



EUROPEAN GEOTHERMAL ENERGY COUNCIL

EGEC contribution to the CEER public consultation on the implications of non-harmonised support schemes

5th January 2012

1. How significant do you consider the impacts of non-harmonisation of support schemes to be for the development of RES and RES technologies?

Non-harmonised RES support schemes across EU member states will no doubt continue to have a positive impact on the development of RES technologies.

The current debate on the harmonization of support schemes appears to be characterized by myopia, preventing a farsighted vision beyond 2020. Indeed, one of the leading principles behind support schemes is to help innovative technologies such as RES, for example Enhanced Geothermal Systems (EGS), to progress down the learning curve and reduce their costs.

Support schemes are crucial to attract new investments and to favour a large deployment of several RES technologies, which will be needed to achieve the long-term objectives of the EU energy policy, i.e. competitiveness, sustainability and security of supply.

On the contrary, if an eventual harmonised scheme does not differentiate by technology, dynamic efficiency and deployment of RES could be reduced, as only some of the most currently competitive technologies would expand. Further, this would lead to the congestion of renewable energy projects in supposed “best sites”, e.g. Wind in the North, Geothermal in very high enthalpy regions and Biomass in Nordic and Central Europe, with increased infrastructure and storage costs.

To this regard, geothermal electricity provides flexible and renewable baseload that can operate around the clock, anywhere in Europe, with the best load factor of all energy technologies (>80%). Geothermal can therefore ensure system stability while reducing grid management costs.

The idea that harmonised support schemes is the most cost-effective option is anyway highly questionable. As rightly pointed out in the consultation document, such an approach would also imply a high concentration of capital investments into a small number of countries, making the investment requirements a potentially more significant challenge to the development of RES technologies. In contrast, a more balanced concentration would share and reduce the investment requirements among member states, not to mention the benefits in terms of local competitiveness and job growth. As far as the latter is concerned, it is worth mentioning that geothermal requires local labour force (more than 80% of the value chain is European), with no risk of relocation.

On the other hand, slow development of RES in some areas with good resources is mainly due to the complete absence of support schemes. For instance, feed-in tariffs for geothermal are in place in only eleven EU member states. Feed-in tariff systems in other member states will contribute to the further development of new geothermal technologies, primarily EGS, as it is

happening in Germany where such a support mechanism is in place and where 41 new geothermal power plants are currently being developed (Source: EGEC Deep Market Report 2011).

2. In comparison, how significant do you consider the impacts of non-harmonisation of factors other than support schemes, explored in this report (or in addition to those explored) to be for the development of RES and RES technologies?

Regarding the factors explored in the consultation document:

- Being a baseload renewable energy source which is available everywhere in the EU, the development of geothermal is not particularly affected by local terrain, and non-harmonisation of connection and charging rules, wholesale market arrangements, and ancillary services. Moreover, geothermal plants can be sized to answer the local demand and contribute to local development;
- Social acceptance, planning and permitting are key issues for the development of RES in general. Simplifying the permit procedures for energy infrastructures and power plants is indeed crucial. To increase the transparency and predictability of the permit granting process for all parties involved, EU guidelines targeted at ministries, local and regional authorities, project developers and affected citizens could be developed;
- Subsidies to other technologies, notably fossil fuels, have an enormous negative impact on the development of RES. They should be abolished in all EU member states as to create a fair level-playing field. Likewise, cost of externalities such as infrastructure, storage and waste management should be integrated to the energy price of other technologies as to withdraw long-standing market distortions.

3. Please place the factors of non-harmonisation (whether explored in this report or not) in order of materiality/significance. Please separate non-harmonisation of support schemes into type, level, structure, history and stability of support as explored in the public consultation document (Table 1).

Please rank the five factors mentioned below in order of their importance, starting with 1 i.e. most important and ending with 5 i.e. the least important.

1. *Support scheme stability (perception of stability, perception of instability)*
2. *Type of support (price-based scheme, quota-based scheme)*
3. *Level of support (high amount of support provided, low amount of support provided)*
4. *Support provision structure (fixed rate over time, variable rate over time)*
5. *History of support (long-term, short term)*

4. In your view, does this consultation document capture all major implications of non-harmonisation of support schemes? Are there additional impacts on investment decisions, market functioning or any other areas you consider relevant?

This consultation document covers nearly all major implications of non-harmonisation of support schemes, though the issue of integrating the externalities to the technology costs is not developed.

However, the focus should not be on how to harmonize support mechanisms, but rather how to improve and make them effective in all member states without neglecting certain technologies. Looking beyond 2020 by developing ambitious follow-up targets and related market design to accommodate a wider deployment of RES will also be a relevant factor to create a stable climate for investments in this sector.

As regard to additional impacts on investment decisions, a relevant factor to be further investigated is the existence of barriers which are peculiar to specific RES technologies. In the geothermal sector, for instance, the lack of coverage for geologically related financial risk constantly acts as a break on geothermal development. Setting up a European support scheme such as a *Geothermal risk insurance scheme* could provide a response to investors' reluctance and help promoting the development of this renewable energy source.

Do you have any relevant document you would like to upload?

- EGEC, [EGEC paper on financing geothermal technologies](#) , January 2010
- [EGEC contribution to the EC Public consultation on "Permit Granting Procedures"](#), April 2011
- EGEC, with ESHA and EUBIA: [Flexible renewable resources will be the key for an optimal electricity mix](#), July 2011