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(54) Title: SINGLE WALL CARBON NANOTUBE BASED AIR CATHODES

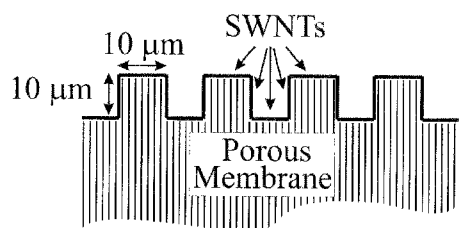


Figure 1A

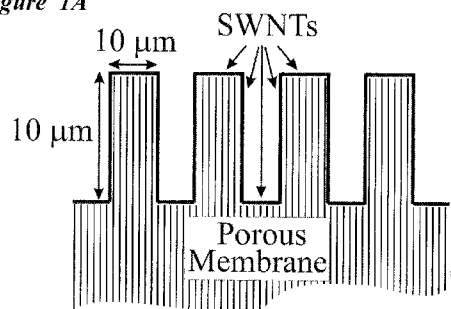


Figure 1B

(57) Abstract: An embodiment of the invention is an air cathode having a porous membrane with at least one hydrophobic surface that contacts a conductive catalytic film that comprises single walled carbon nanotubes (SWNTs) where the nanotubes are in intimate electrical contact. The conductive film can include fullerenes, metals, metal alloys, metal oxides, or electroactive polymers in addition to the SWNTs. In other embodiments of the invention the air cathode is a component of a metal-air battery or a fuel cell.



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