Focus Self Assessment Number: PI-FSA-09-01
AR Number: 01165841
Assessment Descriptive Title: Corrective Action Program Self Assessment
Assessment Dates: January 12-16, 2009

1.0 INTRODUCTION & SCOPE

Evaluate selected significant station events and determine if station responses appropriately address the following objectives:

- The root (apparent) and contributing causes are understood
- Assess the extent of condition and the extent of cause.
- Determine if the reports address safety culture components that caused or significantly contributed to these issues.
- Determine if the corrective actions are logically tied to the causes and are sufficient to address the root and contributing causes to prevent recurrence.

Significant events are defined as 1) NRC findings, 2) degraded performance of SSC, and 3) significant organizational & programmatic issues

2.0 TEAM MEMBERS

Management Sponsor: Tim Allen, Prairie Island Business Systems Manager
Team Leader: Kurt Petersen, Prairie Island Performance Assessment Supervisor
Team Members:

1. Tim Borgen, Operations Training Supervisors
2. Greg Duffy, External Peer, WD Associates
3. Scott Lappegaard, Prairie Island Production Planning
4. Jason Strickland, Prairie Island Operations
5. William Scholberg, Prairie Island Engineer

3.0 EXECUTIVE SUMMARY

Self-Assessment Objectives:

1. Evaluate the root cause, extent of condition and extent of cause evaluations against the IP95002 criteria.
2. Determine the effectiveness of corrective actions resolving identified problems.
3. Assess the safety culture evaluations for completeness and objectivity.
4. Verify that performance indicators effectively characterize corrective action program performance and that CAP trending identifies potential adverse trends.
5. Assess the effectiveness of management overview of the CAP.
6. Assess the quality of execution of corrective actions.
7. Assess station response to previously identified CAP implementation and leadership/ accountability problems.
8. Reports meet all station procedure requirements.
9. Reports meet all IP 95001 criteria.
10. Corrective actions are implemented as intended and are timely.
11. There are no additional significant events due to the same causal factors.

Evaluate the timing for completion of the recommended corrective actions vs. significance of issue to determine if they are appropriate.

Areas for improvement

1. CAP 01173361 – The root cause template is not consistent with the requirements of IP95002 (also missing safety culture aspects)
2. CAP 01173302 – RCE Preparation/grading did not identify weakness in corrective actions - Corrective actions are not generated for all causal factors (and justification is not provide) and some are not tied to a specific causal factor

3. CAP 01173322 – Station does not consistently follow requirement of FP-PA-ARP-01 for corrective action completion
4. CAP 01173335 – CAP performance indicators do not reliably represent CAP Health
5. CAP 01173341 – Station does not effectively evaluate repeat issue in its corrective action process
6. CAP 01173347 – ACE/CCE evaluations are not consistently written to meet the standard of FP-PA-ARP-01 or FP-PA-CCE-01 or without rework.

Insights

- Level A & B actions have roughly doubled in the last year and the level C actions have decreased.
- Potential for individuals to manage corrective actions by due date versus priority or severity
- Plant is challenged to complete corrective actions prioritized by severity level
    - Late CAP actions
    - Distribution of CAP work between individuals
    - Level A/B actions have doubled over the last year
    - Schedule challenges – Completed PCE for refueling the day the breaker opens
    - Document review of RCE revealed reactive OE response
- During this assessment, several of the reports reviewed involved instances of “failure to follow procedure”. Based on the events and the associated analyses, it is not clear the station has well developed mental model of the concept of procedure use and adherence and its application. This is not to say that the station has not promulgated the expectation for procedure use and adherence but it appears there may be short comings in describing and reinforcing the specifics of the expected behavior. In discussion with the NRC resident, maintaining the plant within or recognizing departure from the “operating envelope” was identified as a watch area.

Strengths

There were no strengths identified during the process of completing this Focused Self-Assessment.

Discussion on Area for Improvement

1. Reports reviewed clearly satisfied format and content requirements with RCEs being amongst the best (in the industry) for inclusion of multiple systematic methods (Events & Causal Factors [E&CF] Charting, Barrier Analysis, and Performance Failure Modes Analysis). Although these methods were used, they, in some cases, did not meet the intent of the analysis. One RCE had an E&CF chart that had a root cause that was not logically connected to the associated inappropriate action. In another report, the barrier analysis identified causal factors that were not captured in the report and did not have associated corrective actions. Repeat events and applicable OE were listed with no analysis of why they were not effective in preventing the current event. Several of the reports identified issues with poor procedure use and adherence and this inappropriate action was not sufficiently evaluated.

2. It is noteworthy that the performance observed in the completion of Root Cause Evaluations [See objective 1a] is replicated in the Apparent Cause Evaluations. As a result of this the team did not identify separate AFI's under the belief that corrective actions to address the RCE deficiencies will also address the same in ACE evaluation.

3. There is no simple mechanism to identify "Ineffective Corrective Actions". The station is not aware of the impact of this attribute. Due to this inability to identify the aggregate impact, the station addresses individual ineffective corrective actions rather than programmatic/systematic/behavioral based issues. There was no evidence that the station has performed an evaluation on why the corrective actions were ineffective in the first place [individually or collectively].

4. The CAP indicators used at the station provide feedback on the health of the CAP program. Those indicators are effective in the aspect that they measure. The team identified that there are aspects of the corrective action program that the existing indicators do not represent that may not provide the management team with critical information. Specifically, repeat conditions and ineffective corrective actions have not been identified an indicator.

5. The station has not performed a trend analysis on significant station issues (RCE). There are missed opportunities to identify larger trends and take corrective actions prior as a self-identified issue. The trends identified in this review have been addressed in other venues not thru the corrective action program.

6. Based on reviews of several CAP/ACE/CCE/RCE and related actions, the following issues were identified:

   - The site does not consistently perform RCE/ACE/CCE to the expected level as evidenced by number of failed ACE/CCE/RCE. There are no existing actions in place to improve the performance of these evaluations.
   - The site does not consistently set due dates for corrective actions that are commensurate with when the actions should be performed, leading to repeat issues.
   - Neither ACE nor RCE are including the required safety culture impact review as required by procedure. As a result, the NRC is identifying cross-cutting issues on the site that the site could have previously identified had the fleet procedures been followed.
   - The number of Level "A/B" actions has roughly doubled in the last year. Level "A" actions went from 38 to 102, and level "B" actions went from 225 to 427. Yet in this same time period Level "C" actions have decreased from 719 to 658.
   - The CAP procedural requirements are not consistently followed, as noted by CAP actions being closed to non-CAP actions.