If your CRISPR Experiment is not working there are a few things you can optimize that can help you succeed.

1. Make sure you know how to pipette. The tubes with DNA have very small amounts and you need to move around even smaller amounts! First, [follow this guide](https://docs.google.com/document/d/1e9heRklEyINMc_sHPyRcBB3mxT0vnf4wqxkn7aiwlBM/edit?usp=sharing) and make sure you are using your pipette correctly. Next, when pipetting 10uL you barely need to press the plunger, your thumb should not be exerting much force. If it is, you are probably pushing the pipette plunger to the second stop, which is not the correct one.
2. Do not heat shock at higher than 42C([Page 14 of the guide](https://docs.google.com/document/d/1qJ-hkVjE3uqbSazqJdDkhdM7K9HDTqWl8pN-reX26JM/edit?usp=sharing)) or for longer than 30 seconds if you do you can kill the bacteria and it won’t work at all.
3. After transformation when outgrowing the cells in LB at 30C for 2-4 hours([Page 14 of the guide](https://docs.google.com/document/d/1qJ-hkVjE3uqbSazqJdDkhdM7K9HDTqWl8pN-reX26JM/edit?usp=sharing)) it must be at 30C or less. One of the plasmids has a temperature sensitive origin of replication.
4. You can outgrow the cells for longer than 2-4 hours to increase your chances of success ([Page 14 of the guide](https://docs.google.com/document/d/1qJ-hkVjE3uqbSazqJdDkhdM7K9HDTqWl8pN-reX26JM/edit?usp=sharing)).
5. Plate more than 200uL of bacteria. This will increase your chances of success([Page 14 of the guide](https://docs.google.com/document/d/1qJ-hkVjE3uqbSazqJdDkhdM7K9HDTqWl8pN-reX26JM/edit?usp=sharing)).
6. Do not incubate the bacteria at higher than 30C