

Title (en)

METHOD FOR FURTHER PROCESSING THE RESIDUE OBTAINED DURING THE PRODUCTION OF FULLERENE AND CARBON NANOSTRUCTURES

Title (de)

VERFAHREN ZUR WEITERVERARBEITUNG DES BEI DER FULLEREN- UND KOHLENSTOFF-NANOSTRUKTUREN-HERSTELLUNG ANFALLENDEN RÜCKSTANDES

Title (fr)

PROCEDE DE RETRAITEMENT DES RESIDUS RESULTANT DE LA PRODUCTION DE NANOSTRUCTURES DE FULLERENE ET DE CARBONE

Publication

EP 1879965 A2 20080123 (DE)

Application

EP 06754848 A 20060425

Priority

- EP 2006061825 W 20060425
- DE 102005019301 A 20050426

Abstract (en)

[origin: DE102005019301A1] The residue is received by ablation of a carbon electrode by arc, laser or solar power, incomplete combustion of hydrocarbons, thermal plasma treatment of carbon powder and condensation of gas forming carbon in an inert or partial inert atmosphere. The carbon is soot, graphite, allotropic carbon or a mixture. The residue is used as hydroxylating agent, wetting agent, additive in rubber compounds, halogenating agent such as chlorine or bromine and oxidizing agent such as potassium permanganate. The residue is converted with ammonia, alkyl or aryl amines and ozone under formation of ozonide and is subjected under cycloaddition, Grignard reaction, electro-chemical reaction, Diels-Alder reaction and fullerene reaction. Donor acceptor Molecule complexes are formed. An independent claim is included for functionalized carbon-containing residue.

IPC 8 full level

C09C 3/06 (2006.01); **C09C 1/56** (2006.01); **C09C 3/08** (2006.01)

CPC (source: EP KR US)

C08K 3/04 (2013.01 - EP US); **C09C 1/485** (2013.01 - EP US); **C09C 1/52** (2013.01 - EP US); **C09C 1/56** (2013.01 - KR); **C09C 1/565** (2013.01 - EP US); **C09C 3/06** (2013.01 - KR); **C09C 3/08** (2013.01 - KR); **B82Y 40/00** (2013.01 - KR); **C01P 2004/04** (2013.01 - EP US)

Citation (search report)

See references of WO 2006114419A2

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

DOCDB simple family (publication)

DE 102005019301 A1 20061102; AU 2006239347 A1 20061102; BR PI0610766 A2 20100720; CA 2606031 A1 20061102; CN 101248143 A 20080820; EA 200702333 A1 20080228; EP 1879965 A2 20080123; JP 2008539152 A 20081113; KR 20080005577 A 20080114; MX 2007013303 A 20080225; TW 200708476 A 20070301; US 2008279749 A1 20081113; WO 2006114419 A2 20061102; WO 2006114419 A3 20070111

DOCDB simple family (application)

DE 102005019301 A 20050426; AU 2006239347 A 20060425; BR PI0610766 A 20060425; CA 2606031 A 20060425; CN 200680014125 A 20060425; EA 200702333 A 20060425; EP 06754848 A 20060425; EP 2006061825 W 20060425; JP 2008508214 A 20060425; KR 20077027333 A 20071123; MX 2007013303 A 20060425; TW 95114911 A 20060426; US 91247106 A 20060425