

Introdução ao R

Anaíle Mendes Rabelo

Conhecendo o R

Conhecendo a Linguagem R

- É uma linguagem de programação livre e de código aberto (um projeto GNU).
- Linguagem de propósito específico – Análise de Dados
 - Computação estatística
 - Criação de Gráficos
- <https://www.r-project.org/about.html>.



Conhecendo a Linguagem R

- ▶ Inúmeros recursos gráficos.
- ▶ Extensível: + 20 mil pacotes no CRAN.
- ▶ Interoperabilidade & Interconectividade: APIs/drivers para outros softwares/linguagens.
- ▶ Multiplataforma: Linux, Mac OS, Windows, Android.

Conhecendo a Linguagem R

Integração “out of box” com quase tudo:

- Oracle
 - SQL Server
 - .NET
 - Java
 - Python
 - Tableau
 - Power BI
 - Hadoop
- } Banco de dados
- } Linguagem de programação
- } Ambientes de BI
- } Processamento Distribuído

Conhecendo o R



[\[Home\]](#)

Download

[CRAN](#)

R Project

[About R](#)

[Logo](#)

[Contributors](#)

[What's New?](#)

[Reporting Bugs](#)

[Conferences](#)

[Search](#)

[Get Involved: Mailing Lists](#)

[Get Involved: Contributing](#)

[Developer Pages](#)

[R Blog](#)

The R Project for Statistical Computing

Getting Started

R is a free software environment for statistical computing and graphics. It compiles and runs on a wide variety of UNIX platforms, Windows and MacOS. To [download R](#), please choose your preferred [CRAN mirror](#).

If you have questions about R like how to download and install the software, or what the license terms are, please read our [answers to frequently asked questions](#) before you send an email.

News

- **R version 4.4.1 (Race for Your Life)** has been released on 2024-06-14.
- We are deeply sorry to announce that our friend and colleague Friedrich (Fritz) Leisch has died. [Read our tribute to Fritz here](#).
- **R version 4.4.0 (Puppy Cup)** has been released on 2024-04-24.
- **R version 4.3.3 (Angel Food Cake)** (wrap-up of 4.3.x) was released on 2024-02-29.
- **Registration for useR! 2024** has opened with early bird deadline March 31 2024.
- You can support the R Foundation with a renewable subscription as a [supporting member](#).

<https://www.r-project.org/>

Conhecendo o CRAN



CRAN

[Mirrors](#)

[What's new?](#)

[Search](#)

[CRAN Team](#)

About R

[R Homepage](#)

[The R Journal](#)

Software

[R Sources](#)

[R Binaries](#)

[Packages](#)

[Task Views](#)

[Other](#)

Documentation

[Manuals](#)

[FAQs](#)

[Contributed](#)

The Comprehensive R Archive Network

Download and Install R

Precompiled binary distributions of the base system and contributed packages, **Windows and Mac** users most likely want one of these versions of R:

- [Download R for Linux \(Debian, Fedora/Redhat, Ubuntu\)](#)
- [Download R for macOS](#)
- [Download R for Windows](#)

R is part of many Linux distributions, you should check with your Linux package management system in addition to the link above.

Source Code for all Platforms

Windows and Mac users most likely want to download the precompiled binaries listed in the upper box, not the source code. The sources have to be compiled before you can use them. If you do not know what this means, you probably do not want to do it!

- The latest release (2024-06-14, Race for Your Life) [R-4.4.1.tar.gz](#), read [what's new](#) in the latest version.
- Sources of [R alpha and beta releases](#) (daily snapshots, created only in time periods before a planned release).
- Daily snapshots of current patched and development versions are [available here](#). Please read about [new features and bug fixes](#) before filing corresponding feature

Pacotes por Tarefas

Topics

<u>ActuarialScience</u>	Actuarial Science
<u>Agriculture</u>	Agricultural Science
<u>Bayesian</u>	Bayesian Inference
<u>CausalInference</u>	Causal Inference
<u>ChemPhys</u>	Chemometrics and Computational Physics
<u>ClinicalTrials</u>	Clinical Trial Design, Monitoring, and Analysis
<u>Cluster</u>	Cluster Analysis & Finite Mixture Models
<u>Databases</u>	Databases with R
<u>DifferentialEquations</u>	Differential Equations
<u>Distributions</u>	Probability Distributions
<u>Econometrics</u>	Econometrics
<u>Environmetrics</u>	Analysis of Ecological and Environmental Data
<u>Epidemiology</u>	Epidemiology
<u>ExperimentalDesign</u>	Design of Experiments (DoE) & Analysis of Experimental Data
<u>ExtremeValue</u>	Extreme Value Analysis
<u>Finance</u>	Empirical Finance
<u>FunctionalData</u>	Functional Data Analysis
<u>GraphicalModels</u>	Graphical Models
<u>HighPerformanceComputing</u>	High-Performance and Parallel Computing with R
<u>Hydrology</u>	Hydrological Data and Modeling
<u>MachineLearning</u>	Machine Learning & Statistical Learning

<https://cran-r.c3sl.ufpr.br/>



PUC Minas
Virtual