

# NetBuilder'

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NetBuilder' is a completely overhauled version of the tool NetBuilder, an editor and simulator for genetic regulatory networks. This new version uses **Petri Nets** to design networks. The tool is separated into a graphical user interface, the **model designer**, and a new **simulation engine**.

## Additional features:

- print the model
- save model as **JPG**
- save model in **SBML**
- save model in PNML (planned)

Zoom

Create a layer

Create a place

Create a transition

Create an arc (types:  
activation, inhibition,  
input or output represented  
as lines or bezier curves)

The model design is very flexible since you can specify sizes and colors or an image file that is used as background for an object.

width:  height:

Which style?

☒ paint ☐ icon

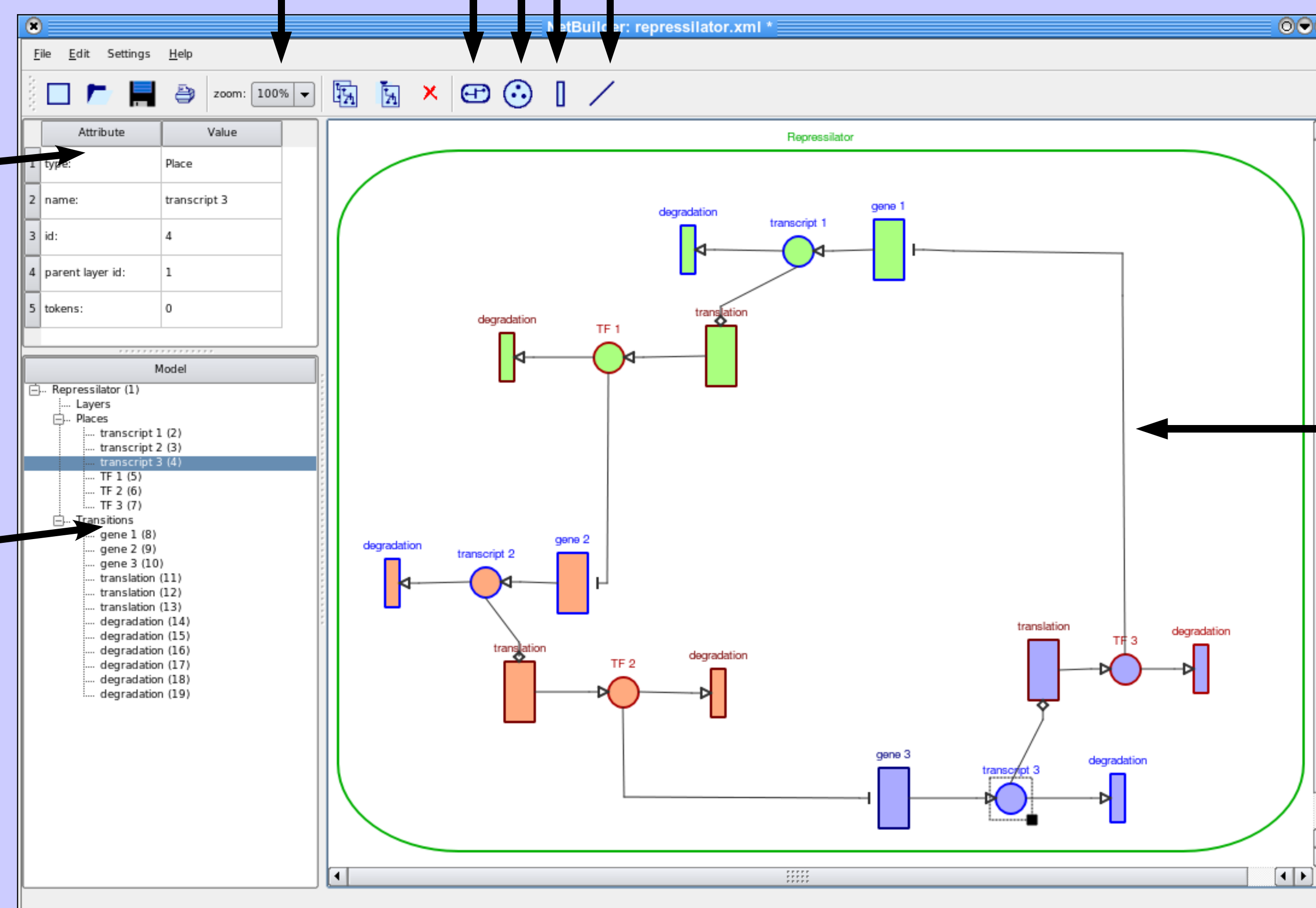
border color:

background color:

line thickness:

Table view:  
Attributes of the  
selected item

Tree view:  
Hierarchy of the  
current model



Drawing area:

- copy objects
- delete objects
- move objects
- rotate objects
- scale objects

After modeling the network is converted into a mathematical model using user specified parameters. This mathematical model can be simulated stochastically or deterministically and the results are saved in a simple text file that can be read by e.g. gnuplot to view the results.

## Future developments:

- graphical representations of simulation results
- integration of dynamic layout algorithms

The tool will be **open-source** and freely available for Windows, Linux and Apple Macintosh when the test phase is completed. Check our web page for latest information:

<http://strc.herts.ac.uk/bio/maria/Apostrophe/index.htm>