Review of: "On the existence of precession of planets' orbits in Newtonian gravity"

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Potential competing interests: No potential competing interests to declare.

Congratulations to C. Cordan for the studies on Mercury's precession. However, based on this article, he needs to be more aware of the astrometry of Mercury's orbit. See, for example, Park, Ryan et al. "Precession of Mercury's Perihelion from Ranging to the Messenger spacecraft". AJ, vol. 153, no. 3, 2017, p. 121. https://doi.org/10.3847/1538-3881/aa5be2 *and references therein*.

At the very introduction, there are several mistakes. The total **observed** precession of Mercury is about 574 arcseconds per century, different from the values in the paper.

The analogy in section 2 of the cars and observers, all of them inertial, has nothing to do with the supposedly non-inertial Sun.

In section 3, the author "takes the origin of the frame of reference in the center of the Sun", and then "recalls that each central attractive force can produce an approximately circular orbit that should not necessarily be closed." The orbits in Newtonian gravity are around a center of mass (of the Sun and the planet), for which the result the author recalls is valid. One should do another analysis if one takes the origin at the center of the Sun. The ansatz that the Sun is in a circular orbit is generally false. The two-body problem in Newton's Gravity proves that the Sun and the planet orbit in ellipses about the center of mass. So, the remaining author's calculations have no consistent meaning.

Finally, section 4 shows yet another flaw in the author's reasoning. Suffice to mention equation 33, in which the total force is the standard Newton's force on a particle of mass m by the total mass (m+M); that is, the result would be what Newtonian physics predicts.

Thus, the conclusions are not backed by sounding arguments.