# Package 'timeSeriesDataSets'

September 13, 2024

Type Package Title Time Series Data Sets Version 0.1.0 Maintainer Renzo Caceres Rossi <arenzocaceresrossi@gmail.com> Description Provides a diverse collection of time series datasets spanning various fields such as economics, finance, energy, healthcare, and more. Designed to support time series analysis in R by offering datasets from multiple disciplines, making it a valuable resource for researchers and analysts. License GPL-3 URL https://github.com/lightbluetitan/timeseriesdatasets\_R **Encoding** UTF-8 LazyData true **Suggests** ggplot2, knitr, rmarkdown, testthat (>= 3.0.0) Config/testthat/edition 3 RoxygenNote 7.3.2 VignetteBuilder knitr NeedsCompilation no Author Renzo Caceres Rossi [aut, cre] **Depends** R (>= 3.5.0) **Repository** CRAN

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# a10\_ts

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Monthly Anti-Diabetic Drug Subsidy in Australia from 1991 to 2008.

# Description

a10\_ts

The dataset name has been changed to 'a10\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The suffix 'ts' identifies the dataset as a time series, helping to differentiate it from other datasets within the package. The original content of the dataset has not been modified in any way.

# Usage

data(a10\_ts)

# Format

A time series object with 204 observations:

**a10** A numeric vector containing the monthly anti-diabetic drug subsidy in Australia, recorded from 1991 to 2008.

#### Source

Data provided by the Australian government.

AirPassengers\_ts Monthly Airline Passenger Numbers from 1949 to 1960.

# Description

The dataset name has been changed to 'AirPassengers\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The suffix 'ts' identifies the dataset as a time series, helping to differentiate it from other datasets within the package. The original content of the dataset has not been modified in any way.

#### Usage

data(AirPassengers\_ts)

3

# Format

A time series object with 144 observations:

**AirPassengers** A numeric vector containing the monthly airline passenger numbers from 1949 to 1960.

## Source

Original data provided by the International Air Transport Association (IATA).

airpass\_ts

Monthly Airline Passenger Numbers from 1949 to 1960.

## Description

The dataset name has been changed to 'airpass\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The suffix 'ts' identifies the dataset as a time series, helping to differentiate it from other datasets within the package. The original content of the dataset has not been modified in any way.

# Usage

data(airpass\_ts)

# Format

A time series object with 144 observations:

airpass A numeric vector containing the monthly airline passenger numbers from 1949 to 1960.

# Source

Original data provided by the International Air Transport Association (IATA).

ausbeer\_ts

# Description

The dataset name has been changed to 'ausbeer\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The suffix 'ts' identifies the dataset as a time series object, helping to differentiate it from other datasets within the package. The original content of the dataset has not been modified in any way.

# Usage

data(ausbeer\_ts)

## Format

A time series object with 218 observations:

**ausbeer** A numeric vector representing the quarterly beer production in Australia, measured in megalitres.

# Source

Data provided by the Australian Bureau of Statistics.

auscafe\_ts

Monthly Expenditure on Eating Out in Australia.

# Description

The dataset name has been changed to 'auscafe\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The suffix 'ts' identifies the dataset as a time series object, helping to differentiate it from other datasets within the package. The original content of the dataset has not been modified in any way.

#### Usage

data(auscafe\_ts)

## Format

A time series object with 426 observations:

**auscafe** A numeric vector representing the monthly expenditure on eating out in Australia, measured in dollars.

# Source

Data provided by the Australian Bureau of Statistics.

beer\_ts

Monthly Beer Production.

# Description

The dataset name has been changed to 'beer\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' signifies that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(beer\_ts)

# Format

A time series object with 56 observations:

beer A numeric vector representing the monthly beer production, measured in megalitres.

#### Source

Data provided by the Australian Bureau of Statistics.

BJsales\_ts

## Description

The dataset name has been changed to 'BJsales\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The suffix 'ts' identifies the dataset as a time series object, helping to differentiate it from other datasets within the package. The original content of the dataset has not been modified in any way.

#### Usage

data(BJsales\_ts)

#### Format

A time series object with 150 observations:

**BJsales** A numeric vector representing the sales data with a leading indicator, measured in dollars.

## Source

Original data provided by Box and Jenkins (1976) in their book "Time Series Analysis: Forecasting and Control."

books\_mts

Sales of Paperback and Hardcover Books.

#### Description

The dataset name has been changed to 'books\_mts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'mts' signifies that this dataset is a multivariate time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(books\_mts)

#### Format

A time series object with 60 observations and 2 series:

**Paperback** A numeric vector representing the monthly sales of paperback books. **Hardcover** A numeric vector representing the monthly sales of hardcover books.

## Source

Data provided by the Australian Bureau of Statistics.

bricksq\_ts

Quarterly Clay Brick Production.

## Description

The dataset name has been changed to 'bricksq\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' signifies that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(bricksq\_ts)

# Format

A time series object with 155 observations:

**bricksq** A numeric vector representing the quarterly clay brick production, measured in thousands of bricks.

#### Source

Data provided by the Australian Bureau of Statistics.

co2\_ts

Mauna Loa Atmospheric CO2 Concentration.

#### Description

The dataset name has been changed to 'co2\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(co2\_ts)

#### discoveries\_ts

# Format

A time series object with 468 observations:

**co2** A numeric vector representing the atmospheric CO2 concentration measured at Mauna Loa, Hawaii, in parts per million (ppm).

# Source

Data provided by the National Oceanic and Atmospheric Administration (NOAA).

discoveries\_ts Yearly Numbers of Important Discoveries.

# Description

The dataset name has been changed to 'discoveries\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

```
data(discoveries_ts)
```

# Format

A time series object with 100 observations:

discoveries A numeric vector representing the yearly number of important discoveries.

#### Source

Data provided by the dataset included in R's 'datasets' package.

economics\_df\_ts US I

## Description

The dataset name has been changed to 'economics\_df\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'df\_ts' indicates that this dataset is a data frame containing time series data. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

```
data(economics_df_ts)
```

# Format

A time series object ('spec\_tbl\_df') with 574 rows and 6 variables:

**date** A Date vector representing the date of the observation.

- **pce** A numeric vector representing the personal consumption expenditures (PCE) in billions of dollars.
- **pop** A numeric vector representing the US population in millions.
- **psavert** A numeric vector representing the personal saving rate as a percentage of disposable income.
- **uempmed** A numeric vector representing the median duration of unemployment in weeks.
- unemploy A numeric vector representing the number of unemployed individuals in thousands.

#### Source

Data provided by the Federal Reserve Economic Data (FRED) database.

| elecdaily_mts | Half-Hourly and Daily Electricity Demand for Victoria, Australia, in |
|---------------|--|
|               | 2014.  |

# Description

The dataset name has been changed to 'elecdaily\_mts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'mts' indicates that this dataset is a multivariate time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(elecdaily\_mts)

# Format

A time series object with 365 observations and 3 variables:

Demand A numeric vector representing the half-hourly electricity demand in megawatts (MW).

**WorkDay** A binary vector indicating whether the day is a working day (1 = yes, 0 = no).

**Temperature** A numeric vector representing the daily average temperature in degrees Celsius.

# Source

Data provided by the Australian Energy Market Operator (AEMO).

| elecdemand_msts | Half-Hourly and Daily Electricity Demand for Victoria, Australia, in |
|-----------------|--|
|                 | 2014.  |

# Description

The dataset name has been changed to 'elecdemand\_msts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'msts' indicates that this dataset is a time series object with multiple seasonalities. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

```
data(elecdemand_msts)
```

# Format

A time series object with multiple seasonalities and 17,520 observations:

**Demand** A numeric vector representing the half-hourly electricity demand in megawatts (MW).

**WorkDay** A binary vector indicating whether the half-hour period is on a working day (1 = yes, 0 = no).

**Temperature** A numeric vector representing the half-hourly temperature in degrees Celsius.

# Source

Data provided by the Australian Energy Market Operator (AEMO).

```
elecequip_ts
```

# Description

The dataset name has been changed to 'elecequip\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(elecequip\_ts)

# Format

A time series object with 195 observations:

**elecequip** A numeric vector representing the monthly production of electrical equipment in the Euro area, measured in millions of euros.

#### Source

Data provided by Eurostat.

elec\_ts

Electricity Production.

# Description

The dataset name has been changed to 'elec\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(elec\_ts)

# Format

A time series object with 476 observations:

elec A numeric vector representing the monthly electricity production, measured in gigawatt-hours (GWh).

#### euretail\_ts

# Source

Data provided by the Australian Bureau of Statistics.

euretail\_ts

Quarterly Retail Trade in the Euro Area.

# Description

The dataset name has been changed to 'euretail\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(euretail\_ts)

# Format

A time series object with 64 observations:

euretail A numeric vector representing the quarterly retail trade in the Euro area, measured in millions of euros.

#### Source

Data provided by Eurostat.

goog200\_ts

Daily Closing Stock Prices of Google Inc. (200 Days).

#### Description

The dataset name has been changed to 'goog200\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(goog200\_ts)

# Format

A time series object with 200 observations:

**goog200** A numeric vector representing the daily closing stock prices of Google Inc., measured in US dollars, for a period of 200 days.

# Source

Data provided by Yahoo Finance.

 ${\tt gtemp\_both\_ts}$ 

*Global Mean Land and Open Ocean Temperature Deviations (1850-2023).* 

# Description

The dataset name has been changed to 'gtemp\_both\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(gtemp\_both\_ts)

# Format

A time series object with 174 observations:

**gtemp\_both** A numeric vector representing the global mean temperature deviations from the long-term average, measured in degrees Celsius.

# Source

Data provided by the National Oceanic and Atmospheric Administration (NOAA) and the Hadley Centre.

gtemp\_land\_ts

#### Description

The dataset name has been changed to 'gtemp\_land\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

### Usage

data(gtemp\_land\_ts)

# Format

A time series object with 174 observations:

**gtemp\_land** A numeric vector representing the global mean land temperature deviations from the long-term average, measured in degrees Celsius.

# Source

Data provided by the National Oceanic and Atmospheric Administration (NOAA) and the Hadley Centre.

gtemp\_ocean\_ts Global Mean Ocean Temperature Deviations (1850-2023).

# Description

The dataset name has been changed to 'gtemp\_ocean\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(gtemp\_ocean\_ts)

## Format

A time series object with 174 observations:

**gtemp\_ocean** A numeric vector representing the global mean ocean temperature deviations from the long-term average, measured in degrees Celsius.

## Source

Data provided by the National Oceanic and Atmospheric Administration (NOAA) and the Hadley Centre.

h02\_ts

Monthly Corticosteroid Drug Subsidy in Australia (1991-2008).

# Description

The dataset name has been changed to 'h02\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(h02\_ts)

## Format

A time series object with 204 observations:

**h02** A numeric vector representing the monthly corticosteroid drug subsidy in Australia, measured in Australian dollars, from January 1991 to December 2008.

#### Source

Data provided by the Australian Government Department of Health.

hsales2\_ts

Sales of New One-Family Houses (1987-1996).

# Description

The dataset name has been changed to 'hsales2\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(hsales2\_ts)

# hyndsight\_ts

# Format

A time series object with 107 observations:

hsales2 A numeric vector representing the monthly sales of new one-family houses, measured in thousands of units, from January 1987 to December 1996.

## Source

Data provided by the U.S. Census Bureau and the U.S. Department of Housing and Urban Development.

hyndsight\_ts

Daily Pageviews for the Hyndsight Blog (April 2014 - April 2015).

# Description

The dataset name has been changed to 'hyndsight\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(hyndsight\_ts)

# Format

A time series object with 365 observations:

**hyndsight** A numeric vector representing the daily pageviews for the Hyndsight blog, measured as the number of pageviews per day, from April 30, 2014 to April 29, 2015.

# Source

Data provided by the author of the Hyndsight blog.

ibmclose\_ts

# Description

The dataset name has been changed to 'ibmclose\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(ibmclose\_ts)

# Format

A time series object with 369 observations:

**ibmclose** A numeric vector representing the daily closing stock price of IBM, measured in US dollars, over a period of 369 days.

## Source

Data provided by Yahoo Finance.

ibm\_mts

IBM Sales and Profit Data.

## Description

The dataset name has been changed to 'ibm\_mts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'mts' indicates that this dataset is a multivariate time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(ibm\_mts)

# jcars\_ts

# Format

A time series object with 42 observations and 4 variables:

Sales A numeric vector representing the monthly sales of IBM, measured in millions of dollars.

**Profit** A numeric vector representing the monthly profit of IBM, measured in millions of dollars.

FSales A numeric vector representing the forecasted sales of IBM.

FProfit A numeric vector representing the forecasted profit of IBM.

# Source

Data provided by the IBM Company.

jcars\_ts

Motor Vehicle Production (1947-1989).

# Description

The dataset name has been changed to 'jcars\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(jcars\_ts)

# Format

A time series object with 43 observations:

**jcars** A numeric vector representing the monthly production of motor vehicles, measured in thousands of units, from January 1947 to December 1989.

# Source

Data provided by the International Organization of Motor Vehicle Manufacturers (OICA).

jj\_ts

# Description

The dataset name has been changed to 'jj\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(jj\_ts)

#### Format

A time series object with 84 observations:

jj A numeric vector representing the quarterly earnings per share of Johnson & Johnson, measured in US dollars, from the first quarter of 1960 to the fourth quarter of 1981.

# Source

Data provided by the Johnson & Johnson Company.

JohnsonJohnson\_ts Quarterly Earnings per Johnson & Johnson Share (1960-1981).

# Description

The dataset name has been changed to 'JohnsonJohnson\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(JohnsonJohnson\_ts)

## Format

A time series object with 84 observations:

**Johnson Johnson** A numeric vector representing the quarterly earnings per share of Johnson & Johnson, measured in US dollars, from the first quarter of 1960 to the fourth quarter of 1981.

## LakeHuron\_ts

# Source

Data provided by the Johnson & Johnson Company.

LakeHuron\_ts

Lake Huron Water Level (1875-1972).

# Description

The dataset name has been changed to 'LakeHuron\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(LakeHuron\_ts)

## Format

A time series object with 98 observations:

**LakeHuron** A numeric vector representing the annual water level of Lake Huron, measured in feet, from 1875 to 1972.

## Source

Data provided by the National Oceanic and Atmospheric Administration (NOAA).

ldeaths\_ts

Monthly Deaths from Lung Diseases in the UK (1974-1980).

#### Description

The dataset name has been changed to 'ldeaths\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(ldeaths\_ts)

# Format

A time series object with 72 observations:

**ldeaths** A numeric vector representing the monthly number of deaths from lung diseases in the UK, from 1974 to 1980.

## Source

Data collected by the UK Office of Population Censuses and Surveys.

livestock\_ts Livestock (Sheep) in Asia, 1961-2007.

## Description

The dataset name has been changed to 'livestock\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(livestock\_ts)

## Format

A time series object with 47 observations:

**livestock** A numeric vector representing the annual number of livestock (sheep) in Asia from 1961 to 2007.

# Source

Food and Agriculture Organization of the United Nations (FAO).

marathon\_ts

# Description

The dataset name has been changed to 'marathon\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(marathon\_ts)

#### Format

A time series object with 120 observations:

**marathon** A numeric vector representing the winning times (in minutes) of the Boston Marathon from 1897 to 2016.

## Source

Boston Athletic Association.

maxtemp\_ts

Maximum Annual Temperatures at Moorabbin Airport, Melbourne

# Description

The dataset name has been changed to 'maxtemp\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(maxtemp\_ts)

# Format

A time series object with 46 observations:

**maxtemp** A numeric vector representing the maximum annual temperatures (in degrees Celsius) recorded at Moorabbin Airport, Melbourne, from 1971 to 2016.

# Source

Australian Bureau of Meteorology.

mdeaths\_ts

Monthly Deaths from Lung Diseases in the UK

#### Description

The dataset name has been changed to 'mdeaths\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(mdeaths\_ts)

## Format

A time series object of 72 observations on the following:

**Time-Series** [1:72] The number of monthly deaths from lung diseases in the UK.

#### **Details**

The data covers the period from 1974 to 1980.

## Source

UK Government Health Department

mens400\_ts

Winning Times in Olympic Men's 400m Track Final

## Description

The dataset name has been changed to 'mens400\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(mens400\_ts)

# milk\_ts

# Format

A time series object of 31 observations on the following:

Time-Series [1:31] Winning times (in seconds) in the Olympic men's 400m track final.

# Details

The data covers the period from 1896 to 2016.

# Source

International Olympic Committee (IOC)

milk\_ts

Monthly Milk Production per Cow

# Description

The dataset name has been changed to 'milk\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(milk\_ts)

# Format

A time series object of 168 observations on the following:

Time-Series [1:168 ] Monthly milk production per cow (in pounds).

# Details

The data covers the period from 1962 to 1976.

#### Source

U.S. Department of Agriculture

nail\_ts

# Description

The dataset name has been changed to 'nail\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(nail\_ts)

## Format

A time series object of 197 observations on the following:

Time-Series [1:197] Nail prices (in cents per pound).

# Details

The data covers the period from 1800 to 1996.

#### Source

U.S. Department of Agriculture

Nile\_ts

Flow of the River Nile

# Description

The dataset name has been changed to 'Nile\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(Nile\_ts)

# Format

A time series object of 100 observations on the following:

Time-Series [1:100] Monthly flow of the River Nile (in cubic meters per second).

## Details

The data covers the period from 1871 to 1970.

#### Source

The dataset is from the British Hydrographic Office and has been digitized by the R package datasets.

pedestrian\_tbl\_ts Pedestrian Counts in the City of Melbourne

# Description

The dataset name has been changed to 'pedestrian\_tbl\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'tbl\_ts' indicates that this dataset is a tibble-based time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(pedestrian\_tbl\_ts)

# Format

A 'tbl\_ts' object with 66,037 rows and 5 columns:

Sensor Identifier for the sensor used to count pedestrians.

Date\_Time Date and time of the pedestrian count (POSIXct format).

Date Date of the pedestrian count (Date format).

Time Time of the pedestrian count (Time format).

Count Number of pedestrians counted.

#### Details

This dataset contains pedestrian count data collected from various sensors located throughout the city of Melbourne. The data includes information on the date and time of each count as well as the number of pedestrians detected.

# Source

City of Melbourne, Australia.

qauselec\_ts

#### Description

The dataset name has been changed to 'qauselec\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(qauselec\_ts)

# Format

A 'ts' object with 218 observations:

time Quarterly time series from 1956 to 2010.

value Electricity production (in GWh) in Australia.

#### Details

This dataset contains quarterly data on electricity production in Australia from 1956 to 2010. The values are measured in gigawatt-hours (GWh).

#### Source

Australian Bureau of Statistics.

qcement\_ts

Quarterly Australian Portland Cement Production

# Description

The dataset name has been changed to 'qcement\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(qcement\_ts)

#### qgas\_ts

# Format

A 'ts' object with 233 observations:

time Quarterly time series from 1956 to 2014.

value Portland cement production (in thousands of tonnes) in Australia.

# Details

This dataset contains quarterly data on Portland cement production in Australia from 1956 to 2014. The values are measured in thousands of tonnes.

# Source

Australian Bureau of Statistics.

qgas\_ts

Quarterly Australian Gas Production

#### Description

The dataset name has been changed to 'qgas\_ts' to avoid confusion with other packages in the R ecosystem from which datasets have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(qgas\_ts)

# Format

A 'ts' object with 218 observations:

time Quarterly time series from 1956 to 2010.

value Gas production (in terajoules) in Australia.

## Details

This dataset contains quarterly data on gas production in Australia from 1956 to 2010. The values are measured in terajoules (TJ).

# Source

Australian Bureau of Statistics.

sunspotarea\_ts

#### Description

The dataset name has been changed to 'sunspotarea\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(sunspotarea\_ts)

#### Format

A 'ts' object with 141 observations:

time Annual time series from 1875 to 2015.

value Average sunspot area observed per year (in millionths of the solar disk).

#### Details

This dataset contains annual data on the average sunspot area observed from 1875 to 2015. Sunspot area measurements indicate the size of sunspots on the Sun's surface.

#### Source

NASA's Solar Dynamics Observatory.

taylor\_30\_min\_df\_ts Half-Hourly Electricity Demand

## Description

The dataset name has been changed to 'taylor\_30\_min\_df\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'df\_ts' indicates that this dataset is a time series object formatted as a data frame. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(taylor\_30\_min\_df\_ts)

# timeSeriesDataSets

# Format

A 'ts' object with 4032 observations:

time Half-hourly time series from 1 to 13.

value Electricity demand measured in half-hour intervals.

# Details

This dataset contains half-hourly data on electricity demand over a period. The data is organized in a time series format with observations at 30-minute intervals.

# Source

Taylor, J.W. (2003). Short-term electricity demand forecasting using double seasonal exponential smoothing. Journal of the Operational Research Society, 54(8), 799-805.

timeSeriesDataSets timeSeriesDataSets: Time Series Data Sets

# Description

This package provides a wide variety of time series data sets for testing, learning, and research purposes.

# Details

timeSeriesDataSets: Time Series Data Sets

A comprehensive collection of time series data sets for use in R.

#### Author(s)

Maintainer: Renzo Caceres Rossi <arenzocaceresrossi@gmail.com>

#### See Also

Useful links:

• https://github.com/lightbluetitan/timeSeriesDataSets\_R

tourism\_tbl\_ts

#### Description

The dataset name has been changed to 'tourism\_tbl\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'tbl\_ts' indicates that this dataset is a time series object formatted as a tibble. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(tourism\_tbl\_ts)

#### Format

A 'tbl\_ts' object with 24,320 observations:

Quarter The quarter of the year when the trips were taken.

Region The region in Australia where the trips occurred.

**State** The state in Australia where the trips occurred.

**Purpose** The purpose of the trips (e.g., holiday, business).

**Trips** The number of overnight trips.

## Details

This dataset contains data on domestic overnight trips taken within Australia, categorized by quarter, region, state, and purpose. The data covers various time periods and provides insight into travel patterns across different states and regions.

# Source

Australian Bureau of Statistics.

| uschange_mts | Growth Rates of Personal Consumption and Personal Income in the |
|--------------|---|
|              | USA   |

# Description

The dataset name has been changed to 'uschange\_mts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'mts' indicates that this dataset is a multivariate time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# USgas\_ts

# Usage

data(uschange\_mts)

## Format

A 'ts' object with 187 observations and 5 variables:

Consumption Growth rate of personal consumption.

Income Growth rate of personal income.

Production Growth rate of industrial production.

Savings Growth rate of personal savings.

Unemployment Growth rate of unemployment.

# Details

This dataset contains quarterly growth rates of various economic indicators in the USA from 1970 to 2016. The variables include rates of personal consumption, personal income, industrial production, personal savings, and unemployment.

## Source

Federal Reserve Economic Data (FRED).

USgas\_ts

US Monthly Natural Gas Consumption

# Description

The dataset name has been changed to 'USgas\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(USgas\_ts)

#### Format

A 'ts' object with 238 observations:

time Monthly time series from 2000 to 2020.

value Natural gas consumption in the US (in billion cubic feet).

## Details

This dataset contains monthly data on natural gas consumption in the United States from 2000 to 2020. The values represent consumption in billion cubic feet.

# Source

U.S. Energy Information Administration.

usmelec\_ts

Monthly Total Net Electricity Generation in the USA

# Description

The dataset name has been changed to 'usmelec\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(usmelec\_ts)

# Format

A 'ts' object with 486 observations:

time Monthly time series from January 1973 to June 2013.

value Total net electricity generation in the USA (in GWh).

## Details

This dataset contains monthly total net electricity generation data for the USA from January 1973 to June 2013. The values are measured in gigawatt-hours (GWh).

# Source

U.S. Energy Information Administration (EIA).

uspop\_ts

# Description

The dataset name has been changed to 'uspop\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(uspop\_ts)

# Format

A 'ts' object with 19 observations:

time Annual time series from 1790 to 1970.

value Population recorded by the US Census (in millions).

# Details

This dataset contains annual population data recorded by the US Census from 1790 to 1970. The values are recorded in millions.

# Source

US Census Bureau.

wineind\_ts

Australian Total Wine Sales

# Description

The dataset name has been changed to 'wineind\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

## Usage

data(wineind\_ts)

# Format

A 'ts' object with 176 observations:

time Monthly time series from 1980 to 1995.

value Total wine sales in Australia (in millions of dollars).

# Details

This dataset contains monthly data on total wine sales in Australia from 1980 to 1995. The values represent the sales in millions of dollars.

# Source

Australian Bureau of Statistics.

wmurders\_ts

Annual Female Murder Rate in the USA

# Description

The dataset name has been changed to 'wmurders\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

# Usage

data(wmurders\_ts)

#### Format

A 'ts' object with 55 observations:

time Annual time series from 1950 to 2004.

value Female murder rate per 100,000 standard population in the USA.

## Details

This dataset contains annual data on the female murder rate per 100,000 standard population in the USA from 1950 to 2004.

# Source

United States Federal Bureau of Investigation (FBI).

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## Description

The dataset name has been changed to 'woolyrnq\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseries-datasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(woolyrnq\_ts)

# Format

A 'ts' object with 119 observations:

time Quarterly time series from 1965 to 1994.

value Quarterly production of woollen yarn in Australia (in millions of dollars).

#### Details

This dataset contains quarterly data on the production of woollen yarn in Australia from 1965 to 1994. The values are measured in millions of dollars.

#### Source

Australian Bureau of Statistics.

WWWusage\_ts

Internet Usage per Minute

# Description

The dataset name has been changed to 'WWWusage\_ts' to avoid confusion with other datasets in the R ecosystem from which data have been sourced. The suffix 'ts' indicates that this dataset is a time series object. This naming convention helps distinguish this dataset as part of the 'timeseriesdatasets' package and assists users in identifying its specific characteristics. The original content of the dataset has not been modified in any way.

#### Usage

data(WWWusage\_ts)

# Format

A 'ts' object with 100 observations:

time Time series from 1 to 100 minutes.

value Internet usage per minute (in MB).

# Details

This dataset contains data on internet usage per minute from 1 to 100 minutes. The values are measured in megabytes (MB).

# Source

The dataset is part of the R datasets package.

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