

Package: scFOCAL (via r-universe)

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Type Package

Title Integration of Drug and Single-Cell Gene Expression Signatures

Version 0.1.0

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Description scFOCAL integrates small molecules transcriptional consensus signatures with single-cell gene expression data to identify cell states targeted or resistant to different perturbations. This information is leveraged by the scFOCAL combination index, which identifies synergistic combinations that maximize the discordance across a heterogeneous tumor.

License file LICENSE

Encoding UTF-8

LazyData true

RoxygenNote 7.3.2

URL <https://github.com/Zaoqu-Liu/scFOCAL>

BugReports <https://github.com/Zaoqu-Liu/scFOCAL/issues>

Depends R (>= 3.5)

Imports ComplexHeatmap, corrplot, cowplot, DT, dplyr, edgeR, EnhancedVolcano, fields, ggalluvial, ggforce, ggplot2, ggpubr, ggrepel, ggsci, grid, Hmisc, htmlwidgets, lme4, MASS, MAST, pheatmap, plotly, reshape2, scales, shiny, shinydashboard, shinythemes, stats, stringr, tibble, tidyr, viridis

Suggests Seurat (>= 4.0.0), SeuratObject (>= 4.0.0), testthat (>= 3.0.0), knitr, rmarkdown, gridExtra, circlize, RColorBrewer

VignetteBuilder knitr

Config/testthat/edition 3

Config/pak/sysreqs cmake libfontconfig1-dev libfreetype6-dev make libicu-dev libpng-dev libuv1-dev libssl-dev perl zlib1g-dev

Repository <https://zaoqu-liu.r-universe.dev>
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RemoteUrl <https://github.com/Zaoqu-Liu/scFOCAL>
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L1000_compounds	<i>L1000_compounds</i>
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Description

Compounds included in 2017 Release TCSs as published in Stathias et al., 2018

Usage

L1000_compounds

Format

A character vector with 1679 elements.

id The unique identifier

name The name associated with the id

Source

<http://www.source-of-my-data.com>

`L1000_genes`*L1000_genes*

Description

character vector of L1000-measured genes

Usage

```
L1000_genes
```

Format

chr vector 961 elements

id The unique identifier

name The name associated with the id

Source

<http://www.source-of-my-data.com>

`LINCS.ResponseSigs`*LINCS.ResponseSigs*

Description

2017 Release TCSs as published in Stathias et al., 2018

Usage

```
LINCS.ResponseSigs
```

Format

A data frame with 1679 rows and 961 variables:

id The unique identifier

name The name associated with the id

Source

<http://www.source-of-my-data.com>

runscFOCAL

Launch scFOCAL

Description

Launch scFOCAL

Usage

runscFOCAL()

Examples

runscFOCAL()

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