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Doctor of Philosophy

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Image created outside the Natural Resources Engineering Facility, University of Alberta

Borrowed Sunshine

Semi-Finalist

Oil and gas resources are solar energy reserves from prehistoric times, which we use every day to power our lives. In many cases, these resources are non-renewable, but what if it were possible to recover and reuse some? In the Innovative Process Lab of the Natural Resources Engineering Facility we are developing the technology to use carbon dioxide as an environmentally friendly solvent to extract fuel oil from contaminated soils which would otherwise be sent to the landfill. The photo shows a sample of the oil that we have extracted: "borrowed sunshine" from prehistoric times, against the backdrop of the beautiful, blue Alberta sky.