

Package: IIS (via r-universe)

February 12, 2025

Type Package

Version 1.1

Date 2025-02-07

Title Datasets to Accompany Wolfe and Schneider - Intuitive
Introductory Statistics

Description These datasets and functions accompany Wolfe and Schneider (2017) - Intuitive Introductory Statistics (ISBN: 978-3-319-56070-0) <doi:10.1007/978-3-319-56072-4>. They are used in the examples throughout the text and in the end-of-chapter exercises. The datasets are meant to cover a broad range of topics in order to appeal to the diverse set of interests and backgrounds typically present in an introductory Statistics class.

Maintainer Grant Schneider <gschneidz@gmail.com>

License GPL-2

LazyLoad yes

Depends R (>= 2.10)

Imports asbio, BSDA, Hmisc, NSM3, Rfit

RoxygenNote 6.0.1

NeedsCompilation no

Date/Publication 2025-02-11 16:50:05 UTC

Author Grant Schneider [aut, cre]

Config/pak/sysreqs bwidget libgmp3-dev make libicu-dev

Repository <https://drg-123.r-universe.dev>

RemoteUrl <https://github.com/cran/IIS>

RemoteRef HEAD

RemoteSha 1f308835bd1887707ed4c8f1fda8b3684441fc3c

Contents

IIS-package	3
agricultural_chargeoff_rates_by_quarter	3
airline_arrivals	4
american_league_salary_2014	5
arion_subfuscus	5
average_HDL_levels	6
beer_head	6
body_temperature_and_heart_rate	7
chargeoff_rates	8
college_rankings_2012	8
delinquency_rates	9
desimipramine	9
diamonds_carats_color_cost	10
emissions	11
engineering_drawing_hours	11
female_amerindians	12
FindTriples	12
fmr_white_tailed_deer	13
gender_roles	14
goggled_green_turtles	14
health_care_by_affiliation	15
homes_prices	16
house_lot_sizes	16
infant_walking	17
interstitial_lengths	17
kentucky_derby_2012	18
meniscal_repairs_load_at_failure	18
mother_smoking_age	19
mother_smoking_education	20
mother_smoking_education_1989_1993	20
mother_smoking_education_2010	21
motor_vehicle_death_rate_2012	22
movie_facts	22
national_league_salary_2014	23
nba_2015_2016	24
osu_math_salaries_2015	24
pennies_age	25
percentage_hatched_eggs	25
pew_science_survey_data_by_age_group	26
pew_science_survey_data_by_party	27
pinus_1997	27
pmn_migration	28
population_estimates_2015	28
presidential_election_polls	29
proportion_for_profit_hospitals	30
q2_q4_agricultural_chargeoff_rates	30

reading_habits_2011	31
school_report_cards_2014	32
sheep_weight	32
state_cdi	33
state_poverty_levels_2013	34
tiaa_cref	34
traffic_accidents	35
weekly_salaries	35
weight_of_Euros	36

Index 37

IIS-package *Datasets and functions to accompany Wolfe and Schneider - Intuitive Introductory Statistics (2017)*

Description

This package contains the R datasets and functions referenced in the text and exercises of Wolfe and Schneider - Intuitive Introductory Statistics (2017)

Author(s)

Grant Schneider
Maintainer: Grant Schneider <gschneidz@gmail.com>

References

Wolfe and Schneider - Intuitive Introductory Statistics (2017)

agricultural_chargeoff_rates_by_quarter
Agricultural Chargeoff Rates by Quarter

Description

This data set contains twenty-five years (1991 through 2015) of quarterly charge-off rates for agricultural loans as reported by the Federal Reserve. This is the full dataset corresponding to the selected rows displayed in Table 2.5 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

agricultural_chargeoff_rates_by_quarter

Format

A data.frame with 100 rows and 3 columns indicating the chargeoff rates for agricultural loans for each quarter.

Source

<https://www.federalreserve.gov/releases/chargeoff/chgallnsa.htm>

Examples

```
data(agricultural_chargeoff_rates_by_quarter)
summary(agricultural_chargeoff_rates_by_quarter)
```

airline_arrivals	<i>Airline Arrivals</i>
------------------	-------------------------

Description

This data set contains on-time arrival records for U.S. flight carriers in for all four quarters of the year 2015, the month of December 2015, and the entire year 2015. This data is displayed in Table 2.9 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
airline_arrivals
```

Format

A data.frame with 13 rows and 13 columns indicating the percentages and ranks for each airline.

Source

U.S. Department of Transportation (2016)

Examples

```
data(airline_arrivals)
summary(airline_arrivals)
```

american_league_salary_2014
American League Salary 2014

Description

This data set contains the 2014 salaries (as of March 26, 2014) for all baseball players in the American League.

Usage

```
american_league_salary_2014
```

Format

A data.frame with 447 rows and 3 columns corresponding to the name, salary, and team for each player.

Source

Petchesky (2014)

Examples

```
data(american_league_salary_2014)  
summary(american_league_salary_2014)
```

arion_subfuscus *Arion Subfuscus*

Description

This data set contains the Acceptability Indices (AI) for Arion Subfuscus from woodland and waste sites with the toxic woodland plant Allium Ursinum (wild garlic) as test gel as reported by Whelan (1982). This data is displayed in Table 9.3 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
arion_subfuscus
```

Format

A data.frame with 10 rows and 2 columns indicating the AI for the woodland and waste sites.

Source

Whelan (1982)

Examples

```
data(arion_subfuscus)
summary(arion_subfuscus)
```

average_HDL_levels	<i>Average HDL Levels</i>
--------------------	---------------------------

Description

This data set contains the averages of two HDL measurements taken 24 hours apart for each of twelve women who participated in Kerr (1983). This data is displayed in Table 7.1 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
average_HDL_levels
```

Format

A vector with 12 observations corresponding to the average HDL measurements for each woman.

Source

Kerr (1983)

Examples

```
data(average_HDL_levels)
summary(average_HDL_levels)
```

beer_head	<i>Beer Head</i>
-----------	------------------

Description

This data set contains the height of the initial head formation upon pouring, the percentage adhesion of the head, and the percentage collapse of the head 4 min after pouring for 20 bottles selected from two different production lots of beer as reported by Ault et al. (1967).

Usage

```
beer_head
```

Format

A list containing 2 data.frames (one for each of the two production lots). Each data.frame has 20 rows and 3 columns corresponding to the attributes for each bottle.

Source

Ault et al. (1967)

Examples

```
data(beer_head)
summary(beer_head)
```

body_temperature_and_heart_rate
Body Temperature and Heart Rate

Description

This data set contains body temperature values artificially generated by Shoemaker (1996), to closely recreate the original data obtained by Mackowiak et al. (1992) for 65 male and 65 female subjects.

Usage

```
body_temperature_and_heart_rate
```

Format

A data frame with 130 rows and 3 columns corresponding to the body temperature, gender (1 for male, 2 for female), and heart rate for each subject.

Source

Shoemaker (1996)

Examples

```
data(body_temperature_and_heart_rate)
summary(body_temperature_and_heart_rate)
```

chargeoff_rates	<i>Chargeoff Rates</i>
-----------------	------------------------

Description

This data set contains twenty-five years (1991 through 2015) of quarterly charge-off rates for eight different types of loans as reported by the Federal Reserve. This data is displayed in Table 2.4 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
chargeoff_rates
```

Format

A data.frame with 100 rows and 9 columns indicating the chargeoff rates for each of the eight loan types for each quarter.

Source

<https://www.federalreserve.gov/releases/chargeoff/chgallnsa.htm>

Examples

```
data(chargeoff_rates)
summary(chargeoff_rates)
```

college_rankings_2012	<i>College Rankings 2012</i>
-----------------------	------------------------------

Description

This data set contains a subset of the College Scorecard Data reported by the U.S. Department of Education.

Usage

```
college_rankings_2012
```

Format

A data.frame with 7793 rows and 9 columns indicating various scorecard metrics for each school.

Source

United States Department of Education (2016)

Examples

```
data(college_rankings_2012)
summary(college_rankings_2012)
```

delinquency_rates	<i>Delinquency Rates</i>
-------------------	--------------------------

Description

This data set contains twenty-five years (1991 through 2015) of quarterly delinquency rates for eight different types of loans as reported by the Federal Reserve.

Usage

```
delinquency_rates
```

Format

A data.frame with 100 rows and 9 columns indicating the delinquency rates for each of the eight loan types for each quarter.

Source

<https://www.federalreserve.gov/releases/chargeoff/delallnsa.htm>

Examples

```
data(delinquency_rates)
summary(delinquency_rates)
```

desimipramine	<i>Desimipramine</i>
---------------	----------------------

Description

This data set contains the body weight of 12 subjects with anorexia nervosa before and after treatment with the medication desimipramine as reported by Brambilla et al. (1985). This data is displayed in Table 8.3 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
desimipramine
```

Format

A data.frame with 12 rows and 2 columns indicating the pre-treatment and post-treatment weights (in kg) of each subject.

Source

Brambilla et al. (1985)

Examples

```
data(desimipramine)
summary(desimipramine)
```

```
diamonds_carats_color_cost
```

Diamonds Carats Color Cost

Description

This data set contains weight in carats, color purity, grade of clarity, certification body, and value in Singapore dollars for 308 round diamond stones from an advertisement in the February 18, 2000 edition of Singapore's Business Times as discussed in Chu (2001).

Usage

```
diamonds_carats_color_cost
```

Format

A data.frame with 308 rows and 5 columns indicating the attributes of each diamond.

Source

Chu (2001)

Examples

```
data(diamonds_carats_color_cost)
summary(diamonds_carats_color_cost)
```

`emissions`*Emissions*

Description

This data set contains annual emissions data (in million metric tons of carbon dioxide equivalents) for four common air pollutants from 1990 to 2014 in the United States. This data is displayed in Table 2.3 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage`emissions`**Format**

A data.frame with 25 rows and 5 columns indicating the amount of the four pollutants for each year.

Source

U.S. Environmental Protection Agency (2016)

Examples

```
data(emissions)
summary(emissions)
```

`engineering_drawing_hours`*Engineering Drawing Hours*

Description

This data set contains the total engineering drawing hours contributing to the cost of pieces of machinery/mechanical devices for a large Ohio-based company that is displayed in Table 1.3 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage`engineering_drawing_hours`**Format**

A vector with 96 observations corresponding to the hours for each piece of machinery/mechanical device.

Source

Ohio-based company

Examples

```
data(engineering_drawing_hours)
summary(engineering_drawing_hours)
```

female_amerindians	<i>Female Amerindians</i>
--------------------	---------------------------

Description

This data set contains the stature of 20 female Amerindians from the Turner site in Cincinnati, Ohio, representing the Ohio Hopewell period (200-400 AD) studied by Sciulli and Carlisle (1975). This data is displayed in Table 7.8 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
female_amerindians
```

Format

A vector with 20 observations corresponding to the stature (in centimeters) for each female Amerindian.

Source

Sciulli and Carlisle (1975)

Examples

```
data(female_amerindians)
summary(female_amerindians)
```

FindTriples	<i>Find "triples" of vector elements.</i>
-------------	---

Description

FindTriples returns the number of left triples, right triples, and triples that are neither left nor right for the given vector.

Usage

```
FindTriples(z)
```

Arguments

z Numeric vector

Details

Triples are formed by taking any three data values from a vector and order this triple of data values from smallest to largest. If the middle ordered item is closer to the smallest than to the largest, the triple is said to be a right triple. If the middle ordered item is closer to the largest, the triple is said to be a left triple. If the middle ordered value is exactly halfway between the other two, the triple is neither right nor left. This function will do the necessary computations and return the number of each type of triple.

Value

A list with three components:

- right - Number of right triples (where middle value is closer to smallest)
- left - Number of left triples (where middle value is closer to largest)
- neither - Number of triples that are neither left nor right (where middle value is exactly halfway between the other two)

Examples

```
FindTriples(1:10)
FindTriples(rnorm(20))
```

fmr_white_tailed_deer *FMR White-Tailed Deer*

Description

This data set contains data on the fasting metabolic rate (FMR) of white-tailed deer for different two-month periods of the year. This data is displayed in Table 12.9 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
fmr_white_tailed_deer
```

Format

A list with 3 vectors, each containing FMR (kcal/kg/day) for the deer observed in the corresponding time period.

Source

Silver et al. (1969)

Examples

```
data(fmr_white_tailed_deer)
summary(fmr_white_tailed_deer)
```

gender_roles *Gender Roles*

Description

This data set contains counts of gender 7685 individuals for which gender could be identified into the seven role categories. This data was used by Vigorito and Curry (1998) to investigate whether there is any relationship between gender and the roles that individuals play in magazine ad illustrations. This data is displayed in Table 10.12 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
gender_roles
```

Format

A data.frame with 7 rows and 2 columns indicating the counts for each gender and role category.

Source

Vigorito and Curry (1998)

Examples

```
data(gender_roles)
summary(gender_roles)
```

goggled_green_turtles *Goggled Green Turtles*

Description

This data set contains the number of times that 36 turtle hatchlings split into two groups 'circled', in an attempt to determine whether light had an effect on the orientation and sea-finding ability of such hatchlings as reported by Mrosovsky and Shettleworth (1974). This data is displayed in Table 9.6 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
goggled_green_turtles
```

Format

A data.frame with 18 rows and 2 columns indicating the number of circles in a two-minute period for the nasal field goggles and for the harlequin goggles.

Source

Mrosovsky and Shettleworth (1974)

Examples

```
data(goggled_green_turtles)
summary(goggled_green_turtles)
```

```
health_care_by_affiliation
```

Health Care by Affiliation

Description

This data set contains counts of respondents' preferences between two statements about healthcare grouped by political party from the report "Generation to Generation: American Values about Taking Care of Each Other" (1998). This data is displayed in Table 10.20 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
health_care_by_affiliation
```

Format

A data.frame with 2 rows and 2 columns indicating the counts for each statement and each party.

Source

Princeton Survey Research Associates of Princeton, New Jersey (1998)

Examples

```
data(health_care_by_affiliation)
summary(health_care_by_affiliation)
```

homes_prices	<i>Homes Prices</i>
--------------	---------------------

Description

This data set contains the information about house prices for a random sample of 100 properties in Wake County, North Carolina, as collected by Woodard and Leone (2008).

Usage

```
homes_prices
```

Format

A `data.frame` with 100 rows and 6 columns indicating the attributes of each house.

Source

Woodard and Leone (2008)

Examples

```
data(homes_prices)
summary(homes_prices)
```

house_lot_sizes	<i>House Lot Sizes</i>
-----------------	------------------------

Description

This data set contains the information about house and lot sizes for a random sample of 100 properties in Wake County, North Carolina, as collected by Woodard and Leone (2008).

Usage

```
house_lot_sizes
```

Format

A `data.frame` with 100 rows and 8 columns indicating the attributes of each house.

Source

Woodard and Leone (2008)

Examples

```
data(house_lot_sizes)
summary(house_lot_sizes)
```

infant_walking	<i>Infant Walking</i>
----------------	-----------------------

Description

This data set contains the ages at which 12 infants were reported to have started walking by their mothers. The infants were randomly split into "exercise" and "no-exercise" groups" as part of the study conducted by Zelazo et al. (1972). This data is displayed in Table 9.8 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
infant_walking
```

Format

A data.frame with 6 rows and 2 columns indicating the age (in months) at which infants first walked for the exercise and no-exercise groups.

Source

Zelazo et al. (1972)

Examples

```
data(infant_walking)
summary(infant_walking)
```

interstitial_lengths	<i>Interstitial Lengths</i>
----------------------	-----------------------------

Description

This data set contains the averages (mm) of interstitial lengths (distances between midpoints) of ten pairs of secondary branches for each of twelve blue spruce and twelve white pine trees. This data is displayed in Table 1.24 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
interstitial_lengths
```

Format

A data.frame with 12 rows and 2 columns corresponding to 12 observations each of blue spruce and white pine trees.

Source

Kayle (1984)

Examples

```
data(interstitial_lengths)
summary(interstitial_lengths)
```

kentucky_derby_2012 *Kentucky Derby 2012*

Description

This data set contains race statistics for the Kentucky Derby for each year from 1990 to 2012. This data is displayed in Table 2.7 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
kentucky_derby_2012
```

Format

A data.frame with 23 rows and 6 columns indicating various statistics for each year.

Source

<https://kentuckyderby.ag/>

Examples

```
data(kentucky_derby_2012)
summary(kentucky_derby_2012)
```

meniscal_repairs_load_at_failure
Meniscal Repairs Load at Failure

Description

This data set contains the load at failure for 18 cadaveric menisci repaired by one of three techniques: the FasT-Fix Meniscal Repair Suture System (FasT-Fix), the use of biodegradable Meniscus Arrows (MA), and the Vertical Mattress Sutures (VMS) approach. This data is displayed in Table 12.1 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
meniscal_repairs_load_at_failure
```

Format

A list with 3 vectors, each containing the load (in Newtons) at failure of the 6 menisci assigned to the corresponding group.

Source

Borden et al. (2003)

Examples

```
data(meniscal_repairs_load_at_failure)
summary(meniscal_repairs_load_at_failure)
```

mother_smoking_age	<i>Mother Smoking Age</i>
--------------------	---------------------------

Description

This data set contains the percentages of mothers in the United States who smoked during pregnancies from 2010 to 2014 for various age categories. This data is displayed in Table 2.14 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
mother_smoking_age
```

Format

A data.frame with 45 rows and 4 columns indicating the age group, number of births, and percentage of smoking mothers for each year.

Source

Centers for Disease Control and Prevention (CDC) "WONDER Online Database" (2016)

Examples

```
data(mother_smoking_age)
summary(mother_smoking_age)
```

mother_smoking_education

Mother Smoking Education

Description

This data set contains the percentages of mothers in the United States from 2010 to 2014 who smoked during pregnancy for various categories of educational level. A subset of this data is displayed in Table 2.13 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
mother_smoking_education
```

Format

A data.frame with 40 rows and 4 columns indicating the education, births, and percentage of smoking mothers for each year.

Source

Centers for Disease Control and Prevention (CDC) "WONDER Online Database" (2016)

Examples

```
data(mother_smoking_education)
summary(mother_smoking_education)
```

mother_smoking_education_1989_1993

Mother Smoking Education 1989-1993

Description

This data set contains the percentages of mothers in the United States from 1989 to 1993 who smoked during pregnancy for various categories of educational level. This data is displayed in Table 2.15 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
mother_smoking_education_1989_1993
```

Format

A data.frame with 25 rows and 3 columns indicating the education and percentage of smoking mothers for each year.

Source

Centers for Disease Control and Prevention, National Center for Health Statistics (1995)

Examples

```
data(mother_smoking_education_1989_1993)
summary(mother_smoking_education_1989_1993)
```

```
mother_smoking_education_2010
      Mother Smoking Education 2010
```

Description

This data set contains the percentages of mothers in the United States in 2010 who smoked during pregnancy for various categories of educational level. This is a subset of the *mother_smoking_education* dataset.

Usage

```
mother_smoking_education_2010
```

Format

A `data.frame` with 8 rows and 2 columns indicating the percentage of smoking mothers for each educational level in the year 2010.

Source

Centers for Disease Control and Prevention (CDC) "WONDER Online Database" (2016)

Examples

```
data(mother_smoking_education_2010)
summary(mother_smoking_education_2010)
```

```
motor_vehicle_death_rate_2012
```

Motor Vehicle Death Rate 2012

Description

This data set contains the total motor-vehicle fatalities per 100 million vehicle miles traveled in the 2012 calendar year that is displayed in Table 1.16 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
motor_vehicle_death_rate_2012
```

Format

A data.frame with 50 rows and 3 columns corresponding to the name, fatality rate, and region for each state.

Source

National Highway Traffic Safety Administration (2013)

Examples

```
data(motor_vehicle_death_rate_2012)
summary(motor_vehicle_death_rate_2012)
```

```
movie_facts
```

Movie Facts

Description

This data set contains a random sample of 100 movies from the 1996 edition of The Movie and Video Guide prepared annually by Leonard Maltin as selected by Moore (2006).

Usage

```
movie_facts
```

Format

A data.frame with 100 rows and 6 columns corresponding to the title, release year, length (minutes), number of cast members, rating, and number of lines of description for each movie.

Source

Moore (2006)

Examples

```
data(movie_facts)
summary(movie_facts)
```

```
national_league_salary_2014
```

National League Salary 2014

Description

This data set contains the 2014 salaries (as of March 26, 2014) for all baseball players in the National League.

Usage

```
national_league_salary_2014
```

Format

A data.frame with 437 rows and 3 columns corresponding to the name, salary, and team for each player.

Source

Petchesky (2014)

Examples

```
data(national_league_salary_2014)
summary(national_league_salary_2014)
```

nba_2015_2016	<i>NBA 2015-2016</i>
---------------	----------------------

Description

This data set contains NBA teams' performance in the 2015-2016 season as provided by the NBA's official website.

Usage

```
nba_2015_2016
```

Format

A `data.frame` with 30 rows and 19 columns indicating various performance statistics for each team.

Source

<https://www.nba.com/stats/teams/traditional?Season=2015-16>

Examples

```
data(nba_2015_2016)
summary(nba_2015_2016)
```

osu_math_salaries_2015	<i>OSU Math Salaries 2015</i>
------------------------	-------------------------------

Description

This data set contains 2015 salaries of faculty and staff in the Mathematics Department at The Ohio State University. This data is displayed in Table 3.1 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
osu_math_salaries_2015
```

Format

A vector with 226 observations corresponding to each reported salary.

Source

Cleveland.com (2016)

Examples

```
data(osu_math_salaries_2015)
summary(osu_math_salaries_2015)
```

pennies_age	<i>Pennies' Age</i>
-------------	---------------------

Description

This data set contains the ages (based on minting dates) of 374 United States pennies collected by an introductory class of 25 students.

Usage

```
pennies_age
```

Format

A vector with 374 observations corresponding to the ages of the pennies.

Source

Classroom Experiment

Examples

```
data(pennies_age)
summary(pennies_age)
```

percentage_hatched_eggs	<i>Percentage Hatched Eggs</i>
-------------------------	--------------------------------

Description

This data set contains the percentages of eggs that eventually hatched for dump (communal) nests and normal nests each year from 1966 through 1974 as reported by Clawson et al. (1979). This data is displayed in Table 8.1 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
percentage_hatched_eggs
```

Format

A data.frame with 9 rows and 2 columns indicating the percentage of hatched eggs for the two nest types for each year.

Source

Clawson et al. (1979)

Examples

```
data(percentage_hatched_eggs)
summary(percentage_hatched_eggs)
```

```
pew_science_survey_data_by_age_group
```

Pew Science Survey Data By Age Group

Description

This data set contains the percentages of people who answered "yes" to various questions about scientific topics in a survey conducted by the Pew Research Center grouped by age group. This data is displayed in Table 2.18 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
pew_science_survey_data_by_age_group
```

Format

A `data.frame` with 5 rows and 4 columns indicating the proportion of respondents answering "yes" to each of the four questions indicated in Exercise 2.3.4. of Wolfe and Schneider - Intuitive Introductory Statistics by age group.

Source

Pew Internet & American Life Project, Science Issues (2014)

Examples

```
data(pew_science_survey_data_by_age_group)
summary(pew_science_survey_data_by_age_group)
```

pew_science_survey_data_by_party

Pew Science Survey Data By Party

Description

This data set contains the percentages of people who answered "yes" to various questions about scientific topics in a survey conducted by the Pew Research Center grouped by political affiliation. This data is displayed in Table 2.17 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
pew_science_survey_data_by_party
```

Format

A data.frame with 3 rows and 4 columns indicating the proportion of respondents answering "yes" to each of the four questions indicated in Exercise 2.3.4. of Wolfe and Schneider - Intuitive Introductory Statistics by party.

Source

Pew Internet & American Life Project, Science Issues (2014)

Examples

```
data(pew_science_survey_data_by_party)
summary(pew_science_survey_data_by_party)
```

pinos_1997

Pines 1997

Description

This data set contains a subset of the data collected by biology students at Kenyon College to determine which factors cause pines in the Kenyon Center for Environmental Study to vary in growth rates. A description of the dataset is displayed in Table 2.2 and Example 3.4 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
pinos_1997
```

Format

A data.frame with 1000 rows and 5 columns corresponding to variables described in Table 2.2 of Intuitive Introductory Statistics for each tree.

Source

Kenyon Center for Environmental Study (1997)

Examples

```
data(pines_1997)
summary(pines_1997)
```

pmn_migration	<i>PMN Migration</i>
---------------	----------------------

Description

This data set contains the polymorphonuclear leukocytes (PMN) migration in the sera of the 8 patients with acute pancreatitis measured by Perez et al. (1983). This data is displayed in Table 7.4 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
pmn_migration
```

Format

A vector with 8 observations corresponding to the PMN migration for each patient.

Source

Perez et al. (1983)

Examples

```
data(pmn_migration)
summary(pmn_migration)
```

population_estimates_2015	<i>Population Estimates 2015</i>
---------------------------	----------------------------------

Description

This data set contains population estimates, birth rates (per 1000 population), and net migration (per 1000 population) for each year 2011 through 2015 at the state level as reported by the U.S. Census Bureau.

Usage

```
population_estimates_2015
```

Format

A data.frame with 50 rows and 17 columns indicating each metric over the four years for each state.

Source

United States Census Bureau (2016)

Examples

```
data(population_estimates_2015)
summary(population_estimates_2015)
```

`presidential_election_polls`
Presidential Election Polls

Description

This data set contains the results of the final pre-election Gallup Voter Opinion Poll and the eventual election results for every presidential election from 1936 through 2012.

Usage

```
presidential_election_polls
```

Format

A data.frame with 46 rows and 5 columns corresponding to the year, name, final polling estimate, actual election results, and deviation between polling and actual results for each candidate.

Source

Gallup (2015)

Examples

```
data(presidential_election_polls)
summary(presidential_election_polls)
```

proportion_for_profit_hospitals
Proportion For-Profit Hospitals

Description

This data set contains data on the proportion of a state's hospitals that are for-profit for a subset of states from each of four regions of the country. This data is displayed in Table 12.5 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
proportion_for_profit_hospitals
```

Format

A data.frame with 20 rows and 3 columns indicating the region and proportion of for-profit hospitals for each state.

Source

American Hospital Association (2012)

Examples

```
data(proportion_for_profit_hospitals)
summary(proportion_for_profit_hospitals)
```

q2_q4_agricultural_chargeoff_rates
Q2/Q4 Agricultural Chargeoff Rates

Description

This data set contains twenty-five years (1991 through 2015) of Q2 and Q4 charge-off rates for agricultural loans as reported by the Federal Reserve. This is a subset of the agricultural_chargeoff_rates_by_quarter dataset.

Usage

```
q2_q4_agricultural_chargeoff_rates
```

Format

A data.frame with 50 rows and 3 columns indicating the chargeoff rates for agricultural loans for each quarter.

Source

<https://www.federalreserve.gov/releases/chargeoff/chgallnsa.htm>

Examples

```
data(q2_q4_agricultural_chargeoff_rates)
summary(q2_q4_agricultural_chargeoff_rates)
```

reading_habits_2011 *Reading Habits 2011*

Description

This data set contains data from the 2011 Pew Research Center report titled "The Rise of E-reading" intended to investigate how reading and e-reading habits vary by demographic and socio-economic categories. A subset of this data is displayed in Table 3.4 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
reading_habits_2011
```

Format

A data.frame with 2986 rows and 7 columns indicating various pieces of demographic information and reading habits for each study participant.

Source

Pew Internet & American Life Project: The rise of e-reading (2016)

Examples

```
data(reading_habits_2011)
summary(reading_habits_2011)
```

school_report_cards_2014

School Report Cards 2014

Description

This data set contains 2014 school performance data, or "School Quality Snapshots", for high schools in New York City. A subset of this data is displayed in Table 3.2 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
school_report_cards_2014
```

Format

A data.frame with 484 rows and 8 columns indicating various performance statistics for each high school.

Source

New York City Department of Education (2016)

Examples

```
data(school_report_cards_2014)
summary(school_report_cards_2014)
```

sheep_weight

Sheep Weight

Description

This data set contains the mother's mating weight and her lamb offspring's weight at age 7 months for a subset of twenty ewe-lamb pairs from the Research Farm at Ataturk University, Erzurum, Turkey. This data is displayed in Table 11.6 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
sheep_weight
```

Format

A data.frame with 20 rows and 2 columns indicating the weight (in kg) for the mother and the lamb of each pair.

Source

Ozturk et al. (2005)

Examples

```
data(sheep_weight)
summary(sheep_weight)
```

state_cdi	<i>State CDI</i>
-----------	------------------

Description

This data set contains a sample of "chronic disease indicators", as reported by the CDC's Division of Population Health, for the four states California, Michigan, Ohio, and West Virginia. This data is displayed in Table 2.16 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
state_cdi
```

Format

A `data.frame` with 16 rows and 3 columns indicating the indicator and the percentage of the population having such an indicator for each state.

Source

Centers for Disease Control and Prevention (2016)

Examples

```
data(state_cdi)
summary(state_cdi)
```

```
state_poverty_levels_2013
```

State Poverty Levels 2013

Description

This data set contains the number of individuals in each state whose annual income was below the established poverty level in 2013 at a state-by-state level. This data is displayed in Table 1.4 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
state_poverty_levels_2013
```

Format

A data.frame with 50 rows and 3 columns corresponding to the name, total population, and number of people at or below the poverty line in each state.

Source

United States Census Bureau: Population Division (2014) & American Community Surveys (2014)

Examples

```
data(state_poverty_levels_2013)
summary(state_poverty_levels_2013)
```

```
ttaa_cref
```

TIAA CREF

Description

This data set contains the historical unit values from January 2, 2015 to March 15, 2016 for seven TIAA and CREF variable annuities. This is the full dataset corresponding to the selected rows displayed in Table 2.6 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
ttaa_cref
```

Format

A data.frame with 302 rows and 8 columns indicating the unit values for each of the seven annuities for each day.

Source

<https://www.tiaa-cref.org>

Examples

```
data(tiaa_cref)
summary(tiaa_cref)
```

traffic_accidents	<i>Traffic Accident Data</i>
-------------------	------------------------------

Description

This data set contains traffic accident data from 1949 and 1985 that is displayed in Table 1.2 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
traffic_accidents
```

Format

A data.frame with 9 rows and 2 columns. The rows correspond to various types of accidents and the two columns correspond to the years 1945 and 1985, respectively.

Source

National Safety Council (1996)

Examples

```
data(traffic_accidents)
summary(traffic_accidents)
```

weekly_salaries	<i>Weekly Salaries</i>
-----------------	------------------------

Description

This data set contains the median weekly earnings of male and female employees in service occupations, sales and office occupations, and construction and extraction occupations for each quarter from 2005 to 2015. This data is displayed in Table 2.1 of Wolfe and Schneider - Intuitive Introductory Statistics.

Usage

```
weekly_salaries
```

Format

A data.frame with 44 rows and 6 columns corresponding to male and female earnings for each of the three occupation types for each quarter.

Source

U.S. Department of Labor, Bureau of Labor Statistics (2016)

Examples

```
data(weekly_salaries)
summary(weekly_salaries)
```

weight_of_Euros	<i>Weight of Euros</i>
-----------------	------------------------

Description

This data set contains the weight of 2000 coins from 8 separate packages of 250 Euros each as weighed and reported by Shkedy et al. (2006).

Usage

```
weight_of_Euros
```

Format

A data.frame with 2000 rows and 3 columns corresponding to the ID, weight, and batch/package number for each coin.

Source

Shkedy et al. (2006)

Examples

```
data(weight_of_Euros)
summary(weight_of_Euros)
```

Index

* **Introductory**

IIS-package, 3

* **Intuitive**

IIS-package, 3

* **Schneider**

IIS-package, 3

* **Wolfe**

IIS-package, 3

* **datasets**

agricultural_chargeoff_rates_by_quarter,
3

airline_arrivals, 4

american_league_salary_2014, 5

arion_subfuscus, 5

average_HDL_levels, 6

beer_head, 6

body_temperature_and_heart_rate, 7

chargeoff_rates, 8

college_rankings_2012, 8

delinquency_rates, 9

desimipramine, 9

diamonds_carats_color_cost, 10

emissions, 11

engineering_drawing_hours, 11

female_amerindians, 12

fmr_white_tailed_deer, 13

gender_roles, 14

goggled_green_turtles, 14

health_care_by_affiliation, 15

homes_prices, 16

house_lot_sizes, 16

infant_walking, 17

interstitial_lengths, 17

kentucky_derby_2012, 18

meniscal_repairs_load_at_failure,
18

mother_smoking_age, 19

mother_smoking_education, 20

mother_smoking_education_1989_1993,

20

mother_smoking_education_2010, 21

motor_vehicle_death_rate_2012, 22

movie_facts, 22

national_league_salary_2014, 23

nba_2015_2016, 24

osu_math_salaries_2015, 24

pennies_age, 25

percentage_hatched_eggs, 25

pew_science_survey_data_by_age_group,
26

pew_science_survey_data_by_party,
27

pinos_1997, 27

pmn_migration, 28

population_estimates_2015, 28

presidential_election_polls, 29

proportion_for_profit_hospitals,
30

q2_q4_agricultural_chargeoff_rates,
30

reading_habits_2011, 31

school_report_cards_2014, 32

sheep_weight, 32

state_cdi, 33

state_poverty_levels_2013, 34

tiaa_cref, 34

traffic_accidents, 35

weekly_salaries, 35

weight_of_Euros, 36

agricultural_chargeoff_rates_by_quarter,
3

airline_arrivals, 4

american_league_salary_2014, 5

arion_subfuscus, 5

average_HDL_levels, 6

beer_head, 6

body_temperature_and_heart_rate, 7

chargeoff_rates, 8
college_rankings_2012, 8

delinquency_rates, 9
desimipramine, 9
diamonds_carats_color_cost, 10

emissions, 11
engineering_drawing_hours, 11

female_amerindians, 12
FindTriples, 12
fmr_white_tailed_deer, 13

gender_roles, 14
goggled_green_turtles, 14

health_care_by_affiliation, 15
homes_prices, 16
house_lot_sizes, 16

IIS (IIS-package), 3
IIS-package, 3
infant_walking, 17
interstitial_lengths, 17

kentucky_derby_2012, 18

meniscal_repairs_load_at_failure, 18
mother_smoking_age, 19
mother_smoking_education, 20
mother_smoking_education_1989_1993, 20
mother_smoking_education_2010, 21
motor_vehicle_death_rate_2012, 22
movie_facts, 22

national_league_salary_2014, 23
nba_2015_2016, 24

osu_math_salaries_2015, 24

pennies_age, 25
percentage_hatched_eggs, 25
pew_science_survey_data_by_age_group,
26
pew_science_survey_data_by_party, 27
pines_1997, 27
pmn_migration, 28
population_estimates_2015, 28
presidential_election_polls, 29
proportion_for_profit_hospitals, 30

q2_q4_agricultural_chargeoff_rates, 30

reading_habits_2011, 31

school_report_cards_2014, 32
sheep_weight, 32
state_cdi, 33
state_poverty_levels_2013, 34

tiaa_cref, 34
traffic_accidents, 35

weekly_salaries, 35
weight_of_Euros, 36