# EVER-EST: The platform allowing scientists to cross-fertilize and cross-validate data

Mirko Albani (1), Cristiano Silvagni (1), Rosemarie Leone (1), Simone Mantovani (2), Sergio Ferraresi (2), Fulvio Marelii (3), Sergio Albani (4), Michele Lazzarini (4), Anca Popescu (4), Federica Foglini (5), Francesco De Leo (5), Valentina Grande (5), Stefano Salvi (6), Elisa Trasatti (6), Hazel Napier (7), Tim Aldrdge (8), Steve Cole (9), Robert Moore (9), and Iolanda Maggio (10)

(1) ESA-ESRIN, Frascati, Italy (Mirko.Albani@esa.int), (2) MEEO S.r.l., Ferrara, Italy (mantovani@meeo.it), (3) Terradue, Italy, (4) European Union Satellite Centre, Spain, (5) CNR ISMAR, Italy, (6) INGV-ONT, Italy, (7) British Geological Survey, UK, (8) Health and Safety Executive, UK, (9) Centre for Ecology & Hydrology, UK, (10) Rhea Group, Belgium

Over recent decades large amounts of data about our Planet have become available. If this information could be easily discoverable, accessible and properly exploited, preserved and shared, it would potentially represent a wealth of information for a whole spectrum of stakeholders: from scientists and researchers to the highest level of decision and policy makers. By creating a Virtual Research Environment (VRE) tailored to the needs of Earth Science (ES) communities, the EVER-EST (http://ever-est.eu) project provides a range of both generic and domain specific data analysis and management services to support a dynamic approach to collaborative research. EVER-EST provides the means to overcome existing barriers to sharing of Earth Science data and information allowing research teams to discover, access, share and process heterogeneous data, algorithms, results and experiences within and across their communities, including those domains beyond Earth Science. EVER-EST is funded by the European Commission H2020 programme for three years starting in October 2015. The project is led by the European Space Agency (ESA) and involves some of the major European Earth Science data providers/users including NERC, DLR, INGV, CNR and SatCEN . The paper presents specific aspects of this collaboration platform in terms of infrastructure and implemented paradigms. Some case studies on cross-fertilization analysis are documented in order to show the process for creating knowledge and new data starting from collected data from different sources (e.g. from remote and social sensing). The paper concludes with few future outcomes.