

# Package: mamisc (via r-universe)

October 12, 2024

**Title** Miscellaneous Functions by Paul Hoffman

**Type** Package

**Version** 0.0.0.9001

**Description** More about what it does (maybe more than one line) Use four spaces when indenting paragraphs within the Description.

**URL** <https://github.com/mojaveazure/mamisc>

**BugReports** <https://github.com/mojaveazure/mamisc/issues>

**License** MIT + file LICENSE

**Encoding** UTF-8

**LazyData** true

**RoxygenNote** 7.2.3

**Imports** grDevices, rlang (>= 1.0.6), utils

**Suggests** httr, scales

**Enhances** shiny, shinyjs

**Collate** 'zzz.R' 'collections.R' 'color\_theory.R' 'is.R' 'pkg.R'  
'roxygen.R' 'shinyjs.R' 'sorted.R' 'strings.R' 'www.R'

**Config/Needs/website** pkgdown

**Repository** <https://mojaveazure.r-universe.dev>

**RemoteUrl** <https://github.com/mojaveazure/mamisc>

**RemoteRef** HEAD

**RemoteSha** 509dbeb8c39434f410f0d98a35f4743b0662793a

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## Description

More about what it does (maybe more than one line) Use four spaces when indenting paragraphs within the Description.

## Author(s)

**Maintainer:** Paul Hoffman <hoff0792@umn.edu> ([ORCID](#))

## See Also

Useful links:

- <https://github.com/mojaveazure/mamisc>
- Report bugs at <https://github.com/mojaveazure/mamisc/issues>

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**abbrv***Create Abbreviations*

---

**Description**

Create Abbreviations

**Usage**

```
abbrv(x, digits = TRUE)
```

**Arguments**

x	A character vector
digits	Include digits in the abbreviation

**Value**

Abbreviated versions of x

**Examples**

```
abbrv(c('HelloWorld', 'LetsGo3', 'tomato'))
abbrv(c('HelloWorld', 'LetsGo3', 'tomato'), digits = FALSE)
abbrv('Wow3', digits = FALSE)
```

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**blend\_colors***Blend two or more colors together*

---

**Description**

Blend two or more colors together

**Usage**

```
blend_colors(..., as.rgb = FALSE)
```

**Arguments**

...	Two or more colors to blend together; these can be in a vector or standalone
as.rgb	Return in RGB form, otherwise return in hexadecimal form

**Value**

The blended color in RGB form (1 x 3 matrix) or hexadecimal form

**See Also**

Other color\_theory: [col2hex\(\)](#), [contrast-theory](#), [text\\_color\(\)](#)

**Examples**

```
blend_colors('red', 'green')
if (requireNamespace('scales', quietly = TRUE)) {
  scales::show_col(c('red', blend_colors('red', 'green'), 'green'), ncol = 3)
}
```

---

[col2hex](#)

*Convert R colors to hexadecimal*

---

**Description**

Convert R colors to hexadecimal

**Usage**

```
col2hex(...)
```

**Arguments**

```
...          R colors
```

**Value**

The hexadecimal representations of input colors

**See Also**

Other color\_theory: [blend\\_colors\(\)](#), [contrast-theory](#), [text\\_color\(\)](#)

**Examples**

```
col2hex('black', 'red', 'grey')
```

---

contrast-theory	<i>Color Intensity</i>
-----------------	------------------------

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**Description**

Get the intensity and/or luminance of a color

**Usage**

```
intensity(color)  
luminance(color)
```

**Arguments**

color            A vector of colors

**Value**

A vector of intensities/luminances for each color

**Source**

<https://stackoverflow.com/questions/3942878/how-to-decide-font-color-in-white-or-black-depending-on>

**See Also**

Other color\_theory: [blend\\_colors\(\)](#), [col2hex\(\)](#), [text\\_color\(\)](#)

**Examples**

```
intensity(color = c('black', 'white', '#E76BF3'))  
luminance(color = c('black', 'white', '#E76BF3'))
```

---

interleave	<i>Interleave vectors together</i>
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---

**Description**

Interleave vectors together

**Usage**

```
interleave(...)
```

**Arguments**

...                    Vectors to be interleaved

**Value**

A vector with the values from each vector in ... interleaved

**is\_data\_frame**                *Is an Object a Data Frame*

**Description**

Is an Object a Data Frame

**Usage**

`is_data_frame(x)`

`is_bare_data_frame(x)`

**Arguments**

x                    An object

**Value**

TRUE if x is a data frame, otherwise FALSE

**is\_named\_list**                *Is a List Named*

**Description**

Is a List Named

**Usage**

`is_named_list(x, pass.zero = FALSE)`

**Arguments**

x                    A list

`pass.zero`        Return TRUE for zero-length lists

**Value**

...

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is_nullv	<i>Vectorized Testing of NULL</i>
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---

**Description**

Vectorized Testing of NULL

**Usage**

```
is_nullv(x)
```

**Arguments**

x	A list-like object
---	--------------------

**Value**

...

---

js_tab_hide	<i>Hide Shiny Tabs with ShinyJS</i>
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---

**Description**

Hide Shiny Tabs with **ShinyJS**

**Usage**

```
js_tab_hide(id, values, fxn = "hide")
```

**Arguments**

id	ID of a <code>tabsetPanel</code>
values	One or more values of a <code>tabPanel</code> (see the value parameter)
fxn	Name of JavaScript call function

**Value**

A string with a JavaScript function to hide a set of tabs

**Note**

This function is designed to run custom JavaScript code using `shinyjs::extendShinyJS()`; use of custom JavaScript code requires the **V8** package. **V8** requires a local install of either the **V8** JavaScript Engine or **Node.js**

**See Also**

[shinyjs::extendShinyJS\(\)](#) [shiny::tabPanel\(\)](#)

Other shiny: [js\\_tab\\_key\(\)](#)

Other shinyjs: [js\\_tab\\_key\(\)](#)

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[js\\_tab\\_key](#)

*Get JavaScript IDs for Shiny Tabs*

---

**Description**

Get JavaScript IDs for Shiny Tabs

**Usage**

`js_tab_key(id, values)`

**Arguments**

`id` ID of a [tabsetPanel](#)

`values` One or more values of a [tabPanel](#) (see the `value` parameter)

**Value**

A string with the JavaScript ID for a given set of tabs

**See Also**

[shiny::tabsetPanel\(\)](#) [shiny::tabPanel\(\)](#)

Other shiny: [js\\_tab\\_hide\(\)](#)

Other shinyjs: [js\\_tab\\_hide\(\)](#)

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[online](#)

*Is a Resource Online and Available*

---

**Description**

Check to see if a given resource is online and accessible over the internet

**Usage**

`online(uri, strict = FALSE, timeout =getOption(x = "timeout"))`

**Arguments**

<code>uri</code>	The URI of a given resource
<code>strict</code>	Ensures the HTTP status code is 200
<code>timeout</code>	Timeout in seconds; defaults to the option “ <code>timeout</code> ” (currently set to 60 seconds)

**Value**

TRUE if `uri` is accessible, otherwise FALSE

**Note**

This function requires the `\ href{https://cran.r-project.org/package=httr} \ pkg{httr}` package to be installed

order2

*Keyed Ordering Permutation***Description**

Keyed Ordering Permutation

**Usage**

```
order2(
  ...,
  key = identity,
  na.last = TRUE,
  decreasing = FALSE,
  method = c("auto", "shell", "radix")
)
```

**Arguments**

<code>...</code>	a sequence of numeric, complex, character or logical vectors, all of the same length, or a classed R object.
<code>key</code>	A function that takes a single argument, defaults to <code>identity</code>
<code>na.last</code>	for controlling the treatment of NAs. If TRUE, missing values in the data are put last; if FALSE, they are put first; if NA, they are removed (see ‘Note’.)
<code>decreasing</code>	logical. Should the sort order be increasing or decreasing? For the “ <code>radix</code> ” method, this can be a vector of length equal to the number of arguments in ... and the elements are recycled as necessary. For the other methods, it must be length one.
<code>method</code>	the method to be used: partial matches are allowed. The default (“ <code>auto</code> ”) implies “ <code>radix</code> ” for numeric vectors, integer vectors, logical vectors and factors with fewer than $2^{31}$ elements. Otherwise, it implies “ <code>shell</code> ”. For details of methods “ <code>shell</code> ”, “ <code>quick</code> ”, and “ <code>radix</code> ”, see the help for <code>sort</code> .

**Value**

An integer vector with the ordered indices of the input data

**See Also**

[sorted](#) [base::sort](#) [base::order](#)

oxford

*Create a List with a Serial Comma*

**Description**

Create a List with a Serial Comma

**Usage**

```
oxford(
  ...,
  cnj = c("or", "and"),
  quote = c("single", "double", "none"),
  fancy = getOption(x = "useFancyQuotes", default = TRUE)
)
```

**Arguments**

...	A character vector to join
cnj	Conjunction to use for final entry
quote	Quote the entries of ...; choose from: <ul style="list-style-type: none"> <li>• “single”: single quotes</li> <li>• “double”: double quotes</li> <li>• “none”: no extra quoting</li> </ul>
fancy	Use fancy quotes; defaults to the value of the “useFancyQuotes” option (currently set to TRUE)

**Value**

... arranged into an English list with a serial comma when needed

**See Also**

[sQuote\(\)](#) [dQuote\(\)](#)

**Examples**

```
oxford('cell')
oxford('cell', 'ident')
oxford('cell', 'ident', 'gene')
```

---

powerset

*Generate a powerset*

---

### Description

Generate a powerset

### Usage

`powerset(x)`

### Arguments

x A list or vector of values to generate all possible combinations of

### Value

A list with all possible combinations of x

### Examples

```
powerset(x = 1:3)
powerset(x = letters[1:3])
```

---

rd\_ilist

*Rdocumentation Itemized List*

---

### Description

Generate an Rdocumentation itemized list

### Usage

`rd_ilist(x)`

### Arguments

x A vector of values for the list

### Value

An Rdocumentation itemized list suitable for injecting into documentation files with \Sexpr

### See Also

Other roxygen: [rd\\_required\\_pkgs\(\)](#)

**Examples**

```
#' \Sexpr[results=rd]{odds::rd_ilist()}
```

**rd\_required\_pkgs**      *Rdocumentation Note of Required Packages*

**Description**

Rdocumentation Note of Required Packages

**Usage**

```
rd_required_pkgs(x, multiple = FALSE)
```

**Arguments**

x	A vector of package names
multiple	...

**Value**

...

**See Also**

Other roxygen: [rd\\_ilist\(\)](#)

**Examples**

```
#' \Sexpr[results=rd]{odds::rd_required_pkgs()}
```

**sorted**      *Sort With A Key*

**Description**

Sort With A Key

**Usage**

```
sorted(x, key = identity, decreasing = FALSE, ...)
## Default S3 method:
sorted(x, key = identity, decreasing = FALSE, na.last = NA, ...)
```

**Arguments**

- `x` for sort an R object with a class or a numeric, complex, character or logical vector. For `sort.int`, a numeric, complex, character or logical vector, or a factor.
- `key` A function that takes a single argument, defaults to `identity`
- `decreasing` logical. Should the sort be increasing or decreasing? Not available for partial sorting.
- `...` arguments to be passed to or from methods or (for the default methods and objects without a class) to `sort.int`.
- `na.last` for controlling the treatment of NAs. If TRUE, missing values in the data are put last; if FALSE, they are put first; if NA, they are removed.

**See Also**

`order2` `base::sort` `base::order`

`text_color`

*Text Color*

**Description**

Determine text color based on background color

**Usage**

```
text_color(
  background,
  threshold = 186,
  w3c = FALSE,
  dark = "black",
  light = "white"
)
```

**Arguments**

- `background` A vector of background colors; supports R color names and hexadecimal codes
- `threshold` Intensity threshold for light/dark cutoff; intensities greater than threshold yield dark, others yield light
- `w3c` Use W3C formula for calculating background text color; ignores threshold
- `dark` Color for dark text
- `light` Color for light text

**Value**

A named vector of either dark or light, depending on background; names of vector are background

**Source**

<https://stackoverflow.com/questions/3942878/how-to-decide-font-color-in-white-or-black-depending-on-the-background-color>

**See Also**

Other color\_theory: [blend\\_colors\(\)](#), [col2hex\(\)](#), [contrast-theory](#)

**Examples**

```
text_color(background = c('black', 'white', '#E76BF3'))
```

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