# STATMENT

# by assoc. prof. DSc Lyuben Vladimirov Vitanov,

member of the scientific Committee, determined by order № RD 38-4 / 04.01.2022 of the Rector of Sofia University "St. Kliment Ohridski" in connection with a competition for the academic position of "Associate Professor" in the professional field 1.3. Pedagogy of training in... (Pedagogy of

training in information technology in primary school), announced in SG, issue 96 of 19.11.2021,

with a single candidate Ch. Assistant Professor PhD. Ivan Nikolaev Dushkov,

# 1. Evaluation of the procedure

The submitted documentation for the competition is very complete and prepared in accordance with the requirements of LDACRB (Law on the development of the academical composition in the republic of Bulgaria), the Regulations for its implementation, as well as the Regulations of Sofia University "St. Kliment Ohridski".

It is evident from it that all procedures of the competition have been strictly observed. I do not find procedural violations. The documentation allows for an objective and complete assessment in accordance with the requirements of the LDACRB (Law on Development of the Academic composition in the Republic of Bulgaria) and the Regulations for its implementation, as well as the Regulations of Sofia University and FEDA (Faculty of Educational studies and the arts).

# 2. General presentation of the candidate

Ivan Dushkov graduated from 7th"Seven Saints" High School with advanced study of mathematics. He obtained a bachelor's degree in applied mathematics and a master's degree in "Mathematical Modelling and Application of Mathematics" at the Faculty of Mathematics at Sofia University "St. Kliment Ohridski". He has successfully completed a postgraduate qualification for acquiring a teaching certification in mathematics and informatics.

Ivan Dushkov works as a teacher of mathematics and informatics at the 8th "Vasil Levski" High School. Since 2006 he has been an assistant at the Department of Early Education and Primary School Pedagogy at the FEDA.

In his work he gives lectures and conducts exercises as an assistant, senior and chief assistant related to modern information technology, information technology and data processing and analysis, etc. Since 2015 he has been a doctor of pedagogy with a dissertation on "Integration of information and communication technologies in the teaching of mathematics in primary school."

He shows professionalism in his work, is a scientific supervisor of PGQ (Postgraduate qualification) programs, successfully manages diploma theses. He is a member of the Faculty Council of FEDA. Ivan Dushkov administers the MOODLE platform for FEDA.

## 3. Presentation of the scientific production of the candidate

The scientific production of Ch. Assistant Professor Dr. Ivan Nikolaev Dushkov includes 28 publications: 1 monograph, 1 book, 2 textbooks, 2 workbooks, 1 study in a scientific journal, 21 articles in scientific journals and conference proceedings.

He participated in the competition with 1 monograph - habilitation thesis, 1 book based on a defended dissertation for the award of educational and scientific degree "Doctor", 3 articles in scientific journals, referenced and indexed in world-famous databases of scientific information, 16 articles and reports in unrefereed journals with scientific review or in edited collective volumes and 1 study in a scientific publication, referenced and indexed in world-famous databases of scientific information.

They are sufficient to cover the minimum scientometric indicators required to hold the academic position of associate professor, as follows:

Groups of indicators	Ivan Dushkov
Number of points	
Indicator group A Indicator group B Indicator group D Indicator group E	50 out of 50 100 out of 100 223 out of 200 55 out of 50
Total number of points	428 out of 400 required

Ivan Dushkov's publications correspond to the topic of the competition. The candidate's monograph "Multimedia presentations - mistakes, omissions and guidelines for overcoming them in future primary school teachers" is an in-depth study of the theory and practice of creating educational multimedia presentations. The main problems are outlined, important rules are structured for creating effective presentations and overcoming frequent content and methodological errors and omissions.

The book "Integration of information and communication technologies in the teaching of geometry in primary school" examines the integration of information and communication technologies in the study of geometric content in mathematics in primary school. The author structures and tests a wide range of multimedia presentations for effective teaching of learning content in the initial stage of learning.

In the presented studies and articles various and significant topics and methodological problems are considered, analysed and researched. Both traditional and innovative pedagogical approaches related to the teaching of mathematics in primary school are very well considered.

Many important and useful studies are described in publications related to the methodology of computer modelling in primary school. The well-organised research, structured problems and methodological orientations in this new methodology of teaching in primary school are impressive.

In the third group of articles Ivan Dushkov submits excellently developed and presented mathematical models of real processes, which is a good basis for creating criteria that reflects the specifics of the studied objects and processes.

#### 4. Contributions of the candidate

I fully accept the described contributions of the candidate at the scientific and methodological level.

*First*: successful research, structuring and approbation of methods and techniques in teaching mathematics in primary school age. Implementation of an innovative approach related to the integration of educational multimedia as a means of improving student learning outcomes, structuring multimedia learning and integrating multimedia in the learning process, the benefits and disadvantages of integrating information and communication technologies in education.

*Second*: creation of a system of criteria for improvement of used multimedia didactic materials in teaching, developed and tested author's set of teaching multimedia presentations integrated in teaching mathematics in primary school related to entertaining tasks, developed a system of criteria for comparative analysis of teaching content related to the subject Computer modelling in primary school, as well as tested models and analysis of results obtained in the teaching of mathematics in primary school.

*Third*: e-courses have been developed for students of pedagogical specialties in the Moodle system, as well as new university courses in various disciplines related to information technology.

# 5. The teaching and research activity of the candidate

Ivan Dushkov significantly exceeds the required employment for the period of the previous five school years. He successfully conducts lectures and exercises in compulsory and elective subjects

with both bachelors and master students. These include various disciplines such as "Information and communication technologies in teaching and working in the digital environment", "Audiovisual and information technologies", "Mathematical and statistical methods in physical education and sports", "Pedagogical statistics", "Data processing and analysis in social research", "Web design for pedagogical purposes", "Digital competence and digital creativity".

Ivan Dushkov conducts active research work on projects. He participates in 14 scientific projects, many of which have scientific and methodological contributions, which show Dushkov's contribution to the work on this project.

#### Conclusion

All this gives me reason to believe that Ch. Assistant Professor PhD. Ivan Nikolaev Dushkov has a variety of competencies and extensive professional experience in the methodology of training in information technology in the early stage of primary education.

This gives me reason to give a positive conclusion and propose to the members of the Scientific Committee to support this candidacy and propose to the Faculty Council of the Faculty of Science, Education and Arts at Sofia University "St. Cl. Ohridski" to elect Ch. Assistant Professor PhD Ivan Nikolaev Dushkov for "Associate Professor" in pedagogy of information technology education in primary school.

Sofia, February 14, 2022.

Prepared the opinion: (assoc. prof. DSc Lyuben Vitanov)