

Title (en)

Cylinder liner for a uniflow type two cycle internal combustion engine.

Title (de)

Zylinderbüchse einer Zweitaktbrennkraftmaschine vom Gleichstromtyp.

Title (fr)

Chemise de cylindre pour un moteur à combustion interne du type équicourant.

Publication

**EP 0108706 A2 19840516 (EN)**

Application

**EP 83730100 A 19831021**

Priority

- JP 19250982 A 19821104
- JP 19596782 A 19821110

Abstract (en)

An improved cylinder liner for an uniflow type two cycle internal combustion engine of the type including a number of scavenging holes formed thereon in an equally spaced relation in the peripheral direction is disclosed, wherein the improvement consists in that the centre line (Y1 - Y1) extending across the outer opening of the scavenging holes on the outer peripheral surface of the cylinder liner is inclined in the opposite direction to that of the swirl flow S and the upper swirl angle ( theta 2) is determined larger than the lower swirl angle ( theta min 2) so that an air passage extending through each of the scavenging holes is twisted away from the vertical plane. Further, another improved cylinder liner for an uniflow type two cycle internal combustion engine is disclosed, wherein the improvement consists in that each of the scavenging holes comprises a combination of plural circular holes arranged in an end-to-end relation in the substantially axial direction of the cylinder and the linear line (Y1 - Y1) extending through the center (01) of the lowermost hole part and the centre (02) of the uppermost hole part on the outer opening of the scavenging holes on the outer peripheral surface of the cylinder liner is inclined in the opposite direction to that of the scavenging swirl flow S, wherein the upper swirl angle ( theta 3) is determined larger than the lower swirl angle ( theta 1) so that an air passage extending through each of the scavenging holes is twisted away from the vertical plane.

IPC 1-7

**F02F 1/22**

IPC 8 full level

**F02F 1/22** (2006.01); **F02B 75/02** (2006.01)

CPC (source: EP KR)

**F02B 25/00** (2013.01 - KR); **F02F 1/22** (2013.01 - EP); **F02B 2075/025** (2013.01 - EP)

Cited by

EP0198816A3; FR2579267A1; FR3020656A1; FR3020657A1; WO2016016522A1; WO2015170020A3

Designated contracting state (EPC)

CH DE FR GB LI NL SE

DOCDB simple family (publication)

**EP 0108706 A2 19840516**; **EP 0108706 A3 19851218**; **EP 0108706 B1 19880824**; DE 3377804 D1 19880929; DK 157701 B 19900205;  
DK 157701 C 19900625; DK 503283 A 19840505; DK 503283 D0 19831103; KR 840007136 A 19841205

DOCDB simple family (application)

**EP 83730100 A 19831021**; DE 3377804 T 19831021; DK 503283 A 19831103; KR 830004932 A 19831019