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ASX:14D

## NEW HYDROGEN PROCESSING TECHNOLOGY FOR 14D

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In a further development of our strategy to use our technology to produce low-emissions hydrogen, 1414 Degrees Ltd (ASX: 14D) ("1414 Degrees" or the "Company") is pleased to announce it has acquired exclusive rights to a new method for producing net zero hydrogen from natural gas.

This invention by the University of Adelaide (UoA) is the subject of an international patent application.

The rights are in addition to [rights acquired in January](#), also from the UoA, for a dual column fluid reactor which is an integral component of our methane pyrolysis hydrogen technology.

The complementary UoA inventions comprise a complete technology for efficient low-emission hydrogen production.

1414 Degrees will progress development of these technologies and integrate them with our silicon-based thermal energy storage solution, with the aim to commercialise "decarbonised gas" as a turn-key solution for industrial heat users.

The new patent is for a process optimising energy use and increasing the efficiency of conversion of natural gas to hydrogen and carbon. The process involves innovative gas-recycling and heat recovery, along with optimised temperature, pressure and separation ratios which can achieve higher reaction efficiencies compared to the existing processes.

By incorporating our SiBrick® silicon storage into the technology, we plan to increase the use of renewable energy and potentially eliminate the need to use hydrogen or methane for process heat, further increasing the hydrogen yield from the process. Using renewable power and hybridising with biogas would result in zero net carbon dioxide emissions.

Dr. Kevin Moriarty, 1414 Degrees Executive Chairman said: "incorporating our silicon storage technologies will allow charging to occur when electricity prices are low, while sustaining round-the-clock heat supply for production in a factory. We are excited to use these patents in our quest to decarbonise high temperature industries."

### AUTHORISED BY:

Dr Kevin Moriarty, Executive Chairman on behalf of the Board of Directors

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## ABOUT 1414 DEGREES LIMITED

1414 Degrees is an innovative clean energy company specialising in thermal energy storage solutions to decarbonise high temperature industry and power generation. 1414 Degrees' SiBrick® is a mass manufacturable silicon thermal storage which harnesses silicon's extremely high energy density. The SiBox® latent heat battery, one of several applications for SiBrick, provides consistent, carbon-free heat at high temperatures from renewable sources.

In 2019 the Company made the strategic purchase of the Aurora Energy Precinct located near Port Augusta, South Australia. The Precinct is a long-term renewable energy initiative to deliver reliable electricity to the region and National Electricity Market. The Precinct has approval for 14D to pilot and demonstrate a large commercial scale version of the SiBox technology.

For more information, please visit [www.1414degrees.com.au](http://www.1414degrees.com.au)

### Forward-looking statements

This announcement includes forward-looking statements which may be identified by words such as 'anticipates', 'believes', 'expects', 'intends', 'may', 'will', 'could', or 'should' and other similar words that involve risks and uncertainties. These forward-looking statements are based on the 1414 Degrees' expectations and beliefs concerning future events as at the date of this announcement. Forward-looking statements are necessarily subject to risks, uncertainties and other factors, many of which are outside the control of 1414 Degrees, which could cause actual results to differ materially from such statements. 1414 Degrees makes no undertaking to update or revise the forward-looking statements made in this announcement to reflect any change in circumstances or events after the date of this announcement.