

Title (en)
Condenser for vehicle air-conditioning systems

Title (de)
Verflüssiger für Fahrzeugklimaanlagen

Title (fr)
Condenseur pour systèmes de climatisation de véhicules

Publication
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Application
EP 99830758 A 19991206

Priority
IT TO981076 A 19981223

Abstract (en)
A condenser for air conditioning systems for vehicles, comprising a pair of distributors (16, 18) and a plurality of tubes (14a-14n) extending between the distributors and having end portions (22a-22n) inserted into corresponding apertures (20) formed in the lateral walls of the distributors (16, 18). At least one of said tubes (14a-14n) has an end portion (22d, 22l, 22g) which divides the respective distributors (16, 18) in two chambers (16a, 16b, 16c, 18a, 18b). Said end portion (22d, 22l, 22g) has an aperture (28) in its lateral wall which puts the tube (14d, 14c, 14l) in fluid communication with only one of said chambers (16a, 16b, 16c, 18a, 18b). <IMAGE>

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Citation (search report)

- [XY] US 5299635 A 19940405 - ABRAHAM ANTHONY W [US]
- [Y] US 4960169 A 19901002 - GRANETZKE DENNIS [US]
- [X] US 5318111 A 19940607 - YOUNG DARRYL L [US], et al
- [A] US 5233756 A 19930810 - LE GAUYER PHILIPPE [FR]
- [XA] PATENT ABSTRACTS OF JAPAN vol. 015, no. 081 (M - 1086) 25 February 1991 (1991-02-25)
- [A] PATENT ABSTRACTS OF JAPAN vol. 007, no. 031 (M - 192) 8 February 1983 (1983-02-08)

Cited by
US9267737B2; CN108954922A; CN108954921A; CN103003653A; EP1580513A1; EP1557630A1; US2011315363A1; DE102005016941A1; DE10123347B4; WO2004023056A1; WO2012006073A3

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