

STATEMENT OF PURPOSE

By Prof. Dr Ivan Kostov, PhD, DMSc

Regarding

Contest for receiving the academic title “Docent” (Associate Professor) in higher education area 7. “Healthcare and sport” in occupational health 7.1. Medicine and scientific specialisation “Surgery”, based on order for scientific jury No. RD-26-1168/05.05.2021.

One candidate is participating in the contest - **Dr Konstantin Ivanov Kostov, PhD** - a surgeon in the Surgery Clinic, UMHATEM “N. I. Pirogov” EAD. The documents and materials presented by the candidate meet the requirements of the Law for the Development of Academic Staff in the Republic of Bulgaria, the Regulations for its application and the Rules for the Development of Academic Make-Up of UMHATEM “N. I. Pirogov” EAD.

1. Professional biography

Dr Konstantin Ivanov Kostov, PhD was born on 19.03.1978. He completed a Master’s degree in medicine in 2002 at MU-Sofia. He specialised “Surgery” in UMHATEM “N. I. Pirogov” and since 2008 is with recognised speciality in “Surgery”. Between 02.11.2010 and 02.02.2012 he studied and obtained a second master’s degree, specialising in “Public health and health management” at the Faculty of Public Health - Medical University - Sofia. Between 15.10.2012 and 1.11.2016 he worked as an assistant professor at the Department of

General, Visceral and Urgent Surgery of UMHATEM “N. I. Pirogov”. On 14.07.2014 he completed an educational course and gained a certificate from Military Medical Academy for a qualification for highly specialised work - “Laparoscopic cholecystectomy and laparoscopic operations in emergency surgery”.

On 7.11.2017 he defended a PhD thesis (doctoral dissertation) on the subject of “Contemporary trends in the treatment of colon trauma” and acquired the educational and scientific title “Doctor” in “General surgery”.

At the time of submitting the documents for the contest Dr Konstantin Ivanov Kostov had 18 years of work experience in surgery.

2. Research activity and publication activity

For the contest the candidate has presented 32 publications - articles in international and Bulgarian journals, referenced and indexed in world-renown databases for scientific information and publications in Bulgarian issues with scientific reviewing. The scientific-metric indicators are assigned as follows:

Indicator Group A: includes defended PhD thesis covering 50 p.

Indicator Group C: for this indicator group, Dr Konstantin Kostov presents 10 referenced articles worth a total of 390 p., which exceeds the minimal amount of 100 points required as per national criteria.

Indicator Group D: Dr Konstantin Kostov presents 32 publications. The mandatory minimum of 25 publications has been exceeded - the total number of publications presented in the

contest (32) is worth 1020 points, the necessary number according to the indicator table accepted by the academic council of UMHATEM “N. I. Pirogov” EAD being 750.

In this indicator group, according to the national minimum requirements, Dr K. Kostov has 230.6 points, which exceeds the mandatory minimum of 200 points.

Indicator Group E: 10 citations in Bulgarian journals are presented (50 points).

References have been presented for the respective citations.

Indicator Group F: Dr Kostov exceeds the requirements by presenting 40 points for specialisation obtained and a reference from Scientific Activities and Postgraduate Qualification Department for completed training of specialising physicians. Official notices for participation in projects and in training of specialising physicians have been presented, as well as a diploma for recognised speciality.

Indicator Group G: Presented are 5 publications in scientific issues with an impact factor (in all of them as first author), meeting the requirements for the UMHATEM “N. I. Pirogov” EAD norm of 5 points.

Dr Konstantin Ivanov Kostov meets and exceeds the minimal national requirements, as well as the criteria accepted by the Scientific Council of UMHATEM “N. I. Pirogov” EAD and exceeds the national criteria.

3. Main scientific and scientifically applied contributions

The defended PhD thesis on the topic of “Contemporary trends in the treatment of colon trauma” presents a thorough review of contemporary literature regarding the trauma damage to the colon, a serious surgical issue for which there is no unified standpoint on the choice of surgical-therapeutic approach. Collected, reserved and structured for statistical processing are data from a pool of patients with trauma colon damage. When compared with the predominant data in literature, this presents quantitatively and qualitatively significant material characterising the issue. A general characterisation profile of those injured with trauma colon damage has been developed and presented. A thorough analytical study was conducted on different signs characterising trauma damage, determining their differential parameters and frequency. Based on these studies, the following have been determined to be the most important groups of signs: spread of the general trauma within the body; localisation of the trauma damage to the colon; time intervals from trauma to hospitalisation and from hospitalisation to surgery; degree of trauma damage according to penetration and largeness. The significance of local signs characterising colon trauma damage and the total physiological disintegration as a result of the studied phenomenon have been analysed and groups have been determined with gradual overall weight of the damage. Presented are the links between the manifestation of the different signs characterising the groups and the choice of operative approach. The frequency of complications and lethality depending on the manifestation of the different signs have been traced in detail, combined with the choice of operative approach. A rational, clinically applicable algorithm is proposed, determining the surgical tactic for achieving a timely and correct diagnosis. The local and general characteristics and degree of trauma colon damage is determined. A standardised and well-founded choice of surgical approach is presented.

The diagnostic and therapeutic algorithms have been synthesised and optimised from articles and reports in collections and journals included in the national referential list, and publications in journals referenced in international databases, with the aim of improving postoperative results and reducing postoperative complications and lethality.

The scientific interests of the candidate are in the area of contemporary methods of surgical treatment, profiled in:

- **Colon trauma damage**
- **Piercing abdominal trauma**
- **Laparoscopic treatment in perforated peptic ulcer**
- **Abilities of emergency laparoscopy in acute non-trauma abdomen**
- **Laparoscopic treatment in acute appendicitis and acute cholecystitis**
- **Choice of therapeutic approach in intra-abdominal abscesses**
- **Small intestinal and mesenteric damage from non-piercing abdominal trauma**
- **Clinical and pathological signs in large intestinal ileus. Staging.**
- **Treatment of acute mesenteric venous thrombosis**
- **Coloproctology**
- **Acute peritonitis**
- **Choice of surgical approach in post-operative abdominal adhesions**
- **Surgical treatment and results in haemorrhoidectomy**

4. Conclusion

The scientific works presented by Dr Konstantin Ivanov Kostov, PhD, which have been published in prestigious Bulgarian and international scientific journals, the defended PhD thesis, the amount of citations and the other quantitative scientifically-metric indicators fulfil and exceed the requirements for holding the academic title of “Docent” listed in the Law for the Development of Academic Staff in the Republic of Bulgaria and the Regulations of UMHATEM “N. I. Pirogov” EAD. This, as well as his scientific and teaching work, his acknowledgements and his authority in the professional field of the speciality “Surgery” are grounds for me to confidently recommend to the esteemed scientific jury that they support Dr Kostov’s candidacy to be chosen for the academic position “Docent” in the scientific speciality “Surgery”.

25.05.2021

Sofia city

Signature:.....

(Prof. Ivan Kostov, PhD)