Erratum: Magnetic structure and Dzyaloshinskii-Moriya interaction in the $S = \frac{1}{2}$ helical-honeycomb antiferromagnet α -Cu₂V₂O₇ [Phys. Rev. B **92, 024423 (2015)]**

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We mistakenly stated that the Dzyaloshinskii-Moriya (DM) interaction between the next-nearest neighbors (NNN) vanishes by basing our argument on the drawing of the NNN bond in Fig. 1(a), which shows that two Cu1–O(1)–Cu2 bonds are equivalent when viewed along the crystallographic c axis. However, when viewed along the b axis, it becomes clear that there is no inversion center between Cu1 and Cu2 as shown in Fig. 1(b). Therefore, the NNN DM interaction can be nonzero. In fact, the DM vector defined by $\mathbf{D}_{ij} \propto \mathbf{r}_{\perp} \times \mathbf{r}_{ij}$ for the NNN bond, if nonzero, must lie within the ab plane. We note that this mistake does not affect the rest of the article.

FIG. 1. The NNN bond shows that there is no inversion center between Cu1 and Cu2.