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(54) **ENERGY UTILIZATION SYSTEM, AND METHOD FOR MANUFACTURING
CARBON-CONTAINING MATERIAL**

(57) Provided are an energy utilization system and a method for producing a carbon-containing material, each capable of giving a carbon-containing material with a reduced carbon dioxide emission through minimizing the discharge of carbon dioxide. An energy utilization system (1) including: a circulation circuit (30) including a temperature adjustment section (36) that adjusts the temperature of a heating medium by using renewable energy or energy obtained from waste heat, wherein the heating medium circulates in the circulation circuit; and an electrolytic reduction apparatus (70) that performs electrolytic reduction of an electrolytic solution in which carbon dioxide is dissolved, wherein the electrolytic re-

duction apparatus (70) performs electrolytic reduction of the electrolytic solution temperature-adjusted through thermal contact with the heating medium, and the electrolytic reduction apparatus (70) includes: an electrolyzer casing (79) that is cylindrical and extends in a first direction; an anode (71) that is provided within the electrolyzer casing (79) and extends in the first direction; a cathode (72) that is cylindrical and positioned within the electrolyzer casing (79) and on the outside of the anode (71) as viewed in the first direction, and extends in the first direction; and an electrolytic solution passage (73) that allows the electrolytic solution to flow in the first direction between the anode (71) and the cathode (72).

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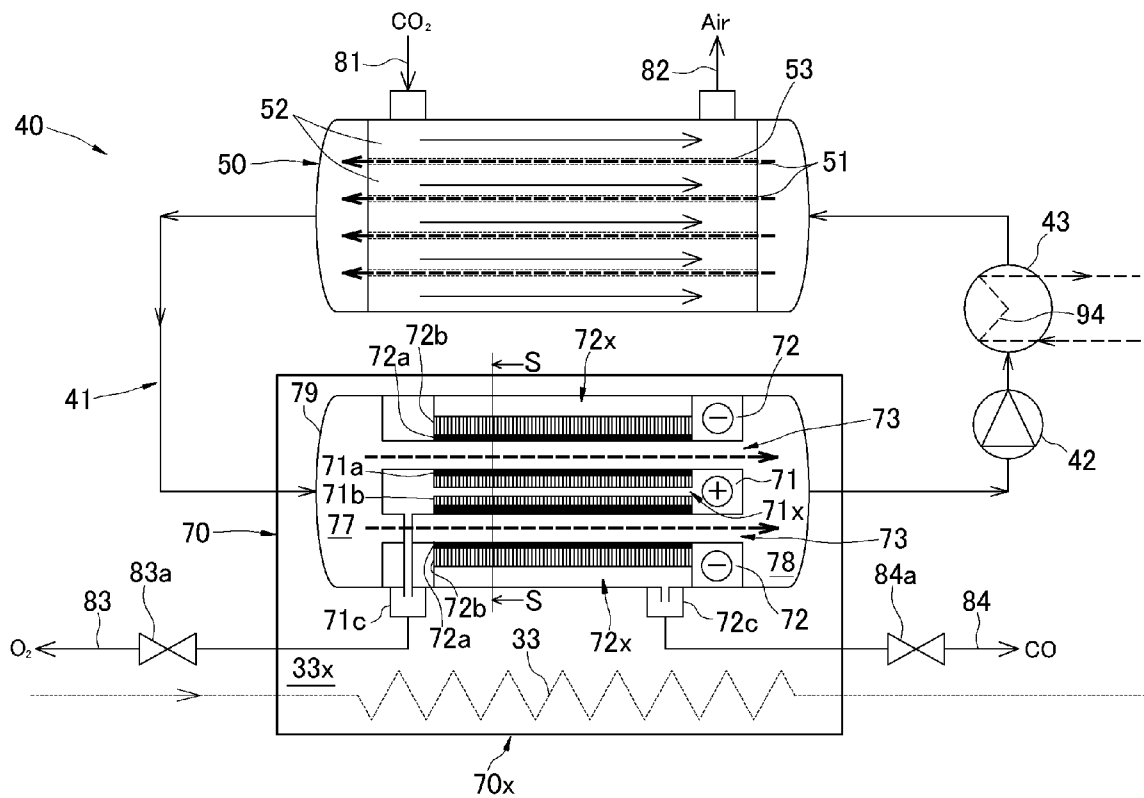


FIG. 2