

# RESEARCHING ARCHAEOLOGICAL QUARTZITES

## AT THE INSTITUT FÜR UR- UND FRÜGESCHICHTE, ERLAGEN

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### The Forces: Human being

The characterization of lithic raw materials used by prehistoric societies to create artefacts has been a concern of prehistoric archaeology since its beginnings as a scientific discipline. The conclusions reached by those studies have shown their importance in:

- Tracing mobility routes
- To test prehistoric exchanges of material
- Detecting raw material acquisition processes (discovery of new sites)
- Better understanding of raw material management
- Understanding the reason of raw material selection
- Detecting prehistory territories
- Exploitation of landscapes

### The Matter: Archaeological Quartzite

Despite being the second most-often used lithic raw material in European Palaeolithic, quartzite has not received the same geo-archaeological interest as flint and obsidian. This omission generates a serious loss of information and bias in three inter-related axes:

- **The geographic axis** creates a loss of information in areas where quartzite is well represented in the geological strata.
- **The chronocultural axis** hinders information in chronological periods in which flint or obsidian are not well represented, e.g. the Middle Palaeolithic.
- **The interpretation axis** overrepresents the information related with flint and obsidian, generally long-distance mobility or raw material interchanges.

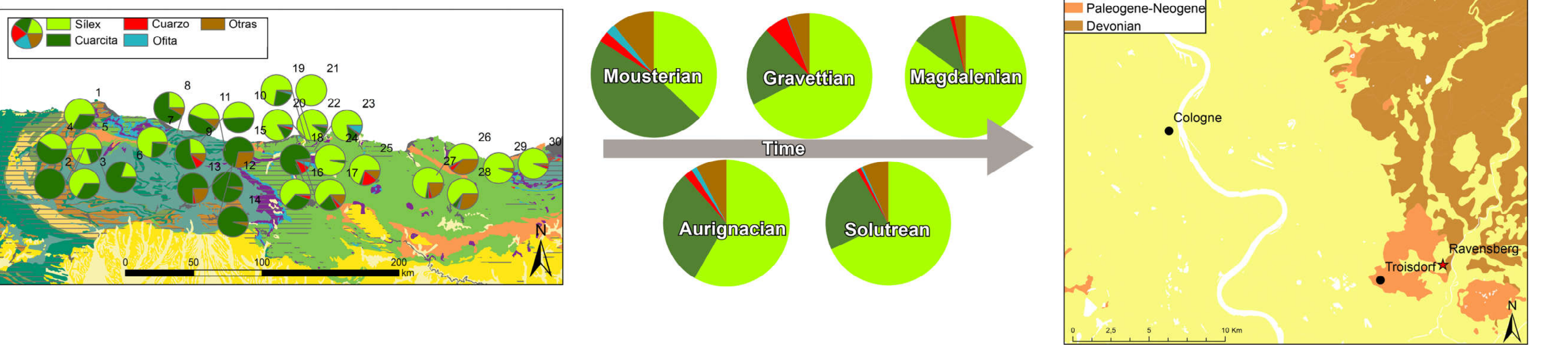
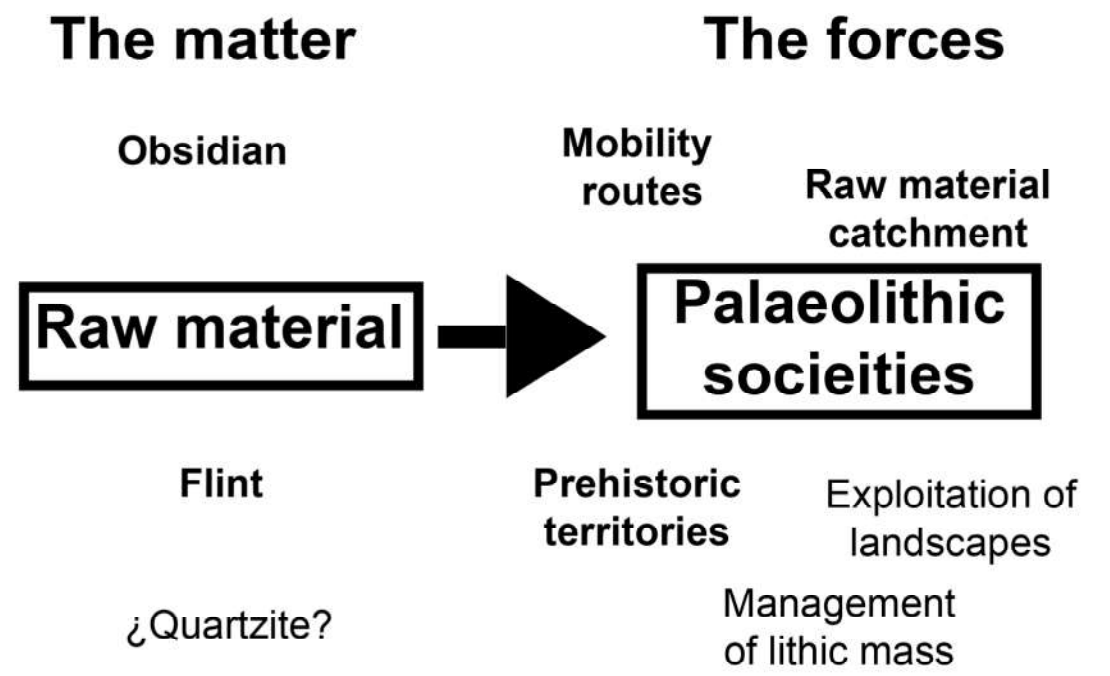
The formal definition and characterization of archaeological quartzite is difficult because of the ambiguity of its very name. In numerous texts, the term 'quartzite' refers to the mineralogical composition of the rock, in fact considering rocks with a quartz content of over 90% also refer to characteristics such as the degree of granularity, conchoidal fracturing and strength of the material. They consider that the genesis of the material may be as wide as sedimentary or metamorphic, which can hinder provenance studies. The absence of geo-archaeological studies that address this raw material in depth and the potentiality and possibilities of its study in archaeological terms, were crucial to start the study "archaeological quartzites" as the basis of my research career.

### Main goals

This poster summarises the methodology and partial results of the research project I have recently finished: "Procurement and management of quartzite in the Cantabrian Region". The recently started post-doctoral research I am developing at the Institute of Prehistory and Protohistory is based on this research and it tries to:

- Deep into the economy and the way of live created around quartzite in previous research area (Deva and Cares Valleys, in the Cantabrian Region, Spain)
- Enlarge the area of Study, including the Sella Valley
- Reinforce the methodology proposed, exporting the method to another European Region: The Lower Rin Valley (Germany)

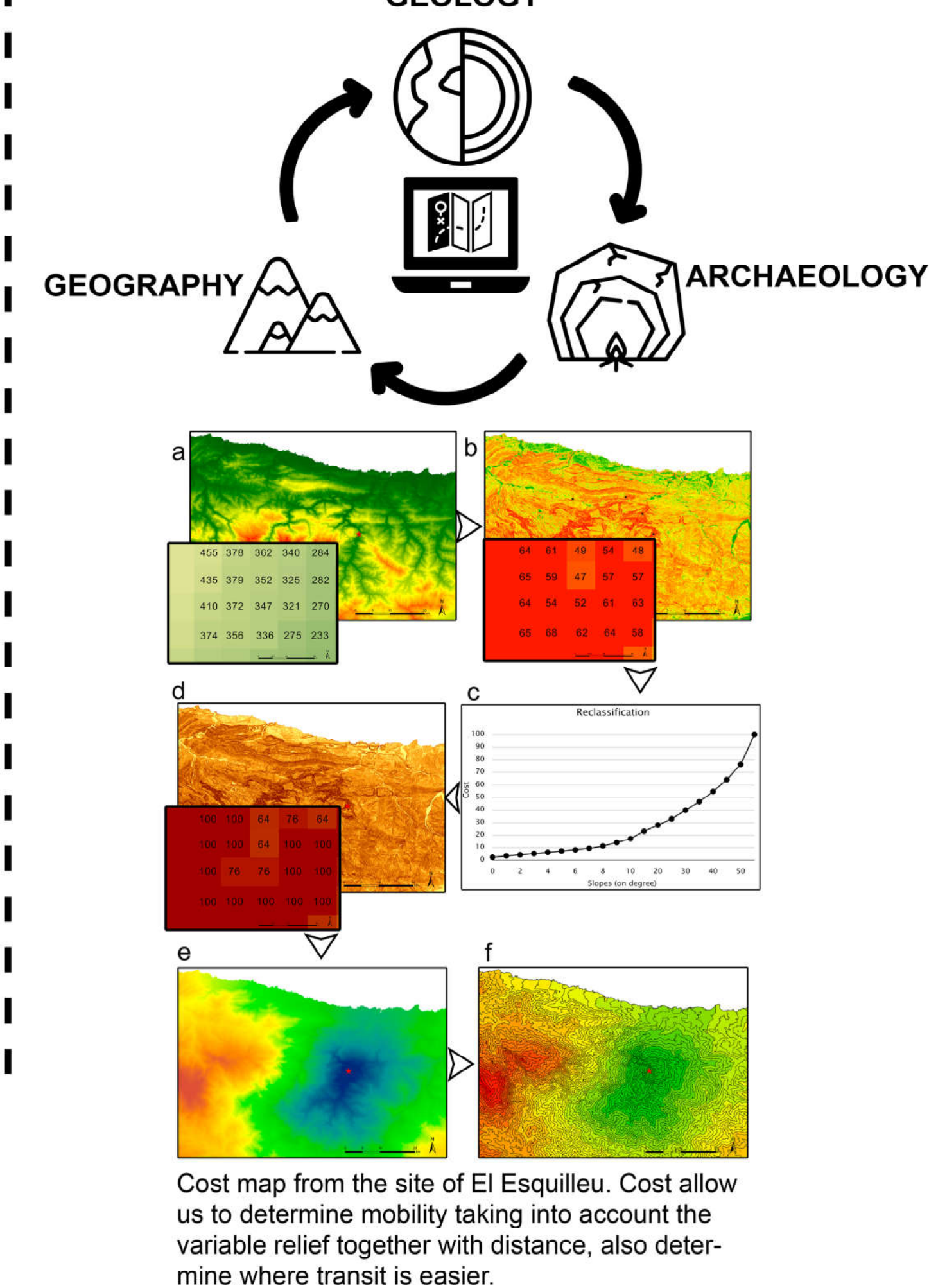
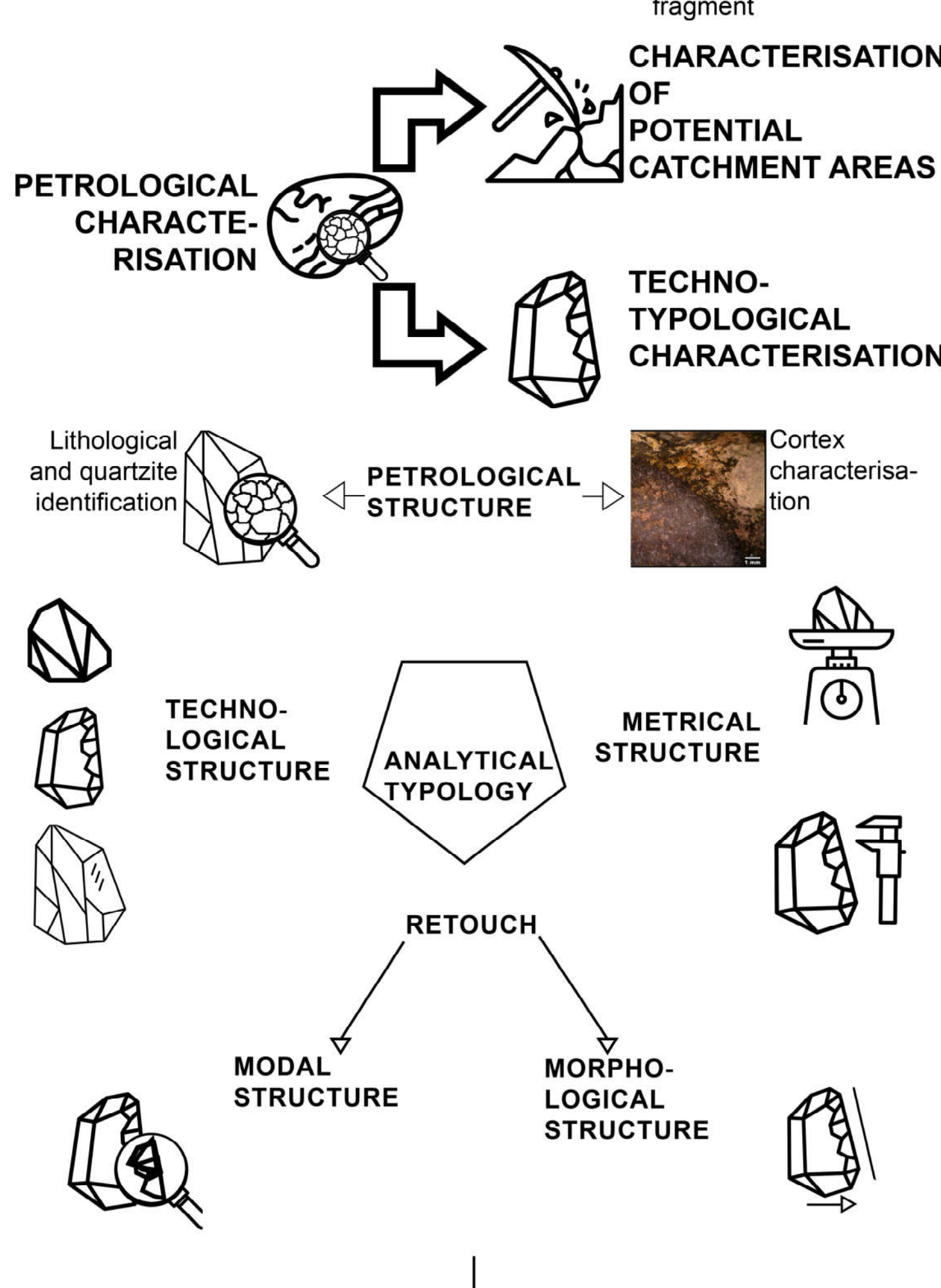
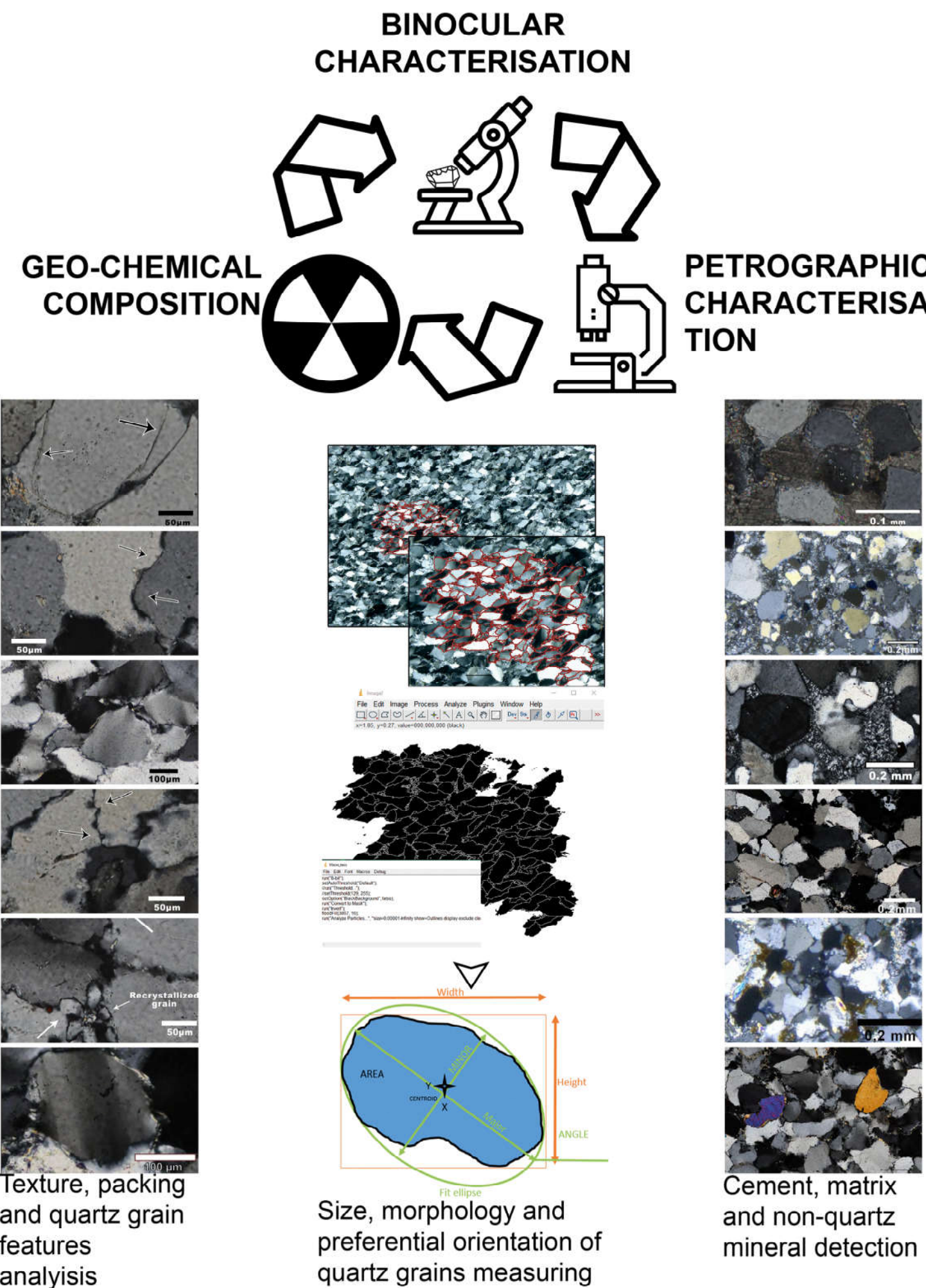
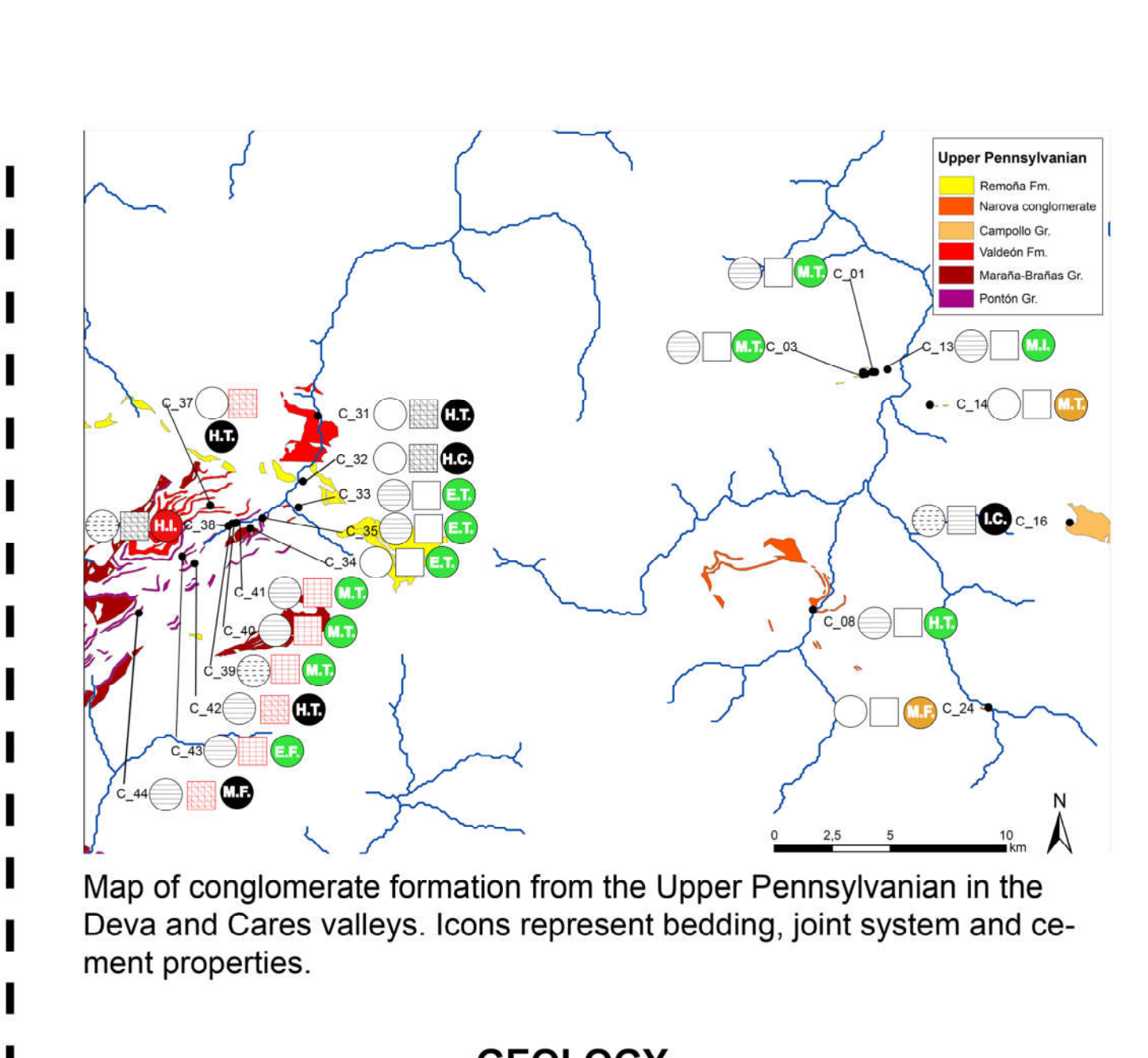
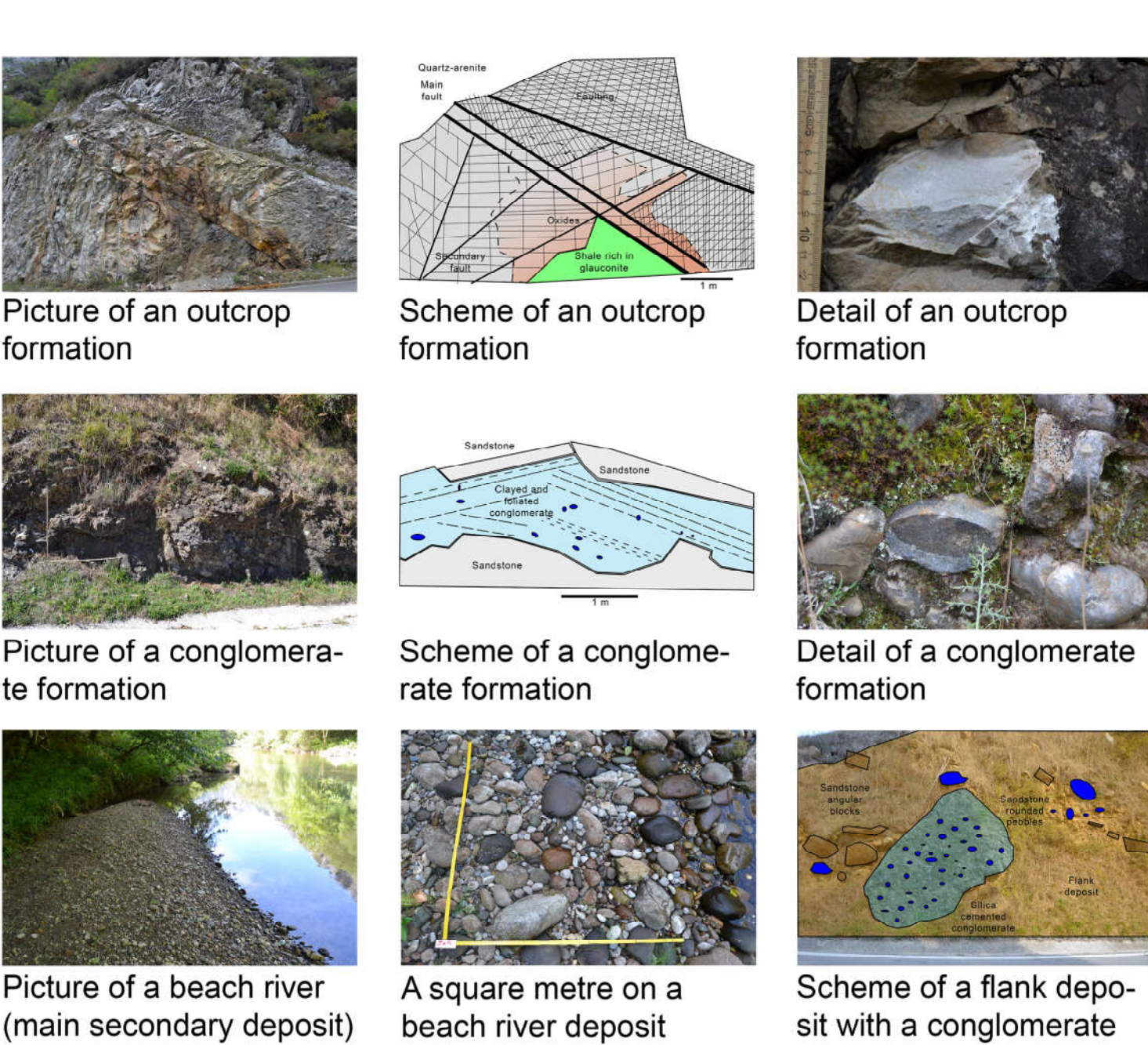
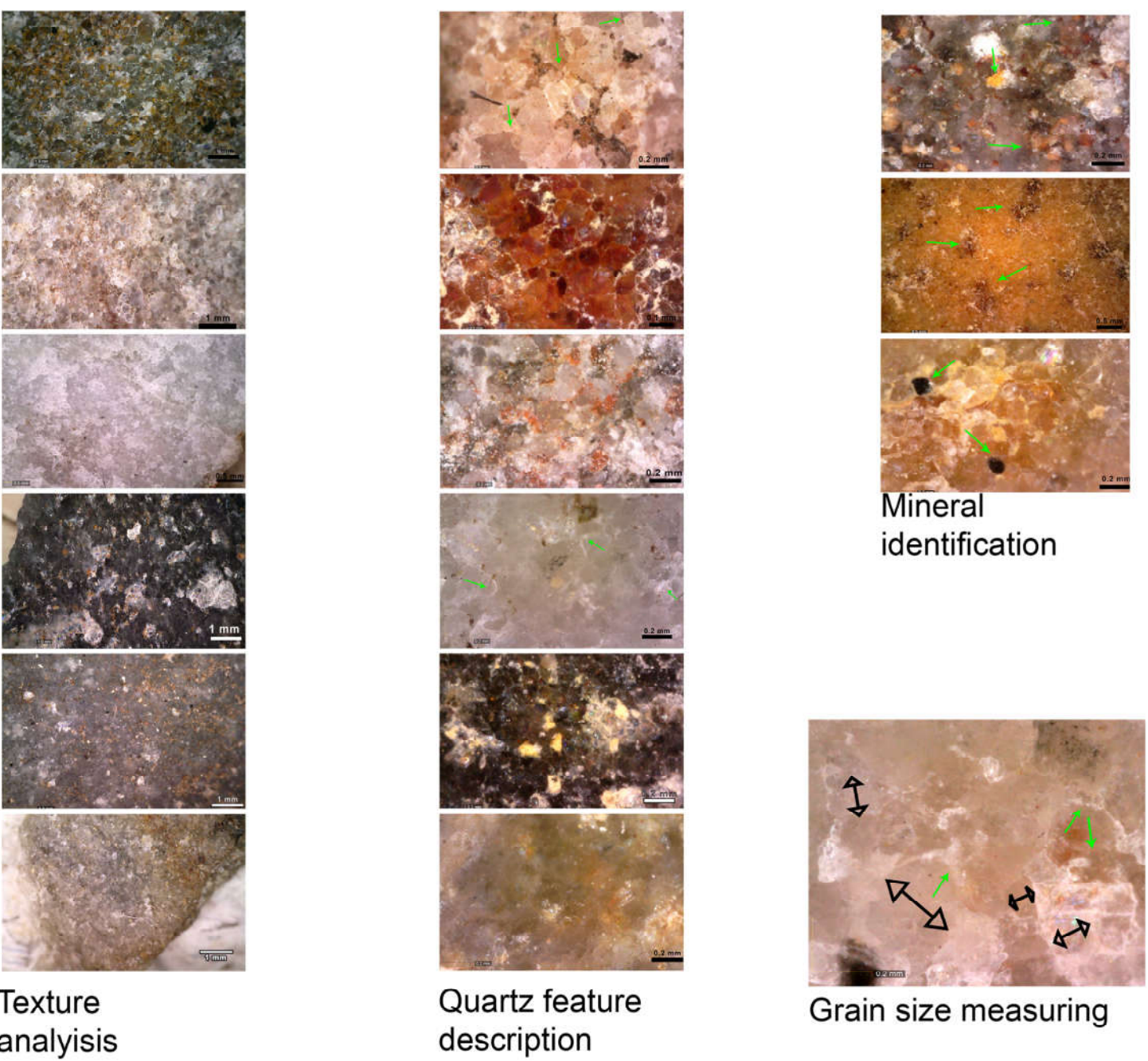
I hope this poster could show the potentiality of this research line, but especially, to open new collaborations.



### MICROSCOPIC APPROACH

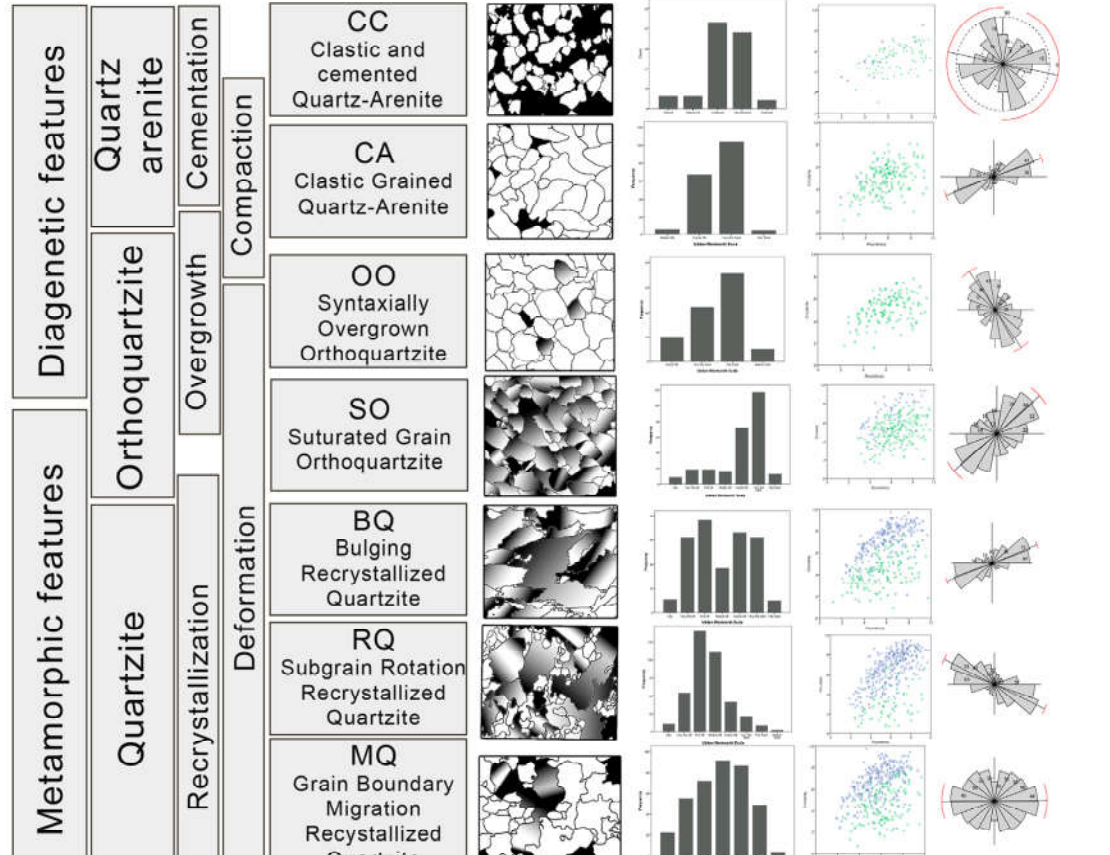
### MACROSCOPIC APPROACH

### REGIONAL APPROACH

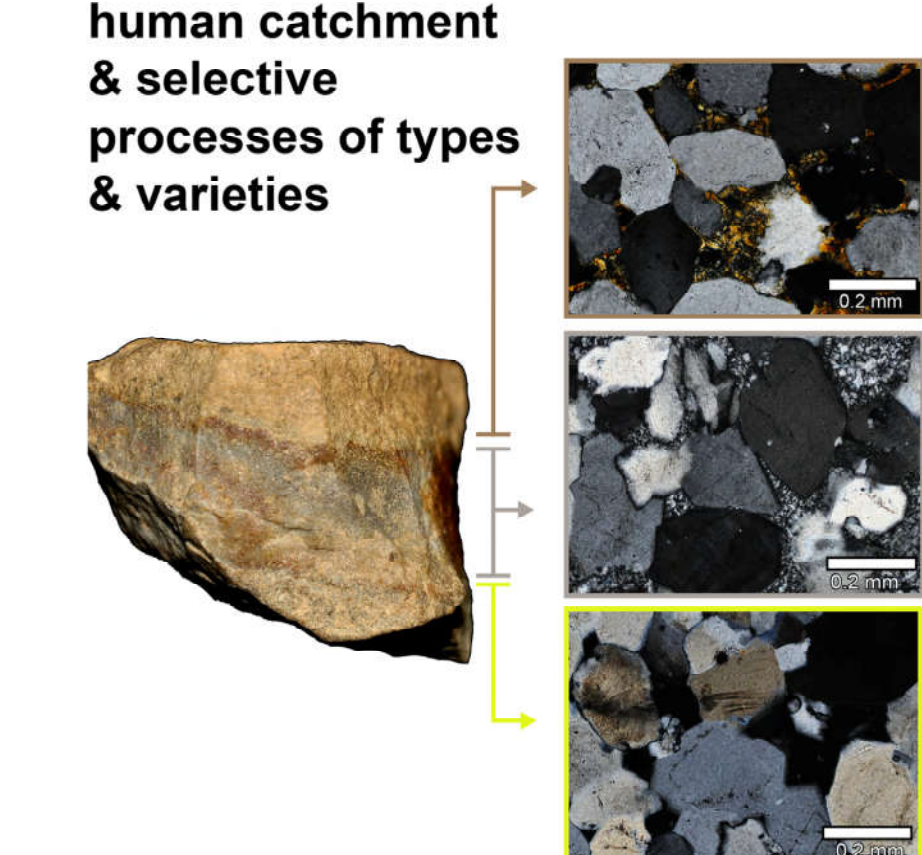


### PARTIAL RESULTS

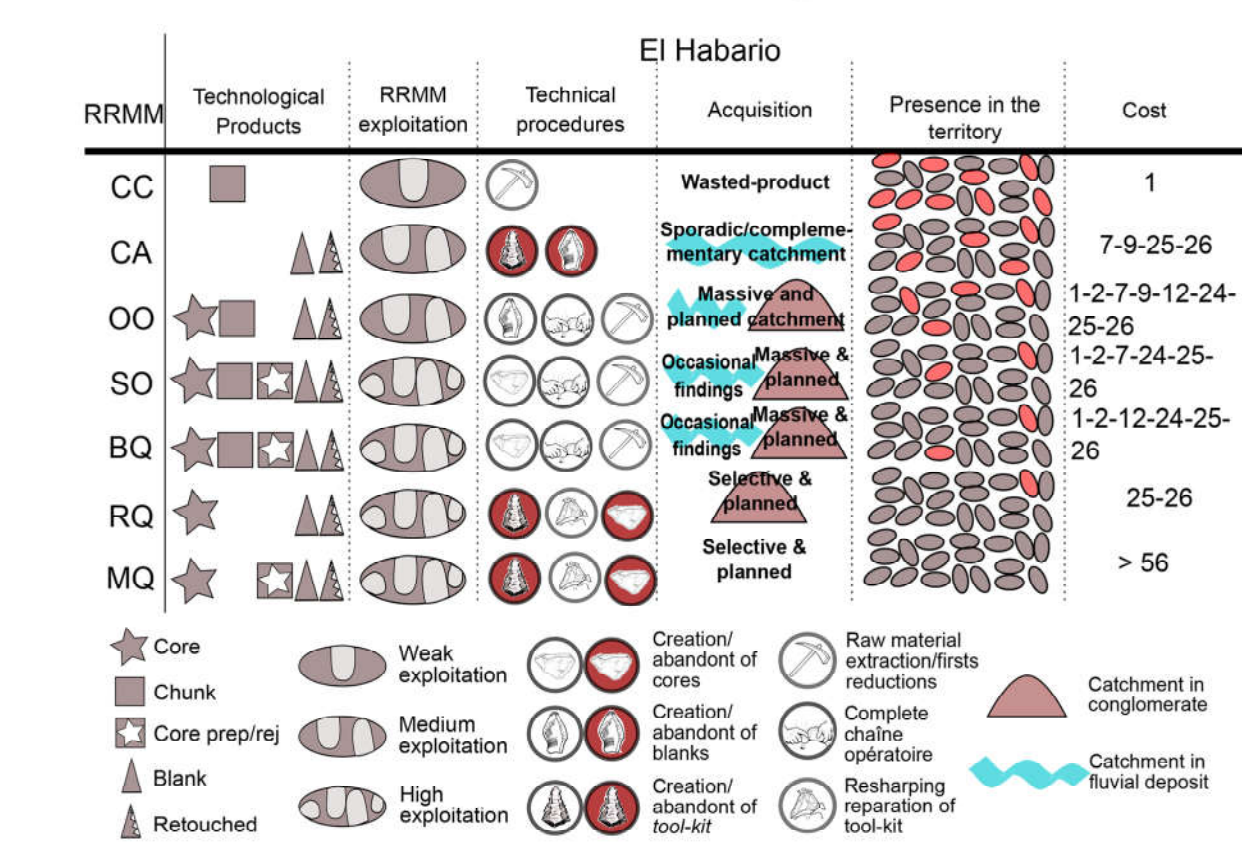
#### Define & characterise "archaeological quartzite"



#### Understand human catchment & selective processes of types & varieties



#### Understand catchment & management mechanism



#### Mobility mechanism and environment exploitation

