

A UK Air Quality Reanalysis

Eleanor Smith · Lucy Neal · Paul Agnew

eleanor.smith@metoffice.gov.uk



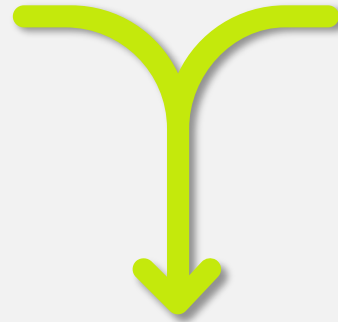
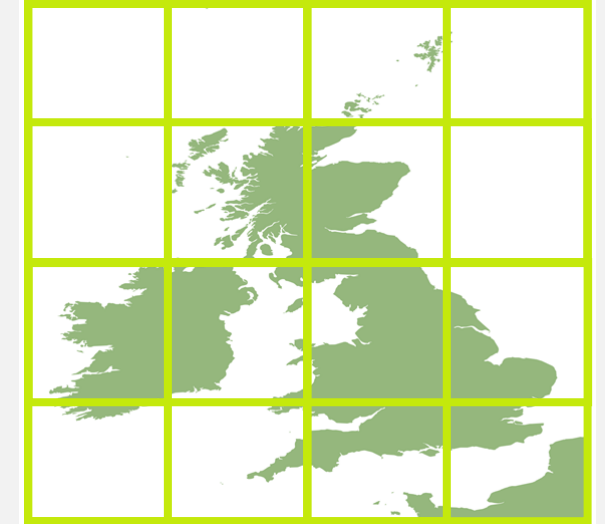


Observational Data

- Sparse spatial coverage
- Incomplete time coverage
- Incomplete pollutant species records

Model Data

- Accuracy dependent on a wide range of inputs
- Inconsistent model configurations



Coverage of whole area of interest

Coverage of a long time period

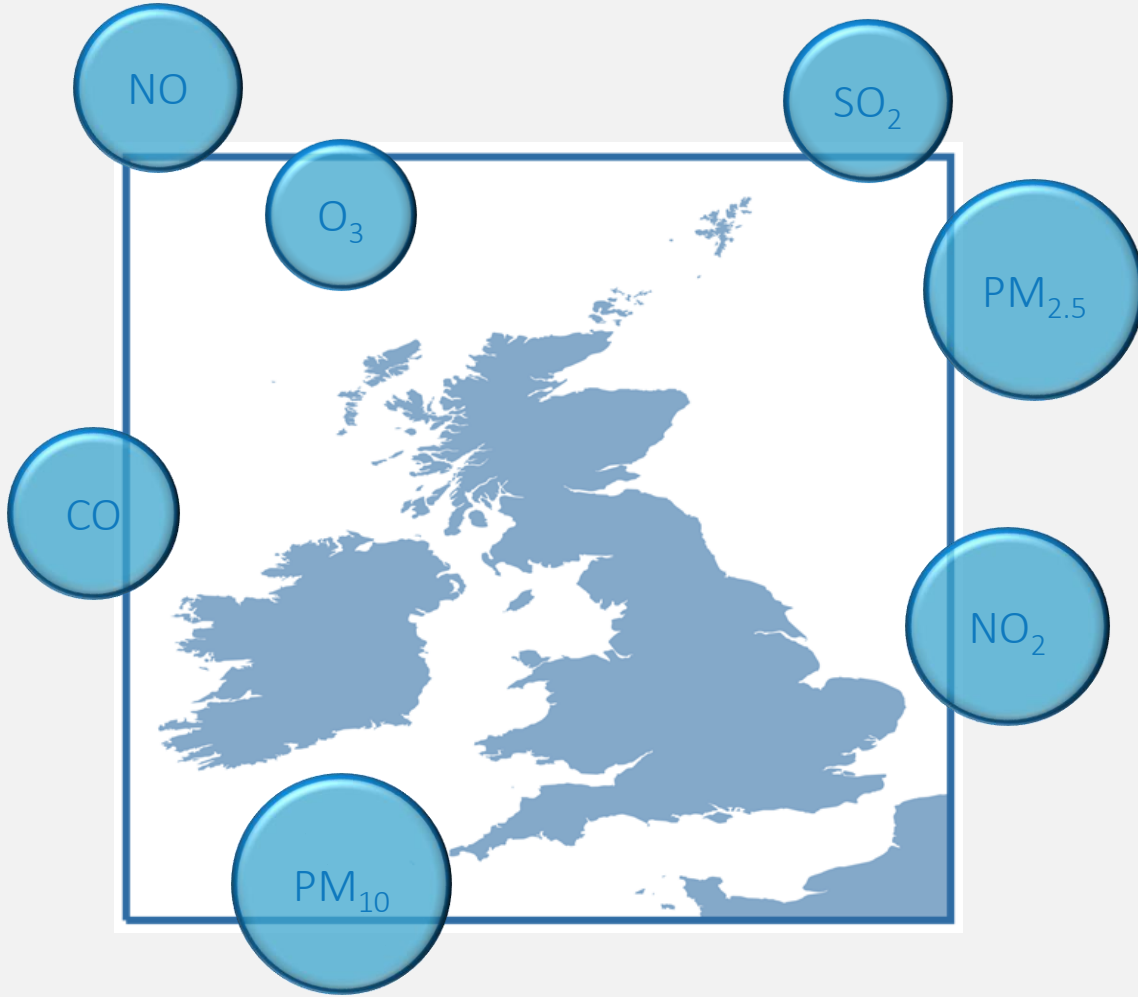
Consistent model configuration

Reanalysis Data

Inclusion of all species of interest

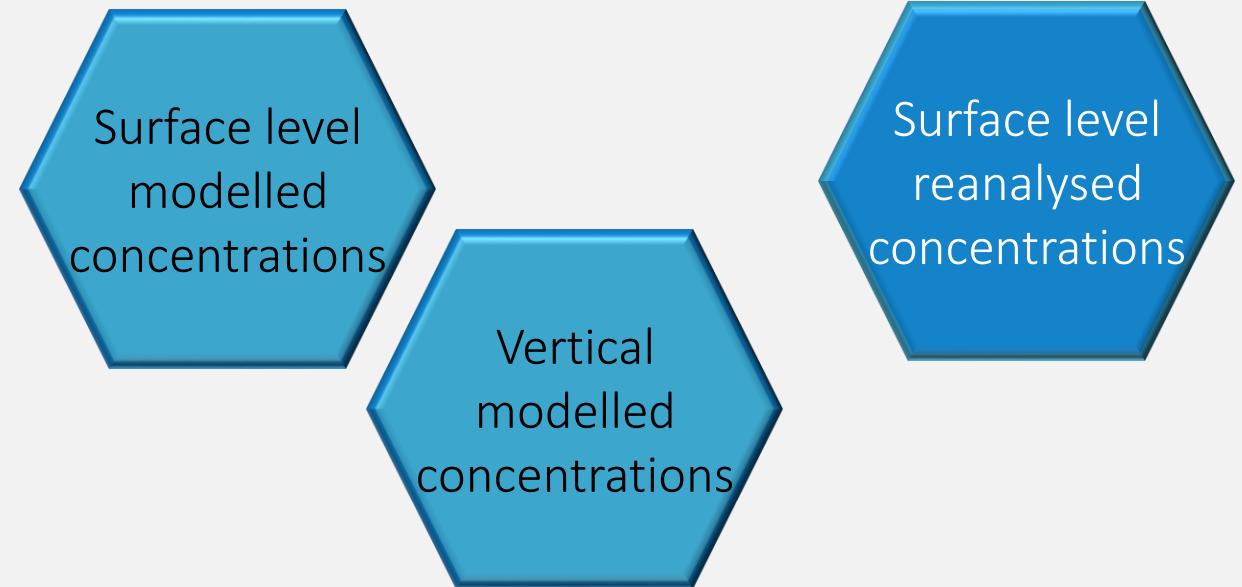
Enhanced through bias corrections using observations





17 years (1st January 2003 to 31st December 2019)

Hourly time resolution



Advertise the dataset to potential users

Analyse the dataset to look at long term spatial and temporal trends in UK air quality

Collaborate with health scientists to perform health impact assessment studies

Publish details of the reanalysis dataset as a peer-reviewed publication

Support and advise people on how to use the data

