



Introduction to Time Series Analysis

PRACTICAL TIME SERIES ANALYSIS

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Objectives

- ▶ Define a time series
- ▶ Get familiar with 'astsa' package

Definition

- ▶ Time series is a data set collected through time.

Correlation

- ▶ Sampling adjacent points in time introduce a correlation.

Areas

- ▶ Economics and financial time series
- ▶ Physical time series
- ▶ Marketing time series
- ▶ Demographic time series
- ▶ Population time series
- ▶ Etc.

“astsa” package

- ▶ Package by Robert H. Shumway and David S. Stoffer
- ▶ Contains data sets and scripts to accompany “Time Series Analysis and Its Applications: With R Examples”
- ▶ <https://cran.r-project.org/web/packages/astsa/astsa.pdf>

What We've Learned

- ▶ Definition of a time series (we will re-define it in a slightly different way)
- ▶ The package titled 'astsa'