



ProM v6.14 Guide

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ProM Version 6.14 Guide

During the development of the project, we wanted to satisfy our curiosity by exploring the new features introduced in ProM version 6.14, comparing it with ProM version 6.5.1, which is recommended for use during the course.

Simplified Installation

To begin, we downloaded the new version directly from the [official ProM Tools website](#). Specifically, for the purpose of creating this guide, we downloaded the file from the “ProM 6.14 Windows with 64-bit JRE8” section, which is provided as a .exe file. Once the executable file was launched, it initiated the installation process, during which we left all options set to their default values.

Don't worry, the files we will provide do not require installation. You will simply need to move the files from the compressed .zip archive as indicated here, of course, after extracting them from the compressed folder.

For this reason, we won't discuss the other packages we installed, as you will find them already included in the release. This way, we avoid boring you with less important instructions.

The Zip needs to be extracted into your ‘Users’ folder, for example ‘C:\Users\filippo’.

! VERY IMPORTANT !

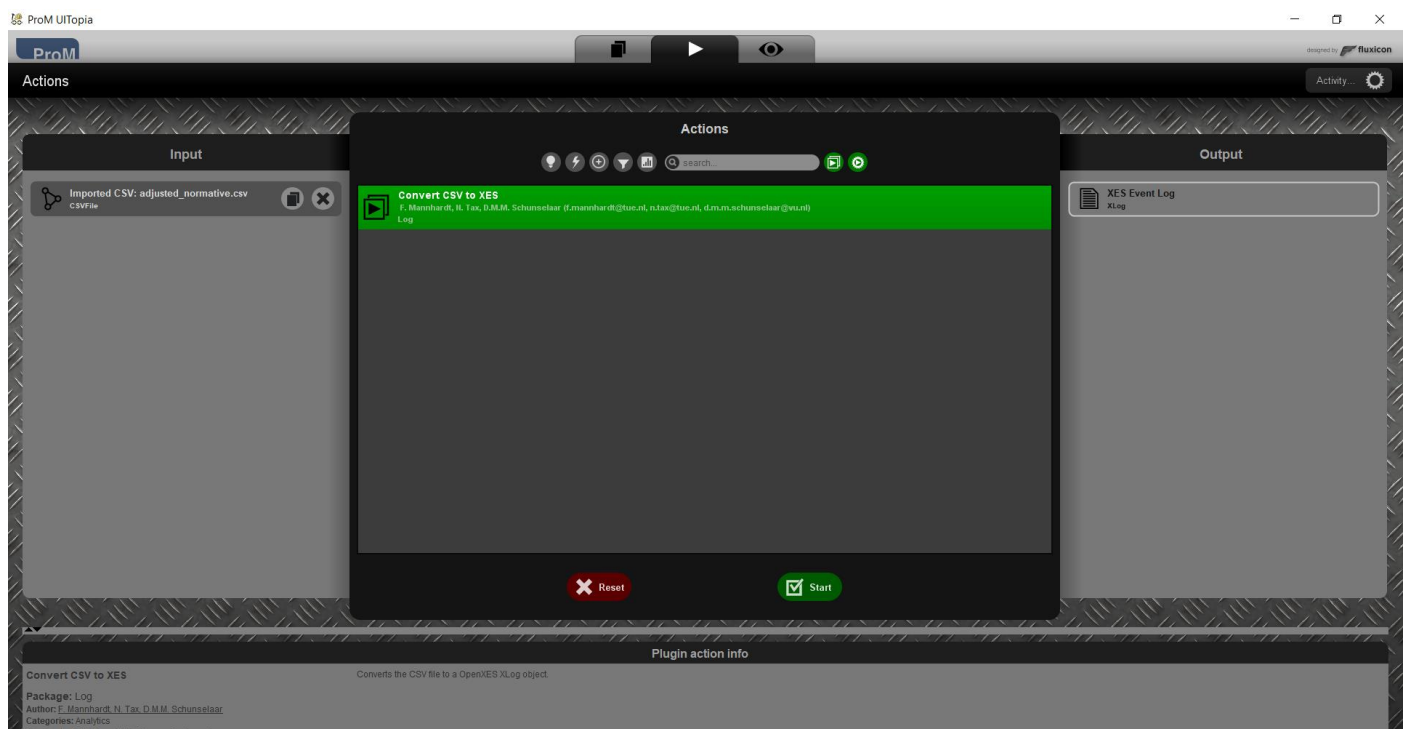
The first execution of the program must be done using [ProM614.bat](#). During this initial run, ProM checks which plugins have already been installed. Don't be alarmed if the script seems to have frozen, it simply takes a long time. Therefore, be very careful not to interrupt this first execution and let it proceed undisturbed for as long as needed (typically 3 or 4 minutes). In the end, ProM should start just fine.

Mini-guides

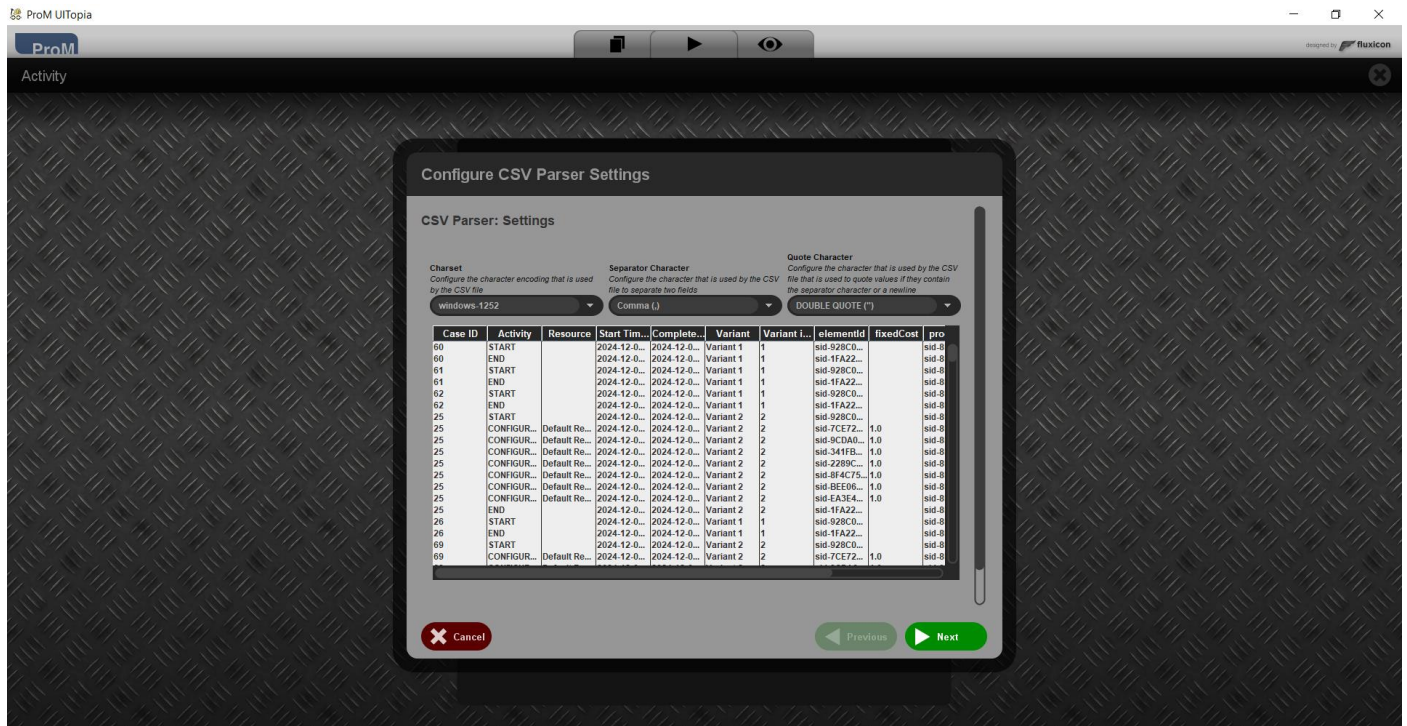
Let's finally take a look at what is essential for project development: how to handle the various files and convert them. Every operation that follows was executed starting from a CSV log, obtained from a BIMP simulation log that was originally in MXML format and that was converted in CSV using DISCO.

Converting CSV to XES

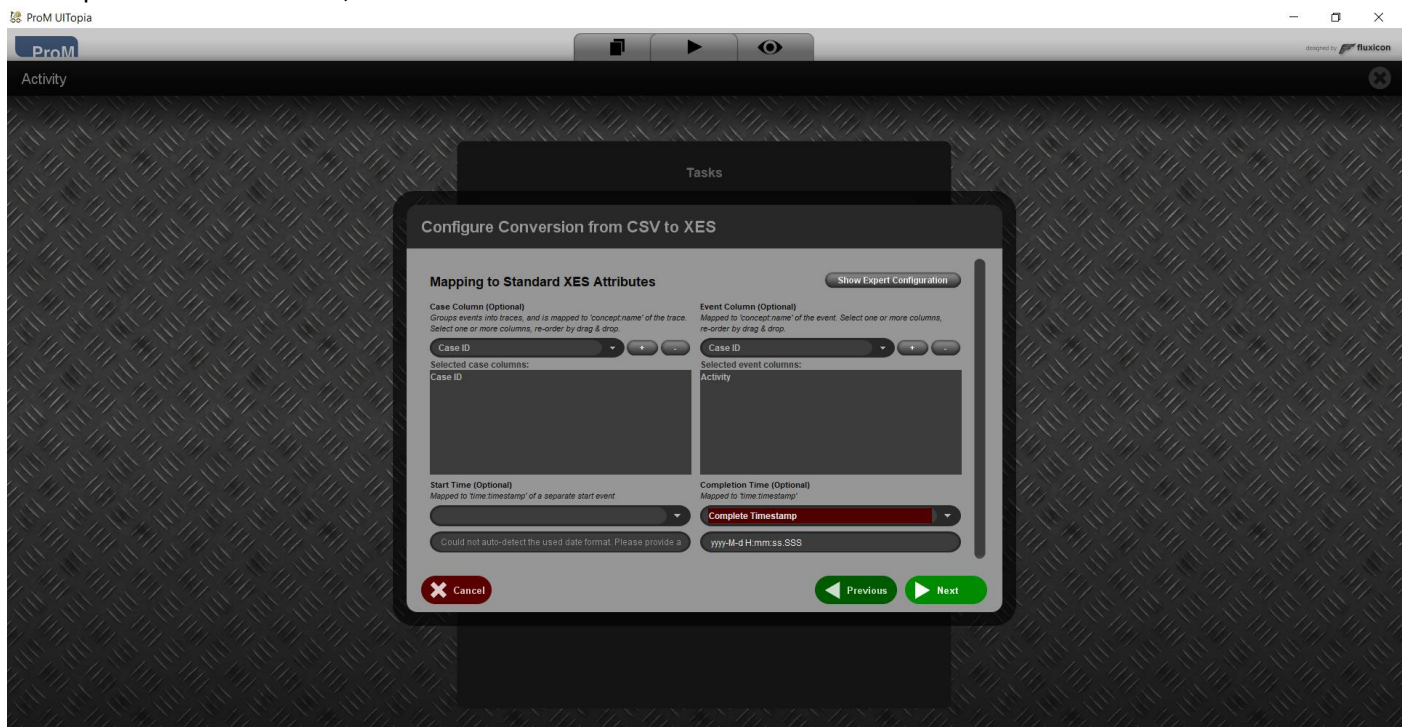
This operation is mostly similar to the old version.



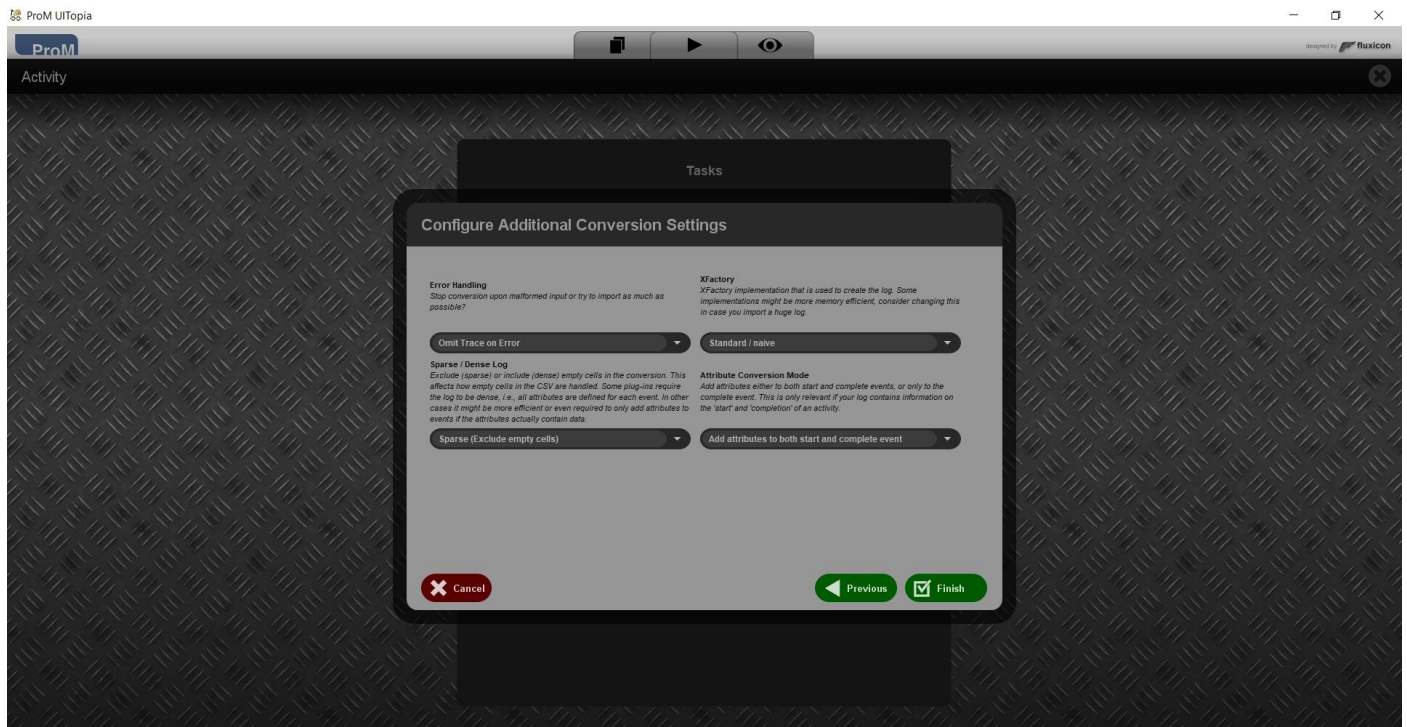
The plugin to select is “Convert CSV to XES”.



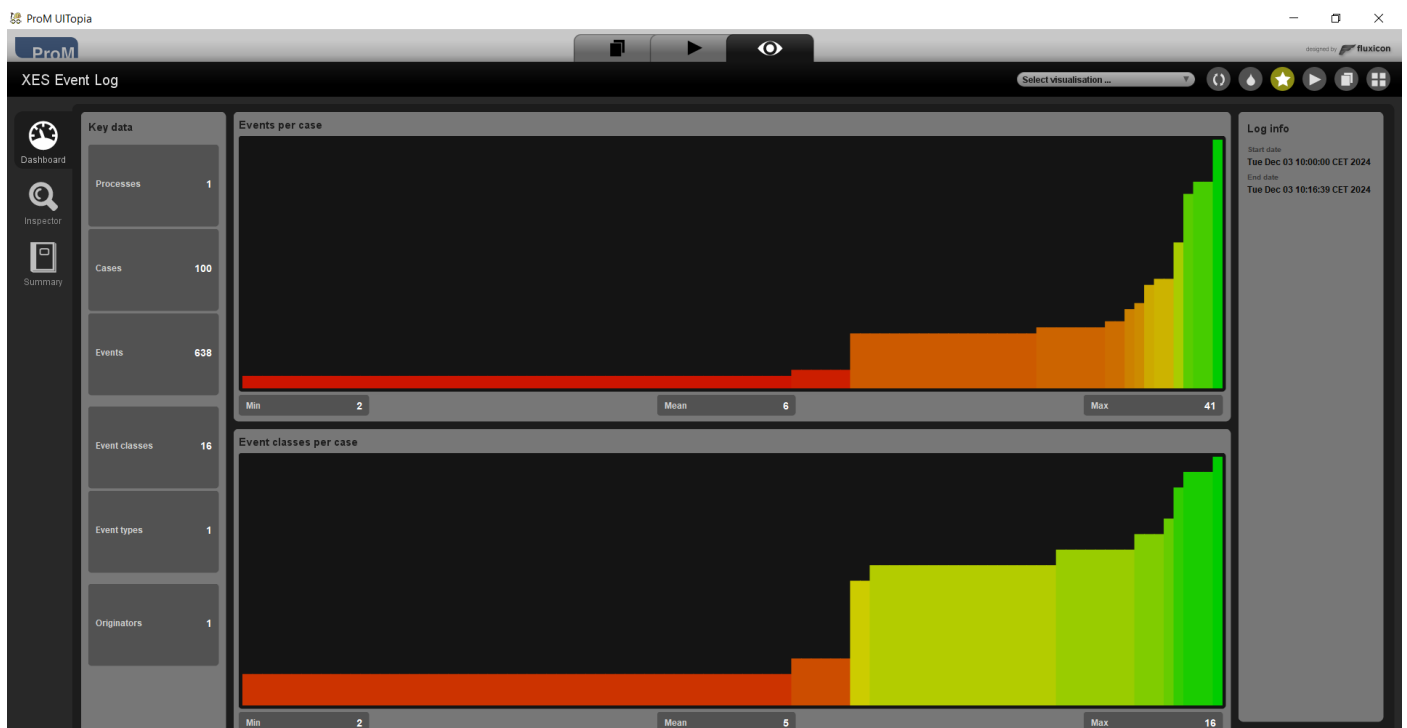
Leave parameters as default, click “Next”.



Add ‘Case ID’ as selected case column, and select ‘Complete Timestamp’ as completion time.

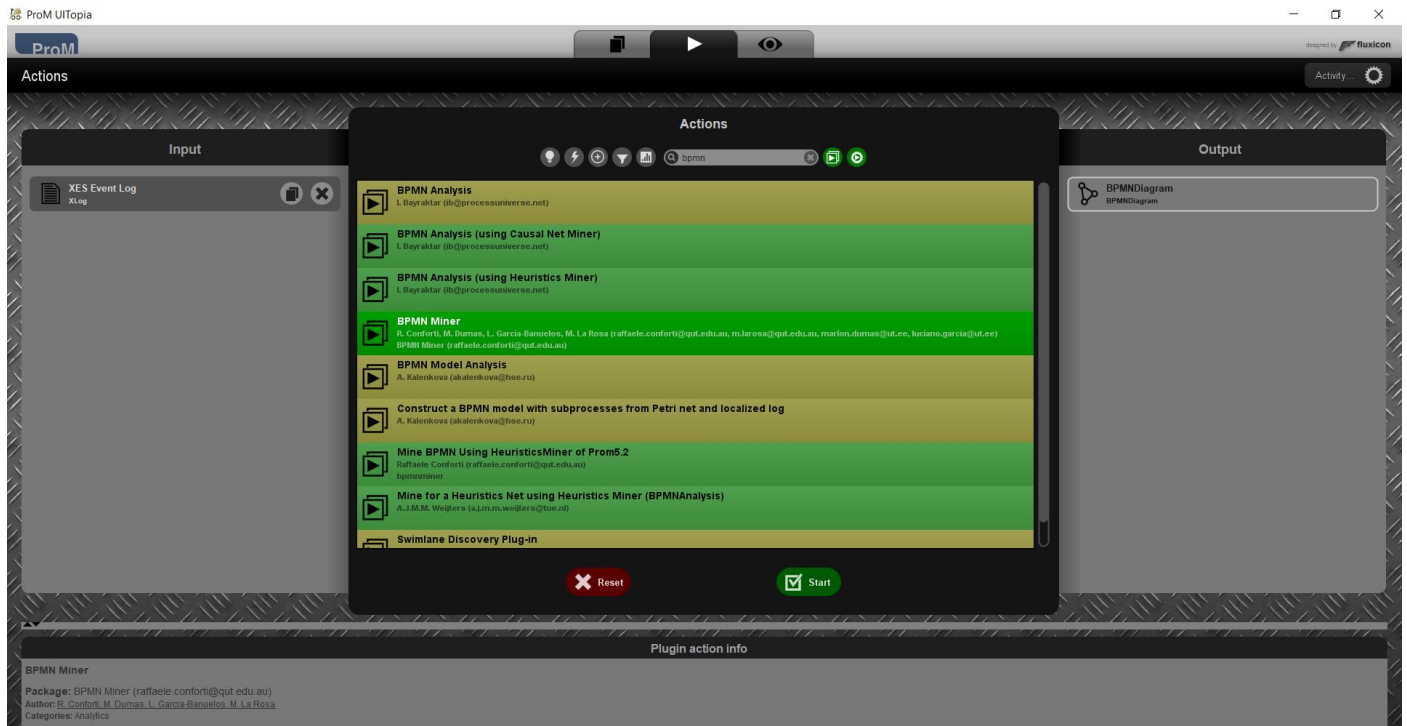


There is a new option, 'Attribute Conversion Mode'. Leave this and every other parameter as default, select finish.

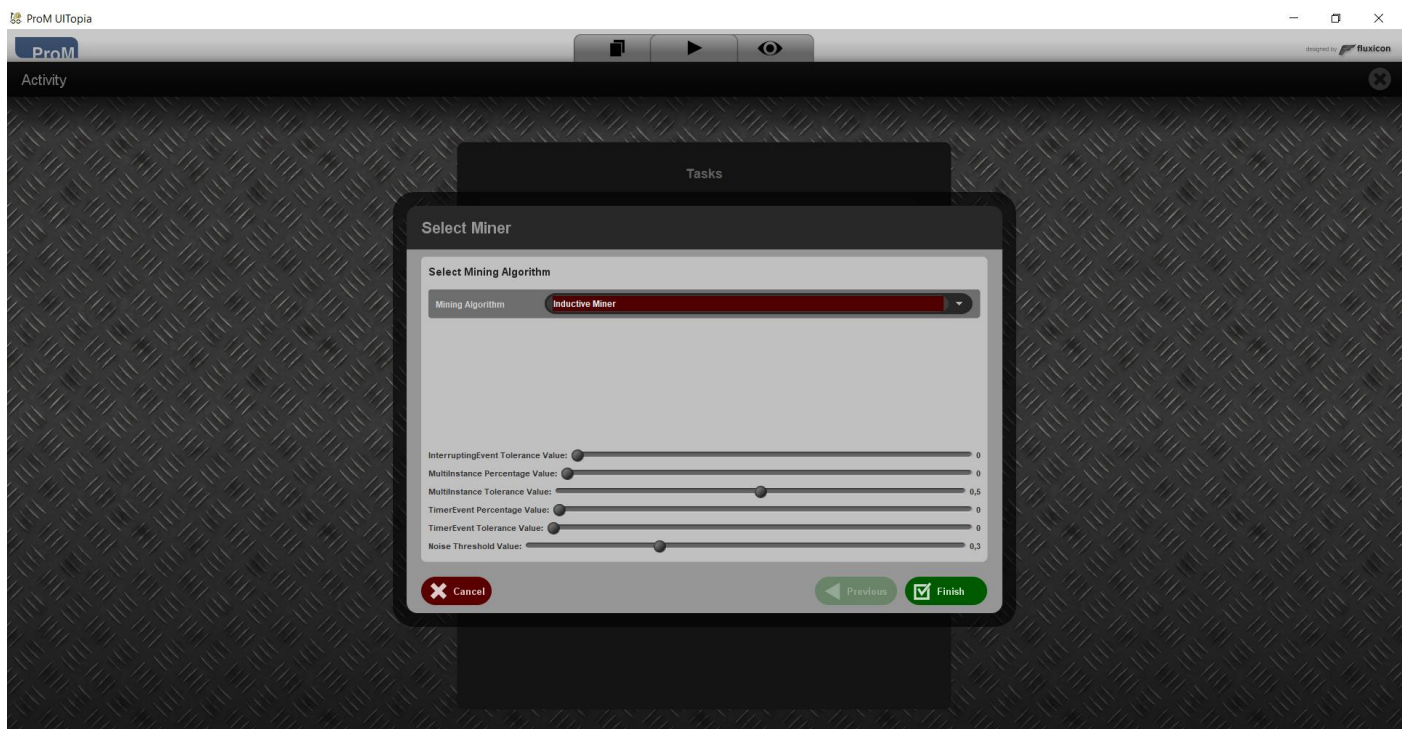


The output should look similar to the above.

BPMN Mining



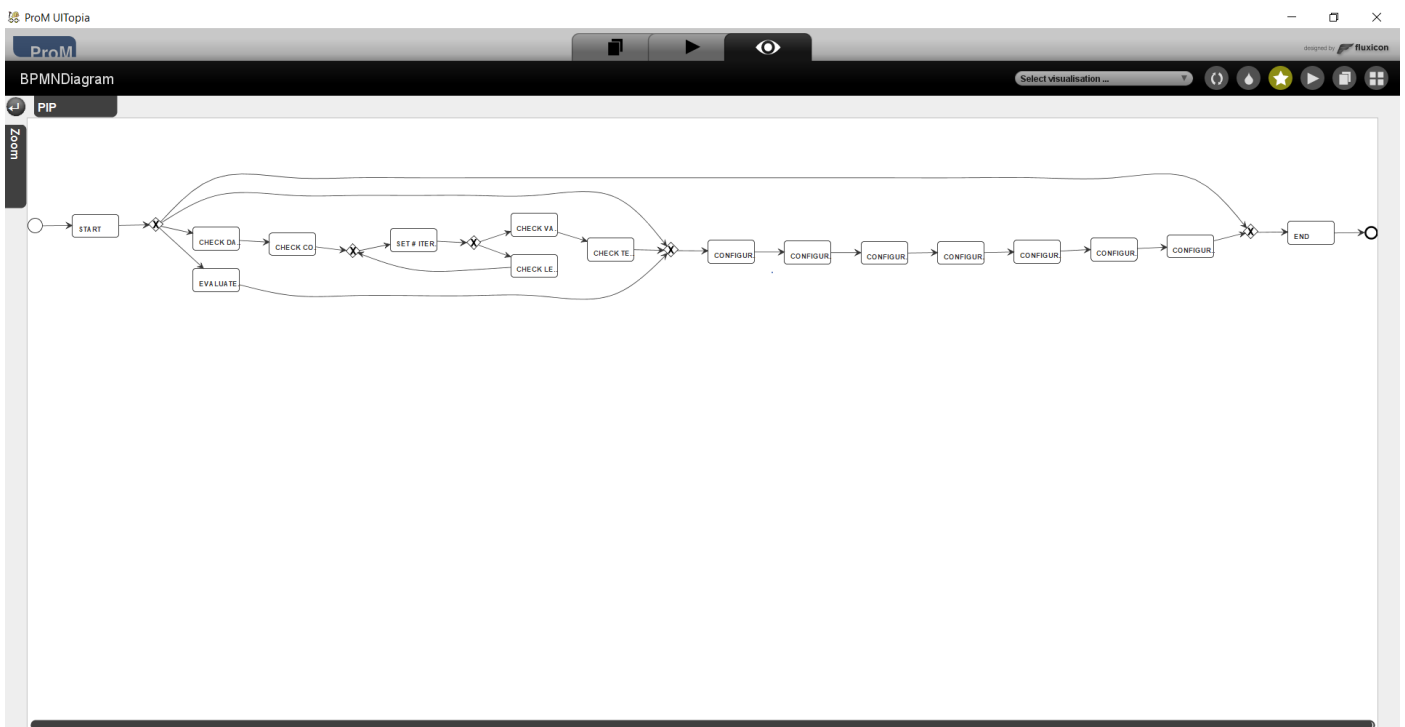
Next, select BPMN Miner as the action, and XES event log you just generated as the input.



Several Miners are available, we will use inductive miner.

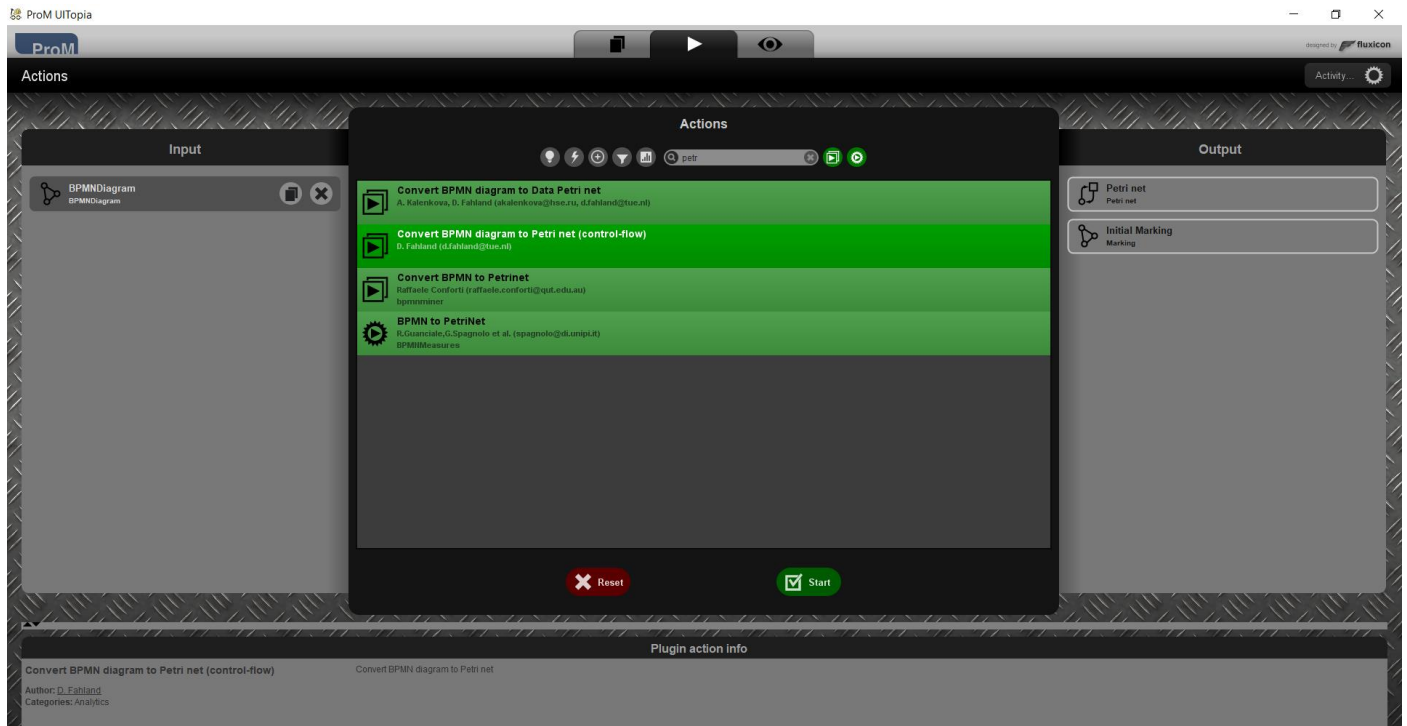


Deselect every attribute on this screen, then press finish. Compared to the older version, there is one less set-up screen, making the whole process simpler.

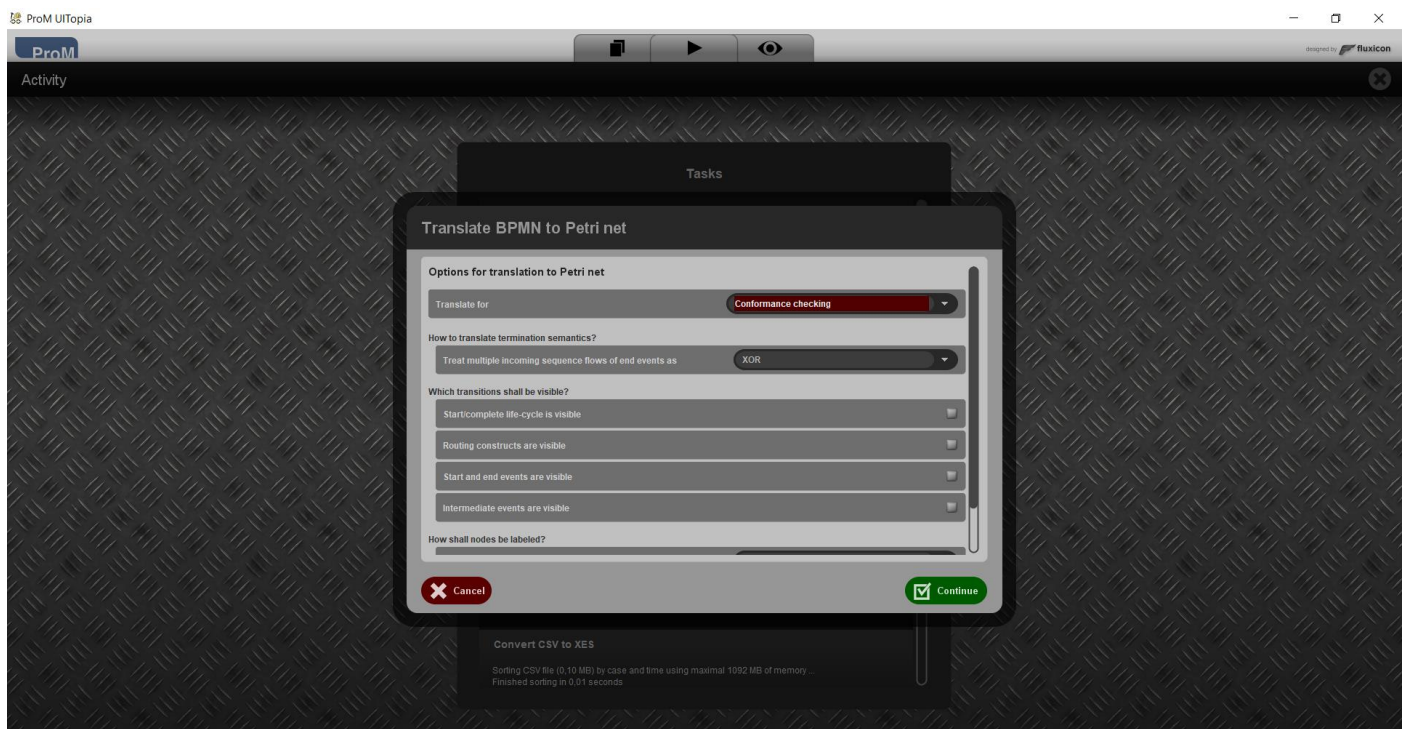


The output should obviously be a BPMN graph, as above.

Creating a Petri Net

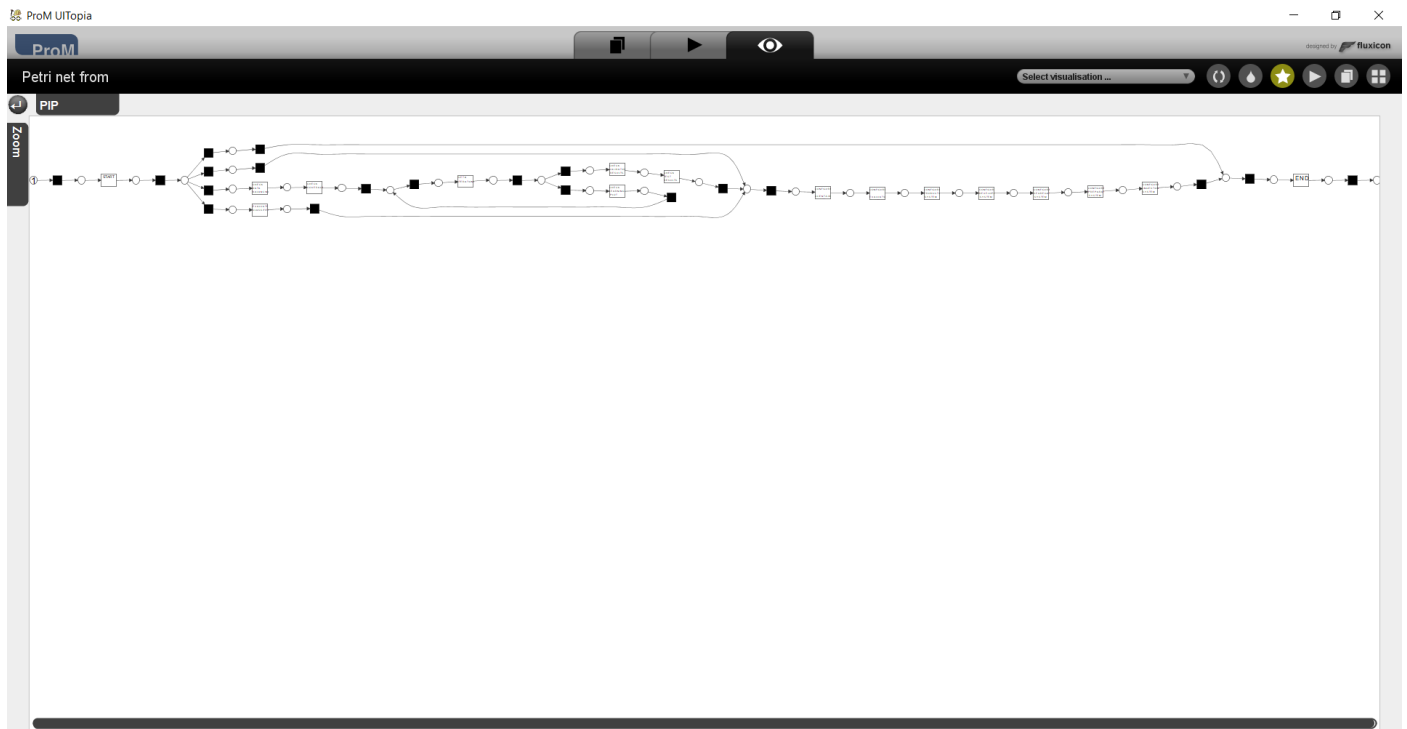


Next, select the BPMN Diagram you just created as input and 'Convert BPMN Diagram to Petri Net (control-flow)' as the action.



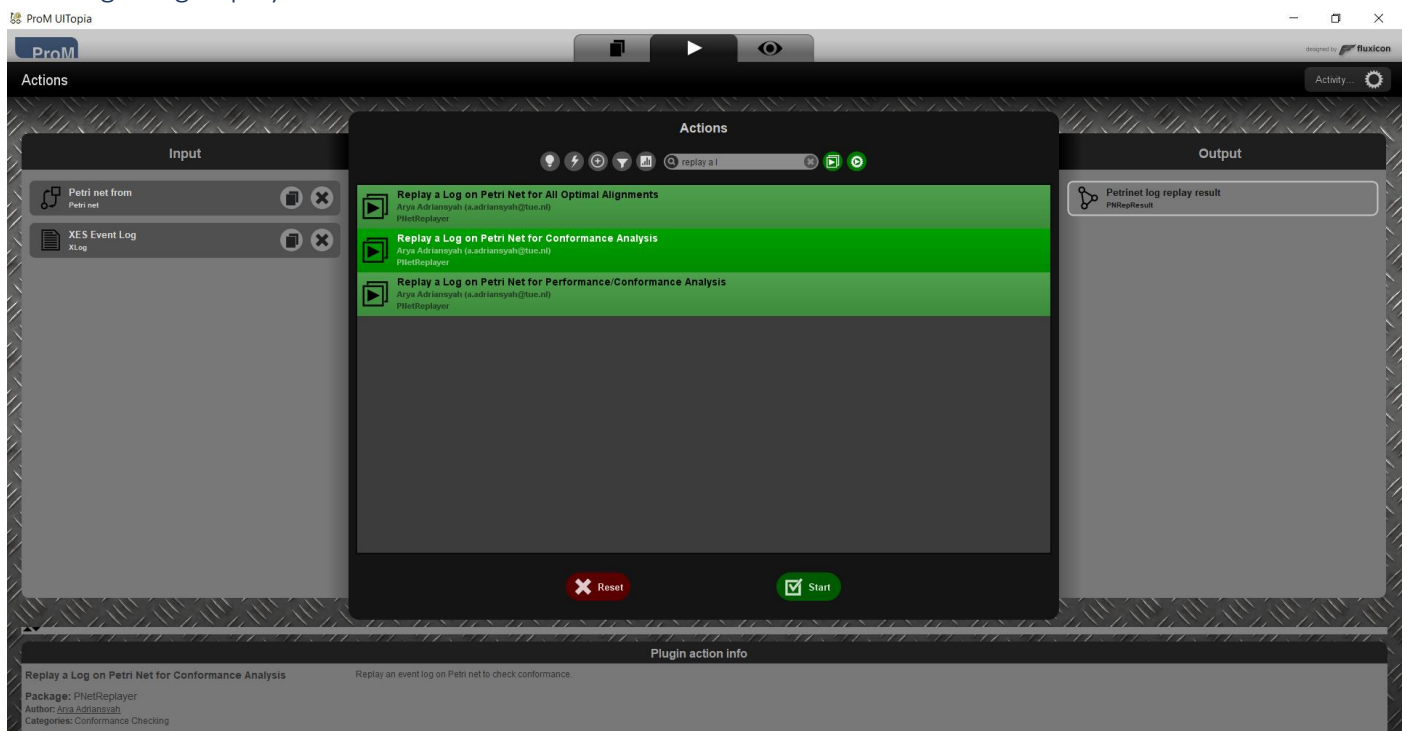
! VERY IMPORTANT !

Select 'Conformance checking' for the 'Translate for' parameter, leave everything else as default.

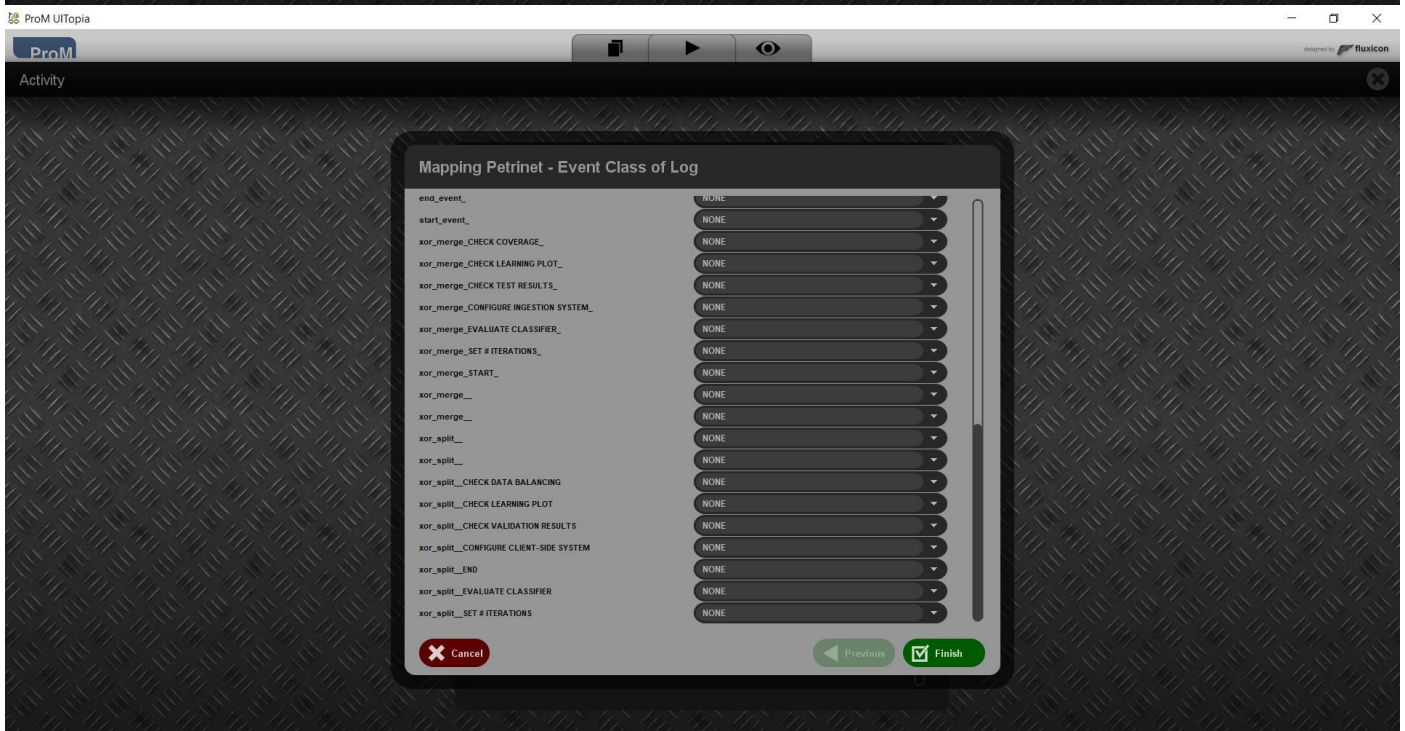
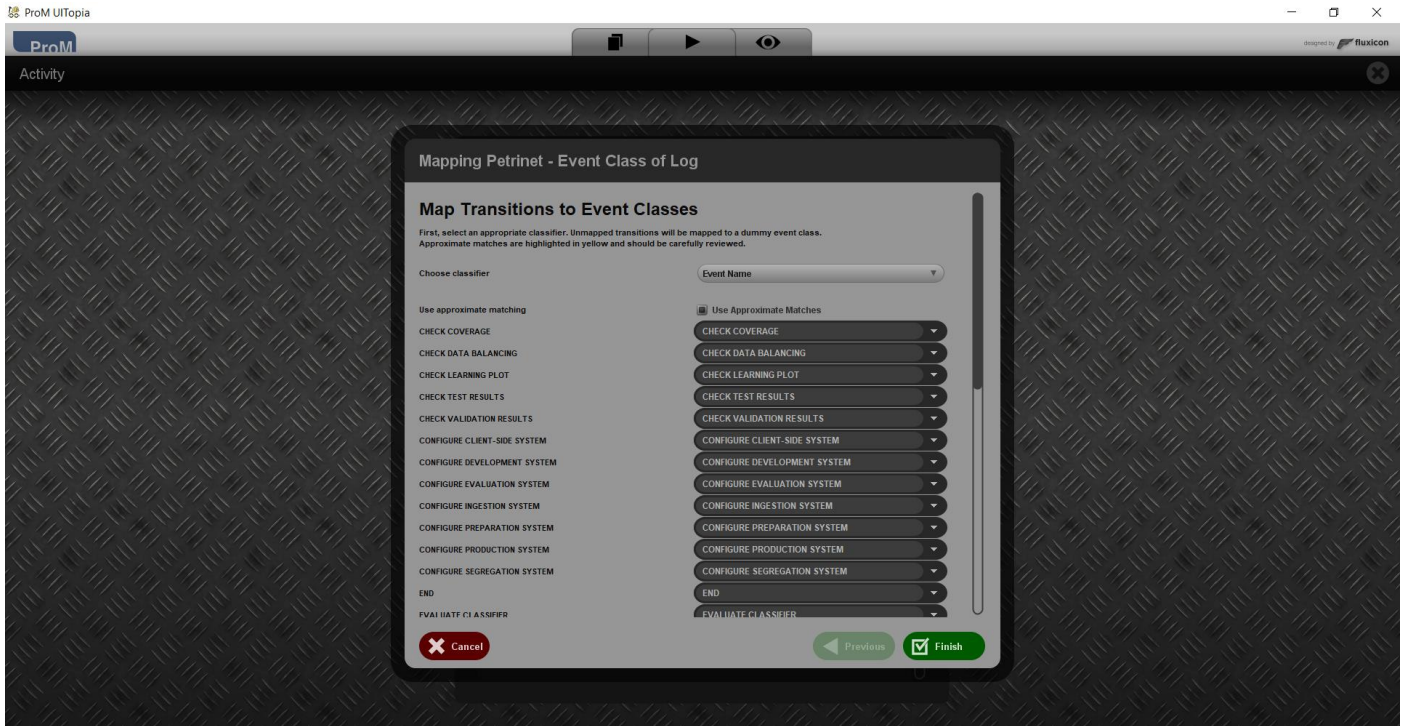


The result should be a Petri Net, as above. This is another step where the number of set-up screens was reduced.

Creating a Log Replay



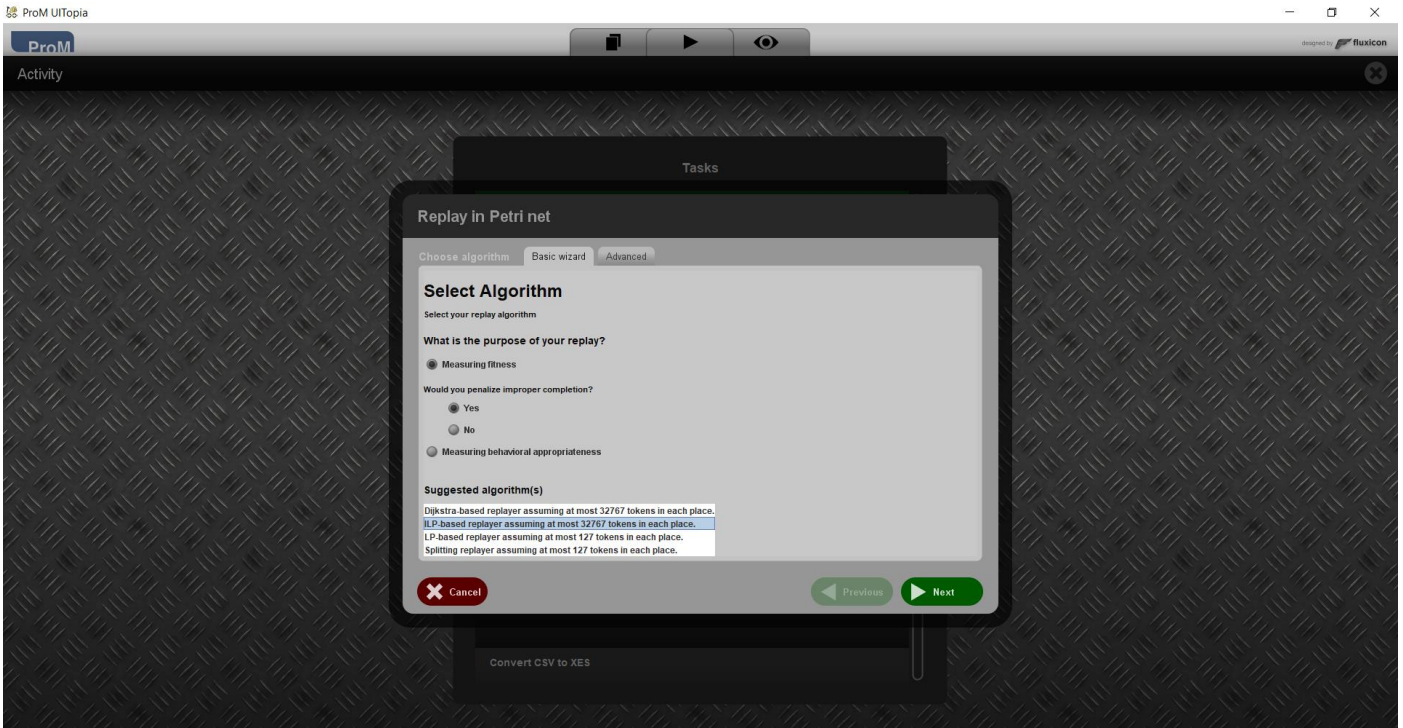
Next, select 'Replay a Log on Petri Net for Conformance Analysis' as action, and the Petri Net you just created and the XES log as inputs.



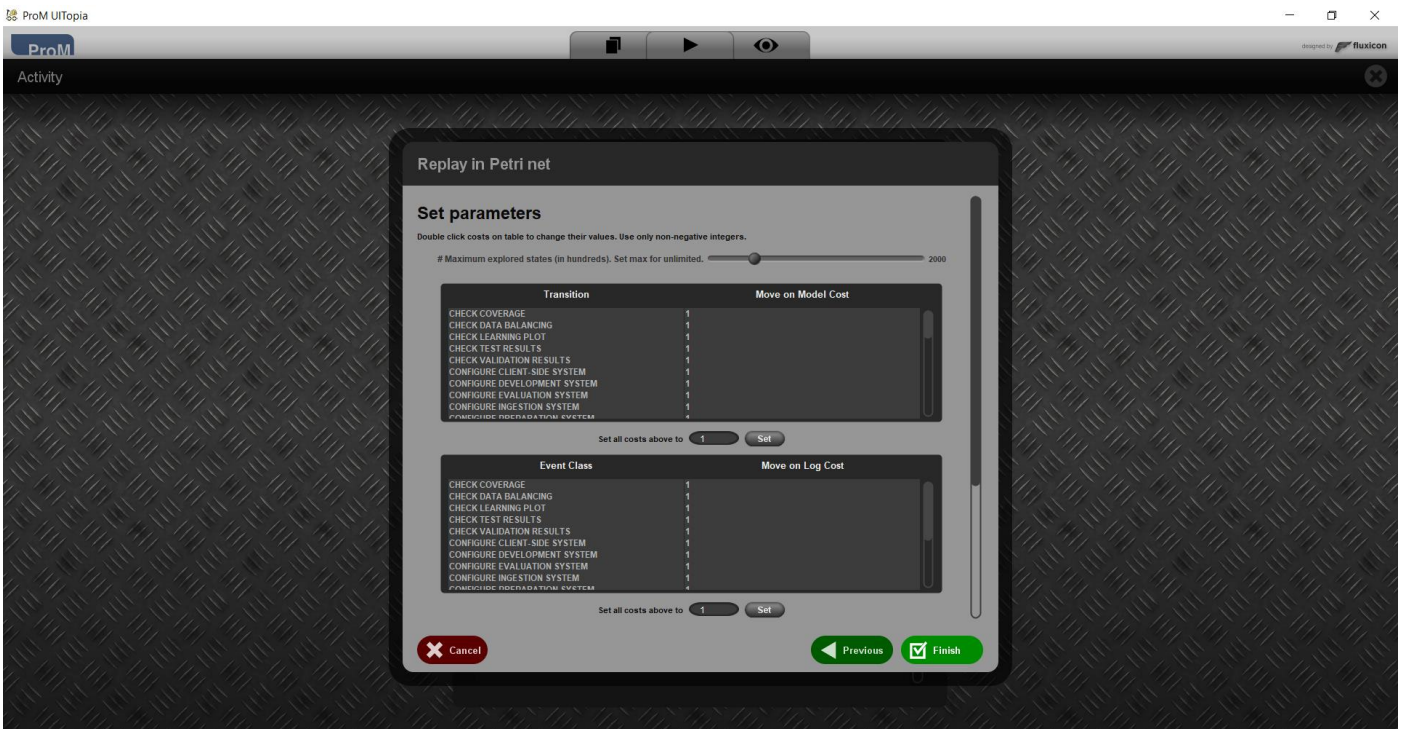
Select 'Event Name' for the 'choose classifier' parameter. Make sure that the actual events are matched correctly, while every other transition is mapped to NONE, as shown above.

Note: this is now much simpler than before, because the plugin automatically recognizes which transitions should be set to NONE

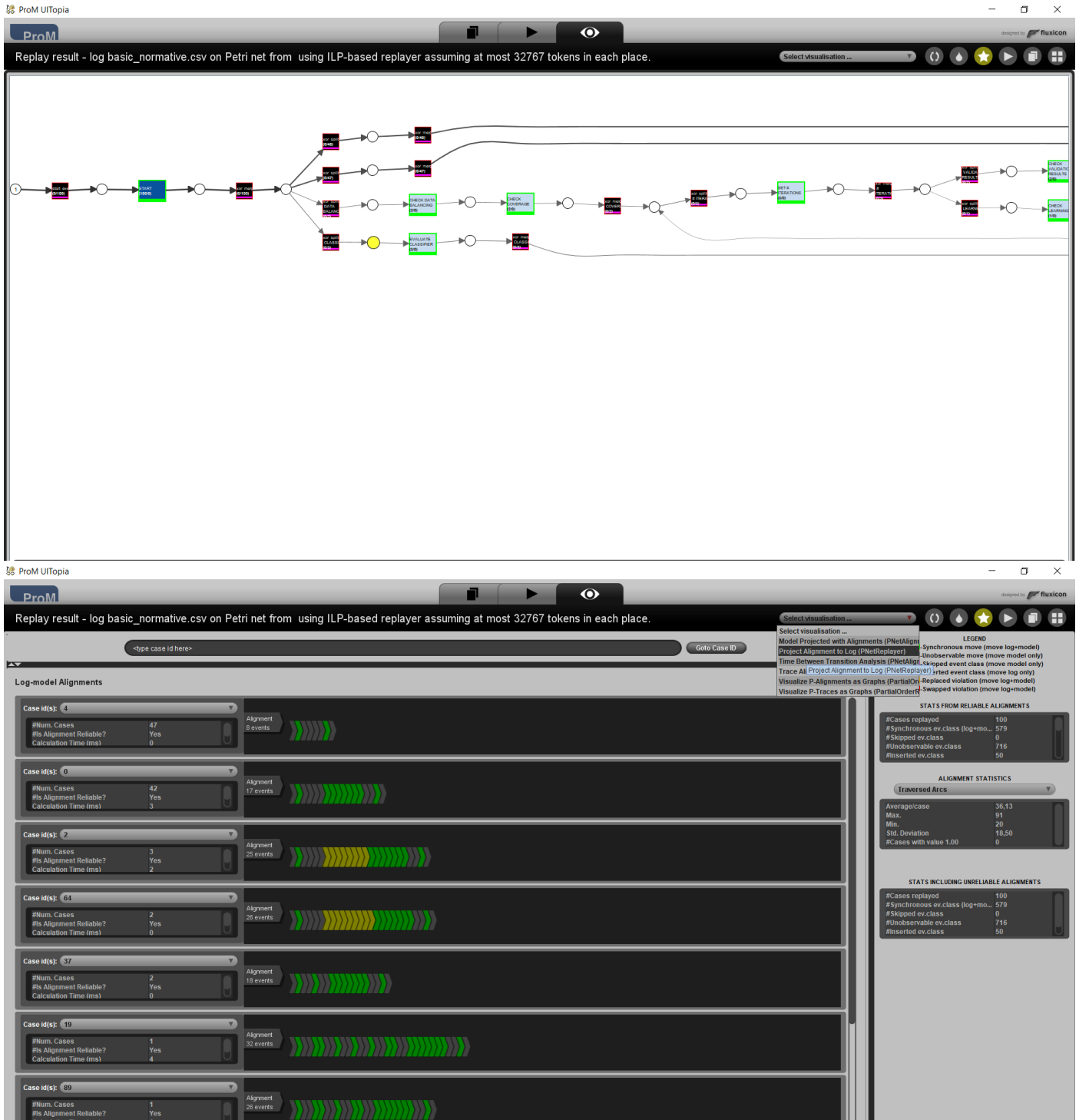
Select Finish.



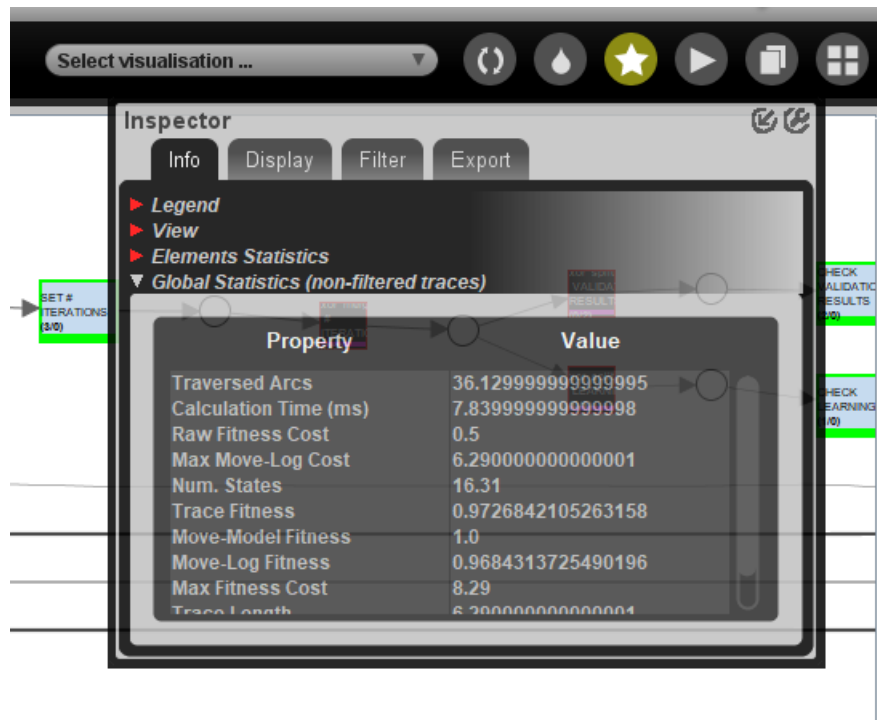
Different algorithms are available, we selected ILP-based replayer. Leave everything else as default.



Leave the above parameters as default, select Finish.



The output should look like the above. You can switch between the Model projection and the Projection on the log by selecting 'Select visualization...'



The inspector works the same way as before.

Measuring Precision/Generalization

The procedure remains unchanged from the previous version.

Missing Plugin Issue

The following is taken from the ProM website:

Plug-ins

If you feel that some plug-ins are missing from ProM that should be there, a likely cause is that the creation of the cache as mentioned above has failed at some point. As a result, jar files that do contain plug-ins may be listed as jar files that do not contain plug-ins. The plug-ins contained in these jar files may be missing in ProM.

To get around this, please remove (or empty) the following impl folder in the Registry:

```
Computer\HKEY_CURRENT_USER\Software\JavaSoft\Prefs\org\processmining\framework\plugin\impl
```

Then start ProM with the batch file provided (ProM6x.bat), as mentioned above.

Steps to perform:

- **Open the Registry Editor:**
 - Press Win + R, type regedit, and press Enter to open the Registry Editor.
- **Navigate to the Path:**

- Follow the given path:
HKEY_CURRENT_USER\Software\JavaSoft\Prefs\org\processmining\framework\plugin\impl.

- **Remove or Clear:**

- You can right-click on the impl folder (key) and choose Delete to remove it entirely.
- Alternatively, you can click on the folder, view its contents (values on the right side), and clear specific values by right-clicking and selecting Delete.

If the above does not solve the issue, you can always just reinstall the plugin by selecting it in the ProM Package Manager. To open it, launch [ProMPM614.bat](#), click on 'Not Installed' and search for the missing plugin to install it.