

Title (en)
FIN TUBE HEAT EXCHANGER

Title (de)
WÄRMETAUSCHER MIT GERIPPTEN RÖHREN

Title (fr)
ÉCHANGEUR DE CHALEUR À TUBE À AILETTES

Publication
EP 2767791 B1 20190515 (EN)

Application
EP 12840153 A 20121010

Priority
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• JP 2012006469 W 20121010

Abstract (en)
[origin: EP2767791A1] A fin tube heat exchanger (100) includes fins (31) and heat transfer tubes (21). Each of the fins (31) has a flat portion (35), a first inclined portion (36), and a second inclined portion (38). A length of the fin (31) in a gas flow direction is defined as S1, a center-to-center distance between the heat transfer tubes in a row direction is defined as S2, a diameter of the flat portion (35) is defined as D1, a flat plane passing through an upstream end and a downstream end of the fin (31) in the gas flow direction is defined as a reference plane H1, an angle between the reference plane H1 and the first inclined portion (36) is defined as α_1 , an angle between the reference plane H1 and the second inclined portion (38) is defined as α_2 , and a distance from the reference plane H1 to the flat portion (35) is defined as \pm . The fin tube heat exchanger (100) satisfies a relationship: $\tan^{-1} \{(S1 \cdot \tan \alpha_1 \pm 2\pm)/(S2 - D1)\} \leq \alpha_2 < 80^\circ - \alpha_1$.

IPC 8 full level
F28F 1/32 (2006.01)

CPC (source: EP)
F28D 1/0477 (2013.01); **F28F 1/32** (2013.01); **F28F 1/325** (2013.01)

Cited by
EP3018439A1; US2016123681A1; US10072898B2

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DOCDB simple family (publication)
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