

Title (en)

METHOD OF MANUFACTURE OF METAL MATRIX COMPOSITE MATERIAL INCLUDING INTERMETALLIC COMPOUNDS WITH NO MICROPORES

Publication

EP 0408257 A3 19920429 (EN)

Application

EP 90307379 A 19900705

Priority

- JP 17772189 A 19890710
- JP 24415889 A 19890920
- JP 28225089 A 19891030

Abstract (en)

[origin: EP0408257A2] A metal matrix composite material having uniformly dispersed intermetallic compounds and no micropores is manufactured by forming a porous preform (18) including 60% to 80% by volume fine fragments essentially made of aluminum, 1% to 10% by volume fine fragments essentially made of nickel, copper or both, and 1% to 10% by volume fine fragments essentially made of titanium so that these fine fragments occupy in total 62% to 95% by volume of said preform (18), and at least a part of the preform is contacted with a melt (22) of a matrix metal selected from aluminum, aluminum alloy, magnesium and magnesium alloy, so that the porous preform is infiltrated with the melt under no substantial application of pressure to the melt.

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C22C 1/09

IPC 8 full level

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CPC (source: EP)

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Citation (search report)

- [A] EP 0133191 A2 19850220 - TOYOTA MOTOR CO LTD [JP]
- [APD] EP 0340957 A2 19891108 - TOYOTA MOTOR CO LTD [JP]

Cited by

FR2675063A1; GB2298872A; DE102010061960A1; US6599466B1; WO9925885A1

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