

Package ‘IQSlides’

May 17, 2022

Type Package

Title Produce Powerpoint Output from R and IQRtools Objects (Add-On for IQRtools)

Version 0.3.6

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Description IQSlides accompanies the efficient conduct of analyses that require reporting to Powerpoint slides.

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Encoding UTF-8

LazyData true

Roxygen list(markdown = TRUE)

Suggests testthat, devtools, roxygen2, IQRtools (>= 1.1)

Imports crayon, dplyr, magick, pdftools, cowplot, ggplot2, officer (>= 0.3.14), flextable (>= 0.5.9), webshot (>= 0.5.2), zip (>= 2.1.1)

RoxygenNote 7.1.2

NeedsCompilation no

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caption	<i>Set and retrieve caption for an object</i>
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Description

Get or set a caption attribute on any object. Is used by [IQRoutputPPTX](#) to select the proper slide layout.

Usage

```
caption(x)

caption(x) <- value
```

Arguments

x	any R object
value	character, the caption.

Value

The object x with caption attribute

Author(s)

Daniel Kaschek, IntiQuan

clean_IQRoutputSection	<i>Clean the Slide Output Folder</i>
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Description

Select a single section to be cleaned or clean all sections from the slide output folder.

Usage

```
clean_IQRoutputSection(section = NULL, outputFolder = NULL, verbose = FALSE)
```

Arguments

section	character or NULL (default), the section to be removed. All sections if NULL. See also section argument of IQRoutputPPTX .
outputFolder	character or NULL (default). The slide folder where the rds files are saved. By default, slides are saved in the folder <code>getOption("IQSlide.outputfolder")</code> .
verbose	Logical (FALSE by default). Print information during cleaning if TRUE.

IQRoutputPPTX

*Push contents into a PPTX output***Description**

The function pushes a plot or table with additional information like title and section into an rds file within a slide folder. From that folder, a slide deck can be generated using the [IQSlidedeck\(\)](#) function.

Usage

```
IQRoutputPPTX(
  ...,
  section = NULL,
  title = NULL,
  layout = NULL,
  filename = NULL,
  outputFolder = NULL,
  verbose = TRUE
)
```

Arguments

...	The contents to be presented on a slide. Currently supported are one or two objects of type plot or table.
section	character, optional section name. Different section names will generate different subfolders of the slide output folder.
title	character, optional slide title.
layout	character or NULL (default). If NULL, the layout is chosen automatically according to the number of arguments passed via ... List of possible layouts <ul style="list-style-type: none"> • "Title and Content" (one object) • "Two Content" (two objects) • "Two Content Right Bigger" (two objects, left column smaller than right one) • "Title and Content Wide"
filename	character, filename of the rds file.
outputFolder	character or NULL (default). The slide folder where the rds files are saved. By default, slides are saved in the folder <code>getOption("IQSlide.outputfolder")</code> .
verbose	logical, if TRUE (default) show verbose information.

Author(s)

Daniel Kaschek, IntiQuan

See Also

Other Slidedeck functions: [IQSlidedeck\(\)](#)

Examples

```
## Not run:

library(IQRtools)
library(ggplot2)
library(flextable)
setwd(tempdir())

# For compliance information in the footer of the slides
IQRinitCompliance("IQSlidedeck.R")

# -----
# Slide 1: Create a plot and a bullet point list
# -----

p1 <- IQRggplot(cars, aes(x = speed, y = dist)) + geom_point()
caption(p1) <- "Source: Ezekiel, M. (1930) Methods of Correlation Analysis. Wiley."

IQRoutputPPTX(
  c("Cars data set from R datasets",
    "The data via the speed of cars and distances taken to stop shown as plot"),
  p1,
  section = "Slides with plots",
  title = "Overview of cars distance vs time to stop",
  filename = "carsPlot"
)

# -----
# Slide 2: Create a table and a bullet point list
# -----

IQRoutputPPTX(
  info = c("Cars data set from R datasets",
    "The data via the speed of cars and distances taken to stop"),
  table = IQ_table(cars[1:16,]),
  section = "Slides with tables",
  title = "Overview of cars distance vs time to stop shown as table",
  filename = "carsTable"
)

# -----
# Slide 3: Create a table and a formatted bullet point list
# -----

IQRoutputPPTX(
  IQ_bullet_list(
    "* Bullet point with bold and italic" ,
    "* Another bullet point",
    " * Indented by two spaces",
    " * Another one",
    "* And back to really outer level",
    "* Some sort of formula  $E_{rel} = m \\cdot c^2$ "
  ),
  IQ_table(
```

```

      cars[1:16,]
    ),
    section = "Slides with tables",
    title = "Overview of cars distance vs time to stop shown as table",
    filename = "carsTable2"
  )

# -----
# Finally: Create
# -----
# Copy-paste the filename shown in R console
# to explorer to open the file

# All slides
IQSlidedeck(
  title = "My first slidedeck with IQSlides",
  subtitle = "Cars and the time they take to stop",
  affiliation = "Daniel Kaschek, IntiQuan",
  date = "2019-11-20"
)

# Just section slides
IQSlidedeck(section = "Slides with plots")

## End(Not run)

```

 IQSlidedeck

Build a slide deck from a slide folder

Description

Reads all rds files and generates a slide deck from the input

Usage

```

IQSlidedeck(
  title = NULL,
  subtitle = NULL,
  affiliation = NULL,
  date = NULL,
  filename = "slides.pptx",
  section = NULL,
  rdspath = NULL,
  template = NULL
)

```

Arguments

title character or NULL (default), title of the slide deck.

subtitle	character or NULL (default), subtitle of the slide deck.
affiliation	character or NULL (default), author name and company.
date	character or NULL (default), date.
filename	character, output file name of the slide deck. If a single file name, the output is generated in rdspath. If the filename contains path information, the file will be generated in the exact filename location.
section	character or NULL (default), allows to create slides for a specific section only.
rdspath	character or NULL (default), path to the slide files. Searches for slides in <code>getOption("IQSlide.output")</code> if NULL.
template	character or NULL (default), path to the template PPTX file. Uses the internal template if NULL.

Details

If non of the title-relevant arguments are supplied, a slide deck without title page is produced.

The appearance of the slides can be changed by setting the corresponding options via The R options() interface:

- Select a template via `options(IQSlide.template = "TemplateName")`. Currently supported are "Default" and "IQ".
- Select the aspect ratio via `options(IQSlide.ratio = "Ratio")`. Currently supported are "16:9" and "4:3". To change your settings permanently, please include your preferred options in your RProfile file.

Author(s)

Daniel Kaschek, IntiQuan

See Also

Other Slidedeck functions: [IQRoutputPPTX\(\)](#)

Examples

Not run:

```
library(IQRtools)
library(ggplot2)
library(flextable)
setwd(tempdir())

# For compliance information in the footer of the slides
IQRinitCompliance("IQSlidedeck.R")

# -----
# Slide 1: Create a plot and a bullet point list
# -----

p1 <- IQRggplot(cars, aes(x = speed, y = dist)) + geom_point()
caption(p1) <- "Source: Ezekiel, M. (1930) Methods of Correlation Analysis. Wiley."

IQRoutputPPTX(
```

```

    c("Cars data set from R datasets",
      "The data vie the speed of cars and distances taken to stop shown as plot"),
    p1,
    section = "Slides with plots",
    title = "Overview of cars distance vs time to stop",
    filename = "carsPlot"
  )

# -----
# Slide 2: Create a table and a bullet point list
# -----

IQRoutputPPTX(
  info = c("Cars data set from R datasets",
    "The data vie the speed of cars and distances taken to stop"),
  table = IQ_table(cars[1:16,]),
  section = "Slides with tables",
  title = "Overview of cars distance vs time to stop shown as table",
  filename = "carsTable"
)

# -----
# Slide 3: Create a table and a formatted bullet point list
# -----

IQRoutputPPTX(
  IQ_bullet_list(
    "* Bullet point with and italic ",
    "* Another bullet point",
    "  * Indented by two spaces",
    "  * Another one",
    "* And back to really outer level",
    "* Some sort of formula  $E_{rel} = m \cdot c^2$ "
  ),
  IQ_table(
    cars[1:16,]
  ),
  section = "Slides with tables",
  title = "Overview of cars distance vs time to stop shown as table",
  filename = "carsTable2"
)

# -----
# Finally: Create
# -----
# Copy-paste the filename shown in R console
# to explorer to open the file

# All slides
IQSlidedeck(
  title = "My first slidedeck with IQSlides",
  subtitle = "Cars and the time they take to stop",
  affiliation = "Daniel Kaschek, IntiQuan",
  date = "2019-11-20"
)

```

```
)

# Just section slides
IQSlidedeck(section = "Slides with plots")

## End(Not run)
```

IQ_bullet_list	<i>Create bullet point list</i>
----------------	---------------------------------

Description

Allows to create a formatted bullet point list using basic elements of markdown syntax.

Usage

```
IQ_bullet_list(...)

bullet_list(...)
```

Arguments

... Each bullet point is entered as a string. The string should start with "*" and can be indented by multiples of two spaces to change the item level. See example.

Value

Object of type bullet_list.

Examples

```
bl <- IQ_bullet_list(
  "* Bullet point with and italic",
  "* Another bullet point",
  " * Indented by two spaces",
  " * Another one",
  "* And back to really outer level",
  "* Some sort of formula  $E_{rel} = m \\cdot c^2$ "
)
```

 IQ_image

Image output for IQRoutputPPTX

Description

Prepares objects which can be interpreted as plots (image files, ggplot) for output via IQRout-putPPTX.

Usage

```

IQ_image(x, ...)

## S3 method for class 'character'
IQ_image(x, pages = 1, ...)

## S3 method for class 'gg'
IQ_image(x, ...)
```

Arguments

x	path to image file or ggplot object
...	currently not used
pages	integer, the page from the pdf to be extracted

Value

ggplot object (any table will be printed as image)

 IQ_table

Table output for IQRoutputPPTX

Description

Prepares objects which can be interpreted as tables (matrix, data.frame, flextable) for output via IQRoutputPPTX.

Usage

```

IQ_table(x, ...)

## S3 method for class 'IQRtable'
IQ_table(x, ...)

## S3 method for class 'matrix'
IQ_table(x, ...)

## S3 method for class 'data.frame'
IQ_table(x, ...)

## S3 method for class 'flextable'
IQ_table(x, ...)
```

Arguments

x	R object (matrix, IQRtable, data.frame, flextable)
...	currently not used

Value

ggplot object (any table will be printed as image)

select_plot

Subsetting IQRoutputFigures

Description

Subsetting IQRoutputFigures

Usage

```
select_plot(figure, n)
```

Arguments

figure	IQRoutputFigure
n	integer or range indicating the plots to keep in the figure

Value

IQRoutputFigure object

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