Geophysical Research Abstracts Vol. 19, EGU2017-5220, 2017 EGU General Assembly 2017 © Author(s) 2017. CC Attribution 3.0 License.



## **Immersive participation: Smartphone-Apps and Virtual Reality - tools for knowledge transfer, citizen science and interactive collaboration**

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In the last few years, the use of smartphone-apps has become a daily routine in our life. However, only a few approaches have been undertaken to use apps for transferring scientific knowledge to the public audience. The development of learning apps or serious games requires large efforts and several levels of simplification which is different to traditional text books or learning webpages. Current approaches often lack a connection to the real life and/or innovative gamification concepts. Another almost untapped potential is the use of Virtual Reality, a fast growing technology which replicates a virtual environment in order to simulate physical experiences in artificial or real worlds. Hence, smartphone-apps and VR provides new opportunities for capacity building, knowledge transfer, citizen science or interactive engagement in the realm of environmental sciences. This presentation will show some examples and discuss the advantages of these immersive approaches to improve the knowledge transfer between scientists and citizens and to stimulate actions in the real world.