

# Package ‘sfo’

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**Type** Package

**Title** San Francisco International Airport Monthly Air Passengers

**Version** 0.1.2

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**Description** Provides monthly statistics on the number of monthly air passengers at SFO airport such as operating airline, terminal, geo, etc.

Data source: San Francisco data portal (DataSF) <<https://data.sfgov.org/Transportation/Air-Traffic-Passenger-Statistics/rkru-6vcg>>.

**License** MIT + file LICENSE

**Encoding** UTF-8

**LazyData** true

**Depends** R (>= 2.10)

**Suggests** dplyr (>= 1.0.0), magrittr (>= 1.5), plotly (>= 4.9.2.1),  
knitr, rmarkdown, tidyr (>= 1.0.0)

**RoxygenNote** 7.1.2

**VignetteBuilder** knitr

**NeedsCompilation** no

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**Repository** CRAN

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 sankey\_ly

*Sankey Plot with Plotly*


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## Description

Sankey Plot with Plotly

## Usage

```
sankey_ly(x, cat_cols, num_col, title = NULL)
```

## Arguments

x	A data.frame input, must have at least two categorical columns and one numeric column
cat_cols	A vector of at least two categorical columns names
num_col	A single numeric column name
title	Optional, string to pass to plotly layout title function

## Details

A customized function for data transformation and plotting sankey plot with Plotly

## Examples

```
data("sfo_passengers")

library(dplyr)

d <- sfo_passengers %>%
  filter(activity_period >= 202201 & activity_period < 202301)

head(d)

d %>%
  filter(operating_airline == "United Airlines") %>%
  mutate(terminal = ifelse(terminal == "International", "international", terminal)) %>%
  group_by(operating_airline, activity_type_code, geo_summary, geo_region, terminal) %>%
  summarise(total = sum(passenger_count), .groups = "drop") %>%
  sankey_ly(cat_cols = c("operating_airline", "terminal", "geo_summary",
                        "geo_region", "activity_type_code"),
            num_col = "total",
            title = "Distribution of United Airlines Passengers at SFO During 2022")
```

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sfo\_passengers

*SFO Airport Air Traffic Passenger Statistics*

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### Description

Monthly summary of number of passengers in San Francisco International Airport (SFO)

### Usage

sfo\_passengers

### Format

A data frame with 12 variables.

**activity\_period** Activity year and month in YYYYMM format

**operating\_airline** Airline name for the aircraft operator

**operating\_airline\_iata\_code** The International Air Transport Association (IATA) two-letter designation for the Operating Airline

**published\_airline** Airline name that issues the ticket and books revenue for passenger activity

**published\_airline\_iata\_code** The International Air Transport Association (IATA) two-letter designation for the Published Airline

**geo\_summary** The flights' classification by domestic for flights that arrived from or departed to a destination within the United States and international for destinations outside the United States

**geo\_region** The flight origin/destination geographic region details

**activity\_type\_code** A description of the physical action a passenger took in relation to a flight, which includes boarding a flight ("enplanements"), getting off a flight ("deplanements") and transiting to another location ("intransit")

**price\_category\_code** A categorization of whether a Published Airline is a low-cost carrier or not a low-cost carrier

**terminal** The airport's terminal designations at SFO where passenger activity took place

**boarding\_area** The airport's boarding area designations at SFO where passenger activity took place

**passenger\_count** The number of monthly passengers associated with the above attribute fields

### Details

The dataset contains the monthly summary of number of passengers in San Francisco International Airport (SFO)

### Source

San Francisco data portal (DataSF) [website](#).

**Examples**

```

data(sfo_passengers)

require(dplyr)

# Get summary of total number of passengers by activity type
# in most recent month
sfo_passengers %>%
  filter(activity_period == max(activity_period)) %>%
  group_by(activity_type_code) %>%
  summarise(total = sum(passenger_count), .groups = "drop")

# Get summary of total number of passengers by
# activity type and geo region in most recent month
sfo_passengers %>%
  filter(activity_period == max(activity_period)) %>%
  group_by(activity_type_code, geo_region) %>%
  summarise(total = sum(passenger_count), .groups = "drop")

```

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sfo\_stats

*SFO Airport Air Landings Statistics*


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**Description**

Monthly statistics on San Francisco International Airport (SFO) landings

**Usage**

```
sfo_stats
```

**Format**

A data frame with 14 variables.

**activity\_period** Activity year and month in YYYYMM format

**operating\_airline** Airline name for the aircraft operator

**operating\_airline\_iata\_code** The International Air Transport Association (IATA) two-letter designation for the Operating Airline

**published\_airline** Airline name that issues the ticket and books revenue for passenger activity

**published\_airline\_iata\_code** The International Air Transport Association (IATA) two-letter designation for the Published Airline

**geo\_summary** The flights' classification by domestic for flights that arrived from or departed to a destination within the United States and international for destinations outside the United States

**geo\_region** The flight origin/destination geographic region details

**landing\_aircraft\_type** A designation for three types of aircraft that landed at SFO, which includes passenger aircraft, cargo-only aircraft (“freighters”), or combination aircraft (“combi”)

**aircraft\_body\_type** A designation that is independent from Landing Aircraft Type, which determines whether commercial aircraft landed at SFO is a wide body-jet, narrow-body jet, regional-jet or a propeller operated aircraft

**aircraft\_manufacturer** Manufacturer name for the aircraft that landed at SFO

**aircraft\_model** Model designation of aircraft by the manufacturer

**aircraft\_version** Variations of the Aircraft Model, also known as the “dash number”, designated by the manufacturer to segregate unique versions of the same model

**landing\_count** The number of aircraft landings associated with General and Landings Statistics attribute fields

**total\_landed\_weight** The aircraft landed weight (in pounds) associated with General and Landings Statistics attribute fields

## Details

The dataset contains the monthly statistics on the air traffic landings in San Francisco International Airport (SFO)

## Source

San Francisco data portal (DataSF) [website](#).

## Examples

```
data(sfo_stats)

require(dplyr)

# Get summary of total landing and weight by geo region
# in most recent month
sfo_stats %>%
  filter(activity_period == max(activity_period)) %>%
  group_by(geo_region) %>%
  summarise(total_landing = sum(landing_count),
            total_weight = sum(total_landed_weight),
            .groups = "drop")
```

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