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Interactive Comment

Interactive comment on "READY: a web-based geographical information system for enhanced flood resilience through raising awareness in citizens" by R. Albano et al.

R. Albano et al.

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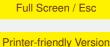
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I want to thank you very much for your valuable comments.

If the paper on NHESS were accepted, I plan to add a section called "Discussion," in which I will address the issues that you highlighted.

Below is the proposed discussion.

Communities in flood-risk areas are not homogenous. They are composed of individuals of varying social and demographic profiles, and these differences are reflected in the complexity and multi-dimensional nature of the communication process. The



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READY WebGIS, therefore, ought to be supported by "place-based" methods. For example, the provision and dissemination of information by holding public consultation events, in-person information initiatives, or through recognized access points or on-the-ground services, to promote the dissemination of information to the broadest target audience possible.

On one hand, flood-risk agencies and civil protection associations ought to contribute to the development of self-help groups in communities at-risk. This could be achieved by communicating with existing local groups, utilizing on-the-ground services and holding public events.

On the other hand, READY could lead to an increase in citizen participation, informed discussion and consensus building. It could also provide a common visual basis for a two-way exchange about the local risk situation. Moreover, WebGIS technologies could improve the effectiveness of the communication strategy, owing to the wide range of people that it could reach and the potential of GIS. For example, the multi-scale and multilayer approach, in addition to the easily understandable maps that, thanks to the READY engine, can be tailored to users needs. These maps can be adapted by uploading users' own data, created in other GIS or spatial platforms, or downloaded from the web.

Furthermore, READY can operatively support a regular and ongoing information campaign that is more efficient than one-off information campaigns (O'Sullivan et al., 2012) that are typically performed by TV and radio. The latter communication media, together with the existing robust procedure systems (I.e. warning systems and emergency assistance plans) are more efficient than WebGIS during the crisis emergency management, and during floods when real time services are needed,

Instead, WebGIS is highly relevant in the prevention, mitigation and preparedness phases (Le Cozannet et al., 2014). In these areas, WebGIS is needed to provide citizens with information about hazards, vulnerability, and exposure assessments for

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evacuation procedures. These measures increase the citizens' capacity to protect their own lives, the lives of their family, and to protect their property. Preparedness advice was found to reinforce the economic savings that could be achieved from the implementation of low-cost, reasonably simple, self-protection measures (O'Sullivan et al., 2012). Therefore, when asked – who can create such a system? – governance agencies, private associations, and interested citizens ought to be informed that resilient communities can save money by adopting these prevention techniques. Thus, disseminating information can raise awareness about risks and encourage efforts at mitigating those risks to persons and property.

As an integrated communication strategy, READY also aims to support stakeholders (for example, voluntary associations and civil protection organizations), and aims to build their capacity so that they can be better prepared for flood events and disseminate information to citizens unable to use electronic devices.

Reference

Le Cozannet, G., Bagni, M., Thierry, P., Aragno, C., and Kouokam, E.: WebGIS as boundary tools between scientific geoinformation and disaster risk reduction action in volcanic areas, Nat. Hazards Earth Syst. Sci., 14, 1591–1598, doi:10.5194/nhess-14-1591-2014, 2014.

O'Sullivan, J. J., Bradford, R. A., Bonaiuto, M., De Dominicis, S., Rotko, P., Aaltonen, J., Waylen, K., and Langan, S. J.: Enhancing flood resilience through improved risk communications, Nat. Hazards Earth Syst. Sci., 12, 2271–2282, doi:10.5194/nhess-12-2271-2012, 2012.

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