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(54) GATE DRIVE DEVICE

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(57) **ABSTRACT**

A gate drive device drives a gate of each of two semiconductor switching elements constituting upper and lower arms of a half bridge circuit. The gate drive device detects a peak value of an element voltage that is a voltage of a main terminal of one of the two semiconductor switching elements, as one semiconductor switching element, or a change rate of the element voltage during a change period in which the element voltage changes. The gate drive device determines whether an energization to the one semiconductor switching element during the change period is a forward energization in which a current flows in a forward direction or a reverse energization in which the current flows in a reverse direction.