

REVIEW

by **Prof. Zlatimir Kolarov, MD, PhD, MSc**

Clinic of Rheumatology, University Hospital "St. Ivan Rilski"

Department of Rheumatology, Medical University of Sofia

of PhD Thesis for obtaining the scientific-educational degree "Doctor of Pharmacy" of **Master Pharmacist Tzvetomir Mario Delijski** - Assistant at the Research Laboratory "Social Pharmacy" at the Faculty of Chemistry and Pharmacy of Sofia University "Kliment Ohridski" on the topic "Health-related quality of life in patients with vasculitis associated with antineutrophil cytoplasmic antibodies undergoing biological treatment" with scientific supervisors Assoc. prof. Emil Hristov, MD, PhD and Assoc. prof. Lubomir Marinchev, MD, PhD Field of higher education - 7. Health and Sports, Professional direction - 7.3 Pharmacy, Scientific specialty "Social medicine and the organization of health care and pharmacy"

The PhD Thesis was discussed and directed for defense by the Department of Physical Chemistry, Faculty of Chemistry and Pharmacy, Sofia University "St. Kliment Ohridski", Sofia. It contains 154 pages, is illustrated with 42 tables, 33 figures and 2 photos and two appendices describing the tests, indexes and questionnaires used in the study and follow-up of patients. The literature reference includes 468 sources, arranged in the order of citations.

The studies reflected in the title of the paper are in three main, widely debated and studied areas of medical research today - quality of life, vasculitis - one of the most severe and problematic rheumatic diseases, among which associated with antineutrophil cytoplasmic antibodies are the most - difficult and relatively little known to the general medical community and biological therapy - an indisputable therapeutic vanguard not only in the field of rheumatology, but also in the territory of other internal, dermatological, gastroenterological and other diseases. This makes the topic of the PhD Thesis indisputably relevant, modern and significant.

The 7-page introduction extensively reflects the scale and grounds for conducting the research. The literature review, written on 25 standard pages, shows the author's excellent awareness of the topic of the PhD Thesis. The emphasis is on the clinical manifestations and treatment of systemic vasculitis, which is a logical consequence of the thoughtful and successfully conducted studies reflected in the title of the PhD Thesis.

The aim and tasks of the PhD Thesis (6 in number) are clearly and precisely defined, corresponding to the title and the intended research.

The number of patients 12 is generally small, but in this case is justified by the low incidence of the disease and the low number of patients suitable for biological therapy on the one hand and the need for such research on the other, due to severe disease and the possibility of adequate treatment with a biological agent that affects not only the activity of the disease, hence the quality of life of patients, which until the era of biological therapy was greatly reduced.

The inclusion and exclusion criteria are clear, well thought out and defined, allow for clear, concrete and real results and minimize the possibility of including inappropriate patients in the study. Patients are fully treated by demographic, clinical and functional indicators with reliable, modern methods, tests, questionnaires and indices.

The methods used to assess the quality of life of patients are modern, relevant and allow to make logical and objective conclusions about the opinion of patients and their objective condition for their physical, mental and social condition.

The results are interesting, accurate, objective, clear, richly illustrated with tables, graphs and color figures. This allows for quick and easy perception.

The 3-page discussion focuses on analyzing one's own results and, to a lesser extent, comparing them with the results of other authors who have published papers on the same topic.

Conclusions are 11, concrete, clear, logical consequences of the results of studies evaluating the quality of life of patients with ANCA-associated vasculitis treated with biological agents.

I share the originality and contributions to the value of the scientific work submitted for review.

I share and approve the recommendation to health institutions, in this case the Ministry of Health and the National Health Insurance Fund for accessibility of patients with Microscopic polyangiitis and Eosinophilic granulomatosis with polyangiitis (Cherg-Strauss Syndrome) for reimbursement of their treatment with Rituximab.

The literature reference is purposeful, specific, clear according to the nature of the planned research, reflects the world's top research and results on the topic of the PhD Thesis from the last 10 years.

As the author has complied with most of the remarks and recommendations that I reflected in the Recommendation for reviewing the PhD Thesis of the Department Council of the Department of Research Laboratory "Social Pharmacy" at the Faculty of Chemistry and Pharmacy of Sofia University "Kliment Ohridski" and its advance for public defence, I have no significant new recommendations and comments.

All this gives me reason to recommend to the esteemed members of the scientific jury, entered in the Register of Sofia University "Kliment Ohridski" for members of scientific juries under № 5 / 17.12.2021, to award Master of Pharmacy Tzvetomir Mario Delijski scientific and educational degree "Doctor of Pharmacy".

Prof. Zlatimir Kolarov, MD, PhD, MSc

02/16/2022

Sofia

A handwritten signature in blue ink, consisting of stylized, overlapping letters, likely representing the name Zlatimir Kolarov.