INFLUENCE! Inspiration and insight to change minds and policy

19 - 20 June 2019 University of Manchester

Headline Sponsor



Don't forget to follow and tweet us @TheEAUC Join in the conversation using #Influence2019







National Clean Air Day What are Universities and Colleges doing to advance the achievement of clean air for all?

Professor James Longhurst Assistant Vice Chancellor, UWE Bristol



EAUC Trustee and Director





National Clean Air Day – what are we doing to advance the achievement of clean air for all?



- Introduction and welcome
- Brief summary of the air quality challenge
- Discussion on the role of Universities and Colleges in addressing air quality
- Conclusions and a draft statement on the role of Universities and Colleges in achieving clean air





National Clean Air Day



- June 20th is National Clean Air Day. The World Health Organisation describe air pollution as the world's biggest environmental health risk.
- Through a round table discussion, this session will ask "what is the role of universities through research, teaching, operations and community engagement to address this public health emergency?"
- Universities and FE colleges are ideally placed to lead and influence debates and actions designed to improve air quality.
- How can universities and FE colleges realise this potential?





A Starting Perspective



- Anthropogenic air pollution is not an accident.
- It results from the decision others take to shape land use, develop transport infrastructure and to develop the economy.
- Air pollution results from the interactions of these processes and the way citizens' practices are conditions by the systems in which they live their lives.
- The consequence is an impact on public health and the environment.
- Different groups in society have different experiences of pollution.
- In general, the richest in society emit the most pollution and are exposed the least.
- In general, the poorest in society emit the least pollution and are exposed the most.



A Public Health Emergency



WHAT ARE THE SOURCES OF AIR POLLUTION?

Outdoor air pollution affects urban and rural areas and is caused by multiple factors:





The World's Biggest Environmental Health Risk



ceauc

Harding Source

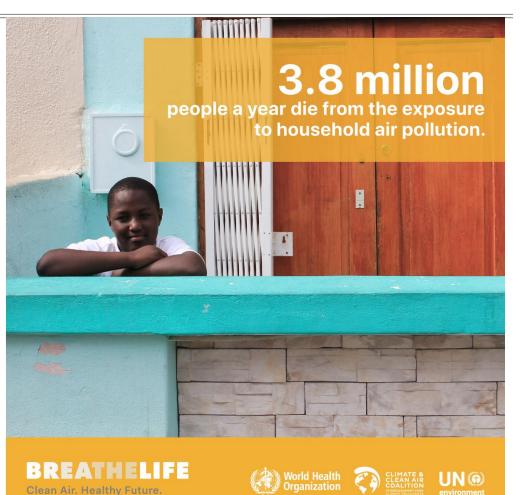
4.2 million deaths every year as a result of exposure to ambient (outdoor) air pollution WHO https://www .who.int/airp ollution/en/

Air pollution was responsible for **7 million** premature deaths in 2016, of these almost **600,000**

were children under 5 years old.

Clean Air. Healthy Future.

World Health Organization





UN 💮

91% of the world's population lives in places where air quality exceeds WHO guideline limits



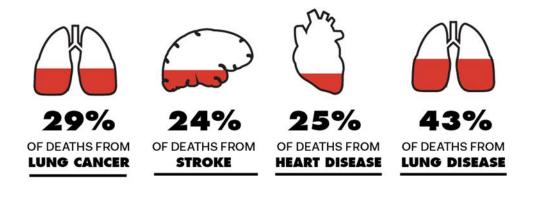


Join us in breathing life back into our cities at BreatheLife2030.com

Clean air. Healthy future.

INVISIBLE KILLER

Air pollution may not always be visible, but it can be deadly.









- Some 500,000 premature deaths in Europe every year
- Premature deaths attributable to fine particulate matter (PM_{2.5}), ozone (O₃) and nitrogen dioxide (NO₂) exposure in 2012 in 40 European countries.
- <u>https://www.eea.europa.eu/media/newsreleases/many-europeans-still-exposed-to-air-pollution-</u> 2015/premature-deaths-attributable-to-air-pollution





EU's Biggest Environmental Health Risk



• "Air Pollution is the Biggest Environmental Risk to Health in the European Union"

 Air pollution causes about 400 000 premature deaths in the EU and hundreds of billions of euros in health-related external costs.







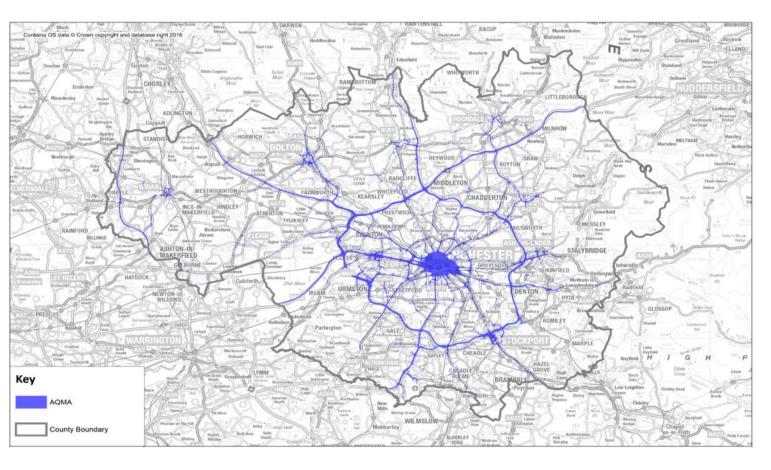
- In the UK estimates vary as to the annual death toll associated with exposure to air pollution with the most recent data suggesting that between 28 000 and 36 000 people die prematurely each year, principally associated with exposure to fine particles and nitrogen dioxide.
- Air pollution is estimated to cost the UK some £20 billion per annum in health care costs and lost productivity.
- Public Health England estimate the 2017 costs of air pollution to the NHS and social care in England as about £157 million.





Greater Manchester AQMA - NO₂

First declared in 2001-2002 for an objective that should have been achieved in 2005 and is still in existence 18 years later.



Both Manchester universities appear to be in the AQMA

Source https://cleanairgm.com/air-quality-management-areas





Discussion

- Hearing from each other how can your University or College help beat air pollution?
- Teaching
- Research
- Campus Operations
- Civic Engagements
- Investments
- Other?

AIR POLLUTION ISSUE GLOBALLY

Over 80% of urban residents are exposed to air pollution levels that exceed WHO limits



SEE YOUR OWN CITY'S LEVEL AT: BREATHELIFE2030.ORG







- Sharing key insights, great ideas and inspiration!
- Teaching
- Research
- Campus Operations
- Civic and Community Engagements
- Investments
- Other?







- Teaching Air Quality in various UG, PG and CPD provision
- Research Air Quality Management Resource Centre, ClairCity, CADTIME, Air Quality and the SDGs. 382 air quality deposits in UWE's Research Repository <u>http://eprints.uwe.ac.uk/</u>
- Campus Operations electrification of the vehicle fleet, CHP, PV, REGO certified renewable electricity supply
- Civic and Community Engagements Bristol Green Capital Partnership, Clean Air Bishopston, Bristol City Council etc.



UWE Actions for Cleaner Air



- Research
- Consultancy
- Live Briefs
- UG Dissertation topics
- MSc Dissertation topics
- Placements
- Part funded internships
- Knowledge Transfer Partnerships
- PhDs



A Draft Declaration of Intent



- The Manchester Air Quality Declaration
- The EAUC recognises the urgent need to address the public health emergency caused by air pollution.
- Through their teaching, research, operations and community engagement Universities, and Colleges are ideally placed to lead and influence debates and actions designed to improve air quality. Through their operations institutions contribute to the problem of air pollution. In their research and teaching, Universities and Colleges make a significant contribution to understanding the causes, consequences and solutions to air pollution and to inform management policy and practice at scales from the local to the global. Universities and Colleges have a major role to play in informing the public about the risks of air pollution and the actions that can be taken to reduce emissions and personal exposure.







- Breathe Life <u>https://breathelife2030.org/</u>
- Beat Air Pollution #BeatAirPollution
- UNEP <u>https://www.unenvironment.org/interactive/how-to-beat-pollution/</u>
- WHO <u>https://www.who.int/airpollution/en/</u>
- National Clean Air Day <u>https://www.cleanairday.org.uk/forms/clean-air-day-resources</u>
- ClairCity <u>http://www.claircity.eu/</u>



BREATHE LIFE



BREATHELIFE.

Clean Air. Healthy Future.

Join us in breathing life back into our cities

www.breathelife2030.org







The SDG Accord





End extreme poverty, inequality and climate change www.sdgaccord.org

Headline Sponsor







Don't forget to follow and tweet us @TheEAUC Join in the conversation using #Influence2019

