

Paula M Alves Bio – March 2023

Paula Alves graduated in Biochemistry at the Faculdade de Ciências da Universidade de Lisboa, and holds a PhD in Biochemical Engineering From ITQB - Instituto de Tecnologia Química Biológica da Universidade Nova de Lisboa.

Working in Animal Cell Technology since 1990, her PhD contributed to the establishment of 3D in vitro models of Brain Cells for metabolic trafficking studies. She did part of her PhD studies at the NMR Center-Sintef, Trondheim Hospital, Norway (1994) and a Sabbatical at MIT, USA (2009). She has been an Independent Researcher and Principal Investigator of ITQB-NOVA University of Lisbon since 2005. Since, January 2007 she is Head of the Animal Cell Technology Unit form ITQB-UNL/IBET, where she coordinates the work of five laboratories (<http://tca.itqb.unl.pt>).

Since 2012 she is the CEO of iBET. Was elected member of the US National Academy of Engineering in 2021 and was the Chairperson of the ESACT (European Society for Animal Cell Technology) from 2017 to June 2022. Paula Alves is currently a Member of the International Advisory Committee of the Center for Research and Development of Immunobiologicals – CerDI (Instituto Butantan, Brasil) and SAB Member of IABS (International Alliance for Biological Standardization (IABS) Endowment Fund Committee, France and of Vibalogics, Germany. At the European Commission she was member of IMI and EURL-ECVAM Scientific Advisory Committee and of the Advisory Board of Horizon 2020 Societal Challenge. In 2009 she received the Scientific Merit Award from NOVA University of Lisbon, in 2021 the Gold medal of Oeiras Town.

CV Highlights: (i) 280 published papers; 32 book chapters; 3 patents (ii) supervised 38 PhD students (thesis defended), 9 post-docs and 7 Master thesis (defended (iii) Pos-graduation teaching activities at NOVA (PhD Programs) and at several Portuguese Universities, lecturer at the MIT-Portugal Program.

Her Current Research, with funding from Fundação para a Ciência e Tecnologia (Portugal), EU Framework programs and the Pharmaceutical industry, is focused on understanding cell metabolism to improve the efficiency of bioprocesses and at developing new tools and technologies for pre-clinical research. More recently this expertise was expanded to generate expansion and differentiation of stem cells (human embryonic, hiPSC and adult) in bioreactors. The Unit she coordinates uses Animal Cell Technology for research and development in particular for (I) production of complex biopharmaceuticals such as viral vectors, vaccines and recombinant proteins (II) development of 3D culture systems for toxicity testing using primary cells and stem cells in bioreactors (III) expand systems biology approaches to organize the complexity of the processes involved in the research described in (i) and (ii). She was WP leader in 8 from the 25 EU projects where she participated as PI.