Event Investigation Report

Complete the evaluation of the human performance event using the following, as applicable:

1. Date and Time of the event: 03/22/05 12:20 p.m.
2. Personnel Involved [redacted] 7C
3. Department/Group Involved: Maint. Installation Services Group / DZNPS.
   Program/Work Process/Activity Involved: Scaffold Erection WO#0401229 SI
5. Unit: PBNP Unit 0 PBNP Unit 1 PBNP Unit 2
6. Mode/Power Level: 100% / Mode 1
7. Describe the inappropriate action and conditions that led up to the event. Consider the following in this description:

   a. Was a conscious decision made or not made by the individual(s) involved?

   Yes (lanyard unavailable); (tool pouches not available). Decision was made to continue work without fabricating a restraining device.

   b. Was the event a result of rule non-compliance, misapplication of a rule, or applying an incorrect rule?

   Individual chose the desire to keep the job going and complete task over the lanyarding of any of his construction tools.

   c. Was the individual fully trained/knowledgeable of the task? **Yes**

   d. Did the individual make an error in judgment? **Yes**

   e. Was an intended action not performed due to shortcuts taken or inadequate tracking?

   f. Was the individual overconfident or was their mental/physical state a factor?

   Yes

   g. Did the supervisor not identify error likely situations and error precursors?

   No – Issue was discussed in the pre-job brief (the tools the individual had previously used (apron) were not available).

   h. Was there a process or organizational failure that led to this error (see table on next page)?

D-26

8. Summarize the inappropriate action in one sentence as follows:

craftsman did **use an un-lanyarded tool during scaffold erection** instead of **waiting for proper tools (lanyards) to be utilized on the job.**

(WHO) (WHAT) (THE REQUIREMENT)

as found in **Pre-job briefing discussion** because **individual felt time / schedule pressure (did not want to impact work performance by delaying job to wait for a lanyard).**

(Where the Requirement is found) (WHY if known)

9. Based on what you have learned, describe the error likely situations that were present at the time of the event.

   a. What Error Reduction Tools were not used or not used effectively? What Error Reduction Tools could have been used to prevent this event? Clearly state which is the one tool, which if used, would have had the greatest chance of being successful.

   Stop when unsure; Are You Ready Checklist; Peer Checking

   b. Are these Error Reduction Tools going to provide the barriers to prevent recurrence? Where else should these barriers be applied?

   Yes

Human Performance Failure Modes (From the NMC Trend Code Manual)

- Inattention
- **Distracted & Interrupted**
- **Time & Schedule Pressure**
- Spatial Disorientation
- Inadequate Motivation
- Unfamiliar or Infrequent Task
- Inadequate Knowledge of Standards
- Inadequate Knowledge of Fundamentals
- Inadequate Verification
- Inadequate Tracking (Place Keeping)
- Habit/Reflex
- Imprecise Communication
- Bored
- Multi-Tasking
- Fear of Failure
- Mindset/Preconceived Idea
- **Shortcuts Taken**
- Misdiagnosis
- Flawed Analytical Process or Model
- **Over Confident**
- Cognitive Overload
- Tired & Fatigued
- Lapse of Memory
- Wrong Assumptions

- Work Around
- **Tunnel Vision**

Process Failure Modes (From the NMC Trend Code Manual)

- Critical Actions Not Verified
- Excessive Verifications
- No Process Monitoring
- Only Monitoring Problems
- Person Specified Not Able to Perform Task.
- More Than One Person Specified to Perform Task
- No One Specified to Perform Task
- No Acceptance Criteria

Organizational Failure Modes (From the NMC Trend Code Manual)

- Inadequate Prioritization
- Inadequate Trust
- Inadequate Self Assessment
- **Inadequate Planning**
- Inadequate Teamwork
- Inadequate Program Management
- Inadequate Span of Control
- Inadequate Communication among Organizations
- Inadequate Communication within an Organization
- Lack of Commitment
- Inadequate Knowledge
- Inadequate Emerging Issues Management
- Insufficient Staffing
- Inadequate Levels in Organization

Event Investigation Personnel Statement

Name: _____

Position: _____

Event Date: _____

Handwritten statements are acceptable. Include the plant conditions prior to the event, your indications that a problem existed, your action as a result of those indications, noted equipment malfunctions or inadequacies, and any identified procedure deficiencies. Also, include any information you consider important to the review of this event and actions that may prevent recurrence. Use additional paper as necessary.

ATTACHMENT D
HUMAN PERFORMANCE EVENT INVESTIGATION TOOL

EVENT INVESTIGATION REPORT

(10)

Complete the evaluation of the human performance event using the following, as applicable:

1. Date and Time of the event: 3/22/05, ~1220 hrs
2. Personnel Involved: [redacted]
3. Department/Group Involved: _____
4. Program/Work Process/Activity Involved: Scaffold erection (~~OCE~~ 40122951) DTS 2282 IST
5. Unit: PBNP Unit1 (PBNP Unit 2)
6. Mode/Power Level: 100% / Mode 1
7. Describe the inappropriate action and conditions that led up to the event. Consider the following in this description:
   a. Was a conscious decision made or not made by the individual(s) involved? Yes (Any tool unavailable) (tool pouches not available at the time
   b. Was the event a result of rule non-compliance, misapplication of a rule, or applying an incorrect rule? Desire to keep the job going (no (any tools on my tools)
   c. Was the individual fully trained/knowledgeable of the task? Yes
   d. Did the individual make an error in judgment? ~~Yes~~ Y
   e. Was an intended action not performed due to shortcuts taken or inadequate tracking? Due to desire to prevent work performance/ schedule delay
   f. Was the individual overconfident or was their mental/physical state a factor? No
   g. Did the supervisor not identify error likely situations and error precursors? No i.d.d/discussed in pre-job (outlined in loss of Appd (out for Mod)
   h. Was there a process or organizational failure that led to this error (see table on next page)?

8. Summarize the inappropriate action in one sentence as follows:
   Craftsman (WHO) did used w/ unauthorized tool during scaffold erection (WHAT) instead of (THE REQUIREMENT) implemented the tool as expected/discussed during pre-job briefing
   as found in _____ because T/S pressure (did not want to impact work performance by delaying for (any tool or (any tool
   (Where the Requirement is found) (WHY if known) could INFORMATION USE

cont: over confidence

ATTACHMENT D
HUMAN PERFORMANCE EVENT INVESTIGATION TOOL

9. Based on what you have learned, describe the error likely situations that were present at the time of the event.

   a. What Error Reduction Tools were not used or not used effectively? What Error Reduction Tools could have been used to prevent this event? Clearly state which is the one tool, which if used, would have had the greatest chance of being successful.

   Stop when unsure; Use ~~ye~~ ready checklist; peer checking

   b. Are these Error Reduction Tools going to provide the barriers to prevent recurrence? Where else should these barriers be applied?

   Yes

Human Performance Failure Modes (From the NMC Trend Code Manual)

Inattention	Bored	Habit/Reflex	Tired & Fatigued
*Distracted & Interrupted	Multi-Tasking	Lapse of Memory	Inadequate Tracking (Place Keeping)
**Time & Schedule Pressure	Fear of Failure	Imprecise Communication	

Cognitive Overload

Spatial Disorientation	Mindset/Preconceived Idea	Wrong Assumptions	Inadequate Verification
Inadequate Motivation	Shortcuts Taken	Work Around	*Over Confident
Unfamiliar or Infrequent Task	Misdiagnosis	*Tunnel Vision*	Inadequate Knowledge of Fundamentals
Inadequate Knowledge of Standards	Flawed Analytical Process or Model		

7c

Crew [redacted]

ATTACHMENT D
HUMAN PERFORMANCE EVENT INVESTIGATION TOOL

Process Failure Modes (From the NMC Trend Code Manual)

Critical Actions Not Verified
Excessive Verifications
No Process Monitoring
Only Monitoring Problems
No Acceptance Criteria
No One Specified to Perform Task
More Than One Person Specified to Perform Task
Person Specified Not Able to Perform Task.

Organizational Failure Modes (From the NMC Trend Code Manual)

Inadequate Communication within an Organization
Inadequate Communication among Organizations
Inadequate Prioritization
Inadequate Planning (contributor)
Inadequate Emerging Issues Management
Inadequate Program Management
Inadequate Span of Control
Inadequate Levels in Organization
Insufficient Staffing
Inadequate Teamwork
Inadequate Knowledge
Lack of Commitment
Inadequate Self Assessment
Inadequate Trust

Event Investigation Personnel Statement

1C

Name [redacted]

Position: FORMAN

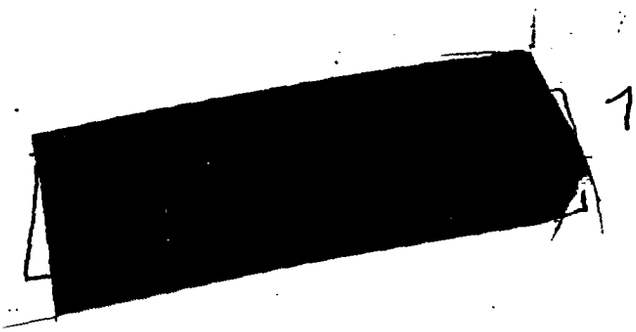
Event Date: 3-22-05

Handwritten statements are acceptable. Include the plant conditions prior to the event, your indications that a problem existed, your action as a result of those indications, noted equipment malfunctions or inadequacies, and any identified procedure deficiencies. Also, include any information you consider important to the review of this event and actions that may prevent recurrence. Use additional paper as necessary.

PLANT CONDITION WAS GREEN, PRIOR TO AND AFTER.

TOOL WAS DROP. NO LANYARD ON TOOL

HAVEING TOOLS ON A LANYARD WAS DISCUST IN THE PREJOB BRIFF TO PREVENT THIS. WE WILL TIE OFF TOOLS WITH STRING UNTIL WE GET LANYARDS IN.



1C

Event Investigation Personnel Statement

7C

Name: [redacted]

Position: Carp.

Event Date: 3-22-05

Handwritten statements are acceptable. Include the plant conditions prior to the event, your indications that a problem existed, your action as a result of those indications, noted equipment malfunctions or inadequacies, and any identified procedure deficiencies. Also, include any information you consider important to the review of this event and actions that may prevent recurrence. Use additional paper as necessary.

While working on the west side of the water boxes 24' EL. DTS 2282 A a combination box wrench slipped out of my hand. to the 8' level. My laborer [redacted] got the wrench at 8' 7C no instrument was hit and to the best of my knowledge nothing else was damaged. the 8' level was barricaded I reported to [redacted] 7C about the incident at the 12:30 ~~break~~, It happened right before break. break

W.O # ce40122951

[redacted] 7C

25Ch

PBNP Maintenance Department
Event Clock Blue Sheet
CAP

Days Since Last Clock Reset: 12 days Goal: 20 Days

The following information is to be used at Maintenance Dept. shift briefs to present timely OE on an event that reset the Maintenance Human Performance Clock.
Clock Reset Based On: Personal Safety Issue / Near Miss **CAP Number:**
Background:
Event Outline:

Corrective Action Taken: The workers stopped, placed their work area in a safe condition and notified their Supervisor. The Supervisor then contacted the following personnel: NMC Contractor Manager Operations Department Manager Maintenance Department Manager Industrial Health and Safety Manager **Corrective Action Taken:** (cont.) An Operations representative performed a walk down of the area to ensure that no equipment had been damaged during this incident. The Contractor Site Manager and Responsible Contractor Liaison then held a Briefing / Safety Stand down with all Craft Scaffolding personnel. A lessons learned briefing was also held with all Supervisors. A Human Performance Investigation was performed.
Operating Experience: N/A
References: N/A
Error Reduction Tools that may have helped in this event: STAR (Worker adjusting the decking), Challenging Information (How am I verifying the loose plate is not being allowed to fall), Communications
Human Performance Failure Modes: (A1) – Inattention, (A5) – Distracted, (A6) – Multi-Tasking, (A8) - Inadequate Tracking, (J5) - Inadequate Verification
ACEMAN Barrier Not Met: Worker Practices, Job Planning/Preparation, Verification/Validation, Peer Checking
Attachment: N/A

Event Investigation Personnel Statement

Name: _____

Position: _____

Event Date: _____

Handwritten statements are acceptable. Include the plant conditions prior to the event, your indications that a problem existed, your action as a result of those indications, noted equipment malfunctions or inadequacies, and any identified procedure deficiencies. Also, include any information you consider important to the review of this event and actions that may prevent recurrence. Use additional paper as necessary.

Event Investigation Personnel Statement

TC

Name: [redacted]

Position: Carpenter

Event Date: 03-22-05

Handwritten statements are acceptable. Include the plant conditions prior to the event, your indications that a problem existed, your action as a result of those indications, noted equipment malfunctions or inadequacies, and any identified procedure deficiencies. Also, include any information you consider important to the review of this event and actions that may prevent recurrence. Use additional paper as necessary.

[redacted] Said He Drop a wrench ON tuesday March 22 2005. TC
The wrench was Lying ON The 8' Turbine Floor. The wrench
Fell from 26' Water Box NOT Harming Plant Equipt.
Pre Outage. After NOtice put in safe Condition and Stop
work. Then a Safty stand down.

Event Investigation Personnel Statement

7C

Name: [redacted]

Position: Laborer - NP-5

Event Date: 3-22-05

Handwritten statements are acceptable. Include the plant conditions prior to the event, your indications that a problem existed, your action as a result of those indications, noted equipment malfunctions or inadequacies, and any identified procedure deficiencies. Also, include any information you consider important to the review of this event and actions that may prevent recurrence. Use additional paper as necessary.

We were working on the west side of the water boxes on the 26' Level. A wrench was dropped and fell to the 8' Level. [redacted] informed us that it was dropped It was before the outage. We stopped the job. and had a stand down. Supervisors were also notified.

AMS File No. R111-05[illegible]-0062

I filed a complaint with the D.O.L. on Sat. Aug. 20th.
This a copy of the correspondance I made to them.

[redacted] 7C

(12)

AUG 25 2005