

Procedures Adherence

Course 35.41

Terminal Objective:

At the completion of this course the trainee will comply with the requirements for strict adherence as stated in WI 02.03.16.01.01.

Enabling Objectives:

- EO1 Define: Procedure, Strict Adherence, Malicious Compliance, and Good workmanship.
- EO2 State Levels-of-Use requirements.
- EO3 State user requirements when following procedures.

ISM Summary

1. Define Scope of Work

Employees are required to strictly adhere to procedures.

2. Identify and Analyze Hazards

Procedures are reviewed by the appropriate organization(s) and address how to safely work around known hazards.

3. Develop & Implement Hazard Controls

Procedures will designate controls and PPE (Personnel Protective Equipment) to ensure safety. Employees follow the procedures and the controls that are stipulated.

4. Perform Work within Controls

Employees ensure that they have the most current issue of the procedure prior to work.

Employees strictly adhere to the procedures.

5. Provide Feedback & Continuous Improvement

Employees will stop work and contact their supervisor when a procedure needs to be corrected or the procedure is unsafe.

What is Procedures Adherence?

Procedures Adherence is simply following the procedure. Procedures Adherence is like a recipe in that if you follow the recipe to the letter, add the right ingredients and follow the directions, you should end up with the desired product.

Is Procedures Adherence important?

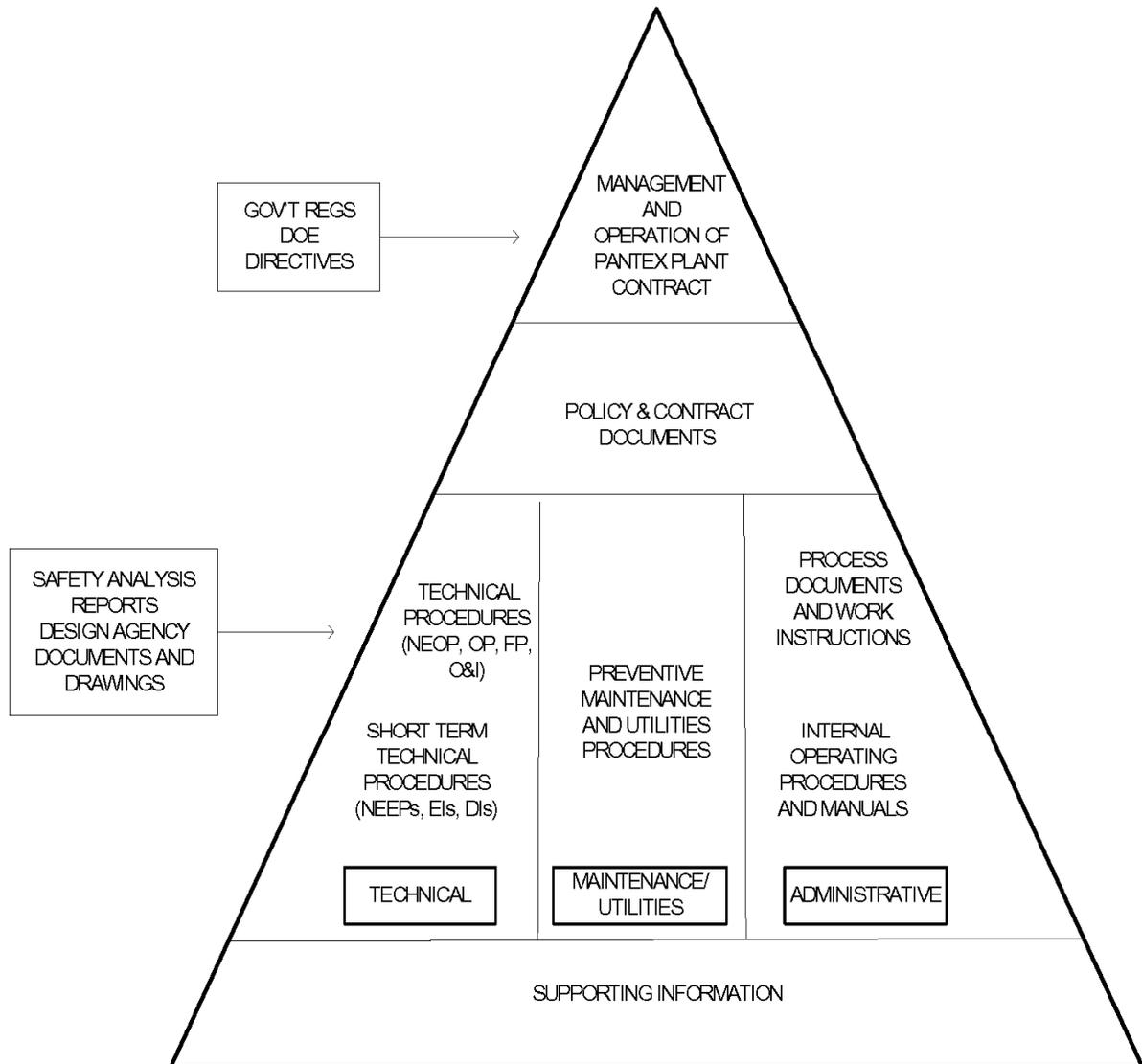
Why should we follow procedures?

EO1. Define Procedure

Procedure - approved, revision-control document used to do work and/or establish performance criteria for work. Pantex procedures include but are not limited to: PDs, WIs, NEOPs, DIs, EIs, NEEPs, IOPs, EPPs, IEPs, O&I's, FPs, OPs, Contract Documents (CDs), Manuals, Work Plans and Standing Orders.

What is by Document Hierarchy

Compliance with federal laws, regulations, codes, & standards is accomplished through the flow down of regulations in DOE Directives, which is eventually agreed upon and implemented through our Contract with NNSA. These requirements, then flow down into our procedures. We have used the illustration below to demonstrate the different types of documents which implement our requirements at the Plant and how these upper tier requirements flow into our procedures. This hierarchy does not negate our responsibility to adhere to all procedures. An example of the hierarchy is provided in the following diagram.



We follow procedures for...

- Worker Safety and Health
 - If we follow procedures, we will be doing the operation safely.
- Environmental Concerns
 - Procedures are written and reviewed to assure that the operation will not have a negative impact on the environment.
 - There are civil (fines) and criminal (go to jail) penalties to the person who did it, not just the company, for violating environmental compliance requirements. Following procedures ensure that nothing happens, to people, property, the environment, or the company.
- Quality Issues
 - Following procedures should ensure us that we will maintain a quality product or process.
- Disciplinary Actions
 - Procedures Adherence is a requirement, employees not adhering to strict adherence are subject to disciplinary actions.

Lessons Learned - Procedure Adherence Violations

- During an operation that involved electrical testing of a nuclear explosive, the procedure indicated that the testing was to be conducted without interruption. Part way into the operation the team stopped the test and broke for lunch, thus violating the procedure. In this particular case there was a note at the beginning of the testing sequence that indicated the testing was to be done continuously, without interruption. One of the operators thought that meant do it in one day, but another was sure that it did not allow breaks. Although the second technician brought the issue up to another technician who agreed that continuous did not mean breaks were allowed, neither brought this to the attention of the other technicians.
- During an operation that involved electrical testing of a component that had been removed from the NE, the technicians hooked the tester to a connector on the NE and performed the test. When the test did not yield the expected results, they stopped. Although the procedure clearly called out the connection point by number and on a particular component number, the hookup point was found by looking for a similar shape connector on the NE. When the test was performed, the readings were incorrect and the test was stopped. In this case there was doubt in the mind of at least one and perhaps more as to where the correct connector was, but nothing was said to stop the process before the hookup was made. There was a diagram in the procedure several pages before that step that showed where the component and the connection point were.
- During an operation that involved cleaning of a case component, the cleaning process was conducted using materials not specified in the procedure and the case part was damaged. In addition, the procedure - which had combined three cleaning steps into one - called for the cleaning operation to be performed under man to man coverage, yet the cleaning of the case part was done by a single individual. Although it was clear to all that from a NES standpoint there is no requirement for two- person coverage on a case component, the procedure called for it and it was not provided. In addition, the step containing the cleaning of the three

components was signed off as complete before the cleaning of the third component was even started.

- While moving a JTA from one location to another, although our procedures clearly call for the use of the PX 3192 because this JTA contained small amounts of explosives, the 3192 was not used and the transporters did not ensure one was present before moving the item. Three similar errors have been made in the movement of JTA. In one case the result was that the JTA was delivered to an area that was not allowed to have that type of explosive. In another case a weapon was moved without the use of the protective blanket.

Definitions (EO1):

1. Procedure - approved, revision-control documents used to do work and/or establish performance criteria for work. Pantex procedures include but are not limited to: PDs, WIs, Technical Procedures, NEOPs, DIs, EIs, NEEPs, IOPs, EPPs, IEPs, ONIs, FPs, OPs, Contract Documents (CDs), Manuals, Work Plans and Standing Orders.
2. Strict Adherence - Performing actions or activities as specified in the procedure, regardless of the Level-of-Use, to produce the expected result. While Strict Adherence requires doing what the procedure says, Strict Adherence does not imply that every action to be taken by the user is stated in the procedure. Good workmanship is expected in all operations.
3. Good Workmanship – Performance of tasks based on operator techniques, skill of the trade, or expertise, which are not specifically included in the procedure. The operator is expected to know how to perform these tasks based on training and experience.
4. Malicious Compliance - Following a procedure knowing that unwanted, unlawful, or unexpected consequences result.

Level-of-Use Categories

Describes the different categories for labeling and using procedures.

The four Levels of Use are: Critical Use, Specific Use, General Use, and Reference Use. (E02)

1. Critical Use – The highest Level-of-Use category. The procedure is required to be present in the immediate work area and open to the page containing the step being performed. Sequence of steps is mandatory unless otherwise specified in the procedure. When required by the procedure, each step is read and performed before going to the next step. This assures the step is performed, as written, in the sequence specified. Critical Use is required for all procedures used for nuclear explosive work.
2. Specific Use – A Level-of-Use category that requires having the procedure present in the immediate work area and open to the page containing the step being performed to assure strict adherence during performance of an activity. Sequence of steps is mandatory unless

indicated by a note prior to the steps. Specific Use procedures do not perform Nuclear Explosive Work and may contain Critical Steps.

3. General use – A Level of Use category that requires referring to a procedure as needed, to assure strict adherence during performance of an activity. Sequence may or may not be mandatory, as specified in the procedure. This Level of Use category requires that the written procedure be available in the immediate area of the work being performed. The frequency with which the user refers to the procedure varies depending on training, experience, and complexity of work to be performed. For nuclear explosive activities, General Use Procedures includes: facility procedures, general safety standards, staging procedures, transportation procedures, and other procedures for nuclear explosive operations that are not defined as nuclear explosive work.
4. Reference Use – A Level of Use category that allows the procedure to be performed from memory. Sequence is not mandatory. This Level of Use does not require the document to be at the work location, but is readily available. The majority of non-technical procedures used at Pantex are identified as “Reference Use”.

Requirements (EO3) WI 02.03.16.01.01 All Users of Procedures:

- Strict adherence is required. Strict adherence does not imply malicious compliance that produces unwanted or unexpected results, or imply that every action to be taken by the user is stated in the procedure. Good workmanship is expected in all work activities.
- Typographical errors in procedures, such as, but not limited to misspellings, word omissions, and obvious mis-numberings, which are considered typographical errors, are not causes for suspension of work activities. (Reference Operating Procedure P7-2003)
- Continuing to use a procedure that contains a typographical error for which a correction has been requested is not considered an adherence violation.
- Strictly adhere to the procedure as written including Level-of-Use Category.
- Use the current approved issue.
- Submit a change request for improvements or corrections to procedures.
- When the word "per" is encountered in a procedure:
 1. Physically obtain the cited procedure, and
 2. Adhere to the Level of Use on the original procedure.
- When the word "reference" is encountered in a procedure
 1. Adhere to the Level of Use on the referenced procedure.
- When the work “as outlined in” is encountered in a procedure
 1. Adhere to the cited General Use procedure.
- Apply a level of good workmanship.

Requirements (EO3) WI 02.03.16.01.01 All Users of Technical Procedures

Technical Procedure – A procedure which specifies building or facility operational and safety requirements, or directs operations involving nuclear explosives, high explosives, radioactive components, toxic materials, or nuclear explosive like assemblies that may be performed in a safe, environmentally sound, and efficient manner.

- Use the current approved issue, except as applied to special cases of maintenance procedures or Bomb Books.
- Assure stamp/sign-off (Reference WI 01.03.04.01.03 and Operating Procedure P7-2003) is accomplished.
- Apply a level of good workmanship.
- Suspend work and notify the supervisor in the event the procedure cannot be followed, or produces or may produce unexpected or undesirable results. (Reference WI 02.01.01.05.05)
- Requirements (EO3) WI 02.03.16.01.01 and P7-2003 The person performing the work using a Technical Procedure:
- Unless specifically stated otherwise in the procedure, stamp or sign-off required steps before beginning the next step.

Requirements (EO3) 3.1.4 The Supervisor:

- Enforces strict adherence and specified Level- of-Use requirements. (Reference WI 02.04.01.01.01)
- Reports violations of procedure adherence. (Reference WI 02.03.04.01.04)

Bottom Line Requirement:

Users performing work shall strictly adhere to procedures. If a procedure cannot be followed or if the user believes the procedure presents a safety risk as written, the work shall be stopped until the procedure is corrected.

Procedure adherence in our business is a very sensitive issue. No matter how many times we do it right, it will always be of concern if we find we are doing it wrong.