



Dipartimento
Oncologia



POSTDOCTORAL POSITION in Computational Oncology
University of Torino, ITALY

TARGET: Targeting DNA repair pathways, sparking anti-cancer immunity

An ERC-funded postdoctoral position is available in the Laboratory of Prof. [Bardelli](#) at the Dep. of Oncology, University of Turin (<https://www.dep-oncology.unito.it/do/docenti.pl/Show?id=albardel#tab-profilo>), in an international and team-based working environment with strong ties with the [IFOM Institute](#) in Milan (<https://www.ifom.eu/it/ricerca-cancro/ricercatori/alberto-bardelli.php>).

We are a dynamic and multidisciplinary group encompassing computational biologists, biotechnologists, physicians and physicists with extensive national and international collaborations.

Project information

Our research aims at testing for the first time the hypothesis that therapeutic inactivation of DNA repair pathways in cancer cells can be exploited for patient benefit by reawakening an anti-tumor immune response. Candidate will develop custom methods and pipelines to answer the following biological questions with innovative computational approaches:

- What are the bases of the extraordinarily long-lasting responses of patients with MMRd tumors?
- Are there other DNA repair defects able to increase immune surveillance and response to immunotherapy?
- Can we pharmacologically inhibit DNA repair proteins to promote the production of tumor neoantigens allowing the immune system to detect cancer cells?

Job mandatory requirements:

PhD in biology, genetics, bioinformatics, computational biology or in a related field of the life sciences.

A strong background in cancer biology and/or computer science.

Knowledge in statistics.

Good Skills in programming (no language preferences).

Confidence in linux systems.

Proficiency in English, good communication skills.

Team work attitude.

Preferential titles:

Previous experience in analysis of Next Generation Sequencing data

Advanced statistical knowledge is a plus

Previous experience in analysis of -omics data (genomics, transcriptomics, proteomics)

Applications should be submitted to simona.destefanis@unito.it and should include a CV with a list of publications, a research statement, a cover letter and contact information for at least two references (name, address, email and phone number).