STATEMENT OF OPINION

From: Prof. Todorka Ignatova Kostadinova, Ph.D., Director, "International Relations, Accreditation and Quality" Directorate, at the Medical University - Varna, Professor in the professional field "3.7 Administration and Management" at the Faculty of Public Health, 55 Marin Drinov Str., Varna 9002, tel. 052 677089, mobile tel.: 0889588408, e-mail: kostadinova@mu-varna.bg,

member of a scientific jury according to Rector's Order № P-109-173 from 23.04.2021.

Regarding a competition for the academic position "Professor" in the field of higher education 3. Social, Economic and Legal Sciences ", professional field" 3.7 Administration and Management ", in the scientific specialty" Organization and Management Outside the Sphere of Material Production" at MU-Varna, at the Medical College - Varna, Training Sector (TS) "Assistant Pharmacist", published in the State Gazette, issue 17/26.02.2021 according to Order P-109-173 from 23.04.2021 of the Rector of the Medical University - Varna.

One candidate applied and was admitted to the competition - Assoc. Prof. Antoaneta Zdravkova Tsvetkova, Ph.D. All necessary documents are presented according to the requirements of the Law for development of the academic staff in Bulgaria, the Regulations for application of the Law for development of the academic staff in Bulgaria, the Regulations for development of the academic staff of Medical University - Varna and the announced conditions of the competition.

Biographical data

Associate Professor Antoaneta Zdravkova Tsvetkova, PhD was born in 1971. She is a graduate of "V. Levski" Secondary School in Shumen. In 1992 she successfully graduated from the Medical College with a professional Bachelor's degree "Assistant Pharmacist". In 2008 she acquired a Master's degree in Health Management at MU-Varna, and in 2021 she has also obtained a Master's degree as a "Health Technology Expert" at MU-Sofia. Her research interests are realized in the process of developing her dissertation, which she successfully defended in 2015. The topic of the dissertation was: "Social and

pharmacoeconomic aspects of the use of over-the-counter drugs". Over the years, Assoc. Prof. Tsvetkova has been working systematically and sustainably in the field of pharmacy, health management and evaluation of health technologies, both in practical, teaching and research aspects. She has over twenty years of experience in various pharmacy structures - hospital pharmacy, pharmacy, pharmacy warehouse. In each stage of her work Assoc. Prof. Tsvetkova consistently upgrades and combines her professional development with a successful academic career: in the period 2010 - 2021 she holds the positions of Assistant, Associate professor, Head of the training sector "Assistant Pharmacist" and currently she is a Director of the Medical College - Varna. Assoc. Prof. Antoaneta Tsvetkova has the necessary education, specializations and specialized courses such as Master's Assessment of Health Technologies with Pharmacoeconomics, Professional Department of Pharmacy, Faculty of Pharmacy at the Medical University - Sofia; Master's degree in Health Management, Faculty of Public Health at the Medical University - Varna; Doctor of Economics in the field of higher education 3. Social, economic and legal sciences, professional field 3.7. Administration and management, specialty "Organization and management outside the field of material production" since 2015. Assoc. Prof. Tsvetkova has a wide range of professional knowledge and competencies, which she maintains and upgrades with various trainings in Bulgaria and abroad, some of which are: "Hospital pharmacy and pharmacoeconomics" 2019; "Big data - information retrieval and analysis" 2018. ISPOR Bulgarian Chapter and Bulgarian Scientific Society of Pharmacy; "Pricing Reimbursement" "Health and and Technology Assessment" 2015; "Pharmacoeconomics and clinical epidemiology with biostatistics".

The practical experience of Assoc. Prof. Tsvetkova began as a pharmacist at the Naval Hospital - Varna; she worked as a dealer in the hospital market sales at the Sanita Trading warehouse, and in various pharmacies (Medicus, Galantus). This contributes to the acquisition of valuable experience, knowledge, skills and competencies in the pharmaceutical sector, in wholesale and retail trade in medicines, food supplements and medical devices, in the field of social pharmacy and economics, which make it a valuable and sought-after lecturer and expert in this area.

Assoc. Prof. Tsvetkova successfully and constructively applies her professional and managerial competencies and skills in the process of her career development as an Assistant and Associate professor, as an expert in Bulgarian and international research teams, as chairman and member of municipal commissions of the Municipality of Varna: since 2015 she is a Municipal councilor, Chairman of the PC "Healthcare", since 2019 is Chairman of the PC "Science and Education" at the Municipal Council - Varna; she participates as a member

of a number of permanent and temporary commissions, member of the Advisory Council on HIV/AIDS Prevention at the Municipal Council - Varna and the General Meeting of Shareholders of MHAT "St. Anna - Varna" as a representative of the Municipality of Varna. In the period 2017-2019 she participated as an expert in working committees for health technology assessment at the National Center for Public Health and Analysis - Sofia.

The balanced combination of her practical work and managerial experience over the years builds a sustainable basis for the development of research, pedagogical and expert qualities of Assoc. Prof. Tsvetkova. Knowledge of foreign languages (English and Russian) helps her to communicate in an international environment, as well as in her work with foreign language scientific literature.

Evaluation of the research, teaching and administrative activity of Assoc. Prof. Antoaneta Tsvetkova, Ph.D.

From the academic reference of Assoc. Prof. Antoaneta Tsvetkova, Ph.D. regarding the publications, citations and scientific profiles of the scientometric indicators, it can be seen that the requirements for holding the academic position "Professor" are met.

Presented are: total number of articles - 84, for PhD - 4, for Associate professor - 61, for Professor - 20, two monographs, one book. Two publications with IF (IF 9,733), articles referenced and indexed in world-famous databases SJR 8, 36 - in international scientific journals, 34 - in Bulgarian, h-index 5. List of citations covering the minimum requirements for academic position "Professor" total number of points - 120 (100 required minimum).

According to indicators A, B, C, D:

- **A1.** Dissertation for the acquisition of educational and scientific degree "Doctor" on the topic: "Social and pharmacoeconomic aspects of the use of over-the-counter drugs", MU-Varna, 2015.
- **C3.** Habilitation work monograph. "Regional health policy assessment and opportunities for optimization. Promotion of policies of the Municipality of Varna related to the health of its residents for the period 2015-2019" (monograph). Varna: MU-Varna; 2021. 145 p. ISBN: 978-619-221-312-1.
- **D5.** Published book based on a defended dissertation thesis for the conferring of the educational and scientific degree "PhD" or Scientidic degree "Doctor of Science" on the topic: "OTC drugs market, aspects of use, user profile" dissertation book. Varna: MU-Varna; 2021, 186 p. ISBN: 978-619-221-311-4.

D6. Articles and reports published in scientific journals, referenced and indexed in world-famous databases with scientific information Articles and reports published in scientific journals, non-refereed journals with scientific review - 5 pcs

D7. Articles and reports published in non-refereed journals with scientific review or published in edited collective volumes – 10 pcs

Total number of points on these indicators - 205.33 with a required minimum of 200 points.

The distribution of scientific publications is as follows:

- 4 articles for the conferring of the educational and scientific degree "PhD";
- 61 articles for the academic possition "Associate professor";
- 19 articles under the current competition for the academic possition "Professor".

In addition, Assoc. Prof. Tsvetkova has participated in over 30 scientific fora: ten with full-text reports in Bulgarian scientific forums, 12 with international participation, 8 international. In the articles for the competition for Professor she is an independent author of 3 articles, first author of 6 articles, co-author of 6 articles. According to the attached reference, 5 of the publications are referenced in the Web of Science (WOS) and cover the requirements of MU-Varna for 200 points, 50 of which are from articles in scientific journals, referenced and indexed in world-famous databases. According to this indicator, the candidate meets the additional requirements of MU-Varna.

The publications that are referenced in WOS on the topic are dedicated to the screening, treatment and adherence to therapy for three socially significant diseases - breast cancer, depression and diabetes. In four of these publications, Assoc. Prof. Tsvetkova is the first author, which shows research responsibility and leading contribution to research. Publications in non-peer-reviewed journals complement the topics of research in the field of consent and adherence to therapy, pediatric patients - quality of life and prevention, use of over-the-counter drugs and marketing. Four more publications were presented to the competition for the use of over-the-counter drugs and the prevention of socially significant diseases, which are additional to the minimum national requirements.

The researches and scientific publications of Assoc. Prof. Antoaneta Tsvetkova are characterized by topicality and applicability in practice. They are developed in an academic style and show good awareness of modern scientific and practical issues. The scientific production corresponds to the research development of the candidate and satisfies the requirements of the Regulations to the Law on the Development of the Academic Staff in the

Republic of Bulgaria and the Regulations for Development of the Academic staff of the Medical University - Varna.

Summary of the applicant's contributions, grouped in the following areas:

Contributions in the field of Health Technology Assessment

- Current problems of modern health care are presented, for instance, the impact of new health technologies on the health care system and measures are defined to ensure patients' access to them by building appropriate mechanisms at the political level. Modern healthcare is driven by new technologies in all its aspects. They help doctors with the correct diagnosis, patients with medication, treatment and health care in general, introducing new methods of treatment that save money, time and improve the quality of life.
- A framework for municipal health policy has been developed based on a study of the impact of new technologies on socially significant diseases, such as diabetes, breast cancer and new medical devices.
- The issue of evaluation of health technologies as part of the state and municipal policy has been studied. It is proposed to involve the regional authorities in this process, which enriches the evaluation method, the involvement of stakeholders in this process and a new understanding in Bulgarian conditions.
- Studies have been conducted in the field of diabetes and cancer of the mammary gland in the Municipality of Varna, drawing conclusions about the incidence of the diseases, the drug use and the costs paid by the Regional Health Insurance Fund.

Scientific papers in this field according to the attached reference are № D6-3, D6-4, D7-9.

Contributions in the field of "Management and Development of Pharmaceutical Care"

- It is known that the pharmacists' knowledge and skills are necessary for the analysis and assessment of the decisions efficiency at macro level, influencing the patient in the field of pharmacy as part of the health care. The FIP concept of "Pharmaceutical care" has been confirmed as ever more important for the better treatment of the Bulgarian patient, which along with the improvement of life quality and duration has a favourable effect on the health budget, saving considerable costs.

- It has been proved that pharmaceutical care can reduce both the number of errors and the costs incurred as a result. The leading role of the pharmacists in ensuring the patients' safety at individual level as well as at organizational and political level. The safety of drug therapy constitutes a global problem and many countries place it on top of their national healthcare priorities.

Scientific work in this field according to the attached references: №№ D6-1,2; D7-1,2; D7-4.

Contributions in the field of "Marketing of the OTC Medical Products"

- The general tendencies in the pharmaceutical sector are analyzed and established, which reflect both the changes in the market of the pharmaceutical product and the profile of the consumer. The more significant characteristics of the changing status and profile of the modern consumer in conditions of competitive market environment in the drug supply and drug service in our country are outlined.
- It was found that the growth of the global market of OTC, functional foods and nutritional supplements is also due to increasing awareness of preventive health care in the daily lives of modern consumers, as greater consumption of this category of products is accompanied by easy access to OTC products.
- Socio-medical, economic and organizational factors for the use of OTC are derived. It
 was pointed out that advertising in all its forms, in the process of realization of OTC
 products and the volume of sales are important.
- Characteristics of OTC users are presented to help managers of pharmacies, pharmacy warehouses, pharmaceutical agencies to develop advertising and promotional campaigns for OTC products.
- Certain differences are outlined in patients' attitudes towards self-medication and the demographic characteristics of patients compared to OTC users in other EU countries.
- An algorithm has been developed of therapeutic behavior in patients with chronic noncommunicable disease (AR) dissection analysis, through which it is possible to achieve control in properly selected OTC AH and to lead to savings for patients and health and insurance institutions.

Scientific work in this field according to the attached references: №№ D5; D7-3; D7-5; D7-10; additional articles- 2.

Contributions in the field "Analysis of the Health System and the Regional Health Policy"

- It has been found that there is no methodological framework through which the evidence for the health effects of various environmental factors can be clearly formulated and examined. The problem in the implementation of municipal policies has been identified the lack of national methodology for assessing the impact of public policies on health.
- An analysis of the legislative frame in the field of healthcare at national and local level has been carried out in accordance with the EU directives in the field of decentralization of the activities of the central government, regulating the rights and liabilities of local authorities. Conclusions, analyzes and recommendations are made on the basis of direct research for the period 2015-2019 in accordance with the real activity and the results of the social, preventive, health projects, planned and conducted by the author.
- The analysis of health policies and their results are beneficial not only for the Municipality of Varna, but also for other municipalities, taking into accout the fact that the tasks, funding mechanisms and national programs discussed in the research papers are the same and that all of them are subordinated to the unified health strategy of the Republic of Bulgaria synchronized with that of the European Union. The idea that prevention programs are a mechanism for improving access to health services is confirmed.
- On the basis of the analysis and evaluation, concrete proposals have been proposed and the author's ideas for improving the reform are defended: improvement of the health culture of the population through cooperation between the local government and the universities on the territory of the city and the more active participation of the citizens would lead to an increase of its health status; adoption and approval of methods for evaluation of the work done so far by the local government in the function "Healthcare", for correct reporting of the results, for outlining the trends and determining the future actions; establishment of a systematic approach to conducting preventive health programs as part of the Regional Health Policy; at local level, adoption of an integrated approach to the prevention of non-communicable diseases and the deepening of the health inequalities; improvement of the interaction and coordination between the municipalities and the bodies of the Ministry of Health through new mechanisms.

Scientific work in this field according to the attached references: №№ C.3, D6-4, D6-5, D7-7, D7-8, additional article-3.

Indicator F:

Assoc. Prof. Tsvetkova has taken part in two national scientific and educational projects and two international projects. She has been academic supervisor in national scientific and/or educational projects – 2. Co-author of one teaching manual and two textbooks.

Supervisor of three postgraduate students and two PhD students.

- 1. Stanila Seryozheva Stoeva Master pharmacist, defended a PhD thesis "New aspects in the liquid chromatographic analysis of Capecitabine in samples of biological and non-biological origin".
- 2. Stanislava Georgieva Master pharmacist, title of PhD thesis "Characteristic features of acute medication poisoning in the region of Varna for the past 30 years".

Assoc. Prof. Tsvetkova has more than 30 participations with full-text articles in national and international for a, of which 22 in Bulgaria and 8 abroad. Member of the orgasing committee of the annual scientific conference of the Medical College – Varna.

Active and updated scientific profiles in Google Scholar, Research Gate, ORCID; PUBLONS.

Assoc. Prof. Tsvetkova is also a **member of a number of Bulgarian and international scientific societies** in the field of pharmacoeconomics and healthcare management, namely the European Partnership Network of the WHO "Regions for Health", the Bulgarian scientific society for Public Health, the Bulgarian Association of Pharmacoeconomics (ISPOR Bulgarian Chapter).

For this indicator materials have been submitted, reaching 208, 91 p., exceeding the required minimum of 100 points. (According to the requirements of the competition, the requirement for 80 p. For indicator F15 is not applicable).

General assessment of the candidate's teaching and training activities

The attached reference of Assoc. Prof. Tsvetkova's academic workload indicates that she has over 10 years of teaching experience at the Medical University – Varna, covering the number of required number of academic hours.

For the period since 2010 to the present moment she has taught courses in the Master's programme in the discipline "Pharmacoeconomics", lectures and seminars in the Master's programme "Pharmaceutical Management" of the Faculty of Public Health at MU – Varna in

the discipline "Applied Aspects of Economic Theory in the Healthcare and Pharmaceutical Sectors" and "Organisation of Work and Care in Over-the-counter Drug Products", lectures and seminars in the disciplines "Social Pharmacy and Pharmaceutical Legislation", "Medical Devices" at the Medical College of Varna, supervisor of the pre-graduation internships of assistant pharmacists and the training practice at the Medical College of Varna. Member of the State Examination Boards in the specialty "Healthcare Economics" and in the working commissions to the National Centre for Public Health and Analyses on Health Technologies Assessment for the period 2017-2019.

Assoc. Prof. Tsvetkova participates as co-author in the textbook "Pharmacoeconomics", "Methodological guidelines for practical training of students in the professional field "Nursing care" and a training guidelines on social pharmacy and pharmaceutical legislation, used in the training of students from different specialties taught at MU – Varna.

Remarks and recommendations

My recommendation for the future is to make a more precise distinction of the roles in the involvement in national and international projects, e.g. in what cases it concerns the project manager and in what cases it is a question of participation in a project as leader of students, interns or teams. Such a confusion is made in this case without however, affecting the number of points, which exceeds the required minimum.

Regarding the future scientific research, I would like to recommend to Assoc. Prof. Tsvetkova to systematise the results from the different studies on socially significant diseases in one combined publication in English language, including the topics on digitalisation and e-health.

Personal impressions from the candidate

I have known Assoc. Prof. Tsvetkova since she was a student and I have observed with satisfaction her development as a lecturer, researcher and a socially committed person. In her position and work as Chair and member of municipality commissions on health and education, Assoc. Prof. Tsvetkova organises and motivates her colleagues and the students from the Medical University of Varna to participate in civil initiatives and contribute to the consolidation of the University as a bearer of social responsibility and work to the benefit of society. At international level, she has been working as a representative of the team of the Medical University of Varna and the Municipality of Varna in the European Partnership Network of the WHO "Regions for Health" by implementing various successful projects and inititives with Bulgarian and international partners. From an institutional aspect, Assoc. Prof.

Tsvetkova has been working responsibly for the successful accreditation of the specialties

taught at the Medical College - Varna and has participated actively from the point of her

position at the Municipality of Varna, presenting its achievements and role. Thus, she

contributes to sustaining and promoting the prosperity and the image of the Medical College

- Varna at regional, national and international level.

Assoc. Prof. Tsvetkova stands out with her loyalty, delicacy, professional qualities and

personal responsibility. Her leadership and ability to motivate people, seek and apply

innovation as well as to work under stress conditions, make her a preferred member of the

teams in which she works...

Conclusion

Assoc. Prof. Tsvetkova, PhD participates in the competition for professor with the necessary

scientific work in volume and structure. She has concrete scientific contribution related to the

improvement and the further development of the existent theory and methodology as well as

significant conclusions and results, obtained through interdisciplinary activities. She covers

completely the requirements for occupying the academic position "Professor", in accordance

with the Law on the Development of the Academic Staff in the Republic of Bulgaria and the

Regulations for the conditions and the procedure for the acquisition of academic titles and

occupation of academic positions at MU-Varna.

The candidate's academic development, the achieved results in the teaching and scientific

research activities give me grounds to propose to the honorable Scientific Jury to elect

Associate Professor Antoaneta Zdravkova Tsvetkova, PhD for professor in the field of higher

education " 3. Social, economic and legal sciences, professional field 3.7. Administration and

management, in the scientific specialty "Organization and management outside the sphere of

material production", Training Sector "Assistant Pharmacist".

Date: 25.05.2021r.

Varna

REVIEWER:

/Prof. T. Kostadinova, PhD/

10