GMI Oil & Gas Subcommittee Webinar

11 September 2019
Webinar Tips

- All attendees (except speakers) are currently in listen-only mode
- To ask a question:
  - “Raise your hand” by clicking the “hand” icon.
  - Questions may be typed in the “Questions Pane.”
- If you are experiencing technical difficulties, please let us know using the Questions pane
- A copy of today's presentation will be available on GMI's website
Agenda

- Welcome
- The Bluesource Methane Reduction Program: An Opportunity to Tackle the Global Oil & Gas Methane Challenge, Yvan Champagne, Bluesource
  - Question and Answer
- GMI News and Updates
- Global Methane Challenge Project Spotlight
- Subcommittee News and Upcoming Activities
- Question and Answer / Wrap up
The Bluesource Methane Reduction Program

Yvan Champagne
President, Bluesource Methane Reduction
TACKLING THE GLOBAL OIL & GAS METHANE CHALLENGE ONE DEVICE AT A TIME

The Bluesource Methane Program Case Study in Alberta and Beyond

September 11, 2019
About Bluesource

• One of North America’s largest developers and marketers of emission reduction projects

• >40 million tonnes of reductions created and sold since 2001

• Voted Top North American Project Developer for the past 4 years by Environmental Finance

• Our business is identifying opportunities for generating large-scale emission reductions and making them happen

• Calgary, Toronto, Salt Lake City and San Francisco
The Canadian Methane Challenge

- Federal/Alberta goal of 40-45% reduction in methane emissions from oil and gas sector by 2025
- Environment Canada/AER Regulations targeting methane emissions include pneumatic controllers such as level controllers, pressure controllers and transducers

Source: ECCC
What is a Pneumatic Controller and why do they matter?

• Control critical safety and operational functions across upstream/midstream oil & gas sector

• Vent by design

• A single gas-driven high-bleed device can emit the same amount of GHG emissions as 10-35 cars

• Newer low-bleed devices vent up to 98% less than old devices
Methane Challenge for Oil & Gas Producers

• High-bleed controllers must be replaced by 2023

• Pneumatic devices are everywhere in the upstream and midstream oil & gas sector
  • estimates of 70,000 to <100,000 in Alberta alone

• Inventorying and replacing devices is complex and capital/labour intensive

• Many producers are financially challenged due to low commodity prices
01 Bluesource Methane Program Overview
Bluesource Methane Program Solution

- Federal and provincial regulations allow for early-action crediting in advance of the regulation taking effect in 2023

- Alberta compliance market presents opportunity to monetize reductions for limited period of time

- We designed a program to help producers achieve methane regulatory compliance for pneumatic devices that requires no capital expenditure and minimal burden on staff
  - Performing an inventory of pneumatic devices
  - Project management services enabling efficient scheduling, deployment and installation of controllers
  - Logistics and capital cost of controllers
  - Data management costs for tracking and informational requirements (offset creation and reporting purposes)
How we do it

- Program Lead: bluesource
- Financial Partner: ATB Financial
- Logistics and Data Management: RAKKEN

E&I Contractors: TARPON, TECHMATION, E&I Contractors

Producers: TORC Oil & Gas Ltd., nal, CLEARVIEW RESOURCES, Tangle Creek, Pine Cliff Energy Ltd., Ridgeback Resources, BONAVISTA, MURPHY OIL CORPORATION

23 contracted 5 producers in advanced contracting
Impact in Alberta

Over the past 21 months, 6,200 devices retrofitted or replaced for 21 oil & gas producers, over 20,000 devices inventoried

Over the next 7 months, we will retrofit or replace another ~4,000 devices

By 2023, ~3 million tonnes CO$_2$e of GHG reductions, equivalent to taking 384,000-576,000 cars off the road for a year

Conserved enough natural gas to heat 50,000 homes
Key Insights That Are Applicable Globally

1. In jurisdictions with a high concentration of gas-driven pneumatics, pneumatic replacements are one of the fastest and largest opportunities for methane reductions in upstream oil & gas sector

2. Canada has provided a template to the world on how you catalyse and accelerate reductions in this area
   • Combination of defined regulatory timeline (stick) with early-action incentive (carrot)
   • Carbon market and infrastructure to enable carbon finance and project developers to deploy capital and accelerate uptake
   • Third-party finance critical to accelerated deployment in oil & gas sector due to the mismatch in hurdle rates
Our Next Steps

• Our program delivers globally-meaningful emission reductions by tackling small-scale distributed emission sources in a fast

• We are looking to expand our program outside of Canada and we are actively looking for regulator/government partners to explore new markets

• If you are interested in learning more on how to accelerate pneumatic reductions in your jurisdiction, please reach out
Thank You and Questions

Yvan Champagne
President, Blue Source Methane ULC

Phone:  403-262-3026 x.226
Cell:  647-408-9122
Email:  yvanc@bluesourcecan.com
Global Methane Initiative
News and Updates

Monica Shimamura,
Director, GMI Administrative Support Group
GMI News and Updates

- GMI Website Enhancements
  - Home page
  - Sector pages
  - Project Network page

- Project Network
  - Quarterly Newsletter

- New Mailing List

- Social Media:
  - Facebook.com/globalmethane
  - Twitter.com/globalmethane
  - Linkedin.com/company/global-methane-initiative-gmi
Global Methane Forum 2020

- 23 – 27 March 2020 in Geneva, Switzerland
- Co-hosted with UNECE
- GMI Meetings:
  - Oil & Gas Subcommittee
  - Coal Mines Subcommittee
  - Biogas Subcommittee
  - Steering Committee
  - Plenary Session
- Capstone event to celebrate the Global Methane Challenge
- Opportunity to participate in the UNECE Group of Experts in Oil and Gas meetings

Recommendations for topics?
Send recommendations to ASG@Globalmethane.org
More details coming soon!
Global Methane Challenge Spotlight

View the GM Video at:
https://globalmethane.org/challenge/video/gmc.mp4
Why Participate in the Challenge?

- Each Challenge participant will be publicly recognized for actions to reduce methane emissions
  - Opportunity to highlight new and ongoing efforts
  - "Challenge" website and GMI social media will showcase actions
  - GMI, CCAC and UNECE events will provide forum for sharing actions
- Challenge participants and actions will be celebrated at the 2020 Global Methane Forum
- Your efforts will help inspire other organizations to take ambitious actions towards methane mitigation
- Challenge submissions will be accepted until the end of the year
Check out submissions and showcase your own actions at globalmethane.org/challenge
GMI Oil & Gas
Subcommittee News and Upcoming Events
Oil & Gas Subcommittee News

- New U.S. Oil and Gas Lead:
  
  **Denise Mulholland**
  International Lead, Voluntary Methane Programs, Climate Change Division, Office of Air and Radiation, U.S. Environmental Protection Agency (EPA)

- “Identification and Evaluation of GHG Reduction & Energy Efficiency Improvement Opportunities at Oil and Gas Facilities”
  - Draft Final Report is under final EPA review
  - Anticipated completion by the end of the year

- GMI Oil & Gas Subcommittee Meeting:
  - In conjunction with the Global Methane Forum 2020 in March 2020
  - Email recommendations for topics and sessions to ASG@Globalmethane.org
THANK YOU

Wrap up and adjourn

See you in Geneva in March!