

Title (en)

METHOD TO DETERMINE HEAT TRANSFER EFFICIENCY OF A HEATING DEVICE AND SYSTEM THEREFOR

Title (de)

VERFAHREN ZUR BESTIMMUNG DER WÄRMEÜBERTRAGUNGSEFFIZIENZ EINER HEIZVORRICHTUNG UND SYSTEM DAFÜR

Title (fr)

PROCÉDÉ DE DÉTERMINATION DE L'EFFICACITÉ DE TRANSFERT THERMIQUE D'UN DISPOSITIF DE CHAUFFAGE ET SYSTÈME POUR CELUI-CI

Publication

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Application

EP 14903170 A 20140929

Priority

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Abstract (en)

[origin: WO2016053234A1] To determine the heat output efficacy of a heating device such as a convective warming blanket, a conduit structure is constructed to have coiled metal tubings that form the head, torso and other non-moving parts of a person analog. Flexible tubings interconnect the metal tubings to establish a continuous conduit between an inlet and an outlet of the structure, so that a fluid having a particular heat capacity may flow uninterrupted through the conduit structure. Respective temperature sensors at the inlet and outlet measure the input and output temperatures of the fluid. Using the flow rate, the heat capacity and the respective temperatures of the fluid measured at the inlet and outlet, the heat output efficiency of the blanket may be calculated. A FLIR camera may be used to obtain an IR image to confirm the heat output efficiency of the blanket.

IPC 8 full level

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Citation (search report)

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