## LNG Bunkering Trial for the LNG-fueled Tugboat Ishin at Kobe Port

September 18, 2019 Osaka Gas Co., Ltd. OGCTS Co., Ltd.

Osaka Gas Co., Ltd. (President: Takehiro Honjo ; hereinafter referred to as "Osaka Gas") and OGCTS Co., Ltd. (President: Hiroyasu Suzuki), a wholly-owned subsidiary of Osaka Gas, today announced that they conducted the liquefied natural gas (LNG) bunkering trial for the LNG - fueled Tugboat<sup>\*1</sup> *Ishin* owned by Mitsui O.S.K. Lines, Ltd. (MOL; President & CEO: Junichiro Ikeda) and operated by Nihon-Tug-boat Co., Ltd. (President: Tetsuro Nishio) at Kobe Port. This marks the first LNG bunkering for a ship at Kobe Port.

LNG fuel was hauled by a tanker truck from the Himeji LNG Terminal of Osaka Gas and was bunkered to the *Ishin* berthed at Shinko Pier No. 4 of Kobe Port. This trial makes fuel supplying achievements in the second place as Daigas Group, following to the ones at Sakai-Senboku Port.

In October 2016, the International Maritime Organization decided to introduce tighter regulations on sulfur oxides (SOx) emissions in sea areas including Japan in 2020. Under the leadership of the Ministry of Land, Infrastructure, Transport and Tourism, Japan has been actively promoting LNG bunkering, which supplies ships with LNG, an environmentally friendly fuel, increasing the possibility of expanded consumption of LNG in marine transportation in coming years.

The Daigas Group will conduct a further study to expand the LNG bunkering business for ships by taking full advantage of the experience of this LNG bunkering trial at Kobe Port and the track record at Sakai-Senboku Port. The Daigas Group aims to conduct its business in an ESG\*2-conscious manner meeting global standards, as set out in its long-term business vision Going Forward Beyond Borders 2030. We intend to actively contribute to reducing impact on the environment by promoting widespread use of natural gas, a clean energy source.

- \*1 Tugboat: a boat used to assist large ships and aquatic structures in berthing to or leaving from a jetty or quay
- \*2 ESG: environmental, social, and governance

[Reference] Commencing Kansai's First LNG-fuel to LNG-Fueled Tugboat *Ishin* https://www.osakagas.co.jp/en/whatsnew/ icsFiles/afieldfile/2019/02/13/190131.pdf <The scene of the LNG bunkering trial>

