

Step by step guide to set up master and agent machines on Windows

 Note: There is no need to install Jenkins on the agent machine.

1. On your master machine go to **Manage Jenkins > Manage Nodes**.



Manage Nodes

Add, remove, control and monitor the various nodes that Jenkins runs jobs on.

2. **New Node**

- a. **Enter Node Name**
- b. **Select Permanent Agent**
- c. Press **OK**.

Node name

- Permanent Agent**

Adds a plain, permanent agent such as dynamic provisioned machines managed outside Jenkins.

- Copy Existing Node**

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OK

3. Fill out the following:

- a. Set a **number of executors**
 - i. (one or more) as needed.
- b. Set a **Remote FS Root**
 - i. a home directory for the master on the agent machine.
 - ii. For a *Windows agent*, use something like: "C:\Jenkins\"
- c. Select the appropriate **Usage** setting:
 - i. For an additional worker: *Utilize this node as much as possible*
 - ii. For specialized jobs: *Leave this machine for tied jobs only*
- d. **Launch Method**:
 - i. An easy way to control a Windows agent is by using *Launch agent via Java Web Start* (Recommended for Windows)
 - ii. TODO: add steps for other methods.
- e. **Availability**
 - i. *Keep this agent online as much as possible*
 - ii. TODO: add details for each option.
- f. Press **OK**.

Name	Jenkins Slave
Description	
# of executors	2
Remote FS root	C:\Jenkins\
Labels	
Usage	Leave this machine for tied jobs only
Launch method	Launch slave agents via Java Web Start
Availability	Keep this agent online as much as possible
Node Properties	
<input type="checkbox"/>	Enable console view
<input type="checkbox"/>	Prepare job environment
<input type="checkbox"/>	Test Location
<input type="button" value="Save"/>	

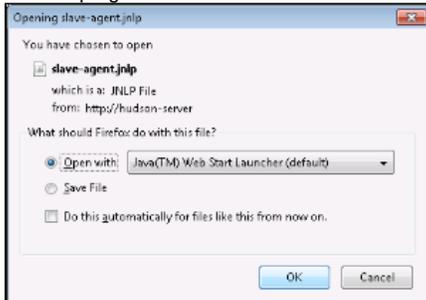
4. Now you need to connect your agent machine to the master using the following steps.

- a. Open a browser on the **agent machine** and go to the **Jenkins master server** url (<http://yourjenkinsmaster:8080>).
- b. Go to **Manage Jenkins > Manage Nodes**,
 - i. Click on the newly created agent machine. You will need to login as someone that has the "Connect" Agent permission if you have configured global security.

- c. Click on the **Launch** button to launch agent from browser on agent.

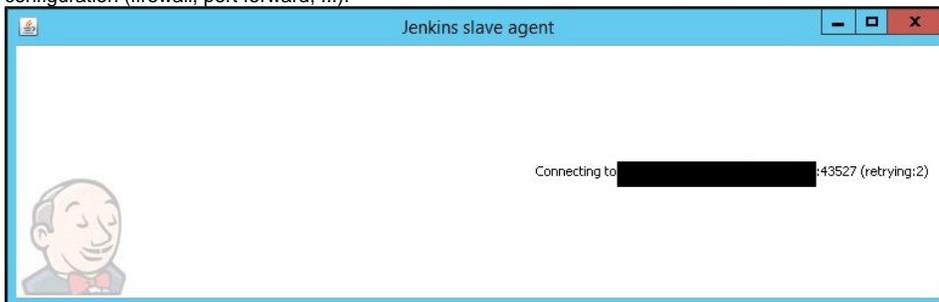


- d. Run the program.



If Windows asks you to choose a program, use %JAVA_HOME%\bin\javaws.exe (the Java Web Start Launcher).

- e. If you encounter connection issue, then you could enlarge the popup windows to see the master **port used** and check your network configuration (firewall, port forward, ...).

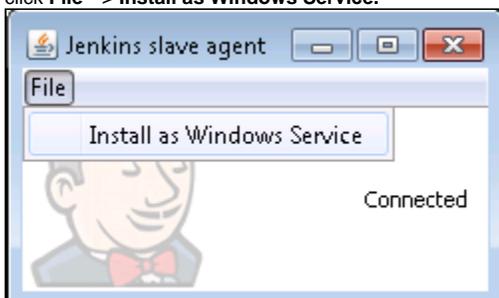


Note that Jenkins chooses a random, high-number port. If you want Jenkins to use a static port, go to "Manage Jenkins" > "Configure Global Security" and choose the port number in the "TCP port for JNLP agents" box.

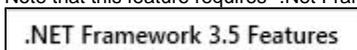
- f. If the port is open, the agent still can't connect, and your Jenkins instance is served securely over SSL/HTTPS, download and install the [Java Cryptography Extension \(JCE\) Unlimited Strength Jurisdiction Policy Files 8](#). Take the .jar files and save them to %JAVA_HOME%\lib\security. Try the above steps again.
- g. Now you should see the agent machine connected under **Nodes**.



1. If you want the service to run on start-up of the agent machine do the following (Windows only directions):
- In the agent program running on your agent machine,
 - click **File --> Install as Windows Service**.



Note that this feature requires ".Net Framework 3.5"



- c. **Start**, type Services and Select the **Services** program.
- d. Find **Jenkins Agent** in the list, Double click to open.
- e. Select **Startup type** --> **Automatic**.
- f. Go to the **Log On** tab, change the **Log on as** to a user of your choice (Special user account Jenkins recommended).
- g. Make sure that auto login is set for the agent machine for the user account, then the VM (or physical computer) should connect and be available when needed.

TODO: Add steps for connecting via ssh

Also: take a look at [Distributed builds](#)