

SCIENTIFIC CALL FOR PROPOSALS AFM-TELETHON 2022

THIS INTERNATIONAL CALL FOR PROPOSALS, OPEN TO BOTH FRENCH AND FOREIGN TEAMS, AIMS TO SUPPORT RESEARCH WHICH WILL:

PARTICULAR FOCUS on therapeutic and technological projects applicable to several pathologies

A. FUNDAMENTAL RESEARCH AND PHYSIOPATHOLOGY OF DISEASES OF THE NEUROMUSCULAR SYSTEM

1 - Fundamental research projects aimed at increasing our understanding of molecular, cellular, physiological and pathological mechanisms, involving the structure and function of skeletal muscles, motor neurons, neuromuscular junctions, aging and degeneration/regeneration in physiological and pathological conditions.

For applications on cardiac research, the applicant has to justify why this is of interest for neuromuscular pathologies, for example, the use of a neuromuscular cell or animal model system.

2 - Research projects aimed at increasing our understanding of the clinical and genetic heterogeneity of neuromuscular diseases.

3 - Genetic cardiomyopathies with muscle structure abnormalities.

4 - Understanding the physiopathology of smooth muscle in relation to neuromuscular diseases.

5 - Differentiation of adult, embryonic and iPS stem cells into skeletal/ cardiac muscles or neuronal cells (including motor neurons) (in physiological and pathological conditions).

6 - Genetic/epigenetic regulation of genes and characterization of gene regulation networks within the neuromuscular system.

Nota Bene: Concerning projects on ALS, priority will be given to therapeutic innovation.

B. DEVELOPMENT OF INNOVATIVE THERAPEUTIC APPROACHES FOR RARE GENETIC DISEASES

1/ Gene and/or cell therapy for rare genetic disorders

- Breakthrough innovation
- Gene transfer and gene correction
- Genome editing
- Genetically modified cells
- Development of delivery strategies and biomaterials
- Control of the immune response (auto-immunity, anti-vector and anti-transgene responses, etc.)

2/ Strategies for modifying gene expression both at the gene and RNA level

- Projects based on gene transfer, chemical molecules or biotherapies

3/ Pharmacotherapies of neuromuscular diseases

The proposed projects must be exclusively focused on neuromuscular diseases

4/ Translational research: tools for evaluation of treatments for neuromuscular diseases

- Outcome measures: functional, connected objects, imaging
- Genomic, transcriptomic, proteomic, metabolomic biomarkers of pathologies and/or therapies
- New cellular, tissue and animal models organoids

TYPES OF FINANCING:

The selected projects will be subject to an agreement with AFM-Telethon. AFM-Telethon may decide to finance the selected project under a collaboration which entails a co-ownership of the results.

- Trampoline grant: intended to support young teams or investigators early in their professional career (less than 10 years after thesis, either permanent or non-permanent position), and/or early stage innovative and high risk projects. This grant is awarded for a maximum of 50,000 euros for one year.
- Research project for one year, renewable for a second year, and exceptionally for a third year.
- Post-doctoral fellowship for one year, renewable for a second year.
- PhD fellowship (open to students enrolled in a French university doctoral degree program) for a maximum of three years.

Please note that Fellowship salaries (PhD and post-doctoral fellowships) cannot be included in the budget of a Research grant or a Trampoline grant. PhD and post-doctoral fellows must submit a separate application to cover their salary.

DEADLINES AND INSTRUCTIONS FOR APPLICATIONS:

are available on the [AFM-Telethon website](#).

[Access to the applicant portal](#)

LAURENCE TIENNOT-HERMENT
PRESIDENT OF AFM-TELETHON

ODILE BOESPFLUG-TANGUY
PRESIDENT OF THE SCIENTIFIC COUNCIL

<http://www.afm-telethon.com>