

Low Temperature Potential in the Near-Term

Low-temperature and co-produced resources represent a small but growing sector of hydrothermal development, in geothermal resources below 150°C (300°F). Considered non-conventional hydrothermal resources, these technologies are bringing valuable returns on investment in the near term, using unique power production methods.

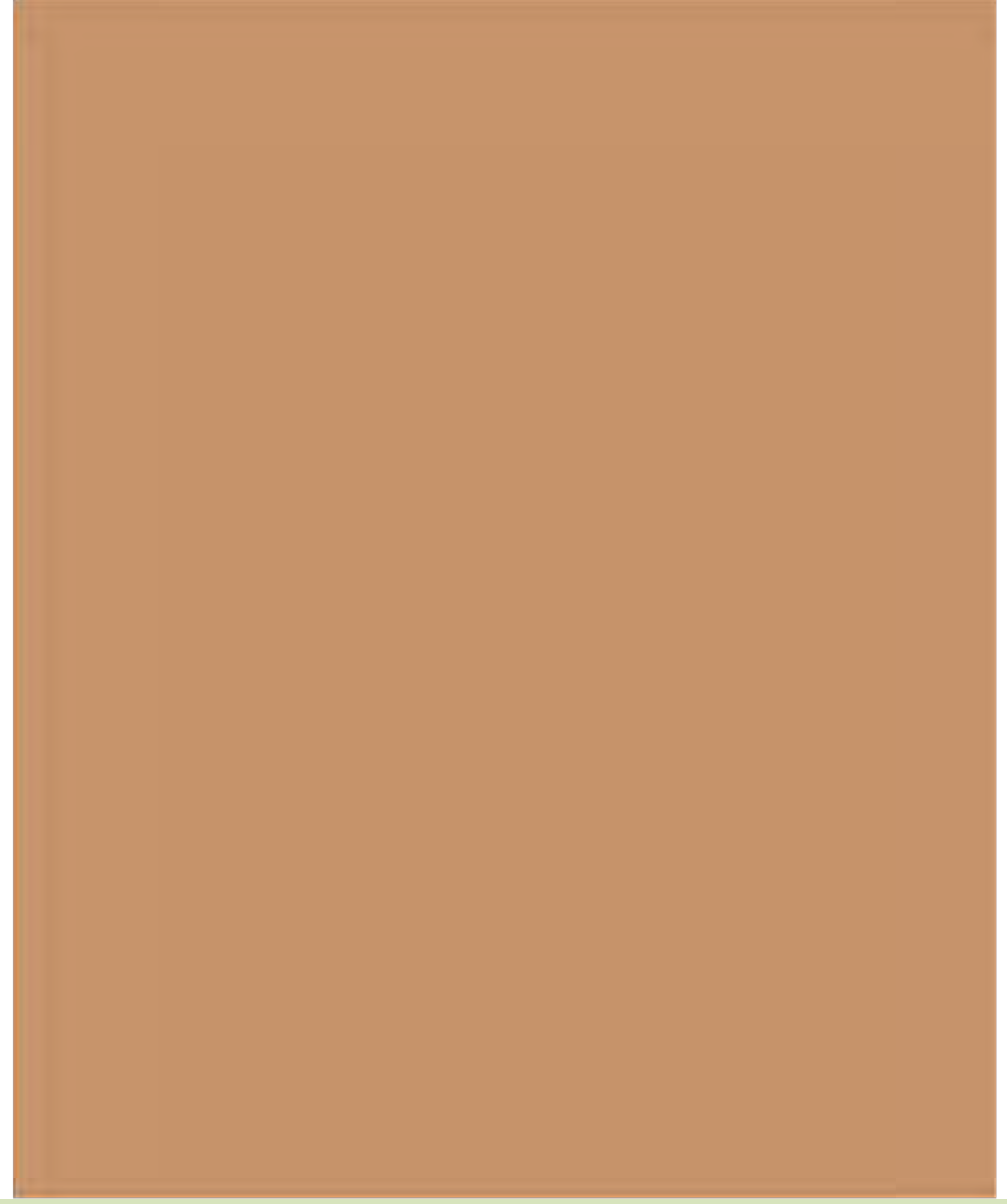
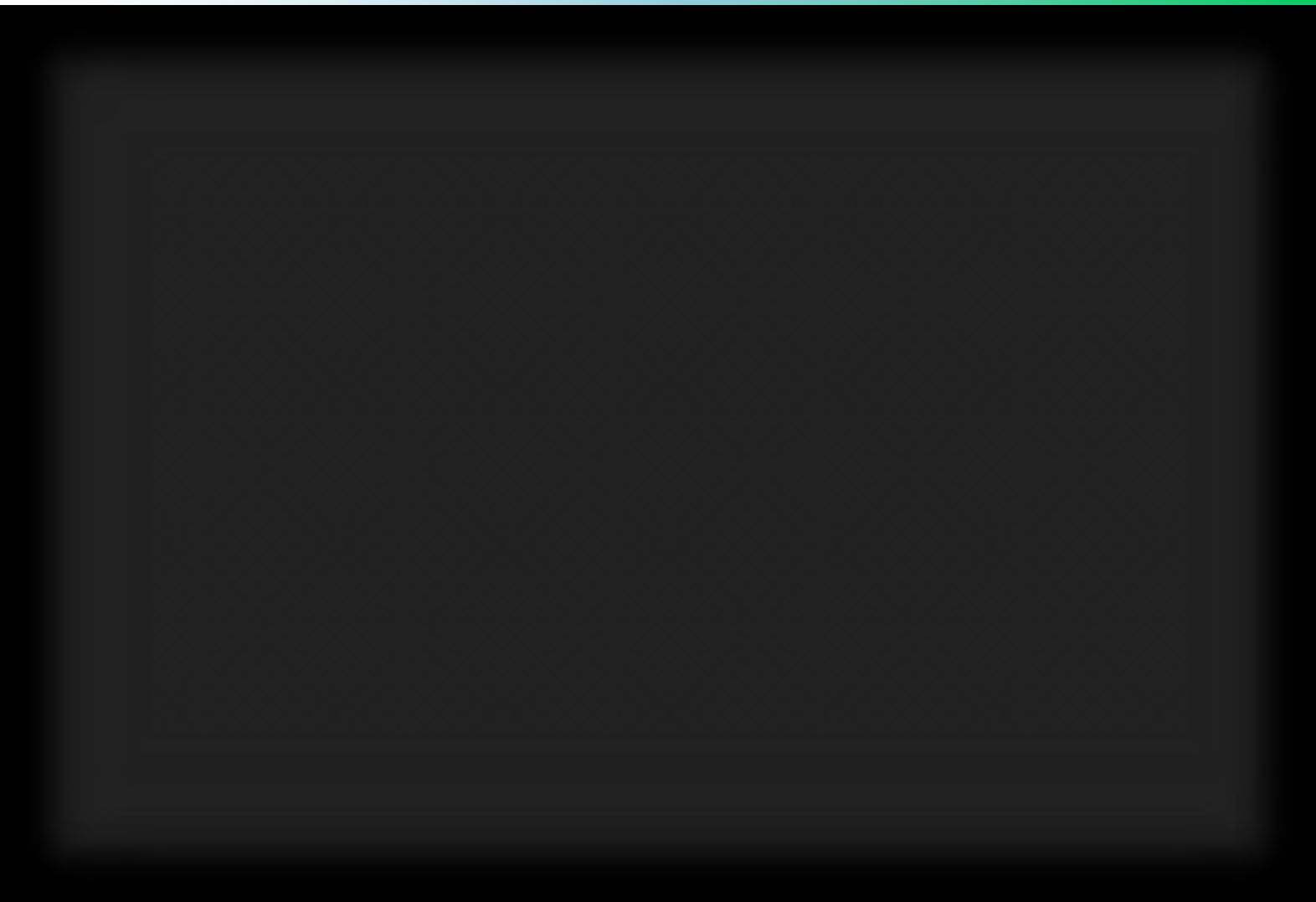
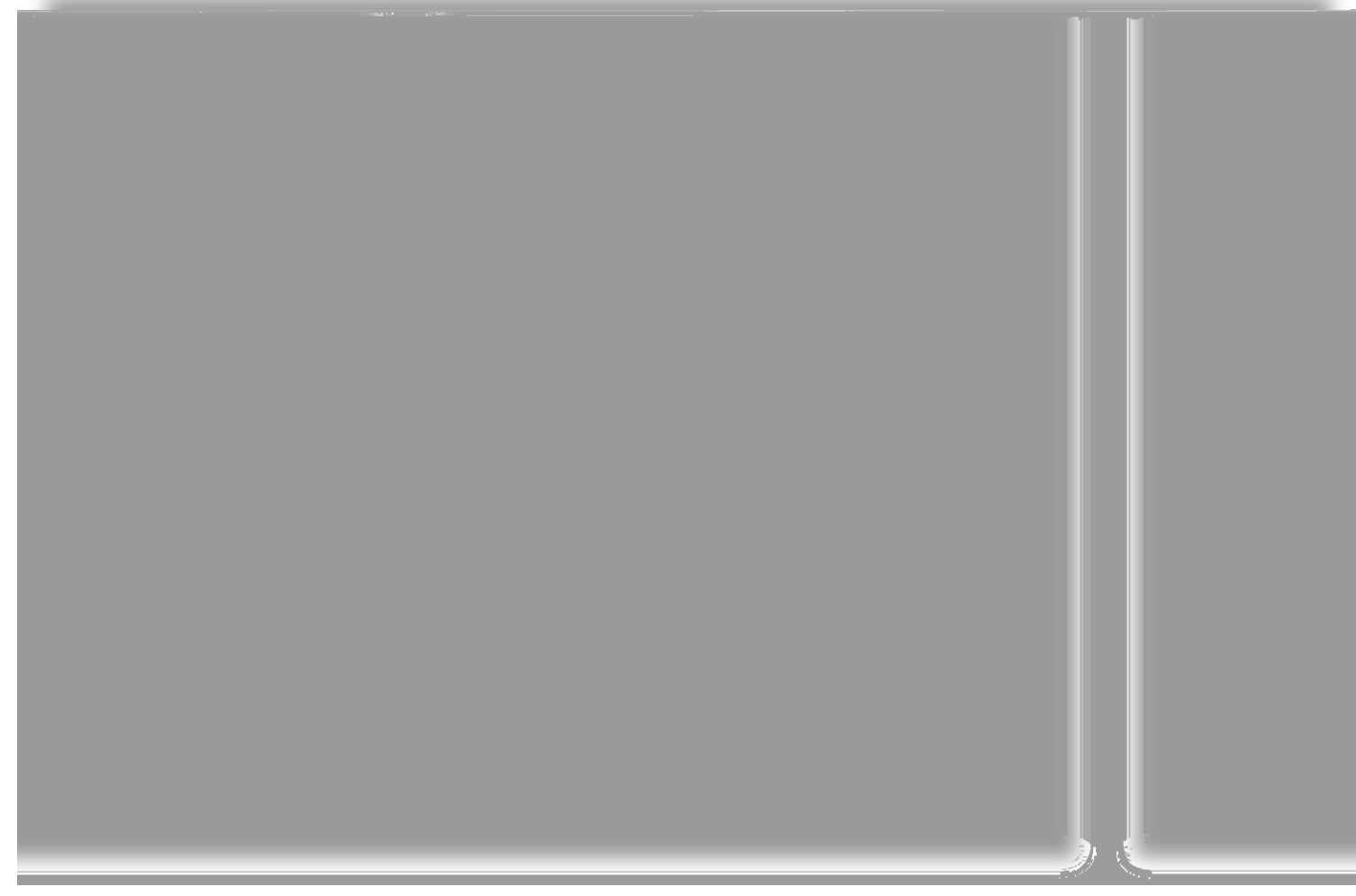
Pacific Northwest National Laboratory (PNNL) is developing microporous metal-organic solids as the primary heat

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Significant Growth in the Future

A Funding Opportunity Announcement (FOA) is slated for release in FY 2014 by the U.S. Department of Energy (DOE) Geothermal Technologies Office (GTO) to advance thermal energy conversion processes and promote technologies that capture, concentrate, and purify strategic materials within geothermal brines for economical extraction and added revenue streams



Small Scale Power Generation from Co-Produced Geothermal Fluid
Electrathon has successfully demonstrated the technical and economic feasibility of geothermal energy production through a state-of-the-art Organic Rankine Cycle (ORC) heat-to-power generator.

Innovative Rotating Heat Exchanger
Sandia National Lab
The innovative rotating heat exchanger prototype is an emerging technology addressing several barriers that conventional technologies presently face, including heat transfer bottleneck, noise levels, and dust fouling. The effort produced promising results in the lab and the prototype is 10X smaller than current state-of-the-art CPU coolers and offers potential for even greater impacts on energy efficiency through upscaling from use in electronics to vehicles, HVAC systems, and potentially power plants.