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## Taking the Heat Out of Geothermal: Integrating Public Engagement With EGS in SW England

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### Summary

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Enhanced Geothermal Systems (EGS) have the potential to dramatically increase the number and variety of countries that are able to exploit the potential of geothermal energy not only for heat generation, but also for electricity. As a result, more and more countries will start to engage in this novel and unfamiliar form of energy generation. As has been seen in the past with the EGS projects in Soultz-sous-Forêts in France and Basel in Switzerland, gaining public acceptance and maintaining community support is key to ensuring the safe and timely development of these resources, which are often utilised in highly populated, even urbanised areas. In order to address the issue of potential disconnection between the public and the new technology it is important to develop integrated and holistic approaches to securing 'the social licence' to exploit geothermal power.

In the southwest of England, one such partnership is already in action. Integrating social science and science communication expertise with the planned development of the UK's first geothermal power plant, the United Downs Deep Geothermal Power (UDDGP) project aims to augment innovative technical development with research-led community engagement.

## **Taking the heat out of geothermal: integrating public engagement with EGS in SW England**

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In the southwest of England, one such partnership is already in action. Integrating social science and science communication expertise with the planned development of the UK's first geothermal power plant, the United Downs Deep Geothermal Power (UDDGP) project aims to augment innovative technical development with research-led community engagement. A partnership between Geothermal Engineering Ltd and researchers from the University of Plymouth, this community-centred research project addresses a number of issues concerning the societal acceptance of EGS, such as: social factors that influence public acceptability of geothermal as an energy option; the cognitive models by which people visualise and comprehend the subsurface geothermal environment, and the role of the media (particularly emergent social media) in framing and shaping wider public debate around geo-energy controversies. By integrating geoscience with the social science, two previously disparate sides of energy generation are brought together in a new way that will potentially increase the wide uptake of geothermal power projects in the UK and beyond.