

Continuing our tradition of providing better services for our customers' needs, Veolia is pleased to sponsor the 2023 Fuming Acid Safety and Technology Symposium on Tuesday, October 10, through Thursday, October 12, at the Hotel Monteleone, French Quarter, New Orleans, LA.

The meeting will cover a variety of safety, environmental, facility and regulatory issues. The products to be covered include sulfur trioxide (SO<sub>3</sub>), oleum (fuming sulfuric acid) and chlorosulfonic acid (CSA). Veolia desires to share our fuming acid safety knowledge and technology with our customers to meet our customers' needs for continued improvement in the safety, health and environmental arenas. We have also opened the attendance to include any members of the community near your site that you wish to sponsor. This would include any fire department, LEPC members or other HazMat groups. Many of the workshop topics and talks this year will involve emergency response. The agenda for the Symposium is geared towards operating, safety, maintenance, technical support and emergency response personnel.

Topics for this Symposium will be covered in small workshop groups to permit longer, more detailed discussions. We are offering ten workshops, of which each participant will be able to attend the five that he/she has the most interest in or is most relevant to their work.

We will also have a number of suppliers present to exhibit equipment and services. These will include personal protective equipment (PPE), valves, gaskets, pumps, hoses, instrumentation and other equipment/services. There will be ample time during the Symposium for the participants to view the exhibits.

Registration and Accommodations:

This Symposium is offered tuition-free for our customers and their sponsored community members. Participants will be responsible for their own transportation, lodging and other travel expenses.

Space in the Symposium is limited. Persons interested in attending must:

- 1. Register using this link: 2023 Fuming Acid Safety & Technology Symposium Registration Form
- 2. Book your own transportation. All travel costs are the responsibility of participants.

The deadline for registration is July 14, 2023.

Accommodations: A limited number of rooms have been reserved at the Hotel Monteleone for Symposium participants. Your hotel reservation will be made once your completed registration form is received. You will provide your credit card upon check-in at the hotel for all lodging charges.

A site tour of the Burnside plant is planned for Thursday morning for those that sign up. Site entry requirements are listed below in the Agenda.



# Workshops:

Personal Protective Equipment (PPE); First Aid & Medical Treatment

Participants in this workshop will discuss personal protective equipment (PPE) issues, uses and experiences. Levels of protection, chemical resistance of suit materials (permeation data), respiratory protection, training and inspection will be discussed. Examples of personal protective equipment will be displayed in the workshop. Participants will also discuss/review the Veolia recommended first aid and medical treatment procedures and protocols.

# Mechanical Integrity & Reliability Programs

Mechanical integrity is an important component of both OSHA's Process Safety Management (PSM) and EPA's Risk Management Plan (RMP) programs. The Veolia mechanical integrity resources for the Veolia sulfuric acid plants will lead this workshop with a focus on Quality Assurance and Mechanical Integrity systems, CMMS Processes, and Reliability Centered Maintenance strategies. Attendees should be willing to discuss their own plant status on their mechanical integrity programs to gain full benefit of the workshop.

#### Process Instrumentation & Recommended Alarms/Interlocks

Participants will review the various types of instrumentation and process control used in the manufacture, storage and use of sulfur-based acids. Topics will include level, pressure, temperature, mass flow and sulfuric acid strength measurement. Automatic valves, control loops and process control schemes will also be discussed. Participants are invited to discuss specific plant issues/problems they have encountered. A general review of alarms/interlocks on fuming acid storage and handling systems to make the facility "state-of-the-art" will be included.

#### Pumps, Valves, Hoses for Fuming Acids

Participants will review the various types of pumps, valves, and hoses used in the manufacture and use of sulfur based acids. Topics will include centrifugal pumps, magnetic drive pumps, air diaphragm pumps, plug valves, control valves, ball valves, and hoses. Participants are invited to discuss specific plant issues/problems they have encountered.

## SO<sub>3</sub>/Oleum Transportation, Unloading, Storage & Handling

This workshop will review the "best practices" for transporting and unloading rail cars, tank trucks and portable tanks of sulfur trioxide and oleum. "Best practices" will cover equipment, facilities and procedures. Driver training/certification and route selection can also be discussed. Experiences with "fume-free" disconnects will be emphasized. Also included will be a discussion of the "state-of-the-art" storage and handling facilities for SO<sub>3</sub> and oleum.



# SO<sub>3</sub>/Oleum/CSA Scrubber Design & Operation

This workshop will review the theory behind the design and operation of a scrubber system used for SO3, oleum, and CSA storage and handling facilities. The common commercially available types of scrubbing systems will be discussed, and proper selection of materials of construction, appropriate sizing, and instrumentation will be touched upon. A properly designed and operated scrubber system is essential for maintaining a "fume-free" environment around the SO3/oleum/CSA facilities.

## Storage Tank Standards, Materials and Corrosion Overview

NACE SP0294-06 is the industry practice for storage tank materials, design and inspection. This workshop provides insight on the highest priority requirements for the end-user to incorporate into their Mechanical Integrity Program. The presentation also includes a materials of construction and corrosion overview. The purpose of this section is to know what to look for, where to look and how to avoid some common materials and corrosion problems.

# CSA Storage & Handling

Storage, handling and transportation equipment used for CSA will be reviewed. This workshop will emphasize the proper facilities and procedures for unloading, storing and handling CSA. Materials of construction, storage tanks, pumps, piping systems and scrubbing systems will be reviewed along with "best practice" unloading procedures. Participants can select the degree of discussion detail, allowing the participants to discuss these or any other specific issues they may have with CSA.

# Tank Cleaning and Inspection

The latest techniques for safely cleaning, decontaminating and inspecting fuming acids storage tanks and equipment in an environmentally sound manner will be discussed in this workshop. The advantages and disadvantages of the different techniques will be reviewed. Variables to be considered include product, tank size, tank heel, tank location, weather conditions, scrubber facilities/condition and acid-handling capabilities. Industry Standards and recommended procedures for tank Inspections will be discussed.

#### Safe Work Practices/Line Break Procedures

This workshop will provide an overview of hazardous systems line breaks and how to manage them safely. Key definitions, training requirements, permits, important planning steps, and PPE will be reviewed. Veolia best practices will be reviewed and discussed, as well as any other safety concerns from participants.



## Agenda

Monday, October 9, 2023

5:00-6:30 PM Pre-Registration at Hotel Monteleone

Tuesday, October 10, 2023

7:00 AM Registration and Continental Breakfast\*

8:00 AM Welcome

8:10 AM Business Overview

8:25 AM Keynote Speaker

9:15 AM Introductions (Vendors and Hosts) Exhibitor Area Review\*

9:30 AM Break\*

9:50 AM Introduction to Fuming Acids - Main Ballroom

## 10:30 AM Workshop Period A

- Personal Protective Equipment; First Aid & Medical Treatment
- SO<sub>3</sub>/Oleum Transportation, Unloading, Storage & Handling
- CSA Unloading, Storage & Handling
- Tank Cleaning & Inspection

## 12:00 PM Lunch\*

1:00 PM Special Permits & Transportation Regulations - Main Ballroom - Jeff/Jennifer

# 1:15 PM Workshop Period B

- Pumps, Hoses & Valves for Fuming Acid
- Safe Work Practices/Line Break Procedures
- Storage Tank Standards, Materials and Corrosion Overview
- Mechanical Integrity & Reliability Programs

#### 3:00 PM Break\*

#### 3:30 PM Workshop Period C

- Process Instrumentation & Recommended Alarms/Interlocks
- SO<sub>3</sub>/Oleum/CSA Scrubber Design & Operation
- Personal Protective Equipment; First Aid & Medical Treatment
- Tank Cleaning & Inspection

## 5:00 PM Meeting Adjourns

#### 6:30 PM Dinner on your own

<sup>\*</sup> The exhibitors will be available for discussions of their products/services during breaks and lunch.



## Agenda

Wednesday, October 11, 2023

7:00 AM Continental Breakfast\*

8:00 AM Introductions

8:05 AM Emergency Response Preparation - Main Ballroom

# 8:50 AM Workshop Period D

- SO<sub>3</sub>/Oleum Transportation, Unloading, Storage & Handling
- Pumps, Hoses and Valves for Fuming Acid
- Mechanical Integrity & Reliability Programs
- Process Instrumentation & Recommended Alarms/Interlocks

10:20 AM Break\*

## 10:40 AM Workshop Period E

- Storage Tank Standards, Materials and Corrosion Overview
- CSA Unloading, Storage & Handling
- Safe Work Practices/Line Break Procedures
- SO<sub>3</sub>/Oleum/CSA Scrubber Design & Operation

12:00 PM Lunch\*

1:00 PM Burnside Overview - Safety and Security Access Info - Require Photo ID

1:15 PM Design and Practical Considerations for Proper Flange Make-up

2:00 PM Break\*

2:30 PM Emergency Response and Fuming Acid Mitigation

3:30 Historical Events

4:15 PM Certificates and Graduation

6:00 Dinner on your own

\* The exhibitors will be available for discussions of their products/services during breaks and lunch.



# Agenda

Thursday October 12, 2023

7:30 AM Continental Breakfast

8:30 AM Plant Tour Safety & Security Briefing - Main Ballroom

8:45 Head to busses

9:00 Busses Depart

Approx. 10:00 AM Tour of Burnside Plant \*\*

11:15 AM Leave for Hotel Montelone; snacks/drinks on busses

12:15 Arrive at hotel

- Valid ID. (Includes TWIC, US Driver's License, or valid Passport)
- Long sleeve shirts with a collar, long pants, no open toed shoes (tennis shoes, loafers, or closed toed low
- heels are fine).
- Hard hats, safety glasses, and hearing protection will be provided.

<sup>\*\*</sup> Entry requirements to the Burnside location are: