

Climate Geo-engineering with 'Carbon Negative' Bioenergy

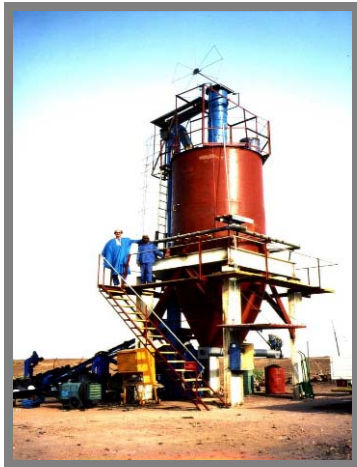
Climate saviour or climate endgame?

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and

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350ppm
CO₂ ?



Cooling the Planet with Biomass?

*"The maximum potential sequestration of 9.5 PgCyr⁻¹ * [from biochar] would exceed today's anthropogenic emissions from fossil fuels of 5.4 PgCyr⁻¹ even if no fossil fuels are substituted by renewable fuels in the future.", Johannes Lehmann, Cornell University.¹*

*PgCyr⁻¹ means Peta-grams of carbon per year. 1 Peta-gram = 1 billion tonnes.

This report represents a critical analysis of proposals for 'carbon negative' bioenergy, including biochar (agrichar) and bioenergy with carbon capture and storage, as a means of reducing atmospheric carbon dioxide concentrations and thus mitigating climate change. It includes a wider discussion about the impacts of large-scale bioenergy, and about the converging crises which threaten imminent collapse of our life-support systems.

The proposals discussed are advocated by a number of scientists including James Hansen and campaigning groups including 350.org, Beyond Zero Carbon, and the authors of Climate Code Red.

The report represents the authors' response to those proposals. It is also intended to contribute to the wider debate about bioenergy, climate change mitigation, and the nature of the converging planetary crises.

We would welcome critical comments, which you can send to [almuth\[at\]ernsting.wanadoo.co.uk](mailto:almuth@ernsting.wanadoo.co.uk) or [dee.rughani\[at\]btinternet.com](mailto:dee.rughani@btinternet.com).

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