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Journal Name:	**Journal of Geography, Environment and Earth Science International**
Manuscript Number:	**Ms_JGEESI_48644**
Title of the Manuscript:	**Determination of flood hazard Zones Using Geographical Information Systems and Remote Sensing techniques: A case Study in part Yenagoa Metropolis**
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:

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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	**1. Some of the stated objectives (see § 2.2.) have not been met so why still mentioning them (e.g. 2.2.4.)?** **2. The authors are kindly asked to give precise definitions of the parameters calculated in Table 1, with their accompanying measuring units.** **3. The authors are also kindly asked to mark the A-B points of the cross-section profile on Map 4 and to note what are the corresponding measuring units on ox and oy coordinates of the Profile Graph.** **4. The contour lines on Figure 5 represent relief elevations? If yes, please note their altitude values.** **5. What do figures on 3D Model (Figure 7) represent? Geographical coordinates, of course, but please write them down completely (N, E etc.). And also the elevation values (m).** **6. It is not very clear how authors obtained the Flood Analysis Map on Figs. 9 and 10. More specifically, on what criteria / grounds were flood zones (FF, F1, F2, F3, F4) delineated? On mere elevation values of the terrain or on more complex statistical parameters regarding the vulnerability of the flood-prone areas? A more detailed account of this issue would be extremely useful.** **7. Objective 2.2.2. – *To detect the vulnerability of the study area*, is not sufficiently accounted for. Please explain how were the vulnerability areas and processes assessed?**	
Minor REVISION comments	**1. The present paper certainly needs a thorough revision of the English language as some phrases are not very clear.**	
Optional/General comments	The present paper provides a 3D representation of the flood-prone areas around the Yenagoa metropolis in southern Nigeria, by means of remote-sensing (SRTM) data and GIS techniques. Starting from the Digital Elevation Model (DEM), the authors have processed a series of statistical parameters describing the main characteristics of five flood zones with altitudes ranging from -5 m to +33 m. Obviously, the scientific enterprise is important as long as the resulting 3D models of flood-prone areas allow a more objective assessment of the vulnerability to which adjoining communities are exposed to but if taking into consideration that the flood-free (FF) areas represent the greatest majority of the total area, then such elaborate analyses might prove somehow futile. Nevertheless, the whole concept of analysis being used still remains original and the resulting findings are in sync with latest achievements in geospatial applications. The visual effects of the numerous geo-referential analyses being made are impressive and provide significant added value to the whole construction. Therefore, the paper could be published if some extra amendments are being made.	

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)*	

Reviewer Details:

Name:	***Ionac Nicoleta***
Department, University & Country	***University of Bucharest, Romania***