

Title (en)
PHYSICALLY STABILIZED DRY POWDER FORMULATIONS

Title (de)
PHYSIKALISCH STABILISIERTE TROCKENPULVER-ZUBEREITUNGEN

Title (fr)
FORMULATIONS DE POUDRE SECHE PHYSIQUEMENT STABILISEES

Publication
EP 1274400 A1 20030115 (EN)

Application
EP 01922711 A 20010327

Priority

- US 0109711 W 20010327
- US 54712500 A 20000411

Abstract (en)
[origin: WO0176560A1] In a method for making a dry powder formulation for inhalation, a hydrophilic pharmaceutical compound is processed to remove particles having a diameter of less than about 3 microns. A hydrophilic excipient is similarly processed to remove excipient particles having a diameter of less than about 10 microns. The processed pharmaceutical compound and excipient are optionally separately ripened, by exposure to high humidity. They are then blended together to create the formulation, and ripened again, if desired. The removal of fine particles physically stabilizes the formulation. The formulation accordingly provides a consistent respirable dose, even after exposure to high humidity conditions, for long periods of time, such as when a patient opens the packaging of the pharmaceutical, and then uses it over weeks or months.

IPC 1-7
A61K 9/14

IPC 8 full level
A61J 3/02 (2006.01); **A61K 9/00** (2006.01); **A61K 9/14** (2006.01); **A61K 9/72** (2006.01); **A61K 47/10** (2006.01); **A61K 47/26** (2006.01)

CPC (source: EP)
A61K 9/0075 (2013.01); **A61K 9/145** (2013.01)

Citation (search report)
See references of WO 0176560A1

Designated contracting state (EPC)
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE TR

DOCDB simple family (publication)
WO 0176560 A1 20011018; AU 4947901 A 20011023; CA 2404645 A1 20011018; EP 1274400 A1 20030115; JP 2004515260 A 20040527

DOCDB simple family (application)
US 0109711 W 20010327; AU 4947901 A 20010327; CA 2404645 A 20010327; EP 01922711 A 20010327; JP 2001574078 A 20010327