European funding for wound healing

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The <u>Tissue Biology and Therapeutic Engineering Laboratory</u> has just been awarded a European Doctoral Network funding from the Marie Skłodowska-Curie actions for a 14-partner project on wound healing: the REMOD-HEALING project.

Wound healing is a physiological process leading to the restoration of the skin barrier integrity after injury. A large number of factors (wound size and location, exogenous pathogenic agents, aging, co-morbidities, genetic diseases) can affect wound healing and prevent its normal resolution, leading to wounds that never heal (i.e. chronic wounds) or that heal in an aberrant manner (e.g. with scarring or dermonecrosis). Wound healing disorders affect up to 6% of the adult population in the world and this number is expected to continue to grow due to population aging and increasing incidence of metabolic diseases. In addition, current therapeutic solutions lack efficiency and there is an urgent need for better diagnostic tools to improve wound management.

In the REMOD-HEALING project, the consortium proposes to tackle the burden of pathological wounds by exploiting the huge reservoir of therapeutic targets and biomarkers associated with extracellular matrix (ECM) remodelling in cutaneous wounds. Our innovative approach will be to analyse, model and target the aberrant ECM modifications induced by proteolytic enzymes in various healing disorders (chronic ulcers, epidermolysis bullosa, snake bite-induced dermonecrosis) with the hypothesis that the quality of the ECM shaped by proteases dictates the quality of tissue regeneration. We have gathered a team of 14 European and Latin American partners to provide excellent training to 12 doctoral candidates. PhD students will benefit from short stays with other partners involved in the project to discover different research environments. The aim of the doctoral network is to develop the transferable skills, creative potential and innovative spirit of doctoral students, opening up career prospects in both academic and non-academic environments.



Concepts and methodology of the REMOD-HEALING project (made with Biorender)

Coordinated by the <u>Tissue Biology and Therapeutic Engineering Laboratory</u>, the REMOD-HEALING project represents a significant advance in wound healing research, with major potential implications for public health and regenerative medicine. The European Doctoral Network funding covers the salary of doctoral students, research, training and networking costs, as well as management and indirect costs, with a total budget of 3.6 million euros. In total, this call for projects will support 149 doctoral training networks and over 1,800 doctoral students, with a total budget of 608.6 million euros. France, with a budget of 54.5 million euros, ranks third among the beneficiary countries, after Germany and the United Kingdom.



Overview of the training content for REMOD-HEALING doctoral students

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