

# RED HAT SOFTWARE COLLECTIONS

## BRIDGING DEVELOPMENT AGILITY AND PRODUCTION STABILITY

TECHNOLOGY BRIEF



### BENEFITS

Choose the right runtimes for your project with access to the latest stable versions.

Preserve application stability by running multiple versions of software components side-by-side.

Deploy resulting applications with confidence.

### REQUIREMENTS

Red Hat Software Collections is available for Red Hat Enterprise Linux 6.2 and higher, for 64-bit Intel and AMD architectures.

[facebook.com/rheldevelop](https://facebook.com/rheldevelop)

[@rheldevelop](https://twitter.com/rheldevelop)

[linkedin.com/in/rheldevelop](https://linkedin.com/in/rheldevelop)

[developerblog.redhat.com](https://developerblog.redhat.com)

### INTRODUCTION

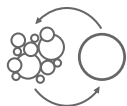
Easy access to advancements in runtime technologies leads to more innovative applications. Red Hat® Software Collections delivers the latest stable versions of dynamic languages, open source databases, and web development tools that can be deployed alongside those included in Red Hat Enterprise Linux. Red Hat Software Collections is available with select Red Hat Enterprise Linux subscriptions and has a three-year life cycle to allow rapid innovation without sacrificing stability.

Some applications require more recent versions of software components to make use of new functionality. Red Hat Software Collections provides a set of dynamic programming languages, database servers, and related packages that are either more recent than those included in Red Hat Enterprise Linux, or are being made available for use with Red Hat Enterprise Linux for the first time.

Red Hat uses software collections functionality to deliver Red Hat Software Collections. Software collections functionality – not to be confused with Red Hat Software Collections – has been available since Red Hat Enterprise Linux 5.9 and Red Hat Enterprise Linux 6.3.

Software collections functionality provides a structural definition, independent of the operating system, for applications or tools. This allows you to build and concurrently install multiple versions of the same software components on your system. Packages built using software collections technology do not overwrite system files and can depend on other software collections.

Red Hat Software Collections is a prescribed set of content intended for use in Red Hat Enterprise Linux production environments. Red Hat Software Collections lets you choose the runtime versions best suited for your projects, preserve application stability, and deploy your applications with confidence.



**ABOUT RED HAT  
ENTERPRISE LINUX  
DEVELOPER PROGRAM**

The Red Hat Enterprise Linux Developer Program combines development agility with production stability and delivers the latest stable developer tools and instructional resources—backed by an ecosystem of experts. It helps you develop great Linux applications faster.

**CHOOSE RUNTIMES BEST SUITED FOR YOUR PROJECT**

Red Hat makes stable tools and runtime technologies available for use with Red Hat Enterprise Linux under its 10-year life cycle. Red Hat Software Collections augments this with access to recent stable versions of popular dynamic languages, open source databases, and web development tools, under a three-year life cycle.

By adopting Red Hat Software Collections, developers can take advantage of innovation with the latest stable versions of Ruby and Rails, PHP, Python, MySQL, and more—without the effort and risk associated with installing and troubleshooting unsupported community versions. The packages included in Red Hat Software Collections are suited for projects with shorter application life cycles. Applications with life cycles greater than 5 years can benefit from the packages that are included in Red Hat Enterprise Linux.

**PRESERVE APPLICATION STABILITY**

Components in Red Hat Software Collections are packaged so that they can be installed on Red Hat Enterprise Linux 6 and run concurrently alongside existing versions without overwriting system files. Red Hat Software Collections does not replace the components that ship with Red Hat Enterprise Linux. This means that you can preserve stability as you deploy applications built on newer versions of Python, Ruby, and other runtime languages. The same is true of database instances.

**DEPLOY WITH CONFIDENCE**

Subscribers can deploy resulting applications into production with confidence because Red Hat Software Collections releases are supported for 3 years. Resulting applications can be natively developed and deployed on Red Hat Enterprise Linux in physical, virtual, and cloud environments, offering customers exceptional flexibility and choice for development and deployment.

**FEATURES AND CAPABILITIES**

Red Hat Software Collections 1.1 includes access to advanced capabilities through the following components:

COMPONENT	SOFTWARE COLLECTION	DESCRIPTION
<b>DYNAMIC LANGUAGES AND PLATFORMS</b>		
Perl 5.16.3	perl516	A recent stable release of Perl with a number of additional utilities, scripts, and database connectors for MySQL and PostgreSQL. This version provides a large number of new features and enhancements, including new debugging options, improved Unicode support, and better performance.
PHP 5.4	php54	A recent stable release of PHP with PEAR 1.9.4 and a number of additional utilities. This version provides new language syntax, a built-in web server for the command line, and improved performance.

COMPONENT	SOFTWARE COLLECTION	DESCRIPTION
PHP 5.5	php55	A recent stable release of PHP with enhanced language features, including better exception handling, generators, and Zend OPcache. This version also includes memcache and MongoDB extensions, as well as a number of other enhancements and bug fixes.
Python 2.7	python27	A recent stable release of Python 2 with a number of additional utilities and database connectors for MySQL and PostgreSQL. This version provides various new features and enhancements, including a new ordered dictionary type, faster I/O operations, and improved forward compatibility with Python 3.
Python 3.3	python33	A recent stable release of Python 3 with a number of additional utilities and a database connector for PostgreSQL. This software collection gives developers on Red Hat Enterprise Linux 6 access to Python 3 and allows them to test the compatibility of their applications with this version.
Ruby 1.9.3	ruby193	A recent stable release of Ruby with Rails 3.2.8 and a large collection of Ruby gems. This software collection gives developers on Red Hat Enterprise Linux 6 access to Ruby 1.9, which provides a number of new features and enhancements, including improved Unicode support, enhanced threading, and faster load times.
Ruby 2.0.0	ruby200	A recent stable release of Ruby 2 and, in its own collection, Ruby on Rails 4 give users the ability to access and install an updated version of Ruby without necessarily having to install an updated version of Rails. Ruby 2.0.0 provides substantial performance and reliability improvements and includes a number of new features and improved debugging capabilities, while maintaining source-level backward compatibility with Ruby 1.9.3.
Ruby on Rails 4.0	ror40	
Node.js 0.10[a]	nodejs010	A recent stable release of Node.js. This software collection gives users of Red Hat Enterprise Linux 6 access to this programming platform.
<b>OPEN SOURCE DATABASES</b>		
MariaDB 5.5	mariadb55	A recent stable release of MariaDB. This software collection gives users of Red Hat Enterprise Linux 6 an alternative to MySQL, which is binary compatible with MariaDB and can be replaced with it without any data conversions.

COMPONENT	SOFTWARE COLLECTION	DESCRIPTION
MongoDB 2.4	mongodb24	A recent stable release of MongoDB, a high-performance, cross-platform document database that provides high availability and easy scalability. This version includes enhanced geospatial support, the V8 JavaScript engine, security enhancements, text search (beta), and hashed indexes.
MySQL 5.5	mysql55	A recent stable release of MySQL. This version provides a number of new features and enhancements, including improved performance.
PostgreSQL 9.2	postgres92	A recent stable release of PostgreSQL. This version provides a number of new features and enhancements, including native JSON support, improved scalability, and better performance.

#### INFRASTRUCTURE COMPONENTS

Apache HTTP Server 2.4	httpd24	A recent stable release of Apache HTTP Server (httpd) includes a high performance event-based processing model for high-traffic environments and enhancements to both SSL and proxy load-balancing support.
Nginx 1.4.4 [a]	nginx14	A recent release of Nginx, a web and proxy server that focuses on high concurrency, performance, and low memory usage.

#### OTHER

Thermostat 1	thermostat1	A recent stable release of Thermostat, a powerful monitoring and instrumentation tool for monitoring Java virtual machine (JVM) instances on multiple hosts.
--------------	-------------	--

[a] In Red Hat Software Collections 1.1, both Node.js and Nginx are included as a technology preview. For more information about Red Hat technology previews, see: <https://access.redhat.com/support/offerings/techpreview/>

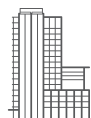
With the exception of Node.js and Nginx, which are technology previews, all Red Hat Software Collections components are fully supported under Red Hat Enterprise Linux subscription support-level agreements (SLAs).

Components are functionally complete and intended for production use. Red Hat Software Collections is available to customers and partners using Red Hat Enterprise Linux 6 with select active Red Hat Enterprise Linux subscriptions, including:

- Red Hat Enterprise Linux Server, Standard and Premium
- Red Hat Enterprise Linux Workstation, Standard and Premium
- Red Hat Enterprise Linux Academic Server, self-support
- Red Hat Enterprise Linux Academic Workstation, self-support
- Red Hat Enterprise Linux Academic Site Subscription, all support levels
- Red Hat Enterprise Linux Developer Suite
- Red Hat Enterprise Linux Developer Support, all support levels
- Red Hat Enterprise Linux Developer Workstation, all support levels
- Red Hat Enterprise Linux Not-for-Resale (NFR) subscriptions for qualifying partners
- Red Hat Enterprise Linux Virtualization Promotional Bundle, all support levels

## NEXT STEPS

Learn more about Red Hat Software Collections at the Red Hat Customer Portal. Then visit the Red Hat online store or contact a Red Hat sales or support representative to learn how you can get started with Red Hat Software Collections today.



## ABOUT RED HAT

Red Hat is the world's leading provider of open source solutions, using a community-powered approach to provide reliable and high-performing cloud, virtualization, storage, Linux, and middleware technologies. Red Hat also offers award-winning support, training, and consulting services. Red Hat is an S&P company with more than 70 offices spanning the globe, empowering its customers' businesses.



facebook.com/redhatinc  
@redhatnews  
linkedin.com/company/red-hat

**NORTH AMERICA**  
1 888 REDHAT1

**EUROPE, MIDDLE EAST,  
AND AFRICA**  
00800 7334 2835  
europe@redhat.com

**ASIA PACIFIC**  
+65 6490 4200  
apac@redhat.com

**LATIN AMERICA**  
+54 11 4329 7300  
info-latam@redhat.com