

The Lab

In **João T. Barata's lab** at IMM we want to clarify the role of cell-intrinsic aberrations and microenvironmental factors on tumor initiation and progression, metastasis, and response to treatment. With extensive work on lymphoid **leukemias**, we are now studying also **brain tumors** and **lung cancer**. Ultimately, we seek to identify, characterize and explore crucial biomarkers and molecular targets for the development of novel, more selective therapies against cancer. Great people with different backgrounds, working in a fun and stimulating environment constitute one of the assets of our lab.



The Institute

With an international, young, vibrant and welcoming atmosphere, **iMM – Instituto de Medicina Molecular João Lobo Antunes** is a leading Portuguese research institute, nurturing innovative ideas in basic, clinical and translational biomedical research. Located in the center of Lisbon in a top academic medical campus, iMM has the perfect setup to combine outstanding science with excellent



quality of life, in a city that rises to the 3rd place in the ranking of the best cities in the world for foreigners to live and work. (Expat City Ranking 2020).

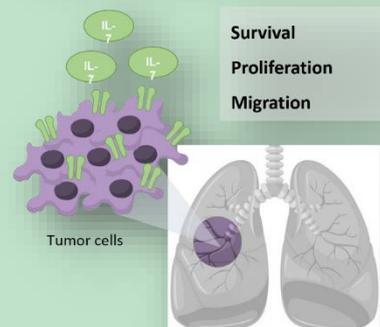


The project

Lung cancer is the leading cause of cancer-related deaths worldwide. In the current project we aim to understand how the interleukin-7 receptor (IL-7R), which is normally expressed in immune cells and essential for anti-tumoral immune responses, is “hijacked” by lung cancer cells in order to promote lung cancer development, metastasis and resistance to immunotherapy. The project will make use of distinct human cancer cell lines, patient-derived xenograft samples, xenotransplant and knock-in mouse models to demonstrate that IL7R is an oncogene in lung cancer and characterize the mechanisms involved.

These studies will be done in close collaboration with the groups of Jon Zugazagoitia and Luis Álvarez-Vallina, in CNIO and Hospital 12 de Octubre, Madrid, Spain.

**Is IL-7R an oncogene in lung cancer development?
Does it contribute to metastasis?**



You

We are looking for a highly **motivated, creative, independent** person that is enthusiastic about science, and ready to take on new challenges in which they can actually **make a difference**. Also:

- Excellent technical skills and strong experience in molecular and cell biology techniques (including multicolor flow cytometry, cell culture, viral production and transduction, western blot);
- Experience in cancer mouse models is highly desired.
- Experience in immunology is highly desired.
- Good English written and spoken skills.

In a lab where people are ambitious and hard-working but also like to have fun and help each other, being a team player is a plus.

Looking forward to meeting you!



More info on the lab and project

<https://imm.medicina.ulisboa.pt/investigation/laboratories/joao-barata-lab/#intro>

<https://fundacaolacaixa.pt/en/web/guest/caixaresearch-health-call-2021-project-drugs-lung-cancer>

<https://observador.pt/2021/12/13/uma-nova-esperanca-no-combate-ao-cancro-do-pulmao/>

Questions?

Contact João: joao_barata@medicina.ulisboa.pt