



Raw materials from geothermal fluids: occurrence, enrichment, extraction

FUNDING BODY	Horizon Europe HORIZON-CL4-2021-RESILIENCE-01
GRANT AGREEMENT NUMBER (IF ANY)	101058163
WEBSITE	https://crm-geothermal.eu
SOCIAL MEDIA	LinkedIn Twitter Instagram TikTok

»» SHORT DESCRIPTION OF THE PROJECT

To assess over all supply potential, CRM-geothermal will enlarge an existing geothermal fluid atlas by collecting new data and sampling wells for their CRM content in Europe and East Africa. The potential of different geological settings for combined extraction will be evaluated.

Extraction/separation techniques exist, but need to be adapted to the harsh conditions of such systems (high temperature, pressure and salinities). Combinations of materials and flow-schemes will be assessed at lab-scale to optimise systems for different geothermal settings and CRM. A modular, mobile plant will be developed and deployed at existing geothermal sites to conduct pilot studies, investigating upscaling and system integration.

The technological developments will be accompanied by assessments of environmental and social impacts to ensure good governance. The project will advance key reference points for stakeholder engagement, in order to obtain and maintain a 'social license to operate'.

Combined extraction creates new business opportunities for both SMEs and larger companies, and its economics under likely future market developments will be investigated with a view to proposing suitable business models.

CRM-geothermal will open up a potentially huge untapped resource and deploy solutions to help Europe fulfil the strategic objectives of the EU Green Deal and the Agenda for Sustainable Development.