

Package ‘tsibbledata’

June 5, 2020

Version 0.2.0

Title Diverse Datasets for 'tsibble'

Description Provides diverse datasets in the 'tsibble' data structure. These datasets are useful for learning and demonstrating how tidy temporal data can be tidied, visualised, and forecasted.

Depends R (>= 3.1.3)

Imports tsibble (>= 0.9.0)

Suggests ggplot2

ByteCompile true

License GPL-3

URL <http://tsibbledata.tidyverts.org/>,
<https://github.com/tidyverts/tsibbledata/>

BugReports <https://github.com/tidyverts/tsibbledata/issues>

Encoding UTF-8

LazyData true

RoxygenNote 7.1.0

NeedsCompilation no

Author Mitchell O'Hara-Wild [aut, cre],
Rob Hyndman [aut],
Earo Wang [aut]

Maintainer Mitchell O'Hara-Wild <mail@mitchelloharawild.com>

Repository CRAN

Date/Publication 2020-06-04 23:00:03 UTC

R topics documented:

ansett	2
aus_livestock	3
aus_production	3
aus_retail	4

gafa_stock	5
global_economy	5
hh_budget	6
nyc_bikes	7
olympic_running	8
PBS	9
pelt	9
vic_elec	10

Index	12
--------------	-----------

ansett	<i>Passenger numbers on Ansett airline flights</i>
--------	--

Description

The data features a major pilots' industrial dispute which results in some weeks having zero passengers. There were also at least two changes in the definitions of passenger classes.

Format

Time series of class `tsibble`

Details

`ansett` is a weekly `tsibble` with one value:

Passengers: Total air passengers travelling with Ansett

Each series is uniquely identified using two keys:

Airports: The airports that passengers are travelling between (both directions)
 Class: The class of the ticket.

Source

Ansett Airlines (which no longer exists).

Examples

```
library(tsibble)
ansett
```

aus_livestock	<i>Australian livestock slaughter</i>
---------------	---------------------------------------

Description

Meat production in Australia for human consumption from Q3 1965 to Q4 2018.

Format

Time series of class tsibble

Details

aus_livestock is an quarterly tsibble with one value:

Count: Number of animals slaughtered.

Each series is uniquely identified by one key:

Animal: The animal slaughtered.

Source

Australian Bureau of Statistics, catalogue number 7218.0.55.001 tables 1 to 6.

Examples

```
library(tsibble)
aus_livestock
```

aus_production	<i>Quarterly production of selected commodities in Australia.</i>
----------------	---

Description

Quarterly estimates of selected indicators of manufacturing production in Australia.

Format

Time series of class tsibble.

Details

aus_production is a half-hourly tsibble with six values:

Beer: Beer production in megalitres.
 Tobacco: Tobacco and cigarette production in tonnes.
 Bricks: Clay brick production in millions of bricks.
 Cement: Portland cement production in thousands of tonnes.
 Electricity: Electricity production in gigawatt hours.
 Gas: Gas production in petajoules.

Source

Australian Bureau of Statistics, catalogue number 8301.0.55.001 table 1.

Examples

```
library(tsibble)
aus_production
```

aus_retail	<i>Australian retail trade turnover</i>
------------	---

Description

aus_retail is a monthly tsibble with one value:

Turnover: Retail turnover in \$Million AUD

Format

Time series of class tsibble

Details

Each series is uniquely identified using two keys:

State: The Australian state (or territory)
 Industry: The industry of retail trade

Source

Australian Bureau of Statistics, catalogue number 8501.0, table 11.

Examples

```
library(tsibble)
aus_retail
```

gafa_stock	<i>GAFAs stock prices</i>
------------	---------------------------

Description

Historical stock prices from 2014-2018 for Google, Amazon, Facebook and Apple. All prices are in \$USD.

Format

Time series of class tsibble

Details

gafa_stock is a tsibble containing data on irregular trading days:

Open:	The opening price for the stock.
High:	The stock's highest trading price.
Low:	The stock's lowest trading price.
Close:	The closing price for the stock.
Adj_Close:	The adjusted closing price for the stock.
Volume:	The amount of stock traded.

Each stock is uniquely identified by one key:

Symbol: The ticker symbol for the stock.

Source

Yahoo Finance historical data, <https://finance.yahoo.com/>

Examples

```
library(tsibble)
gafa_stock
```

global_economy	<i>Global economic indicators</i>
----------------	-----------------------------------

Description

Economic indicators featured by the World Bank from 1960 to 2017.

Format

Time series of class `tsibble`

Details

`global_economy` is an annual `tsibble` with six values:

GDP:	Gross domestic product (in \$USD February 2019).
Growth:	Annual percentage growth in GDP.
CPI:	Consumer price index (base year 2010).
Imports:	Imports of goods and services (% of GDP).
Exports:	Exports of goods and services (% of GDP).
Population:	Total population.

Each series is uniquely identified by one key:

Country: The country or region of the series.

Source

The World Bank, <http://datatopics.worldbank.org/world-development-indicators/>

Examples

```
library(tsibble)
global_economy
```

hh_budget

Household budget characteristics

Description

Annual indicators of household budgets for Australia, Japan, Canada and USA from 1995-2016.

Format

Time series of class `tsibble`.

Details

`hh_budget` is an annual `tsibble` with six values:

Debt:	Debt as a percentage of net disposable income.
DI:	Annual growth rate of disposable income.
Expenditure:	Annual growth rate of expenditure.
Savings:	Savings as a percentage of household disposable income.

Wealth: Wealth as a percentage of net disposable income.
 Unemployment: Percentage of unemployed in the labour force.

Each country is uniquely identified by one key:

Country: The country of the series.

Source

The Organisation for Economic Co-operation and Development (<https://data.oecd.org/>)

Examples

```
library(tsibble)
hh_budget
```

nyc_bikes

NYC Citi Bike trips

Description

A sample from NYC Citi Bike usage of 10 bikes throughout 2018. The data includes event data on each trip, including the trip's start and end times and locations. The customer's gender, birth year and bike usage type is also available.

Format

Time series of class `tsibble`

Details

`nyc_bikes` is a `tsibble` containing event data, the events include these details:

<code>start_time</code> :	The time and date when the trip was started.
<code>stop_time</code> :	The time and date when the trip was ended.
<code>start_station</code> :	A unique identifier for the starting bike station.
<code>start_lat</code> :	The latitude of the starting bike station.
<code>start_long</code> :	The longitude of the starting bike station.
<code>end_station</code> :	A unique identifier for the destination bike station.
<code>end_lat</code> :	The latitude of the destination bike station.
<code>end_long</code> :	The longitude of the destination bike station.
<code>type</code> :	The type of trip. A "Customer" has purchased either a 24-hour or 3-day pass, and a "Subscriber" has purchased
<code>birth_year</code> :	The bike rider's year of birth.
<code>gender</code> :	The gender of the bike rider.

Each series is uniquely identified by one key:

bike_id: A unique identifier for the bike.

Source

Citi Bike NYC, <https://www.citibikenyc.com/system-data>

Examples

```
library(tsibble)
nyc_bikes
```

olympic_running	<i>Fastest running times for Olympic races</i>
-----------------	--

Description

olympic_running is a quadrennial tsibble with one value:

Time: Fastest running time for the event (seconds)

Format

Time series of class tsibble

Details

The event is identified using two keys:

Length: The length of the race (meters)
Sex: The sex of the event

The data contains missing values in 1916, 1940 and 1944 due to the World Wars.

Source

<https://www.olympic.org/athletics>

Examples

```
library(tsibble)
olympic_running

if(requireNamespace("ggplot2")){
```



```

library(ggplot2)
olympic_running %>% as_tibble %>%
  ggplot(aes(x=Year, y = Time, colour = Sex)) +
  geom_line() +
  facet_wrap(~ Length, scales = "free_y")
}

```

PBS

Monthly Medicare Australia prescription data

Description

PBS is a monthly tsibble with two values:

Scripts:	Total number of scripts
Cost:	Cost of the scripts in \$AUD

Format

Time series of class tsibble

Details

The data is disaggregated using four keys:

Concession:	Concessional scripts are given to pensioners, unemployed, dependents, and other card holders
Type:	Co-payments are made until an individual's script expenditure hits a threshold (\$290.00 for concession, \$1141.8
ATC1:	Anatomical Therapeutic Chemical index (level 1)
ATC2:	Anatomical Therapeutic Chemical index (level 2)

Source

Medicare Australia

Examples

```

library(tsibble)
PBS

```

pelt

Pelt trading records

Description

Hudson Bay Company trading records for Snowshoe Hare and Canadian Lynx furs from 1845 to 1935. This data contains trade records for all areas of the company.

Format

Time series of class `tsibble`

Details

`pelt` is an annual `tsibble` with two values:

Hare: The number of Snowshoe Hare pelts traded.
Lynx: The number of Canadian Lynx pelts traded.

Source

Hudson Bay Company

Examples

```
library(tsibble)
pelt
```

vic_elec

Half-hourly electricity demand for Victoria, Australia

Description

`vic_elec` is a half-hourly `tsibble` with three values:

Demand: Total electricity demand in MW.
Temperature: Temperature of Melbourne (BOM site 086071).
Holiday: Indicator for if that day is a public holiday.

Format

Time series of class `tsibble`.

Details

This data is for operational demand, which is the demand met by local scheduled generating units, semi-scheduled generating units, and non-scheduled intermittent generating units of aggregate capacity larger than 30 MW, and by generation imports to the region. The operational demand excludes the demand met by non-scheduled non-intermittent generating units, non-scheduled intermittent generating units of aggregate capacity smaller than 30 MW, exempt generation (e.g. rooftop

solar, gas tri-generation, very small wind farms, etc), and demand of local scheduled loads. It also excludes some very large industrial users (such as mines or smelters).

Source

Australian Energy Market Operator.

Examples

```
library(tsibble)  
vic_elec
```

Index

*Topic **datasets**

- ansett, [2](#)
- aus_livestock, [3](#)
- aus_production, [3](#)
- aus_retail, [4](#)
- gafa_stock, [5](#)
- global_economy, [5](#)
- hh_budget, [6](#)
- nyc_bikes, [7](#)
- olympic_running, [8](#)
- PBS, [9](#)
- pelt, [9](#)
- vic_elec, [10](#)

- ansett, [2](#)
- aus_livestock, [3](#)
- aus_production, [3](#)
- aus_retail, [4](#)

- gafa_stock, [5](#)
- global_economy, [5](#)

- hh_budget, [6](#)

- nyc_bikes, [7](#)

- olympic_running, [8](#)

- PBS, [9](#)
- pelt, [9](#)

- vic_elec, [10](#)