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(12) **United States Patent**
Yu

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(54) **SQUELCH DETECTION CIRCUIT**

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(*) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 700 days.

(21) Appl. No.: **09/957,985**

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(30) **Foreign Application Priority Data**

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(51) **Int. Cl.**⁷ **H04B 1/10**

(52) **U.S. Cl.** **455/222; 455/218; 375/351; 327/551**

(58) **Field of Search** **455/222, 218, 455/550, 557, 556; 327/551; 330/258, 69**

(56) **References Cited**

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(57) **ABSTRACT**

Disclosed is a transmission envelope detector referred to a squelch detection circuit for effectively detecting an element of transmission data in a high speed serial data transmission system. The squelch detection circuit of the invention includes a differential input level shifter, a first reference voltage generator, an amplifier, a second reference voltage generator, and a comparator. The squelch detection circuit can detect whether the transmission data is a noise or signal element even at a cross point of the transmission data, resulting in achieving stable data transmission.

8 Claims, 4 Drawing Sheets

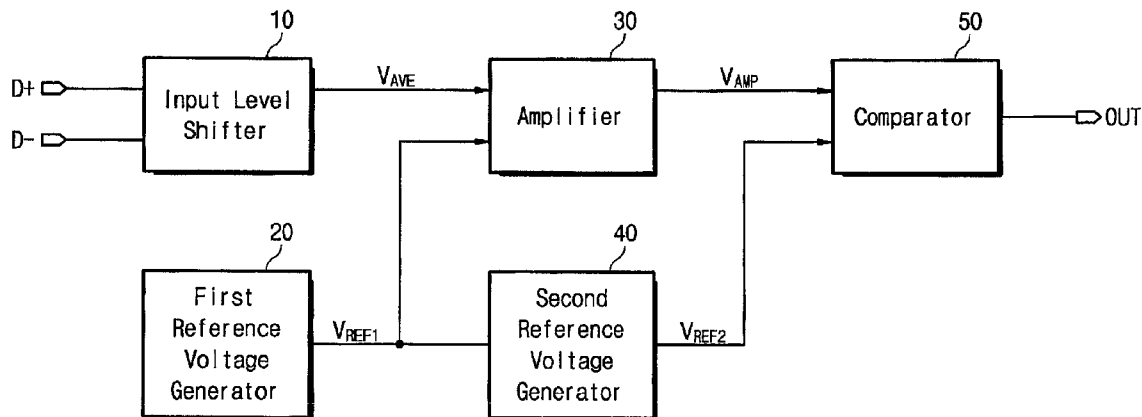


Fig. 1

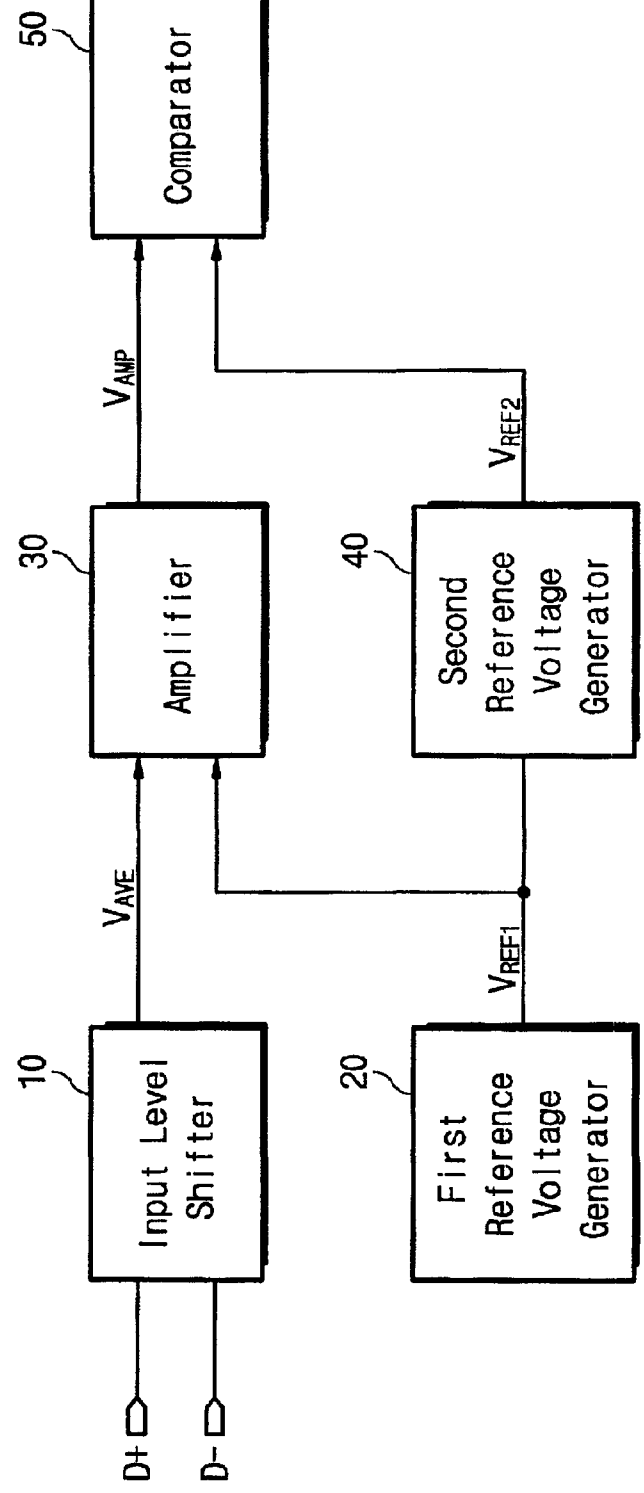


Fig. 2

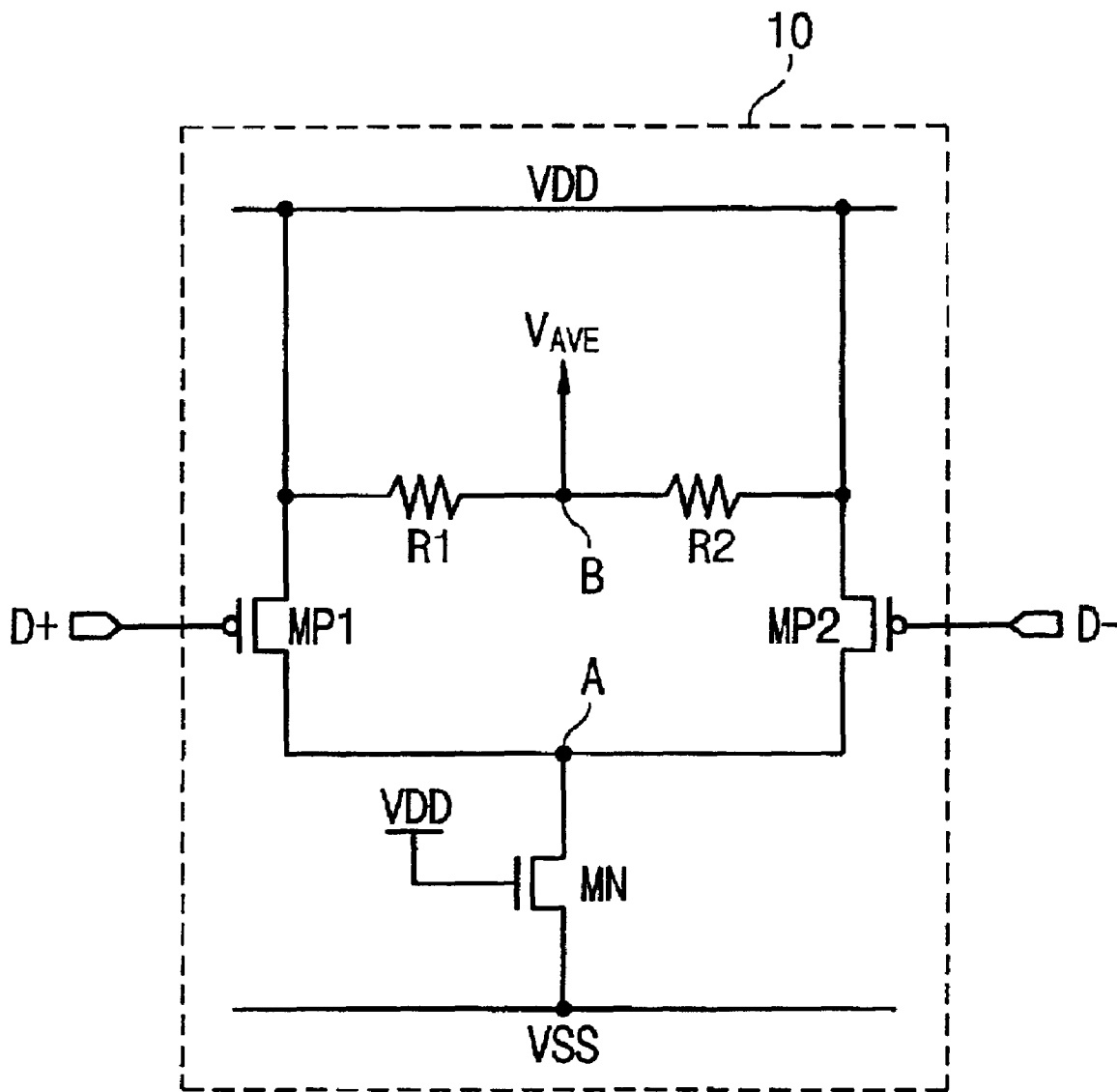


Fig. 3

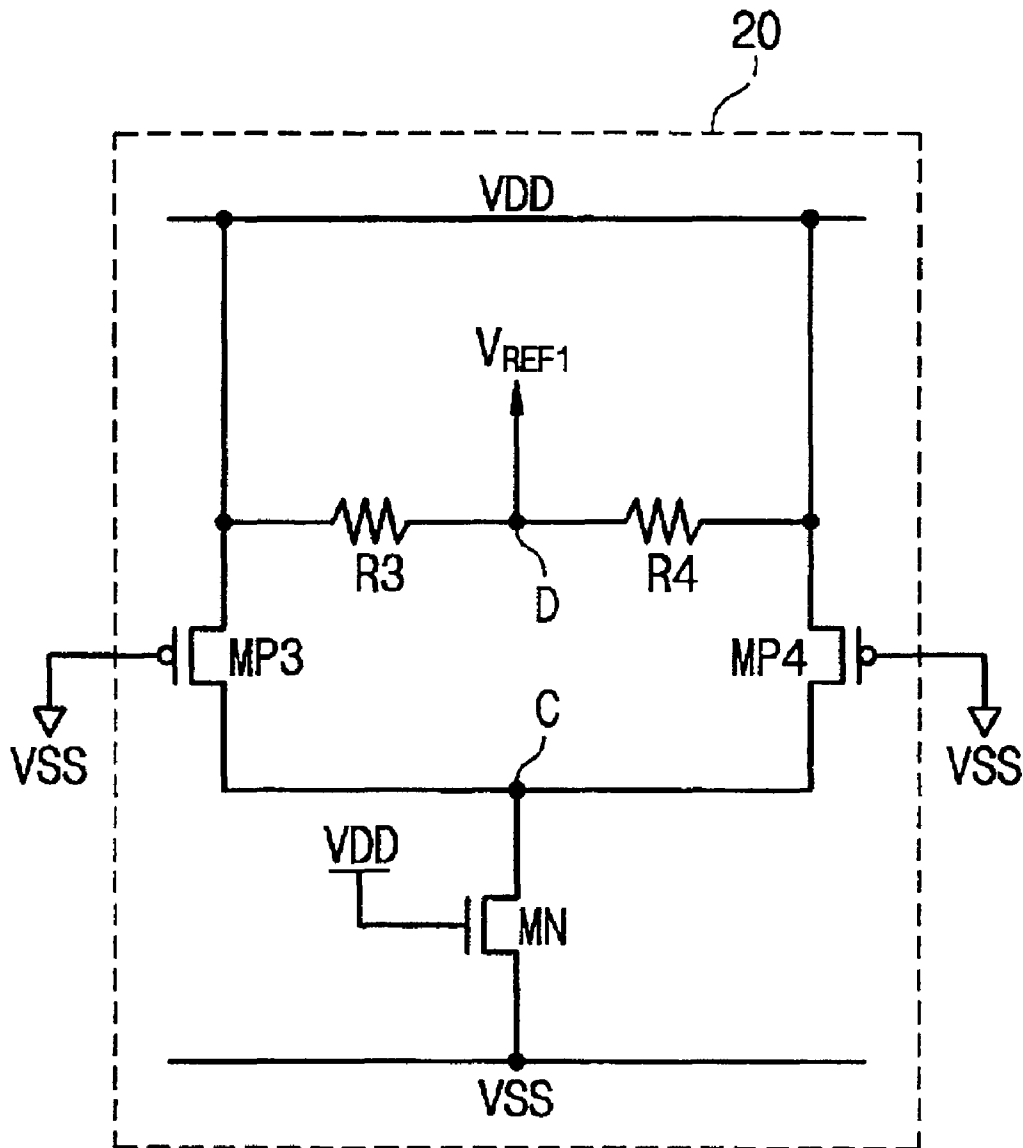


Fig. 4

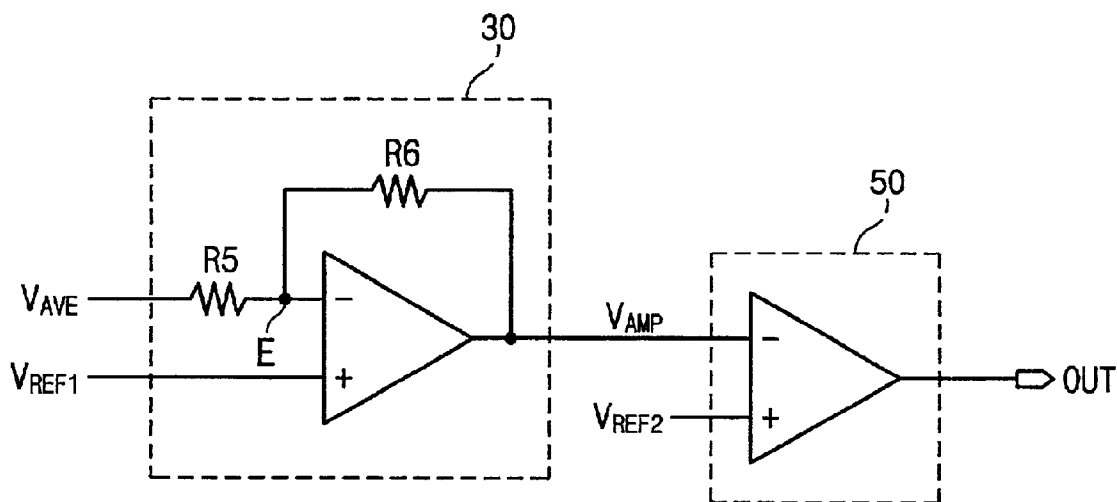
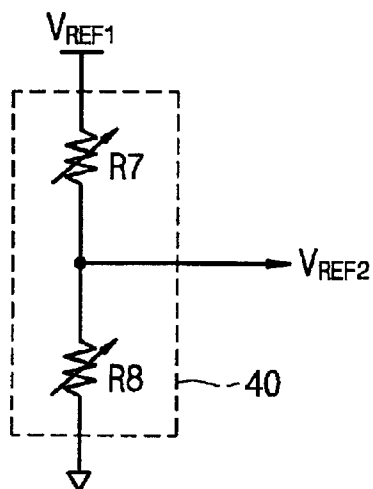


Fig. 5



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