Package 'document'

January 11, 2020

Title Run 'roxygen2' on (Chunks of) Single Code Files

Version 3.2.0

Description Have you ever been tempted to create 'roxygen2'-style documentation
comments for one of your functions that was not part of one of your
packages (yet)?
This is exactly what this package is about: running 'roxygen2' on
(chunks of) a single code file.

Depends R (>= 3.3.0)

License BSD_2_clause + file LICENSE

URL https://gitlab.com/fvafrCU/document

Encoding UTF-8

LazyData true

Imports roxygen2, callr, rcmdcheck, checkmate, rstudioapi, desc, withr

Suggests knitr, rmarkdown, devtools, RUnit, testthat, pkgload,
datasets, rprojroot, covr

VignetteBuilder knitr

RoxygenNote 7.0.2

NeedsCompilation no

Author Andreas Dominik Cullmann [aut, cre]

Maintainer Andreas Dominik Cullmann <fvafrcu@mailbox.org>

Repository CRAN

Date/Publication 2020-01-11 19:50:02 UTC

R topics documented:

1

---

document-package   *Document a Single R Code File*

Description

Have you ever been tempted to create **roxygen2**-style documentation comments for one of your functions that was not part of one of your packages (yet)? This is exactly what this package is about: running `roxygen2::roxygenize` on (chunks of) a single code file.
This package enables you to

1. create function documentation with **roxygen2**

2. detect code/documentation mismatches

3. save the documentation to disk

4. view the documentation in your interactive R session

You will probably be looking for `document` and `man`, the remaining functions are mainly for internal use.

Details

R is a programming language that supports and checks documentation for program libraries (called 'packages'). The package **roxygen2** provides a tool for creating documentation from annotated source code - much like `doxygen`, `javadoc` and `docstrings`/`pydoc` do.

And R is a free software environment for statistical computing and graphics, used by people like me who start out hacking down code, eventually pouring chunks of code into functions (and sometimes even ending up creating and documenting packages). Along that work flow you cannot use R's documentation system, let alone **roxygen2**, unless you have come to forge your code into a package.

I am fully aware of the fact that **roxygen2** is meant to document packages, not single code chunks. So should you. Nevertheless I feel the temptation to use **roxygen2**-style comments in code chunks that are not part of any package. And to convert them to pdf for better readability.

Warning

This package writes to disk, so **never** run as superuser.

Note

This package is basically a wrapper to

1. **roxygen2**. It internally creates a temporary package from the code file provided (using `utils::package.skeleton`) which it then passes to `roxygen2::roxygenize`.

2. `R CMD` commands run by **callr**.

See Also

docstring (<https://cran.r-project.org/package=docstring>) also creates temporary help pages as well but using a different technical approach (allowing you to view them in the RStudio help pane). But it creates them from python style docstring-like comments it then parses into **roxygen2**. And it does not write to file so far.

---

document   *Document (Chunks of) an R Code File*

Description

Document (Chunks of) an R Code File

Usage

```
document(
  file_name,
  working_directory = NULL,
  output_directory = tempdir(),
  dependencies = NULL,
  sanitize_Rd = TRUE,
  runit = FALSE,
  check_package = TRUE,
  check_as_cran = check_package,
  stop_on_check_not_passing = check_package,
  clean = FALSE,
  debug = TRUE,
  ...
)
```

Arguments

file_name	The name of the R code file to be documented.
working_directory	
	A working directory. Keep the default.
output_directory	
	The directory to put the documentation into. You might want to use [dirname](file_name).
dependencies	A character vector of package names the functions depend on.
sanitize_Rd	Remove strange characters from Rdconv?
runit	Convert the text received from the help files if running **RUnit**? Do not bother, this is for Unit testing only.
check_package	Run R CMD check the sources? See **Note** below.
check_as_cran	Use the --as-cran flag with R CMD check?
stop_on_check_not_passing	
	Stop if R CMD check does not pass?

clean	Delete the working directory?
debug	For internal use only: Summarize errors for `travis`?
...	Arguments passed to `get_lines_between_tags`.

Value

A list containing

pdf_path The path to the pdf file produced,

txt_path The path to the text file produced,

html_path The path to the html file produced,

check_result The return value of `rcmdcheck::rcmdcheck()`

Note

One of the main features of R CMD check is checking for code/documentation mismatches (it behaves pretty much like doxygen). No build system can check whether your documentation is useful, but R CMD check checks if it is formally matching your code. This check is the basic idea behind **document**. The possibility to disable the R CMD check is there to disable CPU consuming checks while testing the package. Stick with the default! And do not forget to export your functions using the line
#' @export
should you provide examples.

Examples

```
res <- document(file_name = system.file("files", "minimal.R",
                                    package = "document"),
                check_package = FALSE) # this is for the sake of CRAN cpu
                # time only. _Always_ stick with the default!

# View R CMD check results. If we had set check_package to TRUE in the above
# example, we now could retrieve the check results via:
cat(res[["check_result"]][["output"]][["stdout"]], sep = "\n")
cat(res[["check_result"]][["output"]][["stderr"]], sep = "\n")

# Copy docmentation to current working directory.
# This writes to your disk, so it's disabled.
# Remove or comment out the next line to enable.
if (FALSE)
    file.copy(res[["pdf_path"]], getwd())
```

man	*Display a Help Page From a File's Documentation*

Description

Display a help-like page from an existing R documentation (*.Rd) file, a topic from a temporary
package with options("document_package_directory") set or a topic from an R code file con-
taining **roxygen2** documentation.

Usage

```
man(x, topic = NA, force_Rd = FALSE)
```

Arguments

x   One of the following:

- A path to an R documentation (*.Rd) file.
- A path to a code file containing comments for **roxygen2**.
- A help topic if options("document_package_directory") is set (by document).

topic   A help topic if x is a path to a code file containing comments for **roxygen2**.

force_Rd   if x is a file's path, then is_Rd_file is used to decide whether the file is an
R documentation file and call document otherwise. Set to TRUE to disable
this check and force the file to be assumed to be an R documentation file.
is_Rd_file may produce false negatives.

Value

Invisibly the status of display_Rd.

Examples

```
document::document(file_name = system.file("files", "minimal.R",
                   package = "document"), check_package = FALSE)
document::man("foo")
# this equivalent to
path <- system.file("files", "minimal.R", package = "document")
document::man(x = path, topic = "foo")
```

usage	*Return the Usage of a Function From Within the Function*

Description

Get a usage template for a function from within the function. If you encounter misguided usage, you can display the template.

Usage

```
usage(n = -1, usage = FALSE)
```

Arguments

n   A negative integer giving the number of from to frames/environments to go back
                (passed as which to `sys.call`). Set to `-2` if you want to encapsulate the call
                to usage into a function (like `print` or `assign`) within the function you want
                to obtain the usage for. Use the `<-` assignment operator with the default, see
                examples below.

usage   Give this functions usage (as a usage example . . .) and exit?

Value

A character string giving the Usage as `help` would do.

Examples

```
# usage with assignment operator:
foo <- function(x) {
    u <- usage()
    message("Usage is: ", u)
}
foo()

# usage without assignment operator:
bar <- function(x) {
    message(usage(n = -2))
}
bar()
```

Index