

Title (en)  
SPARK GAP WITH A GAS-FILLED HOUSING

Publication  
**EP 0099522 B2 19900314 (DE)**

Application  
**EP 83106677 A 19830707**

Priority  
DE 3227668 A 19820723

Abstract (en)  
[origin: EP0099522A2] 1. A spark gap for a spark plug of an Otto carburetor engine comprising a cylindrical gas-filled housing (1) which possesses two oppositely and coaxially arranged electrodes (2), where the electrodes (2) are connected to the housing (1) so as to be vacuum-tight, where the housing (1) is filled with an inert gas, where a pressure of several bar prevails in the housing (1) and where the electrode spacing amounts to approximately 0.5 mm, characterised in that the electrodes (2) respectively consist of a soldering flange (4), a thin-walled part (5) which is shaped like a truncated cone and a solid part (7), that the cylindrical housing (1) has end faces (3), that the soldering flanges (4) adjoin the end faces (3) so as to be vacuum-tight, that the part shaped like a truncated cone and the solid part protrude into the housing, that the solid part has an end face (8) and an adjoining, rounded or chamfered edge, that the end faces of the two electrodes form a discharge gap, that the electrodes (2) consist of a material of low gas content, that an ignition aid (10) is secured to the inner wall of the housing (1) in the region of the discharge gap, that the inert gas comprises 97% by weight of N<sub>2</sub>, that the pressure in the housing is approximately 15 bar and that the sum of the spacings of the ignition aid (10) from the electrode edges (11) is greater than the electrode spacing.

IPC 1-7  
**H01T 3/00**; **H01T 1/20**

IPC 8 full level  
**H01T 2/02** (2006.01); **H01T 1/20** (2006.01); **H01T 4/12** (2006.01); **H01T 13/00** (2006.01)

CPC (source: EP)  
**H01T 1/20** (2013.01); **H01T 4/12** (2013.01)

Cited by  
EP0229303A1; EP0407975A3; US5166574A; US5142194A; DE3723571A1; WO8704017A1

Designated contracting state (EPC)  
CH DE FR GB IT LI SE

DOCDB simple family (publication)  
**EP 0099522 A2 19840201**; **EP 0099522 A3 19840704**; **EP 0099522 B1 19870211**; **EP 0099522 B2 19900314**; DE 3227668 A1 19840126; DE 3369813 D1 19870319; JP S5933779 A 19840223

DOCDB simple family (application)  
**EP 83106677 A 19830707**; DE 3227668 A 19820723; DE 3369813 T 19830707; JP 13178383 A 19830719