



MINTELL4EU: UNFC RAW MATERIALS CASE STUDIES – EXPERIENCE FROM GeoERA

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UNECE training, 5 April 2022



This project has received funding by the European Union's Horizon 2020 research and innovation programme under grant agreement number 731166







MINTELL4EU: 19 CASE STUDIES IN 9 COUNTRIES

	Gold	Copper	Cobalt	Manga- nese	REE	Phos- phate	Carbo- nates	Graphite	Aggre- gates	Natural stone	Peat	Gypsum	Perlite
Austria									R				
Belgium						n							
Croatia									R				
Denmark							Ν		Ν				
Finland	Ν	N	N					Ν			R		
Hungary				[S]								[r]	[r]
Norway						n		r	r	r			
Slovenia									Ν				
Sweden					r								
#	1	1	1	1	1	2	1	2	5	1	1	1	1
				n: National site	nal, R: Regional, aggregated		r: Regional, site		S: Site, site	e			18 58
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MINTELL4EU:

19 CASE STUDIES IN 9 COUNTRIES (+ other recent experience)

- UNFC is easy and simple for CRIRSCO-compliant resources
- Any resource can be classified into UNFC categories

Major issues:

- Old data and information (*what is the current relevance?*)
- Recent data not CRIRSCO-compliant, yet categorised into UNFC classes as it were so (*how can we trust the categorisation?*)
- Information not accessible (*industrial minerals; legislation not demanding reporting of any kind; practices of hiding data*)
- A large variation in how evaluators quantify resources, interpret the EFG criteria



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Challenges in mapping 'historic' (and some other) resources **into UNFC categories** (+ some solutions)

- Non-compliant, i.e., bridging document cannot be used
- Old reporting **documents and related data can be scanty to non-existent** => Hard to assess the quality and data density => high numbers for UNFC categories
- Some commodities reported in an older but not in the latest resource => **Different UNFC** categories in a deposit for individual commodities (e.g., lithium at 222, but tantalum at 343)
- CRIRSCO-compliant resource >10 years ago, then the company left the prospect, the possible **new owner has not released a new resource** => Change from 221, 222, 223 to 321, 322, 323 or to 331, 332, 333 (from compliant to non-compliant resources!)
- IM deposit: overall resource only given, only in an EIA => all goes into 111+112+221+222+223 (if active project or a mine, and permits granted) or 3,3,3 (if nonactive and not permitted)



NORWAY NGU -







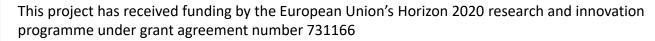


WHAT TO DO?

- National and international *policy frameworks* needed to overcome poor data availability and sharing
- Need for *clearer guidelines allowing as little as possible subjective interpretation* to improve quality and facilitate consistent categorization within the UNFC
- A permanent body organising and supporting training across all countries, organisations, evaluators

Main focus of trainees: *experts working on deposit databases and national resources accounting*, i.e., experts in public organisations













GEOLOGICAL SURVEY OF NORWAY

Thank you!

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MINTELL4EU WP4 deliverables at:

https://geoera.eu/wp-content/uploads/2021/10/D4.1-Mintell4EU-Case-Study-Overview.pdf https://geoera.eu/wp-content/uploads/2021/10/D4.2-UNFC-Harmonisation-issues-gaps-and-recommendations.pdf *UNFC guidelines report by GTK:* https://tupa.gtk.fi/raportti/arkisto/46_2020.pdf

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