

(pre-) clinical

Marina Maréchal

Marina Maréchal graduated in 1980 as Bachelor in Dentistry from the University Hasselt (previous Limburgs Universitair Centrum, Diepenbeek), Belgium and in 1983 as a Master in dentistry from KU Leuven, Belgium. In 1987 she graduated as a Master after Master/Postgraduate in Periodontology, KU Leuven, Belgium.

From 1987 on, as one of the founders of the “Praktijk voor Parodontologie”, Hasselt, Belgium, she worked as a periodontologist in this private practice specialized in the treatment of periodontal diseases. At the same time, she kept working at the department of Periodontology, KU Leuven, Belgium, and performed research on the influence of surface free energy and surface roughness on early bacterial plaque growth on teeth and titanium implants in humans.

After more than 13 years working as a periodontologist, she returned back to the KU Leuven, Belgium to dedicate her work to research in the field of bone tissue engineering. In 2005 she earned her PhD in Biomedical Science from the KU Leuven, Belgium with the subject “Tissue Engineering for Bone Augmentation by means of Osteoprogenitor cells”.

Beginning 2006, she joined TiGenix as Head Preclinical Development (Haasrode, Belgium) where she was responsible for the nonclinical development and translation of ChondroCelect, a cellular therapy for cartilage repair in the knee. She was part of the R&D team that supported the development and marketing approval of ChondroCelect, the first Advanced Therapy Medicinal Product (ATMP) approved by EMA, Europe. Her work at TiGenix focused on large animal models and translation of research data to a GMP environment.

In 2011, she start working at Prometheus, Division of Skeletal Tissue Engineering of KU Leuven, Belgium as Senior Preclinical/Clinical Translational Project Manager. Her main tasks are translation of new Advanced Therapy Medicinal Products (ATMP) to a clinical setting using large animal models and preparation of ethical dossiers and dossiers containing the regulatory aspects according the guidelines of EMA concerning ATMPs. In 2017, TERMIS approved her appointment as a representative to the Regenerative Medicine Technical Advisory Group (RMTAG) of ICCBBA. RMTAG is chartered with developing nomenclature in areas of tissue engineering, regenerative medicine and those products that fall between the tissue and cellular therapy areas. Her expertise is in the field of skeletal tissue engineering and technology transfer of cell based therapies (ATMP), mesenchymal stem cells differentiation and characterization (chondrocytes, periosteum-derived cells), GLP, GMP, small and large animal models, ethical and regulatory dossiers preparation according EMA guidelines, large scale cell manufacturing, clinical trials, quality control, European projects and project management.

Justus Beier

Univ.-Prof. Dr. med. Justus P. Beier, M.D., is full Professor and the Chair of the Department of Plastic Surgery, Hand Surgery – Burn Center at RWTH Aachen University, Germany.

J. Beier, born in Hamburg, Germany, graduated in medicine at University of Freiburg (2003) and subsequently specialized as a board-certified surgeon in for Plastic and Aesthetic Surgery (21010) and Hand Surgery (2012) at the Department of Plastic and Hand Surgery, University of Erlangen, Germany. He has dedicated his work to the field of plastic and reconstructive surgery for cancer and trauma patients, initially at the University of Freiburg, Germany, and subsequently at the University of Erlangen, Germany. He was appointed full professor at the RWTH Aachen University in 2017 and is since then Chair of the Department of Plastic Surgery, Hand Surgery – Burn Center in Aachen, Germany.

His experimental research focus over the last 20 years has been in Tissue Engineering, including mesenchymal stem cell differentiation and developing strategies for generation of vascularized musculoskeletal tissues. An important part of his research activities is based on the development of new microsurgical animal models, including the large animal AV-loop sheep model. Currently his Tissue Engineering Lab at the University Hospital RWTH Aachen investigates human adipose stem cell differentiation and possible new applications in Tissue Engineering of human adipose, bone and skeletal muscle tissue as well as peripheral nerves. In a number of interdisciplinary research projects with material and imaging scientists, innovative scaffolds and new imaging modalities are subject to investigation in vitro and in vivo.

Clinically, J. Beier is specialized on plastic and reconstructive surgery for cancer treatment-induced deformities of the breast, including autogenous microsurgical reconstruction, as well as for trunk, perineum, and lower extremities. As a hand surgeon, acute trauma and reconstructive surgery of the hand, as well as congenital hand deformities, are part of his clinical spectrum.

J. Beier is a german board-certified Plastic & Aesthetic Surgeon as well as a board-certified Hand Surgeon. He is a member of the German Society of Plastic Surgeons, the German Society of Surgery, the German Society for Burn Care, the German-speaking language group for Microsurgery, the Tissue Engineering & Regenerative Medicine Society international and the European Plastic Surgery Research Council.