

Title (en)  
IN-LINE FLUID HEATER

Title (de)  
INLINE-FLÜSSIGKEITSERHITZER

Title (fr)  
APPAREIL DE CHAUFFAGE DE FLUIDE EN LIGNE

Publication  
**EP 3601898 A1 20200205 (EN)**

Application  
**EP 18716350 A 20180321**

Priority  
• US 201715467567 A 20170323  
• IB 2018051897 W 20180321

Abstract (en)  
[origin: US2018274817A1] An inline fluid heater is disclosed, comprising: an inlet operable to receive a fluid to be heated; a substrate defining at least one conduit fluidly coupled with the inlet to receive the fluid; a positive thermal coefficient heater thermally coupled with the substrate and operable to heat the substrate to provide a heated fluid by heating the fluid within the at least one conduit; and an outlet fluidly coupled with the at least one conduit and operable to provide the heated fluid. In this way, a compact, cost-effective and efficient heater is provided which avoids the need for safety devices or safety circuits, as the positive thermal co-efficient heaters are self-limiting.

IPC 8 full level  
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CPC (source: EP GB KR US)  
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**F24H 2250/04** (2013.01 - EP KR US); **H05B 2203/02** (2013.01 - EP KR US); **H05B 2203/021** (2013.01 - EP KR US)

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