

WHITE PAPER / LNG PLANT CONSTRUCTION

STREAMLINING LNG PLANT CONSTRUCTION WITH PROACTIVE STAKEHOLDER ENGAGEMENT

BY Steven Testa, PE

Owner-operators need to bring liquefied natural gas (LNG) facilities online to meet growing energy demand.

By engaging stakeholders early, LNG companies can build collaborative relationships within diverse communities and decrease the likelihood of third-party interest groups initiating opposition activities.



Liquefied natural gas (LNG) plant construction has increased significantly in recent years to keep pace with growing energy demand. Low natural gas prices, favorable regulations and difficulty in siting new pipelines are driving the market for LNG facility expansions and investments in new infrastructure, particularly peak shaver plants and satellite facilities. To meet this demand, it's imperative that LNG owner-operators bring LNG facilities online as efficiently as possible. However, even the most experienced LNG facility project manager may encounter delays if local stakeholders oppose the project.

Taking a proactive approach to stakeholder engagement helps LNG project managers identify and address stakeholder concerns early in the development process. By reaching out directly to community leaders and key stakeholders, LNG companies can set the tone for respectful and cooperative interactions and work toward mutually beneficial solutions. Moreover, building strong relationships within communities increases the likelihood that third-party interest groups will engage with the project team to discuss opportunities instead of initiating opposition activities.



The most effective stakeholder engagement programs start early in a project, incorporate a variety of communication and outreach techniques, and continue until construction and restoration activities are complete. An experienced stakeholder management team can play a valuable role in the planning process by anticipating both common and unique challenges and implementing effective mitigation and outreach strategies.

ENGAGE STAKEHOLDERS EARLY

Title 49 of the Code of Federal Regulations (CFR) Part 193 governs how LNG plants are built, operated and maintained. The nature of the required permitting depends on the intended use of the facility. If the facility will be used exclusively to serve nearby customers and effectively stabilize rates, approval from the Federal Energy Regulatory Commission (FERC) is not needed. Instead, oversight falls to local siting authorities. If the LNG will be sold on the open market or transported across state lines, the project will need FERC certification.

Some aspects of the permitting process, such as title search and review, surveys and appraisals, are relatively straightforward. However, special care must be taken when LNG plant construction is planned in or near populated areas. Consideration must be given to current land uses and local zoning in and around the planned facility. Even then, LNG projects may encounter resistance when owners of nearby land and businesses are notified about the plans. Accordingly, the first communications with local stakeholders must involve them as part of a solution.

PUBLIC INVOLVEMENT ACTIVITIES

Educating public safety and elected officials about an LNG project should be a top priority. Though fire marshals, police chiefs and other first responders are experts in how to handle catastrophes, they may not know much about LNG production and storage. Once these key stakeholders understand the safety profile of LNG plants, they can assist the project team with opportunity and stakeholder identification. In addition, equipping local officials with project need and benefit information allows them to convey these positive attributes to their constituents. By keeping safety and elected officials involved in the project throughout the various phases of development,

project teams create community-based advocates who can assist with solutions-oriented public outreach.

Proactive stakeholder engagement also requires a community assessment and creation of a strategic communication plan. Developed with input from project team members, the plan provides a road map that directs outreach activities and the varying methods through which different local stakeholder groups - residents, neighborhood groups, business owners, community leaders, labor officials, and public safety and elected officials — can most effectively be included in a project. Through thoughtful communication, the project team can identify stakeholder concerns, educate stakeholders about LNG and incorporate their input to improve the overall process.

ADDRESS COMMON CONCERNS

When it comes to LNG construction, permitting compliance isn't enough to achieve successful project completion. Community support is also essential. To gain stakeholder backing, LNG companies need to engage residents and community leaders early in the project. Early engagement allows LNG companies to identify stakeholder concerns and develop a customized communication plan to address them. By bringing concerns into the open, you can encourage direct communication, promote trust and build relationships that will ease the path to project completion.

While every construction project is unique, the public concerns around LNG construction tend to fall along common themes.

FOSSIL FUELS

Potentially impacted stakeholders often express concerns about the environmental impacts of LNG. With renewable energy becoming more readily available, stakeholders



may believe there is no longer a need for new fossil fuel plants. In fact, communities still depend on fossil fuels for a significant portion of their energy needs.

Stakeholders may not understand the differences between LNG and petroleum, or the methods used to extract, process and transport these fuels. Without this context, stakeholders may not understand the relative impacts.

Through strategic, transparent engagement, LNG companies can counter misinformation. There is an opportunity to discuss a community's enduring reliance on a diversified energy portfolio, which may include fossil fuels, renewables and other sources as necessary.

SAFETY OF STORAGE AND PRODUCTION

Stakeholders consistently express a variety of concerns about the safety of LNG plants, including fears about terrorism, earthquakes, environmental contamination

and explosions. LNG companies can help stakeholders overcome these fears by presenting the facts conversationally and in easy-to-access formats.

Anticipating stakeholder concerns and using data from identified sources helps maintain transparency and build trust. When stakeholders perceive an organization as dependable, they are more likely to communicate directly, providing the opportunity to work collaboratively toward solutions.

POTENTIAL COMMUNITY DISRUPTION

Many residents try to anticipate the impact of plant construction and operations on their community. Common questions include:

- · Will traffic be disrupted by street closures during construction?
- When will the project be completed?
- How noisy will the plant be once it's up and running?
- How often will I see trucks transporting LNG?

Proactively distributing information on these subjects can forestall many concerns. When stakeholders do raise these questions, we recommend maintaining clear communication about project scheduling and any potential disruptions to daily activity.

Whenever possible, it's helpful to seek ways of addressing specific scheduling concerns. As in all aspects of stakeholder engagement, be honest and transparent. This might include notifying stakeholders that air and noise pollution studies will be performed to mitigate impacts, that LNG is typically transported only during the summer to complement the liquefaction, and any traffic disruptions should be minimal and quickly resolved.

NOT IN MY BACKYARD

Alleviating concerns about environmental impacts and communicating the safety of LNG production or potential disruptions won't be enough to win the support of all stakeholders. Some simply don't want an LNG plant nearby. In these cases, the goal isn't necessarily to change minds, but to identify these individuals and establish relationships that encourage regular communication, acknowledge stakeholder complaints and identify opportunities to address stakeholder concerns.

BIOGRAPHY —

STEVEN TESTA, PE, is a project manager at Burns & McDonnell, where he serves the LNG industry. He has over 27 years of experience in engineering, strategic initiatives, and program and construction management. He has been responsible for delivery of numerous corporate and strategic initiatives — involving safety, quality, budget and schedule, compliance and more — as well as capital projects and programs. Steven has extensive experience with authorities and regulators at the state and federal levels.

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