

Review Form 1.6

Journal Name:	Asian Research Journal of Mathematics
Manuscript Number:	Ms_ARJOM_94834
Title of the Manuscript:	A correlation study between dengue incidence and climatological factors in the Philippines
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:

(<https://www.journalarjom.com/index.php/ARJOM/editorial-policy>)

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	The presented paper is relevant, because the fight against the dengue epidemic is not removed from the agenda of the Philippines, as it is for many countries with a humid and hot climate. The epidemic modelling methodology in this work is based on the correlation approach in combination with wavelet analysis. This methodology actually became normative for modelling epidemics, the source of which is the mosquito factor, as evidenced by the articles of authors from Vietnam, Indonesia, Sri Lanka and other tropical countries. Therefore, the obtained results: such as the positive correlation between the level of diseases and the average monthly temperature and the level of precipitation look completely natural and do not raise doubts about their reliability. However, on the other hand, this kind of connection is common knowledge. More interesting is the result of the simulation, according to which the level of precipitation has a more significant effect on the level of diseases than the average monthly temperature. On the basis of wavelet analysis, the authors showed the seasonal cyclist of the dynamics of dengue diseases. Based on the results of this study, a number of recommendations are offered.	
Minor REVISION comments	However, in my opinion, the recommendations are too general, namely that wavelet coherence analysis of these climatologically variables can be integrated into an early warning system to improve dengue forecasting. In order to give such recommendations, the authors of the article should have proposed some method of forecasting	
Optional/General comments	Another wish concerns the lack of analysis of the spatial distribution of dengue fever. Although the Philippines is located in the same climate zone, as an island nation it is spread over a large territory. Therefore, the hypothesis of homogeneity is possible here only in the first approximation.	

PART 2:

	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)
Are there ethical issues in this manuscript?	(If yes, Kindly please write down the ethical issues here in details)	

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