## **Preface**

I proudly present to you the first MaRBLe serie of the Faculty of Health Medicine and Life Sciences of Maastricht University. Maastricht University started in late 2008 with the implementation of its bachelor's excellence program under the National Sirius program. This excellence program was named MaRBLe (Maastricht Research Based Learning for Excellence) and is a weighted component within the third year of the regular bachelor program. Excellence for the university means above average developed academic skills, but also above average enthusiasm and passion to develop. At the FHML we choose for the option to have a faculty wide project called MaRBLe<sup>+</sup>, with the emphasis on career development competencies. Furthermore, interdisciplinarity was also one of the cornerstones of the program, meaning students from the various tracks were mixed in the MaRBLe groups, and in this way they learned that Healthcare is broader than their track alone. Students were selected to participate in this excellence program, from

- Molecular Life Sciences, a specialization with a strong focus on the molecular basis of health and disease;
- Biological Health, focuses on the complex physiological regulation systems within the body that control the equilibrium (homeostasis) governing health and disease;
- Human Movement Sciences, a specialization about the processes and structures in the body that enable movement;
- Policy, Management and Evaluation of Health Care focuses on the complex relationships in health care;
- Biology and Health examines the influence of diet, physical activity, and environmental factors in the development of diseases;
- Mental Health looks at the biological, psychological and socio-cultural aspects of psychopathology;
- Prevention and Health focuses on disease prevention, early detection of diseases and help people to cope with their illness.

The program consisted of various workshops, a meeting with a career coach and the opportunity for the students to practice in giving scientific talks to a broad audience and not only their fellow students from the same track. Furthermore, the students had the opportunity to present the findings of their bachelor thesis research during the MaRBLe<sup>+</sup> symposium in June 2014.

This series contain the summaries of the bachelor thesis of the MaRBLe<sup>+</sup> students of 2014, and represent the different strands of research in the various bachelor tracks of

Health Sciences and Bio Medical Sciences programs in the academic year 2013/14. Due to requirements from the different tracks students also used different references styles, also one of the summaries is in Dutch. Furthermore some students could not present their work in this thesis due to the fact that their work was in the process of submission to scientific journals and therefore not allowed to be published elsewhere. These publications could be the first step in the research career for theses students and is an ideal way to spread their research findings to a broader audience.

I would like to thank all the participating students for their contribution to this first series and to the fruitful discussions we had together as part of the MaRBLe<sup>+</sup> program.

## Jonathan van Tilburg

MaRBLe coordinator FHML