

TO THE CHAIR OF THE SCIENTIFIC JURY,  
APPOINTED BY ORDER No. P109-274/ June 20, 2025  
BY THE RECTOR OF THE MEDICAL UNIVERSITY – VARNA

**OPINION**

by **Assoc. Prof. Dr. Radoslav Slavchev Todorov, MD – external member,**  
MU-Sofia, Faculty of Medicine, Department of General and Operative Surgery,  
Alexandrovska University Hospital, Clinic of General and Hepato-Pancreatic  
Surgery

appointed by Order No. P109-151/March 26, 2026 of the Rector of MU-Varna

he body's immunological, hematological, hemodynamic, and hormonal functions.  
“Hidden” deep in the upper left abdominal quadrant, it is less frequently affected

20th century, the term “leukocytemia” was used to describe malignant

d, supported by evidence of the spleen's important immunological role.

2 The future is expected to offer new therapeutic alternatives that will reduce the need for splenectomy, as well as a deeper understanding of the biological function of this organ. All of this makes the topic of Dr. Vladislav Velikov's dissertation, “SURGICAL DISEASES OF THE SPLEEN,” exceptionally relevant and useful.

The study included in the dissertation was conducted as a retrospective study with a prospective component in the form of postoperative follow-up. A retrospective cohort study was conducted over a 15-year period, for which 117 patients who underwent surgical intervention—splenectomy—due to various spleen diseases were selected.

Within the framework of the study, the author examines in detail various preoperative indicators:

**1/ Demographic characteristics of the patients.** The author describes and examines in detail various groups of demographic factors, such as gender, age, and age distribution by gender.

**2/ Examination and distribution of patients according to the primary diagnosis**

**(disease) that led to the need for surgical intervention**—Dr. Velikov compares this factor with the distribution by gender and age of patients.

3/ **Various indicators and symptoms of the physical status related to splenic diseases are examined in detail**—the author thoroughly investigates these anamnestic and physical indicators and includes them in his subsequent statistical evaluation.

4/ **The laboratory and microbiological analysis** of various samples relevant to the detailed study of spleen diseases **is well-covered**.

5/ **The various imaging methods** that are relevant to establishing an accurate diagnosis of splenic disease and aid in the decision to proceed with surgical treatment **are examined in detail**.

6/ **The surgical techniques and methods** used in surgical treatment **are described in detail**, and the postoperative pathological findings have been thoroughly examined.

7/ The study extensively covers **investigations into comorbidities**, linking them to the factor of **“dependence on intensive care”** following surgery.

8/ Cases **involving hemoperitoneum** are examined and presented in a separate section, highlighting concepts such as emergency laparotomy based on these criteria.

9/ **Survival and mortality** rates were examined for all patients and presented in detail using descriptive tables and Kaplan-Meier curves.

10/ The dissertation examines in detail **the length of hospital stay**, which is linked to **the underlying cause of the disease**, with patients divided into diagnostic groups.

11/ **Blood test values**, such as hemoglobin levels, white blood cell count, and white blood cell differential, are also analyzed.

The dissertation extensively covers the statistical analysis of the retrospective cohort under study. Descriptive and correlation analyses are employed. SPSS version 26.0 software was used for statistical data processing.

#### 1/ Descriptive Analysis

Descriptive methods are used to identify central tendencies, the degree of variation among individual observation units (patients), and the degree of deviation of the empirical distributions of the observed units from standard distributions. Different methods are applied for each individual group of characteristics. Measures of central tendency (mode, median) are used to identify central trends; measures of dispersion (variance, standard deviation) are used to identify differences between units; and measures of deviation from reference distributions (skewness coefficient, kurtosis coefficient) are used to identify deviations from reference distributions. The graphical representation of the empirical distribution is an essential part of descriptive statistical methodology.

#### Correlation Analysis

Correlation analysis is a statistical method that measures the strength and direction of the correlation between two or more phenomena.

The dissertation applies Brave's parametric correlation coefficient, the nonparametric contingency correlation coefficient, and the nonparametric Eta coefficient, which is specific to the particular case of a relationship between an interval-scaled and a nominal-scaled variable.

The dissertation comprises a total of 139 pages and is illustrated with 40 diagrams, 18 figures and 81 tables. The bibliography includes 288 titles, of which 4 are in Cyrillic and 284 in Latin script.

The aim of the dissertation is well-formulated and structured. The tasks set have been fully accomplished and correspond to the parameters specified in the aim. In the "Discussion" section, Dr. Velikov analyzes his results by comparing them with those presented in the contemporary literature, demonstrating fully comparable and consistent results. The limiting factors and the scope of the study are clearly presented, which makes the dissertation objective.

Dr. Velikov's dissertation is supported by an in-depth, focused, and logically sound statistical analysis. The statistical methods used for the purposes of the study are:

- Descriptive statistics—means, standard deviations, range, and degree of balance in the sample.
- Percentage ratios and distributions.
- Correlation analysis.
- Descriptive analysis

All statistical analyses were performed at a 95% confidence interval.

ntive measures against infectious and thrombotic complications is crucial for optimal outcomes across a wide spectrum of conditions—from trauma and

ed in isolation but as part of a comprehensive treatment process aimed at optimizing the patient's short- and long-term outcomes.

Currently, laparoscopic and robotic surgical interventions are playing an increasingly established role in the treatment of splenic diseases, providing lower surgical trauma, faster recovery, and comparable therapeutic efficacy in selected patients.

As a result of the well-structured and well-supported conclusion, Dr. Velikov draws five conclusions with which I fully agree.

The dissertation concludes with five contributions, which are well-supported and logically derived as consequences of the research process. As a result of Dr.

Velikov's study, a "Standardized Algorithm for Management Applicable to Patients with Spleen Diseases" has been developed.

The three publications cited, preceding the completion and defense of the dissertation, in which Dr. V. Velikov is the lead author, have been verified.

Dr. Vladislav Krasimirov Velikov's dissertation is well-organized and illustrated. It reads very smoothly. It is stylistically consistent and free of spelling errors.

Having familiarized myself in detail with the dissertation of Dr. Vladislav Krasimirov Velikov, I believe that the work is worthy of a dissertation, innovative, and will be of use to surgeons across the country in their daily work. The author possesses indisputable qualities, proven in his daily surgical practice at a leading medical institution; therefore, I take the liberty of recommending to the esteemed members of the academic jury that they approve it and award Dr. Vladislav Krasimirov Velikov the academic and scientific degree of "Doctor."

Sofia, May 17, 2026

Assoc. Prof. R. Todorov, M.D.

Заличено на основание чл. 5,  
§1, б. „В“ от Регламент (ЕС)  
2016/679