

Visualisation of events and uncertainties in the 20th Century Reanalysis

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The 20th Century reanalysis is invaluable as an observational dataset because of its length (138 years), the large set of atmospheric variables reconstructed, and the provision of uncertainty estimates by providing an ensemble of reconstructions. The reanalysis provides an unprecedented opportunity to investigate notable historical weather events, but the sheer quantity of information produced presents challenges in analysis and visualisation. By processing the reanalysis output for selected events into layers for Google Earth it is possible to make easy-to-use visualisations of the multivariate reanalysis output, with its uncertainties, and to demonstrate the links between the original surface observations and the reanalysis results.