

Title (en)  
LUNG-CONTROLLED DIAPHRAGM FOR BREATH PROTECTION MASKS

Publication  
**EP 0221525 B1 19910123 (DE)**

Application  
**EP 86115184 A 19861103**

Priority  
DE 3539668 A 19851108

Abstract (en)  
[origin: US4715371A] A lung-controlled diaphragm valve for respirator masks includes a device for creating a positive pressure in the interior of the mask, the device includes a tilting lever which by spring elements can be moved from a dead center position into a first pressure position exerting a force on the diaphragm or into a second disconnecting pressure position lifting the diaphragm off the valve lever. During the entire respiration cycle a positive pressure continuously prevails in the interior of the mask, it being prevented also that, by the movement of the diaphragm, the tilting lever can be brought into a stable disconnecting position. In addition, after use, an intentional disconnecting of the positive pressure is possible. To this end it is provided that the diaphragm has a tappet for the tilting lever which protrudes into the outer chamber of the valve. The residual stroke (a) of the tappet, when the inlet valve is closed is smaller than the residual tilting path (b) of the tilting lever between its pressure position and its dead center position. The outer chamber housing has an actual element by which the tilting lever is moveable against an end piece of the tappet.

IPC 1-7  
**A62B 9/02**

IPC 8 full level  
**A62B 9/02** (2006.01); **A62B 18/10** (2006.01)

CPC (source: EP US)  
**A62B 9/025** (2013.01 - EP US)

Citation (examination)  
US 2790454 A 19570430 - BENZEL HOWARD A

Cited by  
EP0371209A3; EP0334147A1; DE102019108790A1; DE102019108790B4

Designated contracting state (EPC)  
DE FR GB SE

DOCDB simple family (publication)  
**EP 0221525 A2 19870513; EP 0221525 A3 19880921; EP 0221525 B1 19910123**; AU 582285 B2 19890316; AU 6494686 A 19870514; BR 8605514 A 19870811; CA 1285453 C 19910702; CN 86107621 A 19870805; CN 86107621 B 19880803; DE 3539668 A1 19870521; DE 3539668 C2 19891102; DE 3677133 D1 19910228; JP H031034 B2 19910109; JP S62114569 A 19870526; SU 1489576 A3 19890623; US 4715371 A 19871229; ZA 868190 B 19870624

DOCDB simple family (application)  
**EP 86115184 A 19861103**; AU 6494686 A 19861107; BR 8605514 A 19861107; CA 522418 A 19861107; CN 86107621 A 19861108; DE 3539668 A 19851108; DE 3677133 T 19861103; JP 26414686 A 19861107; SU 4028317 A 19861020; US 92435886 A 19861028; ZA 868190 A 19861028