

## HEATWAVES AND EFFECTS ON THE TERRITORY. THE ALERT SYSTEM FOR THE CITY OF TURIN

Agnese Maria Colizzi - Department of Earth Sciences, University of Torino

7 December 2023, h 11.00, Dep. of Management Corso Unione Sovietica, 218bis - Torino, aula 6



One of the consequences of climate change is the increased frequency and severity of extreme meteorological events such as extreme drought events, hurricanes, flooding, and heatwaves. These extreme events impact the environment and human health (IPCC,2023). There isn't a universal definition for "heatwave" because it is defined in relation to the climatic conditions of a specific city but we can define a heatwave when very high temperatures are recorded for several consecutive days, often associated with high humidity rates, strong solar radiation and absence of ventilation. Since 2004, for the city of Turin (and for the entire region of Piedmont) the Arpa Piemonte has activated a surveillance system in 2004 for the prevention of the effects of heatwaves on health and provides an alert bulletin based on HSI, Heat Stress Index (Watts et Kalkstein, 2003). This index, created in the USA after summer of 2003, is very complex but has the advantage of having a good correspondence with the forecasted heat stress mortality. Nevertheless, for the complexity and the difficulty in the calculation of HSI, Arpa Piemonte has developed and is testing a new index that is simpler to calculate in the forecasting phase.



## The speaker

Agnese Maria Colizzi is an Environmental Biologist. She is a research fellow at the Department of Earth Sciences of the University of Turin. The research topics are heatwave events and drought events. She is collaborating with Arpa Piemonte to develop a new heatwave warning system and the related bulletin.