Thinking Outside the Box (Deep Permeable Strata Geothermal Energy; Solar Augmented Geothermal Energy)

Douglas Swift, Sr.[1], Richard Erdlac, Jr.[2], and Anthony Swift[3]
[1]*Swift-Arrow Geological Consultants*
[2]*Energy America Geothermal*
[3]*University of Pennsylvania Law School*

Innovative thinking includes viewing Assets and Liabilities in new ways. Utilization of deep, high BHT, depleted gas fields as geothermal reservoirs (Deep Permeable Strata Geothermal Energy) significantly expands areas prospective for geothermal energy. Solar Augmented Geothermal Energy (SAGE) converts depleting oil and gas fields and comparable reservoir strata, to "synthetic geothermal" reservoirs, over even wider regions. SAGE stores/banks solar energy, utilizing naturally occurring brines, for uninterrupted geothermal power generation, while enhancing tertiary recovery. Additional hydrocarbons are recovered, a new source of electrical power established, fresh water resources developed, and hydrogen/oxygen generated for end-user power generation, delivered through existing natural gas/oil pipeline right-of-way infrastructure. SAGE converts oilfield liabilities to assets, while utilizing industry technologies, data bases, and personnel. New hybrid sources of energy will encounter both legislative and legal issues.