Welcome and thank you for joining us for the last in a series of four webinars to discuss the content and implementation of the new ANSI/API Recommended Practice 754, Process Safety Performance Indicators for the Refining and Petrochemical Industries.

All four webinars are being recorded for future playback on the API website.

My name is Dawn Wurst and I am the Safety Director for Flint Hills Resources’ Pine Bend Refinery and it was my pleasure to serve as a member of the RP-754 drafting committee.

Following the presentation, there will be an opportunity for questions and answers.

Let’s get started.

In this session we will be covering the data necessary to implement API 754, an overview of the general work process, and also how the data can be used for your company’s and employee’s benefit to improve your PSM program.

I will also be sharing some examples along the way to help you picture what real-life implementation looks like.

•TRANSITION TO NEXT SLIDE
Implementation of RP-754

- Background
- Implementation Process
- PSE Data Capture
- Introduction to Recordkeeping Spreadsheet
- Useful References & Examples
- Data Analysis Examples
- “What’s in it for me?”
- Where to go for help

This webinar is focused on implementation. If you are looking for further detail on the structure or purpose behind 754, I encourage you to view the previous webinars published by API.

-Overview topics as listed →

• TRANSITION TO NEXT SLIDE
• If you have participated in previous webinars, this graphic may look familiar to you:
  • The pyramid itself reflects the 1931 Heinrich model which embodies two key concepts:
    • First, events can be placed on a scale of increasing consequence
    • Second, precursor or predictive events occur at a lower consequence for each event with a higher consequence
  • In terms of the Chemical Safety Board recommendation
    • Tier 1 serves as a lagging indicator
    • Tier 2 serves as a leading indicator (predictive of Tier 1)
    • Tiers 3 & 4 serve as indicator for use at individual facilities [WE WILL TALK MORE ABOUT TIER 3 REGARDING RESULTS COMMUNICATION LATER IN THE PRESENTATION]
  • Leading and lagging labels are often debated, but the classification is not important.
    • The important point is to capture information that can be acted upon to correct a situation.
    • Indicators at the top of the pyramid tend to be more lagging, while indicators at the bottom tend to be more leading or predictive
  • Tier 4 and to some extent Tier 3 are the action end of the pyramid. It is at this level that performance is improved which in turn affects the outcome measured by Tiers 1 & 2.
Critical First Step:
- Education & Awareness on the value of metrics as they apply to Process Safety
  - You can't track what you never hear about, monitor, or see

• API 754 is focused in unplanned losses of primary containment. If the connection between losses of containment and process safety are not made for employees and contractors, they may not understand the importance of reporting even minor leaks and releases.

• As you implement API 754, I would encourage you to incorporate frequent communication regarding how process safety can be improved if losses of primary containment are detected, reported, measured, and investigated.

• Since Tier 1 and 2 metrics will be reported externally, it is imperative that the metrics reflect the reality of the issues in the plant. You cannot capture those unless the facility is educated on why they are important to encourage accurate and consistent reporting.

• In the next several slides, I’ll be walking you through the data collection and reporting process for Tier 1 & 2 metrics

• TRANSITION TO NEXT SLIDE
As covered in previous API 754 Webinars, a Process Safety Event (PSE) is defined as an unplanned or uncontrolled release of material, including non-toxic and non-flammable materials, from a process which results in specific consequences.

- A basic work process for event review and analysis is shown here <<animate through each box>>
  - Monitoring unplanned LOPC events, either looking specifically for LOPC events or by filtering already reported or recorded events
  - Determining if events meet API 754 Tier 1 or 2 criteria – this step could be done manually or by logic written in the facility or company’s reporting system
  - Data associated with the Tier 1 or 2 event is then tracked and recorded internally for future reporting (Note that data sharing will be handled on a gradual basis as API 754 roll-out matures over the next few years)
  - An important step comes when the event is investigated according to your company’s investigation requirements or standards
  - The process safety improvement step comes when the cause of the event is determined and improvement areas are identified. This step is also a great opportunity to share learnings both internally and externally to maximize the benefit of the lessons learned.
Example Event

• Process upset
• 40 lbs H₂S released through a pressure safety device (PRD/PSV) on a tank
• Release results in a shelter in place order within the facility
• No offsite impact
• Tier 2 event

The details of the example event are as follows:

-The site had a process upset which resulted in a release of 40 pounds of Hydrogen Sulfide through a pressure safety device or PSV located on a tank
-Due to the proximity of the release to nearby personnel and the potential for additional releases, the site issued a shelter in place order within the facility
-There was no offsite impact of the release

-Based on API 754 classification covered in the 2nd Webinar on Tier 1 & Tier 2 Events, this event is classified as a Tier 2 Event.

TRANSITION TO NEXT SLIDE
In order to assist users of API 754 to determine if their events meet the Tier 1 and 2 PSE criteria, API 754 includes a useful flowchart that walks through the logic steps of event classification.

I’d recommend that you use this flowchart in both your training of personnel classifying incidents (if applicable), and also as a basis to audit classifications once they are entered, especially if the classification is done automatically via scripts or macros in existing databases or data collection systems.

To point out how it’s used, I’ll now walk through our earlier PSV example to show you how the flowchart confirms our PSE classification result of Tier 2.

<<Walk through flowchart via Hyperlink, using PSV example again (use animation circles & x’s to show applicable boxes to arrive at final decision)>>

**TRANSITION TO NEXT SLIDE**
Here is an example to walk through the steps we have just covered <<animate through each box>>:

• As an outcome, the facility might edit their operating procedure through their existing procedure MOC process, and then communicate with others in their site, company, or even industry depending on the significance of the learning or severity of the event.

• In order for users of API 754 to drive process safety performance improvement, data must be captured accurately and consistently. This will allow data to be analyzed, compared and utilized in benchmarking studies- all going back to consistent definitions/basis.

• TRANSITION TO NEXT SLIDE
The purposes of required data capture and reporting include:

• Each event is an opportunity for learning and improvement
• Cumulative data provides for analysis and benchmarking of performance
• Reporting of PSE data to industry associations can trigger to focus of industry resources to address common issues.

Basic information is to be captured and reported for each Tier 1 & 2 event.
Additional information to be captured and reported for Tier 1 and 2 events includes:

<<Read from slides.>>

This information will help at an industry level in determining where joint efforts should be targeted to reduce incident frequency.

The following slides cover an example data reporting format.
API Sample Tier 1 & 2 Data Reporting Format

- Data collection may be done a number of different ways
- A sample spreadsheet has been prepared to show data to be collected on Process Safety Events (PSEs)
- Spreadsheet includes:
  - Introduction/Instruction Tab
  - Site Data Tab
  - Event Recordkeeping Tab
  - Reference Tables Tab
  - Pick list Tab

- Facilities implementing API 754 are coming from a number of different starting places concerning existing event data collection systems. Because of this, I’ll emphasize that there are number of different ways that data can be collected.
- Today I am covering a very basic spreadsheet method for data recordkeeping. Your facility/company may have an existing system that can export the same data, making a separate spreadsheet unnecessary. Use of this spreadsheet is not required, although collecting the data included in the spreadsheet is. The required data is also specifically referred to in API 754.
- I’ll be walking through the spreadsheet next to help you understand what is there and why.

**TRANSITION TO NEXT SLIDE**
The Site Data Tab contains basic information about the site where the LOPC data was generated from.

The spreadsheet is designed to only require one line of data to be completed for the site associated with the data.

Now I’ll walk through the specific data included. Note that the 1st data line (noted with gray shading) is an example that is contained in the spreadsheet, while the 2nd data line is meant to show what a real facility would be entering.

- Basic site data comes first, including the corporation name, company name, a company code (chosen by API), followed by the site name & site code, which is selected by the company. The Site ID is a code chosen by API for their records. Next you’ll input the country and state or province where the site is located.

TRANSITION TO NEXT SLIDE
- Continuing to the right on the spreadsheet, you have the option to include the city, followed by the facility type (using the North American Industry Classification System or NAICS or equivalent system) and facility type description, such as refinery or gas plant.

- Next, normalizers are included. The normalizers will be used when site data is combined for industry benchmarking purposes. Normalizers include employee hours and contractor work hours, further defined in Section 3.1 (Definitions) and Section 10 (Reporting) of API 754. Also included on the spreadsheet are Refining Capacity in barrels per day and Refining EDC (Equivalent Distillation Capacity). There are also columns to include other normalizers if appropriate.
Further to the right, in the additional information section, each site would input:
- the reporting year for the data included,
- Whether or not they are reporting the data to other groups,
- Who they are reporting to, such as NPRA (National Petrochemical & Refiners’ Association) or CCPS (Center for Chemical Process Safety),
- The reporting basis for the data is included, such as API 754 or the CCPS criteria.

• TRANSITION TO NEXT SLIDE
The last section of Site data includes:

- The age of the site, then whether or not the site was
  - Operated the full year
  - Included in the metrics during the previous year
  - Currently open or closed
- And Lastly, if a change in ownership has occurred during the reporting period
Event Data Tab

- One line of data would be entered on the Event Data tab of the spreadsheet for each Process Safety Event that meets the Tier 1 or Tier 2 criteria.

The Event Data Tab contains the detailed Process Safety Event information that meet Tier 1 or Tier 2 criteria.

- Again, this spreadsheet shows what the required data includes, though this specific spreadsheet is not required as a means to submit the data.

- Each participating facility will be required to record this data for each of their Tier 1 or Tier 2 PSEs (one data line per event)

- Now I’ll walk through the specific data included, using our earlier example of a PSV release. Note that the 1st data line (in gray) is an example that is contained in the spreadsheet, while the 2nd data line is meant to show what an actual facility would be entering.

TRANSITION TO NEXT SLIDE
On the Events tab of the spreadsheet, the site would enter the following information for this event:

• Site code (chosen by the company)

• The date and time of the event

• The type of process where the Loss of Primary Containment occurred; Note that the options for this and other columns are included in a drop down list in the spreadsheet. The options are also listed in Section 10.4.4 of API 754 if a company is not using the spreadsheet for data recording.

• Next, the mode of operation during the event- in this case an upset condition.

• The point of release is the equipment type where the Loss of Primary Containment was released from- in this case a relief system or PSV

• The type of material released is listed as one of several general categories- again, selected from the list included in Section 10.4.4.- in this case Toxic for H2S

• The required information continues on the next slide (further to the right on the same spreadsheet)

TRANSITION TO NEXT SLIDE
It is optional to include a short description of the even, and also optional to include a basis or justification for the classification of the event (in this case Tier 2).

The next section captures injury consequences of the event.
- Each injury column is defaulted to zero. Since no injuries for either employees or contractors were involved in this incident, all injury columns remain at zero.

**TRANSITION TO NEXT SLIDE**
The next section covers evacuation. Since no officially declared community evacuation was involved, this column remains with a ‘No’ entry.

In the Fire/Explosion section, the direct cost of the fire or explosion is recorded. Since there was no fire, this is left at ‘None’

The following section covers pressure relief devices or PRDs, which is applicable to the example event.

The first column of this section asks if a PRD relieved directly to atmosphere or via a downstream destructive device. This is true- and the volume was a Tier 2 volume (as shown in Table 2) and went to atmosphere, thus it is recorded as shown.

TRANSITION TO NEXT SLIDE
As we continue through the PRD discharge section, the applicable sections are made:
- There was no liquid carry over, no discharge to an unsafe location, and no public protective measures were required
- However, there was an onsite shelter in place order, so this is recorded in the appropriate column

Next, we move to the Acute Release section.

- Because Hydrogen Sulfide or H2S is considered a toxic substance, it is recorded as an Acute Release Threshold Category 2 release (TIH Zone B). Refer to the Webinar on Tier 1 & Tier 2 for more information about release classification. The example event is listed as Tier 2 level because the amount (40 pounds) was less than the Tier 1 quantity of 55 pounds, but greater than the Tier 2 quantity of 5.5 pounds.

TRANSITION TO NEXT SLIDE
After placing the release in the appropriate category, the site must also note whether it was an indoor or outdoor release.

Lastly, each event is summarized with a Tier 1 or Tier 2 Classification and an optional Event Type, such as PRD Discharge, Acute Release, or Injury. In the case where multiple categories apply, the most severe should be recorded.

For example, if a Tier 2 release causes a lost time injury or hospitalization, the type should be listed as Injury. Again, this last field is optional, but helpful when summarizing information.

For this example, the release quantity was in Tier 2, and it was classified as a PRD Discharge since the release came out of a PRD and there was an onsite shelter in place order as a result.

TRANSITION TO NEXT SLIDE
### References

- It is useful to create a common list of substances involved at your facility that could be released
- Include the Threshold Release Category (i.e. TIH Zone), Threshold and Quantity

<table>
<thead>
<tr>
<th>Classification</th>
<th>Tier 1 - Higher consequence</th>
<th>Tier 2 - Lower consequence</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute Release</td>
<td>Flammable Gas (flashpoint &lt; 73°F, boiling point &lt; 85°F)</td>
<td>Flammable Liquid UNDG, PG II (flashpoint &lt; 75°F, boiling point &gt; 95°F)</td>
</tr>
<tr>
<td></td>
<td>Flammable Liquid UNDG, PG III (flashpoint ≥ 73°F and ≤ 76°F)</td>
<td>Flammable Liquid UNDG, PG II (flashpoint &lt; 75°F, boiling point &gt; 95°F)</td>
</tr>
<tr>
<td></td>
<td>Combustible Liquid (flashpoint &gt; 10°F) released above flashpoint</td>
<td>Combustible Liquid (flashpoint &gt; 10°F) released above flashpoint</td>
</tr>
<tr>
<td></td>
<td>Toxic Substances (See Table 1 for details)</td>
<td>Toxic Substances (See Table 1 for details)</td>
</tr>
<tr>
<td></td>
<td>Ammonia, Anhydrous</td>
<td>Ammonia, Anhydrous</td>
</tr>
<tr>
<td></td>
<td>Ammonia, Solution (55-95% solution)</td>
<td>Ammonia, Solution (55-95% solution)</td>
</tr>
<tr>
<td></td>
<td>Chlorine</td>
<td>Chlorine</td>
</tr>
<tr>
<td></td>
<td>Hydrogen Sulfide</td>
<td>Hydrogen Sulfide</td>
</tr>
<tr>
<td></td>
<td>Hydrogen Fluoride, Anhydrous</td>
<td>Hydrogen Fluoride, Anhydrous</td>
</tr>
<tr>
<td></td>
<td>Phosphorus Acid, 60% solution</td>
<td>Phosphorus Acid, 60% solution</td>
</tr>
<tr>
<td></td>
<td>Hydrofluoric Acid, 40% solution</td>
<td>Hydrofluoric Acid, 40% solution</td>
</tr>
<tr>
<td></td>
<td>Sulfuric Acid (exothermic)</td>
<td>Sulfuric Acid (exothermic)</td>
</tr>
<tr>
<td></td>
<td>Sodium Hydroxide (exothermic)</td>
<td>Sodium Hydroxide (exothermic)</td>
</tr>
<tr>
<td></td>
<td>Sodium Hydroxide (spent and treated)</td>
<td>Sodium Hydroxide (spent and treated)</td>
</tr>
<tr>
<td></td>
<td>Sulfur dioxide</td>
<td>Sulfur dioxide</td>
</tr>
</tbody>
</table>

### Variant (See detail)

- In addition to the flowchart, it is useful for facilities to compile references for API 754 that are specific to their facility or type of operation.
- This example shown is a reference table for Tier 1 and Tier 2 releases in a refinery operation. Note that the list of toxic substances includes only those that the facility has on site, for ease of use by those classifying events.
- This example would be most useful to those working to implement API 754 for several sites (common group to multiple facilities), assuming they are knowledgeable on the classification categories.

**TRANSITION TO NEXT SLIDE**
**References**

- **Another example of a release threshold table (site-specific):**

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Hazard Classification</th>
<th>Tier 1 (Threshold)</th>
<th>Tier 2 (10%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute Release = Exceeds threshold in &lt;=1 hour</td>
<td>Threshold (lbs)</td>
<td>Barrels</td>
<td>Gallons</td>
</tr>
<tr>
<td>#1 Fuel Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>#2 Fuel Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Ammonia</td>
<td>Toxic Inhalation Hazard</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Butane</td>
<td>Flammable Gas</td>
<td>1100</td>
<td>0.64</td>
</tr>
<tr>
<td>Chlorine</td>
<td>Toxic Inhalation Hazard</td>
<td>55</td>
<td>0.64</td>
</tr>
<tr>
<td>Clarified Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Crude Oil</td>
<td>Flammable Liquid</td>
<td>2200</td>
<td>0.64</td>
</tr>
<tr>
<td>SRC Gasoline</td>
<td>Flammable Liquid</td>
<td>2200</td>
<td>0.64</td>
</tr>
<tr>
<td>Gas Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Heavy Alkylate</td>
<td>Flammable Liquid</td>
<td>2200</td>
<td>0.64</td>
</tr>
<tr>
<td>Heavy Cycle Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Heavy Vacuum Gas Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Hydrogen</td>
<td>Flammable Gas</td>
<td>1100</td>
<td>0.64</td>
</tr>
<tr>
<td>Hydrogen Sulfide</td>
<td>Toxic Inhalation Hazard</td>
<td>55</td>
<td>0.64</td>
</tr>
<tr>
<td>Light Cycle Gas Oil</td>
<td>Flammable Liquid</td>
<td>2200</td>
<td>0.64</td>
</tr>
<tr>
<td>Light Cycle Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Light Vacuum Gas Oil</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Naphtha</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>MEA</td>
<td>Combustible Liquid</td>
<td>440</td>
<td>0.64</td>
</tr>
<tr>
<td>Propane</td>
<td>Flammable Gas</td>
<td>1100</td>
<td>0.64</td>
</tr>
<tr>
<td>Sulfur Dioxide</td>
<td>Toxic Inhalation Hazard</td>
<td>220</td>
<td>0.64</td>
</tr>
</tbody>
</table>

- **This table is a simple list of common streams for a specific site, and includes their Tier 1 and Tier 2 threshold.**

- **This table shows an example of a customized materials list for one site, which could easily be used by a Maintenance or Operations employee or Front Line Supervisor.**

- **TRANSITION TO NEXT SLIDE**
Examples Section of API 754

- Annex A contains multiple examples of events and their correct classification using API 754
- Annex A is organized by event type, and includes a determination for each example of what the resulting classification would be based on the event described

| Loss of Primary Containment (LOPC) | 19) An operator opens a quality control sample point to collect a routine sample of product and material splash on him. The operator runs to a safety shower leaving the sample point open and a Tier 2 threshold quantity is released. This is a Tier 2 PSE since the release of a threshold quantity was unplanned or uncontrolled. Same as above, however, the operator catches the sample, blocks the sample point and later drops and breaks the sample container resulting in exposure and injury from the sample contents. This is not a PSE because the LOPC is from a piece of ancillary equipment not connected to a process. | Tier 2
$\S 6.2$, Tier 2 Definition | Not a PSE
$\S 1.2$, Applicability |
| 20) A bleeder valve is left open after a plant turnaround. On start-up, an estimated 15 lb of fuel oil, a liquid with a flashpoint above 60°C (140°F), is released at 55°C (131°F) below its flashpoint onto the ground within an hour and into the plant's drainage system before the bleeder is found and closed. This is a Tier 2 PSE. Same as above, except the release temperature is above the flashpoint, thus, it would be a Tier 1 PSE. | Tier 2
$\S 6.2$, Table 2 |
| Tier 1
$\S 6.1$, Table 1 |

- A useful list of examples, organized by category (such as injury, loss of primary containment, and pressure relief devices), is included in Annex A.
- The Annex includes over 50 detailed examples.
- The last column contains the correct classification of the situation (i.e. Tier 2), along with a reference to the section of API 754 used to make the determination.

- TRANSITION TO NEXT SLIDE
Extending API 754 Data into Industry, Company & Site Analysis

- It is a natural extension of API 754 data collection to develop trends, breakdowns, and pareto charts by industry-type, company and by site
- The following slides contain examples of what can be done with API 754 data once it is collected.

- I’ll now walk through some examples that show what could be voluntarily done by a company or site with the API 754 data to determine specific process safety areas that require improvement.

- TRANSITION TO NEXT SLIDE
API has been collecting petrochemical industry data with somewhat similar criteria to Tier 1 PSEs for several years.

This is an example of analysis that is possible when data is reported in using clear criteria on process safety events.

Note that the 2nd pie chart is a breakdown of the releases in refineries by type of material released.

This data can be used to better target proactive efforts on an industry, company, and site level.

For example, the data on the right pie chart shows us that the majority of the releases in refineries in 2008 occurred in liquid form and were not toxic materials.

TRANSITION TO NEXT SLIDE
• When analyzing API 754 data on a site level, the site may also choose to track Tier 3 data, similar to Tier 1 & 2 as covered earlier in this presentation.

• This data allows the site to determine what types of process safety events are occurring most often within a certain time frame [this example was for a 1 year period]

• In this case, challenges to safety systems (such as heater trips) were the leading type of Tier 3 process safety events

• TRANSITION TO NEXT SLIDE
• This chart shows an example of how Tier 1, 2, and 3 data could be used to compare performance within a company at various sites.

• The colors represent various types of PSE, while the columns show the severity and count of events (Tier 1-3).

• This data can be very useful when analyzing PSEs to look for trends and differences among sites.

• For example, this chart would tell you that the 2 sites with the largest amount of events were struggled most with safety system challenges (Tier 3), but also had fires as their most prevalent type of Tier 1 event.

• TRANSITION TO NEXT SLIDE
• This slide shows an example of how PSE data collected can be analyzed within a site. There are many potential ways to slice & dice this data- including by LOPC-type, severity of impact, time/month, etc.  

• For example, this analysis shows that most events at this site occur during normal operations, and of those, most incidents involve pumps- which are spread among all 5 areas of the facility.

• This type of analysis is helpful to pinpoint improvement areas on a broad basis for a site or company, rather than only looking at a specific event or list.

• TRANSITION TO NEXT SLIDE
"What's in it for me?"

- Classification and communication of facility events as Process Safety Events is a powerful catalyst for Process Safety awareness
- Data collected on events can be used to:
  - Draw attention to areas of process safety that employees are not aware of
  - Focus in-depth investigations on specific 'repeat offenders'
  - Pareto the highest frequency of events to better allocate resources and equipment
  - Assist with prioritizing project resources for equipment improvements
  - Categorization and prioritization of events is an excellent learning tool for facility personnel on critical areas of process safety
  - Trigger actions which become a 'what have I done for you lately' list of specific process safety improvements
  - Show improvement over time, which should be communicated both internally and externally

• After data collection and categorization is complete, API 754 results have many benefits for participating sites.
• Read through points listed, including examples such as
  • Priority of a safety system challenge vs. a PSV relief with liquid carry over as far as level of investigation and management review required sends a clear message to an organization about what Management and Safety consider important and worthy of more analysis
  • Also, simply requiring basic investigations of Tier 3 PSEs would send a message that they are expected to be minimized—such as PSV overpressures to a flare system with no carry over
• Analysis of events can be extremely helpful when prioritizing equipment improvement projects for the coming year
• Data from events are also useful during PHAs, since Tier 2 or 3 data may include incidents that previously were not considered or investigated, yet provide useful Process safety learnings.

• TRANSITION TO NEXT SLIDE
Local [Site] Public Reporting

- Each site determines the appropriate methods to communicate PSE information.
- Annual report of site-specific Tier 1, 2, 3, and 4 PSE information to employees and employee representatives.
- Annually, each Company makes available a summary of site-specific Tier 1 and 2 PSE information and may report site-specific Tier 3 and 4 PSE information to the local community and emergency management officials.

*Speak to contents of the slide*

*Transparency is valued by our employees and communities*

*Internal reporting can be handled using a simple one-page website available to all employees and contractors as well as other measures communications the facility already has in place for other safety measures.

*Local community reporting could be accomplished in an annual face to face discussion with a community advisory council if a facility has one, explaining the basis for Tier 1 and 2 API 754 classification, as well as the local site’s results. Over time, changes since the initial years data were collected can be very useful for comparison purposes.*

*Exemption: Unattended, remote-operated, or single-manned facilities are exempt.*

*Exemption: Remote sites where the worst potential-case LOPC cannot impact any public receptors are exempt.*

*TRANSITION TO NEXT SLIDE*
Where to go for Help

- **API website:** [http://api.org/standards/psstandards](http://api.org/standards/psstandards)
  - Access to API 754 Recommended Practice
  - Sample Data Spreadsheet
  - Webinar Presentations
  - Contact Information for API personnel if questions arise
  - Benchmark information for member companies who participate in data collection

- **CCPS website:** [http://www.aiche.org/ccps/](http://www.aiche.org/ccps/)
  - Full list of materials cross-referenced to the UN Dangerous Goods definitions

- **NPRA website:** [http://www.npра.org/](http://www.npра.org/)
  - Many resources for member companies

- **DOT Resources:**
  - Hazardous Materials Table (§ 172.101)
    [http://dot.gov/sites/table4172101qofh.html](http://dot.gov/sites/table4172101qofh.html)

• Several resources are available for those using API 754
• Walk through content on slide

• TRANSITION TO NEXT SLIDE
As I said at the beginning, all four webinars are being recorded for future playback on the API website.

If you have any questions or comments beyond today’s webinar, Karen Haase is the API Staff member tagged to RP-754.

Her contact information is shown on the screen.

Also, RP-754 is available for free electronic download at the URL shown.

Okay, let’s open it up for questions.
*Following any questions, TRANSITION TO NEXT SLIDE*