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ACCEPTED MANUSCRIPT

Development of a Touch Sensor Capable of Touch and Touch Load Recognition

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Highlights

- A 10 inch-sized touch sensor for detecting touch and touch loads, simultaneously, was designed and manufactured using transparent electrode material.
- The touch sensor consists of 32 transmit lines for signal application, 47 receive lines for signal detection, and two ground-line channels. It is 183 mm in width and 234 mm in length.
- The cells that sense the touch and touch load are separated from each other. Hence, multitouch and multiforce sensing, which is difficult to implement with conventional touch screen sensors, is possible.
- Additionally, the dynamic characteristics of the touch load are evaluated through a load application system.

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