

HF Insider

The Latest News and Resources for Honeywell Hydrofluoric Acid Customers



Spring/Summer 2018

Welcome to the 2018 Spring/Summer edition of the HF Insider, our newsletter dedicated to hydrofluoric acid (HF). In this edition, we'll introduce you to Arthur Sheehan, global business manager, and Michelle Misiano, product marketing specialist. Other important topics include news about changes to personal protective equipment (PPE), the installation of PeopleNet to our HF fleet, and new stainless steel unloading hoses. We also are proud to share how we provided deinventory services to a customer following an emergency. We have exciting news about Augmented Reality training under development and finally, we offer reminders for important upcoming training opportunities, such as the Hydrogen Fluoride Safety Seminar starting July 30.

If you have ideas about how we can help improve your experience or suggestions for topics you'd like us to discuss in future editions, please let us know.

Thank you and enjoy!

Cheryl Wilkinson

Technical Services Manager, Industrial Fluorines

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MEET OUR NEW TEAM MEMBER - ARTHUR SHEEHAN

Role: Global Business Manager, HF/BF₃, Advanced Materials

Education: Bachelor of Science in Operations Research and Industrial Engineering, Cornell University; MBA, Columbia University.

Why are you excited to be in this role in the HF business? I am proud to be working with the world's largest HF production facility and the leader in HF reliability, technical services, and safety. HF is the core building block for all Fluorine Products and is a key material in many other industrial processes such as alkylation, leaching, and nuclear. We have a fantastic customer base. I really enjoy the depth of the customer relationships as some of the partnerships go back almost 20 years! I feel very energized as I work alongside our world-class, seasoned internal team from plant operations, technical services, sales, and transportation.

Past experience: I've been with Honeywell for 6 years. Prior roles included global product marketing manager for the Foam Blowing Agents business. Before that, I was a procurement manager covering our Specialty Products business.

What are your priorities in this role? My top priority is a zero-incident rate for any issues relating to safety, offloading, production, and delivery. I'm focused on enhancing our position as the technical services leader through continued innovation, such as implementation of level sensors on the trailers, PeopleNet on the tractors, and the use of Augmented Reality for training. Finally, we want to earn more business by continuing to bring exceptional value through reliable and safe supply to our customers

Dream job if not at Honeywell: I love the New England region and being on the water. Owning a fishing charter business in New England sounds great!

Family: I've been married for 7 years and we have two young boys - one is 18 months old and the other is 3 and a half years old. Our home is in New Jersey.

Hobbies/Interests: Between work and raising two active boys, there's not a lot of time for hobbies. When I do have time, I love anything to do with the water, like boating, fishing, and going to the beach.



MEET OUR NEW TEAM MEMBER - MICHELLE MISIANO

Role: Product Marketing Specialist, HF/BF₃, Advanced Materials

Education: Bachelor's degree in Finance, Pace University; MBA, Marist College.

Why are you excited to be in this role in the HF business? This is my first role at Honeywell so learning about the HF and BF_3 businesses has been new and interesting. The crossfunctional team has been welcoming and willing to help me learn.

Past experience: I began my career as a banking analyst and from there, I have transitioned into a variety of marketing roles in product management and brand merchandising management. I spent many years working for large paint companies, such as Benjamin Moore and Sherwin Williams.

What are your priorities in this role? The main priorities in this role are to support and manage all of the product marketing activities related to the HF/BF₃ businesses. This involves working closely with account managers, manufacturing, logistics, R&D, and technical services to support our customers to ensure quality products are delivered safely.

Dream job if not at Honeywell: It would probably be in the health and wellness industry. Living a healthy lifestyle is important and interesting to me.

Family: I have two young children (ages 2 and 3) that keep me entertained and very busy.

Hobbies/Interests: My hobbies are walking, yoga, pilates, or doing anything outside when the weather is nice. I also like watching football and baseball.



UPGRADING PERSONAL PROTECTIVE EQUIPMENT FOR OUR HF DRIVERS

In accordance with our commitment to safety, our Performance Materials and Technologies (PMT) HSE group has been reviewing the PPE requirements for all HF-related tasks. PMT has revised the PPE required for HF drivers when making anhydrous HF deliveries. At left is a picture showing the new PPE for anhydrous HF deliveries, as well as the corresponding PPE matrix.

	HF Level B
Suit/Clothing	Hooded HF-resistant chemical PPE
Eye/Face and Respiratory Protection (All respiratory protection shall be NIOSH/ equivalent approved)	Pressure-demand or other positive pressure mode (e.g., open/closed circuit) full-face supplied-air respirator with escape bottle
Head Protection (All hard hats used shall be ANSI/equivalent approved)	Hard Hat as required by PPE Hazard Assessment
Hand Protection	HF-Resistant inner gloves (HFIPI) and HF-Resistant outer gloves
Foot Protection	HF-Resistant boots, with safety toe and shank

What does this PPE upgrade mean to you?

The HF drivers will return to using the half C halo hood. The jacket and hood are integrated. Underneath this half C halo hood, there will be a pressure-demand, full-face supplied-air respirator with 5-minute escape bottle. The half C halo hood and pressure-demand, full-face supplied-air respirator are expected to be in service by mid-July. Our HF drivers' overall interaction with your team and delivery of the product remains unchanged.

Additional background:

Honeywell's HSE team is constantly working to ensure the safety of employees while performing hazardous job tasks. The HSE team identified an opportunity to upgrade the respiratory protection for HF drivers while offloading anhydrous HF. The half C halo hood configuration without full-face respiratory protection had an assigned protection factor (APF) of 25. The half C halo hood with the full-face supplied-air respirator has an APF of 1,000. Additionally, the use of respiratory protection follows the Hydrogen Fluoride Industry Practices Institute (HFIPI) recommendations. For HF users, these recommended practices are like what the API RP-751 is to the refining industry.

Please contact your Honeywell HF representative if you have questions about this change.

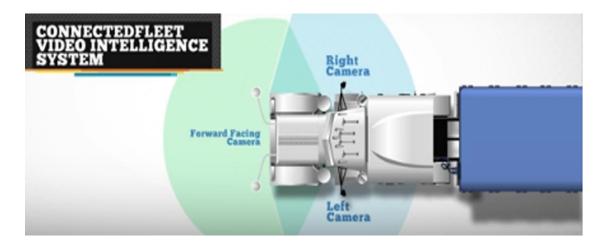
HF TRUCKS EQUIPPED WITH CAMERAS AND IMPROVED COMMUNICATION

We are excited to announce that our fleet of transportation trucks is upgraded with **PeopleNet**, a world-class digital system that is proven to improve safety and fleet efficiency, while being compliant with federal safety regulations.

Some of the features that PeopleNet technology provides for our fleet include:

• Electronic logs

- Safety features
- Tractor and trailer are equipped with a series of 4 cameras
- One camera mounted inside the cab faces forward, so it can see what the driver sees
- Each side view mirror has a camera that faces rearward
- A fourth, rear facing camera is mounted at the back of the trailer (not on all trailers yet)



Rear Facing Camera on Back of Trailer

Examples of situations when the camera system would be activated to provide a digital recording include:

- A vehicle accident or a hard-brake incident (system is designed to record the 8 seconds leading up to an incident, as well as the 12 seconds after the incident)
- Periodically, these cameras will be activated by Honeywell management to observe driver performance
 - The cameras can be activated during transport, as well as during the off-loading

process. We want to observe the drivers so that exemplary safety behavior can be recognized, while identifying coaching opportunities for others who are on their continual journey of safety excellence.

Please take a moment to view this <u>video</u> for a demonstration of how these cameras will be utilized. The video is less than 4 minutes and provides actual incidents that were captured by the <u>PeopleNet</u> system.

If you have any questions, please feel free to reach out to your account manager.

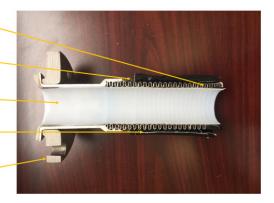
(Shown with optional 1/8" vent port accessory)



HF DELIVERY FLEET TRANSITIONING TO STAINLESS STEEL HOSES

As part of our commitment to continually improve our HF truck fleet, new state-of-the-art stainless steel hoses are being installed. These hoses comply with HFIPI requirements and are intended to further reduce the potential for failures due to hose-related issues.

- Corrugated Flexible Stainless Steel Shell
- Stainless Steel Wire Braided Exterior
- · Teflon internal liner
- Loose wrapped, spiral wound hard plastic protection (protect against fraying)
- Stainless Steel 4-bolt 150lb Flange



As shown, the new hose has a TeflonTM internal liner, surrounded by a flexible 316 stainless steel hose, and further surrounded by a stainless steel, wire braided exterior. The hose has weep holes at each flanged end.

In addition to being lighter, it has a tighter bend radius and will hold up against abrasions and impacts better than rubber hoses. Working temperatures for this hose are minus 20° F to plus 350° F. The transition to these stronger, more durable stainless steel hoses is underway and we expect the entire fleet to be outfitted with the new hoses by the end of the year.

Teflon is a registered trademark of The Chemours Company.

HF DEINVENTORY SERVICES - MEETING OUR CUSTOMER'S URGENT REQUIREMENT

When a major Texas refinery needed to remove HF Acid from its alkylation unit to perform emergency repairs, our HF team was immediately called upon to assist. The team developed and implemented an HF deinventory plan urgently and flawlessly. After quickly assessing the situation, the team visited the customer and worked long hours through the weekend to put together and execute the HF deinventory in a matter of days – a task that typically takes several months.

"We are very proud that our HF deinventory services are able to assist our customers, even in emergency situations," said Arthur Sheehan, global business manager, Honeywell HF/BF₃. "It is rewarding to apply our HF expertise and capabilities in collaboration with our customers to exceed their expectations."

Sheehan explained that, in parallel to the deinventory planning, the team worked with the customer to reach a deinventory service agreement that allowed both parties to work

quickly to get the job done. He added that our team, which also included Cheryl Wilkinson, Tony Loggie, Alessandra Marcarian, Larry Dull, and others, planned and implemented a safe, incident-free deinventory in 7 days from initial notification by the customer.

Feedback from the customer about our assistance during this emergency repair was very positive. The customer's HF alkylation process project manager said, "Honeywell was contacted on a Friday, and we were able to develop a plan and mobilize by mid-week the following week... everything was completed smoothly, safely, onschedule, and without incident. The Honeywell team really came together on very short notice to support us... ensuring this task went seamlessly start to finish."

The customer's strategic sourcing manager added, "I can only think of a handful of times in my 30-year career in which I've seen two large companies come together so quickly to accomplish such a critical task."



To learn more about our HF deinventory services, download our flyer.





AUGMENTED REALITY - EXCITING HF TRAINING POSSIBILITIES...AND IT'S COOL!

All around us, we see how the digital world is impacting our physical world. At Honeywell, we've been exploring how technology can be used to improve how we serve our customers. One of the emerging technologies is Augmented Reality (AR). AR is an innovative technology that superimposes a computergenerated image on a user's view of the real world, thus enhancing or "augmenting" the user's view of reality and allowing for an interactive experience.

One of the AR initiatives we are developing will be to enhance our HF customer training on

proper Capping Kit installation on an HF trailer in the event of a leak. Here's a sneak preview of some of the benefits that AR training could provide:

- After instruction on how to properly install the Capping Kit, customers would practice what they have learned through three AR scenarios:
 - 1) show me
 - 2) help me
 - 3) and try me

Additional benefits:

- Ability to enhance training and simulate complex situations and conditions
- Ability to simulate typical failure modes with varying degrees of difficulty
- Can support multiple users allowing others to share in the experience, compete, and learn by watching
- Digital documentation of skill competency
- AR provides a multi-sensory learning experience that meets the learning experience of the current workforce

Benefits from a bottom-line perspective:

- Reduced risk for an incident that is not properly mitigated due to lack of training
- Ability to train new employees on demand and ensure they are prepared to support emergency response

Augmented Reality is on the leading edge of training to reduce risk and improve competency. We look forward to bringing this industry-leading technology to our customers. As AR training gets closer to being launched later this year, we'll continue to keep you well-informed.

REGISTER TODAY FOR OUR TRAINING SESSIONS!



RECOMMENDED TREATMENT OF HF EXPOSURES WEBINAR

There is still time to register for our "Recommended Medical Treatment of HF Exposures" interactive webinar hosted by Dr. Elizabeth Jennison.

When: October 10, 2018 - 1:00 p.m. ET

How: Visit <u>www.hfacid.com</u>, select the "Contact Us" tab, select "Register for Training," then choose "Recommended Medical Treatment of HF Exposures Webinar" from the drop-down list and complete the registration form. It is free of charge for all Honeywell HF customers.



HANDS-ON EMERGENCY RESPONSE TRAINING

In-depth, hands-on training in Baton Rouge, La. To make response exercises meaningful to all participants, the number of attendees is capped at 25. Participants will be responsible for travel, lodging, and meal expenses. Honeywell will assume the cost of the training and sponsor a group dinner. Lunch will be provided during the incident response exercise on the third day.

When: October 16-18, 2018 - Fall Customer HazMat (Class is full)

Because this HazMat emergency response training is in high demand each year, we encourage you to register for the training now. We will add you to a participant list for the 2019 training (dates will be shared soon).

How: Follow the same registration process as above, but select "HF Emergency Response Training" from the drop-down menu. It will show the October training, but we'll add you to the 2019 list. These sessions and others are ideal for personnel new to the HF Acid industry, or as a refresher for more experienced employees.

ADDITIONAL TRAINING RESOURCES

To stay informed about upcoming training being offered, visit www.hfacid.com. On the HF Acid website under Literature/Technical Service Offerings, you can download information sheets that describe the various technical services and training opportunities provided by our HF team.





The Hydrogen Fluoride Panel of the American Chemistry Council (HF Panel), along with HFIPI, are now accepting registrations for the next **Hydrogen Fluoride Safety Seminar** to be held **July 30 - August 1, 2018** at the **Westin Hilton Head Island Resort & Spa** in Hilton Head, South Carolina. The 2018 Seminar aims to cover the following topics:

- Safety Incidents and Lessons Learned
- Safe Handling of HF- What's New?
- New Regulations on Tank Car Design and Maintenance
- Emergency Preparedness and Response Planning

Learn More Here

Be sure to reserve your spot in this gathering of HF industry professionals and take advantage of this unique learning and networking opportunity today. **Register today!**

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