Oral Presentation

[OLED3]OLED Display

Chair: Taishi Tsuji (NIPPON STEEL Chemical &Material)
Co-Chair: Masaya Adachi (Japan Display Inc)
Wed. Nov 27, 2019 5:00 PM - 6:25 PM Room 204 (2F)

5:20 PM - 5:40 PM

[OLED3-2]An Investigation on the Effect of Bending on the Circular Polarizer of an Organic Light Emitting Diode Display

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Keywords:OLED, circular polarizer, retardation, the slow axis, QWP film

This work reports the experimental research results of the retardation change of a reactive mesogen type quarter-wave plate (QWP) by bending when the slow axis the QWP is oriented with the bending axis according to perpendicular or parallel directions. Moreover, the effect of the retardation changes on the antireflective properties of a quasi-circular polarizer taken accounts for an organic light-emitting diode in the simulation. Based on the obtained results, we assign that the light leakage reduced gradually with bending effect in the vertical viewing orientation, while it was increased in the horizontal viewing direction regardless of the orientation of the slow axis.