

# The movement of lithosphere plates under the influence of bombardments by galactic comets, a new interpretation of the "true polar wander" phenomenon

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In connection with the discovery of galactic comets that cyclically bombard the Solar System, it has been established that their bombardments are the main relief-forming factor on all planets. On Earth, comet falls cause the disintegration and movement of continental lithospheric plates, as well as the successive association of plates into supercontinents, either in the southern or northern hemisphere. The latter phenomenon is called "true polar wander (TPW)". Geologists believe that its cause is the matter convection of the Earth's mantle, which deforms the ellipsoid of inertia of our planet, changing the orientation of its rotation axis, whereas the position of the magnetic poles remains unchanged. This explanation is not physically indisputable. The author offers a different physical interpretation of TPW phenomenon, according to which, under the influence of galactic comets fall, the orientation of not the Earth's axis changes, but the rotation axis of the Earth's up-per lithosphere shell, in which the lithosphere plates move. This model makes it possible to explain in a new way the sequence of the breakup of the supercontinent Pangaea, which led to the formation of the Atlantic Ocean, and to link the occurrence of transform faults on the Atlantic mid-ocean ridge with the action of the Coriolis force.