

Title (en)
Platinum aluminide coating for cobalt-based superalloys

Title (de)
Platinaluminid-Schicht für Kobaltbasis-Superlegierungen

Title (fr)
Couche d'aluminure au platine pour superalliages à base de cobalt

Publication
EP 1099775 A1 20010516 (EN)

Application
EP 00309637 A 20001101

Priority
US 43851199 A 19991112

Abstract (en)
A method for enhancing oxidation resistance and hot gas corrosion of a Co-based component for use in a gas turbine engine hot section. The Co-based component is aluminided to form a CoAl layer on the surface thereof. A Pt layer is then applied on top of the CoAl layer. The Pt layer is diffused into the CoAl layer to form a PtAl imparting oxidation resistance and hot gas corrosion resistance to the component.

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C23C 10/58

IPC 8 full level
C23C 10/28 (2006.01); **C23C 10/48** (2006.01); **C23C 10/58** (2006.01); **F01D 25/00** (2006.01); **F02C 7/00** (2006.01)

CPC (source: EP)
C23C 10/58 (2013.01)

Citation (search report)

- [A] WO 9203587 A1 19920305 - LIBURDI ENGINEERING [US], et al
- [A] US 3677789 A 19720718 - BUNGARDT KARL, et al
- [X] PATENT ABSTRACTS OF JAPAN vol. 004, no. 129 (C - 024) 10 September 1980 (1980-09-10)

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DE FR GB

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EP 00309637 A 20001101; JP 2000341231 A 20001109