

## Review

by Prof. Ivan Tomov Gruev, MD, PhD

Deputy Director of Medical Activity, NCTB "Tsar Boris III" -Sofia

**In connection with a competition for the academic position of "ASSOCIATED ASSOCIATE" in the field of higher education 7. Health and sports, professional field 7.1. MEDICINE, scientific specialty CARDIOLOGY for the needs of the Cardiology Clinic of Acibadem City Clinic UMBAL Tokuda EAD, announced in SG No. 27 of 02.04.2021.**

I have been appointed a member of a scientific jury with order №243 / 01.06.2021, of the executive director of Acibadem City Clinic Tokuda Hospital EAD.

In connection with the material submitted to me for review, I declare that I have no conflict of interest and do not establish evidence of plagiarism.

The only candidate is Dr. Valeri Lyubenov Gelev dm.

Dr. Valeri Gelev graduated from the English High School and MU-Sofia. He has acquired specialties in internal medicine - 1995, cardiology - 2000 and invasive cardiology - 2003. In 2016 he completed a master's degree in health management, and in 2021 he obtained a scientific and educational degree "Doctor". He has international specializations in invasive cardiology in France, the United States and Russia.

Professional path: started as a district doctor in Kostenets, cardiologist at UBALSM "Pirogov", invasive cardiologist at NKB, head of the department of invasive cardiology UBALSM "Pirogov" and from 2013 deputy. Head of Acibadem City Clinic Cardiology Clinic Tokuda Hospital

Positions held: Member of DKB - member of the Board since 2020, the European Society of Cardiology, the European Club of Chronic Occlusions, the Bulgarian Society of Invasive Cardiology - 2 terms chairman-2015-2019, director of BBC, member of the expert council on cardiology at the Ministry of Health.

A total of 90 scientific papers were presented in the competition: one dissertation for obtaining the educational and scientific degree "Doctor", 72 scientific publications and 17 scientific communications (Table I). The publications are described in a list presented under №12 of the mandatory documents for participation in the competition.

Table I. Types of scientific works.

Total number	71
Dissertation for PhD	1
Articles in Bulgarian and international journals	68
• Articles in Bulgarian magazines	32
• Articles in international journals (total number):	36
• with impact factor	31
• total impact factor фактор	

	536.350
Co-authorship in monographs	2
• First author	• 18 от 85 (21.18%)
• Second author	• 23 от 66 (27.06%)
• Third and subsequent author	• 27 от 67 (51.76%)
Co - authorship in textbooks	1
Total number of citations	3749

The scientific works of Dr. Gelev can be grouped in the following sections:

### **1. Recanalization of Chronic Coronary Occlusions**

Scientific publications in the field of chronic coronary occlusions are related to the epidemiology of this type of coronary lesions, anatomical features, as well as indications and techniques for interventional revascularization. Several reviews on the subject have been published, which trace over time the trends and progress in this rapidly evolving part of interventional cardiology. The location and importance of retrograde access for recanalization of chronic coronary occlusions are discussed in detail. The relatively new methodology used is key to significantly improving procedural success in these complex coronary interventions.

In the dissertation, for the first time in Bulgaria, the place and importance of the retrograde approach for the successful recanalization of the chronic coronary occlusions is considered.

The author also participates in publications that examine various aspects and trends in the recanalization of chronic occlusions, by analyzing the data of the world's largest register of chronic coronary occlusions - European Registry of Chronic Total Occlusion, built by members of the European Club for Chronic occlusions. The European Chronic Occlusion Club has initiated, successfully conducted and published the world's first randomized study comparing the effectiveness of interventional treatment versus drug therapy in patients with chronic coronary occlusion.

### **2. Percutaneous interventions in stem stenosis**

With the advancement of technology, the introduction of more effective, safe and affordable drug-emitting stents, intravascular imaging techniques, as well as the development of techniques in invasive cardiology, interventional revascularization of the trunk of the left coronary artery has become very effective and safe, recommended by all guidelines as an alternative to the current "gold standard" - coronary surgery. Due to the great interest and the existing unresolved issues, this topic is very relevant.

### **3. Trans radial access in invasive coronary procedures**

In recent years, the trans radial approach to conducting diagnostic and interventional procedures has established itself as leading and preferred due to its many advantages. Leading is the practical absence of complications associated with access, especially significant bleeding, which is significantly higher in traditional trans femoral access. It is well known that significant bleeding is associated with an unfavorable prognosis in patients, especially in emergencies. Another significant advantage of this access is the ability to immediately move and verticalize patients, which is especially important for their comfort and makes it a preferred access for both patients and medical staff.

As a member of the team that introduced trans radial access in Bulgaria, the author participates in publications that analyze the experience and results of the first procedures performed in Bulgaria with this access.

Dr. Gelev is a co-author of a chapter in a manual on invasive cardiology, which discusses the advantages and features of trans radial access, its use in specific cases, as well as behavior in anatomical features and complications.

He has also participated in a prospective, multicenter, international study on the benefits of different types of diagnostic catheters used with trans radial access.

The object of publications and scientific communications is the experience gained in performing complex coronary procedures, such as bifurcation lesions, chronic coronary occlusions, etc., through trans radial access.

#### **4. Complex coronary interventions**

Due to the advanced age of the population, we are increasingly faced with the challenge of treating patients with very complex coronary anatomy who are at high risk due to severe comorbidities. For the majority of these patients, surgical revascularization is unacceptable, either because of the very high operative risk or because of the patients' unwillingness to undergo surgery. This section includes scientific publications dealing with the problems of treatment of high-risk patients with complex coronary artery lesions.

The significance and behavior in the presence of massive coronary calcification, as well as global trends in the treatment of this type of lesion are considered. The place of rotational atherectomy in the treatment of calcium lesions is also considered, as well as the analysis of own results in the treatment of patients with rotablation.

Publications and numerous reports on the interventional treatment of complex coronary interventions are presented, which are of significant scientific and applied nature.

#### **5. Miscellaneous**

- Publications in which the experience of endovascular treatment of lesions of the upper and lower extremities is shared.
- Publications for endovascular treatment of visceral organs in life-threatening conditions in gastroenterology and urology.
- An overview of the manifestation of arrhythmias in patients with COVID-19 indicates the mechanisms of arrhythmogenesis and discusses the different types of arrhythmias in terms of therapeutic behavior in a pandemic. The role of antiviral drugs as proarrhythmogenic factors is discussed in detail and practical guidelines for prevention of proarrhythmia are indicated.
- A number of reviews have addressed the issues of modern treatment of acute coronary syndrome, heart failure, treatment of hypertension.
- A number of publications discuss current drug therapy for various heart diseases.

**In conclusion:** in the competition Dr. Valeri Gelev, PhD presents himself as a graduate with extensive medical, research and teaching experience. He has a recognized specialty in internal medicine, cardiology and a certificate in invasive cardiology, many additional qualifications, has defended a dissertation and has significant scientific output.

He is a leading expert in the field of invasive cardiology with an affinity for the therapy of complex and complex lesions. His scientific production fully meets the requirements of the Law on the Development of Academic Staff, as well as the Regulations for the development of the academic staff at Acibadem City Clinic UMBAL Tokuda EAD for the award of the academic position "Associated Professor".

On these grounds, I propose to the esteemed members of the Scientific Jury to vote positively and propose Dr. Valeri Lyubenov Gelev, PhD to take the academic position of "Associated Professor" in the scientific specialty Cardiology, for the needs of the Clinic of Cardiology of Acibadem City Clinic University Hospital Tokuda EAD.

26.07.2021  
Sofia

Prof. Dr. Ivan Tomov Gruev, PhD.