# **Decarbonization of Oil & Gas Operations**

Date: Monday, September 9, 2024

Time: 8:00 am - 4:30 pm

Breakfast: 8:00 am – 9:00 am Workshop Begins: 9:00 am Coffee Break: 10:30 am

Lunch Break: 12:00 pm - 1:00 pm

Coffee Break: 3:00 pm

Workshop Concludes: 4:30 pm

#### Location:

Edmonton Convention Centre, Salon 1 – Edmonton, Canada 9797 Jasper Ave, Edmonton, AB T5J 1N9 +1 (780) 421-9797

Cost: \$695 (includes breakfast, coffee breaks, lunch and workshop materials)

#### Agenda:

#### 1. Introduction

Introduction to Greenhouse Gas (GHG) Carbon Dioxide (CO<sub>2</sub>) emission, impact and control Methods

#### 2. Engineering and Project Management

- a) Introduction and type of engineering projects
- b) Project management basics
- c) Carbon capture project phases: from the technology evaluation and selection to EPC phase and Operation

#### 3. Process Simulation with ProTreat®

- a) Introduction of OGT and its software (ProTreat®, SulphurPro®, & ProBot™)
- b) ProTreat®, Rate-Based Process Simulator for carbon capture applications

## 4. Acid gas removal technology

- a) Process Design & Configurations
- b) Case study # 1 natural gas conditioning

### 5. Post-combustion carbon capture technology

- a) Process Design & Configurations
- b) Case study # 2 Steam Generator in Heavy Oil Operations
- 6. Pre-Combustion carbon capture technology
  - a) Process Design & Configurations
  - b) Case study #3 Hydrogen Plant Steam Methane Reformer
- 7. Plant Performance & Evaluation
- 8. Carbon Capture Plant Simulation with ProTreat® Hands-on
- 9. Discussion