

Leader Environmental Technologies Limited 利德环保技术有限公司

(Incorporated in the Republic of Singapore on 15 August 2006) (Company Registration Number: 200611799H)

UPDATE ON MAJOR BUSINESS AND TECHNOLOGICAL DEVELOPMENTS

The board of directors ("**Board**") of Leader Environmental Technologies Limited ("**Company**", and together with its subsidiaries, "**Group**") wishes to provide an update on its transformation journey to a green technology driven company prior to its Annual General Meeting ("**AGM**") to be held on 27 April 2023.

Since June 2020 till now, the Company has filed 37 patents, including 16 invention patents (6 in artificial intelligence ("**AI**") technology for water management, 8 in municipal and oil sludge treatment technology, and 2 in membrane technology) and 21 utility patents.

The Board would like to provide an update on the following major developments.

<u>1. Artificial Intelligence ("AI") technology for management of wastewater</u> <u>treatment ("AIWater")</u>

The Group has developed its AIWater technology by integrating AI and digital twin technology to achieve AI sensing, AI prediction, AI control, and AI equipment for management of wastewater treatment plant ("**WWTP**"). Our AIWater system optimizes the WWTP operation to achieve low-carbon and cost-effective operation while maintaining stability and legal compliance.

The Group has successfully implemented AIWater for 3 industrial wastewater treatment plants with combined treatment capacity of 90,000 tons/day in Fujian and Tianjin, China; and had demonstrated a reduction of electricity consumption by approximately 10%, chemical consumption by approximately 40% and overall operating cost by approximately 10-20%; carbon emission is reduced by approximately 2,000 tons per thousand tons of wastewater annually.

China generates more than 220 million tons of municipal wastewater and 60 million tons of industrial wastewater daily. We believe that our AIWater is unique and a leading technology to effectively improve the performance of existing wastewater treatment

plants without much additional capital investment and has potential in China's quest to reduce its carbon footprint.

2. Municipal sludge treatment

The Group has developed Continuous Thermal Hydrolysis ("**CTH**") and pyrolysis technologies for municipal sludge treatment. Compared with traditional sludge drying technology, our proprietary technologies can reduce investment by about 50%, operating costs by around 70%, and reduce carbon emissions by approximately 50%. The Group is actively marketing and deploying its CTH and pyrolysis technologies. Besides the previously announced sludge treatment project in Bazhou which is under construction, the Group has also secured a project with contract value of RMB22.5 million (approximately S\$4.4 million) in Taiwan to design and supply equipment to treat 80 ton/day of sludge. Recently, the Company partnering with Nanyang Technological University ("**NTU**") has received an award of S\$3.9 million grant to conduct a pilot test to demonstrate the Company's CTH and pyrolysis technology for sludge treatment at a Changi wastewater treatment facility.

There are currently more than 4,500 municipal sewage treatment plants in China generating more than 60 million tons of sludge annually. We believe that our CTH and pyrolysis technologies could provide cost-effective solutions to tackle the sludge issue in China.

3. Oil sludge treatment

Conventional treatment of oil sludge using fuel heating process for onshore oil and gas facilities occupies large area and is a fire safety hazard. Thus, the conventional treatment system is not suitable for offshore oil platforms and floating production storage and offloading ("**FPSO**") vessels. To address the challenging operating environment of offshore oil platforms and FPSOs, the Group has developed an Electromagnetic Induction Pyrolysis ("**EIP**") technology and equipment for treatment of oily drill cuttings during drilling operations on offshore oil platforms. We believe this breakthrough technology and equipment is a first in the world to treat oily drill cuttings offshore instead of the current practice of transporting the cuttings back to land for onshore treatment. Our technology not only reduces processing cost by more than 60%, it also effectively avoids the environmental and technical risks. The EIP technology has been highly recognized by China National Offshore Oil Corporation ("**CNOOC**"). The Group has recently secured a contract to treat oil sludge of up to 6,000 tons on an offshore oil platform of CNOOC.

We believe our EIP technology will have potential to be deployed in oilfields in Southeast Asia, the Middle East, and the North Sea for oil sludge treatment on offshore drilling platforms.

The Company believes technology is key to the sustainable growth of its business. We see great market potential for our AlWater, CTH municipal sludge treatment technology, and EIP oil sludge treatment technology. The Company remains focused on investing and developing decarbonization and green technologies. We will continue to transform ourselves into a green technology driven and asset-light business model as compared with the traditional capital-intensive investment in projects.

BY ORDER OF THE BOARD

Mr Ngoo Lin Fong Executive Director 21 April 2023