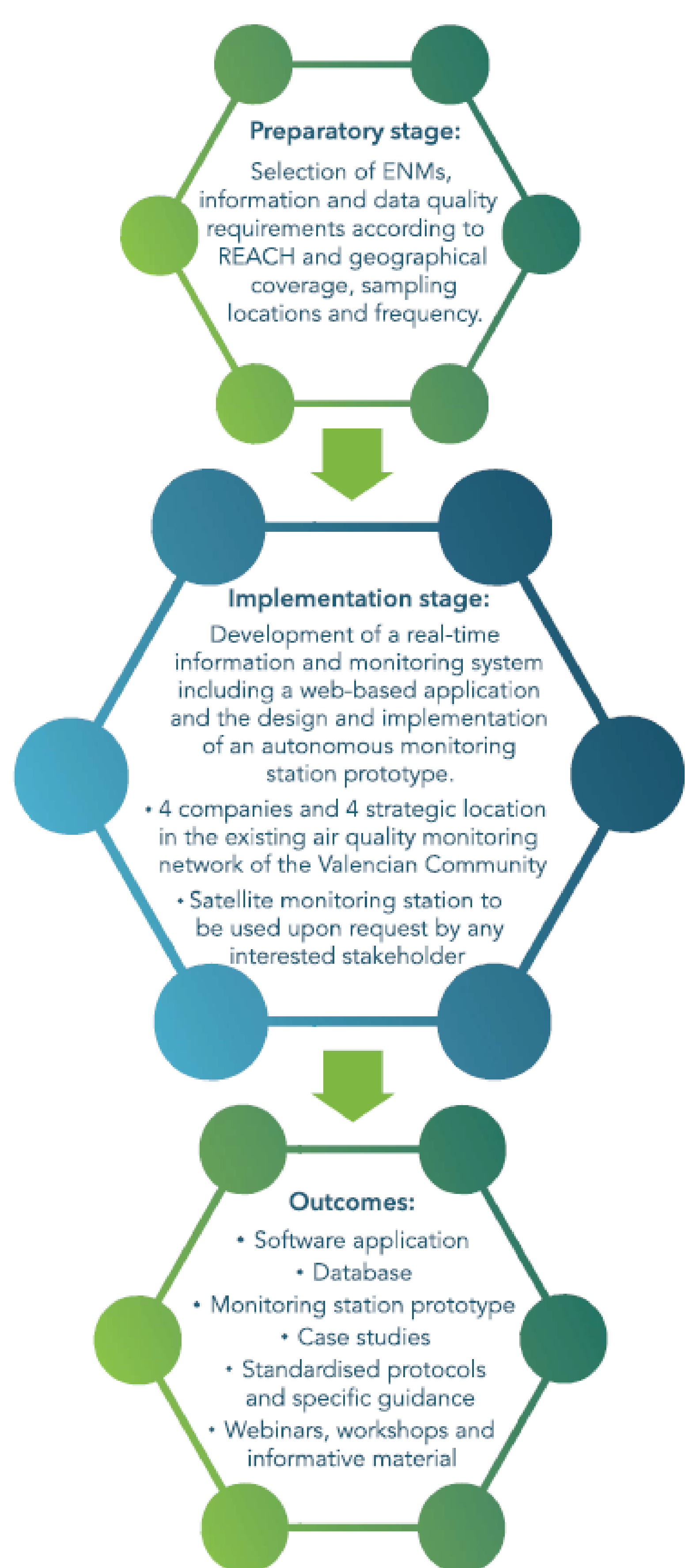
nanoMONITOR

By developing a **real-time information and monitoring system** NanoMonitor supports the risk assessment of nanomaterials under REACH with the aim of:

- improving the use of environmental monitoring data to support the implementation of REACH regulation
- promoting the protection of human health and the environment when dealing with engineered nanomaterials (ENMs).

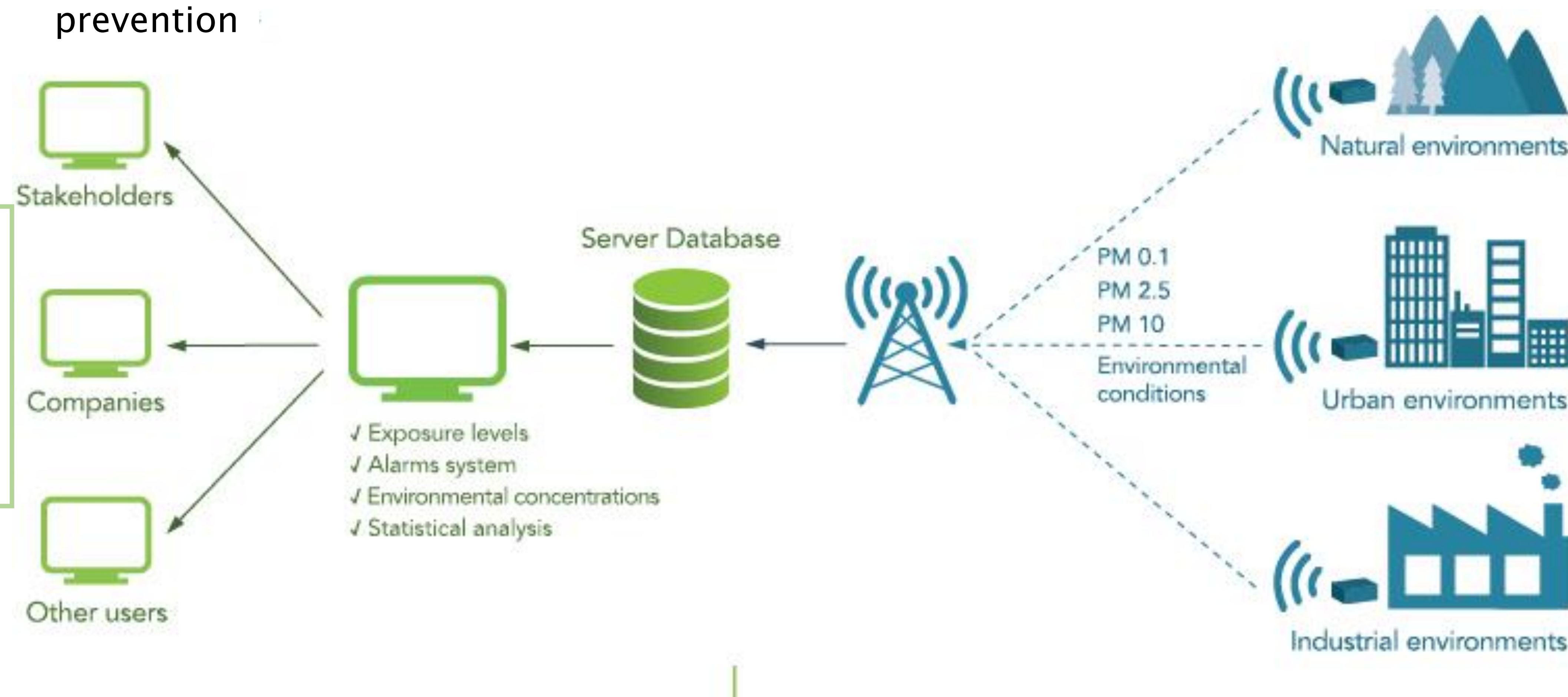
Key objectives:

- to develop standard operating procedures to collect and analyze ENMs in complex industrial, urban and natural environments
- to develop an on-line information system consisting of two elements:
 1. a new **low cost monitoring station prototype** to support the outdoor and indoor monitoring of airborne nano-pollutants.
 2. a **software application** to capture, store, exchange and manage the data on the concentration of ENMs



- ✓ **Weatherproof box** (700mmx500mmx300mm)
- ✓ **Remote monitoring** of number concentration, mass concentration, lung deposited surface area and particle diameter of nanosized and ultrafine particles
- ✓ **Ability to collect nanosized and ultra-fine airborne particles** from an aerosol stream on a collection plate or filter
- ✓ **Modular design**
- ✓ **Tailored designed software** to control the instrument settings, collect and store data
- ✓ **Integrated cooling unit**
- ✓ **External air flow pump**

- to support the monitoring of REACH compliance and its impact on risk mitigation and prevention



Project results will be disseminated to a large community of SMEs, stakeholders and competent authorities at a regional, national and EU level.