Trinidad and Tobago Energy Conference (TTEC) 2017

National Facilities Audit and Beyond Workshop

25th January 2017

9:00 am to 12:00 noon

Regency IV, Hyatt Regency, Port of Spain

Key Note Address: Reflections from the National Facilities Audit, what’s next and further expectations to the Industry Stakeholders

Mr. Selwyn Lashley, Permanent Secretary, Ministry of Energy and Energy Industries

Salutations -

Mr. Graeme Pirie - President & Managing Director, DNV GL T'dad & Tobago Limited;

Mr. Michiel Brongers - National Facilities Audit (NFA) Project Manager, DNV GL;

Mr. Stephen Carboy - Director Operations Excellence, Atlantic;

Mr. Ramesh Harrylal - Vice President, Operations, Phoenix Park Gas Processors Limited (PPGPL);

Other distinguished Stakeholders from across the energy sector;

Good Morning.

It is indeed a pleasure for me to be with you all here this morning, for the opening of this very important workshop.

The turnout here today is clear evidence of the industry’s keen interest in this issue and I would like to thank all stakeholders for their continuing support and enthusiasm.

DNV GL and the Chamber must also be commended for successfully collaborating on the staging of this workshop and we look forward to additional opportunities in the future for partnering on similar initiatives.

As the main regulator of the energy sector in Trinidad and Tobago, the Ministry of Energy and Energy Industries (MEEI) requires that all operations are conducted in a safe and sustainable manner, that is in conformance with the Petroleum Act (Chapter 62:01) and Petroleum Regulations. The Ministry continues to pursue the fulfillment of this mandate, which will undoubtedly lead towards a more efficiently managed energy sector; and one that is dynamically responsive to both variable economic conditions and evolving technological advancements in oil and gas related activities.

Having engaged in over 100 years of commercial oil and gas production, we in Trinidad and Tobago are acutely aware of the aged and diverse infrastructure with which our local energy sector is outfitted, and of the need for the proper management of the integrity of these assets, as that is crucial to ensure their fitness for continued and in many instances extended service. This is perhaps one of the most critical parameters which must be considered for the optimization of the commercial operation of the assets, while at the same time ensuring safe operations and environmental responsibility.

Given the aged infrastructure, one must be wary of the potential for major safety and environmental incidents that could result in high consequence scenarios. On a daily basis, there is the constant challenge and need to:

 (a) prevent injuries and in extreme cases, loss of life;

(b) prevent damage to plant and equipment with the attendant cost of repair and adverse impact on business continuity; and

(c) mitigate the impact of our operations on the environment and vulnerable communities.

The global economic downturn or current economic uncertainty poses yet another challenge for owners and operators of facilities in the energy sector. With budgets being cut, there is always the danger that the maintenance and upgrading of assets which are costly items could be at risk of being deferred. In that vein, one possible option that has been employed for reducing the risk, is by utilizing multi-stakeholder co-operation and working through the issues at an overall sector or industry level.

Prior to the National Facilities Audit (NFA), from the preliminary review which had been done within the Ministry, some of the Asset Integrity Management (AIM) challenges faced by the local energy industry included:

1. Varying degrees of Asset Integrity Management (AIM) - The levels of AIM vary significantly from organization to organization or even within the same organization, where there are various business units;
2. Lack of specific milestone targets and Key Performance Indicators (KPI) with respect to Asset Integrity Management (AIM) plans within individual organizations.
3. Lack of Asset Integrity Management (AIM) integration throughout the organization - A thorough understanding of an organization’s AIM program at all levels promotes a sense of importance of all tasks that contribute to AIM.
4. Lack of proper risk ranking and prioritization policies within organizations for determining whether to repair or replace critical assets.

Against this background, the Ministry of Energy and Energy Industries (MEEI) engaged DNV to embark upon the country-wide project of the National Facilities Audit (NFA), which was designed to assist with the prevention of unwanted occurrences and to minimize the consequences and risks associated with high profile incidents and failures. One of the primary factors driving the need for the National Facilities Audit (NFA) was to benchmark our management of energy assets in three (3) fundamental areas as it relates to Asset Integrity (AI). These were:

1. Managing AIM in the development of the asset (Design and Technical Assurances);
2. Managing AIM Operational systems; and
3. Managing AIM Behavioral culture.

Effective Asset Integrity Management (AIM) is critical to the long term growth and viability of Trinidad and Tobago’s energy sector. A loss of containment can have catastrophic effects, leading to potential major accidents that could result in multiple fatalities as well as significant economic, environmental and reputational damage. Meeting the country’s current energy demands requires not only new exploration activity, but also necessitates extending the life of the existing assets through effective Asset Integrity Management (AIM) programs. In this regard it should also be noted that in addition to the fact that some of these assets may ultimately become the property of the State, in many instances they have been the recipients of generous fiscal incentives which can be viewed as an implied contribution by the citizens of Trinidad and Tobago.

The objective of the Ministry’s ongoing Asset Integrity Management (AIM) initiative, is essentially to ensure that the integrity of all assets is maintained, in order to meet design and performance specifications, and operational standards, while also implementing effective barriers to control risk.

We just heard some of the overarching results of the National Facilities Audit (NFA) which was conducted by DNV GL from July 2015 to April 2016. As you would have seen, the results generally showed that Trinidad and Tobago certainly has some way to go with respect to developing and implementing thoroughly effective Asset Integrity Management (AIM) programs for all the facilities and operators within the oil and gas industry.

The Ministry recognizes the challenges associated with managing the integrity of the assets within the energy sector and with this in mind, as stated in the National Facilities Audit (NFA) report, the National Vision for Asset Integrity Management (AIM) is as follows:

1. For Trinidad and Tobago to enhance its standing as an active and competitive center for oil and gas exploration and production, and petrochemical industry development; and in this regard the Government’s commitment to Asset Integrity Management (AIM) will be on par with or exceed other successful oil and gas producing countries, such as the UK, USA, Norway and Australia;
2. To create an environment where all operators effectively and consistently manage the risk of failure throughout the life cycle of any structure, plant, equipment, or system to prevent or limit the effect of a major Asset Integrity (AI) incident and/or prevent fatalities;
3. To secure the total involvement and commitment at stakeholders at all levels. Business Chambers, Company Board Members, Senior Managers, Operators, Contractors, Suppliers, Unions, Government Departments, Acadamia, Professional Organizations and the Public at large, should be united in the belief that effective management of Asset Integrity (AI) is crucial for Trinidad and Tobago to maintain and grow its position with respect to the oil and gas sector; We would like to get to a place where a national culture of attitudes and occupational behaviors will exist, that always recognizes the hazards and consequences associated with ineffective Asset Integrity Management (AIM) and that translates the significance and responsibility for AIM to all employees and stakeholders;
4. To realize a significant downward trend in the number and severity of AI-related incidents and ultimately achieve the shared Vision of zero incidents.

As mentioned in DNV GL’s earlier presentation, some of the conclusions as determined by the National Facilities Audit (NFA) were:

1. The performance of Asset Integrity Management (AIM) systems showed a wide variation across the industry;
2. The Equipment Audit showed a wide variation in the apparent management and condition of the assets across the industry;
3. In terms of company ownership, Joint Venture companies generally had the highest scores;
4. There is a need for a common understanding and definition of Asset Integrity (AI) and Asset Integrity Management (AIM) systems;
5. Notably, in many cases, company programs for personal safety (HSE) are more developed than programs for Asset Integrity (AI), and analysis and trending of HSE data is performed in more detail than that of AI data;
6. The industry is not effectively sharing best practices.

The Final Report on the National Facilities Audit (NFA) was submitted by DNV to the Ministry on 18th January 2017. Moving forward, as we progress towards becoming a recognized industry leader in terms of reliable operations, a safe place to work and a promoter of environmental protection, the findings and recommendations of the National Facilities Audit (NFA) Final Report, will be reviewed and submitted to Cabinet for consideration and approval of a proposed plan for Asset Integrity Management (AIM).

Additionally, in moving towards the overall goal for all operators to have an effective Asset Integrity Management (AIM) program to manage their assets, the Ministry has commenced the distribution of individual reports to the thirty (30) companies which participated in the National Facilities Audit (NFA), in order to disseminate company specific findings from the audit. Seven (7) individual company reports were presented in December 2016, while another eight (8) will be presented over the next two (2) days.

Further, the Ministry intends to continue interactions with stakeholders through follow-up meetings with the operators, with the companies’ performance scores in the audit serving as the basis for prioritization for follow-up. Future plans of the Ministry include the continuation of Asset Integrity (AI) audits to include other stakeholders who were not part of the initial exercise, and of course a revisit and audit of facilities identified for remedial work. All efforts will be geared towards achieving the National Vision for Asset Integrity Management (AIM).

In closing, I would like to take this opportunity to again thank all industry stakeholders for their valued support and indeed, their sustained enthusiasm towards this initiative, and I look forward to our continued co-operation in the development and implementation of improved Asset Integrity Management (AIM) programs throughout the sector, as we, in Trinidad and Tobago progress towards becoming a world-class example of excellence in Asset Integrity Management (AIM).

Ladies and Gentlemen I thank you for your kind attention and wish you very productive interaction at today’s workshop.