

Title (en)
Heated roll

Title (de)
Heizwalze

Title (fr)
Cylindre chauffant

Publication
EP 0768424 A2 19970416 (DE)

Application
EP 96115816 A 19961002

Priority
DE 19538236 A 19951013

Abstract (en)
A steam-heated roller has pref. peripheral machined holes (4) at least approximately parallel to the roller axis for heat supply and removal, and discharge tubes or drilled holes (7) running from the machined holes radially towards the roller centre for condensate drainage. The radial tubes etc. are designed so that they cause mixing or spinning of steam and condensate. Also claimed is a process for control of the steam throughput and the condensate discharge using the above roller. The pressure difference between steam inlet and outlet for each peripheral machined hole is controlled in relation to the required heat production, the steam pressure or the roller rotation speed so that the percentage composition of excess steam which emerges with the condensate comes under 20, pref. between 5 and 15 wt.%.

Abstract (de)
In einer dampfbeheizten Walze mit peripheren achsparallelen Bohrungen wird der gleichmäßige Dampfdurchfluß und die störungsfreie Ableitung des sich bildenden Kondensats dadurch herbeigeführt, daß die Ableitungsrohre oder -bohrungen für das Kondensat so ausgebildet werden, daß eine Vermischung von Dampf und Kondensat sichergestellt wird. <IMAGE>

IPC 1-7
D21F 5/02; **D21F 5/10**; **D21G 1/02**

IPC 8 full level
F16C 13/00 (2006.01); **D21F 3/02** (2006.01); **D21F 5/02** (2006.01); **D21F 5/10** (2006.01); **D21G 1/02** (2006.01)

CPC (source: EP US)
D21F 5/028 (2013.01 - EP US); **D21F 5/10** (2013.01 - EP US); **D21G 1/0266** (2013.01 - EP US); **F28F 5/02** (2013.01 - EP US); **F28F 9/026** (2013.01 - EP US)

Cited by
EP1029976A1; EP0942097A1; CN106945347A; US6128827A; EP0903438A3; EP0924339A3

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