Title (en)
IMPROVED OZONOLYSIS OF CARBON NANOTUBES

Title (de)
VERBESSERTE OZONOLYSE VON KOHLENSTOFFNANORÖHRCHEN

Title (fr)
OZONOLYSE AMELIOREE DE NANOTUBES DE CARBONE

Publication
EP 1817447 A2 20070815 (EN)

Application
EP 05858262 A 20051021

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- US 2005038116 W 20051021
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Abstract (en)
[origin: WO2006135439A2] Methods of treating single walled and multiwalled carbon nanotubes with ozone are provided. The carbon nanotubes are treated by contacting the carbon nanotubes with ozone at a temperature range between 0°C and 100°C to yield functionalized nanotubes which are greater in weight than the untreated carbon nonotubes. The carbon nonotubes treated according to methods of the invention can be used to prepare complex structures such as three dimensional networks or rigid porous structures which can be utilized to form electordes for fabrication of improved electrochemical capacitors. Useful catalyst supports are prepared by contacting carbon nanotube structures such as carbon nanotube aggregates, three dimensional network or rigid porous structures with ozone in the temperature range between 0°C and 100°C.

IPC 8 full level
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CPC (source: EP KR US)
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Designated contracting state (EPC)
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