



Statistical and stochastic comparison of climate change vs. urbanization

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Urbanization has long been identified as one of the major human impacts on the micro-climate of urban areas and has been linked to large (and often disastrous) changes into several hydroclimatic processes such as temperature, humidity and precipitation. However, climate change studies have rarely separated the urban local-scale influence from the global one. In this study, we thoroughly investigate and compare the changes in the variability of the above hydroclimatic processes in urban regions and in the ones with small or negligible human impact. The analysis includes Monte-Carlo experiments to assess how the aforementioned variability can be simulated through a stochastic model.

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