



SDI Review Form 1.6

Journal Name:	International Journal of Biochemistry Research & Review
Manuscript Number:	2015_IJBcRR_17018
Title of the Manuscript:	Effect of heat treatment on the amino acid profile of <i>Plukenetiaconophora</i> seed kernel flours.
Type of the Article	Original Research Article

General guideline for Peer Review process:

This journal's peer review policy states that **NO** manuscript should be rejected only on the basis of '**lack of Novelty**', provided the manuscript is scientifically robust and technically sound.

To know the complete guideline for Peer Review process, reviewers are requested to visit this link:

(<http://www.sciencedomain.org/page.php?id=sdi-general-editorial-policy#Peer-Review-Guideline>)



SDI Review Form 1.6

PART 1: Review Comments

	Reviewer's comment	Author's comment (if agreed with reviewer, correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)
Compulsory REVISION comments	Abstract: Subsections are missing with necessary information on purpose, design, conclusion and abbreviation like FNB/IOM. Introduction: needs literature on various nut/ crop kernel protein qualities with variations in amino acid profile due to heat processing, while explaining the need for analysis of the African walnut kernel study. Need to incorporate the statistical data on crop, consumption etc., which will support the justification of the study. Please define essential and non-essential amino acids too, pasted little information to start with. Methods: Lacking organisation, methods for crude protein extraction and digestibility, subtitles follow suggestions if acceptable. Statistical data analysis is missing. No information on Standard error or mean or Cv. 1-3 yr child was mentioned, nothing related to this study and PERs Results and Discussion: Results should follow discussion, lack organisation. Discussion with spinach a leafy vegetable. Leaf is different from nut. Presentation of results in human is not necessary as the study is only flour amino acid quality. If it has human digestibility (data missing throughout the text), can include muscular/dietary amino acid data. Please expand discussion on impact of heat processing on amino acid changes due to the protein structural changes under high temperature. Conclusion Please include summary/ major findings of the study. No necessary to include sports or dietary child values or info.	Abstract: Subsections were intentionally omitted. Purpose and design are contained in line 6-10. Conclusion and FNB/IOM are corrected. Introduction: Effect of heat treatment on protein quality (amino acid composition) of plant foods is stated in line 50-55. Statistical data on crop consumption is indicated in line 38-39. Definition of essential and non-essential amino acids is now included. Methods: I do not understand what you mean by lacking organisation. Amino acid contents were quantified using Technicon Sequential Multisample(TSM) Amino acid Analyzer which requires acid hydrolysis of defatted whole sample rather than crude protein extraction and digestion. This research was limited by fund. Statistical analysis would require carrying out multiple analyses of each of the sample treatment. This would cost much. More so TSM analyser used have high level of accuracy. 1-3 yr child was



SDI Review Form 1.6

		mentioned in relation to the potentials of the plant food to satisfy the protein/amino acid requirements of children within the age bracket based on Food and Nutrition Board/Institute of Medicine (FNB/IOM) amino acid reference pattern. Results and discussion: Discussion with spinach is cancelled. Conclusion: Amended.
<u>Minor</u> REVISION comments	Formatting errors through the text including alignment. Scientific names were with errors in space and spelling, missing common names next to them. Words like “wholesome seeds” can be replaced proper language of scientific draft. Expansions (for amino acids) missing at first time use.	Corrected
<u>Optional/General</u> comments	The below pasted article gives information of formulas on EAA estimation and calculation of PER and methodologies to hydrolysis and protein extraction and estimations. For amino acid analysis: http://www.ajol.info/index.php/ajb/article/viewFile/82583/72746	Thanks.