## Abstract Submitted for the NEF17 Meeting of The American Physical Society

Is US Industry losing carbon-free energy to China? PAUL H CARR, AF Research Laboratory Emeritus — In 1995, the US had 43% of the solar manufacturing market with China at 1% Now the US market share of this exponentially increasing market has declined to 10%, as compared to China's 30%. China now dominates wind turbines with 27% of the market share with the US at 9%. Solar energy is available only 26% of the time and wind 33%. Nuclear is 24/7. The energy returned divided by the energy invested (EROI) in manufacturing for nuclear is 8 times that of solar and 19 times that of wind. Fear of nuclear reactors is hurting our environment. We are decommissioning them faster than the increase in wind and solar. To make up for this net decrease, we are increasing our burning of fossil fuels, raising carbon dioxide emissions which warm our planet. Westinghouse's nuclear reactors being built in S. Carolina and in Georgia have gone bankrupt. China has 23 nuclear plants being built and 33 planned. Bill Gates' TerraPower nuclear pilot plant is being built in China with the Chinese National Nuclear Corp. This traveling wave reactor converts depleted uranium, a byproduct of the nuclear-fission process, into usable fuel, solving the nuclear waste storage problem.

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