Electrophoresis

Stefano Varricchio - EPFL iGEM 2010

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Where

On the bench on the right of the fume hood

Material needed

Quantity	What
~2 μL	sample to test
2 μL	H_2O
2 μL	dye(orange)
10 μL	Blue Ladder
~0.3 L	0.5×TAE buffer
1	Agarose Gel (prepare it before!)

Please note that the quantities mentioned here are referred to the littlest comb. Changing the size of the comb will change the volume of the "holes" and so changing the quantities required.

Steps

1. mix the sample to test, the H_20 and the dye in a microtube.
2. put the agarose gel in the electrophorese socket
3. full cover the agarose gel with the 0.5×TAE buffer (there is a filling level on the socket).
4. using the EtBr reserved pipette put the DNA preparation into one hole
5. put the *Blue ladder* into a hole near the DNA preparation. (1-2 holes spacing is perfect)
6. connect the electrodes. **Remember : DNA is negative charged, it will flow toward the positive pole!**
7. set 190V between the 2 electrodes. If the reaction is working some little bubbles appears near the negative electrode.
8. wait until the DNA preparation is in the middle of the gel (~30-60 min)
9. examinate under UV light.

Warnings

- The agarose gel is done with EtBr, use nitril gloves! (the blue ones)
- pay attention of the sense of the Electric field, *DNA flows toward the positive electrod*!
- carefully position the DNA preparation and the Ladder in the holes of the agarose gel. If the preparations are positionned directly into the gel the result will be **bad**.