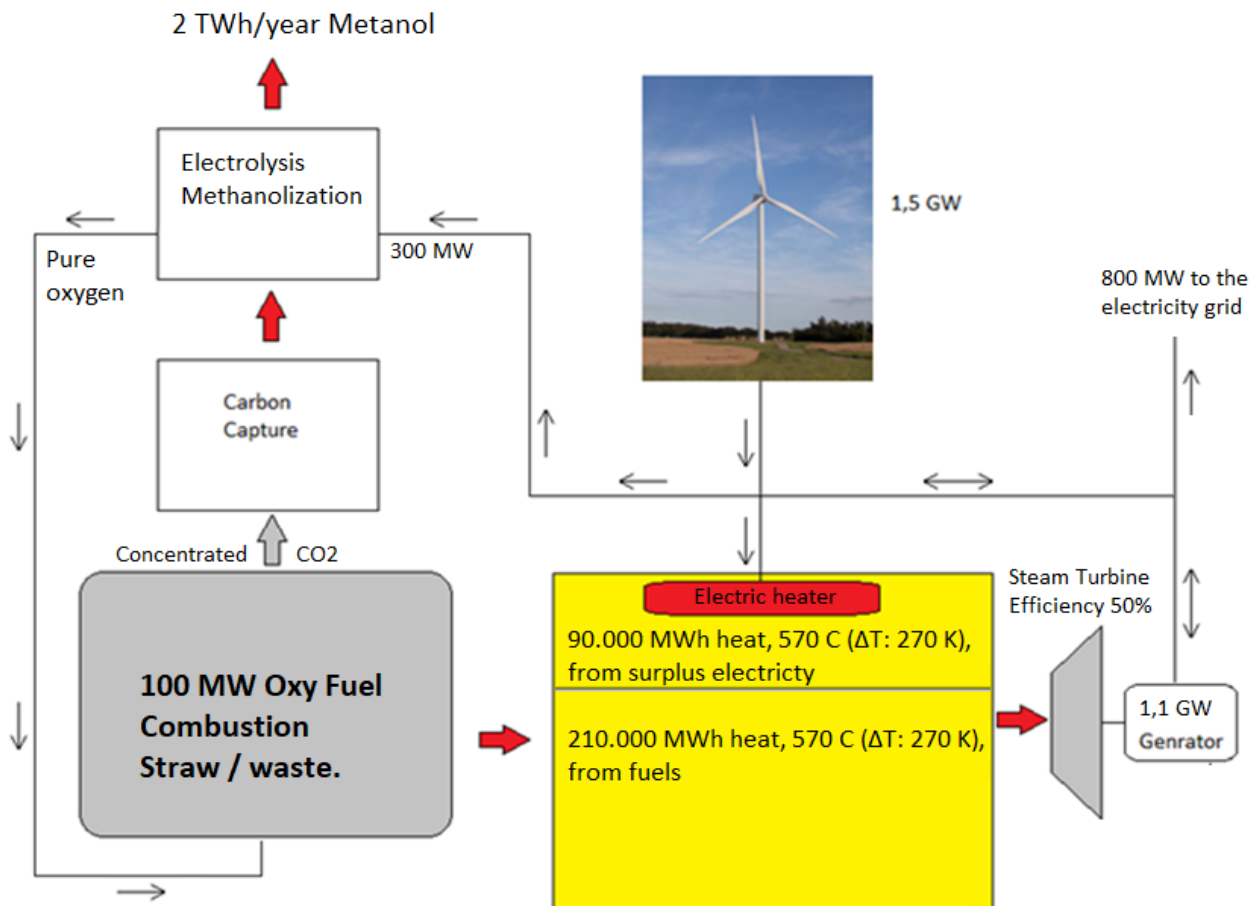


Power plant with a thermal battery that can save and restore surplus electricity 100%



- When weak fuels such as straw, wood and waste are burned as Oxy fuel combustion, the combustion temperature is remarkably high, and as high as from coal and natural gas. The storage can now be heated from 300 to 570 C. And this temperature on the stored energy from the storage can later be converted to 50% electricity via the steam system.
- Surplus electricity also heats the storage, from 300 to 570 C, and provide 50% electricity.
- Due to the pure oxygen for the combustion clean and concentrated co2 is available for the methanolization.

Due to the high combustion temperature, all heat in the storage will be converted to 50% electricity, through the steam system. Waste and straw would normally provide 30% electricity in a normal power plant and 210.000 MWh fuel would then provide 60.000 MWh of electricity.

Fully charged with 300.000 MWh of energy in the storage with 210.000 MWh from fuels and 90.000 MWh from surplus electricity, the steam system will convert the energy into 150.000 MWh of electricity. The fuels would only have provided 60.000 MWh electricity in a normal powerplant and therefore the 90.000 MWh surplus electricity is recovered 100%.

When the storage is fully charged, the plant can operate the electrolysis with 300 MW electricity and the grid with 800 MW for 8 days if the turbines do not supply. And the plant can supply an entire region from a minimum of fuels

Future Energy has the recipe for making huge and cheap thermal storages (<1000 \$ / MWh).

Niels Hansen

Technical Director / CTO

+45 - 60642885