

# PEER-REVIEW REPORT

Name of journal: World Journal of Clinical Cases

**Manuscript NO:** 84647

Title: Delineation of fatty acid metabolism in gastric cancer: therapeutic implications

Provenance and peer review: Unsolicited Manuscript; Externally peer reviewed

Peer-review model: Single blind

Reviewer's code: 03372482 Position: Editorial Board Academic degree: MD, PhD

Professional title: Academic Research, Assistant Professor, Associate Professor

Reviewer's Country/Territory: Egypt

Author's Country/Territory: China

Manuscript submission date: 2023-04-01

Reviewer chosen by: AI Technique

Reviewer accepted review: 2023-04-01 21:23

Reviewer performed review: 2023-04-01 21:30

Review time: 1 Hour

	[ ] Grade A: Excellent [Y] Grade B: Very good [ ] Grade C:
Scientific quality	Good
	[ ] Grade D: Fair [ ] Grade E: Do not publish
Novelty of this manuscript	[ ] Grade A: Excellent [ Y] Grade B: Good [ ] Grade C: Fair [ ] Grade D: No novelty
Creativity or innovation of this manuscript	[ ] Grade A: Excellent [ Y] Grade B: Good [ ] Grade C: Fair [ ] Grade D: No creativity or innovation
	•



Scientific significance of the conclusion in this manuscript	[ ] Grade A: Excellent [Y] Grade B: Good [ ] Grade C: Fair [ ] Grade D: No scientific significance
Language quality	[ ] Grade A: Priority publishing [Y] Grade B: Minor language polishing [ ] Grade C: A great deal of language polishing [ ] Grade D: Rejection
Conclusion	[ ] Accept (High priority) [Y] Accept (General priority) [ ] Minor revision [ ] Major revision [ ] Rejection
Re-review	[Y]Yes [ ]No
Peer-reviewer statements	Peer-Review: [ ] Anonymous [ Y] Onymous  Conflicts-of-Interest: [ ] Yes [ Y] No

#### SPECIFIC COMMENTS TO AUTHORS

The prognosis of gastric cancer remains dismal. Metabolic reprogramming involving lipids has been associated with cancer occurrence and progression. AIM To illustrate fatty acid metabolic mechanisms in gastric cancer, detect core genes, develop a prognostic model, and provide treatment options. METHODS Raw data from The Cancer Genome Atlas) and Gene Expression Omnibus databases were collected and analyzed. Differentially expressed fatty acid metabolism genes were identified and incorporated into a risk model based on least absolute shrinkage and selection operator regression analysis. Patients from The Cancer Genome Atlas were then assigned to highand low-risk cohorts according to the mean value of the risk score as the threshold, which was verified in the Gene Expression Omnibus database. Relationships between chemotherapeutic sensitivity and tumor microenvironment features were assessed. RESULTS An integrated evaluation was performed in this study. Fatty acid metabolism-related genes were used to construct the risk model. Patients classified as a high-risk cohort were resistant to chemotherapy using the "pRRophetic" R package. Patients in the high-risk cohort were associated with type I/II interferon activation,



7041 Koll Center Parkway, Suite 160, Pleasanton, CA 94566, USA

**Telephone:** +1-925-399-1568 **E-mail:** bpgoffice@wjgnet.com

https://www.wjgnet.com

increased levels of inflammation, immune cell infiltration, and tumor immune dysfunction using the exclusion algorithm, indicating the potential benefit of immunotherapy in these patients. CONCLUSION In brief, we constructed a fatty acid-related risk score model to assess the comprehensive fatty acid features in gastric cancer and validated its vital role in prognosis, chemotherapy sensitivity, and immunotherapy. In General: it's a good paper and the subject of the manuscript is applicable and useful. Title: the title properly explains the purpose and objective of the article Abstract: abstract contains an appropriate summary for the article, the language used in the abstract is easy to read and understand, and there are no suggestions for improvement. Introduction: authors do provide adequate background on the topic and reason for this article and describe what the authors hoped to achieve. MATERIALS AND METHODS: - The variables selected for the study are described clearly and are appropriate, given the nature of the question asked. The research design is described in detail. The research design is appropriate and does not contain particular weaknesses. The measurement instrument, including its psychometric qualities, is described clearly. The population of interest and the sampling procedure are defined clearly. The data collection procedure is clearly described. The setting in which the study took place is described. The data analysis procedures are stated in precise terms. The data analysis procedures are appropriate. Results: the results are presented clearly, the authors provide accurate research results, and there is sufficient evidence for each result, Specific data accompany the result statement, and Tables and figures are used efficiently. Conclusion: in general: Good and the research provides sample data for the authors to make their conclusion. Grammar: There are a lot of grammatical errors. This must be taken care of and addressed. . (Check The Paper Comments). Finally, this was an attractive article. In its current state, it adds much new insightful information to the field. Therefore, I accept that paper to be published in your



https://www.wjgnet.com

journal.



# PEER-REVIEW REPORT

Name of journal: World Journal of Clinical Cases

Manuscript NO: 84647

**Title:** Delineation of fatty acid metabolism in gastric cancer: therapeutic implications

Provenance and peer review: Unsolicited Manuscript; Externally peer reviewed

Peer-review model: Single blind

Reviewer's code: 06301995 Position: Peer Reviewer Academic degree: MD

**Professional title:** Doctor

Reviewer's Country/Territory: China

Author's Country/Territory: China

Manuscript submission date: 2023-04-01

Reviewer chosen by: AI Technique

Reviewer accepted review: 2023-04-03 06:20

Reviewer performed review: 2023-04-03 06:45

Review time: 1 Hour

Scientific quality	[ ] Grade A: Excellent [ Y] Grade B: Very good [ ] Grade C:  Good [ ] Grade D: Fair [ ] Grade E: Do not publish
Novelty of this manuscript	[ ] Grade A: Excellent [ Y] Grade B: Good [ ] Grade C: Fair [ ] Grade D: No novelty
Creativity or innovation of this manuscript	[ Y] Grade A: Excellent [ ] Grade B: Good [ ] Grade C: Fair [ ] Grade D: No creativity or innovation



Scientific significance of the conclusion in this manuscript	[ ] Grade A: Excellent [Y] Grade B: Good [ ] Grade C: Fair [ ] Grade D: No scientific significance
Language quality	[Y] Grade A: Priority publishing [] Grade B: Minor language polishing [] Grade C: A great deal of language polishing [] Grade D: Rejection
Conclusion	[ ] Accept (High priority) [ ] Accept (General priority) [ Y] Minor revision [ ] Major revision [ ] Rejection
Re-review	[ ]Yes [Y]No
Peer-reviewer statements	Peer-Review: [Y] Anonymous [ ] Onymous  Conflicts-of-Interest: [ ] Yes [Y] No

# SPECIFIC COMMENTS TO AUTHORS

The author chose a novel problem: to explore the treatment of gastric cancer from the perspective of fatty acid metabolism. I think this may be a new potential drug therapeutic target, and fatty acid metabolites are also potential targets for evaluating therapeutic effects. We screened some genes related to fatty acid metabolism, analyzed their expression levels and tumorigenesis, and obtained several significant genes, which are worthy of further study.