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## **Ethical Dimensions of Transdisciplinary Approaches in Seismic Risk Communication**

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For more than a decade, social science studies indicate that there is little or no correlation between the provision of scientific information about geohazards and risks and the adaptive changes in individual or community behaviour that would reduce risk[1,2]. If geoscientists are to help at-risk communities to adopt meaningful measures to protect themselves, new strategies are needed for public communication and community engagement. This change requires a methodological shift away from the dominant interpretation of seismic risk communication as a transfer of scientific facts to “the public”, towards more inclusive transdisciplinary communication strategies that incorporate peer-role models, adopt social network-based strategies and directly engage with communities in motivating preparedness actions [3].

Putting communication expertise into these new practices confronts geoscientists with various ethical questions. These range from the difficulty of deciding on the target-groups relevant to address, to defining roles, responsibilities and levels of personal engagement, the ability/willingness to include other forms of knowledge (e.g. from local communities or other disciplines), to deciding on formats suitable to reconcile argumentative, informational “matters of fact” and sociocultural and psychological “matters of concern”. In the context of these ethical challenges, many geoscientist struggle to switch from conventional communication modes in which they are the technical ‘experts’ to more community-centred, participatory modes of public engagement.



As a further exploration of these concerns are highly relevant to develop novel frameworks and allow a critical reflection of the current paradigms of communication, we will present the results of a transdisciplinary communication workshop Istanbul. An urban field visit to seismically-vulnerable neighbourhoods in Istanbul allowed a group of 15 young geoscience researchers to meet with local residents facing the seismic threat. Those meetings exposed the complex social, political and cultural

concerns among Istanbul's at-risk urban communities.

*Figure 1: Workshop Participants in an Urban High Risk Area, Istanbul, Turkey*

These concerns were used to provoke subsequent roundtable discussions among the group of geoscientists about the roles and responsibilities of communicating hazard information to the public. Through the direct testimony of local residents and geoscientists, we explore the ethical dimension of new strategies for public communication and community engagement.

*References:*

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