## MFBM 2021 poster project instructions

You will do a poster **either alone or with a pair.** The poster project is the task to do during period IV on the course and it is worth 30 points on the course.

### Timetable:

**Topic selection:** The poster topics are assigned in the classroom session (Wednesday 3.3, 11:15-12:00), or during the week after, if you want some time to think about the topic.

**Mid checkup:** On Wed 17.3 11-12 you will discuss your unfinished (but already well on its way!) poster with the teachers.

Poster session: Posters are presented 7.4.2021 10:15-12:00 in Zoom.

**Deadline:** Deadline is just before the poster session. The poster pdf is returned to Zoom

### Instructions:

The work consists of making a literature study of a chosen topic and preparing a scientific poster about it. The poster should present the idea, the state of the art, the microfluidic concepts involved and benefits obtained. The results are from published literature but the poster itself is a scientific work where you will curate and select the material. You will be presenting your perspective in the poster, not a recap of someone else's perspective. It is of course understood that your perspective is heavily influenced by the sources you read, should you judge them reliable. The poster is like a mini version of bachelors thesis. You are expected to browse/read maybe a maximum 10 papers on a topic, and then select 2-3 suitable ones for your poster. Like your bachelors thesis, your poster is also your own scientific work; your own synthesis of existing scientific literature. For most other instructions on what is expected, refer to the assessment rubric and the lecture on scientific posters.

Otherwise, the poster follows all the rules of a scientific work, sources should be cited etc. Typically all figures and tables should be captioned and cited in text, but if for example a figure has a clear enough explanatory text already in a subheading, then maybe it does not need to be repeated.

Make your poster in A0 size and the final document needs to be .pdf. You can use any software, most use powerpoint.

## **Choice of topic:**

You can choose your topic in two different ways.

- 1. During the classroom session 3.3.
- 2. By editing a Wiki page in the courses MyCourses page

# 2021 poster topic choices

- 1. Inertial microfluidics for circulating tumor cell screening
- 2. Acoustofluidics for circulating tumor cell screening
- 3. Droplet microfluidics for single cell RNA sequencing
- 4. Digital microfluidic immunoassays
- 5. Paper microfluidics: sensing opportunities beyond colorimetric detection
- 6. CD microfluidics based diagnostics: what are the advantages?
- 7. Liver-on-chip
- 8. Gut-on-chip
- 9. Human-on-chip: integrated organs on chip
- 10. Microchip capillary electrophoresis for environmental analysis
- 11. Multicellular organism on a chip (choose e.g. C.Elegans, zebrafish).