

**Erratum: Identifying axion insulator by quantized magnetoelectric effect in antiferromagnetic MnBi<sub>2</sub>Te<sub>4</sub> tunnel junction [Phys. Rev. Research 4, L022067 (2022)]**Yu-Hang Li  and Ran Cheng

(Received 15 March 2023; published 12 April 2023)

DOI: [10.1103/PhysRevResearch.5.029001](https://doi.org/10.1103/PhysRevResearch.5.029001)

After publication of this paper, we became aware of a critical error in the estimation of the detectable current induced by a harmonic magnetic field normal to the plane. In the paragraph right before the summary, we stated that for an MBT of size  $L_x = L_y = 10 \mu\text{m}$ , a harmonic magnetic field of strength  $B \sim 100 \text{ G s}$  and frequency  $\omega/2\pi = 1 \text{ GHz}$  induces an output ac current  $I \sim 1.1 \text{ nA}$ , which should be corrected as

$$I \sim 121.54 \text{ nA}. \quad (1)$$

This correction in the estimation makes our predicted effect two orders of magnitude larger than what we previously anticipated, thus further solidifying our central conclusion. With this new estimate, our prediction becomes a rather significant effect extremely easy to detect experimentally. The numerical plot of  $I(t)$  in Fig. 3 is unaffected because the current is scaled to be dimensionless.

We sincerely thank Jianxiang Qiu for drawing our attention to this mistake.