

Development of a portable laser-interferometric gravity-gradiometer

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We are developing a portable laser-interferometric gravity-gradiometer for environmental measurements. In the gravity gradiometer, differential accelerations between two test masses, which are in free fall at different heights in a vacuum tank, are measured by a laser interferometer. A prototype of the gravity gradiometer was built up, and its performance was tested at the Sakurajima Volcanological Laboratory of the Kyoto University. We will report the current status of the development.

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