

iGEM report week 14–18/07

July 18, 2008

1 Wet Lab

Some preliminary work was done (pour plates, prepare medium...) A first attempt to transform competent DH5alpha cells with **Ba_M30109** (CMPG protocol) failed: no growth observed. A second attempt to transform **Ba_M30109** (this time in competent TOP10 cells using the iGEM protocol) on LB agar with ampicillin failed, only the pUC control did show growth. Transforming **Ba_B0034** and pUC in competent DH5alpha cells only showed growth with pUC on ampicillin LB plates. Transformations of BioBricks we do not need into TOP10 cells, using heat-shock or electroporation both failed. The procedure for making TOP10 cells competent was started.

Wandering around other team's wikis made us conclude that many of this year's teams have problems with their transformations, especially with DH5alpha cells, less with TOP10 cells, and especially with the iGEM protocol.

2 Dry lab

There rised two major problems: (a) Putting LVA tag on T7 polymerase is impossible, as the C-terminal end is part of the catalytic site. New literature study came up with a N-terminal tag derived from UmuD. To be continued. (b) The Calgary 2007 team reports quite a lot of problems using **Ba_M30109**. This part is also used by the Melbourne 2008 team. If we also experience big troubles, solutions have to be found. The worst scenario is looking for an other input device. Also to be continued.

3 Modeling

Most composite parts are now realistically parametrized. Only the memory still remains and pieces of the pulse generator. We started to put the composite parts together. Results, pictures and models can be found in the modeling section on the wiki. Things are actually looking surprisingly good.

