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2D-3D μ XRF Elemental Mapping Reconstruction on Archeological Samples

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“Rainbow X-Ray” (RXR) is a μ XRF station at “XLab-Frascati”, now open for users and optimized for any kind of analytical research field using X-ray sources.

In collaboration with two archeological groups (site “Grotta Romanelli” - Late Pleis- tocene, and site “Gran Carro” - Iron Age) we are starting X-ray Fluorescence studies on local artifacts. The elemental analysis of these artifacts (in particular focalizing the analysis on the inclusions) allows us to understand the provenience of the raw materials: superficial (2D) and bulk (3D) micro-fluorescence mapping can provide useful informations for the geologists in order to identify the possible artifacts origins.

The results presented in this work are a part of a more wide anthropological/archeological study that is indispensable to understand the social and economical relations of these prehistorical communities.

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