

European Network on New Sensing Technologies for Air Pollution Control and Environmental Sustainability - *EuNetAir*

COST Action TD1105

WGs & MC Meeting at SOFIA (BG), 16-18 December 2015

New Sensing Technologies for Indoor Air Quality Monitoring: Trends and Challenges

Action Start date: 01/07/2012 - Action End date: 30/04/2016 - Year 4: 1 July 2015 - 30 April 2016

Updating on Report *Innovation on Environmental Sensor Technologies*



Agenzia nazionale per le nuove tecnologie,
l'energia e lo sviluppo economico sostenibile

Marco Alvisi

SIG1 Leader

ENEA – Italy

marco.alvisi@enea.it


 **cost**
EUROPEAN COOPERATION IN SCIENCE AND TECHNOLOGY





Why a position paper on...?

- To assess the key factors in sensor technology and the relative state of the art in an effective and exhaustive way;
- To depict, as excellent and comprehensive community, a collective Vision in order to define a Roadmap of suggested implementation actions
- To map existing approaches and methodologies in Innovation in AQC and propose new ones
- To map the strengths and weaknesses factors of the European Technology in sensors for ACQ
- Increase and share in the community the awareness of the existing and developing methodologies to produce innovation in the Action topics.



Expected Deliverables from Focus Group on Innovation...

- A Report on European Innovation Sensor Technologies for Air Quality Monitoring;
- A Scoping Paper with Vision, Roadmap and suggested EU actions to boost the “societal innovation stars” (research, education, industries, institutions, citizens) in AQC;
- A publishable review article on innovation in sensor technology for AQC
- A smart specialisation platform for sensor technology in AQC: rationale and synergies with existing initiatives

Table of Contents -1-

Management Summary (Executive Summary) - 1 page

REFERENCE POINT: Penza



Vision and Strategic Goals - 1 page

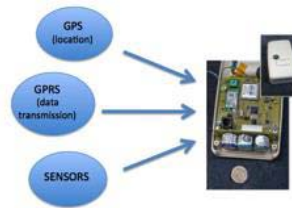
REFERENCE POINT: Penza

OTHER CONTRIBUTORS: Schuetze, Karatzas, Borrego, Hertel, Chowdhury, von Sicard, Hueglin

Typical Applications - 3 pages

REFERENCE POINT: Schuetze

OTHER CONTRIBUTORS: Karatzas, Hueglin.....



Political, Economic and Technical Framework - 2 pages

European Regulation and EU Ambient Air Directive

Other Definitions ???

REFERENCE POINT: Borrego

OTHER CONTRIBUTORS: Hertel, Karatzas, Hans-Guido Muecke (WHO-CC), Romano



Table of Contents -2-

Key Challenges/Solutions and Priorities in the Different Segments of the AQC “Technology Value Chain”:

Indoor Air Quality Applications - 5-10 pages

REFERENCE POINT: Schuetze

OTHER CONTRIBUTORS: Kock, von Sicard, Noren,

Research, Development and Innovation

Companies

Academy

Agency

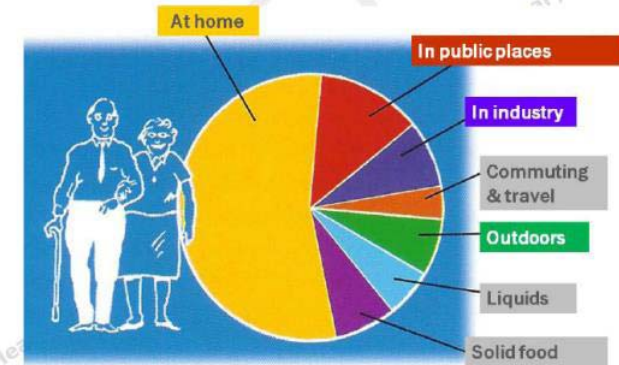
Outdoor Air Quality Applications - 5-10 pages

REFERENCE POINT: Hertel

OTHER CONTRIBUTORS: Kostas Karatzas, Carlos Borrego, Nuria Castell, Thomas Schneider, Jan Theunis, Christoph Heuglin, Maria Bech Poulsen

GUIDELINES FOR HEALTH-BASED VENTILATION IN EUROPE - HEALTHVENT

Indoor air is significant contributor to life-time exposures



<http://www.healthvent.byg.dtu.dk/>





Table of Contents - 4 -

Main Industrial Needs and Related R&D Challenges and Skills

REFERENCE POINT: Martimort

OTHER CONTRIBUTORS:

Main Research Needs in Terms of Instruments, Infrastructures, Regulations

REFERENCE POINT:

OTHER CONTRIBUTORS:

Best European and World Practices in Sensor Technology (1 page/COST Country)

Country Analysis (COST Parties joined to EuNetAir)

REFERENCE POINT: Penza

OTHER CONTRIBUTORS: MC/WG Leaders - *ITALY FORMAT by Penza*

Representation, Communication etc.

REFERENCE POINT: Karatzas

OTHER CONTRIBUTORS:Martimort

Conclusions / Recommendations - 1 page

ALL

Relevant Bibliography (more recent, no limit)

REFERENCE POINT: Chowdhury

OTHER CONTRIBUTORS: ALL



TIMELINE OF REPORT

DECEMBER 2015 - FOCUS GROUP MEETING ON INNOVATION (SCOPING PAPER, VISION, ROADMAP, IMPLEMENTATION ACTION).

Sofia (Bulgaria)

MARCH 2016 - FIRST VERSION OF THE REPORT

MAY 2016 - FINAL VERSION Report at BRUXELLES



First Focus Group meeting in Siemens - Munich.

**THANKS
FOR
YOUR KIND
ATTENTION!**