Package 'ggblanket'

March 28, 2024

Title Simplify 'ggplot2' Visualisation

Version 7.0.0

Description Simplify 'ggplot2' visualisation with 'ggblanket' wrapper
functions.

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URL <https://davidhodge931.github.io/ggblanket/>,

<https://github.com/davidhodge931/ggblanket>

BugReports <https://github.com/davidhodge931/ggblanket/issues>

Imports dplyr (>= 1.0.4), farver, forcats, ggplot2 (>= 3.5.0), grid,
hms (>= 0.5.0), lubridate (>= 1.7.8), magrittr, purrr, rlang
(>= 1.1.0), scales (>= 1.3.0), snakecase, stringr (>= 1.3.0),
tidyr (>= 1.0.0), tidyselect (>= 1.2.0), viridisLite (>= 0.4.0)

Suggests hexbin, isoband, knitr, palmerpenguins, patchwork, quantreg,
rmarkdown, sf, testthat (>= 3.0.0), tibble, vdiffr

VignetteBuilder knitr

Config/Needs/website concaveman, corrr, distributional, farver,
geomtextpath, ggbeeswarm, ggblend, ggdensity, ggdist, ggeasy,
ggforce, ggh4x, gghighlight, ggnewscale, ggrepel, ggridges,
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NeedsCompilation no

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R **topics documented:**

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aes_contrast *A colour aesthetic that automatically contrasts with fill.*

Description

A colour aesthetic for annotation that automatically contrasts with fill. Can be spliced into [gg-plot2::aes](#) with [rlang::!!!](#).

Usage

```
aes_contrast(contrast_pal = lightness[2:3])
```

Arguments

contrast_pal   A vector of a dark colour and then a light colour (e.g. greyness[2:3] or
                darkness[1:2]). Defaults to lightness[2:3].

Value

An aesthetic

Examples

```
library(ggplot2)
library(dplyr)
library(stringr)
library(palmerpenguins)

set_blanket()
```

```
penguins |>
  count(species, sex) |>
  gg_col(
    x = sex,
    y = n,
    col = species,
    position = position_dodge2(preserve = "single"),
    width = 0.75,
    x_labels = \(x) str_to_sentence(x),
  ) +
  geom_text(
    mapping = aes(label = n, !!!aes_contrast()),
    position = position_dodge2(width = 0.75, preserve = "single"),
    vjust = 1.33,
    show.legend = FALSE,
  )

penguins |>
  count(species, sex) |>
  gg_col(
    x = n,
    y = sex,
    col = species,
    position = position_dodge2(preserve = "single"),
    width = 0.75,
    y_labels = \(x) str_to_sentence(x),
    mode = dark_mode_r(),
  ) +
  geom_text(
    mapping = aes(label = n, !!!aes_contrast(darkness[1:2])),
    position = position_dodge2(width = 0.75, preserve = "single"),
    hjust = 1.25,
    show.legend = FALSE,
  )
```

blue	*A blue colour*

Description

A blue colour derived from `viridisLite::mako(9)[5]`

Usage

```
blue
```

Format

An object of class `character` of length 1.

Value

A character vector.

Examples

```
scales::show_col(blue)
```

---

darkness   *The* dark_mode_* *theme colours*

Description

A vector of colours used in the dark_mode_* themes.

Usage

```
darkness
```

Format

An object of class character of length 3.

Value

A character vector.

Examples

```
scales::show_col(darkness)
```

---

dark_mode_b   *Dark mode theme with bottom legend*

Description

Dark mode theme for a ggplot visualisation with bottom legend. It uses the colours from darkness.

Usage

```
dark_mode_b(base_size = 11, base_family = "")
```

Arguments

base_size	The base size of the text. Defaults to 11.
base_family	The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = dark_mode_b()
  )
```

---

dark_mode_n   *Dark mode theme with no legend*

Description

Dark mode theme for a ggplot visualisation with no legend. It uses the colours from darkness.

Usage

```
dark_mode_n(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_jitter(
    x = species,
```

```
    y = body_mass_g,
    col = species,
    mode = dark_mode_n()
  )
```

---

dark_mode_r *Dark mode theme with right legend*

Description

Dark mode theme for a ggplot visualisation with legend at right. It uses the colours from `darkness`.

Usage

```
dark_mode_r(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = dark_mode_r()
  )
```

---

dark_mode_t   *Dark mode theme with top legend*

Description

Dark mode theme for a ggplot visualisation with top legend. It uses the colours from `darkness`.

Usage

```
dark_mode_t(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = dark_mode_t()
  )
```

---

gg_area   *Area ggplot*

Description

Create an area ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_area()](#).

Usage

```
gg_area(
  data = NULL,
  ...,
  stat = "align",
  position = "stack",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
  y_limits = NULL,
  y_oob = scales::oob_keep,
  y_position = "left",
  y_title = NULL,
  y_transform = NULL,
  col_breaks = NULL,
  col_expand_limits = NULL,
  col_labels = NULL,
  col_legend_ncol = NULL,
```

```
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks

> A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand

> Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits

> For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

> For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

> The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

> Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

> When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
facet_layout	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

economics |>
  gg_area(
    x = date,
    y = unemploy,
    y_title = "Unemployment",
  )
```

---

gg_bar   *Bar ggplot*

Description

Create a bar ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_bar()](#).

Usage

```
gg_bar(
  data = NULL,
  ...,
  stat = "count",
  position = "stack",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
  y_limits = NULL,
  y_oob = scales::oob_keep,
  y_position = "left",
  y_title = NULL,
  y_transform = NULL,
  col_breaks = NULL,
  col_expand_limits = NULL,
  col_labels = NULL,
  col_legend_ncol = NULL,
```

```
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks

    A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand

    Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits

    For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels

    A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

    For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

    For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

    The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

    Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

    For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

    The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

    Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

    When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

When the facet layout is "grid", whether to switch the facet labels to the oppo-site side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both direc-tions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_bar(
    y = species,
    col = sex,
    position = position_dodge(preserve = "single"),
    width = 0.75,
  )
```

---

gg_bin_2d *Bin_2d ggplot*

Description

Create a bin2d ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_bin_2d()](#).

Usage

```
gg_bin_2d(
  data = NULL,
  ...,
  stat = "bin2d",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
```

```
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will re-

moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
An unquoted aesthetic variable.

mapping   A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand
Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits
For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob
For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position
The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title
Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform
For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow
The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes	Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or ″all_y″.
facet_axis_labels	
	Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.
facet_labels_position	
	When the facet layout is ″wrap″, the position of the facet labels. Either ″top″, ″right″, ″bottom″ or ″left″.
facet_labels_switch	
	When the facet layout is ″grid″, whether to switch the facet labels to the opposite side of the plot. Either ″x″, ″y″ or ″both″.
facet_layout	Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet and facet2 arguments are provided, defaults to ″grid″.
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of ″wrap″.
facet_scales	Whether facet scales should be ″fixed″ across facets, ″free″ in both directions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.
facet_space	When the facet layout is ″grid″ and facet scales are not ″fixed″, whether facet space should be ″fixed″ across facets, ″free″ to be proportional in both directions, or free to be proportional in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

diamonds |>
  gg_bin_2d(
    x = carat,
    y = price,
  )
```

gg_blanket *Blanket ggplot*

Description

Create a blanket ggplot with a wrapper around [ggplot2::ggplot()](#) + layer() with [geom_blank()](#) defaults. This function underlies all other gg_* functions. It contains a geom argument for maximum flexibility.

Usage

```
gg_blanket(
  data = NULL,
  ...,
  geom = "blank",
  stat = "identity",
  position = "identity",
  coord = NULL,
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
```

```
      y_expand = NULL,
      y_expand_limits = NULL,
      y_labels = NULL,
      y_limits = NULL,
      y_oob = scales::oob_keep,
      y_position = "left",
      y_title = NULL,
      y_transform = NULL,
      col_breaks = NULL,
      col_expand_limits = NULL,
      col_labels = NULL,
      col_legend_ncol = NULL,
      col_legend_nrow = NULL,
      col_legend_rev = FALSE,
      col_limits = NULL,
      col_oob = scales::oob_keep,
      col_pal = NULL,
      col_pal_na = "darkgrey",
      col_rescale = scales::rescale(),
      col_steps = FALSE,
      col_title = NULL,
      col_transform = NULL,
      facet_axes = NULL,
      facet_axis_labels = "margins",
      facet_labels = NULL,
      facet_labels_position = "top",
      facet_labels_switch = NULL,
      facet_layout = NULL,
      facet_ncol = NULL,
      facet_nrow = NULL,
      facet_scales = "fixed",
      facet_space = "fixed",
      title = NULL,
      subtitle = NULL,
      caption = NULL,
      titles_to_case = snakecase::to_sentence_case
    )
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`geom`	A geometric object to display the data. A snakecase character string of a ggproto Geom subclass object minus the Geom prefix (e.g. `"point"`).
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*()

function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).

coord
: A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).

mode
: A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
: An unquoted aesthetic variable.

mapping
: A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
: A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.

x_expand, y_expand
: Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

x_expand_limits, y_expand_limits, col_expand_limits
: For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels
: A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).

x_limits, y_limits, col_limits
: For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

x_oob, y_oob, col_oob
: For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position
: The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title
: Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform
: For a continuous scale, a transformation object (e.g. `scales::transform_log10()`) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow
: The number of columns and rows in a legend guide.

col_legend_rev
: `TRUE` or `FALSE` of whether to reverse the elements of a legend guide. Defaults to `FALSE`.

`col_pal`	Colours to use. A character vector of hex codes (or names).
`col_pal_na`	Colour to use for `NA` values. A character vector of a hex code (or name).
`col_rescale`	For a continuous variable, a `scales::rescale()` function.
`col_steps`	For a continuous variable, `TRUE` or `FALSE` of whether to colour in steps. Defaults to `FALSE`.
`facet_axes`	Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.
`facet_axis_labels`	
	Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.
`facet_labels_position`	
	When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.
`facet_labels_switch`	
	When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.
`facet_layout`	Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both facet and facet2 arguments are provided, defaults to `"grid"`.
`facet_ncol, facet_nrow`	
	The number of columns and rows of facet panels. Only applies to a facet layout of `"wrap"`.
`facet_scales`	Whether facet scales should be `"fixed"` across facets, `"free"` in both directions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.
`facet_space`	When the facet layout is `"grid"` and facet scales are not `"fixed"`, whether facet space should be `"fixed"` across facets, `"free"` to be proportional in both directions, or free to be proportional in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.
`title`	Title string.
`subtitle`	Subtitle string.
`caption`	Caption title string.
`titles_to_case`	A function to format unspecified titles_to_case. Defaults to `snakecase::to_sentence_case`.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)


set_blanket()
```

```
penguins |>
  tidyr::drop_na(sex) |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_blanket(
    geom = "violin",
    stat = "ydensity",
    position = "dodge",
    x = sex,
    y = body_mass_g,
    col = sex,
    facet = species,
    mode = grey_mode_b(),
  )
```

---

gg_boxplot   *Boxplot ggplot*

Description

Create a boxplot ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_boxplot()](#).

Usage

```
gg_boxplot(
  data = NULL,
  ...,
  stat = "boxplot",
  position = "dodge2",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
```

```
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
  y_limits = NULL,
  y_oob = scales::oob_keep,
  y_position = "left",
  y_title = NULL,
  y_transform = NULL,
  col_breaks = NULL,
  col_expand_limits = NULL,
  col_labels = NULL,
  col_legend_ncol = NULL,
  col_legend_nrow = NULL,
  col_legend_rev = FALSE,
  col_limits = NULL,
  col_oob = scales::oob_keep,
  col_pal = NULL,
  col_pal_na = "darkgrey",
  col_rescale = scales::rescale(),
  col_steps = FALSE,
  col_title = NULL,
  col_transform = NULL,
  facet_axes = NULL,
  facet_axis_labels = "margins",
  facet_labels = NULL,
  facet_labels_position = "top",
  facet_labels_switch = NULL,
  facet_layout = NULL,
  facet_ncol = NULL,
  facet_nrow = NULL,
  facet_scales = "fixed",
  facet_space = "fixed",
  title = NULL,
  subtitle = NULL,
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
`coord`	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
`mode`	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
`x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample`	An unquoted aesthetic variable.
`mapping`	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
`x_breaks, y_breaks, col_breaks`	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
`x_expand, y_expand`	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
`x_expand_limits, y_expand_limits, col_expand_limits`	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
`x_labels, y_labels, col_labels, facet_labels`	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
`x_limits, y_limits, col_limits`	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
`x_oob, y_oob, col_oob`	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.
`x_position, y_position`	The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.
`x_title, y_title, col_title`	Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. `scales::transform_log10()`) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single facet (or facet2) argument is provided, then defaults to `"wrap"`. If NULL and both facet and facet2 arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of `"wrap"`.

facet_scales   Whether facet scales should be `"fixed"` across facets, `"free"` in both directions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

facet_space   When the facet layout is `"grid"` and facet scales are not `"fixed"`, whether facet space should be `"fixed"` across facets, `"free"` to be proportional in both directions, or free to be proportional in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  tidyr::drop_na(sex) |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_boxplot(
    x = flipper_length_mm,
    y = sex,
    col = species,
    mode = light_mode_b(),
  )
```

---

gg_col   *Col ggplot*

Description

Create a col ggplot with a wrapper around ggplot2::ggplot() + geom_col().

Usage

```
gg_col(
  data = NULL,
  ...,
  stat = "identity",
  position = "stack",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
```

```
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
title = NULL,
subtitle = NULL,
```

```
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
x_oob, y_oob, col_oob	
	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. ″left″, ″right″, ″bottom″ or ″top″).If using
> y_position = ″top″ with a *_mode_* theme, add caption = ″″ or caption =
> ″\n″.

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#))
> or character string of this minus the transform_ prefix (e.g. ″log10″).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
> FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
> to FALSE.

facet_axes   Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or
> ″all_y″.

facet_axis_labels

> Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_labels_position

> When the facet layout is ″wrap″, the position of the facet labels. Either ″top″,
> ″right″, ″bottom″ or ″left″.

facet_labels_switch

> When the facet layout is ″grid″, whether to switch the facet labels to the oppo-
> site side of the plot. Either ″x″, ″y″ or ″both″.

facet_layout   Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or
> facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet
> and facet2 arguments are provided, defaults to ″grid″.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout
> of ″wrap″.

facet_scales   Whether facet scales should be ″fixed″ across facets, ″free″ in both direc-
> tions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to
> ″fixed″.

facet_space   When the facet layout is ″grid″ and facet scales are not ″fixed″, whether
> facet space should be ″fixed″ across facets, ″free″ to be proportional in both
> directions, or free to be proportional in just one direction (i.e. ″free_x″ or
> ″free_y″). Defaults to ″fixed″.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  tidyr::drop_na(sex) |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  group_by(sex, species) |>
  summarise(across(flipper_length_mm, \(x) mean(x, na.rm = TRUE))) |>
  gg_col(
    x = flipper_length_mm,
    y = species,
    col = sex,
    position = position_dodge(preserve = "single"),
    width = 0.75,
  )
```

---

gg_contour   *Contour ggplot*

Description

Create a contour ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_contour()](#).

Usage

```
gg_contour(
  data = NULL,
  ...,
  stat = "contour",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
```

```
        yend = NULL,
        z = NULL,
        col = NULL,
        facet = NULL,
        facet2 = NULL,
        group = NULL,
        subgroup = NULL,
        label = NULL,
        text = NULL,
        sample = NULL,
        mapping = NULL,
        x_breaks = NULL,
        x_expand = NULL,
        x_expand_limits = NULL,
        x_labels = NULL,
        x_limits = NULL,
        x_oob = scales::oob_keep,
        x_position = "bottom",
        x_title = NULL,
        x_transform = NULL,
        y_breaks = NULL,
        y_expand = NULL,
        y_expand_limits = NULL,
        y_labels = NULL,
        y_limits = NULL,
        y_oob = scales::oob_keep,
        y_position = "left",
        y_title = NULL,
        y_transform = NULL,
        col_breaks = NULL,
        col_expand_limits = NULL,
        col_labels = NULL,
        col_legend_ncol = NULL,
        col_legend_nrow = NULL,
        col_legend_rev = FALSE,
        col_limits = NULL,
        col_oob = scales::oob_keep,
        col_pal = NULL,
        col_pal_na = "darkgrey",
        col_rescale = scales::rescale(),
        col_steps = FALSE,
        col_title = NULL,
        col_transform = NULL,
        facet_axes = NULL,
        facet_axis_labels = "margins",
        facet_labels = NULL,
        facet_labels_position = "top",
        facet_labels_switch = NULL,
```

```
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A *_mode_* theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A scales::breaks_* function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale.
> For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand`
> or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values out-
> side of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using
> `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption =`
> `"\n"`.

x_title, y_title, col_title

> Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. scales::transform_log10())
> or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
to FALSE.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or
`"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`,
> `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the oppo-
> site side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or
`facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both facet
and facet2 arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout
> of `"wrap"`.

facet_scales   Whether facet scales should be `"fixed"` across facets, `"free"` in both direc-
tions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to
`"fixed"`.

facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

ggplot2::faithfuld |>
  gg_contour(
    x = waiting,
    y = eruptions,
    z = density,
  )
```

---

gg_contour_filled   *Contour_filled ggplot*

Description

Create a contour_filled ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_contour_filled()](#).

Usage

```
gg_contour_filled(
  data = NULL,
  ...,
  stat = "contour_filled",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
```

```
    xend = NULL,
    y = NULL,
    ymin = NULL,
    ymax = NULL,
    yend = NULL,
    z = NULL,
    col = NULL,
    facet = NULL,
    facet2 = NULL,
    group = NULL,
    subgroup = NULL,
    label = NULL,
    text = NULL,
    sample = NULL,
    mapping = NULL,
    x_breaks = NULL,
    x_expand = NULL,
    x_expand_limits = NULL,
    x_labels = NULL,
    x_limits = NULL,
    x_oob = scales::oob_keep,
    x_position = "bottom",
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
```

```
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. [ggplot2::coord_cartesian()](#)).
mode	A `*_mode_*` theme (e.g. [light_mode_t()](#), [grey_mode_r()](#), or [dark_mode_r()](#)). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in [ggplot2::aes()](#). Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. [scales::breaks_pretty()](#)), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the [ggplot2::expansion()](#) function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or [scales::label_comma()](), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

> For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

> The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [scales::transform_log10()]() or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

> Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

> When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

> When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

faithfuld |>
  gg_contour_filled(
    x = waiting,
    y = eruptions,
    z = density,
    bins = 8,
  )
```

---

gg_crossbar   *Crossbar ggplot*

Description

Create a crossbar ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_crossbar()](#).

Usage

```
gg_crossbar(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
```

```
mode = NULL,
x = NULL,
xmin = NULL,
xmax = NULL,
xend = NULL,
y = NULL,
ymin = NULL,
ymax = NULL,
yend = NULL,
z = NULL,
col = NULL,
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
```

```
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
`coord`	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
`mode`	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
`x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample`	
	An unquoted aesthetic variable.
`mapping`	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
`x_breaks, y_breaks, col_breaks`	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
`x_expand, y_expand`	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

x_expand_limits, y_expand_limits, col_expand_limits

> For a continuous variable, any values that the limits should encompass (e.g. `0`).
> For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or [`scales::label_comma()`](#)), or a vector of labels (Note this must be named for `facet_labels`).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale.
> For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use `+ ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [`scales::transform_log10()`](#)) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   `TRUE` or `FALSE` of whether to reverse the elements of a legend guide. Defaults to `FALSE`.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for `NA` values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, `TRUE` or `FALSE` of whether to colour in steps. Defaults to `FALSE`.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both `facet` and `facet2` arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

>   The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

data.frame(
  trt = factor(c(1, 1, 2, 2)),
  resp = c(1, 5, 3, 4),
  group = factor(c(1, 2, 1, 2)),
  upper = c(1.1, 5.3, 3.3, 4.2),
  lower = c(0.8, 4.6, 2.4, 3.6)) |>
  gg_crossbar(
    x = trt,
    y = resp,
    ymin = lower,
    ymax = upper,
    col = group,
    width = 0.5,
    x_title = "Treatment",
    y_title = "Response",
  )
```

gg_density *Density ggplot*

Description

Create a density ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_density()](#).

Usage

```
gg_density(
  data = NULL,
  ...,
  stat = "density",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
```

```
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. [`ggplot2::coord_cartesian()`](#)).
mode	A `*_mode_*` theme (e.g. [`light_mode_t()`](#), [`grey_mode_r()`](#), or [`dark_mode_r()`](#)). This argument adds the theme with side-effects, as the `gg_*` function will re-

moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
An unquoted aesthetic variable.

mapping   A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand
Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits
For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob
For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position
The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title
Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform
For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow
The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes	Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or ″all_y″.
facet_axis_labels	
	Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.
facet_labels_position	
	When the facet layout is ″wrap″, the position of the facet labels. Either ″top″, ″right″, ″bottom″ or ″left″.
facet_labels_switch	
	When the facet layout is ″grid″, whether to switch the facet labels to the opposite side of the plot. Either ″x″, ″y″ or ″both″.
facet_layout	Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet and facet2 arguments are provided, defaults to ″grid″.
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of ″wrap″.
facet_scales	Whether facet scales should be ″fixed″ across facets, ″free″ in both directions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.
facet_space	When the facet layout is ″grid″ and facet scales are not ″fixed″, whether facet space should be ″fixed″ across facets, ″free″ to be proportional in both directions, or free to be proportional in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  tidyr::drop_na(sex) |>
  gg_density(
    x = flipper_length_mm,
    col = species,
    mode = light_mode_t(),
```

```
)
```

---

gg_density_2d   *Density_2d ggplot*

Description

Create a density_2d ggplot with a wrapper around ggplot2::ggplot() + geom_density_2d().

Usage

```
gg_density_2d(
  data = NULL,
  ...,
  stat = "density_2d",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
```

```
        y_expand = NULL,
        y_expand_limits = NULL,
        y_labels = NULL,
        y_limits = NULL,
        y_oob = scales::oob_keep,
        y_position = "left",
        y_title = NULL,
        y_transform = NULL,
        col_breaks = NULL,
        col_expand_limits = NULL,
        col_labels = NULL,
        col_legend_ncol = NULL,
        col_legend_nrow = NULL,
        col_legend_rev = FALSE,
        col_limits = NULL,
        col_oob = scales::oob_keep,
        col_pal = NULL,
        col_pal_na = "darkgrey",
        col_rescale = scales::rescale(),
        col_steps = FALSE,
        col_title = NULL,
        col_transform = NULL,
        facet_axes = NULL,
        facet_axis_labels = "margins",
        facet_labels = NULL,
        facet_labels_position = "top",
        facet_labels_switch = NULL,
        facet_layout = NULL,
        facet_ncol = NULL,
        facet_nrow = NULL,
        facet_scales = "fixed",
        facet_space = "fixed",
        title = NULL,
        subtitle = NULL,
        caption = NULL,
        titles_to_case = snakecase::to_sentence_case
    )
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).

coord   A coordinate system. A coord_*() function that outputs a constructed ggproto
                 Coord subclass object (e.g. ggplot2::coord_cartesian()).

mode   A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()).
                 This argument adds the theme with side-effects, as the gg_* function will re-
                 moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme
                 on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
                 An unquoted aesthetic variable.

mapping   A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily
                 for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but
                 can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
                 A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector
                 of breaks.

x_expand, y_expand
                 Padding to the limits with the ggplot2::expansion() function, or a vector of
                 length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
                 For a continuous variable, any values that the limits should encompass (e.g. 0).
                 For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
                 A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x)
                 or scales::label_comma()), or a vector of labels (Note this must be named for
                 facet_labels).

x_limits, y_limits, col_limits
                 For a continuous scale, a vector of length 2 to determine the limits of the scale.
                 For a discrete scale, manipulate the data instead with factor, forcats::fct_expand
                 or forcats::fct_drop.

x_oob, y_oob, col_oob
                 For a continuous scale, a scales::oob_* function of how to handle values out-
                 side of limits. Defaults to scales::oob_keep.

x_position, y_position
                 The position of the axis (i.e. "left", "right", "bottom" or "top").If using
                 y_position = "top" with a *_mode_* theme, add caption = "" or caption =
                 "\n".

x_title, y_title, col_title
                 Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform
                 For a continuous scale, a transformation object (e.g. scales::transform_log10())
                 or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow
                 The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
                 FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na	Colour to use for NA values. A character vector of a hex code (or name).
col_rescale	For a continuous variable, a scales::rescale() function.
col_steps	For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.
facet_axes	Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".
facet_axis_labels	
	Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".
facet_labels_position	
	When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".
facet_labels_switch	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
facet_layout	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

faithful |>
  gg_density_2d(
```

```
  x = waiting,
  y = eruptions,
  bins = 8,
)
```

---

gg_density_2d_filled   *Density_2d_filled ggplot*

Description

Create a density_2d_filled ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_density_2d_filled()](#).

Usage

```
gg_density_2d_filled(
  data = NULL,
  ...,
  stat = "density_2d_filled",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
```

```
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position sub-

	class object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.
x_oob, y_oob, col_oob	
	For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.
x_position, y_position	
	The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".
x_title, y_title, col_title	
	Axis title string. Use + ggplot2::labs(... = NULL) for no title.
x_transform, y_transform, col_transform	
	For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").
col_legend_ncol, col_legend_nrow	
	The number of columns and rows in a legend guide.
col_legend_rev	TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal	Colours to use. A character vector of hex codes (or names).
col_pal_na	Colour to use for NA values. A character vector of a hex code (or name).
col_rescale	For a continuous variable, a scales::rescale() function.
col_steps	For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.
facet_axes	Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".
facet_axis_labels	
	Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".
facet_labels_position	
	When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".
facet_labels_switch	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
facet_layout	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()
```

```
faithful |>
  gg_density_2d_filled(
    x = waiting,
    y = eruptions,
    bins = 8,
  )
```

---

gg_errorbar   *Errorbar ggplot*

Description

Create a errorbar ggplot with a wrapper around ggplot2::ggplot() + geom_errorbar().

Usage

```
gg_errorbar(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
```

```
    x_oob = scales::oob_keep,
    x_position = "bottom",
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a

	ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
x_oob, y_oob, col_oob	
	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.
x_position, y_position	
	The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.
x_title, y_title, col_title	
	Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.
x_transform, y_transform, col_transform	
	For a continuous scale, a transformation object (e.g. `scales::transform_log10()`) or character string of this minus the `transform_` prefix (e.g. `"log10"`).
col_legend_ncol, col_legend_nrow	
	The number of columns and rows in a legend guide.

`col_legend_rev`	TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.
`col_pal`	Colours to use. A character vector of hex codes (or names).
`col_pal_na`	Colour to use for NA values. A character vector of a hex code (or name).
`col_rescale`	For a continuous variable, a `scales::rescale()` function.
`col_steps`	For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.
`facet_axes`	Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".
`facet_axis_labels`	
	Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".
`facet_labels_position`	
	When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".
`facet_labels_switch`	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
`facet_layout`	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
`facet_ncol, facet_nrow`	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
`facet_scales`	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
`facet_space`	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
`title`	Title string.
`subtitle`	Subtitle string.
`caption`	Caption title string.
`titles_to_case`	A function to format unspecified titles_to_case. Defaults to `snakecase::to_sentence_case`.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)
```

```
set_blanket()

data.frame(
  trt = factor(c(1, 1, 2, 2)),
  resp = c(1, 5, 3, 4),
  group = factor(c(1, 2, 1, 2)),
  upper = c(1.1, 5.3, 3.3, 4.2),
  lower = c(0.8, 4.6, 2.4, 3.6)
) |>
  gg_errorbar(
    x = trt,
    ymin = lower,
    ymax = upper,
    col = group,
    width = 0.1,
    x_title = "Treatment",
    y_title = "Response",
  )
```

gg_freqpoly   *Freqpoly ggplot*

Description

Create a freqpoly ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_freqpoly()](#).

Usage

```
gg_freqpoly(
  data = NULL,
  ...,
  stat = "bin",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
```

```
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
```

```
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
x_oob, y_oob, col_oob	
	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. ″left″, ″right″, ″bottom″ or ″top″).If using y_position = ″top″ with a *_mode_* theme, add caption = ″″ or caption = ″\n″.

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#) or character string of this minus the transform_ prefix (e.g. ″log10″).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_axis_labels

> Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_labels_position

> When the facet layout is ″wrap″, the position of the facet labels. Either ″top″, ″right″, ″bottom″ or ″left″.

facet_labels_switch

> When the facet layout is ″grid″, whether to switch the facet labels to the opposite side of the plot. Either ″x″, ″y″ or ″both″.

facet_layout   Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet and facet2 arguments are provided, defaults to ″grid″.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of ″wrap″.

facet_scales   Whether facet scales should be ″fixed″ across facets, ″free″ in both directions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.

facet_space   When the facet layout is ″grid″ and facet scales are not ″fixed″, whether facet space should be ″fixed″ across facets, ″free″ to be proportional in both directions, or free to be proportional in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_freqpoly(
    x = flipper_length_mm,
    col = sex,
    col_title = "",
    mode = light_mode_t(),
  )
```

---

gg_function   *Function ggplot*

Description

Create a function ggplot with a wrapper around ggplot2::ggplot() + geom_function().

Usage

```
gg_function(
  data = NULL,
  ...,
  stat = "function",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
```

```
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
```

```
  facet_space = "fixed",
  title = NULL,
  subtitle = NULL,
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
x_oob, y_oob, col_oob	
	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

> Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

> When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

> When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

gg_function(
  fun = \(x) dnorm(x, mean = 0, sd = 5),
  x_limits = qnorm(p = c(0.005, 0.995), mean = 0, sd = 5),
  y_expand_limits = 0,
)
```

gg_hex   *Hex ggplot*

Description

Create a hex ggplot with a wrapper around ggplot2::ggplot() + geom_hex().

Usage

```
gg_hex(
  data = NULL,
  ...,
  stat = "binhex",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
```

```
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
title = NULL,
subtitle = NULL,
caption = NULL,
```

```
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A *_mode_* theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
x_limits, y_limits, col_limits	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
x_oob, y_oob, col_oob	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.
x_position, y_position	The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a *_mode_* theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

        Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

        For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

        The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

        Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

        When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

        When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

        The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

diamonds |>
  gg_hex(
    x = carat,
    y = price,
    coord = coord_cartesian(clip = "on"),
    y_limits = c(0, 20000),
  )
```

---

gg_histogram   *Histogram ggplot*

Description

Create a histogram ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_histogram()](#).

Usage

```
gg_histogram(
  data = NULL,
  ...,
  stat = "bin",
  position = "stack",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
```

```
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
title = NULL,
subtitle = NULL,
caption = NULL,
titles_to_case = snakecase::to_sentence_case
```

)

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
: An unquoted aesthetic variable.

mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
: A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand
: Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
: For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
: A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits
: For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob
: For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position
: The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

>   Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

>   For a continuous scale, a transformation object (e.g. scales::transform_log10())
>   or character string of this minus the transform_ prefix (e.g. ″log10″).

col_legend_ncol, col_legend_nrow

>   The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
>   FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
>   to FALSE.

facet_axes   Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or
>   ″all_y″.

facet_axis_labels

>   Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_labels_position

>   When the facet layout is ″wrap″, the position of the facet labels. Either ″top″,
>   ″right″, ″bottom″ or ″left″.

facet_labels_switch

>   When the facet layout is ″grid″, whether to switch the facet labels to the oppo-
>   site side of the plot. Either ″x″, ″y″ or ″both″.

facet_layout   Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or
>   facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet
>   and facet2 arguments are provided, defaults to ″grid″.

facet_ncol, facet_nrow

>   The number of columns and rows of facet panels. Only applies to a facet layout
>   of ″wrap″.

facet_scales   Whether facet scales should be ″fixed″ across facets, ″free″ in both direc-
>   tions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to
>   ″fixed″.

facet_space   When the facet layout is ″grid″ and facet scales are not ″fixed″, whether
>   facet space should be ″fixed″ across facets, ″free″ to be proportional in both
>   directions, or free to be proportional in just one direction (i.e. ″free_x″ or
>   ″free_y″). Defaults to ″fixed″.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

>   A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_histogram(
    x = flipper_length_mm,
    col = sex,
    facet = species,
    bins = 50,
    mode = light_mode_b(),
  )
```

---

gg_jitter   *Jitter ggplot*

Description

Create a jitter ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_jitter()](#).

Usage

```
gg_jitter(
  data = NULL,
  ...,
  stat = "identity",
  position = "jitter",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
```

```
    label = NULL,
    text = NULL,
    sample = NULL,
    mapping = NULL,
    x_breaks = NULL,
    x_expand = NULL,
    x_expand_limits = NULL,
    x_labels = NULL,
    x_limits = NULL,
    x_oob = scales::oob_keep,
    x_position = "bottom",
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
```

```
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
`coord`	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
`mode`	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
`x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample`	An unquoted aesthetic variable.
`mapping`	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
`x_breaks, y_breaks, col_breaks`	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
`x_expand, y_expand`	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
`x_expand_limits, y_expand_limits, col_expand_limits`	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
`x_labels, y_labels, col_labels, facet_labels`	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
`x_limits, y_limits, col_limits`	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
`x_oob, y_oob, col_oob`	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

    The position of the axis (i.e. ″left″, ″right″, ″bottom″ or ″top″).If using
    y_position = ″top″ with a *_mode_* theme, add caption = ″″ or caption =
    ″\n″.

x_title, y_title, col_title

    Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

    For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#))
    or character string of this minus the transform_ prefix (e.g. ″log10″).

col_legend_ncol, col_legend_nrow

    The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
    FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
    to FALSE.

facet_axes   Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or
    ″all_y″.

facet_axis_labels

    Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_labels_position

    When the facet layout is ″wrap″, the position of the facet labels. Either ″top″,
    ″right″, ″bottom″ or ″left″.

facet_labels_switch

    When the facet layout is ″grid″, whether to switch the facet labels to the oppo-
    site side of the plot. Either ″x″, ″y″ or ″both″.

facet_layout   Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or
    facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet
    and facet2 arguments are provided, defaults to ″grid″.

facet_ncol, facet_nrow

    The number of columns and rows of facet panels. Only applies to a facet layout
    of ″wrap″.

facet_scales   Whether facet scales should be ″fixed″ across facets, ″free″ in both direc-
    tions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to
    ″fixed″.

facet_space   When the facet layout is ″grid″ and facet scales are not ″fixed″, whether
    facet space should be ″fixed″ across facets, ″free″ to be proportional in both
    directions, or free to be proportional in just one direction (i.e. ″free_x″ or
    ″free_y″). Defaults to ″fixed″.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

set.seed(123)

penguins |>
  gg_jitter(
    x = species,
    y = body_mass_g,
    col = flipper_length_mm,
    position = position_jitter(height = 0),
    y_expand_limits = 0,
    col_steps = TRUE,
  )
```

---

gg_label   *Label ggplot*

Description

Create a label ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_label()](#).

Usage

```
gg_label(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
```

```
z = NULL,
col = NULL,
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
```

```
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [`scales::transform_log10()`](scales::transform_log10())) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   `TRUE` or `FALSE` of whether to reverse the elements of a legend guide. Defaults to `FALSE`.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for `NA` values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, `TRUE` or `FALSE` of whether to colour in steps. Defaults to `FALSE`.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both facet and facet2 arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of `"wrap"`.

facet_scales   Whether facet scales should be `"fixed"` across facets, `"free"` in both directions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

facet_space   When the facet layout is `"grid"` and facet scales are not `"fixed"`, whether facet space should be `"fixed"` across facets, `"free"` to be proportional in both directions, or free to be proportional in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

`title`	Title string.
`subtitle`	Subtitle string.
`caption`	Caption title string.
`titles_to_case`	A function to format unspecified titles_to_case. Defaults to `snakecase::to_sentence_case`.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

bind_rows(
  mtcars |> slice_min(order_by = mpg),
  mtcars |> slice_max(order_by = mpg)) |>
  tibble::rownames_to_column("model") |>
  gg_label(
    x = model,
    y = mpg,
    col = mpg,
    label = model,
    y_expand_limits = 0,
    y_title = "Miles per gallon",
    col_pal = c(orange, "white", teal),
  )
```

---

gg_line   *Line ggplot*

Description

Create a line ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_line()](#).

Usage

```
gg_line(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
```

```
xmin = NULL,
xmax = NULL,
xend = NULL,
y = NULL,
ymin = NULL,
ymax = NULL,
yend = NULL,
z = NULL,
col = NULL,
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
```

```
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A *_mode_* theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

        A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or [`scales::label_comma()`](#)), or a vector of labels (Note this must be named for `facet_labels`).

x_limits, y_limits, col_limits

        For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

x_oob, y_oob, col_oob

        For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

        The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

        Axis title string. Use `+ ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

        For a continuous scale, a transformation object (e.g. [`scales::transform_log10()`](#)) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

        The number of columns and rows in a legend guide.

col_legend_rev   `TRUE` or `FALSE` of whether to reverse the elements of a legend guide. Defaults to `FALSE`.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for `NA` values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, `TRUE` or `FALSE` of whether to colour in steps. Defaults to `FALSE`.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

        Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

        When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

        When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both facet and facet2 arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

        The number of columns and rows of facet panels. Only applies to a facet layout of `"wrap"`.

facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

economics |>
  gg_line(
    x = date,
    y = unemploy,
    y_expand_limits = 0,
    y_title = "Unemployment",
  )
```

---

gg_linerange   *Linerange ggplot*

Description

Create a linerange ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_linerange()](#).

Usage

```
gg_linerange(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
```

```
mode = NULL,
x = NULL,
xmin = NULL,
xmax = NULL,
xend = NULL,
y = NULL,
ymin = NULL,
ymax = NULL,
yend = NULL,
z = NULL,
col = NULL,
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
```

```
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

x_expand_limits, y_expand_limits, col_expand_limits

> For a continuous variable, any values that the limits should encompass (e.g. `0`).
> For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)`
> or [`scales::label_comma()`](#)), or a vector of labels (Note this must be named for
> `facet_labels`).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale.
> For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand`
> or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values out-
> side of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using
> `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use `+ ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [`scales::transform_log10()`](#))
> or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
> FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for `NA` values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
> to FALSE.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or
> `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`,
> `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the oppo-
> site side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or
> `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both `facet`
> and `facet2` arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

      The number of columns and rows of facet panels. Only applies to a facet layout
      of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both direc-
      tions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to
      "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether
      facet space should be "fixed" across facets, "free" to be proportional in both
      directions, or free to be proportional in just one direction (i.e. "free_x" or
      "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

data.frame(
  trt = factor(c(1, 1, 2, 2)),
  resp = c(1, 5, 3, 4),
  group = factor(c(1, 2, 1, 2)),
  upper = c(1.1, 5.3, 3.3, 4.2),
  lower = c(0.8, 4.6, 2.4, 3.6)) |>
  gg_linerange(
    x = trt,
    ymin = lower,
    ymax = upper,
    col = group,
    position = position_dodge(width = 0.2),
    x_title = "Treatment",
    y_title = "Response",
  )
```

gg_path	*Path ggplot*

Description

Create a path ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_path()](#).

Usage

```
gg_path(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
```

```
        y_limits = NULL,
        y_oob = scales::oob_keep,
        y_position = "left",
        y_title = NULL,
        y_transform = NULL,
        col_breaks = NULL,
        col_expand_limits = NULL,
        col_labels = NULL,
        col_legend_ncol = NULL,
        col_legend_nrow = NULL,
        col_legend_rev = FALSE,
        col_limits = NULL,
        col_oob = scales::oob_keep,
        col_pal = NULL,
        col_pal_na = "darkgrey",
        col_rescale = scales::rescale(),
        col_steps = FALSE,
        col_title = NULL,
        col_transform = NULL,
        facet_axes = NULL,
        facet_axis_labels = "margins",
        facet_labels = NULL,
        facet_labels_position = "top",
        facet_labels_switch = NULL,
        facet_layout = NULL,
        facet_ncol = NULL,
        facet_nrow = NULL,
        facet_scales = "fixed",
        facet_space = "fixed",
        title = NULL,
        subtitle = NULL,
        caption = NULL,
        titles_to_case = snakecase::to_sentence_case
    )
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. [ggplot2::coord_cartesian()](#)).
mode	A `*_mode_*` theme (e.g. [light_mode_t()](#), [grey_mode_r()](#), or [dark_mode_r()](#)). This argument adds the theme with side-effects, as the `gg_*` function will re-

	moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in [ggplot2::aes()](). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A scales::breaks_* function (e.g. [scales::breaks_pretty()]()), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the [ggplot2::expansion()]() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or [scales::label_comma()]()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.
x_oob, y_oob, col_oob	For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.
x_position, y_position	The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".
x_title, y_title, col_title	Axis title string. Use + ggplot2::labs(... = NULL) for no title.
x_transform, y_transform, col_transform	For a continuous scale, a transformation object (e.g. [scales::transform_log10()]()) or character string of this minus the transform_ prefix (e.g. "log10").
col_legend_ncol, col_legend_nrow	The number of columns and rows in a legend guide.
col_legend_rev	TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.
col_pal	Colours to use. A character vector of hex codes (or names).
col_pal_na	Colour to use for NA values. A character vector of a hex code (or name).
col_rescale	For a continuous variable, a scales::rescale() function.
col_steps	For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes	Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".
facet_axis_labels	
	Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".
facet_labels_position	
	When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".
facet_labels_switch	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
facet_layout	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

economics |>
  mutate(unemploy_rate = unemploy / pop) |>
  gg_path(
    x = unemploy_rate,
    y = psavert,
    x_title = "Unemployment rate",
    y_expand_limits = 0,
    y_title = "Personal savings rate",
```

```
)
```

---

gg_point   *Point ggplot*

Description

Create a point ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_point()](#).

Usage

```
gg_point(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
```

```
      y_expand = NULL,
      y_expand_limits = NULL,
      y_labels = NULL,
      y_limits = NULL,
      y_oob = scales::oob_keep,
      y_position = "left",
      y_title = NULL,
      y_transform = NULL,
      col_breaks = NULL,
      col_expand_limits = NULL,
      col_labels = NULL,
      col_legend_ncol = NULL,
      col_legend_nrow = NULL,
      col_legend_rev = FALSE,
      col_limits = NULL,
      col_oob = scales::oob_keep,
      col_pal = NULL,
      col_pal_na = "darkgrey",
      col_rescale = scales::rescale(),
      col_steps = FALSE,
      col_title = NULL,
      col_transform = NULL,
      facet_axes = NULL,
      facet_axis_labels = "margins",
      facet_labels = NULL,
      facet_labels_position = "top",
      facet_labels_switch = NULL,
      facet_layout = NULL,
      facet_ncol = NULL,
      facet_nrow = NULL,
      facet_scales = "fixed",
      facet_space = "fixed",
      title = NULL,
      subtitle = NULL,
      caption = NULL,
      titles_to_case = snakecase::to_sentence_case
    )
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).

coord   A coordinate system. A coord_*() function that outputs a constructed ggproto
                           Coord subclass object (e.g. ggplot2::coord_cartesian()).

mode   A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()).
                           This argument adds the theme with side-effects, as the gg_* function will re-
                           moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme
                           on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
                           An unquoted aesthetic variable.

mapping   A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily
                           for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but
                           can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
                           A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector
                           of breaks.

x_expand, y_expand
                           Padding to the limits with the ggplot2::expansion() function, or a vector of
                           length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
                           For a continuous variable, any values that the limits should encompass (e.g. 0).
                           For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
                           A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x)
                           or scales::label_comma()), or a vector of labels (Note this must be named for
                           facet_labels).

x_limits, y_limits, col_limits
                           For a continuous scale, a vector of length 2 to determine the limits of the scale.
                           For a discrete scale, manipulate the data instead with factor, forcats::fct_expand
                           or forcats::fct_drop.

x_oob, y_oob, col_oob
                           For a continuous scale, a scales::oob_* function of how to handle values out-
                           side of limits. Defaults to scales::oob_keep.

x_position, y_position
                           The position of the axis (i.e. "left", "right", "bottom" or "top").If using
                           y_position = "top" with a *_mode_* theme, add caption = "" or caption =
                           "\n".

x_title, y_title, col_title
                           Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform
                           For a continuous scale, a transformation object (e.g. scales::transform_log10())
                           or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow
                           The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
                           FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
                    to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or
                    "all_y".

facet_axis_labels
                    Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position
                    When the facet layout is "wrap", the position of the facet labels. Either "top",
                    "right", "bottom" or "left".

facet_labels_switch
                    When the facet layout is "grid", whether to switch the facet labels to the oppo-
                    site side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or
                    facet2) argument is provided, then defaults to "wrap". If NULL and both facet
                    and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow
                    The number of columns and rows of facet panels. Only applies to a facet layout
                    of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both direc-
                    tions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to
                    "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether
                    facet space should be "fixed" across facets, "free" to be proportional in both
                    directions, or free to be proportional in just one direction (i.e. "free_x" or
                    "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
```

```
gg_point(
  x = flipper_length_mm,
  y = body_mass_g,
  col = sex,
)
```

---

gg_pointrange   *Pointrange ggplot*

Description

Create a pointrange ggplot with a wrapper around ggplot2::ggplot() + geom_pointrange().

Usage

```
gg_pointrange(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
```

```
    x_position = "bottom",
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).

position	A position adjustment. A snakecase character string of a ggproto Position sub-class object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will re-moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.

`x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample`
> An unquoted aesthetic variable.

mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.

`x_breaks, y_breaks, col_breaks`
> A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.

`x_expand, y_expand`
> Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

`x_expand_limits, y_expand_limits, col_expand_limits`
> For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

`x_labels, y_labels, col_labels, facet_labels`
> A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).

`x_limits, y_limits, col_limits`
> For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

`x_oob, y_oob, col_oob`
> For a continuous scale, a `scales::oob_*` function of how to handle values out-side of limits. Defaults to `scales::oob_keep`.

`x_position, y_position`
> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

`x_title, y_title, col_title`
> Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

`x_transform, y_transform, col_transform`
> For a continuous scale, a transformation object (e.g. `scales::transform_log10()`) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

`col_legend_ncol, col_legend_nrow`
> The number of columns and rows in a legend guide.

col_legend_rev	TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.
col_pal	Colours to use. A character vector of hex codes (or names).
col_pal_na	Colour to use for NA values. A character vector of a hex code (or name).
col_rescale	For a continuous variable, a scales::rescale() function.
col_steps	For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.
facet_axes	Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".
facet_axis_labels	
	Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".
facet_labels_position	
	When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".
facet_labels_switch	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
facet_layout	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()
```

```
data.frame(
  trt = factor(c(1, 1, 2, 2)),
  resp = c(1, 5, 3, 4),
  group = factor(c(1, 2, 1, 2)),
  upper = c(1.1, 5.3, 3.3, 4.2),
  lower = c(0.8, 4.6, 2.4, 3.6)) |>
  gg_pointrange(
    x = trt,
    y = resp,
    col = group,
    ymin = lower,
    ymax = upper,
    position = position_dodge(width = 0.2),
    x_title = "Treatment",
    y_title = "Response",
  )
```

gg_polygon   *Polygon ggplot*

Description

Create a polygon ggplot with a wrapper around ggplot2::ggplot() + geom_polygon().

Usage

```
gg_polygon(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
```

```
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
  y_limits = NULL,
  y_oob = scales::oob_keep,
  y_position = "left",
  y_title = NULL,
  y_transform = NULL,
  col_breaks = NULL,
  col_expand_limits = NULL,
  col_labels = NULL,
  col_legend_ncol = NULL,
  col_legend_nrow = NULL,
  col_legend_rev = FALSE,
  col_limits = NULL,
  col_oob = scales::oob_keep,
  col_pal = NULL,
  col_pal_na = "darkgrey",
  col_rescale = scales::rescale(),
  col_steps = FALSE,
  col_title = NULL,
  col_transform = NULL,
  facet_axes = NULL,
  facet_axis_labels = "margins",
  facet_labels = NULL,
  facet_labels_position = "top",
  facet_labels_switch = NULL,
  facet_layout = NULL,
  facet_ncol = NULL,
  facet_nrow = NULL,
  facet_scales = "fixed",
  facet_space = "fixed",
  title = NULL,
```

```
  subtitle = NULL,
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.
x_oob, y_oob, col_oob	For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

> The position of the axis (i.e. "left", "right", "bottom" or "top").If using
> y_position = "top" with a *_mode_* theme, add caption = "" or caption =
> "\n".

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. scales::transform_log10())
> or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
                FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
                to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or
                "all_y".

facet_axis_labels

> Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

> When the facet layout is "wrap", the position of the facet labels. Either "top",
> "right", "bottom" or "left".

facet_labels_switch

> When the facet layout is "grid", whether to switch the facet labels to the oppo-
> site side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or
                facet2) argument is provided, then defaults to "wrap". If NULL and both facet
                and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout
> of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both direc-
                tions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to
                "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether
                facet space should be "fixed" across facets, "free" to be proportional in both
                directions, or free to be proportional in just one direction (i.e. "free_x" or
                "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

ids <- factor(c("1.1", "2.1", "1.2", "2.2", "1.3", "2.3"))

values <- data.frame(
  id = ids,
  value = c(3, 3.1, 3.1, 3.2, 3.15, 3.5)
)

positions <- data.frame(
  id = rep(ids, each = 4),
  x = c(2, 1, 1.1, 2.2, 1, 0, 0.3, 1.1, 2.2, 1.1, 1.2, 2.5, 1.1, 0.3,
        0.5, 1.2, 2.5, 1.2, 1.3, 2.7, 1.2, 0.5, 0.6, 1.3),
  y = c(-0.5, 0, 1, 0.5, 0, 0.5, 1.5, 1, 0.5, 1, 2.1, 1.7, 1, 1.5,
        2.2, 2.1, 1.7, 2.1, 3.2, 2.8, 2.1, 2.2, 3.3, 3.2)
)

datapoly <- merge(values, positions, by = c("id"))

datapoly |>
  gg_polygon(
    x = x,
    y = y,
    col = value,
    group = id,
  )
```

---

gg_qq   *Qq ggplot*

Description

Create a qq ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_qq()](#).

Usage

```
gg_qq(
  data = NULL,
  ...,
  stat = "qq",
```

```
position = "identity",
coord = ggplot2::coord_cartesian(clip = "off"),
mode = NULL,
x = NULL,
xmin = NULL,
xmax = NULL,
xend = NULL,
y = NULL,
ymin = NULL,
ymax = NULL,
yend = NULL,
z = NULL,
col = NULL,
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
```

```
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

x_expand_limits, y_expand_limits, col_expand_limits

> For a continuous variable, any values that the limits should encompass (e.g. `0`).
> For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or [`scales::label_comma()`](#)), or a vector of labels (Note this must be named for `facet_labels`).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale.
> For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [`scales::transform_log10()`](#)) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both `facet` and `facet2` arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of ″wrap″.

facet_scales   Whether facet scales should be ″fixed″ across facets, ″free″ in both directions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.

facet_space   When the facet layout is ″grid″ and facet scales are not ″fixed″, whether facet space should be ″fixed″ across facets, ″free″ to be proportional in both directions, or free to be proportional in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  gg_qq(
    sample = body_mass_g,
    facet = species,
    coord = coord_cartesian(clip = ″on″),
  ) +
  geom_qq_line(
    colour = blue,
  )
```

---

gg_quantile   *Quantile ggplot*

Description

Create an quantile ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_quantile()](#).

Usage

```
gg_quantile(
  data = NULL,
  ...,
  stat = "quantile",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
  y_limits = NULL,
  y_oob = scales::oob_keep,
  y_position = "left",
  y_title = NULL,
  y_transform = NULL,
  col_breaks = NULL,
  col_expand_limits = NULL,
  col_labels = NULL,
  col_legend_ncol = NULL,
```

```
      col_legend_nrow = NULL,
      col_legend_rev = FALSE,
      col_limits = NULL,
      col_oob = scales::oob_keep,
      col_pal = NULL,
      col_pal_na = "darkgrey",
      col_rescale = scales::rescale(),
      col_steps = FALSE,
      col_title = NULL,
      col_transform = NULL,
      facet_axes = NULL,
      facet_axis_labels = "margins",
      facet_labels = NULL,
      facet_labels_position = "top",
      facet_labels_switch = NULL,
      facet_layout = NULL,
      facet_ncol = NULL,
      facet_nrow = NULL,
      facet_scales = "fixed",
      facet_space = "fixed",
      title = NULL,
      subtitle = NULL,
      caption = NULL,
      titles_to_case = snakecase::to_sentence_case
    )
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. [ggplot2::coord_cartesian()]).
mode	A *_mode_* theme (e.g. [light_mode_t()], [grey_mode_r()], or [dark_mode_r()]). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in [ggplot2::aes()]. Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks

> A scales::breaks_* function (e.g. `scales::breaks_pretty()`), or a vector of breaks.

x_expand, y_expand

> Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

x_expand_limits, y_expand_limits, col_expand_limits

> For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. `scales::transform_log10()`) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is "grid", whether to switch the facet labels to the oppo-site side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both direc-tions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
if (requireNamespace("quantreg", quietly = TRUE)) {
  library(ggplot2)
  library(palmerpenguins)

  set_blanket()

  penguins |>
    gg_quantile(
      x = flipper_length_mm,
      y = body_mass_g,
    )
}
```

---

gg_raster *Raster ggplot*

Description

Create a raster ggplot with a wrapper around `ggplot2::ggplot()` + `geom_raster()`.

Usage

```
gg_raster(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
```

```
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a `params` list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. [`ggplot2::coord_cartesian()`](#)).
mode	A `*_mode_*` theme (e.g. [`light_mode_t()`](#), [`grey_mode_r()`](#), or [`dark_mode_r()`](#)). This argument adds the theme with side-effects, as the `gg_*` function will re-

moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme
on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
An unquoted aesthetic variable.

mapping   A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily
                        for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but
                        can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
                        A scales::breaks_* function (e.g. `scales::breaks_pretty()`), or a vector
                        of breaks.

x_expand, y_expand
                        Padding to the limits with the `ggplot2::expansion()` function, or a vector of
                        length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
                        For a continuous variable, any values that the limits should encompass (e.g. 0).
                        For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
                        A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x)
                        or `scales::label_comma()`), or a vector of labels (Note this must be named for
                        facet_labels).

x_limits, y_limits, col_limits
                        For a continuous scale, a vector of length 2 to determine the limits of the scale.
                        For a discrete scale, manipulate the data instead with factor, forcats::fct_expand
                        or forcats::fct_drop.

x_oob, y_oob, col_oob
                        For a continuous scale, a scales::oob_* function of how to handle values out-
                        side of limits. Defaults to scales::oob_keep.

x_position, y_position
                        The position of the axis (i.e. "left", "right", "bottom" or "top").If using
                        y_position = "top" with a *_mode_* theme, add caption = "" or caption =
                        "\n".

x_title, y_title, col_title
                        Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform
                        For a continuous scale, a transformation object (e.g. `scales::transform_log10()`)
                        or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow
                        The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
                        FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
                        to FALSE.

facet_axes	Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".
facet_axis_labels	
	Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".
facet_labels_position	
	When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".
facet_labels_switch	
	When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".
facet_layout	Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".
facet_scales	Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
facet_space	When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

faithfuld |>
  gg_raster(
    x = waiting,
    y = eruptions,
    col = density,
  )
```

gg_rect   *Rect ggplot*

Description

Create a rect ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_rect()](#).

Usage

```
gg_rect(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
```

```
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will re-

moves selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme
on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample
An unquoted aesthetic variable.

mapping   A set of additional aesthetic mappings in [ggplot2::aes()](). Intended primarily
                           for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but
                           can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks
                           A scales::breaks_* function (e.g. [scales::breaks_pretty()]()), or a vector
                           of breaks.

x_expand, y_expand
                           Padding to the limits with the [ggplot2::expansion()]() function, or a vector of
                           length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits
                           For a continuous variable, any values that the limits should encompass (e.g. 0).
                           For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels
                           A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x)
                           or [scales::label_comma()]()), or a vector of labels (Note this must be named for
                           facet_labels).

x_limits, y_limits, col_limits
                           For a continuous scale, a vector of length 2 to determine the limits of the scale.
                           For a discrete scale, manipulate the data instead with factor, forcats::fct_expand
                           or forcats::fct_drop.

x_oob, y_oob, col_oob
                           For a continuous scale, a scales::oob_* function of how to handle values out-
                           side of limits. Defaults to scales::oob_keep.

x_position, y_position
                           The position of the axis (i.e. "left", "right", "bottom" or "top").If using
                           y_position = "top" with a *_mode_* theme, add caption = "" or caption =
                           "\n".

x_title, y_title, col_title
                           Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform
                           For a continuous scale, a transformation object (e.g. [scales::transform_log10()]())
                           or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow
                           The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
                           FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
                           to FALSE.

facet_axes	Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or ″all_y″.
facet_axis_labels	
	Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.
facet_labels_position	
	When the facet layout is ″wrap″, the position of the facet labels. Either ″top″, ″right″, ″bottom″ or ″left″.
facet_labels_switch	
	When the facet layout is ″grid″, whether to switch the facet labels to the opposite side of the plot. Either ″x″, ″y″ or ″both″.
facet_layout	Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet and facet2 arguments are provided, defaults to ″grid″.
facet_ncol, facet_nrow	
	The number of columns and rows of facet panels. Only applies to a facet layout of ″wrap″.
facet_scales	Whether facet scales should be ″fixed″ across facets, ″free″ in both directions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.
facet_space	When the facet layout is ″grid″ and facet scales are not ″fixed″, whether facet space should be ″fixed″ across facets, ″free″ to be proportional in both directions, or free to be proportional in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.
title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

data.frame(
  x = rep(c(2, 5, 7, 9, 12), 2),
  y = rep(c(1, 2), each = 5),
  z = factor(c(rep(1:3, each = 3), 4)),
  w = rep(diff(c(0, 4, 6, 8, 10, 14)), 2)) |>
  mutate(
    xmin = x - w / 2,
    xmax = x + w / 2,
```

```
    ymin = y,
    ymax = y + 1
) |>
gg_rect(
  xmin = xmin,
  xmax = xmax,
  ymin = ymin,
  ymax = ymax,
  col = z,
)
```

---

gg_ribbon   *Ribbon ggplot*

Description

Create a ribbon ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_ribbon()](#)

Usage

```
gg_ribbon(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
```

```
    x_expand_limits = NULL,
    x_labels = NULL,
    x_limits = NULL,
    x_oob = scales::oob_keep,
    x_position = "bottom",
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data   A data frame or tibble.

...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.

x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample

An unquoted aesthetic variable.

mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks

A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand

Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits

For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels

A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

      The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

      Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

      When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

      When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

      The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

data.frame(year = 1875:1972, level = as.vector(LakeHuron)) |>
  mutate(level_min = level - 1, level_max = level + 1) |>
  gg_ribbon(
    x = year,
    ymin = level_min,
    ymax = level_max,
    colour = NA,
    x_labels = \(x) x,
    y_title = "Level",
  ) +
  geom_line(
    mapping = aes(y = level),
  )
```

---

gg_rug   *Rug ggplot*

Description

Create a rug ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_rug()](#).

Usage

```
gg_rug(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
```

```
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
```

```
  facet_space = "fixed",
  title = NULL,
  subtitle = NULL,
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.
x_oob, y_oob, col_oob	
	For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

> The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

> Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

> When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

> When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_rug(
    x = flipper_length_mm,
    y = body_mass_g,
    col = sex,
  )
```

---

gg_segment   *Segment ggplot*

Description

Create a segment ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_segment()](#).

Usage

```
gg_segment(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
```

```
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
```

```
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A *_mode_* theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
x_limits, y_limits, col_limits	
	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
x_oob, y_oob, col_oob	
	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. ″left″, ″right″, ″bottom″ or ″top″).If using
> y_position = ″top″ with a *_mode_* theme, add caption = ″″ or caption =
> ″\n″.

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#)）
> or character string of this minus the transform_ prefix (e.g. ″log10″).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
FALSE.

col_pal Colours to use. A character vector of hex codes (or names).

col_pal_na Colour to use for NA values. A character vector of a hex code (or name).

col_rescale For a continuous variable, a scales::rescale() function.

col_steps For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
to FALSE.

facet_axes Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or
″all_y″.

facet_axis_labels

> Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_labels_position

> When the facet layout is ″wrap″, the position of the facet labels. Either ″top″,
> ″right″, ″bottom″ or ″left″.

facet_labels_switch

> When the facet layout is ″grid″, whether to switch the facet labels to the oppo-
> site side of the plot. Either ″x″, ″y″ or ″both″.

facet_layout Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or
facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet
and facet2 arguments are provided, defaults to ″grid″.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout
> of ″wrap″.

facet_scales Whether facet scales should be ″fixed″ across facets, ″free″ in both direc-
tions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to
″fixed″.

facet_space When the facet layout is ″grid″ and facet scales are not ″fixed″, whether
facet space should be ″fixed″ across facets, ″free″ to be proportional in both
directions, or free to be proportional in just one direction (i.e. ″free_x″ or
″free_y″). Defaults to ″fixed″.

title Title string.

subtitle Subtitle string.

caption Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

data.frame(x1 = 2.62, x2 = 3.57, y1 = 21.0, y2 = 15.0) |>
  gg_segment(
    x = x1,
    xend = x2,
    y = y1,
    yend = y2,
  )
```

---

gg_sf   *Sf ggplot*

Description

Create a blank ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_sf()](#).

Usage

```
gg_sf(
  data = NULL,
  ...,
  stat = "sf",
  position = "identity",
  coord = ggplot2::coord_sf(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
```

```
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
```

```
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.
x_oob, y_oob, col_oob	For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

> The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

> Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

> Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

> When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

> When the facet layout is "grid", whether to switch the facet labels to the opposite side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both directions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

if (requireNamespace("sf", quietly = TRUE)) {
  sf::st_read(system.file("shape/nc.shp", package = "sf")) |>
    gg_sf(
      col = AREA,
    )
}
```

---

gg_smooth   *Smooth ggplot*

Description

Create a smooth ggplot with a wrapper around [ggplot2::ggplot()](#) + [geom_smooth()](#).

Usage

```
gg_smooth(
  data = NULL,
  ...,
  stat = "smooth",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
```

```
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
facet_scales = "fixed",
facet_space = "fixed",
title = NULL,
subtitle = NULL,
```

```
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

`data`	A data frame or tibble.
`...`	Other arguments passed to within a `params` list in `layer()`.
`stat`	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
`position`	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a position_*() function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
`coord`	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
`mode`	A *_mode_* theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
`x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample`	An unquoted aesthetic variable.
`mapping`	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
`x_breaks, y_breaks, col_breaks`	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
`x_expand, y_expand`	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
`x_expand_limits, y_expand_limits, col_expand_limits`	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
`x_labels, y_labels, col_labels, facet_labels`	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for `facet_labels`).
`x_limits, y_limits, col_limits`	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.
`x_oob, y_oob, col_oob`	For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

        The position of the axis (i.e. ″left″, ″right″, ″bottom″ or ″top″).If using y_position = ″top″ with a *_mode_* theme, add caption = ″″ or caption = ″\n″.

x_title, y_title, col_title

        Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

        For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#)) or character string of this minus the transform_ prefix (e.g. ″log10″).

col_legend_ncol, col_legend_nrow

        The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_axis_labels

        Whether to add interior axis labels with ″margins″, ″all″, ″all_x″, or ″all_y″.

facet_labels_position

        When the facet layout is ″wrap″, the position of the facet labels. Either ″top″, ″right″, ″bottom″ or ″left″.

facet_labels_switch

        When the facet layout is ″grid″, whether to switch the facet labels to the opposite side of the plot. Either ″x″, ″y″ or ″both″.

facet_layout   Whether the layout is to be ″wrap″ or ″grid″. If NULL and a single facet (or facet2) argument is provided, then defaults to ″wrap″. If NULL and both facet and facet2 arguments are provided, defaults to ″grid″.

facet_ncol, facet_nrow

        The number of columns and rows of facet panels. Only applies to a facet layout of ″wrap″.

facet_scales   Whether facet scales should be ″fixed″ across facets, ″free″ in both directions, or free in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.

facet_space   When the facet layout is ″grid″ and facet scales are not ″fixed″, whether facet space should be ″fixed″ across facets, ″free″ to be proportional in both directions, or free to be proportional in just one direction (i.e. ″free_x″ or ″free_y″). Defaults to ″fixed″.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  tidyr::drop_na(sex) |>
  gg_smooth(
    x = flipper_length_mm,
    y = body_mass_g,
    col = sex,
    se = TRUE,
  )
```

---

gg_step   *Step ggplot*

Description

Create a step plot with a wrapper around [ggplot2::ggplot()](#) + [geom_step().](#)

Usage

```
gg_step(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
```

```
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
col_pal_na = "darkgrey",
col_rescale = scales::rescale(),
col_steps = FALSE,
col_title = NULL,
col_transform = NULL,
facet_axes = NULL,
facet_axis_labels = "margins",
facet_labels = NULL,
facet_labels_position = "top",
facet_labels_switch = NULL,
facet_layout = NULL,
facet_ncol = NULL,
facet_nrow = NULL,
```

```
  facet_scales = "fixed",
  facet_space = "fixed",
  title = NULL,
  subtitle = NULL,
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.
x_expand, y_expand	Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).
x_expand_limits, y_expand_limits, col_expand_limits	For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.
x_labels, y_labels, col_labels, facet_labels	A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).
x_limits, y_limits, col_limits	For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use + `ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. `scales::transform_log10()`) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a `scales::rescale()` function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout   Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single facet (or facet2) argument is provided, then defaults to `"wrap"`. If NULL and both facet and facet2 arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout of `"wrap"`.

facet_scales   Whether facet scales should be `"fixed"` across facets, `"free"` in both directions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

facet_space   When the facet layout is `"grid"` and facet scales are not `"fixed"`, whether facet space should be `"fixed"` across facets, `"free"` to be proportional in both directions, or free to be proportional in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

title	Title string.
subtitle	Subtitle string.
caption	Caption title string.
titles_to_case	A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

economics |>
  gg_step(
    x = date,
    y = unemploy,
    coord = ggplot2::coord_cartesian(clip = "on"),
    x_limits = c(lubridate::ymd("2010-01-01"), lubridate::NA_Date_),
    y_expand_limits = 0,
    y_title = "Unemployment",
  )
```

---

gg_text   *Text ggplot*

Description

Create a text plot with a wrapper around ggplot2::ggplot() + geom_text().

Usage

```
gg_text(
  data = NULL,
  ...,
  stat = "identity",
  position = "identity",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
```

```
    ymin = NULL,
    ymax = NULL,
    yend = NULL,
    z = NULL,
    col = NULL,
    facet = NULL,
    facet2 = NULL,
    group = NULL,
    subgroup = NULL,
    label = NULL,
    text = NULL,
    sample = NULL,
    mapping = NULL,
    x_breaks = NULL,
    x_expand = NULL,
    x_expand_limits = NULL,
    x_labels = NULL,
    x_limits = NULL,
    x_oob = scales::oob_keep,
    x_position = "bottom",
    x_title = NULL,
    x_transform = NULL,
    y_breaks = NULL,
    y_expand = NULL,
    y_expand_limits = NULL,
    y_labels = NULL,
    y_limits = NULL,
    y_oob = scales::oob_keep,
    y_position = "left",
    y_title = NULL,
    y_transform = NULL,
    col_breaks = NULL,
    col_expand_limits = NULL,
    col_labels = NULL,
    col_legend_ncol = NULL,
    col_legend_nrow = NULL,
    col_legend_rev = FALSE,
    col_limits = NULL,
    col_oob = scales::oob_keep,
    col_pal = NULL,
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
```

```
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).
x_expand_limits, y_expand_limits, col_expand_limits	
	For a continuous variable, any values that the limits should encompass (e.g. `0`). For a discrete scale, manipulate the data instead with `forcats::fct_expand`.
x_labels, y_labels, col_labels, facet_labels	
	A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or `scales::label_comma()`), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale.
> For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand`
> or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values out-
> side of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using
> `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption =`
> `"\n"`.

x_title, y_title, col_title

> Axis title string. Use `+ ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [scales::transform_log10()](#))
> or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to
> FALSE.

col_pal Colours to use. A character vector of hex codes (or names).

col_pal_na Colour to use for `NA` values. A character vector of a hex code (or name).

col_rescale For a continuous variable, a `scales::rescale()` function.

col_steps For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults
> to FALSE.

facet_axes Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or
> `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`,
> `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the oppo-
> site side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or
> `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both facet
> and facet2 arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

> The number of columns and rows of facet panels. Only applies to a facet layout
> of `"wrap"`.

facet_scales Whether facet scales should be `"fixed"` across facets, `"free"` in both direc-
> tions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to
> `"fixed"`.

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether
                 facet space should be "fixed" across facets, "free" to be proportional in both
                 directions, or free to be proportional in just one direction (i.e. "free_x" or
                 "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case   A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)

set_blanket()

bind_rows(
  mtcars |> slice_min(order_by = mpg),
  mtcars |> slice_max(order_by = mpg)) |>
  tibble::rownames_to_column("model") |>
  gg_text(
    x = model,
    y = mpg,
    col = mpg,
    label = model,
    y_expand_limits = 0,
    y_title = "Miles per gallon",
    col_pal = c(orange, "white", teal),
  )
```

---

gg_tile   *Tile ggplot*

Description

Create a tile plot with a wrapper around ggplot2::ggplot() + geom_tile().

Usage

```
gg_tile(
  data = NULL,
  ...,
  stat = "identity",
```

```
position = "identity",
coord = ggplot2::coord_cartesian(clip = "off"),
mode = NULL,
x = NULL,
xmin = NULL,
xmax = NULL,
xend = NULL,
y = NULL,
ymin = NULL,
ymax = NULL,
yend = NULL,
z = NULL,
col = NULL,
facet = NULL,
facet2 = NULL,
group = NULL,
subgroup = NULL,
label = NULL,
text = NULL,
sample = NULL,
mapping = NULL,
x_breaks = NULL,
x_expand = NULL,
x_expand_limits = NULL,
x_labels = NULL,
x_limits = NULL,
x_oob = scales::oob_keep,
x_position = "bottom",
x_title = NULL,
x_transform = NULL,
y_breaks = NULL,
y_expand = NULL,
y_expand_limits = NULL,
y_labels = NULL,
y_limits = NULL,
y_oob = scales::oob_keep,
y_position = "left",
y_title = NULL,
y_transform = NULL,
col_breaks = NULL,
col_expand_limits = NULL,
col_labels = NULL,
col_legend_ncol = NULL,
col_legend_nrow = NULL,
col_legend_rev = FALSE,
col_limits = NULL,
col_oob = scales::oob_keep,
col_pal = NULL,
```

```
    col_pal_na = "darkgrey",
    col_rescale = scales::rescale(),
    col_steps = FALSE,
    col_title = NULL,
    col_transform = NULL,
    facet_axes = NULL,
    facet_axis_labels = "margins",
    facet_labels = NULL,
    facet_labels_position = "top",
    facet_labels_switch = NULL,
    facet_layout = NULL,
    facet_ncol = NULL,
    facet_nrow = NULL,
    facet_scales = "fixed",
    facet_space = "fixed",
    title = NULL,
    subtitle = NULL,
    caption = NULL,
    titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in `layer()`.
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. `"identity"`).
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. `"identity"`), or a `position_*()` function that outputs a ggproto Position subclass object (e.g. `ggplot2::position_identity()`).
coord	A coordinate system. A `coord_*()` function that outputs a constructed ggproto Coord subclass object (e.g. `ggplot2::coord_cartesian()`).
mode	A `*_mode_*` theme (e.g. `light_mode_t()`, `grey_mode_r()`, or `dark_mode_r()`). This argument adds the theme with side-effects, as the `gg_*` function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of `gg_*`.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	
	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in `ggplot2::aes()`. Intended primarily for non-supported aesthetics (e.g. `shape`, `linetype`, `linewidth`, or `size`), but can also be used for delayed evaluation etc.
x_breaks, y_breaks, col_breaks	
	A `scales::breaks_*` function (e.g. `scales::breaks_pretty()`), or a vector of breaks.
x_expand, y_expand	
	Padding to the limits with the `ggplot2::expansion()` function, or a vector of length 2 (e.g. `c(0, 0)`).

x_expand_limits, y_expand_limits, col_expand_limits

> For a continuous variable, any values that the limits should encompass (e.g. `0`).
> For a discrete scale, manipulate the data instead with `forcats::fct_expand`.

x_labels, y_labels, col_labels, facet_labels

> A function that takes the breaks as inputs (e.g. `\(x) stringr::str_to_sentence(x)` or [`scales::label_comma()`](#)), or a vector of labels (Note this must be named for `facet_labels`).

x_limits, y_limits, col_limits

> For a continuous scale, a vector of length 2 to determine the limits of the scale.
> For a discrete scale, manipulate the data instead with `factor`, `forcats::fct_expand` or `forcats::fct_drop`.

x_oob, y_oob, col_oob

> For a continuous scale, a `scales::oob_*` function of how to handle values outside of limits. Defaults to `scales::oob_keep`.

x_position, y_position

> The position of the axis (i.e. `"left"`, `"right"`, `"bottom"` or `"top"`).If using `y_position = "top"` with a `*_mode_*` theme, add `caption = ""` or `caption = "\n"`.

x_title, y_title, col_title

> Axis title string. Use `+ ggplot2::labs(... = NULL)` for no title.

x_transform, y_transform, col_transform

> For a continuous scale, a transformation object (e.g. [`scales::transform_log10()`](#)) or character string of this minus the `transform_` prefix (e.g. `"log10"`).

col_legend_ncol, col_legend_nrow

> The number of columns and rows in a legend guide.

col_legend_rev TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal Colours to use. A character vector of hex codes (or names).

col_pal_na Colour to use for `NA` values. A character vector of a hex code (or name).

col_rescale For a continuous variable, a `scales::rescale()` function.

col_steps For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes Whether to add interior axes and ticks with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_axis_labels

> Whether to add interior axis labels with `"margins"`, `"all"`, `"all_x"`, or `"all_y"`.

facet_labels_position

> When the facet layout is `"wrap"`, the position of the facet labels. Either `"top"`, `"right"`, `"bottom"` or `"left"`.

facet_labels_switch

> When the facet layout is `"grid"`, whether to switch the facet labels to the opposite side of the plot. Either `"x"`, `"y"` or `"both"`.

facet_layout Whether the layout is to be `"wrap"` or `"grid"`. If NULL and a single `facet` (or `facet2`) argument is provided, then defaults to `"wrap"`. If NULL and both `facet` and `facet2` arguments are provided, defaults to `"grid"`.

facet_ncol, facet_nrow

                The number of columns and rows of facet panels. Only applies to a facet layout of `"wrap"`.

facet_scales   Whether facet scales should be `"fixed"` across facets, `"free"` in both directions, or free in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

facet_space   When the facet layout is `"grid"` and facet scales are not `"fixed"`, whether facet space should be `"fixed"` across facets, `"free"` to be proportional in both directions, or free to be proportional in just one direction (i.e. `"free_x"` or `"free_y"`). Defaults to `"fixed"`.

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  group_by(species, sex) |>
  summarise(across(flipper_length_mm, \(x) mean(x, na.rm = TRUE))) |>
  gg_tile(
    x = sex,
    y = species,
    col = flipper_length_mm,
  )
```

---

gg_violin   *Violin ggplot*

Description

Create a violin plot with a wrapper around ggplot2::ggplot() + geom_violin().

Usage

```
gg_violin(
  data = NULL,
  ...,
  stat = "ydensity",
  position = "dodge",
  coord = ggplot2::coord_cartesian(clip = "off"),
  mode = NULL,
  x = NULL,
  xmin = NULL,
  xmax = NULL,
  xend = NULL,
  y = NULL,
  ymin = NULL,
  ymax = NULL,
  yend = NULL,
  z = NULL,
  col = NULL,
  facet = NULL,
  facet2 = NULL,
  group = NULL,
  subgroup = NULL,
  label = NULL,
  text = NULL,
  sample = NULL,
  mapping = NULL,
  x_breaks = NULL,
  x_expand = NULL,
  x_expand_limits = NULL,
  x_labels = NULL,
  x_limits = NULL,
  x_oob = scales::oob_keep,
  x_position = "bottom",
  x_title = NULL,
  x_transform = NULL,
  y_breaks = NULL,
  y_expand = NULL,
  y_expand_limits = NULL,
  y_labels = NULL,
  y_limits = NULL,
  y_oob = scales::oob_keep,
  y_position = "left",
  y_title = NULL,
  y_transform = NULL,
  col_breaks = NULL,
  col_expand_limits = NULL,
  col_labels = NULL,
  col_legend_ncol = NULL,
```

```
  col_legend_nrow = NULL,
  col_legend_rev = FALSE,
  col_limits = NULL,
  col_oob = scales::oob_keep,
  col_pal = NULL,
  col_pal_na = "darkgrey",
  col_rescale = scales::rescale(),
  col_steps = FALSE,
  col_title = NULL,
  col_transform = NULL,
  facet_axes = NULL,
  facet_axis_labels = "margins",
  facet_labels = NULL,
  facet_labels_position = "top",
  facet_labels_switch = NULL,
  facet_layout = NULL,
  facet_ncol = NULL,
  facet_nrow = NULL,
  facet_scales = "fixed",
  facet_space = "fixed",
  title = NULL,
  subtitle = NULL,
  caption = NULL,
  titles_to_case = snakecase::to_sentence_case
)
```

Arguments

data	A data frame or tibble.
...	Other arguments passed to within a params list in layer().
stat	A statistical transformation to use on the data. A snakecase character string of a ggproto Stat subclass object minus the Stat prefix (e.g. "identity").
position	A position adjustment. A snakecase character string of a ggproto Position subclass object minus the Position prefix (e.g. "identity"), or a position_*() function that outputs a ggproto Position subclass object (e.g. ggplot2::position_identity()).
coord	A coordinate system. A coord_*() function that outputs a constructed ggproto Coord subclass object (e.g. ggplot2::coord_cartesian()).
mode	A *_mode_* theme (e.g. light_mode_t(), grey_mode_r(), or dark_mode_r()). This argument adds the theme with side-effects, as the gg_* function will removes selected gridlines/axis-line/ticks. To avoid these side-effects, + the theme on to the output of gg_*.
x, xmin, xmax, xend, y, ymin, ymax, yend, z, col, facet, facet2, group, subgroup, label, text, sample	An unquoted aesthetic variable.
mapping	A set of additional aesthetic mappings in ggplot2::aes(). Intended primarily for non-supported aesthetics (e.g. shape, linetype, linewidth, or size), but can also be used for delayed evaluation etc.

x_breaks, y_breaks, col_breaks

A scales::breaks_* function (e.g. scales::breaks_pretty()), or a vector of breaks.

x_expand, y_expand

Padding to the limits with the ggplot2::expansion() function, or a vector of length 2 (e.g. c(0, 0)).

x_expand_limits, y_expand_limits, col_expand_limits

For a continuous variable, any values that the limits should encompass (e.g. 0). For a discrete scale, manipulate the data instead with forcats::fct_expand.

x_labels, y_labels, col_labels, facet_labels

A function that takes the breaks as inputs (e.g. \(x) stringr::str_to_sentence(x) or scales::label_comma()), or a vector of labels (Note this must be named for facet_labels).

x_limits, y_limits, col_limits

For a continuous scale, a vector of length 2 to determine the limits of the scale. For a discrete scale, manipulate the data instead with factor, forcats::fct_expand or forcats::fct_drop.

x_oob, y_oob, col_oob

For a continuous scale, a scales::oob_* function of how to handle values outside of limits. Defaults to scales::oob_keep.

x_position, y_position

The position of the axis (i.e. "left", "right", "bottom" or "top").If using y_position = "top" with a *_mode_* theme, add caption = "" or caption = "\n".

x_title, y_title, col_title

Axis title string. Use + ggplot2::labs(... = NULL) for no title.

x_transform, y_transform, col_transform

For a continuous scale, a transformation object (e.g. scales::transform_log10()) or character string of this minus the transform_ prefix (e.g. "log10").

col_legend_ncol, col_legend_nrow

The number of columns and rows in a legend guide.

col_legend_rev   TRUE or FALSE of whether to reverse the elements of a legend guide. Defaults to FALSE.

col_pal   Colours to use. A character vector of hex codes (or names).

col_pal_na   Colour to use for NA values. A character vector of a hex code (or name).

col_rescale   For a continuous variable, a scales::rescale() function.

col_steps   For a continuous variable, TRUE or FALSE of whether to colour in steps. Defaults to FALSE.

facet_axes   Whether to add interior axes and ticks with "margins", "all", "all_x", or "all_y".

facet_axis_labels

Whether to add interior axis labels with "margins", "all", "all_x", or "all_y".

facet_labels_position

When the facet layout is "wrap", the position of the facet labels. Either "top", "right", "bottom" or "left".

facet_labels_switch

                When the facet layout is "grid", whether to switch the facet labels to the oppo-site side of the plot. Either "x", "y" or "both".

facet_layout   Whether the layout is to be "wrap" or "grid". If NULL and a single facet (or facet2) argument is provided, then defaults to "wrap". If NULL and both facet and facet2 arguments are provided, defaults to "grid".

facet_ncol, facet_nrow

                The number of columns and rows of facet panels. Only applies to a facet layout of "wrap".

facet_scales   Whether facet scales should be "fixed" across facets, "free" in both direc-tions, or free in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

facet_space   When the facet layout is "grid" and facet scales are not "fixed", whether facet space should be "fixed" across facets, "free" to be proportional in both directions, or free to be proportional in just one direction (i.e. "free_x" or "free_y"). Defaults to "fixed".

title   Title string.

subtitle   Subtitle string.

caption   Caption title string.

titles_to_case A function to format unspecified titles_to_case. Defaults to snakecase::to_sentence_case.

Value

A ggplot object.

Examples

```
library(ggplot2)
library(dplyr)
library(palmerpenguins)

set_blanket()

penguins |>
  tidyr::drop_na(sex) |>
  mutate(across(sex, \(x) stringr::str_to_sentence(x))) |>
  gg_violin(
    x = sex,
    y = body_mass_g,
    col = sex,
    facet = species,
    mode = light_mode_b(),
  )
```

greyness   *The* grey_mode_* *theme colours*

Description

A vector of colours used in the grey_mode_* themes.

Usage

```
greyness
```

Format

An object of class character of length 3.

Value

A character vector.

Examples

```
scales::show_col(greyness)
```

grey_mode_b   *Grey mode theme with bottom legend*

Description

Grey mode theme for a ggplot visualisation with bottom legend. It uses the colours from greyness.

Usage

```
grey_mode_b(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = grey_mode_b()
  )
```

---

grey_mode_n   *Grey mode theme with no legend*

Description

Grey mode theme for a ggplot visualisation with no legend. It uses the colours from greyness.

Usage

```
grey_mode_n(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.
base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_jitter(
    x = species,
    y = body_mass_g,
    col = species,
    mode = grey_mode_n()
  )
```

---

grey_mode_r *Grey mode theme with right legend*

Description

Grey mode theme for a ggplot visualisation with legend at right. It uses the colours from `greyness`.

Usage

```
grey_mode_r(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = grey_mode_r()
  )
```

---

grey_mode_t *Grey mode theme with top legend*

Description

Grey mode theme for a ggplot visualisation with top legend. It uses the colours from `greyness`.

Usage

```
grey_mode_t(base_size = 11, base_family = "")
```

Arguments

base_size	The base size of the text. Defaults to 11.
base_family	The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = grey_mode_t()
  )
```

---

lightness   *The* light_mode_* *theme colours*

Description

A vector of colours used in the light_mode_* themes.

Usage

```
lightness
```

Format

An object of class character of length 3.

Value

A character vector.

Examples

```
scales::show_col(lightness)
```

---

light_mode_b *Light mode theme with bottom legend*

Description

Light mode theme for a ggplot visualisation with bottom legend. It uses the colours from lightness.

Usage

```
light_mode_b(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = light_mode_b()
  )
```

---

light_mode_n *Light mode theme with no legend*

Description

Light mode theme for a ggplot visualisation with no legend. It uses the colours from lightness.

Usage

```
light_mode_n(base_size = 11, base_family = "")
```

Arguments

base_size	The base size of the text. Defaults to 11.
base_family	The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_jitter(
    x = species,
    y = body_mass_g,
    col = species,
    mode = light_mode_n()
  )
```

---

light_mode_r   *Light mode theme with right legend*

Description

Light mode theme for a ggplot visualisation with legend at right. It uses the colours from lightness.

Usage

```
light_mode_r(base_size = 11, base_family = "")
```

Arguments

base_size	The base size of the text. Defaults to 11.
base_family	The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = light_mode_r()
  )
```

---

light_mode_t   *Light mode theme with top legend*

Description

Light mode theme for a ggplot visualisation with top legend. It uses the colours from lightness.

Usage

```
light_mode_t(base_size = 11, base_family = "")
```

Arguments

base_size   The base size of the text. Defaults to 11.

base_family   The base family of the text. Defaults to "".

Value

A ggplot theme.

Examples

```
library(palmerpenguins)
library(ggplot2)

set_blanket()

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    col = species,
    mode = light_mode_t()
  )
```

---

navy   *A navy colour*

Description

A navy colour.

Usage

```
navy
```

Format

An object of class `character` of length 1.

Value

A character vector.

Examples

```
scales::show_col(navy)
```

---

orange   *A orange colour*

Description

A orange colour.

Usage

```
orange
```

Format

An object of class `character` of length 1.

Value

A character vector.

Examples

```
scales::show_col(orange)
```

---

replace_seq *Replace a sequence of elements in a vector*

Description

Keep every nth element in a vector, and replace the rest with a value such as "".

Usage

```
replace_seq(x, ..., keep_nth = 2, offset = 0, replacement = "")
```

Arguments

x	A vector.
...	If numeric, other arguments passed to the scales::comma function.
keep_nth	The increment of elements to keep as is. Defaults to 2.
offset	An offset to start at the intended offset. Defaults to 0. Possible replaces are -1 to (keep_nth - 2)
replacement	The replacement value to replace non-kept elements with. Defaults to "".

Value

A vector.

Examples

```
replace_seq(seq(1000, 7000, 1000))
replace_seq(seq(1000, 7000, 1000), offset = -1)
replace_seq(seq(1000, 7000, 1000), keep_nth = 3)
replace_seq(LETTERS[1:12])
```

---

set_blanket *Set the default style*

Description

Set the default style by setting the default mode and updating a series of geom and annotate defaults.

Usage

```
set_blanket(
  mode = light_mode_r(),
  geom_default_colour = blue,
  annotate_default_colour = lightness[2],
  ...
)
```

Arguments

mode   A *_mode_* theme set globally for when mode = NULL. E.g. light_mode_t(),
                            grey_mode_r(), or dark_mode_r().

geom_default_colour
                            A default geom colour used within weave_geom_defaults().

annotate_default_colour
                            A default annotate colour used within weave_annotate_defaults().

...   Provided only to support trailing commas.

Value

A globally set mode and updated geom defaults.

Examples

```
library(ggplot2)
library(ggblanket)
library(palmerpenguins)

set_blanket(dark_mode_r(), orange, darkness[2])

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    x_breaks = scales::breaks_pretty(3),
  ) +
  geom_vline(xintercept = 200) +
  annotate("text", x = I(0.25), y = I(0.75), label = "Here")

penguins |>
  gg_histogram(
    x = flipper_length_mm,
    x_breaks = scales::breaks_pretty(3),
  ) +
  geom_vline(xintercept = 200) +
  annotate("text", x = I(0.75), y = I(0.75), label = "Here")

set_blanket()
```

---

teal   *A teal colour*

Description

A teal colour.

Usage

```
teal
```

Format

An object of class `character` of length 1.

Value

A character vector.

Examples

```
scales::show_col(teal)
```

```
weave_annotate_defaults
```

Update a series of annotate defaults

Description

Update a series of geom defaults commonly used for annotation (i.e. `*_vline`, `*_hline`, `*_abline`, `*_curve`, `*_text` and `*_label`).

Usage

```
weave_annotate_defaults(colour = lightness[2])
```

Arguments

colour   A hex colour. Defaults to `lightness[2]`.

Value

Updated annotation geom defaults

Examples

```
library(ggplot2)
library(ggblanket)
library(palmerpenguins)

set_blanket()
weave_annotate_defaults("#bc5090")

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
```

```
    x_breaks = scales::breaks_pretty(3),
  ) +
  geom_vline(xintercept = 200) +
  annotate("text", x = I(0.25), y = I(0.75), label = "Here")
```

---

weave_geom_defaults   *Update a series of geom defaults*

Description

Update a series of geom defaults.

Usage

```
weave_geom_defaults(colour = blue)
```

Arguments

colour   A hex colour. Defaults to blue.

Value

Updated geom defaults

Examples

```
library(ggplot2)
library(ggblanket)
library(palmerpenguins)

set_blanket()
weave_geom_defaults("#bc5090")

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    x_breaks = scales::breaks_pretty(3),
  )
```

weave_mode | *Set the default mode*

Description

Set the default mode for gg_* functions.

Usage

```
weave_mode(mode = light_mode_r())
```

Arguments

mode   A new *_mode_* theme (e.g. dark_mode_r()).

Value

A globally set mode

Examples

```
library(ggplot2)
library(ggblanket)
library(palmerpenguins)

set_blanket()
weave_mode(dark_mode_r())

penguins |>
  gg_point(
    x = flipper_length_mm,
    y = body_mass_g,
    x_breaks = scales::breaks_pretty(3),
  )

weave_mode(dark_mode_r())
```

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