

Rebol is designed for the exchange and interpretation of information.

Rebol provides an easy-to-write, easy-to-read format and a wide variety of data-types for expressing data and code.

If you're familiar with JSON, then you know a simple easy way to share information between systems and processes. Rebol is like an extended version of JSON that provides numerous other lexical data-types and can also execute data as code.

Announcement (March 2024)

This Rebol website is moving to a new server that will provide HTTPS secure access via Apache. This is mainly to improve search engine indexing which penalizes non HTTPS websites. Please take note of the following:

- The www.rebol.com server will operate HTTP on port 80 without redirection. This will allow scripts that use that URL to continue to operate.
- CGI scripts for www.rebol.com are currently disabled. We will be re-enabling the important ones as time permits. However, CGI on rebol.com is still operating.
- Also, plans are in the works to improve CSS for pages that don't render well on mobile devices.

Interesting Facts...

- Rebol is pronounced "reb-ol".
 It's similar to "rebel yell" or "rebel with a cause".
- Rebol rebels against the idea that modern software must be large and complex.

 Such systems are painfully slow and expensive to develop and maintain. They quickly degrade into chaos, requiring constant updates and patches.
- Rebol has been downloaded over 5 million times.

 Many of its features have been added to other computer languages, but due to their older, syntax-driven designs, they will never come close to the expressive power of Rebol.
- Rebol is nearly syntax free.

And, as you become fluent, you end up writing code in *sentences*, somewhat similar to human languages. Because our brains are well optimized for sequences of words, Rebol sentences feel natural, and you become more productive.

Rebol invented the concept of dialects.

Dialects provide expressive leverage not found in other languages. They amplify your coding effort by focusing on the essence of what you are trying to do, whether that's creating a user interface or programming a robot's motion.

- Rebol is more than just a programming language.
 - It is also a language for representing data and metadata. It provides a consistent architecture for computation, storage, and exchange of information.
- · Rebol has been intentionally kept small and lightweight.

It only takes a few seconds to download, requires no special libraries, and includes hundreds of functions, dozens of data-types, built-in help, multiple Internet protocols, graphics, sound, and much more.

Rebol was designed by <u>Carl Sassenrath</u>

The operating system architect known for bringing multitasking to personal computers.

Interesting Examples

- Check out <u>Just One Line</u>
 It gives you some idea of the power of Rebol by showing what's possible with just one line of code.
- Or, check out the <u>Demo Gallery</u> or <u>Reblet Gallery</u>
 They show what a few KB of Rebol data and code can do.
- For more, see the <u>Cookbook of Rebol Code Examples</u>
 It shows more detailed examples of using Rebol to solve specific problems.
- Beyond that, visit the <u>REBOL.org Library</u>
 Although a bit old, it shows hundreds of examples and useful programs.
- See <u>Tutorials and Examples</u>
 For many other links to code examples.

A Quick Example...

To get an idea what it looks like, take a simple digital clock as an example.

Every Rebol program begins with a header description. It's actually an object with fields that can be referenced from within the program or from other programs:

```
REBOL [
Title: "Digital Clock"
Version: 1.3.3
Author: "Carl Sassenrath"
Purpose: "Display a simple digital clock on screen."
]
```

The clock code itself is written in the Rebol VID dialect (Visual Interface Dialect). The code here describes a graphical layout that uses a text line (banner) that refreshes once a second, has a graphical gradient shading, and shows the new time every second:

```
clock: layout [
    origin 0
    clock-face: banner 140x32 rate 1
        effect [gradient 0x1 0.0.150 0.0.50]
        feel [engage: func [f a e] [set-face clock-face now/time]]
]
view clock
```

On screen, the clock looks like this:



If you want to see a list of core functions, check out <u>docs/reference.html</u>. Click on any link to see the details. For example check out the <u>decompress</u> function.