

WebStart and Jar Signing

Overview

Java Web Start is a technology developed by Sun Microsystems (now Oracle) to allow you to download and run Java applications directly from your browser with one-click activation.

Java Web Start requires that any JAR downloaded is signed by the software vendor. To support this requirement, Artifactory lets you manage a set of signing keys that are used to automatically sign JAR files downloaded from a virtual repository.

For more information, please refer to the [Oracle documentation for Java Web Start](#).

Page Contents

- [Overview](#)
- [Managing Signing Keys](#)
 - [Generating JAR Signing Keys](#)
 - [Setting Your Keystore and Keys](#)
 - [Removing a Key Pair](#)
 - [Configuring Virtual Repositories to Sign JARs](#)

Managing Signing Keys

Signing keys are managed in the **Admin** module under **Security | Signing Keys**.

Debian Signing Key

Debian signing keys are also managed on this page, however these are not related to JAR signing. For details, please refer to [Debian Signing Keys](#).

Generating JAR Signing Keys

In order to sign JAR files, you first need to create a keystore, and generate and add key pairs to it. These can be created with Oracle's `keytool` utility, that comes built into your Java Runtime Environment (JRE), by executing the following command:

```
keytool -keystore <keystore filename> -keypass <key_password> -storepass <store_password> -alias <store_alias> \  
-genkeypair -dname "cn=<cName>, ou=<orgUnit>, o=<orgName>, S=<stateName>, c=<country>" -validity <days>
```

For details, please refer to the Oracle [keytool - Key and Certificate Management Tool documentation](#).

Setting Your Keystore and Keys

Before you can add a keystore, you must set the password that will be needed to make any later changes to the keystore. You will need this password to remove or update the keystore.

Set the password and click "Create". This will unlock the rest of the keystore management fields.

Change Key Store Password

Password *

Retype Password *

Create

Once your keystore password is set and you have created a keystore and a set of signing keys, you can add them to Artifactory.

First upload your keystore file under **Add Key-Store** and enter the keystore password. Click "Unlock"

Add Key-Store

Key-Store *	Key-Store Password *
<input type="text" value="acme-demo.store"/>	<input type="password" value="....."/>
<input type="button" value="Unlock"/>	

Once your keystore is set in Artifactory you may add key pairs under **Add Key-Pair**.

Add Key-Pair

Key-Pair Name *	Key-Pair Alias Name *
<input type="text" value="ACME"/>	<input type="text" value="acme-demo"/>
Private Key Password *	
<input type="password" value="....."/>	
<input type="button" value="Cancel"/> <input type="button" value="Save Keypair"/>	

Removing a Key Pair

To remove a key pair, simply select the key pair and click "Remove".

Remove Key-Pair

Choose a Key-Pair to Remove	<input type="button" value="Remove"/>
<input type="text" value="ACME"/>	

Configuring Virtual Repositories to Sign JARs

Once Artifactory has a keystore and key pairs, you can configure a virtual repository with the key pair you wish to use for JAR signing. This is done in the [Advanced settings](#) of the virtual repository configuration screen.

Edit libs-release Repository

Basic

Advanced

Artifactory Requests Can Retrieve Remote Artifacts [?](#)

Cleanup Repository References in POMs [?](#)

Discard active references

Key-Pair

acme