

Submitting FGI jobs from CSC's servers

This instruction guides you through the five steps that are necessary in order to submit grid jobs from the hippu.csc.fi servers of CSC. If you are already using locally installed ARC client, you can go directly to step Step 4. *Store the certificate into the certificate repository in Scientist's User Interface.*

Step 1. Obtain the certificate

Step 2 . Exporting the certificate from the browser

Step 3. Joining the fgj.csc.fi Virtual Organization

Step 4. Store the certificate into the certificate repository in Scientist's User Interface

After steps 1 and 2. you have installed the certificate into you browser. You should also have a file "*usercert.p12*" somewhere in your computer. The next thing is to import this file to the "*My Certificates*" repository in Scientist's User Interface (SUI) service at CSC. Note that this step requires that you have a CSC user account.

To use the repository, go to URL:

<https://sui.csc.fi/group/sui/my-certificates>

When you use this service for the first time you need to set up a password that this certificate repository will use.

This is done by right-clicking the repository and selecting:

Security settings

Once you have defined the repository password (this password is not in any technical way linked to your CSC, SUI or certificate passwords), you can import the certificate to this repository.

Right-click the empty certificate menu and select:

Upload

Change the file format from PEM to PKCS12 and select "**Upload**" to select and import your certificate file.

When you import the usercert.p12 file, SUI will ask for the certificate password. This is the password that you have assigned for the certificate in the Terena certificate portal (not the certificate repository of CSC password).

After giving the password, check the certificate information and click: "**Save**" button.

The certificate should now be visible as one row in the certificate table.

Step 5. Exporting the certificate to Hippu

Once you have the certificate in the *My Certificates* repository in the Scientist's User Interface, you can easily export it in PKCS12 format to your home pc by logging in to the service and using the Download command.

You can use this command also to store the certificate in PEM format to the *.globus* directory of Hippu. This is necessary to be able to submit grid-jobs from Hippu servers-

1. Select the certificate from the list.
2. Right-click and select:

Download

3. Then select:

Download Destination: **Globus directory (\$HOME/.globus)**

File format: **PEM**

After defining the password for the PEM certificate files, they will be stored to the *.globus* directory of your CSC home directory. This is the default location for the certificates that grid tools at CSC will use.

Using ARC in Hippu.csc.fi

You need to perform the five preparatory steps mentioned above only once. After that you can just run the following ARC middleware set up command after each login:

```
moudule load nordugrid-arc
```

After that you should be able to run ARC-commands like:

```
arcproxy  
arcsub job.xrs1  
arcstat -a
```