

Title (en)

An acoustic ink jet printhead design and method of operation utilizing ink cross-flow

Title (de)

Entwurf eines akustischen Tintenstrahldruckkopfes und Verfahren zum Betrieb mit Tintenfluss in Querrichtung

Title (fr)

Conception d'une tête d'impression à jet d'encre acoustique et procédé de fonctionnement utilisant le flux transversal d'encre

Publication

EP 1070586 A2 20010124 (EN)

Application

EP 00115326 A 20000714

Priority

- US 36103599 A 19990723
- US 35952099 A 19990723

Abstract (en)

A droplet emitter with an array of droplet emitting devices constructed such that a flowing liquid used create the droplets can flow through the droplet emitter at higher flow rates. The higher flow rates prevent excess heat absorption during the droplet emission process and allow for excess heat generated by control electronics to be transferred to the flowing liquid after droplet emission but before it leaves the droplet emitter. This prevents excess heat build-up within the droplet emitter and allows for higher more accurate droplet emission. <IMAGE>

IPC 1-7

B41J 2/04

IPC 8 full level

B41J 2/175 (2006.01); **B41J 2/015** (2006.01); **B41J 2/045** (2006.01); **B41J 2/055** (2006.01); **B41J 2/14** (2006.01)

CPC (source: EP)

B41J 2/14008 (2013.01); **B41J 2202/08** (2013.01)

Citation (applicant)

- US 5565113 A 19961015 - HADIMIOGLU BABUR B [US], et al
- US 5786722 A 19980728 - BUHLER STEVEN A [US], et al
- US 5389956 A 19950214 - HADIMIOGLU BABUR B [US], et al

Cited by

US6484975B1; EP1095771A3

Designated contracting state (EPC)

DE FR GB

DOCDB simple family (publication)

EP 1070586 A2 20010124; **EP 1070586 A3 20010314**; **EP 1070586 B1 20080924**; BR 0003104 A 20010313; CA 2313710 A1 20010123; CA 2313710 C 20040217; DE 60040318 D1 20081106; JP 2001038901 A 20010213; JP 4467725 B2 20100526

DOCDB simple family (application)

EP 00115326 A 20000714; BR 0003104 A 20000724; CA 2313710 A 20000711; DE 60040318 T 20000714; JP 2000214071 A 20000714