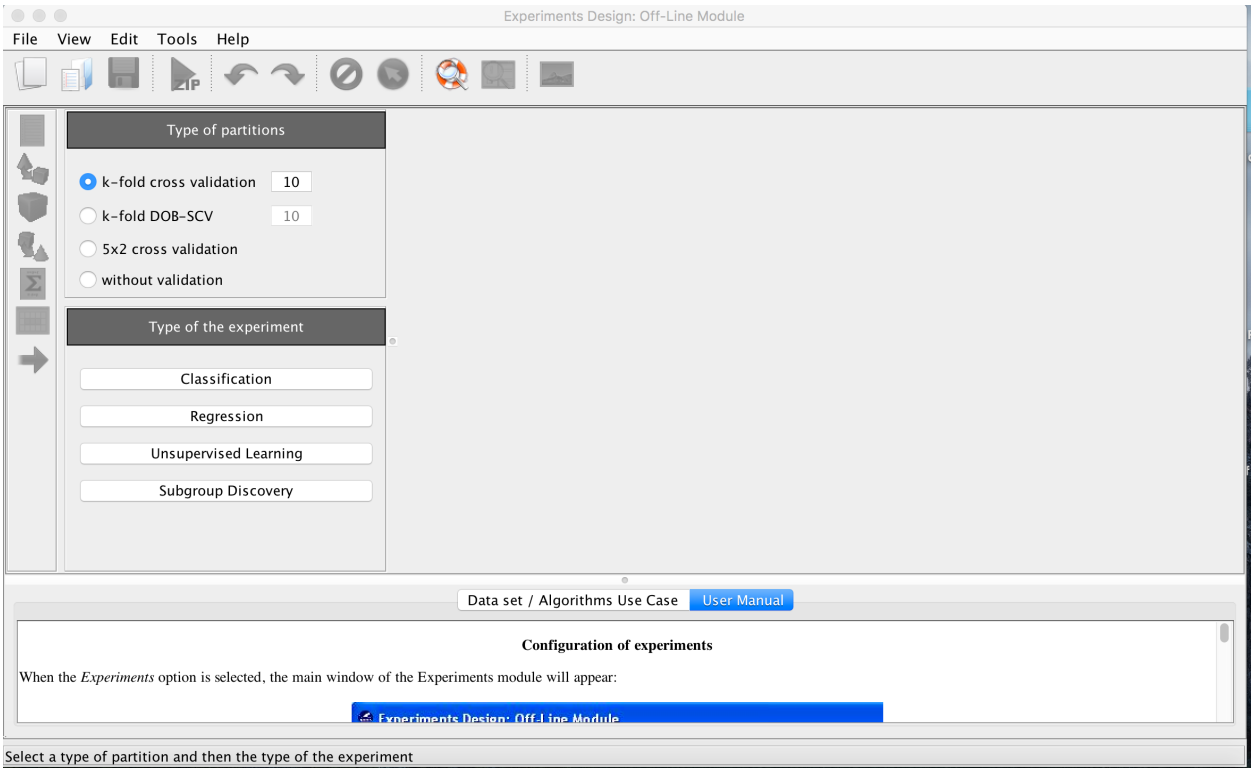
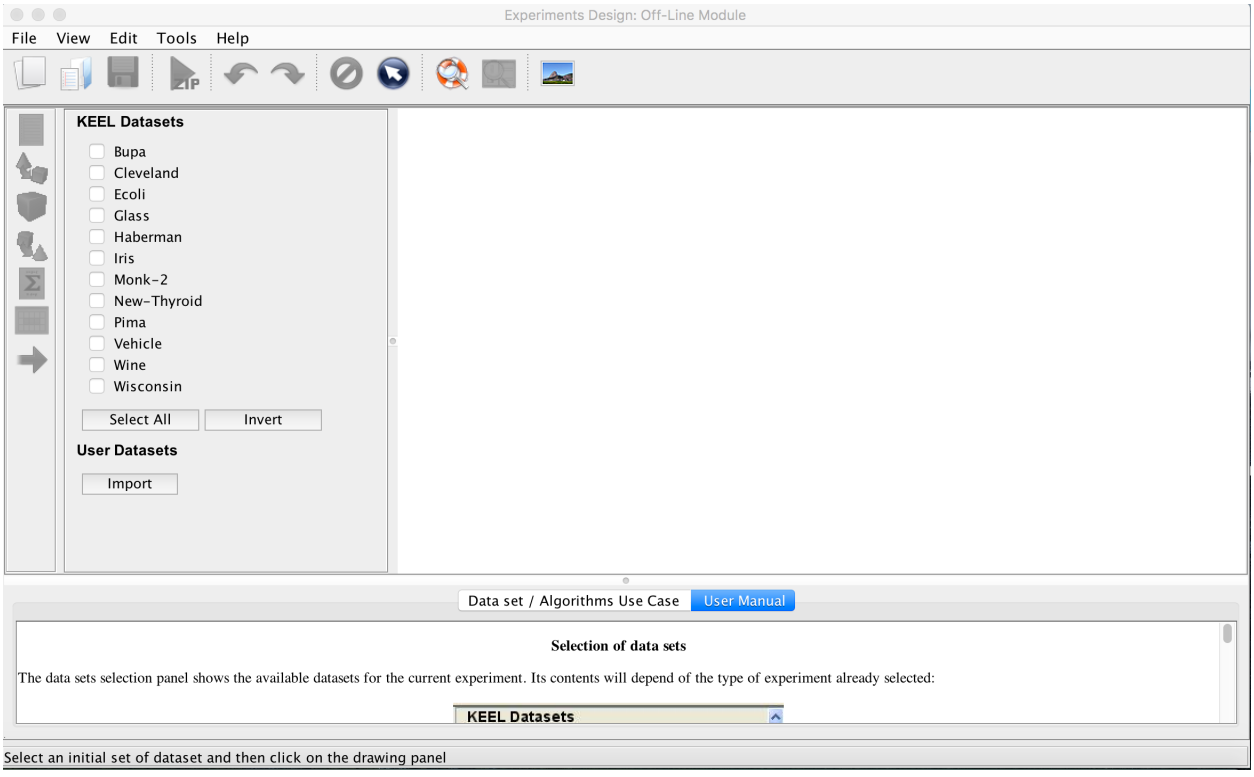
HOW TO USE **KEEL**

- Download KEEL from http://keel.es/
- Unzip the file and run KEEL.

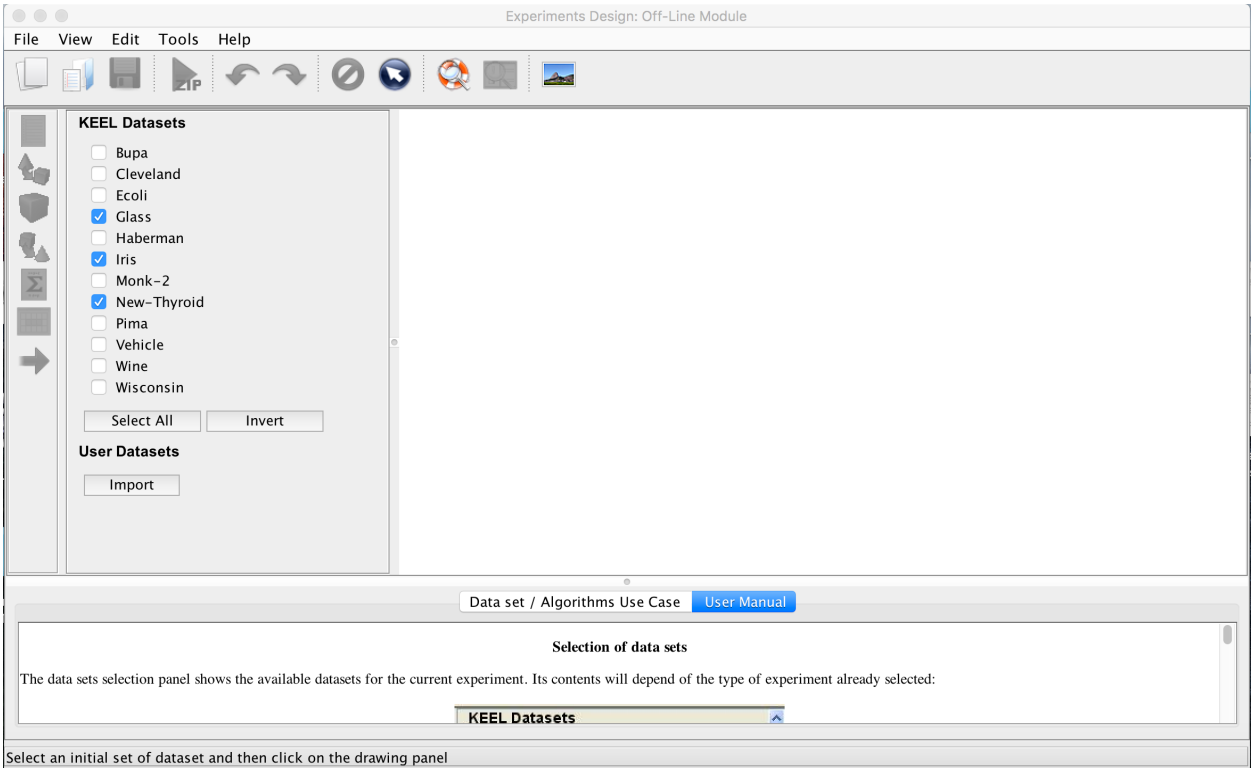
- In order to make a new experiment, click on **Experiments**.



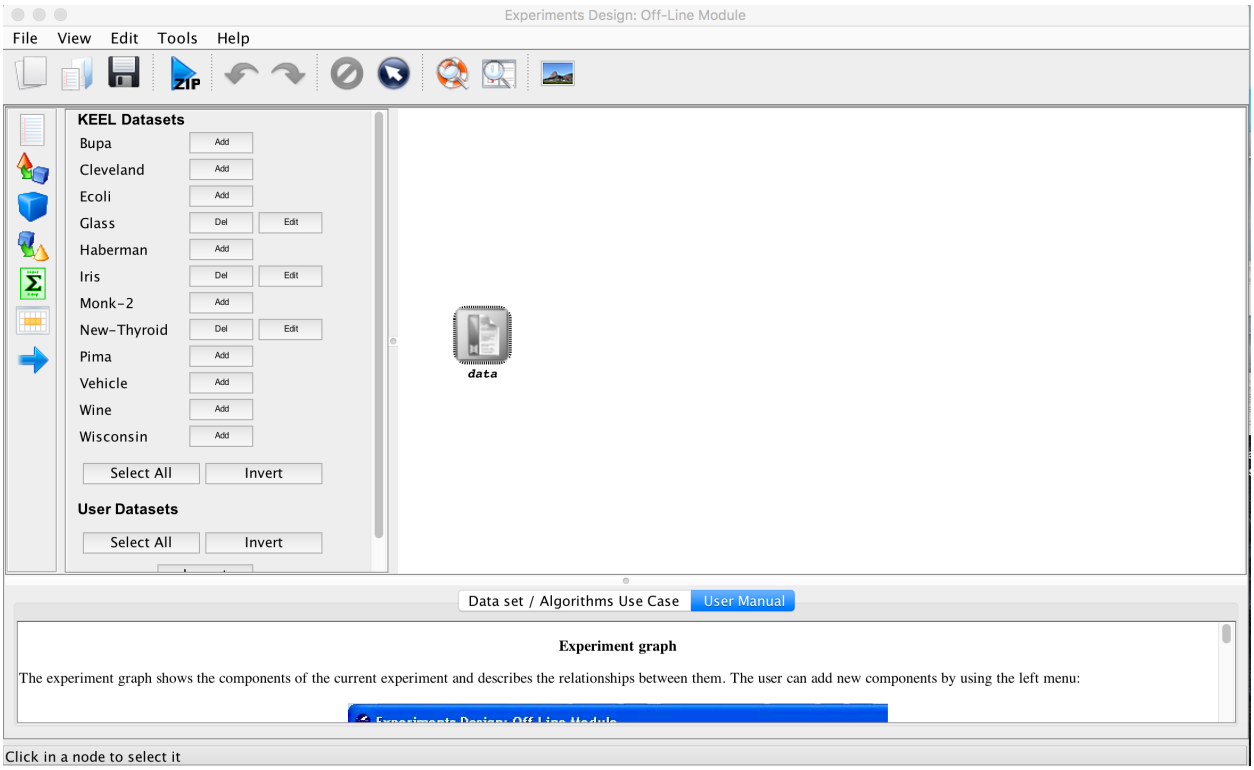
- Then click on **Classification**.



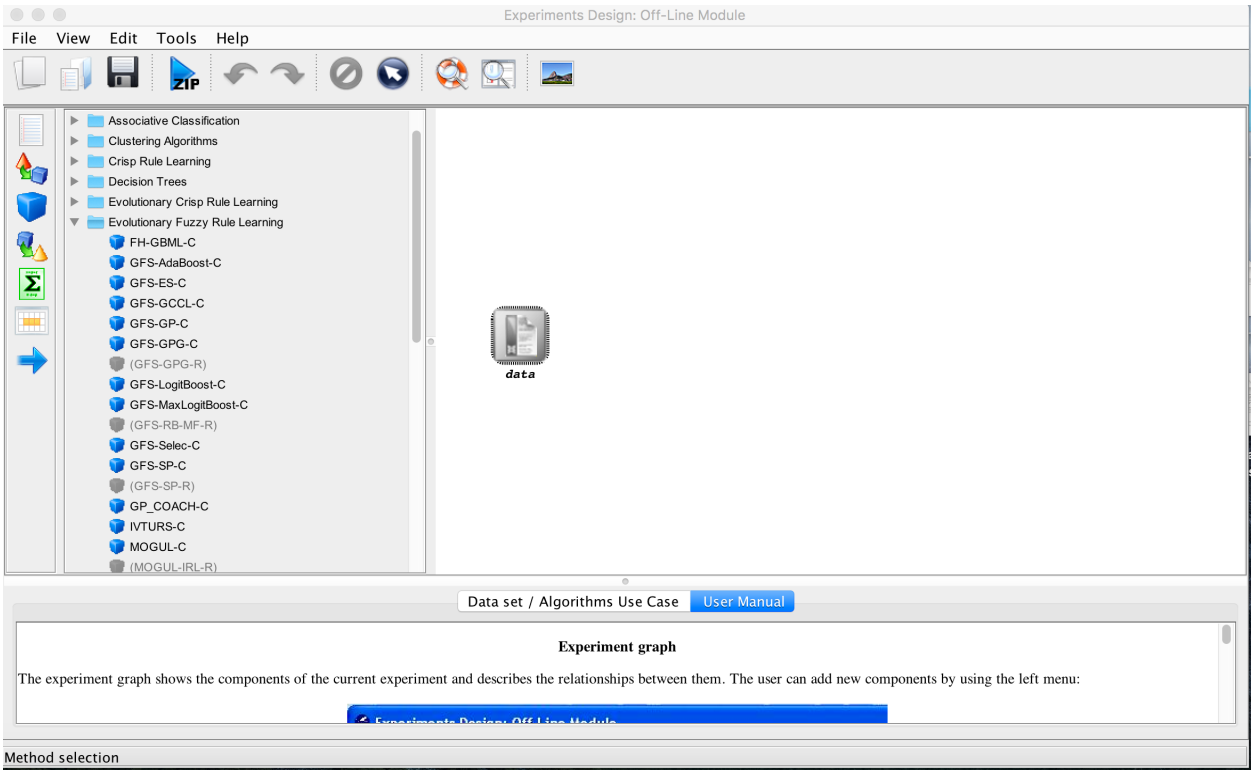
- Now, select the datasets that are going to be used in the experiment.



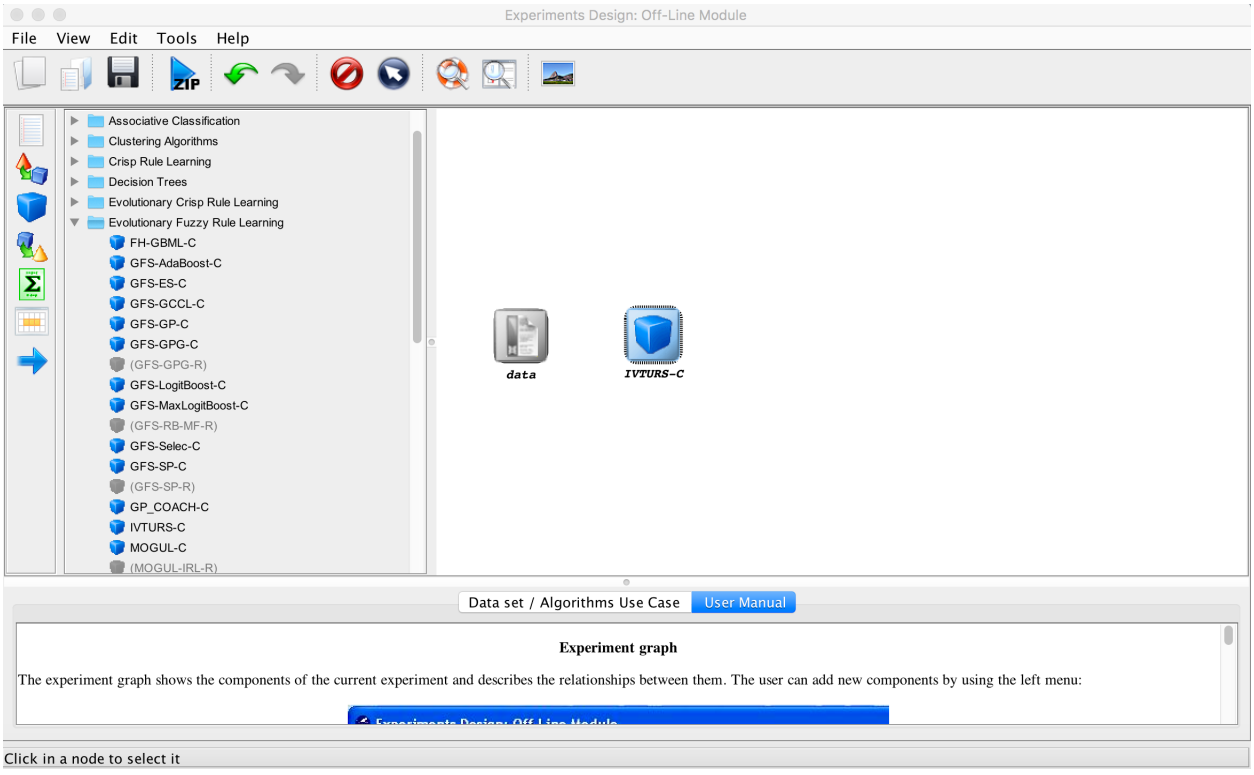
- Once you have finished the selection, place the mouse in the empty space on the right and just click on it.



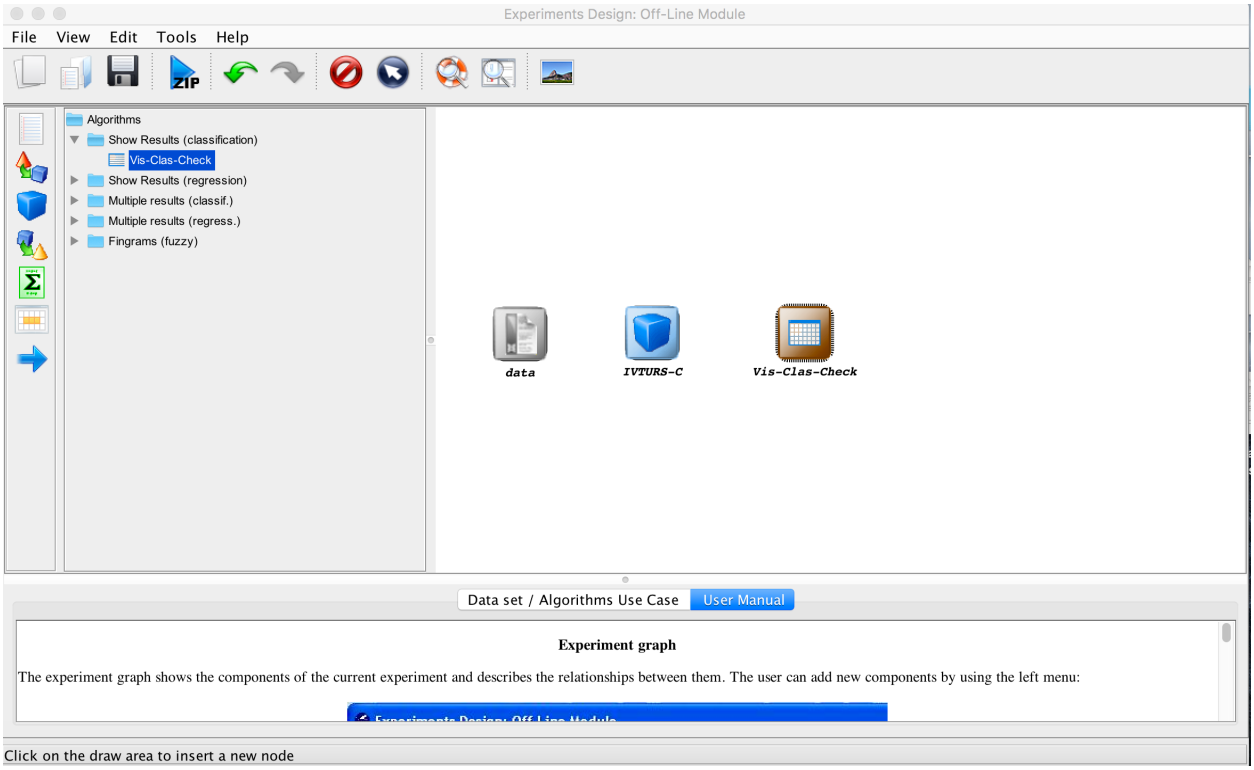
- Click on the third icon on the left list and select the algorithm you want to use for the particular experiment.



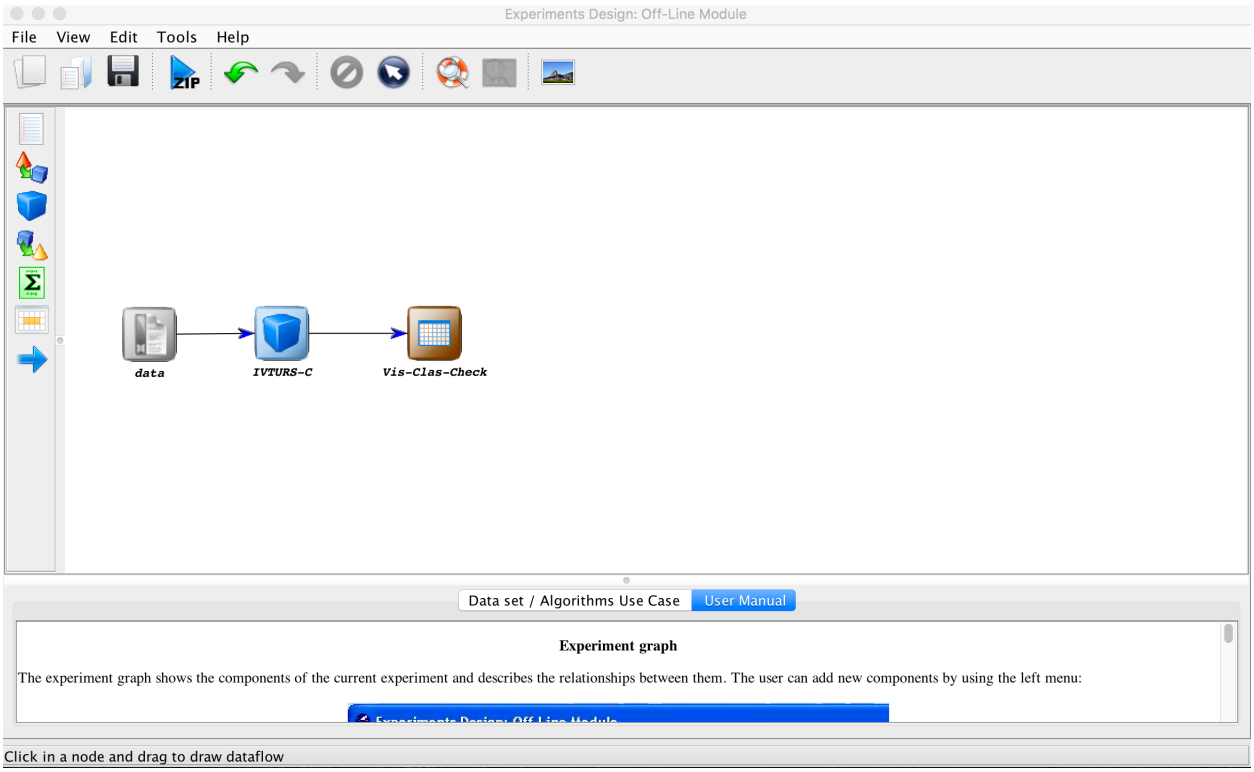
- Again, click in the space on the right.



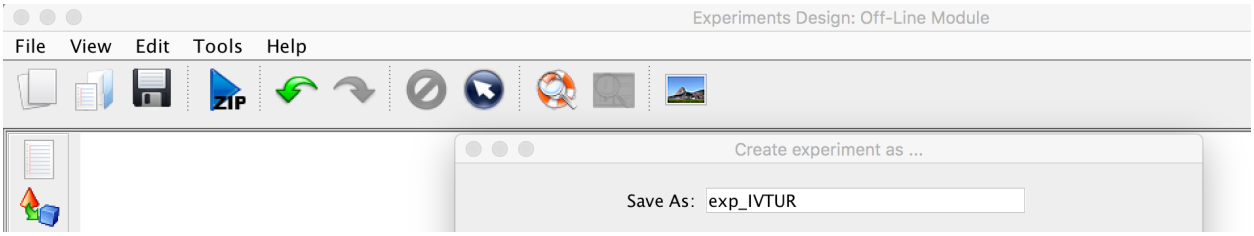
- Click on the sixth icon on the left, select **Vis-Clas-Check** and repeat the previous action.

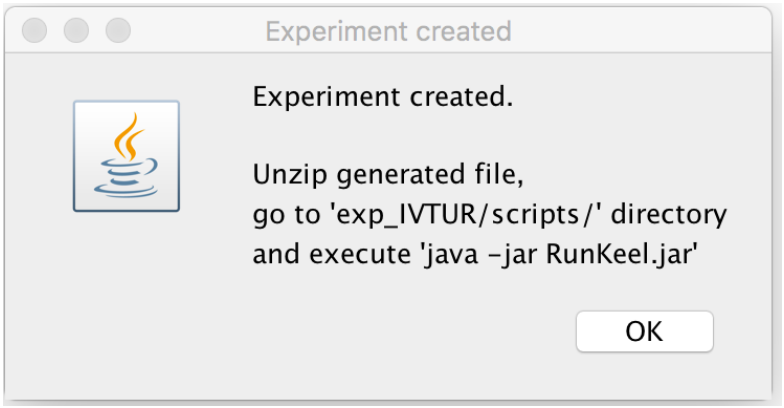


- Now, join all modules in the space on the right by clicking the last icon on the left.

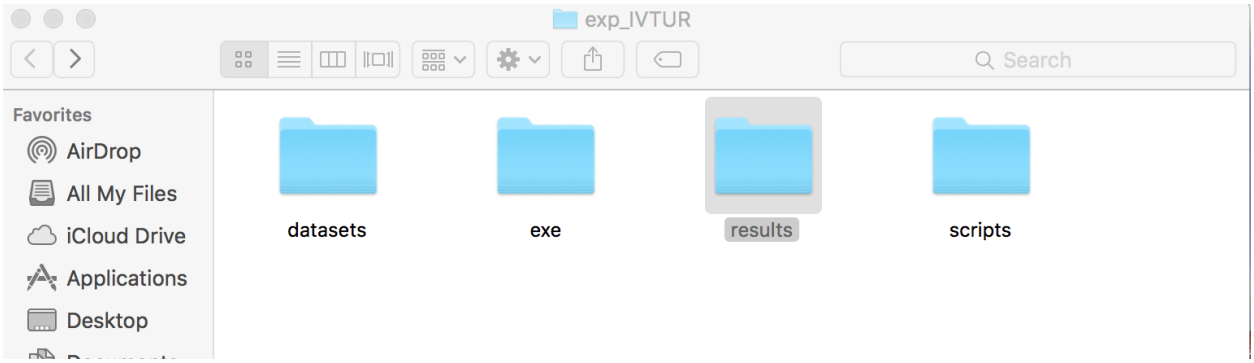


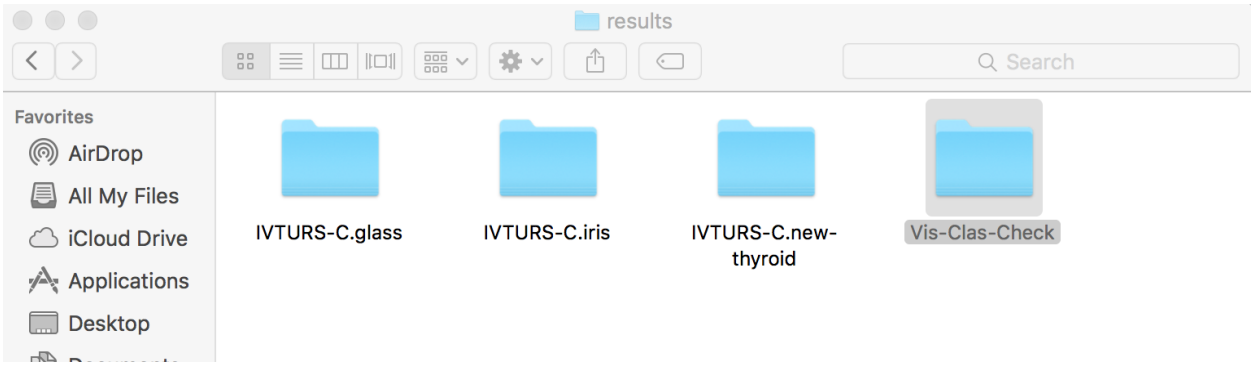
- The last step is to create the experiment. To do that, just click the icon placed in the top menu (says **ZIP**). Save the file and follow the instructions given by the message.





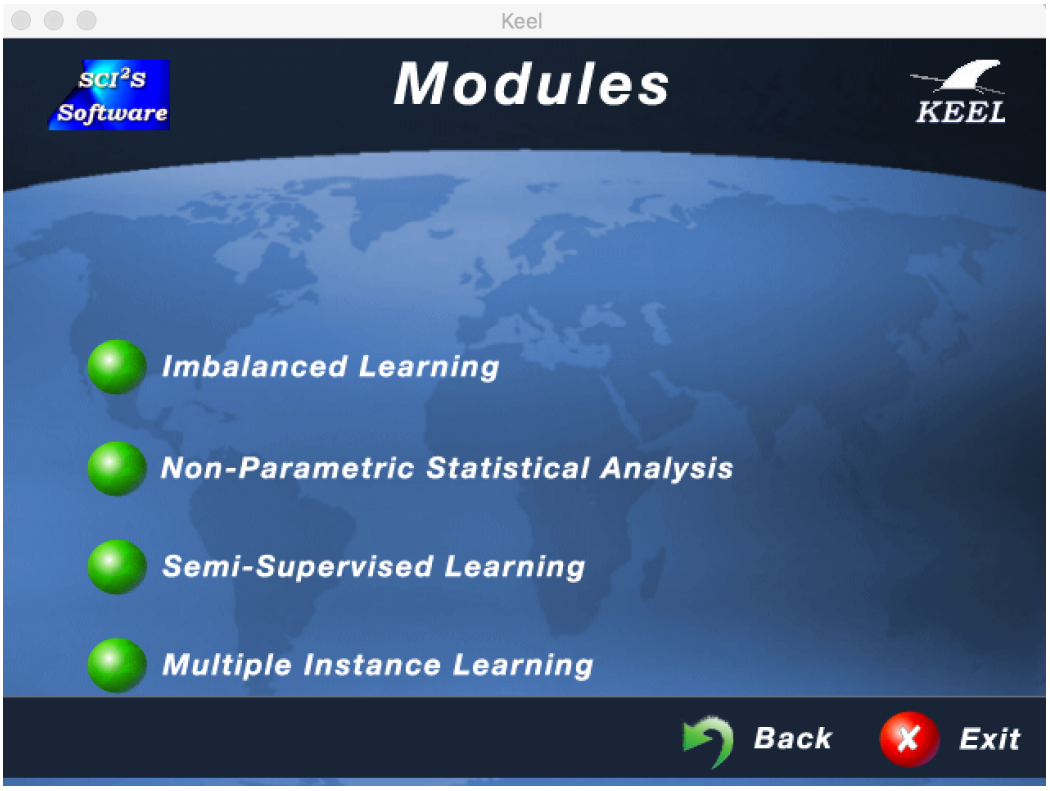
- Once the experiment has finished, the results will be stored inside folder **results→Vis-Clas-Check** (in your experiment folder).

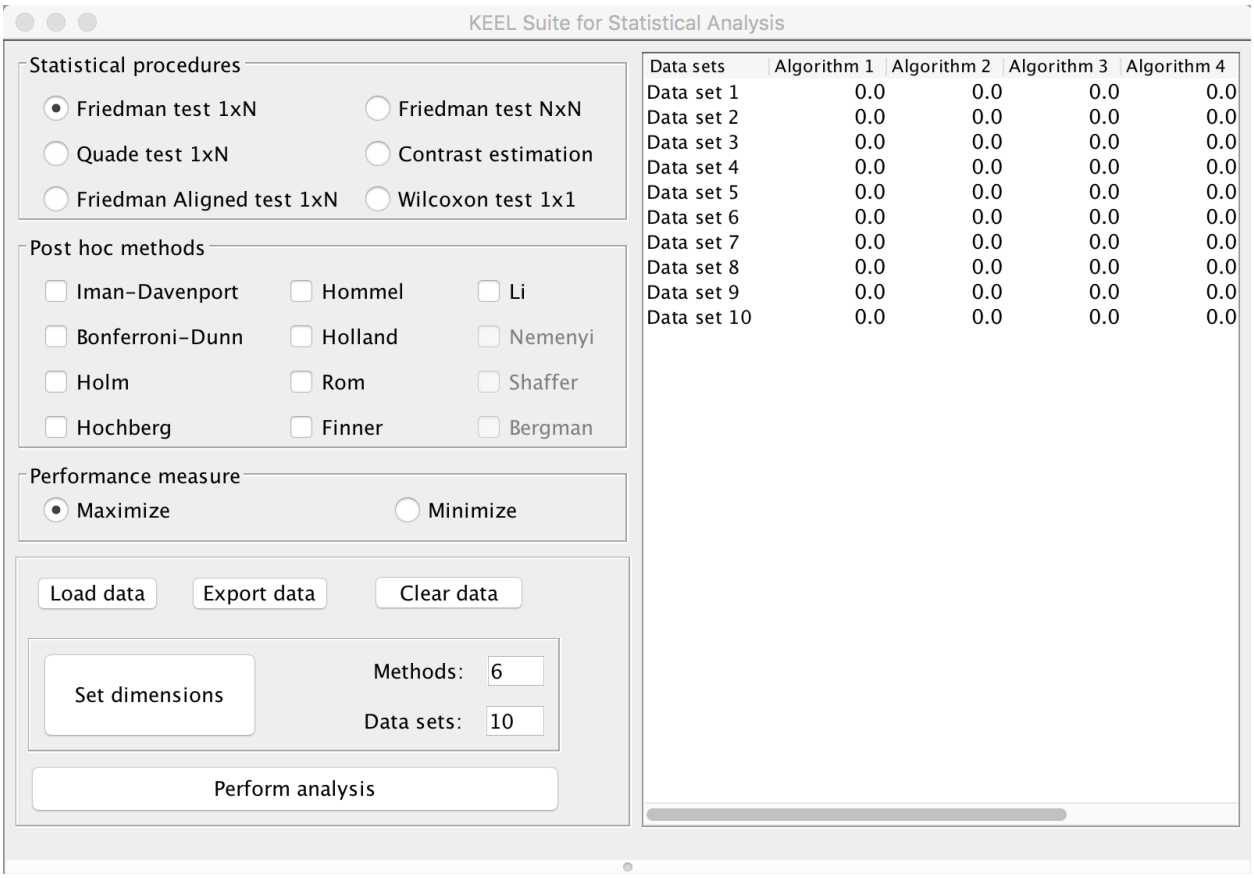




- In order to proceed with the statistical tests (first you need to collect all the results in a file – one file for each parameter that must be compared), go to the main menu and select **Modules → Non-Parametric Statistical Analysis**.


Keel
KEEL Suite 3.0
Data Management
Modules
Experiments
Educational
Help
Exit


Keel
Modules
Imbalanced Learning
Non-Parametric Statistical Analysis
Semi-Supervised Learning
Multiple Instance Learning
Back
Exit


KEEL Suite for Statistical Analysis
Statistical procedures
Friedman test 1xN
Friedman test NxN
Quade test 1xN
Contrast estimation
Friedman Aligned test 1xN
Wilcoxon test 1x1
Post hoc methods
Iman-Davenport
Hommel
Li
Bonferroni-Dunn
Holland
Nemenyi
Holm
Rom
Shaffer
Hochberg
Finner
Bergman
Performance measure
Maximize
Minimize
Load data
Export data
Clear data
Set dimensions
Methods: 6
Data sets: 10
Perform analysis
Data sets Algorithm 1 Algorithm 2 Algorithm 3 Algorithm 4
Data set 1 0.0 0.0 0.0 0.0
Data set 2 0.0 0.0 0.0 0.0
Data set 3 0.0 0.0 0.0 0.0
Data set 4 0.0 0.0 0.0 0.0
Data set 5 0.0 0.0 0.0 0.0
Data set 6 0.0 0.0 0.0 0.0
Data set 7 0.0 0.0 0.0 0.0
Data set 8 0.0 0.0 0.0 0.0
Data set 9 0.0 0.0 0.0 0.0
Data set 10 0.0 0.0 0.0 0.0