

The State of PSI Practice

CEFIC-EPSC Conference, February 1st, 2012

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Process Safety Indicators

Why do we need PSI?

- Ambition & Understanding

What have we learned so far?

- EPSC Members Working Group on PSI

Where are we heading?

- Our Challenges



Why PSI?

- “Give confidence and assurance to site and company leaders that process safety is not only under control but also subject to continuous risk reduction”
- Responsibility under Responsible Care & Integral part of Sustainability



What have we learned so far? (1)

- EPSC recommends the use of indicators to manage process safety performance

...and we had intense discussions

- How do you know your performance?
The limitations of the traditional safety iceberg model



What have we learned so far? (2)

- Following analysis in 2010 EPSC endorses both CEFIC guidance and CCPS/API754 as technically fit for purpose for reporting of lagging indicators
 - Members have their own preferences and those differ
 - Fit for purpose..., very similar principles however different in substances classification and thresholds..., resulting in different outcome
 - Summarizing conclusions as presented to EPSC TSC
- EPSC commissioned FERRET (Fires, Explosions & Releases Reporting Tool), facilitating reporting of process safety incidents in both CEFIC and CCPS systems using several hazard classification systems



What have we learned so far? (3)

- EPSC Members Working Group on PSI focus has shifted towards exchanging experience in the developing and use of leading indicators
 - Pro-active
 - Better coverage of process safety activities
 - Steering resources
 - EPSC leaflet gives a brief overview of collective experience



Where are we heading? (1)

- Process Safety Incident reporting: Living with different approaches in determining whether an incident classifies as a Process Safety Incident
 - Different choices (e.g. UN DG, GHS, threshold quantities)
 - Different (legal and societal) contexts (e.g. Seveso)
 - Additional efforts and costs – or – a different subset of the more detailed in-company reporting?
 - Benchmarking & target setting?



Where are we heading? (2)

- Public reporting
 - How to use PSI?
 - What is the message?
 - Does PSI reporting deliver?
 - Role of Associations



Where are we heading? (3)

- The use of Leading PSI
 - Highly recommended
 - Predictive value
 - Sharing successes



Concluding Remarks

- The use of Process Safety Indicators, both lagging and leading, will give a better understanding of process safety performance and help deciding where to put resources. Embedded in a clear strategy it will support communication with stakeholders
- There are challenges; multiple solutions may exist. Today there are parallel workshop sessions to exchange experience, to learn and to influence the way forward: shaping a future in which PSI have a clear added value in managing process safety



Picture in slide 5

Conclusions (extracted from EPSC TSC April 2010)

- Not one system catches all. Some incidents are caught only in GHS, some (other) incidents are caught only in API-T1+T2.
- From technical perspective either GHS or API-T1+T2 will work. We would not advocate using only API T1 unless there is another internal company system.
- With a certain (extended) dataset it is possible to extract data according to both approaches. However it results in additional work and may not bring you added value: the efforts devoted to making very precise and complicated definitions on the 'borders' of the system (e.g. scope, activities, safety relief valves, release time,...) in practice have little impact on the total result.
- More important is getting things reported, reporting culture, dealing with differences within the company.



EPSC TSC / PS KPI / April 2010

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Picture in slide 6

Making the case for leading indicators in Process Safety

Shaping the future of European Process Safety


EUROPEAN PROCESS SAFETY CENTRE

