Global Deployment of Daigas Group's Onsite Hydrogen Generation Technology with Hyundai Rotem Company

August 3rd, 2022

Daigas Gas and Power Solution Co., Ltd. ("DGPS"), a 100% subsidiary of Osaka Gas Co., Ltd., has established an expanded business collaboration for onsite hydrogen generator technology with Hyundai Rotem Company ("HRC"), an affiliate of Hyundai Motor Group, allowing HRC to sell the generators outside South Korea.

Daigas Group (formerly Osaka Gas Group) launched the first model of "HYSERVE" (*1), onsite hydrogen generator, in 2003 by adopting its accumulated knowledge on catalyst. DGPS introduced a new model "HYSERVE-300" with hourly hydrogen production capacity of 300 Nm³ in 2013. DGPS, as manufacturer of HYSERVE-300, has sold the units mainly to hydrogen fueling stations.

Then in 2019, DGPS granted HRC to manufacture and sell "Hy-Green", hydrogen generator utilizing the technology of HYSERVE-300, enabling HRC to meet the increasing demand for hydrogen fueling stations in South Korea.

After confirming HRC's successful launch of Hy-Green, DGPS has decided to globally deploy its HYSERVE technology through enabling HRC to sell Hy-Green outside of South Korea. DGPS believes this will contribute the prompt buildup of distributed hydrogen supply infrastructure which is necessary for the decarbonization in transportation sector.

Hy-Green will be sold by HRC for the on-site hydrogen fueling station for various hydrogen mobilities (small vehicles, buses, trucks, construction equipment, train, ships, drones and etc), fuel cell power plant, and biogas production facilities (to produce hydrogen) in order to expand the hydrogen supply chain.

HRC has already developed mass production capacity of Hy-Green and is ready for receiving inquiries from the world including those through Daigas Group.

Daigas Group including DGPS is going to expand its overseas energy business from upstream to downstream by fully utilizing its experiences in and out of Japan and its existing overseas business platforms.

(*1) Onsite hydrogen generator developed and sold by Daigas Group. 36 units have been sold in Japan so far.

[Press Release on the launch of HYSERVE-300 (in Japanese)] https://www.osakagas.co.jp/company/press/pr 2013/1206060 7831.html

[HYSERVE -300]

[Hydrogen Generator: Hy-Green 300]





[Corporate Profile]

Osaka Gas Co., Ltd.

Head Office: 4-1-2 Hiranocho, Chuo-ward, Osaka-city, Osaka

Representative: Masataka Fujiwara (President & Representative Director)

Amount of Capital: 132,166,660,000 JPY

Date of Establishment: April 10, 1897

Business Outline: Natural gas distribution and supply; power generation and supply, etc.

Daigas Gas and Power Solution Co., Ltd.

Head Office: 3-5-11 Doshomachi, Chuo-ward, Osaka-city, Osaka

Representative: Nobushige Goto (President & Representative Director)

Amount of Capital: 100,000,000 JPY

Date of Establishment: October 1, 2019

Business Outline: Operation and maintenance of gas and power plants; power generation

and supply; and engineering

Hyundai Rotem Company

Head Office: 37, Cheoldobangmulgwan-ro, Uiwang-si, Gyeonggi-do, 16082, Korea

Representative: Yong-Bae, Lee (CEO) Amount of Capital: 545,711,465,000 KRW

Date of Establishment: July 1, 1977

Business Outline: Total railway systems supply, Ground weapon systems supply, Steel,

automobile production and hydrogen infrastructures supply, etc.

Contact Detail: Duseop Lee / <u>duseop.lee@hyundai-rotem.co.kr</u> / +82-10-2648-5039