

# OPINION

By Dr. Kiril Stoyanov, associate professor

about the materials represented in the competition  
for the academic position of "**associate professor**"  
in the University of Plovdiv "Paisii Hilendarski"

in: field of higher education 4. Natural sciences, mathematics, and computer science  
professional field 4.3. *Biological sciences*  
(*Genetics – General and Evolutionary Genetics*)

In the competition for "associate professor", announced in the State Gazette, issue 98 of 19.11.2024 and on the website of Plovdiv University "Paisiy Hilendarski" for the needs of the Department of Developmental Biology at the Faculty of Biology, the candidate is Senior Assistant Professor Dr. Penka Lazarova Vasileva from the Department of Developmental Biology, Plovdiv University.

## 1. General presentation of the procedure and the candidate

### *Presentation of the procedure and inventory of materials received for review*

By order No. PD-222-442 of 18.02.2025 of the Rector of Plovdiv University "Paisiy Hilendarski" (PU), I have been appointed as a member of the scientific jury of a competition for the academic position of '**associate professor**' at PU in the field of higher education 4. Natural Sciences, Mathematics, and Informatics, professional field Biological Sciences (Genetics - general and evolutionary genetics), announced for the needs of the **Department of Developmental Biology** at the **Faculty of Biology**.

Only **one candidate** has submitted documents for participation in the announced competition: Senior Assistant Professor Dr. Penka Lazarova Vasileva from Plovdiv University "Paisiy Hilendarski", Department of Developmental Biology, Faculty of Biology.

The set of materials on paper submitted by Senior Assistant Professor Dr. Penka Vasileva follows the Regulations for the Development of the Academic Staff of the University of Plovdiv.

The candidate, Senior Assistant Professor Dr. Penka Vasileva, has attached a list of a total of 49 scientific publications, 1 monograph, 3 books, 2 textbooks, 2 online courses, and 14 research

projects. The participating activities for the current competition are 17 scientific publications, 1 monograph, 2 textbooks, and 10 research projects.

The professional experience of Senior Assistant Professor Penka Vasileva began in 2002 at the Institute of Fisheries and Aquaculture in Plovdiv, where she is a full-time PhD student and is defending a dissertation on the reproductive and morphological characteristics of *Astacus leptodactylus*. In 2010, she started at the University of Plovdiv, Faculty of Biology, Department of Developmental Biology as a biologist, chief expert. From 23.12.2010 she has been an assistant professor in the same department, from 1.06.2011 to the present - senior assistant professor. Her professional interests are closely related to the announced competition - General and population genetics, Cytogenetics with genetic analysis of general toxicity and mutagenicity, and, in connection with the PhD thesis - *Astacus* culture.

## **2. General characteristics of the candidate's activities**

### *Evaluation of the candidate's teaching and learning activities and preparation*

The candidate has 14 years of teaching experience. She taught 7 bachelor's specialties: General and Population Genetics (exercises and seminars), Theory of Evolution (lectures, exercises and seminars), Theory of Evolution and Theoretical Biology (lectures and exercises), Genetics (exercises and seminars). She is an author of lecture courses for bachelor's programs in Fundamentals of Genetics, General Genetics, Genetics, Theory of Evolution, and Cell Biology, for the Faculty of Biology and the branches in Smolyan and Kardzhali. The candidate is an author of 3 curricula for the master's course, 2 - for the specialized course "Motivated Teachers" and 2 electronic courses in genetics and fundamentals of genetics.

The candidate is a co-author of two textbooks, for which she accumulated 14 points according to the unified requirements. The submitted participations in projects are 9 in total, of which 4 are national, for which 40 points are obtained. These indicators from group E accumulated 54 points, which is an optional criterion for the announced competition.

The candidate has 9 successfully graduated students (with a minimum requirement of 5).

### *Evaluation of the candidate's scientific and applied scientific activities*

The presented habilitation thesis (monograph) corresponds to the requirements of the indicators of group B. The monographic work examines the cytotoxicity of some nutritional supplements and is an original author's product.

All 17 publications submitted for the competition, which do not overlap with other procedures, have an impact factor and/or impact rank indexed in Scopus. The discoverability of publications by Scopus quartile is distributed as follows: 1 publication with Q1, 6 publications with Q3, and 10 publications with Q4. These publications are evaluated in group D as 235 points, which exceeds the minimum criterion. All submitted publications are compatible with the announced competition position – genetic studies of the species *Apis mellifera* (3 publications), *Astacus leptodactylus* (1 publication), *Cyprinus carpio* (1 publication), *Bombyx mori* (2 publications), *Messor barbarus* (1 publication), *M. structor* (1 publication), *Reticulitermes lucifugus* (1 publication); studies of reproductive problems in humans (3 publications); cytogenetic studies of the effects of anthropogenic factors (4 publications). The submitted publications are original works with the authorship of the candidate, which is proven by participation in a large number of scientific forums.

The candidate participates in the team of 4 national projects (FNI at the Ministry of Education and Science), 2 at the Agricultural Academy, and 4 internal projects at the University of Sofia, being the leader of one of them.

#### *Contributions (scientific, applied science, applied) and citations*

The candidate's contributions are in the field of expanding knowledge on mutagenicity and cytotoxicity of xenobiotics in model test systems *Allium cepa* and *Capsicum annuum* (8 publications), intrapopulation variability during ontogenesis (2 publications), interpopulation variability (4 publications), and human reproductive health (3 publications).

The attached citation list contains 67 noticed citations (four times the number of submitted publications) indexed in Scopus, which equals 134 points and exceeds the minimum criterion of 50 points under group D.

In addition, the candidate also demonstrates good administrative experience - participation in committees and on the editorial board of a scientific journal.

#### **CONCLUSION**

The documents and materials presented by Senior Assistant Professor Dr. Penka Lazarova Vasileva meet the uniform national requirements according to the Law on the Development of the Academic Staff in the Republic of Bulgaria, the Regulations for the Implementation of this law and the relevant Regulations of the University "Paisiy Hilendarski".

The candidate in the competition proves, with the submitted scientific publications and contributions, that she is a competent specialist in the field of general and evolutionary genetics. The achieved results in the educational and scientific research activities completely meet and exceed the national requirements and the specific requirements of the Faculty of Biology.

Based on the facts presented, I give my positive assessment of the overall work of Dr. Penka Vasileva and recommend to the esteemed jury to prepare a report-proposal to the Faculty Council of the Faculty of Biology for selection for the academic position of "associate professor" at Plovdiv University "Paisiy Hilendarski", in the professional field of Biological Sciences (Genetics - general and evolutionary genetics).

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**Prepared the opinion: .....**

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