

1. Project Description

Graduates of medical studies and science-related fields who aim to go into academic and industrial research need to possess beyond excellent specialist skills also abilities to design and conduct experiments, interpret data, manage projects as well as to write scientific reports and papers. Since globalisation has created a global market for research with benchmarks defined and demonstrated through grants as well as through internationally-peer reviewed scientific publications, employment and career advancement has been made dependent on these external criteria. In medicine and study programs related to medicine attaining such key points for one's CV require a long-planning horizon as medical trials and clinical studies tend to run over a long time under strict rules.

Yet existing curricula barely offer any education and training in academic writing, let alone in any of the skills mentioned above. Education in these study programs tends to be lecture-based with no learned-based approaches and work in small groups.

The project at hand aims to remedy this problem by offering short term intensive trainings using a learner-centred approach, where participants are guided to solve real-life problems and attain transversal knowledge and skills for conducting and publishing research. The trainings are composed by sets of modular workshops which can be combined flexibly.

Project objectives:

- Provide a set of modules with focus on medicine and medicine-related studies enabling students to build their transversal research-oriented competences and skills
- Create learning materials for students on how to conduct clinical studies, on the ethics and legal provisions of data-usage of in research with humans/patients, how to write research papers and scientific report, on how to develop individual career plans, how to build an international cooperation network, how to identify financing opportunities, how to formulate a project idea and plan
- Provide a learner-oriented methodology for transferring the knowledge using real-life problems where students can apply their knowledge. Support will be offered by teachers through a moderation process both in individual and group settings during workshops.

- Organise a series of workshops wherein students will exercise their transversal research-oriented skills.

Results

- A methodology with practical use cases and workshop guidelines
- A handbook with tools and methods for research-oriented transversal skills
- A series of intensive short-term trainings
- Publications in peer-reviewed conferences

2. Impact

The impact envisaged includes the modernization of curricula as well as the introduction of modular flexible workshops in the career development resources at universities. In addition it will improve the skills sets of students and young researcher in medical and science-related disciplines.

Long-term benefits include a higher quality of research and scientific publications as well as increased access to third-party funding through project grants.

The project is expected to have an impact on students, the participating teachers and the involved HEIs.

For the participating students the expected impact will be twofold:

a) on a knowledge level and b) on a personal level.

On a knowledge level after completing the workshops offered by the project students will have the ability to set-up an individual career plan including goals, actions and relevant milestones. They will know how to set-up and run a research study (from the ethical and legal guidelines, to the study design, to data collection and interpretation) as well as how to create a scientific report or publication. On a personal level the project will facilitate cross-cultural dialogue and cooperation between students and teachers. It will also equip the participants with better skills and competences to work in international environments.

On an individual level for teachers the project will facilitate knowledge transfer between teachers from different institutions. The project will also publish a book – a cooperative effort by all teachers involved in the project – on the methodology of educating students in transversal skills using a learner-based approach. The publication is expected to have a positive impact both on the participating faculties and on their members. In addition we will strive to publish an experience report either at educational or medical conferences to enable a better visibility of results.

On an organizational level it will support the creation of innovation excellence practices with an innovative training concept and foster better international cooperation in the field of medicine and medicine-related studies. It will strive to foster quality improvement in pedagogical and didactical approaches supported by the use of a learner-centred approach. The innovative way of delivery in small working groups in a workshop setting will modernize the education offer in HEIs in this field, make it more relevant for the labour market and plant a seed for the transfer of similar approaches to other disciplines.

On an organization level the involvement in such a project will improve cooperation processes and working methodologies in international projects, it will facilitate transfer of know-how from more experienced partners to those who have less experience. Also on both administrative and expert level it will provide valuable managerial lesson learned and thus enable future collaborations in international projects.

3. Sustainability

Both universities will assure the sustainability of the project by ensuring continuous access to the project results and open access to the produced materials. The website of the project will be available after the project is finalized. The Handbook of tools and methods and other learning materials will be available for download on the project website. The presentations made during the workshops will be also made available on the website.

Considering the aspects of continuity and transferability of the activities and results, the cooperation project is comprehensive and it offers to involved participants the capacity to create strategic and didactic content.

Partners will share their best practices and know-how for the improvement of their understanding and enhancing new cooperation opportunities to interdisciplinary study/research.

Thanks to the experience gained by the universities, similar projects can be implemented while the team involved in this project will be able to participate to similar projects, or in consulting activities for the implementation of cooperation projects.

In what concerns the organizations' sustainability, the universities will accomplish the necessary understanding in becoming centers for strategic thinking in order to provide future graduates and professionals with cutting-edge methodologies for improving the employability chances and professional success.