



## **Climate stress test in The Netherlands: assessing heat waves for urban planning recommendations**

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The government in The Netherlands has appointed municipalities to perform environmental stress tests in order to assess the impact of a warmer (changing) climate on habitat, safety and comfort in sensible environments, such as cities. Based on insights from these stress tests municipalities are requested to perform sustainable actions to mitigate climate change effects adequately. The assessment of heat waves in cities is one of the most challenging tasks for municipalities due to its complexity, uncertainty and unclear implications of adaptive measures.

With the improvement in thermal observations from space and with recent developments in data processing methods to derive (near) surface temperatures, it becomes possible to use remote-sensing data series to extend model-based studies of heat effects with comprehensive observations. We show how these observations can improve the understanding and reliance on studies of heat island effects in different climate scenario's. Based on every-day experience we also indicate the most critical parameters and their required level of confidence needed in order to convince municipalities to adopt required measures more rigorously.