

# Local newspaper framing of deep geothermal projects in Alsace, France (2002-2020): News narratives at the service of promoters ?

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## Introduction

Since the early 2000s, France has encouraged the use of sources of renewable energy for the production of heat and power. In the 2010s, five deep geothermal energy (DGE) projects were planned in the main urban zone of Alsace, the Eurometropolis of Strasbourg (EMS): only one of these projects was the outcome of a long period of consultation between the different stakeholders, the Illkirch project. The three others are unbound projects.

In the context of the DESTRESS project, we are interested in the formation and circulation of views on deep geothermal energy in different social contexts. Mass media could be one of the ways to communicate about geothermal energy. We address the following research questions:

- What kind of events have attracted the attention of Alsatian newspapers since France began promoting the energy transition in the early 2000s?
- When Alsatian press mentions geothermal energy what angle does they take?
- Does the angle of newspaper articles vary according to the bound/unbound status of a project?
- Are the angles favoured by the local media related to the sources they use?



Fig 1. Location of EMS geothermal projects

## Methods

We analysed the two main Alsatian daily newspapers: *Les Dernières Nouvelles d'Alsace* and *L'Alsace*. The aim was to appreciate how journalists select their sources and whether this selection affects the angle that appears in the reports. Accordingly, we set up coding schemes based on our *in-situ* observations and previous studies and proceeded in two steps:

### First step: focus on angles and types of geothermal project

- Coding on a large corpus (n = 2340)
- Reports from the two main Alsatian dailies (2002-2018)
- Selection process: one occurrence of the keyword : « géothermie » (geothermal energy) in a newspaper article
- Coding scheme (Atlas.ti) : journalist's angle ; project location ; type of geothermal energy

### Second step: focus on sources and issues related to geothermal energy

- Coding of detailed press reports (n = 284)
- Reports from the two main Alsatian dailies (2014-2020)
- Selection process: at least three occurrences of the keyword "géothermie" in a newspaper article
- Coding scheme (Atlas.ti): sources cited; issues related to each source cited; ...

## Results (I). Local coverage of geothermal energy: mostly positive, except for unbound projects

Peaks related to geothermal energy appeared to be related to two types of events (fig.2). First induced seismic events, as visible in 2006 and 2019. Second, presentation and discussion of projects in the public space, as in 2015 and 2019. The increase in the number of reports with a positive angle in 2006-2007 mirrors both the place taken by environmental issues in the 2007 national election and the organization of a national debate on environmental issues (*Le Grenelle de l'Environnement*) that took place the same year.

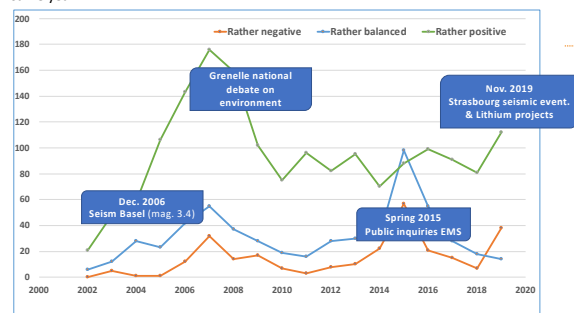


Figure 2: Angle coverage on geothermal energy by Alsatian newspapers (2002-2018) and main events related

The angle favoured by the local media varies according to the status of each project (fig. 3). The press reports on the unbound projects in Eckolsheim and Robertsau projects integrate the multiple criticism of citizens and elected officials that emerge in 2015. Conversely, most of the press reports on concerted project are rather positive.

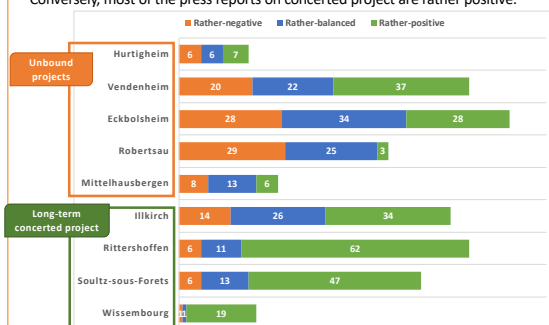


Figure 3: Angle coverage related to deep geothermal energy projects in Alsace by local newspaper (2002-2018)

## Results (II). Focus on detailed reports published by local media (n=284).

Negative statements or themes related to geothermal energy are put forward by journalists at special time: during the organisation of legal public inquiries in 2015, or during the 2019 crisis related to Strasbourg seismic event supposed to be linked to geothermal work, for instance. Apart from these events the media angle is rather positive (fig. 4).

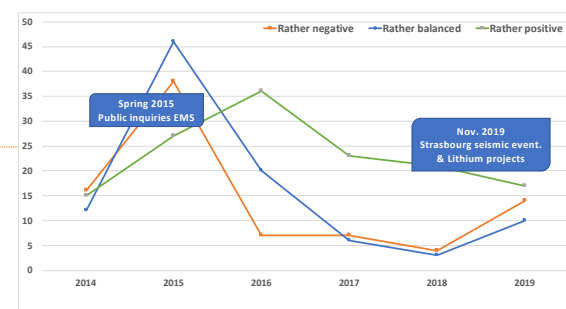


Figure 4: Angle coverage on geothermal energy visible published by Alsatian newspapers (2014-2019)

The positive angle that prevails in the media coverage of geothermal projects since 2016 can be linked to the over-representation of industrialists and local institutions in newspaper reports (Fig. 5). Does that mean that both are recognised as being the most legitimate to talk about geothermal energy?

In numerous reports operators and local institutions – quoted by journalists – explain the technical aspects of the projects (how they will be conducted) and the measures adopted to control induced risks. Scientists and citizens affected by geothermal projects are cited less frequently than other sources. Their statements reported by the journalists focus on three main issues: the industrial and environmental risks linked to geothermal projects; the inadequacy of measures taken by operators to control risks; the negative impacts of past geothermal projects (e.g. earthquakes) (Fig 6).

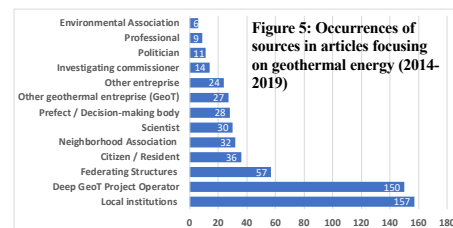


Figure 5: Occurrences of sources in articles focusing on geothermal energy (2014-2019)

	Technical aspects		Benefits		Risks		Geothermy
	Project	Risk control	Economic	Environ-mental	Industrial	Environ-mental	Other negative project
Deep GeOT project operators (n=378)	33%	24%	20%	11%	1%	-	-
Local institutions (n=266)	40%	13%	5%	10%	11%	4%	4%
Federating Structures (n=102)	25%	-	28%	18%	3%	-	4%
Citizen / Resident (n=62)	6%	18%	3%	3%	27%	11%	23%
Scientists (n=41)	7%	32%	2%	5%	34%	-	10%

Figure 6: Themes associated with sources cited by the local newspapers (2014-2019).

## Conclusion

Local press takes a very positive attitude when it comes to geothermal energy except during particular events. This may be related to the fact that actors with economic and political interests (operators and local institutions) are the main sources used by journalists. Other sources who could be considered as experts, such as scientists or environmental associations, are rarely taken into account. In addition, citizens who are concerned about geothermal projects are often portrayed in the press as opponents of deep geothermal projects. This biased narrative provided by local press implicitly conveys the message that citizens must accept the projects: indeed, it scenarizes the operators and institutions invested in risk management and in integrating the projects in their environment. The role of citizens as legitimate actors of the decision-making process is not recognised.

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