

Peer Review Report

Review Report on Akkermansia Muciniphila –impact on the cardiovascular risk, the intestine inflammation and obesity. Mini Review

Mini Review, Acta Biochim. Pol.

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EVALUATION

Q 1 ➤ Please summarize the main theme of the mini review

This manuscript is a factual presentation of the role of Akkermansia muciniphila in the treatment of inflammatory bowel diseases, obesity and cardiovascular diseases. It characterizes the complex mechanism of Akkermansia muciniphila's effects on the human body and highlights its potential use in the comprehensive treatment of the aforementioned diseases. Given the increasing prevalence worldwide of both inflammatory bowel diseases and metabolic diseases, this issue is particularly important, and treatment using Akkermansia muciniphila is relatively inexpensive. It should be emphasized that although inflammatory bowel diseases and metabolic diseases appear to be etiologically distant, treatment of IBD may increase the risk of metabolic diseases including obesity. In addition, a common feature of them is inflammation, which increases the risk of further complications. In addition, drugs taken to treat the diseases described may affect the gut microbiota. However, the effect of diet on Akkermansia muciniphila requires further research.

Q 2 ➤ Please highlight the limitations and strengths.

The limitation of the study is the form of the article – a review paper
The study's strengths include a comprehensive literature review based on the latest research findings.

Q 3 ➤ Does the review include a balanced, comprehensive and critical view of the research area?

Yes

Check List

Q 4 ➤ Is the English language of sufficient quality?

Yes.

Q 5 ➤ Is the quality of the figure and/or table satisfactory?

Not Applicable.

Q 6 ➤ Does this manuscript refer only to published data? (unpublished or original data is not allowed for this article type)

Yes.

Q 7 Does the manuscript cover the topic in an objective and analytical manner?

Yes.

Q 8 Does the reference list cover the relevant literature adequately and in an unbiased manner?

Yes.

Q 9 Does the manuscript include recent developments?

Yes.

Q 10 Does the review add new insights to the scholarly literature with respect to previously published reviews?

Yes.

Q 11 Please provide your detailed review report to the editor and authors (including any comments on the Q4 Check List):

In my opinion, the article fully exhausts the aim of the study. I would suggest, however, adding to the title that it also concerns obesity, and in the discussion emphasizing that all the diseases discussed can coexist and that the effectiveness of treatment with the use of *A. muciniphila* can be affected by the drugs used in the treatment of these diseases.

QUALITY ASSESSMENT

Q 12 Quality of generalization and summary



Q 13 Significance to the field



Q 14 Interest to a general audience



Q 15 Quality of writing

