The work presents an analysis to provide a system to figure out the effectiveness and the capability of a remote sensing collaborative environment for emergency response to geo-hazards. I guess, but I'm not sure, this is an valuation of a so-called Decision Support System (DSS) but there is no mention about DSS.

First of all, the English must be deeply revised. There are many sentences are not clear, that hamper the understating of the work. Moreover, there are too repetition in the manuscript (e.g. *remote sensing cooperative*, or *space-air-ground remote sensing sensor*). The language revision is extremely important, otherwise, the massage carried on is lost. I found many difficulties on reading the manuscript. An example, first sentence really misleading: "*Geo-hazard emergency response is a disaster prevention and reduction action that multi-factorial, time-critical, task-intensive and socially significant*" ...emergency response cannot be prevention and reduction action.

A second important point is that the paper misses, since the beginning, indication on who is doing what for obtaining which results. This should be clear, immediately. The abstract does not allow to understand clearly whish are the objectives of the work, and does not present any figure of results

Last general and important comment: the manuscript has to be re-organised, is is not well presented. In many parts, the content of the section does not report appropriate information (see further comments), a reader can have difficulties on understanding the logic of the work.

Some other detailed issues, here in the following:

1. Instruction → I guess it is Introduction

Section 2, DATA.
Subsection 2.1: This part is not about the data used but a general discussion on the classification of sensors and some info on GIS. It presents an overview of the type of sensors, that is useful but not so much important to fill one page of the manuscript. I would expect to find here a focus on the way you set up the table A1 (that is not exhaustive and maybe can be neglected), giving the criteria adopted to build the table, and some number about the final database. Indeed, this initial part is linked with subsection 2.2 and 2.3
Abut Table A1: why do you list and consider satellites/missions that are no more working? E.g. ERS-1 and ERS-2, ALMAZ, JERS, IRS-P4….and others. It has no sense.
The Subsection 2.1 presents also a description of a GIS for emergency management. I think that this unit should be related to the main components of the system (or service) you want to analyse.
Fig.1 very small.
About the GIS emergency service: I think it is important to improve figure 2, trying to give information about the connections among all the modules/blocks in the scheme.

Section 2.2 and 2.3 I think they could merge because the indexes presented in table 1, are then used to build the database.
Figure 3, to small, and the content is not appreciable in the pdf provided for the review
Maybe split it into 2 figs, one for SAT_RS and one for SE_RS would help.
What is UML? No info about the acronym.

Section 3. Methodology
*The commonly used evaluation methods are*…for evaluating what? a Decision Support System? The performance of ??  what are we talking about?
After reading the simulation results I understand what you want to evaluate. You should say what you are evaluating here, considering you are giving some references of methods.
Please express all the acronym: AHP?? TOPSIS? Some are declared (RSR, BN) some other no. This also happens in subsections titles (RSR and Bayesian Network)

Section 3.1: how you determine the weighting vector W? I guess they are calculated using RSR, but there is no explanation on the relationship between RSR and TOPIS. It is almost clear only after reading sect. 3.2 and then at the simulation results section.
Section 3.2: in equation 9, are the elements Rij the same in matrix A (or B) of the section 3.1? not clear.
Why change meanings of m (objects) and n (indicators) indexes with respect matrix A (or B)?

Equation 10 and 11 are equal. What is SR term? And W' with respect W? Please explain.

Sect. 4 Results and discussion

The two subsection 4.1 and 4.1.1 are not related to presentation of results, but they seem a sort of introduction. The content repeats what already written before.

Section 4.1.2: can you give the criteria you adopt for selecting the remote sensing synergies (A), (B) and (C) for mudslide? I understand it is an example, but you have to justify this choice. Otherwise you can apply it also for earthquakes or other events.

How you set values in matrix A?

In table 4, in the first column two indicators have the same rank 1. One of them should be 2.

Section 4.2.1: figure 6 small, not well visible in the pdf provided for the review

Section 4.2.2: table 6. I would suggest to put horizontal lines for separating the related indexes. For example, Data Acquisition should be with Planning and Observation. These two are related to Response Time & Raliblity, and Technique+Range+Timeliness, repsctively. This will also help on reading figure 7.

About BN model? Hwa do you set the values for the third level (root) nodes?

Part number (4) (on page 18) seems an example of part number (3) (page 17), indeed figure 9 is the same of figure 8 excepting few values (maybe only the one of Forecast Accuracy. Hence, why duplicate it?

Finally, Section 4.3 Analysis: this is not an analysis section, rather a summary of the work with few comments at the end, in points (1), (2) and (3). This part must be improved and expanded, to figure out some issues and considerations about the results, the limits, the applicability, the selected environment for the example etc. etc.

Considering the comments provided above, that work cannot be published. I would propose the rejection of the manuscript, and encourage a resubmission.