Title (en)

INERT ELECTRODE MATERIAL IN NANOCRYSTALLINE POWDER FORM

Title (de)

INERTES ELEKTRODENMATERIAL IN FORM EINES NANOKRISTALLINEN PULVERS

Title (fr)

MATERIAU INERTE D'ELECTRODE EN FORME DE POUDRE NANOCRISTALLINE

Publication

EP 1466039 A2 20041013 (EN)

Application

EP 02706576 A 20020320

Priority

- CA 0200395 W 20020320
- CA 2341779 A 20010320

Abstract (en)

[origin: WO02075023A2] The invention relates to an inert electrode materil in powder form comprising particles having an avrage particle size of 0.1 to 100 um and each forme of an agglomerate of grains of a ceramic materialand grains of a metal or alloy with each grain of eramic material comprising a nanocrystal of the ceamic material and each grain of metal or alloy comrising a nanocrystal of the metal or alloy. Alterntively, each particle can be formed of an agglomerte of grains with each grain comprising a nanocrysal of a single phase ceeramic material, a metal oran alloy. The electrode material in powder form acording to the invention is useful for the manufactre of inert electrodes having improved thermal shok and corrosion resistance properties.

[origin: WO02075023A2] The invention relates to an inert electrode material in powder form comprising particles having an average particle size of 0.1 to 100 microm and each formed of an agglomerate of grains of a ceramic material and grains of a metal or alloy with each grain of ceramic material comprising a nanocrystal of the ceramic material and each grain of metal or alloy comprising a nanocrystal of the metal or alloy. Alternatively, each particle can be formed of an agglomerate of grains with each grain comprising a nanocrystal of a single phase ceramic material, a metal or an alloy. The electrode material in powder form according to the invention is useful for the manufacture of inert electrodes having improved thermal shock and corrosion resistance properties.

IPC 1-7

C25C 3/12; B22F 9/00; C04B 35/00; C22C 1/04

IPC 8 full level

B22F 1/00 (2006.01); **B22F 9/00** (2006.01); **C04B 35/26** (2006.01); **C04B 35/453** (2006.01); **C22C 1/05** (2006.01); **C25C 3/12** (2006.01)

CPC (source: EP US)

B22F 1/07 (2022.01 - EP US); **B22F 9/005** (2013.01 - EP US); **C04B 35/2666** (2013.01 - EP US); **C04B 35/453** (2013.01 - EP US); B22F 2998/10 (2013.01 - EP US); B22F 2999/00 (2013.01 - EP US)

C-Set (source: EP US)

EP

1. B22F 2999/00 + B22F 9/04 + B22F 2201/11
2. B22F 2999/00 + B22F 1/07 + B22F 9/04
3. B22F 2999/00 + B22F 1/148 + B22F 9/04
4. B22F 2998/10 + B22F 9/04 + B22F 1/12 + B22F 9/04

US

1. B22F 2999/00 + B22F 1/148 + B22F 9/04
2. B22F 2999/00 + B22F 1/07 + B22F 9/04
3. B22F 2999/00 + B22F 9/04 + B22F 2201/11
4. B22F 2998/10 + B22F 9/04 + B22F 1/12 + B22F 9/04

Citation (search report)

See references of WO 02075023A2

Cited by

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Designated contracting state (EPC)

CH DE ES FR GB IT LI

DOCDB simple family (publication)

WO 02075023 A2 20020926; **WO 02075023 A3 20030717**; BR 0208273 A 20040413; CA 2341779 A1 20020920; CN 1498287 A 20040519; EP 1466039 A2 20041013; JP 2004531644 A 20041014; NO 20034198 D0 20030919; NO 20034198 L 20031113; RU 2003130746 A 20050210; US 2004045402 A1 20040311

DOCDB simple family (application)

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