



**INVESTIGATION INTO ANONYMOUS
ALLEGATIONS RAISED AT
ENERGY NORTHWEST COLUMBIA
GENERATING STATION
PHASE II**

Prepared by

pillsbury

September 2016

Table of Contents

I. Introduction..... 1

II. Scope & Protocol 2

III. Global Recommendations..... 3

IV. Workgroup Assessment Findings & Recommendations 3

 A. Pillsbury Findings Requiring Corrective Action Within Specific Workgroups 4

 B. Data Supporting Overall Work Environment Conclusions 5

V. Cross-Cutting Issues 7

 A. Employee Concerns Program 7

 B. Condition Reports 10

 C. Human Resources 12

 D. Performance Communications..... 13

 E. 2015 Repair of Feed Water Valve 102A..... 14

I. INTRODUCTION

In February 2016, the Energy Northwest (“EN”) Executive Board retained Pillsbury Winthrop Shaw Pittman (Pillsbury) to investigate claims raised in two anonymous letters received by some members of the Executive Board the prior month (and in two subsequent letters in following months). The EN Executive Board selected Pillsbury as independent, outside counsel to conduct this investigation based on its extensive experience in nuclear related matters and its independence from the EN organization. The assessment team was led by Daryl Shapiro, a Pillsbury Partner with more than 25 years of experience working in safety culture related issues, including assessments, investigations, and training. The assessment team included Pillsbury Partner Jeff Merrifield, who served two terms as a Commissioner on the Nuclear Regulatory Commission (“NRC”) and eight years as a senior executive for a nuclear supplier prior to joining Pillsbury in 2015. The team also included Timothy Walsh, a Pillsbury Special Counsel with over 12 years of legal experience in NRC related matters, including independent investigations, NRC enforcement matters, and nuclear work environment assessments; and Kimberly Harshaw, a (now former) Pillsbury Counsel with over 20 years of experience in the nuclear industry including experience in independent investigations and NRC enforcement matters, as well as experience working at nuclear utilities as an engineer, reactor operator, and manager.¹

Pillsbury reviewed the first two letters submitted to the Board and identified that the letters raised six specific Allegations, and one general Allegation concerning safety conscious work environment (“SCWE”) – the willingness of plant employees to raise concerns without fear of retaliation. Pillsbury investigated the Allegations in two phases. In Phase I, Pillsbury investigated the six specific Allegations. Pillsbury’s Phase I investigation report was provided to the Executive Board and made public in June 2016. In Phase II, Pillsbury investigated the SCWE Allegation. As with the Phase I investigation, Pillsbury’s Phase II investigation was overseen by the Ad Hoc Subcommittee of the Executive Board created for this purpose. Throughout both Phases of investigation, Pillsbury maintained its independence from the EN management team. This report summarizes Pillsbury’s Phase II findings.

In brief summary, Pillsbury found that there does not appear to be a systemic chilled work environment at Columbia Generating Station (“CGS” or “Columbia”). However, Pillsbury found that multiple work groups at Columbia have problems that, if left unaddressed, could result in a chilled work environment. These results are summarized in Section IV of this report. Pillsbury also identified several cross-cutting issues that also should be addressed. These are summarized in Section V.

Section II of this report immediately below provides an overview of the assessment’s scope and protocol. Section III of this report summarizes the global recommendations resulting from this assessment.

¹ Ms. Harshaw left Pillsbury to take an in-house position at a nuclear utility at the end of May 2016 mid-way through the Phase II assessment.

II. SCOPE & PROTOCOL

The initial two anonymous letters state that the authors raised the specific Allegations anonymously because they feared retaliation. The anonymous authors did not provide any identifying information, such as their work group. During the course of both Phases of its investigation, Pillsbury respected the authors' anonymity and avoided any actions that could have been perceived as trying to identify them.

Pillsbury investigated the general work environment allegation after it had completed the bulk of its Phase I investigation into the six specific allegations. The Phase I investigation has informed the scope of the Phase II work environment assessment.

For the work environment assessment, Pillsbury reviewed existing data on workplace issues to identify Columbia work groups with potential SCWE issues. Pillsbury identified five such work groups that were included in the Phase II work environment assessment. Some of the work groups identified were split into their component sub groups. In addition, at the request of the Ad Hoc Subcommittee, Pillsbury included a sampling of another specific work group. Based on information learned in some interviews, Pillsbury expanded the assessment to include an additional department and additional individuals within the workgroups assessed. Pillsbury conducted approximately 190 interviews of individual contributors, supervisors, and managers for the Phase II work environment assessment. Pillsbury also interviewed numerous members of senior management and additional personnel with relevant information.

The work environment assessment was based on a standard SCWE interview protocol and asked the assessment participants questions relating to:

- Their understanding of SCWE;
- Their assessment of the work environment in their department;
- Willingness/hesitancy to raise concerns through avenues (supervisor, manager, senior leadership, Employee Concerns Program (ECP), corrective action program);
- The willingness or hesitancy of their peers to raise concerns;
- Any perceived or actual retaliation for raising concerns;
- Any concerns they had not raised;
- Bad behaviors negatively impacting work environment; and
- Adherence to procedures/policies.

Related to the Phase I investigation, assessment participants were also asked questions on communications on plant performance and on the repair of reactor feed pump valve 102A during the last outage (i.e., the "hot tap" that was performed while the plant was still at power). With respect to communications on plant performance, participants were asked (1) does management regularly communicate plant performance information to them, including both positive and negative aspects of performance?; and (2) what is their current perspective on plant performance? With respect to the valve repair, participants were asked if they (1) believed management prioritized staying online for the repair over nuclear safety?; and (2) had any concerns with the decision making process used to proceed with the repair while the plant was still at power?

At the end of each interview, participants were provided the opportunity to share any additional information on the topics discussed, or to bring up information not previously asked about.

Certain workgroups were also asked to discuss their workload. Multiple personnel from across the site indicated in their interviews that some individuals in these workgroups appeared to have heavy workloads. And, as will be discussed later in this report, multiple individuals with these workgroups independently raised concerns with respect to their workload without any prompting. Thus, all members of these workgroups were asked to describe their workload and whether it was negatively impacting the work environment (for example, their willingness or ability to raise concerns).

Pillsbury briefed the Executive Board and certain members of EN senior leadership on the results of the Phase II assessment at the July 27, 2016 Executive Board meeting. In some cases, EN senior leadership is implementing or has already taken corrective actions based on the initial briefing Pillsbury provided. Accordingly, Pillsbury has indicated where possible in this report the corrective actions being implemented or taken by EN.

III. GLOBAL RECOMMENDATIONS

This section summarizes the global recommendations that result from the overall work environment assessment.

The CEO and/or the CNO should meet with the NRC Regional Administrator to discuss the assessment's findings, taking credit for all of the positive aspects of our findings as well as detailing the corrective actions that will be implemented to improve the work environment.

Pillsbury recommends that more transparent communications be used when announcing and implementing changes to the workforce that will "not sit well" with the workforce. Pillsbury's assessment identified more than one instance of individuals mistakenly believing that their workgroup's management initiated a change to the workforce that was in fact initiated by senior plant management.

The leadership of each of the workgroups assessed must meet with their respective workgroups, acknowledge that their workgroups scored low on the most recent SCWE assessment, and discuss the results of the Pillsbury assessment, including any corrective actions specific to their workgroup. For those workgroups that were assessed as generally strong, leadership must reinforce expectations on raising issues and concerns, and solicit input from their workgroups on how they can further improve.

IV. WORKGROUP ASSESSMENT FINDINGS & RECOMMENDATIONS

This section provides the assessment's findings and provides Pillsbury's recommendations for corrective actions and/or continued improvement in addition to the Global Recommendations set forth above. Overall, Pillsbury found that there does not appear to be a systemic chilled work environment at Columbia. Nonetheless, Pillsbury identified issues across multiple workgroups that, if left unaddressed, could result in a chilled work environment.

A. Pillsbury Findings Requiring Corrective Action Within Specific Workgroups

The following discussion is a general overview of the Pillsbury-identified issues requiring corrective action within specific workgroups.

Pillsbury identified two work groups that Pillsbury believes would benefit from the assistance of Organizational Development experts. One workgroup is stressed by interpersonal conflict among some Individual Contributors. In the second workgroup, a significant portion of the Individual Contributors interviewed believe that their working relationship between themselves and a senior leader is strained. Pillsbury has provided similar recommendations to other nuclear power plant clients, who have had success with Organizational Development external consultants.

Pillsbury found multiple instances where Individual Contributors believed that certain members of plant management exhibited inappropriate behaviors potentially detrimental to the work environment. Examples included making sarcastic or demeaning comments, behaving in an intimidating manner, up to yelling and screaming. Some of the individuals identified as having exhibited such behavior acknowledged that they had a “very direct” management style. These examples are not indicative of the majority of plant management, but nonetheless should be addressed. Pillsbury recommends that certain managers be coached and counseled on appropriate behaviors. In at least one case, the recommendation includes close supervision by senior management and Human Resources. Actions and decisions taken by management are always scrutinized by the workforce. Even if a difference of opinion exists on whether an individual exhibited negative behaviors, management behavior must remain beyond reproach at all times. EN senior leadership has implemented this recommendation and has counseled and coached these members of management.

Pillsbury found that a majority of Individual Contributors in one workgroup believed their workload to be heavy, if not “intense” and “pretty stressful.” No one stated that safety concerns were not being addressed because of the workload, but some expressed a concern that they might miss an issue because they are stretched so thin. Relatedly, some members of this workgroup expressed a desire to do more substantive work in-house, rather than have it performed by contractors. Pillsbury recommends that senior leadership be challenged to develop a plan to address the morale issues in this work group, then present the plan to the CNO for approval, and execute on it. Pillsbury understands that senior management is already implementing an employee engagement plan for this work group, which aims to address most (if not all) of the same issues identified by Pillsbury. The Executive Board should closely monitor the implementation of the engagement plan, see that all issues are being addressed, and monitor its results.

Some assessment participants raised concerns regarding how the plant handled a recent industrial hygiene and industrial safety issue involving exposure to potentially harmful chemicals. Some individuals believed that the plant’s initial response was less than satisfactory in at least two respects: there did not seem to be a plan in place to address an issue like this, and the plant did not have appropriate equipment on hand to analyze the level of exposure. A couple of individuals expressed that they felt like they were being treated as complainers for raising

concerns about the exposure. Pillsbury found that the plant has put in place extensive corrective actions to prevent the issue from recurring, and to address it if it does recur, including purchasing the appropriate equipment for determining exposure levels to contaminants. In addition, the plant is taking measures to ensure that an Industrial Hygienist is on call to monitor work involving potential exposure to contaminants. Plant leadership should reinforce the expectation that industrial safety concerns such as this one be treated with respect. It should also ensure that corrective actions have been implemented.

Pillsbury identified an instance where a member of plant management took a personnel action without necessarily having all of the facts (or perceived facts) in hand. While the personnel action taken may have been appropriate, and necessary, the management member who took the action did not discuss the action with the Individual Contributor, or the individual's supervision. The management member agrees that the situation should have been handled differently. Pillsbury recommends that the personnel involved in this matter review the facts and circumstances of this event to come to an understanding of how it should have been handled differently. The member of management should receive feedback and coaching on the need to check stories (or require his subordinates to check stories) and to get a second opinion before taking personnel actions. Unilateral action taken without understanding all of the facts (or perceived facts) may fuel suspicions that something was not being done correctly.

In one workgroup, Pillsbury determined that the workgroup scored low on the most recent SCWE survey for reasons outside the workgroup, rather than (for example) any unwillingness to raise concerns internally. Indeed, Pillsbury found the work environment within the group to be very strong. Pillsbury's recommendation here is for the manager of this workgroup and members of senior leadership to discuss the reasons for this group's low scores and to acknowledge the important role members of this workgroup play at the plant.

B. Data Supporting Overall Work Environment Conclusions

The following is an overview of some of the data supporting Pillsbury's conclusion there does not appear to be a systemic chilled work environment at Columbia.

- Workgroup No. 1: The Individual Contributors unanimously stated that they are willing to raise concerns to their direct Supervisors. Eighty percent of them stated that they were willing to raise issues to their Manager, and over 90% stated that they would not hesitate to raise issues to members of Senior Leadership. Approximately 40% of Individual Contributors provided overall positive assessments of the work environment ("I don't personally see any bad work environment or any issues"); another 40% provided overall mixed assessments of the work environment ("things are better than they were when I started. To me, it seems like the picture of harmony," but some have raised issues); and approximately 20% provided overall negative assessments ("the people don't treat each other with respect" and it's "been somewhat stressed over the last few years").
- Workgroup No. 2: The Individual Contributors interviewed in this Workgroup unanimously stated that they are willing to raise issues to their direct Supervisors, and nearly all are willing to raise issues to their Manager. All but one Individual Contributor

stated they were willing to raise issues to ECP and through the Corrective Action Program. This Workgroup's members provided a mostly positive view of how the plant is performing.

- Workgroup No. 3: The Individual Contributors in this Workgroup were nearly unanimous in providing positive assessments of their work environments. Nearly all of the Individual Contributors reported being willing to raise concerns through all of the five avenues discussed (direct Supervisor, Manager, Senior Leadership, ECP, Corrective Action Program). The Individual Contributors unanimously stated that they believe their peers are willing to raise concerns.
- Workgroup No. 4: A large majority of personnel provided a positive assessment of work environment. The Individual Contributors were nearly unanimous in stating they are willing to raise issues to their direct Supervisor. They unanimously stated that they were willing to raise issues through the Corrective Action Program, and they unanimously believed that their peers are willing to raise issues.
- Workgroup No. 5: All of the Individual Contributors interviewed stated that they were willing to raise issues to their current Manager. They were nearly unanimous in providing positive assessments of their present work environment, with only one person providing a mixed assessment. The Individual Contributors generally perceived that their peers are willing to raise concerns. With the exception of the negative behaviors exhibited by a former Manager, all of the Individual Contributors, Supervisors, and Manager stated that they are not witnessing behaviors that would negatively impact individuals' willingness to raise issues.
- Workgroup No. 6: Among other positive findings, the Individual Contributors believed that their leadership had an "open door" policy for raising concerns. All personnel interviewed stated that they were willing to raise concerns to Senior Leadership, the Employee Concerns Program, and the Corrective Action Program.
- Workgroup No. 7: The large majority of personnel provided overall positive assessments of the work environment. The Workgroup was nearly unanimous in stating that they were willing to raise issues to their Direct Supervisor, the Employee Concerns Program, and through the Corrective Action Program. A handful of individuals expressed reluctance to raise issues to the Manager and to Senior Management, but the reasons provided for their reluctance did not indicate any fear of retaliation.
- Workgroup No. 8: All personnel unanimously reported that they were willing to raise concerns to their direct Supervisor, their Manager, and to Senior Leadership. Of the three individuals who expressed reluctance to raise issues to ECP, two merely indicated a preference not to use that avenue, and one's apprehension was based on a generalized distrust of the company. The one Individual Contributor who hesitated to raise issues through the Corrective Action Program did not raise any concern with respect to retaliation, but simply disliked receiving constructive criticism on how to write a proper Condition Report.

- Workgroup No. 9: The personnel were nearly unanimous in providing positive assessments of their work environment. They unanimously stated they were willing to raise concerns to their direct Supervisors and through the Corrective Action Program. They were almost unanimous in stating that they would not hesitate to raise concerns to their Manager; to senior leadership; and to ECP. The Individual Contributors in this Workgroup were nearly unanimous in stating that they had not witnessed any negative behaviors that might inhibit the raising of concerns. When provided an opportunity to add further comments, several personnel reiterated their positive assessment of the work environment
- Workgroup No. 10: Personnel unanimously stated they were willing to raise concerns to their direct Supervisors, their Manager, to Senior Leadership, and through the Corrective Action Program. The one individual who expressed reluctance to raise issues to ECP because of lack of familiarity with the ECP Manager, and did not otherwise raise any concern with respect to retaliation. The Workgroup personnel unanimously provided positive assessments of their work environment. The one individual who thought that some peers might not be willing to raise concerns explained that it was personnel from another Workgroup who might not be willing to raise concerns. All persons that were interviewed stated they do not believe they personally had suffered retaliation for raising concerns. When provided an opportunity to add further comments, several reiterated their positive assessment of the work environment and stated their disagreement with the anonymous allegations.

V. CROSS-CUTTING ISSUES

A. Employee Concerns Program

A small number of Columbia personnel across work groups raised three concerns with the Employee Concern Program (ECP): (1) internal reporting and independence of the program; (2) perceived lack of technical qualifications by the ECP Manager; and (3) ECP visibility. Overall, Pillsbury finds that the Columbia ECP operates consistent with industry best practices in the areas of internal reporting, independence, and technical qualifications of the ECP Manager. However, the program's practices may not be fully understood by all personnel. Thus, Pillsbury recommends that Columbia ECP benchmark its peers on best communication and outreach practices in the three identified areas, and implement at Columbia any appropriate measures learned from the benchmark. Benchmarking can be done through the National Association of Employee Concerns Professionals (NAECP).² In addition, ECP should increase its visibility efforts, such as (for examples) speaking at a quarterly "All Hands" meeting at least once a year, providing annual or bi-annual ECP refresher training for all work groups, and publishing an electronic ECP newsletter on a regular basis (e.g., quarterly, or semi-annually). As noted below, ECP has already taken one such step through an ECP Awareness Week this past July.

² NAECP is a professional association whose mission is to promote a commitment to excellence in the field of alternate concern resolution. NAECP and its members work to develop professional and effective alternate concern resolution programs that support strong safety conscious work environments.

Additional ECP visibility and outreach opportunities can be used to better educate the workforce on ECP's internal reporting structure and how it maintains independence, and enlists technical assistance when necessary to investigate technical issues.

ECP Internal Reporting & Independence: Pillsbury's assessment found a small number of individuals questioned the independence of ECP, with some noting that it reports to senior leadership. The ECP Manager stated that he is independent of line management because he reports directly to the CNO. He noted that other plants have located their ECP under "organizational effectiveness," which would be less independent of the business lines. Because Columbia is a single unit and plant, the ECP does not report to a corporate headquarters. Thus, short of his reporting directly to the Executive Board, the ECP is as independent of the Columbia business lines as it can be. The ECP Manager stated that neither ECP procedures nor guidance specifically state under what circumstances he must recuse himself from a matter. However, he said that it is understood that if his independence were questioned, he would "step aside."

The ECP Manager further explained that "there are two individuals whom I cannot investigate" – the CNO and the CEO. Were any allegations reported to ECP against the CNO or CEO, he would reach out to the General Counsel to obtain external resources (such as an outside law firm) to conduct the investigation. The ECP Manager stated that if an allegation called into question his personal independence, he has "three individuals on site who are trained as my backup." They are a Quality Assurance Supervisor; the Assistant General Counsel and Legal Services Manager; and a Human Resources Supervisor.

The ECP Manager previously worked in Security/Access Authorization for Columbia. Pillsbury asked if there have been any issues or concerns with his independence from his previous positions. The ECP Manager did not believe there were any such concerns regarding his independence. He noted that "they all talk with me" when he needs to speak with them, and that he had "partially substantiated a case in Security" that resulted in "redoing a couple of performance appraisals," indicating that he is able to act independently and objectively.

With respect to his reporting relationship with the CNO, the ECP Manager stated that he keeps the CNO informed of issues that come up, but protects confidentiality by never using anyone's name. He would report to the CNO, for example, "something has come up in Electrical Maintenance and I am going to conduct interviews." The CNO will review and sign off on final ECP reports, but the reports also do not identify anyone by name.

Technical Qualifications of ECP Manager: Pillsbury's assessment found a small number of individuals across workgroups questioned whether the current ECP Manager was technically qualified to address safety concerns. As previously noted, the ECP Manager came from the Security/Access Authorization organization. Pillsbury asked him to describe his experience and training relevant to his position as the ECP Manager. The ECP Manager stated that he obtained significant investigatory experience while serving as the Reviewing Official in the Access Authorization Department. In that position, he conducted interviews for the background checks for plant employee unescorted access authorization. He has also taken training certifications through the NAECP on conducting investigations, both introductory and advanced levels.

Pillsbury is very familiar with the NAECP training programs and finds them of very high quality. Although the ECP Manager has not served in a technical role at the plant, he has taken the Boiling Water Reactor Introduction training course, which covered the basics of the plant and its systems.

When presented with an employee concern with a technical component, the ECP Manager explained that he enlists appropriate technical assistance. For example, the QA Supervisor who is one of the ECP Manager's backups previously held a Reactor Operator license. The ECP Manager will often consult with the QA Supervisor on the technical issue, or enlist him to help identify the technical resources. The ECP Manager further explained that, if he has been assigned to investigate and answer an NRC Request for Information ("RFI"), he "always lists the technical contributor" who assisted him on any technical issue. He noted as an example that in answering a recent NRC RFI, he relied on a Cybersecurity Supervisor as a Technical Contributor because the issues addressed had a cybersecurity component. He provided another example where he investigated a concern on reactor operator staffing levels, for which he relied on input from the QA Supervisor.

When asked about the technical qualifications of the ECP Manager, the CNO stated that he believes the ECP Manager is more than qualified for his position. For the CNO, "the question is whether he has the resources he needs" to do his job, including enlisting technical assistance when necessary. The CNO added that when he hired the ECP Manager, he "focused on whether he was a people person," reflecting the particular sensitivities that come with role of investigating concerns raised by individuals who did not feel comfortable raising them through their regular chain of command.

ECP Visibility: Pillsbury's assessment identified that a small number of individuals across work groups did not know the identity of the ECP Manager, or where the ECP was located. Over the course of two interviews (one in early June and one in late July), Pillsbury asked the ECP Manager to describe his efforts at maintaining program visibility. The ECP Manager stated that he regularly attends the daily D15 meetings across the site. At those meetings he will introduce himself, explain what ECP is for, and encourage people to bring concerns to him especially "if you don't want to bring them up the chain." The ECP Manager stated that there are ECP posters across the site, and that he regularly publishes an article in the Energy Northwest newsletter. He instructs on ECP at the new employee orientation training, which occurs twice a year. Pillsbury asked if he's presented or spoken at the quarterly All Hands meeting. The ECP Manager replied that, while he has spoken at various meetings, he does not recall speaking at an All Hands meeting. The ECP Manager also noted that he has considered, but has not proceeded with, providing ECP "trinkets" with program information on them (e.g., pens or stress balls).

In his second interview with Pillsbury in late July, and as a result of hearing some of the initial input on ECP visibility from the assessment, the ECP Manager stated that he worked with the Public Affairs office to hold an "ECP Awareness Week" the week prior in conjunction that week's D15s having a focus on an environment for raising concerns. For the ECP Awareness Week, (1) the ECP Hotline number was put on the display of all employees phones; (2) the electronic billboard on the way into the plant identified the ECP Manager and the ECP Hotline; and (3) the ECP Manager sent a video by email to all employees on the program and himself.

B. Condition Reports

Pillsbury's assessment identified two general concerns with respect to Condition Reports, and one more specific concern. The first general concern is that a small number of Individual Contributors (most of whom are craft personnel) stated that they feel they are nit-picked when drafting CRs. In other words, some individuals expressed reluctance to write a CR if it meant that they were going to be counseled or coached on how a CR was written. The second general concern is the "boomerang" effect whereby the actions to be completed to close out a CR are assigned to the person who initiated a CR. No one stated that they would not write a CR because it might be assigned back to them. But the fact that a CR's initiation might result in increased work for the initiator was mentioned in many interviews. The more specific concern is that Pillsbury identified two Condition Reports that raised issues that were sent to ECP. However, there were no closure notes in either CR. In other words, there was no information indicating that the issues were investigated by ECP, or that the investigation results were available in ECP (to the extent they could be shared with other employees).

With respect to the first general concern, except for inflammatory or derogatory statements, CRs should not be screened for content. The first priority should be to get the identified issue into the Corrective Action program. Pillsbury recommends that the following Expectations for Condition Report Initiation be established and implemented at Columbia:

- Problem identification and resolution is fundamental to safe operation
- All employees and contractors share in the responsibility to identify and report problems
- One avenue for reporting problems is to initiate a CR
- Any employee or contractor may write a condition report about any issue or concern
- You are encouraged, but not required, to notify your supervisor or manager when you write a CR
- Supervisor or manager screening for CR content or approval is unacceptable
- Any behavior that discourages or punishes the writing of a CR is unacceptable and will be addressed.

With respect to the second general concern, the issue of boomerang CRs is not specific to Columbia Generating Station. This issue arises because the person who identified the concern is frequently the most appropriate person to address the issue because of his or her knowledge and technical expertise. For example, if an individual is the owner of a particular procedure, discovers a flaw in that procedure, and documents the issue in a CR, it is nearly certain that the procedure owner will be assigned the corrective action to address the identified problem. For another example, an I&C technician who discovers an I&C issue in a system which the technician owns or on which the technician is working, is also likely to be assigned the additional actions because the technician is the I&C expert on that system. These situations are different from a situation where (for example) a Radiation Protection Technician discovers a leaking valve; that fix will most likely be assigned to Maintenance.

Pillsbury spoke with the Supervisor for the Corrective Action Program about the boomerang issue. The Supervisor provided an overview of the typical CR "life cycle." All CRs, no matter how minor, are sent to the Control Room to be assessed for any immediate operability or

reportability concerns. From there, they go to the Condition Review Group, which meets daily, to be screened. The Condition Review Group includes representatives from Operations, Maintenance, Engineering, and the Corrective Action Program, as well as the Continuous Improvement Coordinators from the major departments. The group reviews the CRs, provides input on their severity, how to address the issue(s) raised (if it was not already addressed by immediate corrective action), and any additional action needed to be taken to address the issue(s) raised. If additional action is to be taken, it is assigned to a department for follow up, or to the work management system (e.g., if a work order is to be prepared to address the identified deficiency). If there is any difference of opinion over which department should address the CR, that is worked out amongst the managers at the next day's morning management meeting. The Manager or Supervisor that owns the group assigned to address the CR will assign a person or persons to fix the identified problem. The Corrective Action Program Supervisor stated that, from a plant-wide perspective, who initiated the Condition Report is not considered when a Condition Report is assigned for follow up action. Further, when a member of a group's or department's leadership is considering to whom the CR should be assigned, what should be considered is "who is the most appropriate person to fix the problem."

Pillsbury also spoke with a Training Supervisor, who described the training employees receive on CRs. Part of each new employee's "checklist" is to sit down with his or her supervisor and walk through writing a CR. In addition, at the new employee training (offered twice a year), the Supervisor spends roughly 20-30 minutes discussing the Corrective Action Program, including what goes into a CR, what a good CR looks like, how to initiate a CR, and what to do if a CR is assigned to you. The Supervisor also noted that the Corrective Action Program website hosts (1) a "job aid," which is a tri-fold brochure on how to write a CR; and (2) a 30-slide PowerPoint presentation on the CAP program and the life cycle of a CR. She also stated that the Manager/Supervisor initial training also contains a module on the Corrective Action Program. The Training Supervisor stated that these CR training opportunities do not discuss how a CR is assigned to an individual, and why, "but it wouldn't hurt at all" to do so.

Corrective Action Program training and department leadership should be sensitive to the boomerang issue. Pillsbury recommends that CR training reflect the fact that the person who discovered an issue is often the most technical expert on the issue, and thus the most appropriate person to address it. When boomerang situations occur, department leadership should acknowledge the extra work being placed on the individual who raised the issue, and balance workload accordingly. More broadly, the plant should celebrate CR initiation rates when they are high.

With respect to the more specific concern of how to indicate closure of Condition Reports sent to ECP: because there were no closure notes in the two CRs, individuals were left unaware as to whether any action had taken place on them. For a strong work environment, individuals must be willing to raise issues and concerns, and know that that their concerns will be looked into (whether or not the response to the issue or concern is that expected by the initiator). The ECP Manager reported that the closure information has been revised on the two CRs. One now states "Details about this CR are personal and won't appear in this CR. Details about this CR are located in ECP case 2015-A1." The second CR now states "Details about this CR are sent to

Compliance and Ethics. Details about this CR are personal and won't appear in this CR. Details about this CR are located on the CRs pulled to ECP/Compliance and Ethics log.”

C. Human Resources

Pillsbury's work environment assessment identified three improvement areas related to Columbia's Human Resources (HR) functions: (1) Plans For Improvement (“PFI”); (2) Exit Interview Process; and (3) HR's input in the disciplinary process.

PFI: Pillsbury's work environment assessment found that an Individual Contributor was put on a PFI after a project milestone was missed. The PFI essentially stated that the individual was to meet the next milestone, and take some training. The Individual Contributor found the PFI to be threatening and bullying. Other individuals reported that they perceived the PFI to be retaliatory. The PFI did not address any behaviors contributing to the failure to meet the first milestone. Leadership members interviewed agreed that the PFI was insufficient. One member of management stated that the PFI “should not have centered on meeting a milestone. It should have addressed behaviors,” and that he did not “see what it's fixing.” Another member of management stated that he had recently spent a weekend working on another individual's PFI, and that it did “not appear to me that anyone spent all weekend writing that PFI.” Pillsbury believes that, while it is certainly appropriate for a PFI to have goals going forward, a PFI that requires an Individual Contributor to meet a deadline (or else) without addressing any behaviors that led to deficient performance could inhibit individuals from raising legitimate concerns (safety-related or otherwise) that might cause the deadline to be missed.

Pillsbury's review of applicable procedures and guidance documents found that they do not discuss or provide any substantive guidance on PFI content. While a Supervisor might consult with HR on a PFI's content, HR reported that it would typically take a Supervisor's word on the content of a particular PFI.

Pillsbury recommends that HR review the guidance and training it is providing to Supervisors and Managers on how to prepare PFIs, and take appropriate corrective action where necessary. Corrective actions include revising applicable procedures and/or guidance documents to provide direction to supervisors and managers on the appropriate content for a PFI. HR should benchmark its peers on best practices on the type of guidance and instruction provided to supervisors and managers when drafting PFIs.

Exit Interview Process: Pillsbury's assessment found that Columbia does not presently conduct formal exit interviews with departing employees. When a departing employee interfaces with the HR benefits coordinator, he or she is provided a form that can be filled out with any concerns or issues and mailed back to ECP. Pillsbury recommends that Columbia augment its exit interview process. Departing employees can be a great source of information on existing concerns and issues. Columbia should implement appropriate measures for capturing this information. At the very least, departing employees should be provided the opportunity to speak in person with a representative of HR or ECP to discuss any outstanding concerns prior to departing the workforce.

HR Input into Disciplinary Process: Pillsbury recommends that HR review whether it is providing sufficient input to management to help management make the best disciplinary decisions. The review should seek to determine if HR is making appropriate recommendations for disciplinary action in accordance with its procedures and practices, and whether management is following those recommendations. The policies for when and how employees will be treated in the counseling, discipline, and termination process should be clear, well understood, and implemented consistently. HR and senior management should seek greater alignment on this process to ensure that employees are being treated equitably and fairly.

D. Performance Communications

One of the issues raised and investigated in Phase I was whether management was hiding Columbia's recent decline in performance from employees, the Executive Board, and the public. Among other things, Pillsbury's Phase I investigation found that performance indicator data is regularly communicated to personnel at various meetings, including monthly department meetings. In Phase II, Pillsbury included questions on the communication of plant performance, and individuals' perspectives on how the plant was performing, in the work environment assessment's structured interviews.

Personnel interviewed overwhelmingly reported that they regularly receive updates on plant performance indicators, in particular at the monthly department meetings. Most individuals also stated that the monthly updates focused primarily on areas where improvement was needed – the “red” and “yellow” indicators – rather than on the indicators whose performance was good or satisfactory (the “green” and “white” indicators). These findings provide further support to the Phase I findings that plant management has kept employees informed on how the plant was performing, and has not tried to hide any decline in plant performance.

The most common comment on plant performance received from work environment assessment participants was how much plant performance had improved compared to five or six years ago. Numerous personnel reported that, at that time, the plant routinely had unplanned shutdowns. Some commented, for example, that they would not know whether to expect to see a plume from the plant's cooling towers each day upon arriving at work. These individuals attributed the vast improvement in overall plant performance to the current management team and/or to the Excellence Model.

Pillsbury has two recommendations based on its assessment of performance communications. First, internal performance communications should be more balanced. It is understandable that the internal communications would seek to focus on the areas in which most improvement is needed, especially as employees will be responsible for implementing that improved performance. Nonetheless, Pillsbury recommends plant management's internal communications should be more balanced. It is inconsistent to publicly tell the world how well the plant is performing and report only or mostly negative information internally. Any inconsistency between internal and external reporting could lead skeptical employees to believe that management is trying to mislead stakeholders.

Second, Pillsbury's assessment found that some employees believed that the performance indicator data communicated at the monthly department meetings was hard to understand, or

could not be read clearly because the type was too small, or was simply overwhelming (one individual stated that it was “death by PowerPoint”). In Phase I, Pillsbury recommended that “presentation of performance data needs to be clear and beyond reproach” and aligned with communications received by other stakeholders so that “all stakeholders receive consistent and clear information.” Adding onto that recommendation, Pillsbury recommends in Phase II that Columbia develop clearer metrics and reduce the number of metrics reported to provide a crisper measure of performance for employees and other stakeholders.

E. 2015 Repair of Feed Water Valve 102A

In Phase I, Pillsbury investigated the allegation that management sought to stay online at all costs and at the expense of safety, pointing to the repair of the feed water valve 102A at the end of the last outage while the plant remained at power. Pillsbury found that management made a decision to complete the repair at power after a thorough analysis of the nuclear and industrial safety risk of performing that work, and evaluating the chosen option by thoroughly vetting it through multiple challenge boards. Pillsbury’s Phase I investigation found that the decision to conduct the repair while at power was controversial for a small minority of employees.

Pillsbury’s Phase II work environment assessment has confirmed that the issue remains controversial among a small minority of individuals. And among these individuals, some mistakenly believe that members of management received a bonus for the plant staying online a certain number of days following the outage (while overall generation factors into at-risk compensation, the number of days a plant stays online following an outage does not). Some individuals also believe the repair may have produced foreign material that entered the reactor coolant system and may have caused the recent fuel failures. The Phase II assessment also found that the more information individuals had on the pros and cons of each repair option available, as well as the decision making process, the more positive their view of the decision to repair the valve while the plant remained at power.

In light of these findings, Pillsbury recommends the following. In Phase I, Pillsbury recommended that the plant expand to appropriate work groups the case study that was presented to Engineers and Supervisors/Managers in their training programs. The Phase II findings reinforce that recommendation. In addition, Pillsbury recommends that the plant prepare a communication to the site in an effort to address any lingering controversy over the repair. The communication should summarize the decision making process (including the use of challenge boards, and soliciting input from across and outside the organization) in making the right decision. The communication should also provide an opportunity for the various craft involved to discuss their role(s) and the care taken in implementing the repair. For example, the individuals involved in preventing foreign material can communicate the care they took to ensure that no metal filings from the drill operation were left behind. The communication should also address the bonus perception issue. The plant may wish to prepare this in the form of a video so that it could be used for future reference and appropriately memorialize the decision making process.