

Pre-Task Planning through Post-Job Review: CPWR's Guidelines and Applied Resources

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CPWR – The Center for Construction Research and Training

CPWR's Webinar Series

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Project & Aims

Project: CPWR's "Prevention through Augmented Pre-Task Planning" funded by NIOSH.

AIMS: Enhance the quality of Pre-Task Planning (PTP) in construction.

- Identify gaps and shortcomings in current PTP practices
- Explore effective strategies to fill the gaps

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➔ ▪ Develop applied tools to help practitioners initiate, assess, and improve their PTP process

Why Pre-Task Planning?

- Research findings suggest that most work-related injuries could be prevented by:
 - Proactively identifying hazards and unsafe conditions associated with each task, tools/equipment, materials, work methods, and jobsite
 - Properly addressing hazards using effective controls before work begins
- When and how to recognize and address hazards?
- **Pre-Task Planning (PTP)** is a process performed before each task starts to discuss the steps of work, the hazards, and available controls. It may also be known as JHA, JSA, morning huddle, or other terms.

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Are current PTP practices functional?

To answer this question, we:

- Interviewed 52 construction managers and safety & health professionals
- Interviewed 132 construction workers
- Observed onsite Pre-Task Planning and morning huddles
- Reviewed 30 sample Pre-Task Planning forms and documents
- Reviewed findings with our Industry Advisory Group

A Comprehensive Guidelines & Resources Package

- Translated research findings into an easy-to-use, comprehensive PTP package (www.cpwr.com/ptp)
- Helps contractors design, implement, assess, and continuously improve their PTP
- Contains:
 - Implementation and Assessment Guidelines
 - Sample Completed PTP Form
 - Blank PTP Template (PDF and Word)
 - Post-Job Review Checklist
 - Management PTP Assessment Checklist
 - Workers' Perspective Questionnaire

[Pre-Task Planning \(PTP\) Implementation and Assessment: Guidelines and Resources](#)

Guidelines and Resources
**Pre-Task Planning (PTP)
Implementation and Assessment
in Construction**

October 2023

Pre-Task Planning (PTP) Guidelines and Resources Page

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Pre-Task Planning (PTP) Guidelines and Resources for Construction

Pre-Task Planning (PTP) is a process performed before each task starts to discuss the steps of work, the hazards, and available controls. This process may also be known as job hazard analysis (JHA), job safety analysis (JSA), morning huddle, or other terms.

To help contractors design, implement, assess, and continuously improve their PTP process, CPWR has developed a comprehensive PTP package. It contains several applied tools — including checklists, templates, and practical examples — to help you through the process. To access these resources, use the links below.

- [Pre-Task Planning \(PTP\) Implementation and Assessment: Guidelines and Resources](#)

To obtain individual checklists and tools included in the full package, select from this list:

- [Sample Completed Pre-Task Planning \(PTP\) Form](#)
- Blank Pre-Task Planning (PTP) Form ([PDF](#), [Word](#))
- [Post-Job Review Checklist: An End-of-Shift Assessment Tool](#)
- [Pre-Task Planning \(PTP\) Assessment: Management Checklist](#)
- [Pre-Task Planning \(PTP\) Assessment: Worker's Perspective](#)

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Training and Awareness Programs from Research	+
Management Resources from Research	—

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Ready to develop your PTP?

- Ready to develop your own PTP?
- Follow the example provided in CPWR's package
- Download and use the blank PTP form
- Download:
 - Sample Completed PTP: [Sample-Completed-Pre-Task-Plan-PTP-Form.pdf \(cpwr.com\)](#)
 - Blank PTP form: [Blank-Pre-Task-Plan-PTP-Form-PDF.pdf \(cpwr.com\)](#)

Pre-Task Planning (PTP) Form

Your company's logo here

Project: Contractor: Date:

Location: Name / Role: PTP #:

Task:

Steps	Hazards	Controls
<input type="text"/>	<input type="text"/>	<input type="text"/>
<input type="text"/>	<input type="text"/>	<input type="text"/>
<input type="text"/>	<input type="text"/>	<input type="text"/>
<input type="text"/>	<input type="text"/>	<input type="text"/>

Staff responsible for implementing and checking controls:

Crews working nearby:

Crew / Activity	Hazards	Action Plan
<input type="text"/>	<input type="text"/>	<input type="text"/>
<input type="text"/>	<input type="text"/>	<input type="text"/>
<input type="text"/>	<input type="text"/>	<input type="text"/>

Staff responsible for coordinating with other crews:

Have you provided the information below?

☐ Site layout ☐ Equipment ☐ Specific types of PPE ☐ Medical facility information





☐ Materials ☐ Tools ☐ Work schedule ☐ Permits ☐ Evacuation and emergency plans

Notes:

How to Develop PTP

- Conduct PTP before each task starts
- Conduct daily walkthroughs and involve workers
- Update and communicate PTP content when condition changes
- Break the task into manageable steps
- Specify hazards associated with each step
- Identify ways to control each hazard
- Identify who is responsible for implementing the controls
- Discuss permit requirements
- Use photos or other visual aids instead of text where possible
- Use educational aids like a whiteboard or live demo

Task: Conduit Installation

Steps	Hazards	Controls
Pre-job set up	<ul style="list-style-type: none"> • Injury from hand tools and power tools • Slips, trips, and falls 	<ul style="list-style-type: none"> • Inspect all tools prior to use. • Secure the work area and clear bystanders. • Use site-specific PPE. • Maintain good housekeeping. • Complete hands-on training prior to using power tools. • Evaluate materials to be drilled for potential hazards (e.g., lead based paint).
Bend conduit using conduit bender tool 	<ul style="list-style-type: none"> • Injury to hands, including pinching fingers • Strain/sprain from awkward position 	<ul style="list-style-type: none"> • Use site-specific PPE. • Keep hands away from bender head. • Use proper body positioning when bending conduit.
Cut conduit with reciprocating saw 	<ul style="list-style-type: none"> • Lacerations • Metal debris in eyes • Strain/sprain from awkward position 	<ul style="list-style-type: none"> • Use site-specific PPE. • Secure conduit with a vise prior to cutting. • Keep hands away from saw blade. • Use proper body positioning.
Drill holes with power drill and install conduit supports 	<ul style="list-style-type: none"> • Debris in eyes • Lacerations • Strain/sprain from awkward position • Breathing hazardous dust • Noise • Burns 	<ul style="list-style-type: none"> • Use site-specific PPE. • In addition to site-specific PPE, use an N95 mask and hearing protection. • Make sure drill bits are sharp and not cracked before use so they don't break off and cause injury. • Do not wear loose fitting clothing that can get caught in moving parts. • Keep hair and jewelry out of the drill path. • Keep hands away from rotating drill bit. • Use proper body positioning. • After drilling, do not touch the drill bit, it is often extremely hot.
Drill hole in junction box with power drill	<ul style="list-style-type: none"> • Debris in eyes • Lacerations • Strain/sprain from awkward position • Breathing hazardous dust • Noise • Burns 	<ul style="list-style-type: none"> • Use site-specific PPE. • In addition to site-specific PPE, use an N95 mask and hearing protection. • Do not wear loose fitting clothing that can get caught in moving parts. • Keep hair and jewelry out of the drill path. • Keep hands away from rotating drill bit. • Secure junction box with a vise prior to drilling to prevent rotation. • Use proper body positioning. • After drilling, do not touch the drill bit, it is often extremely hot.
Place conduit 	<ul style="list-style-type: none"> • Falls • Strain/sprain from awkward position • Debris in eyes 	<ul style="list-style-type: none"> • Use site-specific PPE. • If using a ladder, select one of appropriate height. • Position the ladder directly beneath work area to avoid over-reaching as this can result in falls.

Staff responsible for implementing and checking controls: R. Garcia

How to Develop PTP

- Discuss hazards posed by other crews working nearby
- Include supplemental information
- Give workers the opportunity to lead the PTP meeting
- Provide PTP training – how to complete and how to conduct it
- Gather and incorporate workers' feedback on the PTP process

Crews working nearby:

Crew / Activity	Hazards	Action Plan
Ironworkers / Overhead work	• Falling objects	• Use safety nets. • Establish a clearly marked safety perimeter.
Drywallers / Sanding	• Silica exposure	• Wear a dust mask or N95.
Laborers / Excavation	• Cave-ins • Falling into excavation	• Install barriers or fence off excavation site. • Use a spotter when workers are in or near excavation site.
Operating Engineers / Heavy equipment traffic	• Struck by	• Designate marked pedestrian walkways.

Staff responsible for coordinating with other crews: L. Smith

Have you provided the information below?

- | | | | |
|---|---|---|--|
| <input checked="" type="checkbox"/> Site layout | <input checked="" type="checkbox"/> Equipment | <input checked="" type="checkbox"/> Specific types of PPE | <input checked="" type="checkbox"/> Medical facility information |
| <input checked="" type="checkbox"/> Materials | <input checked="" type="checkbox"/> Tools | <input checked="" type="checkbox"/> Work schedule | <input checked="" type="checkbox"/> Permits <input checked="" type="checkbox"/> Evacuation and emergency plans |

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Operating Engineers / Heavy equipment traffic	<ul style="list-style-type: none">• Struck by	<ul style="list-style-type: none">• Designate marked pedestrian walkways.

Staff responsible for coordinating with other crews: L. Smith

Have you provided the information below?

- | | | | |
|---|---|---|--|
| <input checked="" type="checkbox"/> Site layout | <input checked="" type="checkbox"/> Equipment | <input checked="" type="checkbox"/> Specific types of PPE | <input checked="" type="checkbox"/> Medical facility information |
| <input checked="" type="checkbox"/> Materials | <input checked="" type="checkbox"/> Tools | <input checked="" type="checkbox"/> Work schedule | <input checked="" type="checkbox"/> Permits <input checked="" type="checkbox"/> Evacuation and emergency plans |

Post-Job OR End-of-Shift Review

- Huddle at the end of the work shift
- Briefly discuss issues that occurred during the shift
- Discuss safety, health, and other concerns
- Plan adjustments for the next day
- Keep track of issues during the project lifecycle
- Download the Post-Job Review Checklist:

[Post-Job-Review-Checklist-An-End-of-Shift-Assessment-Tool.pdf \(cpwr.com\)](https://cpwr.com/Post-Job-Review-Checklist-An-End-of-Shift-Assessment-Tool.pdf)

Post-Job Review Checklist: An End-of-Shift Assessment Tool

An end-of-shift review (also known as post-job or post-task review) is a huddle held at the end of the work shift to briefly discuss issues that occurred during the shift, safety and health concerns, and adjustments needed for the next day.

This checklist has been developed based on research findings and input from industry experts to help work crews continuously evaluate and improve their work process. Ask each question from your crew and develop an action plan if the status is not satisfactory. Please note that this checklist is to complement your Pre-Task Planning (JHA, JSA, pre-job planning, etc.) process and is not a replacement for any other planning steps.



Please use the QR code above or go to <https://cpwr.com/Post-Job-Review-Checklist-An-End-of-Shift-Assessment-Tool.pdf> if you have any feedback or questions.

Project: Name / Role:


Task: Date:

No.	Questions	Status		Explanation/Action Items
		Yes	No	
1	Did you have everything you needed to do your job properly?	<input type="checkbox"/>	<input type="checkbox"/>	
2	Were all tasks completed as planned?	<input type="checkbox"/>	<input type="checkbox"/>	
3	Were there any incidents during the shift?	<input type="checkbox"/>	<input type="checkbox"/>	
4	Were there any near misses during the shift?	<input type="checkbox"/>	<input type="checkbox"/>	
5	Were all hazards identified in PTP controlled well?	<input type="checkbox"/>	<input type="checkbox"/>	
6	Did any new hazards emerge during the shift?	<input type="checkbox"/>	<input type="checkbox"/>	
7	Were there any conflicts within the crew?	<input type="checkbox"/>	<input type="checkbox"/>	
8	Were there any conflicts with other crews?	<input type="checkbox"/>	<input type="checkbox"/>	
9	Did any crews work nearby that you did not expect?	<input type="checkbox"/>	<input type="checkbox"/>	
10	Did other crews' work cause any challenges or hazards to your crew?	<input type="checkbox"/>	<input type="checkbox"/>	
11	Were any major pieces of equipment (e.g., tower crane) mobilized to the jobsite?	<input type="checkbox"/>	<input type="checkbox"/>	
12	Were there any equipment or tool related issues (breakdown, unavailability)?	<input type="checkbox"/>	<input type="checkbox"/>	
13	Were there any material related issues?	<input type="checkbox"/>	<input type="checkbox"/>	
14	Did weather conditions impact your work?	<input type="checkbox"/>	<input type="checkbox"/>	
15	Is there anything else you would like to discuss?	<input type="checkbox"/>	<input type="checkbox"/>	

Assess Your PTP Process; Management Checklist

- Use the Management Checklist to assess your PTP process
- Each “No” answer indicates an area for improvement
- Use guidelines presented in the PTP package to improve each component
- Download the Management Checklist:

[Pre-Task-Planning-PTP-Assessment-Management-Checklist.pdf \(cpwr.com\)](https://cpwr.com/Pre-Task-Planning-PTP-Assessment-Management-Checklist.pdf)

Pre-Task Planning (PTP) Assessment Management Checklist	
<p>Pre-Task Planning (PTP) is a process performed before each task starts to discuss the steps of work, the hazards, and available controls. This process may also be known as JHA, JSA, morning huddle, etc.</p> <p>This checklist has been developed based on research findings and input from industry experts to help construction practitioners evaluate and improve their PTP process. Each "No" answer indicates an area for improvement. Please note that this checklist is not a replacement for your PTP.</p>	
 <p>Please use the QR code above or go to http://bit.ly/4535T58 if you have any feedback or questions.</p>	
1.	Do you conduct PTP before each task starts? → If you answered NO, please use CPWR's PTP Guidelines to initiate your process and then use this checklist to assess it.
2.	Do you conduct daily walkthroughs? → If you answered NO, please skip to question 3.
3.	Do you update PTP content when conditions change? → If you answered NO, please skip to question 4.
4.	Does your PTP break the task up into manageable steps or sub-tasks?
5.	Does your PTP specify hazards associated with each step of the task?
6.	Does your PTP discuss ways to control each hazard? → If you answered NO, please skip to question 7.
7.	Do you inform workers about permit requirements during the PTP meeting?
8.	Does your PTP discuss hazards posed by other crews working nearby?
9.	In addition to the crew supervisor, do workers have the opportunity to lead the PTP meeting?
10.	Do you provide any training to conduct or lead the PTP meeting?
11.	Do you gather workers' feedback on PTP content and delivery? → If you answered NO, please skip to question 12.
12.	Does your PTP use photos or other visual aids instead of text where possible?
13.	Do you use educational aids like a whiteboard or live demonstration in your PTP process?
14.	Does your PTP include the following information?
15.	Is PTP information easily accessible to workers after the meeting is completed?
16.	Do you conduct end-of-shift review with your crew to discuss what went well and what didn't?

Assess Your PTP Process; Workers' Perspectives

- Actively gather firsthand information from workers and continuously incorporate it to reach an optimum outcome
- Identify areas for improvement
- Use guidelines presented in the PTP package to improve each component
- Download the Workers' Perspective Questionnaire:

[Pre-Task-Planning-PTP-Assessment-Workers-Perspective.pdf \(cpwr.com\)](https://cpwr.com/Pre-Task-Planning-PTP-Assessment-Workers-Perspective.pdf)

The image displays three overlapping versions of the 'Pre-Task Planning (PTP) Assessment Worker's Perspective' questionnaire. The forms are from CPWR (The Center for Construction Research and Training). The top form is partially obscured by the middle one, which is in turn partially obscured by the bottom one. The forms contain various questions and checkboxes for workers to provide feedback on their PTP process. The questions cover topics such as: how often they receive information, how helpful PTP meetings are, how often PTP content is updated, how much they agree with certain statements, how often they are asked for feedback, and how satisfied they are with the PTP process and their employer's training. The forms also include a section for comments and a final 'Thank you for your participation' message.

Continuous Improvement

- Encourage contractors to initiate their PTP process without emphasizing perfection.
- Ask for workers' perspectives.
- Repeat the process to identify shortcomings.
- Simplify the process so it can be completed with minimal effort.
- Remove unnecessary, non-value adding steps.
- Exercise post-job review.

www.cpwr.com/ptp

Guidelines and Resources

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Acknowledgement



Thanks!

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