



Prof dr Nikola Tucić
(1946-2015)

IN MEMORIAM

NIKOLA TUCIĆ
(1946-2015)

The Corresponding member of the Serbian Academy of Sciences and Arts, Professor Nikola Tucić left us suddenly, after a short and serious illness, on March 2, 2015.

Professor *Nikola G. Tucić* was born in Novi Sad on May 2, 1946. He finished primary and secondary school in Belgrade, and after enrolling at the Department of Biology of the Faculty of Natural Sciences and Mathematics 1965, he graduated in 1968. In 1972 he received his master's degree in Genetics and in 1975 defended his PhD thesis within the field of Evolutionary genetics. In 1976, Dr. Nikola Tucić was elected Assistant Professor for the course in *Principles of Genetics* (for students of Molecular Biology and Physiology, Faculty of Natural Sciences and Mathematics). In 1983, he was elected Associate Professor for the course in *Theory of Evolution* and he acquired the title of a Professor in 1989. Professor Tucić also held the course in *Genetics* at the Department of Psychology of the Faculty of Philosophy in Belgrade (1978-2011).

In the period 1976-1977, Professor Tucić attended postdoctoral studies at the University of California in Davis. He spent three months at the University of Athens (Georgia, USA) during 1982. As an invited lecturer, he gave lectures to postgraduate students at the Department of Anthropology, Faculty of Natural Sciences, University of Zagreb, in the period 1988-1991.

Nikola Tucić was the founder (1991) and the first head of the Department of Evolutionary Biology at the Institute for Biological Research "Siniša Stanković", which became well-known due to many manuscripts that he published in our country and abroad. In the course of many years, Professor Tucić supervised the project "Population and biological aspects of the process of speciation" that was financially supported by the Ministry of Science of the Republic of Serbia. He conducted research within the field of evolutionary genetics and the majority of his almost 120 scientific papers were published in international journals. Professor Tucić was the author and co-author of ten books within the field of evolutionary genetics and socio-ecology, in which his synthetic and concurrent-causal approach to evolutionary biology was presented. He had a particular interest in mechanisms modelling the genetic structure of natural populations, i.e. quantitative-genetic base for regulation of abundance and persistence of populations by using the most appropriate model-organisms under experimental conditions. Professor Tucić was one of the first scientists in the world who empirically established (1988) the role of pleiotropic genes in controlling longevity. He studied quantitative-genetic bases of traits important in the dynamics and regulation of abundance of experimental and natural populations. He supervised 14 master's and 12 doctoral dissertations to completion.

The scientific papers of Nikola Tucić were published in prestigious journals concerned with evolutionary genetics and ecology (*Evolution, Journal of Evolutionary Biology, Genetics, Heredity*), gerontology (*Experimental Gerontology, Biogerontology*) and ethology (*Behavioural Ecology, Journal of Ethology, Behavioural Genetics*). Professor Tucić was the author or the co-author of 10 university textbooks or monographs including *Genetics* (six editions from 1981 to 1991), *The Introduction to the Theory of Evolution* (1987), *Evolution, Humans and Society* (1999), *Evolutionary Biology* (2000, 2003), *About Genes and Humans* (2002, 2005), *Darwiniana* (2009), *From the Molecule to the Organism* (2012).

In addition to scientific research, Professor Tucić devoted his professional career to establishing the relationship between evolutionary biology and the humanities, especially sociology and psychology. He translated into our language many papers

concerning history and philosophy of biology, including the book *Mankind Evolving* by Th. Dobzhansky. Professor Tucić was a member of the Republican Assembly of Science and the first president of the Committee on Genetic Engineering (1986). For many years, he was a member of the Editorial Board of the Dutch journal *Genetica*, as well as a member of the Board of Biology of the Ministry of Science and Technology of the Republic of Serbia.

In October 2003, Professor Nikola Tucić was elected a corresponding member of the Department of chemical and biological sciences of the Serbian Academy of Sciences and Arts. His papers resulting from the project "Adaptation in natural and laboratory populations", funded by the Ministry of Science and Technology of the Republic of Serbia, were mainly published in international journals. He became a member of the National educational council of the Republic of Serbia, as well as a member of the Commission for the Award of the City of Belgrade (2002/2003). Professor Tucić supervised SASA's scientific project "The Role of heat shock proteins in the senescence", in which a prolongation of the lifespan in model-organisms was compared with reproductive ability, along with an explanation of genetic bases of these correlations. He continued studies related to evolution of correlations among additive components of organisms and pointed out that components of genetic variation were not fixed entities that could be considered isolated from one another.

Professor Tucić was a member of the Editorial Board of the SASA's Bulletin of Scientific Research. He participated in the work of the Board of Education and the Board of Higher Education. He took over activities to convey warning of the International Academic Panel (IAP) on the dangers of evolutionary learning on the basis of Creationism to the school institutions in our Republic. In February 2009, he organised an appropriate celebration to mark the 200th birthday of Charles Darwin and 150th anniversary of the publication "The Origin of Species by Means of Natural Selection" and also a series of lectures and seminars for teachers of biology in several cities in Serbia. Afterwards, he actively participated in the public media in advertising the science he was engaged in - modern evolutionary biology.

Unfortunately, Nikola Tucić suffered a great tragedy in the family in 2010, after which he almost exclusively devoted his life to experimental work and writing books, with the gradual withdrawal from teaching activities. However, several publications in leading journals, as well as the book "From the Molecule to the Organism" (2012) represent an authentic contribution to the synthetic approach to modern evolutionary biology. Earlier this year, his weakened body was exposed to viral pneumonia, of which, unfortunately, he was not able to defend.

We lost one of the top evolutionary biologists, who left clear messages of his studies, as well as the followers who should be able and willing to continue this advanced teaching.

On March 2015,

Dragoslav Marinković