

Title (en)
Silencer for a compressed-air system.

Title (de)
Schalldämpfer für Druckluftanlage.

Title (fr)
Silencieux pour installation d'air comprimé.

Publication
EP 0127550 A2 19841205 (FR)

Application
EP 84401109 A 19840530

Priority
FR 8309011 A 19830531

Abstract (en)
1. A silencer for a compressed air installation of the type including baffles (7, 8, 28) prolongating the path of travel of the flux of air with at least one portion of the chamber of the chamber defined by a perforated wall (5) maintaining a filling (6) of absorbing material, the baffles (7, 28) being formed with orifices (13; 27, 27', 33) separating the global flux of air into elementary streams of reduced section, the orifices (13; 27, 27', 33) and the baffles (7, 8, 28) being placed such that the streams collide against the wall of at least some of the adjacent baffles (7, 28) and/or against each other and are brought in contact with said perforated wall (5) maintaining the filling of absorbing material, characterized in that it includes means (12; 27, 27') providing for a return of said streams of air along path of travel portions which are substantially parallel but in an opposite direction with respect to the general circulation direction, the circulation in contact with the perforated wall (5) being effected according to a total path of travel which is close to the length of the silencer.

Abstract (fr)
La présente invention concerne un silencieux pour installation d'air comprimé du type comportant des chicanes (7, 8, 28, 36, 38) allongeant le trajet du flux d'air avec au moins une partie de la chambre délimitée par une paroi perforée (5) maintenant un bourrage (6) en un matériau absorbant. Conformément à l'invention les chicanes (7, 28, 36) sont disposées pour obliger le flux gazeux à circuler sous forme d'une veine de section réduite au contact de la paroi perforée (5) maintenant le bourrage (6) en matériau absorbant et de préférence le flux global est subdivisé en flux élémentaires par passage à travers des perforations de parois perforées (28, 34) parallèles à la direction générale d'écoulement du flux, les perforations assurant un même passage étant échelonnées pour que les flux partiels des perforations aval entrent en collision avec les flux ayant traversé par les perforations amont. Le silencieux assure notamment un meilleur amortissement des aigus.

IPC 1-7
F01N 1/10; F01N 3/02

IPC 8 full level
F01N 1/08 (2006.01); **F01N 1/10** (2006.01); **F01N 3/00** (2006.01); **F01N 3/02** (2006.01); **F01N 3/021** (2006.01); **F01N 3/033** (2006.01); **F01N 3/037** (2006.01)

CPC (source: EP)
F04B 39/0061 (2013.01)

Cited by
EP0316637A1; CN110526409A; EP1383989A4; FR2785360A1; RU202358U1; FR2609108A1; US6604604B1; US6926117B2; US7216739B2; WO2005116409A1; KR101232472B1; EP1191195B1

Designated contracting state (EPC)
AT BE CH DE FR GB IT LI LU NL SE

DOCDB simple family (publication)
EP 0127550 A2 19841205; EP 0127550 A3 19861230; EP 0127550 B1 19900228; AT E50621 T1 19900315; DE 3481438 D1 19900405; FR 2546970 A1 19841207; FR 2546970 B1 19870925

DOCDB simple family (application)
EP 84401109 A 19840530; AT 84401109 T 19840530; DE 3481438 T 19840530; FR 8309011 A 19830531