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Building a fast ignition fusion power plant

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Marvel Fusion will start the first laser fusion company in Europe

Fusion energy is the ultimate energy source and a vital part of fighting climate change. So far the IFE community has focused on indirect-drive hot-spot ignition. Much progress has been made since the start of the NIC campaign in 2009. However, even though only short of about a factor of two in most parameters, ignition has not been achieved.

We report on a new enterprise to take on IFE and to aim for demonstration of ignition, burn and gain until 2030 using the direct-drive proton fast ignition approach.

This research endeavor foots on the expertise of NIF, LIFE and the HIPER project, but is powered by the speed of a private start-up company, that is entirely mission driven and will be based in Germany.

We will report on the concept and the team that has started to work on the goal for a base-load fusion power plant in Europe.

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