

SHORT CURRICULUM VITAE

Jaime Prohens Tomás

Prof Dr. Jaime Prohens is Engineer in Agronomy (1993) and Doctor Engineer in Agronomy (1997). He is Full Professor of Genetics and Plant Breeding (2009) at the Polytechnic University of Valencia, where he has been teaching since 1997.

His main research lines have dealt with vegetable crops breeding, where he has used the integration of conventional methods and new biotechnologies with the final aim of developing new vegetable cultivars for the development of the horticultural sector. He has collaborated with many research groups and his activity has had an important international projection. At the same time, he developed an important task for the promotion and stimulation of the national and international research activity in Plant Breeding and Horticulture by presiding over the European Association Research on Plant Breeding (EUCARPIA; 2004-2008) and also the Spanish Society for Horticultural Science (2012-2015). He has also devoted time to the administration at the University level, by being director of the Department of Biotechnology (2008-2012) and the Institute for Conservation and Improvement of Agrodiversity (COMAV; since 2012), two of the most relevant research structures of the Polytechnical University of Valencia.

Research merits

The research activity of Prof. Dr. Jaime Prohens has been mostly devoted to the genetics and breeding of Solanaceae vegetable crops, mostly in the following fields, in which he is leading an important research group, and has applied innovative approaches and developed significant advances:

- Breeding for yield
- Breeding for resistance to diseases
- Breeding for fruit quality
- Breeding for low-input and organic conditions
- Selection and improvement of landraces
- Interspecific hybridization
- Introduction and adaptation of new crops
- Prospection, conservation and enhancement of genetic resources
- Origin, domestication, and evolution of crops
- Plant breeding methods
- Participatory plant breeding
- Precision breeding
- In vitro* culture techniques for breeding
- Molecular markers and genomics
- Bioinformatics
- Development of rootstocks
- Development of commercial cultivars

The main research merits of Prof. Dr. Jaime Prohens include:

Author (since 1993) of 114 papers in scientific journals indexed by JCR. Most of these papers are published in journals which rank high in impact factor in their respective categories. He has participated in over 250 contributions to national and international congresses, including several keynote and invited conferences

He has also received several awards and recognitions related to research, including:

-“Young Researcher Award” (1999) of the Spanish Society for Horticultural Science.

-“Distinguished Guest” (2007) of the Universidad Nacional de Trujillo, Peru (2007).

-Honorary Member of the “Societatea de Horticultura si Silvicultura din Transilvania”, Romania (2010).

-“Diploma de Excelenta” of the Faculty of Horticulture of the Universitatea de Stiinte Agricole si Medicina Veterinara Cluj-Napoca (Rumanía) for the contributions and achievements in education and research in Horticulture (2011).

-Medal of the International Horticultural Society (ISHS) for the contribution in the organization of the 28th International Horticultural Congress (2010).

Prof. Jaime Prohens has also been convener of two major scientific congresses, has chaired 11 sessions in congresses, and has been member of the scientific committee of 12 congresses. He has also been member of the Executive Committee of the 28th International Horticultural Congress, which had more than 2400 participants.

His scientific prestige has led him to act as member of the editorial board of 8 international journals, as reviewer for 37 JCR-indexed journals and for several editorial projects of major international scientific editorials, as well as for several national and international funding agencies, including the EU COST “Food and Agriculture” Programme.

Among the participation in research projects, he has been principal investigator of over 50 research projects, including 3 H2020 projects (TRADITOM, G”P-SOL, and BRESOV), and contracts

Prof. Jaime Prohens has obtained seven cultivars of *Solanum* crops adapted to Mediterranean conditions. Among them he has selected two cultivars used by the farmers of the Protected Geographical Indication "Almagro Eggplant", which is an important crop from a social point of view, as it provides an extra income to many families. Also, he has had an important activity of technology transfer, including transfer of improved cultivars and plant material and associated technology, as well as participation in courses and technology transfer workshops.

He has also had an important activity in the prospection and conservation of genetic resources, with 12 scientific expeditions in South America, where he has made an important contribution to the understanding of the distribution and ecology of wild relatives of Andean crops. During these expeditions, he discovered two new wild species of the potato-tomato-pepino group: *Solanum catilliflorum* and *S. perlongistylum* of interest for the breeding of these crops.

Teaching Merits

Prof. Jaime Prohens has been teaching subjects related to Genetics and Plant Breeding in BSc, MSc, and PhD programmes at the Polytechnic University of Valencia since 1997, where he has imparted lectures in Spanish and English. He always obtained very good results in the evaluation given by students, with an average mark of 8.63, much above the average of the University and his Department of Biotechnology.

He has been advisor of 4 PhD Thesis, one of which received the Extraordinary Doctorate Award, and 45 BSc and MSc Thesis, five of which received the prestigious Bancaja-UPV Award. He has also tutored some novice University lecturers as well as many ERASMUS students.

Prof. Jaime Prohens has participated in several innovative education projects, including the leadership of the Spanish partnership of two ERASMUS intensive projects between France, Germany, Portugal, and Spain on “Vegetable crop centers in Europe” and “Periurban Horticulture”. He also made several short stays abroad for teaching at other European Universities.

Among the positions related to education, he has been Academic Director of the Degree in Biotechnology, Director of Studies of the Interuniversity Master in Plant Breeding, as well as member of Academic Commissions of several Degrees and Masters at the Polytechnic University of Valencia. He is also member of the Doctorate Commission of this University.

Prof. Prohens is author of 12 teaching publications, including two books, one of which is an international book entitled “A primer on Genetics and Plant Breeding”. He has also participated in several educational national and international congresses and workshops, where

he has presented 12 contributions for the improvement of education in Plant Breeding and Horticulture.

Apart from the teaching activity at the University, he has also participated in many courses directed to technicians and staff of cooperatives and companies.

He has received several awards for his excellence in teaching:

-“Teaching Excellence Award” in the “I Edición de los Premios a la Excelencia Docente Consejo Social Universidad Politécnica de Valencia y Consellería de Educación de la Generalitat Valenciana” (2009). This prize was only awarded to 7 out of the more than 2800 lecturers of the Universidad Politécnica de Valencia.

-“ASHS Education Publication Award” of the American Society for Horticultural Science (ASHS, 2011) for the educational publication “A software tool for teaching backcross breeding simulation”, published in Horttechnology 20:1049-1053.

Management of scientific activities

Prof. Jaime Prohens has held several important positions at the University and also in scientific societies, from which he has stimulated research activity and cooperation.

At the University level he has held the following positions:

-Director of the Department of Biotechnology (2008-2012), one of the most important departments of the Polytechnic University of Valencia, and which counts with 54 teaching staff from the sections of Biochemistry and Molecular Biology, Genetics and Plant Breeding, and Microbiology.

-Director (since 2012) and vice-director (1999-2012) of the Institute for Conservation and Improvement of Agrodiversity, devoted to research in vegetable crops breeding, and which counts with 23 researchers holding a PhD degree.

Regarding scientific societies he has been presiding over two important scientific societies:

-President (2004-2008) of the European Association for Research on Plant Breeding (EUCARPIA; ≈1500 members).

-President (2012-2015) of the Spanish Society for Horticultural Science (SECH; ≈600 members).