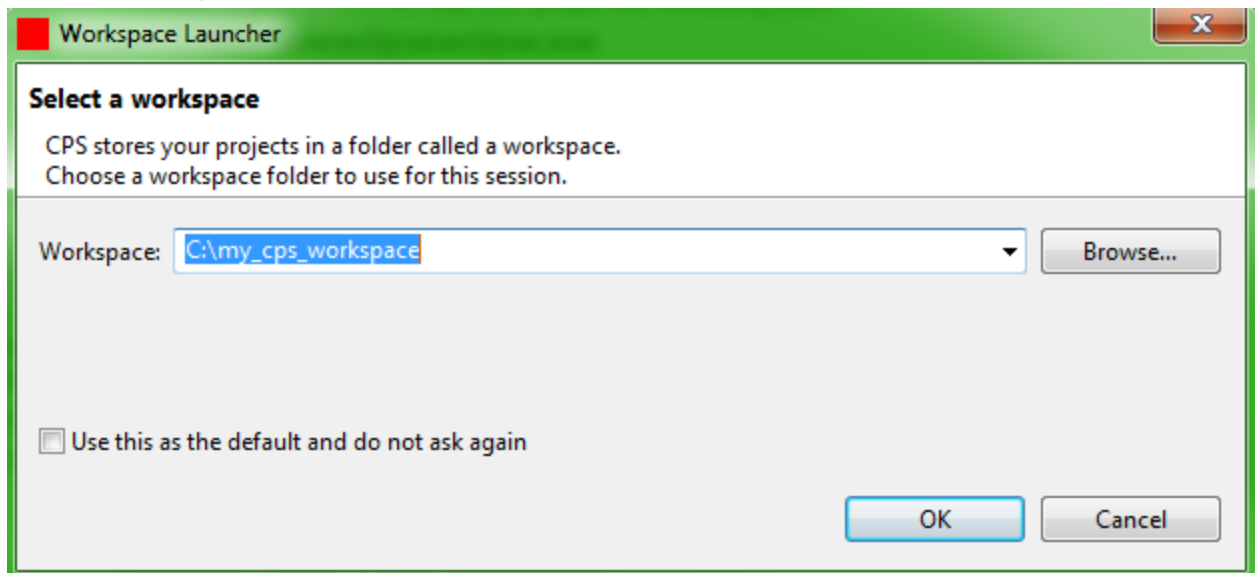# CPS User Manual

v1.0

1.0 - Launching the Cloud Provisioning System

The CPS system is distributed on the CD under the following path:
CPS_System\Executable\eclipse\eclipse.exe

To launch CPS:

1. Double click on the eclipse.exe file at the above path.
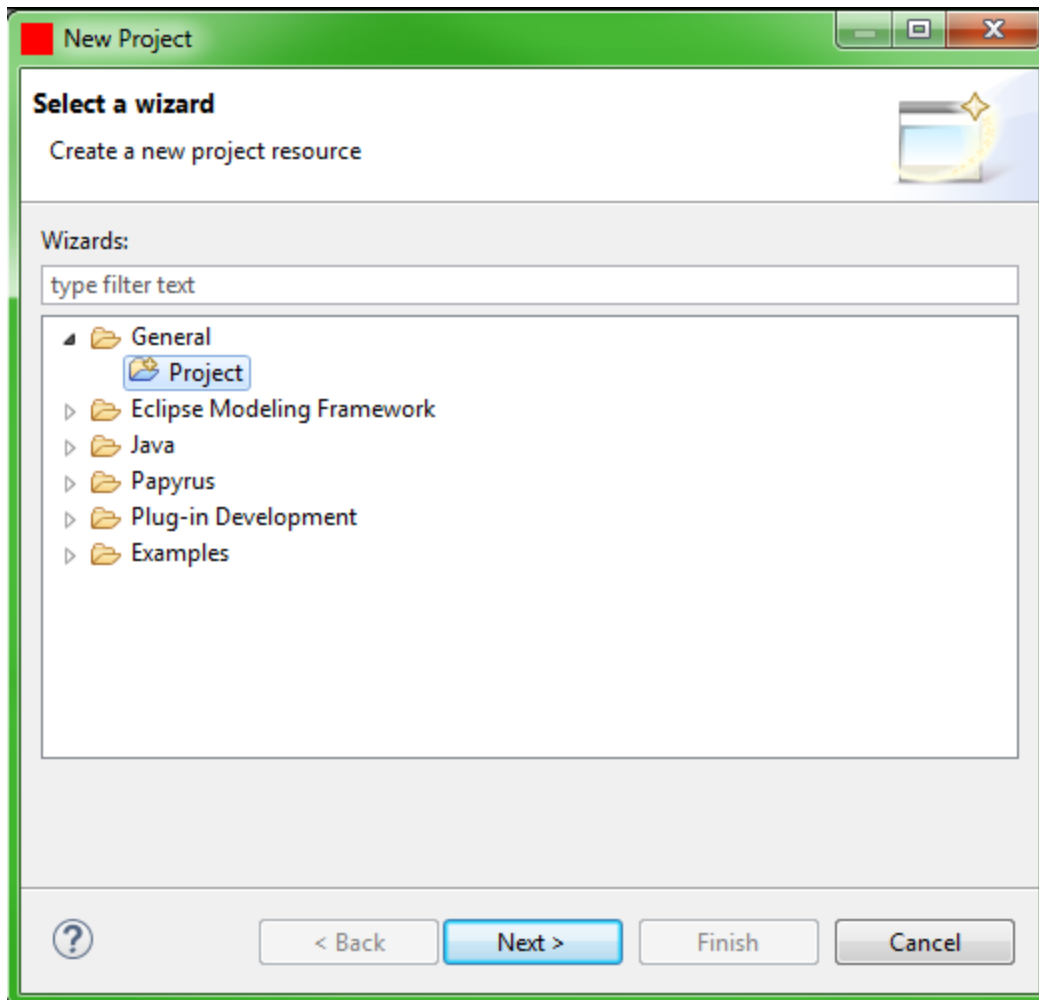
2. Select a workspace:

After selecting a workspace, the CPS system will load.

2.0 - Creating a New Modeling Project

1. Click on the File menu on the top of the user interface.

2. Select New → Project.
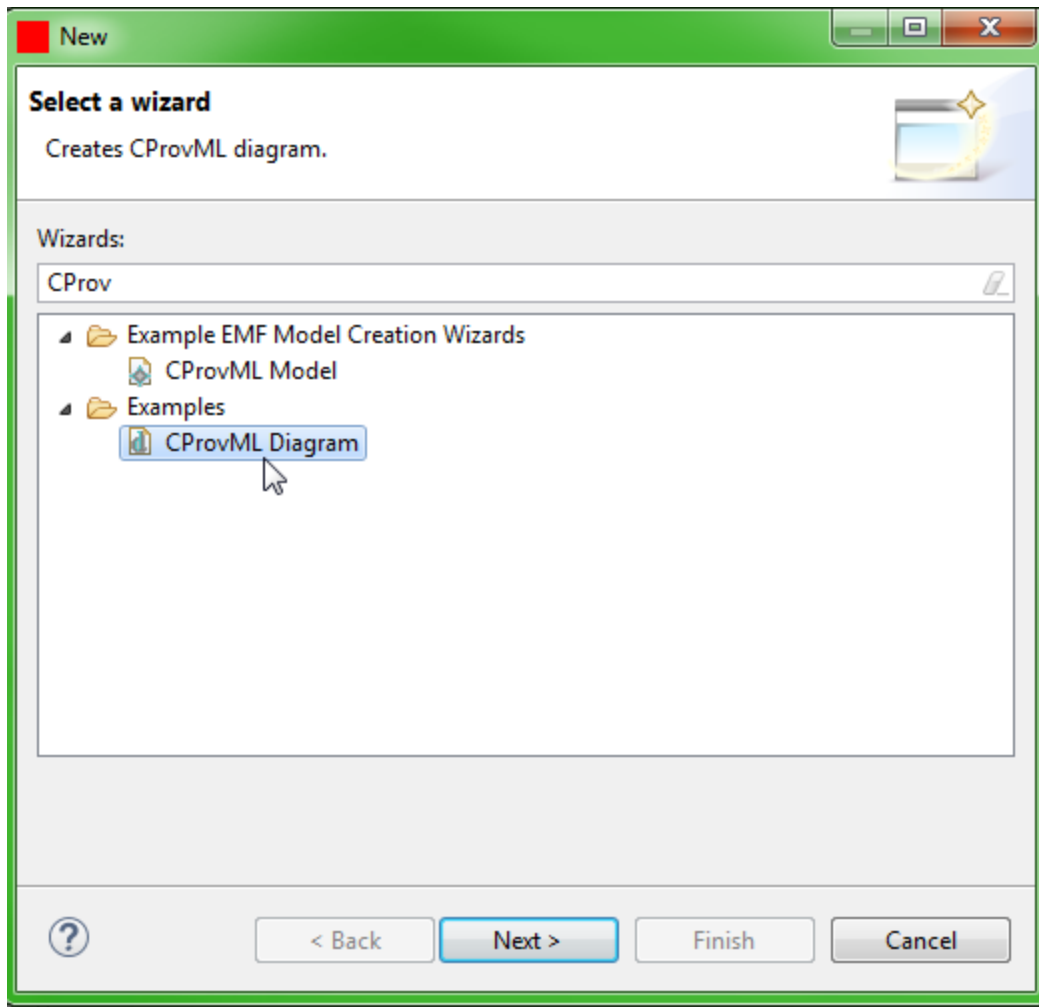
3. Choose General → Project, and click Next.

4. Enter a name for the project and Click "Finish".

3.0 - Creating Your First Diagram

1. Right click on the recently created project.

2. Select New→ Other→ CProv Diagram

3. Click→ Next

4. Enter a name for the diagram or use the default name.

5. Click "Finish".

4.0 - Adding Nodes/Connections to your Diagram

CPS Comes with a simple and intuitive palette which can be used to add elements onto the model canvas. This is a simple two step process:
   1. Click on the desired icon on the Palette
   2. Click on the desired location on the Canvas

The Palette contains the following different types of icons:

1. **Environment** → A Pseudo Virtual Private Cloud/Network
2. **Security Group** → Connects multiples instances and users to the same access control list.
3. **Network Node** → Represents the common types of networks available.
4. **Instance Node**→ represents a server instance able to be configured.
5. **Storage Node** → represents the different types of secondary memory (Hard Drive, SSD, etc…)
6. **Connection icon**→ allows for any two of the above mentioned nodes to be connected to one another.
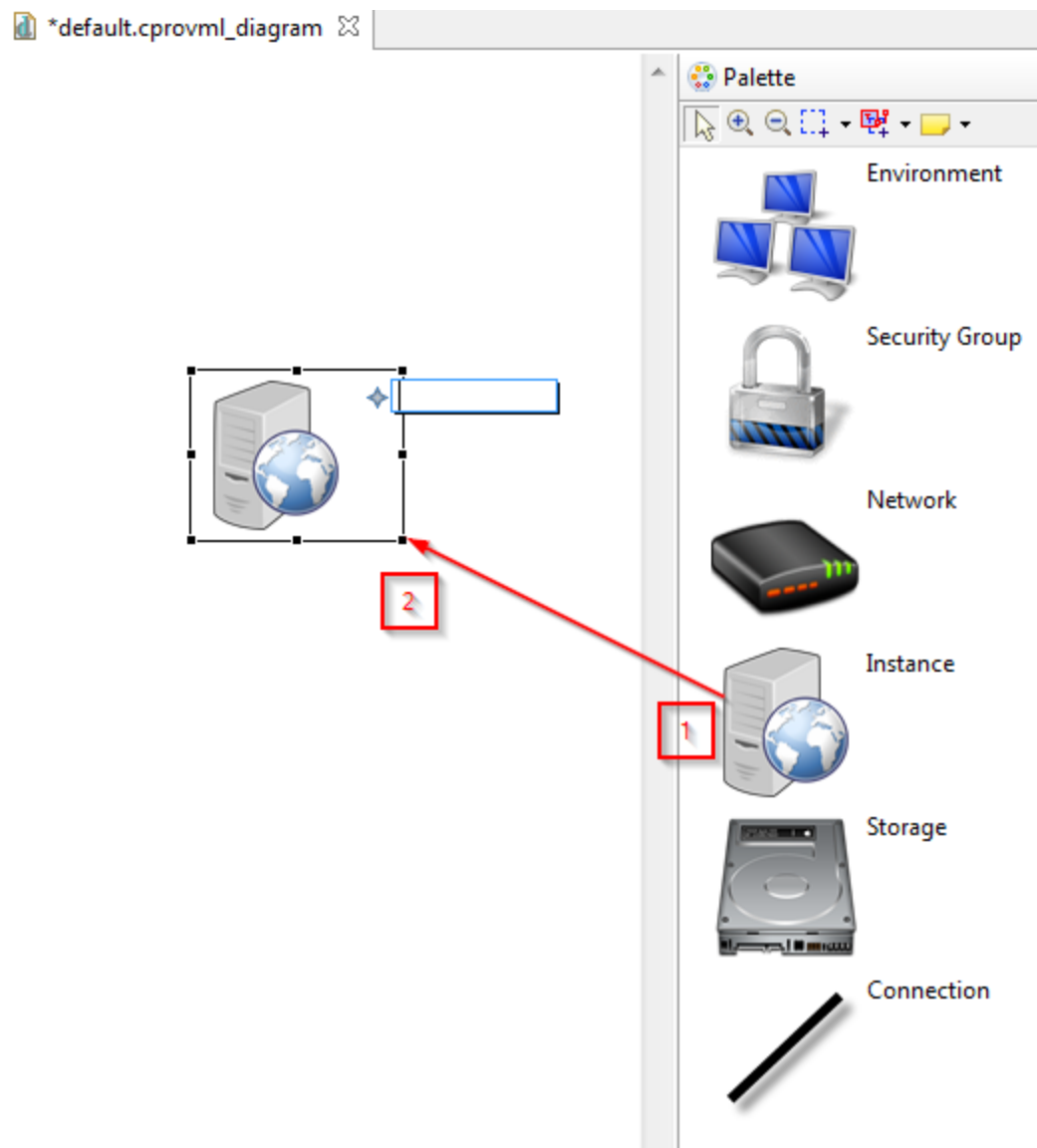
Connections could also be made between nodes using the **Connection** icon on the Palette.
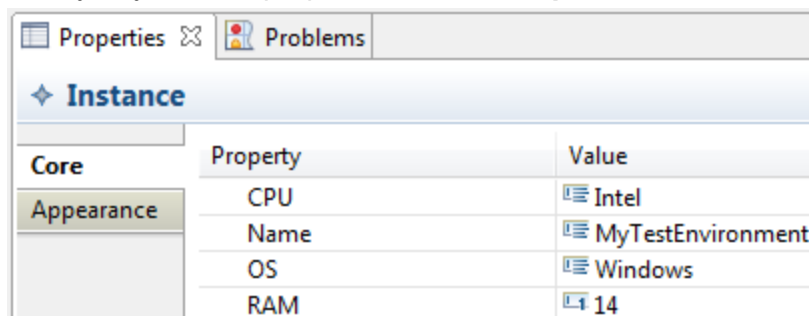
5.0 - Modifying Node Properties

Once nodes have been added to your canvas, you will want to change various properties.

1. Enable the **Properties** view. To enable this view, select **Window → Show View → Other…** and load **General → Properties**.
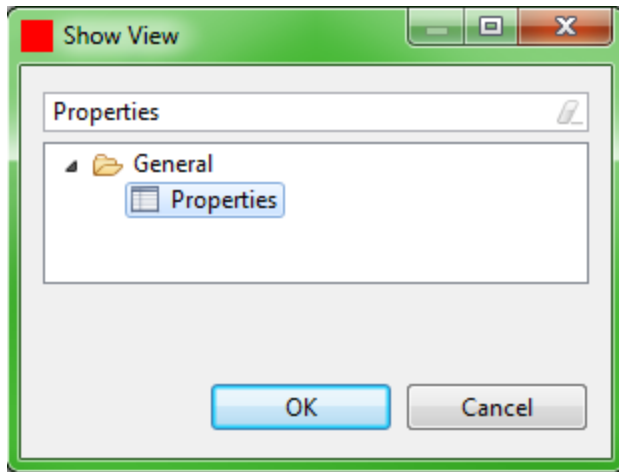
2. Select a node on the canvas. As an example, we will choose an **Instance** node.

3. Modify any desired properties via the **Properties** window:
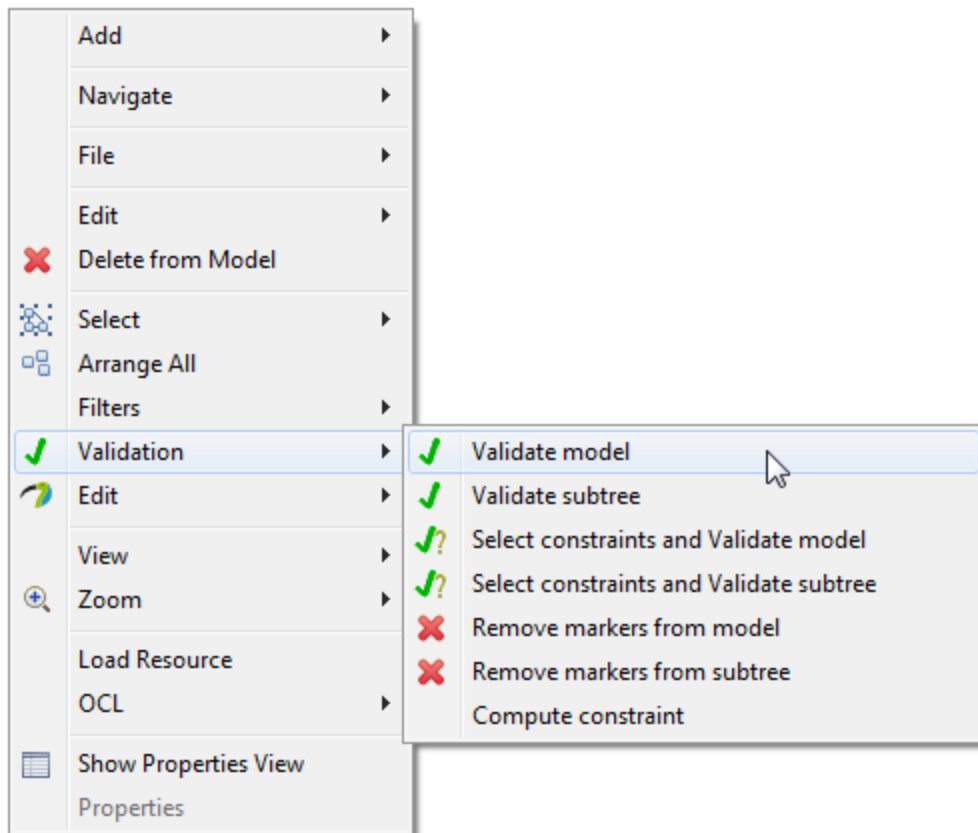
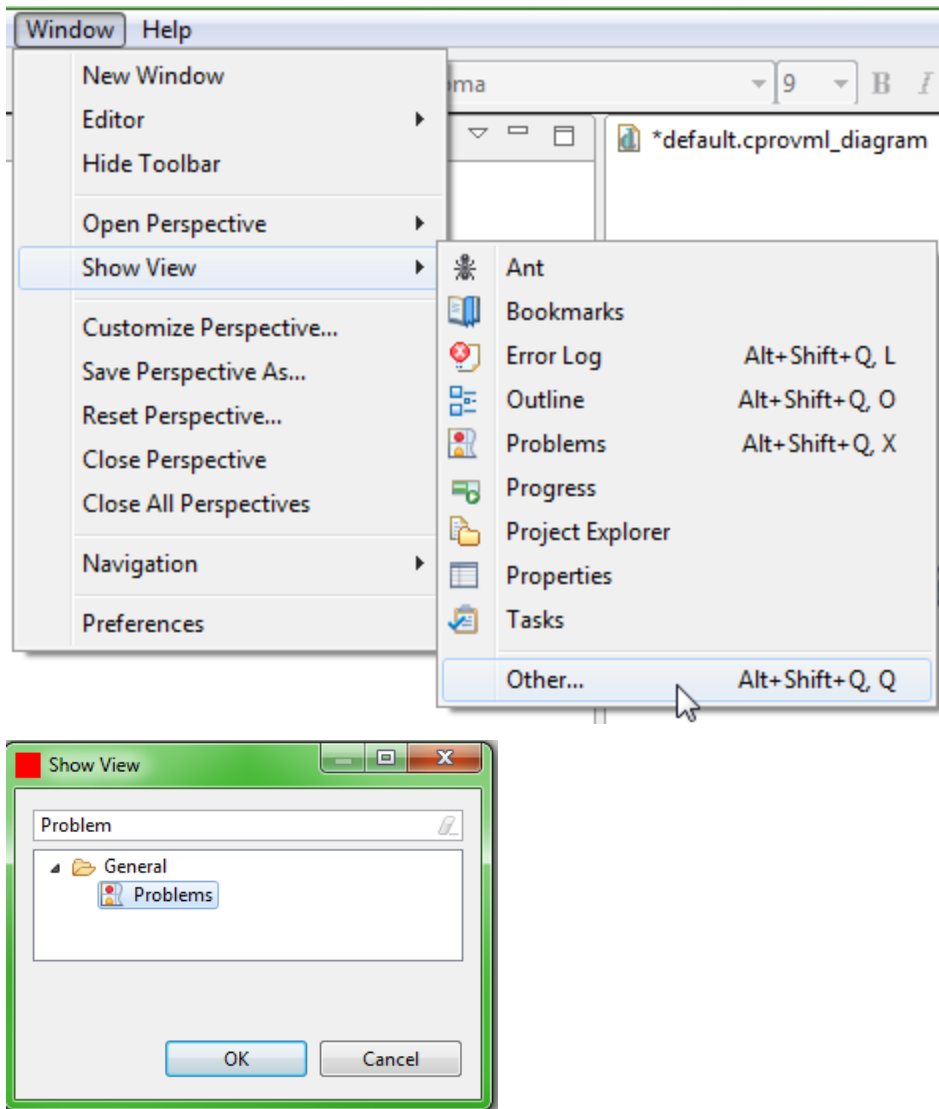

6.0 - Validating a Diagram

The CPS system allows you to validate your diagram to ensure there are no errors. In order to validate:

1. Right click on the canvas area of the diagram.

2. Select Validation-->Validate Model

3. Enable the **Problems** view to see any outstanding validation errors. To enable this view, select **Window → Show View → Other…** and load **General → Problems**.

7.0 - Saving the Diagram

1. Click on the **File** on the top menu.

2. Select→ **Save**

8.0 - Save As on an Existing Diagram/Model

1. Click on the **File** on the top menu.

2. Select→ **Save as**

3. Rename the diagram file.

4. Click → **OK**

9.0 - Transforming a Diagram to X-CProv-ML

In order to transform a file, either a CProv model or diagram must be focused on the CPS editor.

1. Click on the **CProvML** on the top menu.

2. Select→ **Transform to X-CProvML.**

If successful, A file with the extension **.xcprovml** will be created in the project folder.

10.0 - Transforming an X-CProv-ML to Amazon EC2 Calls

5. Click on the **CProvML** on the top menu.

6. Select→ **Transform to EC2 Calls**

Select a file with an **.xcprovml** extension in the file picker window and click **Open.**