



OPINION

regarding the competition for the academic position "Professor" in the scientific specialty "Breeding and seed production of cultivated plants (Plant Biotechnology)," announced in SG no. 7 of January 25, 2022, with candidate Assoc. Prof. Dr. Svetla Dimitrova Yancheva

by Prof. Dr. Argir Todorov Zhivondov - specialty "Breeding and seed production of cultivated plants", determined according to Order № RD -16-368 / 28.03.2022 of the Rector of the Agricultural University - Plovdiv as a member of the scientific jury

1. Brief introduction of the candidate.

Assoc. Prof. Dr. Svetla Dimitrova Yancheva was born on June 15, 1962, in Sofia. In 1989 she graduated from the Higher Agricultural Institute in Plovdiv. From 1991 to 1994, she was a full-time doctoral student at the Institute of Genetic Engineering in Kostinbrod. As a result, in 1997, she obtained the educational and scientific degree "Doctor". The main career development of the candidate passes in the Department of Genetics and Plant Breeding at the Agricultural University - Plovdiv, where since 2008, she has been an Associate Professor. Since 2020 she has been an associate professor at the Department of Viticulture and Fruit Growing at the same university. From 2016 until now, she has been Vice-Rector of the Agricultural University of Plovdiv.

From the beginning of February to the middle of May 2017, Dr. Yancheva was Deputy Minister of the Ministry of Agriculture. During the period 2012 to 2016, she was Chairman of the General Assembly of the Agricultural University of Plovdiv. She has lectured and given exercises in front of students not only from the Agricultural University of Plovdiv but also in five universities abroad and conducted many specializations in different countries. She has trained doctoral students, graduates, and postgraduates. Dr. Yancheva has participated in over 30 international and national symposia and conferences, and she is a member of the Editorial boards of International and Bulgarian scientific journals. She has excellent computer skills and excellent command of English and Russian.

2. General description of the scientific production.

Assoc. Prof. Svetla Yancheva participated in the competition for "Professor" with a total of 39 scientific works, of which:

- Publications with impact factor - 10
- Publications with impact rank - 13

Additionally, the scientific papers could be grouped as follow:

- Scientific articles - 33
- Review paper - 1
- Chapters in a collective monograph - 2
- Books - 1
- Practical manuals - 2

The personal participation of the candidate in the mentioned 39 works is as follows: First and independent author in 13 documents, second author - 8, third and subsequent author - 18 publications.

All 39 papers are subject to review for the preparation of the opinion.

3. Teaching activity

Assoc. Prof. Dr. Svetla Yancheva has been a lecturer at the Agricultural University of Plovdiv since 1998 with a total teaching experience of 23 years and 9 months. In the last five years alone, the teaching hours totaled 2119.5 hours, equivalent to practical exercises. Under the Erasmus + program for the period the first semester of 2011-2012 academic year to the first semester of 2021-2022, she gave a total of 300 hours of lectures and 315 hours of practicals in five disciplines. During the period 2010-2021, she conducted Erasmus + mobility by the Center for International Affairs at the Agricultural University of Plovdiv, including training and teaching at universities and scientific institutes in Spain, Greece, the Czech Republic, Croatia, Poland, and Slovenia. As part of the candidate's participation in the project "Introduction of electronic forms of education at the Agricultural University of Plovdiv," – she has developed and published a textbook in electronic form in the discipline of Plant Biotechnology.

Dr. Svetla Yancheva has supervised three PhD students who successfully defended their doctoral dissertations. She was the research supervisor of three other doctoral students and many graduates and postgraduates. She has participated in 9 scientific juries as a reviewer or with an opinion preparation. She took part in the implementation of 20 curricula, some of which were conducted in English.

4. Research activity.

The main directions in the scientific works of the candidate in this competition include the development and optimization of different biotechnological methods such as: micropropagation, regeneration systems via somatic embryogenesis and organogenesis, callus and cell cultures, and application of molecular marker-assisted selection in various plant species. In theoretical and practical aspects, their importance for the success and application of biotechnological science in the development of agriculture is taken into account. The main contributions to the research of Assoc. Prof. Yancheva are systematized into three groups. The largest of them includes original scientific and applied contributions, which I personally appreciate. These contributions provide opportunities to directly support the development of agriculture and accelerate the selection process.

As more significant of them, I consider the following:

- By skillfully combining classical selection methods and applying the marker-assisted selection, a new variety of pepper "Desislava" with twice the content of beta-carotene was created;
- Effective protocols for micropropagation of the main Bulgarian raspberry varieties have been created;
- A simplified system for raspberry micropropagation has been developed with great practical application for the industrialization of the micropropagation process;
- An effective system for micropropagation of interspecific hybrid tayberry has been developed;
- An optimized, simplified system for micropropagation of grape varieties and rootstocks has been created in order to obtain pre-basic planting material;
- A reliable in vitro protocol for adventitious organogenesis has been developed for four valuable wild species - strawberry, raspberry, blackberry, and cranberry;

- An experimental protocol for in vitro propagation of three Paulownia genotypes has been developed;
PCR-based marker for early selection of pepper with high beta carotene content has been developed.

The results obtained in the research activity and their significance are mainly judged by the citation degree. By February 2022, the candidate had submitted 167 citations, as five of the publications had been cited repeatedly. The presented high volume of citations eloquently shows that the candidate has a high degree of recognition in the scientific community in the country and abroad.

The initiative and leadership skills for conducting research are determined to the greatest extent by participation in research projects and programs. Assoc. Prof. Yancheva has participated in the development and realization of 21 international scientific and educational projects, and in 9 of them, she has been a leader.

5. Remarks and recommendations.

The creation of a new variety guarantees obtaining a unique original product that is not the result of routine research or simple study. I believe with complete conviction that the new variety creation place in the contributions has not the last, as it is placed, and with this top selection achievement, they had to start.

6. Conclusion.

Based on the analysis of the candidate's pedagogical, scientific and scientific-applied activity, I believe that Assoc. Prof. Dr. Svetla Yancheva fully meets the requirements of LDASRB and the Regulations of the Agricultural University for its application. The minimum national criteria for Academic Degree "Professor" from all groups are met, and in some groups, they are significantly exceeded.

All this gives me a reason to appreciate her overall research and teaching activities.

I would like to recommend that the esteemed Scientific Jury vote **POSITIVELY** and the Faculty Council of the Faculty of Viticulture and Horticulture at the Agricultural University - Plovdiv elect Assoc. Prof. Dr. Svetla Yancheva as "**Professor**" in the scientific specialty "Breeding and Seed Production of Cultivated Plants."

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Plovdiv

OPINION PREPARED BY:


(Prof. Dr. Argir Zhivondov)