This abstract will be presented during LNG2023 conference on 10-13 July in Vancouver, Canada among many other innovative projects, ideas and outlooks. LNG2023 will provide a unique platform for the global LNG industry and key stakeholders to discuss, debate, and showcase the latest industry developments and opportunities.



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## **REVAMPING A FIFTY-YEAR-OLD LNG TANK**

Revamping a fifty-year-old LNG Tank

Between 2014 and 2015, an abnormal production of Boil-Off Gas from a 50.000 m3 and 50 years old tank called S2 had been noted; we started a series of checks, inspections and investigations and we found out a defect in the insulation. Therefore, to protect the asset, assess the damage and take actions, we proceeded in stages, summarized below:

Warm-up, isolation of the tank, Airing, Destructive Test and non-destructive test, restoration works, hydraulic testing, replacement of all the instrumentation, restoration of the insulation, TIE-INS for the reconnection of the tank to the rest of the system, precommissioning (Loop-Check, Blank Tests), commissioning.

Most of the activities were carried out in confined spaces thanks to technologically advanced equipment that made it possible to better manage the risks.

The completion of this project represents an important milestone for two main reasons:

- the analyses and tests gave us the opportunity to have full knowledge of the real mechanical conditions of the materials, which during 50 years of operation had faced lots of loading/unloading cycles. Therefore, the results obtained can be considered unique in the literature of cryogenic tanks, a very useful reference also for all contemporary plants.
- the evidence of a residual useful life, that is higher at 25 years, represents an excellent starting point and an indisputable driving force for the modernization activities of the entire plant.

To view the full conference agenda, visit https://www.lng2023.org/lng-programme-overview