

Title (en)  
PNEUMATICALLY OPERATED FASTENER DRIVING TOOL

Publication  
**EP 0297156 B1 19900411 (DE)**

Application  
**EP 87109438 A 19870701**

Priority  
EP 87109438 A 19870701

Abstract (en)  
[origin: EP0297156A1] 1. A pneumatically operated driving tool for fasteners comprising a working cylinder, a working piston within said working cylinder connected to a driver or the like, stop means in said working cylinder limiting the working stroke of said working piston, a control valve adapted to be actuated by a trigger, a working space above said working piston when said piston is in its upper dead point position, said control valve being adapted to alternately connecting said working space with a pressurized air source or with atmosphere, respectively, a piston return chamber surrounding said working cylinder and connected thereto by a first opening adjacent said stop means, and a second opening spaced from said stop means, characterized by said working piston having a smaller diameter than said working cylinder, an annular piston being sealingly displaceable on said driver and sealingly engaging the wall of said working cylinder, said annular piston sealingly engaging said working piston in said upper dead point position, the proportion of the effective areas and the masses of said working piston and said driver blade on one side and of said annular piston on the other side being such that the acceleration of said annular piston during the working stroke is not larger than that of the working piston.

IPC 1-7  
**B25C 1/04**

IPC 8 full level  
**B25C 1/00** (2006.01); **B25C 1/04** (2006.01)

CPC (source: EP US)  
**B25C 1/005** (2013.01 - EP US); **B25C 1/041** (2013.01 - EP US); **B25C 1/047** (2013.01 - EP US)

Cited by  
EP0502667A1; US5931622A; US5733085A; KR20030017281A; FR2661353A1; US5836732A; EP0661140A1

Designated contracting state (EPC)  
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