

OPINION

on the competition for the academic position of Associate Professor in the field of higher education 6. Agricultural Sciences and Veterinary Medicine, professional field 6.2. Plant Protection, scientific specialty "Plant Protection", announced in State Gazette No. 65 of August 8, 2025

Candidate: Chief Assistant Professor Dr. Pavlin Emilov Vasilev, Department of Entomology, Agricultural University – Plovdiv

Member of the Scientific jury: Associate Professor Dr. Atanaska Radeva Stoeva, Agricultural University - Plovdiv, field of higher education 6. Agricultural Sciences and Veterinary Medicine, professional field 6.2. Plant Protection, scientific specialty "Plant Protection," appointed as a member of the scientific jury by Order No. RD 16-991/07.10.2025 of the Rector of the Agricultural University – Plovdiv

1. Brief presentation of the candidate

Pavlin Emilov Vasilev completed his higher education at the Agricultural University – Plovdiv, where he obtained the degrees of **Bachelor** and **Master** in Plant Protection. In 2016, he defended his doctoral dissertation entitled "*Aphids (Hemiptera: Aphididae) on stone fruit crops – distribution, and control.*"

Since 2019, he has been a Chief Assistant Professor at the Department of Entomology, Agricultural University – Plovdiv, where he has developed active teaching and research work in the field of plant protection.

Dr. Vasilev's scientific interests are focused on the entomofauna of agricultural crops, monitoring and biological control of pests, as well as ecological approaches in plant protection.

2. General description of scientific output

In the competition for the academic position of Associate Professor, Chief Assistant Professor Dr. Pavlin Vasilev applied with a total of **26 scientific works**, grouped as follows:

- **Scientific publications in the field of the specialty – 25 issues**, of which:
 - Publications related to the doctoral dissertation – 3 issues, which are not subject to review;
 - Publications with impact factor – 2;
 - Publications in peer-reviewed and referenced scientific journals – 16;
 - Publications in non-refereed journals – 4.
- **Published book** based on the defended doctoral dissertation – 1.

For the purposes of this opinion, **23 works** are subject to analysis.

Dr. Vasilev's personal contribution is evident from the authorship distribution: 3 are single-authored, in 10 he is the first author, in 8 he is the second author, and in 2 he appears as third or subsequent author.

The candidate fulfills the minimum requirements set by the Law on the Development of the Academic Staff in the Republic of Bulgaria (LDASRB) for the academic position of Associate Professor in professional field 6.2 Plant Protection, with a total of 648.6 points, exceeding the required 400. In two of the indicator groups, the scores are significantly above the minimum.

3. Evaluation of the candidate's teaching activity

Chief Assistant Professor Dr. Pavlin Vasilev has over 6 years and 8 months of teaching experience. During this period, his total teaching load, converted into practice hours, amounts to approximately 3,200 hours, averaging more than 500 hours per academic year.

He teaches the following courses in the Bachelor's and Master's programs: *General Entomology, Agricultural Crop Pests, Plant Quarantine, Pest Forecasting and Warning, and Biological Plant Protection*.

His teaching activity is complemented by the supervision of 20 successfully defended diploma theses.

4. Research activity

Dr. Vasilev's research work is oriented toward integrated plant protection, combining biological, agronomic, and chemical methods with modern forecasting approaches for effective pest management in agroecosystems.

His main research areas include:

- Species composition, distribution, and population dynamics of aphids (Hemiptera: Aphididae) on fruit and field crops;
- Evaluation of the efficacy of biological (microbial, botanical) and chemical plant protection products for pest control;
- Study of natural enemies (predators, parasitoids) in agroecosystems and their role in integrated pest management;
- Assessment of the susceptibility of fruit crop varieties to pest infestation and the influence of agroecological factors on entomofauna;
- Application of various models for predicting pest development, combined with accurate monitoring, to improve pest population management.

The main scientific contributions of Dr. Vasilev can be classified into six principal research areas:

- Study of the efficacy of new biological and chemical insecticides against various aphid species on fruit crops. It has been proven that the products *Naturalis* (*Beauveria bassiana*) and *Pyrethrum* are highly effective and suitable for use in organic farming.
- Investigation of the effect of immunostimulants and foliar fertilizers on aphid populations. *Panatechnology* products showed a limited but real reducing effect, while the foliar fertilizer *Citromazinc* demonstrated nearly 100% efficacy against *Aphis spiraecola*.
- Determination of species composition and distribution of aphids (Hemiptera: Aphididae) and aphidophagous species on different crops and regions in Bulgaria. For the first time, the aphid *Rhopalosiphum rufiabdominale* was recorded on wheat, and a beneficial predatory bug *Perillus bioculatus* was reported in the region of Plovdiv.
- Testing of pheromone dispensers and forecasting models for monitoring and control of fruit moths on stone and pome fruit species. The effectiveness of *Isomate* dispensers for *Grapholita funebrana*, *G. molesta*, and *Anarsia lineatella* was confirmed, as well as the applicability of the *RIMpro-Cydia 3* model for predicting the first generation of the codling moth (*Cydia pomonella*);

- Assessment of the impact of climate change on the phenology of fruit crops and the development of major pests, outlining a possible trend toward the emergence of a third generation of *Cydia pomonella* in Southern Bulgaria;
- Confirmation of the positive effect of mulching on reducing pest density and increasing potato yield.

Dr. Vasilev's research achievements are both original and applied, contributing to the improvement of integrated and biological plant protection approaches in fruit growing and the reduction of chemical pesticide use.

Citations and referencing of scientific output

The significance of Dr. Pavlin Vasilev's scientific activity is confirmed by 18 citations, 14 of which are indexed in Scopus and Web of Science, and 4 in non-refereed journals.

Participation in research projects

Dr. Vasilev has participated in numerous **national and international scientific projects**, including *EcoStack*, *SCOOP*, and the National Program "Young Scientists and Postdoctoral Researchers".

He has also taken part in Erasmus+ teaching mobilities at the Universities of Belgrade, Tekirdağ, and Almería.

Dr. Vasilev's extensive experience, significant scientific contributions, and professional commitment clearly demonstrate his qualifications and competence for appointment to the academic position of Associate Professor.

5. Critical remarks and recommendations

I have no remarks or recommendations regarding the candidate's work.

6. Conclusion

Based on the analysis of the teaching, research, and applied scientific activities of the candidate, I conclude that Assistant Professor Dr. Pavlin Emilov Vasilev meets the requirements of the Law for the Development of the Academic Staff in the Republic of Bulgaria, its Implementing Regulations, and the Rules of the Agricultural University – Plovdiv for its application.

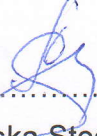
The submitted scientific works demonstrate Dr. Vasilev's excellent preparation and consistent research focus in the field of Plant Protection (6.2) and quantitatively fulfill the indicators required for the academic position of Associate Professor.

All of the above gives me reason to provide a **POSITIVE** evaluation of his overall activity.

I propose to the honorable Scientific Jury to also vote positively, and the Faculty Council of the Faculty of Plant Protection and Agroecology at the Agricultural University – Plovdiv to elect Chief Assistant Professor Dr. Pavlin Emilov Vasilev as Associate Professor in professional field 6.2. Plant Protection, scientific specialty "Plant Protection."

Date: 12.11.2025

Plovdiv

Member of the Scientific jury: 

(Assoc. Prof. Atanaska Stoeva)