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Late Quaternary activity of the Sakai-toge Fault in the southern Hida Mountains, central Japan

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Late Quaternary activity of the NW-SE trending Sakai-toge Fault in the southern Hida Mountains, central Japan, has been evaluated based on the observations of some outcrops and tectonic landforms such as back-facing fault-scarplets. Offset streams and ridges along the fault suggest a left-lateral displacement of a few hundred meters. The fractured basement rocks along the fault surfaces that cut the Middle to Upper Pleistocene terrace deposits have distinct asymmetrical fabrics caused by left-lateral shear. These lines of evidence clearly suggest that the fault is a left-lateral strike-slip one and has an A-class activity since the Late Pleistocene. The latest event recognized along this fault is a meter-order left-lateral displacement after 1480 14C yrs BP.

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