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(54) Title: RESPIRATORY SUPPORT SYSTEM

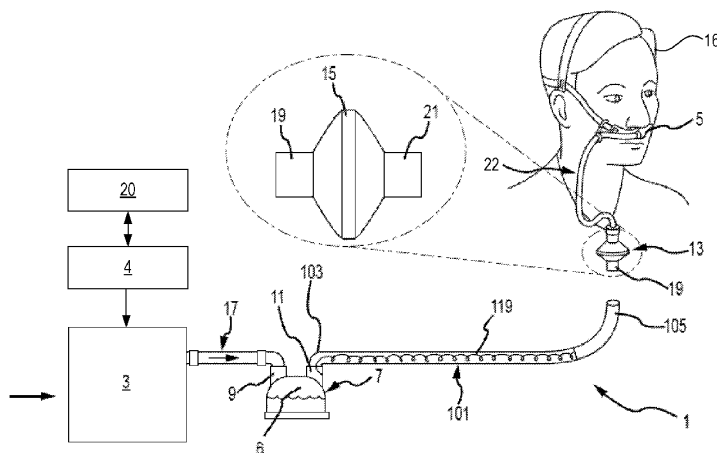


FIG. 1

(57) Abstract: A device for providing respiratory gases comprises a blower configured to receive a first gas from a first gas flow path and generate a flow of a first gas provided through a first gases outlet of the blower; a second gas flow path configured to receive a flow of a second gas and provide the flow of the second gas through a second gases outlet; and a mixing chamber configured to receive a flow of the first gas from the first gases outlet and a flow of the second gas from the second gases outlet. The received gases are configured to mix in the mixing chamber to form a mixed gas. The received gases are configured to travel in a mixing flow direction in the mixing chamber towards a mixed gases inlet, wherein mixed gas exits the mixing chamber via the mixed gases inlet providing flow to a mixed gas flow path.

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