



OBJECTIVES

- Improve efficiency and safety of novel and emerging genome and epigenome editing technologies
- Precisely assess and enhance specificity of genome editing
- Tailor delivery of the novel genome editing technologies for in vivo application.
- Characterize and circumvent the immunogenicity of the AMPs
- Translate these novel AMPs into novel treatment paradigms applicable to diseases affecting large patient populations

UPGRADE offers radical new solutions to the hurdles that currently limit efficacy and safety of conventional and emerging gene therapy approaches.

OUR GOAL

Overcome current limitations that are hindering broad application of gene therapy, improving the safety, efficiency and in vivo delivery of advanced medicinal products (AMPs) based on gene and epigenome editing.



UPGRADE CONSORTIUM

UPGRADE multidisciplinary consortium includes experts in control engineering, computer science, microfluidics, microbiology and biotechnology

UPGRADE STAKEHOLDERS

UPGRADE project will build a network with key stakeholders: researchers, early-stage career scientists, industries, physicians, and patient associations

- Fondazione Telethon, Italy
- Pompeu Fabra University, Spain
- University of Trento, Italy
- Technische Universitaet Dresden, Germany
- Vrije Universiteit Brussel, Belgium
- University of Nantes, France
- Ludwig-Maximiliansuniversitaet Muenchen, Germany
- Massachusetts General Hospital, Unisted States

UPGRADE COORDINATOR

Prof. Luigi Naldini
Email: naldini.luigi@hsr.it
San Raffaele Telethon Institute for Gene Therapy
Milan, Italy

UPGRADE, a 5-year collaborative project supported by the European Commission, was launched on 1st January 2019



UPGRADE project has received funding from the European Union's programme Horizon2020 Grant Agreement No. 825825



UPGRADE

Unlocking Precision
Gene Therapy

WWW.UPGRADE-H2020.EU