CASE STUDY

CONFORMITY CONTROL FOR A LNG TERMINAL EXTENSION

The processing and delivery of natural gas to customers has to be achieved within ever shorter time spans while constantly guaranteeing complete safety for the personnel, installations, nearby communities and for the environment. Belgian Fluxys LNG has managed to keep all these factors under control and still reached its business targets thanks to specialised support from SGS experts. The objective of Fluxys LNG was to extend its LNG terminal located in the Belgian port of Zeebrugge, in order to double its send out capacity.

AMBITIOUS PROJECTS REQUIRE RELIABLE PARTNERS

The project began in January 2005 and the French contractor consortium, SN Technigaz – Saipem, called for SGS to provide its know-how and help finalise the extension of the terminal by December 2007 to allow a LNG send out capacity of 1 800 000 Nm³/h (NG rate) (11.5mtpa). The initial terminal included three 87 000 m³ LNG storage tanks and as part of the extension plan a fourth 140 000 m³ semi-buried full containment, 80 m diameter storage tank had to be built. In addition a new 900 000 Nm³/h send out train with all the necessary pumps, valves, pipeline compressors and pipes was also planned.

SGS brought its international organisation and long-term experience to this large scale plan to ensure that all activities and constructions comply with the relevant regulations and standards during each stage of the project. As a Notified Body, SGS was called to certify the conformity of the Fluxys LNG terminal extension plan with the requirements of the PED directive. Another important task of the SGS team of specialists was to certify that the electrical installations and equipments comply with the local regulations and ATEX, the Directive for Equipment and Protective Systems intended for use in potentially Explosive Atmospheres.

ACHIEVING THE BEST RESULTS BY GIVING ATTENTION TO ALL DETAILS

Making sure that that all activities being performed comply with the relevant regulations required a good coordination between the activities of the SGS specialists, inspectors and technicians and the contractor in the various phases of the project. During the design stage the entire documentation and planning was reviewed. Design conformity assessments were conducted which led to the validation of the scope of services, the risk categories and the modules that were to be implemented.

In the manufacturing stages the SGS team performed an entire series of conformity assessments with RD 11/03/66, the PED directive and its amendments of pipelines cat. I, II, and III. SGS material analysts on-site carried out constant materials appraisals, which played an important role in receiving good results at the fabrication and construction conformity assessments.

SGS

CASE STUDY

The supervision of the Fluxys LNG terminal extension gave SGS once again the possibility to prove its capability in supervising large scale industrial projects. The methodical approach applied by the SGS team enabled them to rapidly identify problematic issues and to forward adequate solutions in coordination meetings with the contractor. The monthly advancement reports provided reliable information about the stage of the construction and allowed the refocus of efforts on the areas that recorded delays. With the final acceptance tests coming in a few weeks there are still several activities that need to be done and the pressure and excitement are running high.

By staying faithful to SGS core values of quality and integrity, the SGS expert team in the Zeebrugge project plays a crucial role in developing one of the biggest and safest LNG terminals in the world. We look forward to the moment when Fluxys LNG will be handed over a successfully concluded project.

SGS IS THE GLOBAL LEADER AND INNOVATOR IN INSPECTION, VERIFICATION, TESTING AND CERTIFICATION SERVICES. FOUNDED IN 1878, SGS IS RECOGNIZED AS THE GLOBAL BENCHMARK IN QUALITY AND INTEGRITY. WITH OVER 59,000 EMPLOYEES, SGS OPERATES A NETWORK OF OVER 1,000 OFFICES AND LABORATORIES AROUND THE WORLD.

INDUSTRIAL.GLOBAL@SGS.COM
WWW.SGS.COM/LNG

SGS