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## **Electronic supporting information**

## Odd-even effects of an asymmetric dimer on the double-twist structure in an amorphous blue phase

## Tetsu Hirose<sup>*a,b*</sup> and Atsushi Yoshizawa<sup>*\*a*</sup>

<sup>a</sup>Department of Frontier Materials Chemistry, Graduate School of Science and Technology, Hirosaki University, 3 Bunkyo-cho, Hirosaki, Aomori, 036-8561, Japan E-mail: ayoshiza@hirosaki-u.ac.jp <sup>b</sup>Tohoku Chemical Corporation, 1-3-1 Kanda, Hirosaki, Aomori, 036-8655, Japan

1. Fig. S–1 Phase transition behaviour of chiral mixtures consisting of host LC [(90–X) wt%], **I-8** (X wt%), and **ISO–(60BA)**<sub>2</sub> (10 wt%).

2. Fig. S–2 Optical transmittances of the mixture consisting of host LC (88.4 wt%), **I–8** (1.6 wt%) and **ISO–(60BA)**<sub>2</sub> (10 wt%) as a function of an AC field at 60 Hz in the induced cubic BP at 65 °C. Circles show transmittances when the electric filed was set at 0° to the analyzer. Triangles show those when the electric filed was set at 45° to the polarizing axis of both polarizers.



Fig. S–1 Phase transition behaviour of chiral mixtures consisting of host LC [(90–X) wt%], **I-8** (X wt%), and **ISO–(60BA)**<sub>2</sub> (10 wt%).



Fig. S–2 Optical transmittances of the mixture consisting of host LC (88.4 wt%), I–8 (1.6 wt%) and ISO–(6OBA)<sub>2</sub> (10 wt%) as a function of an AC field at 60 Hz in the induced cubic BP at 65 °C. Circles show transmittances when the electric filed was set at 0° to the analyzer. Triangles show those when the electric filed was set at 45° to the polarizing axis of both polarizers.