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Lau

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(54) **HVAC FAN CONTROLLER**

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(58) **Field of Classification Search**

None

See application file for complete search history.

(56) **References Cited**

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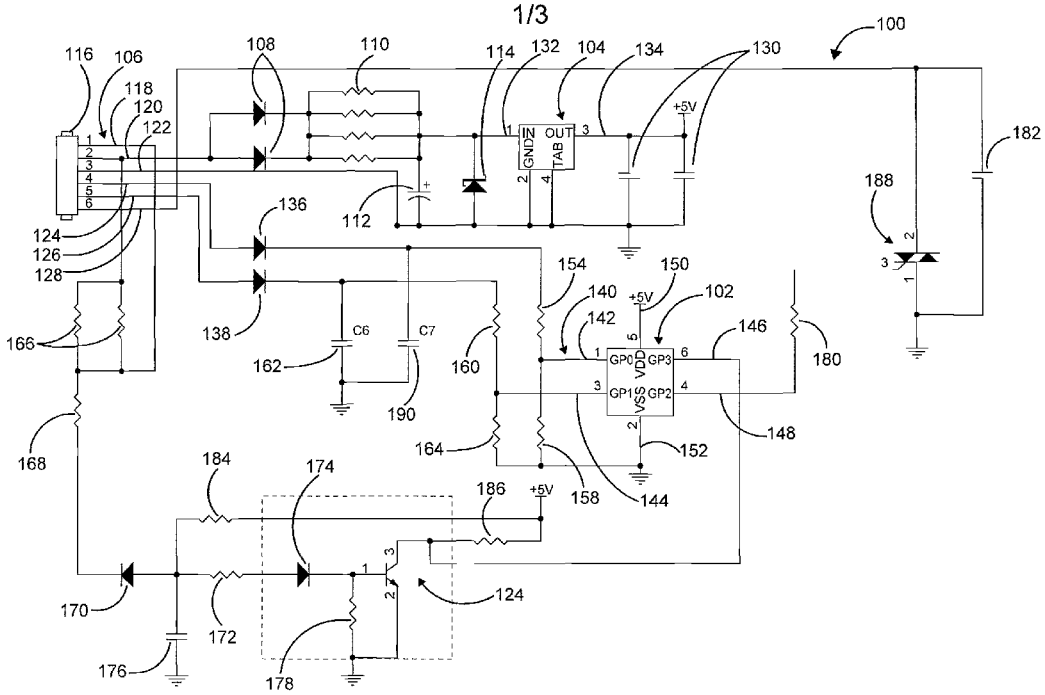
(57) **ABSTRACT**

An integrated efficient fan controller circuit device for controlling a fan of a heating, ventilating and air conditioning (HVAC) system, comprising an input-output port, a voltage regulator, a microprocessor, and a transistor wherein the transistor turns on the microprocessor that sends a trigger signal to the gate of a triac which controls the fan of an HVAC system to switch OFF the HVAC fan operation when the thermostat fan output is in float or unknown state. The proposed circuit avoids the floating state of the thermostat fan output and keeps the HVAC fan either in ON state or in OFF state. The transistor acts as a switch and the collector of the transistor is connected to the input terminal of microprocessor which controls the triac operation. The microprocessor measures the real time temperature of the system and controls the operation of the HVAC fan. The present invention handles the switching OFF of the HVAC fan operation when the thermostat fan is switched to OFF.

19 Claims, 3 Drawing Sheets