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Spatiotemporal forecasting with convolutionals and tensor decomposition

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Tensor based time series decomposition methods based on singular spectrum analysis showed great results in both denoising and interpretability. Several forecasting techniques based on them were already explored, yet none provided simultaneously accurate, stable and computationally cheap inferring. After an in-depth study of well known models we facilitated a new one comprising all three requirements for non-stationary quasi-periodic time series. The model was then tested on real-life data of electricity consumption and other well-explored datasets.

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