

US 20240237419A

(19) United States

(12) Patent Application Publication HONG et al.

(10) Pub. No.: US 2024/0237419 A9

(48) **Pub. Date: Jul. 11, 2024 CORRECTED PUBLICATION**

(54) DISPLAY PANEL AND DISPLAY DEVICE

(71) Applicant: Samsung Display Co., Ltd., Yongin-si

(72) Inventors: **SUNGJIN HONG**, Yongin-si (KR);

YOOMIN KO, Yongin-si (KR); SUNHO KIM, Yongin-si (KR); Hyewon KIM, Yongin-si (KR); JUCHAN PARK, Yongin-si (KR); PILSUK LEE, Yongin-si (KR); CHUNG SOCK CHOI, Yongin-si

(KR)

(73) Assignee: Samsung Display Co., Ltd., Yongin-si

(KR)

(21) Appl. No.: 18/489,979

(22) Filed: Oct. 19, 2023

Prior Publication Data

(15) Correction of US 2024/0138200 A1 Apr. 25, 2024See (22) Filed.See (30) Foreign Application Priority Data.

(65) US 2024/0138200 A1 Apr. 25, 2024

(30) Foreign Application Priority Data

Oct. 21, 2022 (KR) 10-2022-0136376

Publication Classification

(51) Int. Cl. H10K 59/122 (2006.01) H10K 50/822 (2006.01) H10K 50/844 (2006.01) H10K 59/131 (2006.01)

(52) U.S. Cl.

CPC *H10K 59/122* (2023.02); *H10K 50/822* (2023.02); *H10K 50/844* (2023.02); *H10K 59/131* (2023.02)

(57) ABSTRACT

A display device includes a display panel including a first region, a second region, and a third region. The display panel includes a plurality of light emitting devices disposed in the first electrode, and each including a first electrode, an intermediate layer disposed on the first electrode, and a second electrode disposed on the intermediate layer, a separator including a pixel boundary portion disposed in the first region, a peripheral partition portion disposed in the second region, and a peripheral boundary portion disposed in the first region and the third region, and a plurality conductive pattern layers disposed in the second region. A plurality of second electrodes of the plurality of light emitting devices are electrically separated by the pixel boundary portion, and the plurality of conductive pattern layers are electrically separated by the peripheral partition portion.

