Heatwaves

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Daily Weather Data

Using data provided by the Daily Global Historical Climatology Network (Menne et al. 2012), I identify extreme heat events in the historical temperature time series. Historical weather data is available for about 1200 measurement stations in the US. Based on the latitude and longitude coordinates I assign each station to the county it belongs to. In case there is more than one station per county, I take the mean among those.

Following the National Climate Data Center (NCDC), I define an extreme heat event as two or more consecutive days in which the minimum temperature exceeds the 85th percentile of July and August minimum temperatures (Habeeb, Vargo, and Stone 2015).

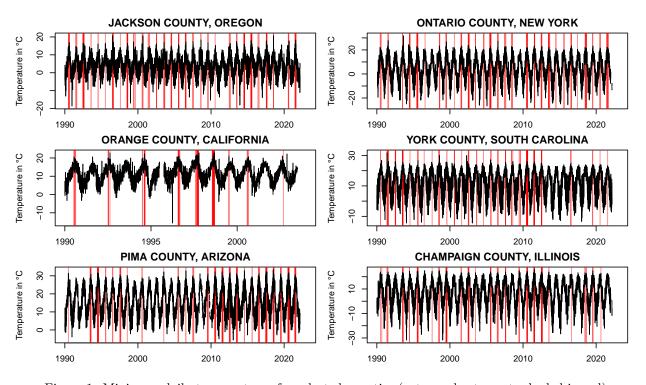


Figure 1: Minimum daily temperatures for selected counties (extreme heat events shaded in red)

References

Habeeb, Dana, Jason Vargo, and Brian Stone. 2015. "Rising Heat Wave Trends in Large US Cities." Natural Hazards 76 (3): 1651–65. https://doi.org/10.1007/s11069-014-1563-z.

Menne, Matthew J., Imke Durre, Bryant Korzeniewski, Shelley McNeill, Kristy Thomas, Xungang Yin, Steven

Anthony, et al. 2012. "Global Historical Climatology Network - Daily (GHCN-Daily), Version 3." NOAA National Centers for Environmental Information. https://doi.org/10.7289/V5D21VHZ.