

Package ‘DescribeDisplay’

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Version 0.2.1

Title R interface to DescribeDisplay (GGobi plugin)

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Depends grid, reshape (>= 0.7.1), ggplot2 (>= 0.8.3), proto

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Description Produce publication quality graphics from output of GGobi’s describe display plugin

License BSD

LazyLoad false

LazyData true

URL <http://www.ggobi.org/describe-display>

Collate ‘axis-geom.r’ ‘axis-grob.r’ ‘data.r’ ‘DescribeDisplay-package.r’ ‘ggplot-barchart.r’ ‘ggplot-parcoords.r’ ‘ggplot-scatmat.r’ ‘ggplot-timeseries.r’ ‘ggplot.r’ ‘plots.r’ ‘utils.r’

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DescribeDisplay-package
R interface to DescribeDisplay (GGobi plugin)

Description

Produce publication quality graphics from output of GGobi's describe display plugin

Details

Package:	DescribeDisplay
Type:	Package
Version:	2.0
Date:	2009-03-31
License:	BSD
LazyData:	yes

Author(s)

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References

<http://www.ggobi.org/describe-display/> <http://www.had.co.nz/ggplot2/>

Examples

```
example(ggplot.dd)
example(ggplot.scatmat)
example(ggplot.parcoords)
example(ggplot.timeseries)
```

addbrush *Add brush to plot...*

Description

Add brush to plot This adds a rectangle to a ggplot plot indicating the brush position.

Usage

```
addbrush(plot, x, y, width=0.5, height=0.5, just=c("left", "top"), fill=transparent)
```

Arguments

plot	plot object
x	x position of brush
y	y position of brush
width	width of brush
height	height of brush
just	which corner of brush should be determined by x and y position
fill	fill colour for brush. Use ggplot-alpha for alpha blending.
col	outline colour of brush

Author(s)

Hadley Wickham (h.wickham@gmail.com)

dd_load *Load describe display...*

Description

Load describe display Retrieve output of from describe display plugin

Usage

```
dd_load(path)
```

Arguments

path	file path
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Details

Also performs some conversion of data structures to more convenient form so that other functions do not have to repeatedly recompute. Some of these conversions could probably be moved into the Describe Display plugin, but it may be easier to just do them on the R side..

Value

object of class dd

Author(s)

Hadley Wickham (h.wickham@gmail.com)

See Also

[dd_example](#) for an easier way of loading example files

ggplot.barplot *Create a nice plot for Bar Plots...*

Description

Create a nice plot for Bar Plots Create a nice looking plot complete with axes using ggplot.

Usage

```
ggplot.barplot(data, spine=FALSE, ...)
```

Arguments

data	plot to display, object created by <code>dd_load()</code>
spine	(not implemented currently) whether to display the barchart as a spine plot
...	arguments passed through to the ggplot function

Author(s)

Barret Schloerke (bigbear@iastate.edu)

Examples

```
print(ggplot(dd_example("barchart-species")))
```

`ggplot.dd`*Create a nice plot...*

Description

Create a nice plot Create a nice looking plot complete with axes using ggplot.

Usage

```
ggplot.dd(data, ...)
```

Arguments

<code>data</code>	plot to display, object created by <code>dd_load()</code>
<code>...</code>	not used

Author(s)

Hadley Wickham (h.wickham@gmail.com)

Examples

```
print(example(ggplot.ddplot))
print(example(ggplot.histogram))
print(example(ggplot.barplot))
```

`ggplot.ddplot`*Create a nice plot...*

Description

Create a nice plot Create a nice looking plot complete with axes using ggplot.

Usage

```
ggplot.ddplot(data, axis.location=c(0.2, 0.2), ...)
```

Arguments

<code>data</code>	plot to display, object created by <code>dd_load()</code>
<code>axis.location</code>	grob function to use for drawing
<code>...</code>	arguments passed to the grob function

Author(s)

Hadley Wickham (h.wickham@gmail.com)

Examples

```
print(ggplot(dd_example("tour2d")))
print(ggplot(dd_example("tour1d")))
print(ggplot(dd_example("tour2d-cube3")))
print(ggplot(dd_example("dot")))
print(ggplot(dd_example("dot-labels")))
print(ggplot(dd_example("xyplot")))
print(ggplot(dd_example("xyplot")) + opts(aspect.ratio = 1))
print(ggplot(dd_example("xyplot")) + xlab(NULL) + ylab(NULL))
print(ggplot(dd_example("ash")))
print(ggplot(dd_example("ash")) + geom_segment(aes(x=x, xend=x, y=0, yend=y), size=0.3))
```

ggplot.histogram *Create a nice plot for Histograms...*

Description

Create a nice plot for Histograms Create a nice looking plot complete with axes using ggplot.

Usage

```
ggplot.histogram(data, spine=FALSE, ...)
```

Arguments

data	plot to display, object created by dd_load()
spine	(not implemented currently) whether to display the barchart as a spine plot
...	arguments passed through to the ggplot function

Author(s)

Barret Schloerke (bigbear@iastate.edu)

Examples

```
print(ggplot(dd_example("barchart")))
```

ggplot.parcoords *Create a nice plot for parallel coordinates plot...*

Description

Create a nice plot for parallel coordinates plot Create a nice looking plot complete with axes using ggplot.

Usage

```
ggplot.parcoords(data, absoluteX=FALSE, absoluteY=FALSE, edges=TRUE, ...)
```

Arguments

data	plot to display
absoluteX	make the sections proportional horizontally to eachother
absoluteY	make the sections proportional vertically to eachother
edges	boolean value to print edges. Defaults to TRUE.
...	arguments passed to the grob function

Author(s)

Barret Schloerke <bigbear@iastate.edu>

Examples

```
print(ggplot(dd_example("pcp")))
print(ggplot(dd_example("pcp-ash")))
print(ggplot(dd_example("pcp-ash"), edges = FALSE))
print(ggplot(dd_example("pcp-ash"), absoluteY = TRUE, edges = FALSE))
print(ggplot(dd_example("pcp-texture")))
print(ggplot(dd_example("pcp-texture"), edges =FALSE))
print(ggplot(dd_example("pcp-texture"), absoluteY=TRUE, edges =FALSE))
```

ggplot.scatmat *Create a nice plots in a scatter plot matrix...*

Description

Create a nice plots in a scatter plot matrix Create a nice looking plots in a matrix. The 1d sections along the diagonal have a smooth density while the values are compared to eachother within the matrix.

Usage

```
ggplot.scatmat(data, ...)
```

Arguments

data to display
 ... (currently) unused arguments

Author(s)

Barret Schloerke <bigbear@iastate.edu>

Examples

```
print(ggplot(dd_example("scattermat-small")))
print(ggplot(dd_example("scattermat")) + opts(aspect.ratio=1))
```

ggplot.timeseries *Create nice plots for a time series...*

Description

Create nice plots for a time series Create nice looking plots complete with axes using ggplot. Produces graphics with a uniform x axis.

Usage

```
ggplot.timeseries(data, edges=FALSE, ...)
```

Arguments

data to display
 edges Boolean operator to tell whether to try to force the edges or not. Will not work to remove the edges.
 ... (currently) unused arguments

Author(s)

Barret Schloerke <bigbear@iastate.edu>

Examples

```
print(ggplot(dd_example("pigs")))
print(ggplot(dd_example("pigs"), edges=TRUE))
```

plot.ddplot	<i>Plot a dd plot...</i>
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Description

Plot a dd plot Convenient method to draw a single panel.

Usage

```
plot.ddplot(x, ..., axislocation=c(0.1, 0.1), axis.gp=gpar(col = "black"), background
```

Arguments

x	object to plot
...	(not used)
axislocation	location of axes (as x and y position in npc coordinates, ie. between 0 and 1)
axis.gp	frame grob containing all panels, note that this does not contain the title or border
background.color	color of in the background of the plot

Details

This is mainly used for bug testing so that you can pull out a single panel quickly and easily.

Author(s)

Hadley Wickham (h.wickham@gmail.com)

Examples

```
scatmat <- dd_example("scattermat")
plot(scatmat)
plot(scatmat$plots[[1]])
plot(scatmat$plots[[3]])
plot(scatmat$plots[[4]])
```

`removehiddens` *Remove hidden points...*

Description

Remove hidden points Will remove all hidden points from the plot.

Usage

```
removehiddens(d)
```

Arguments

`d` `ddplot` object

Author(s)

Hadley Wickham (h.wickham@gmail.com)

`zeeThemAll` *Run All Examples...*

Description

Run All Examples Will run all examples within the package

Author(s)

Barret Schloerke bigbear@iastate.edu

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