

Title (en)

METHOD FOR FORMING A VALVE SEAT ON AN ENDOTHERMIC ENGINE CYLINDER HEAD, AND THE ENGINE WITH VALVE SEATS FORMED BY THIS METHOD

Publication

**EP 0092683 B1 19870225 (EN)**

Application

**EP 83103005 A 19830325**

Priority

IT 6753182 A 19820422

Abstract (en)

[origin: EP0092683A1] The method consists of depositing an added material in a compartment (15) of an engine cylinder head (2) which is constructed of a base material different from the added material and able to form therewith an alloy having a relatively high hardness and strength; then by means of a laser beam heating the added material until it together with an immediately surrounding layer (21) of base material have been melted in order to produce alloying of the added material in this latter; and finally cooling the molten metal alloy thus formed in the compartment (15) in order to produce its rapid solidification therein.

IPC 1-7

**F01L 3/22**; **C23C 24/10**

IPC 8 full level

**C23C 26/02** (2006.01); **F01L 3/22** (2006.01)

CPC (source: EP)

**C23C 26/02** (2013.01); **F01L 3/22** (2013.01)

Cited by

US6138351A; EP0730085A1; US5778531A; EP0743428A1; US5692726A; DE10353474B4; EP0176803A1; GB2169318A; US4698237A; EP0735248A3; US5745993A; EP0727565A1; US5787853A; DE10156196C1; EP0751284A1; US5765520A; EP0723069A1; US5742020A; FR2765915A1; US5768779A; GB2308562A; GB2308562B; EP0228282A3; US6397464B1; US7013858B2; FR2848245A1; WO03042508A1; WO2005047660A1; WO9902839A1

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