# Tailgate Talk



"Demolition Safety"
Date: /
Name & Signature

## **Demolition Safety**

Every road, bridge, and structure has a design life; when that design life ends, demolition usually follows. Demolition may also be needed after structural damage, unforeseen environmental stress, or material imperfections. Demolition activities may often feel like an afterthought compared to construction or maintenance work, but the nature and inherent risks involved in demolition require careful planning and a cautious approach to ensure the safety of both workers and the public.





### **Planning and Preparation**

- PPE: It is necessary to ensure you have all the required types of PPE you need or may need on demolition day. This list includes (but is not limited to):
  - Head & Eye Protection
  - Steel-Toed Boots
  - High-Quality Work Gloves
  - Breathing Protection
  - Proper Clothing (ensure clothing can provide minimal protection and is properly fitted with no loose ends that can be caught by machinery or debris)
  - Hearing Protection
- Developing a work plan for the day and ensuring that the entire team understands
- Go through maintenance checklists for all tools and equipment used during the demolition. Evaluate all equipment to ensure it is in good working order and test equipment before use.

- Ensure employees are adequately trained for demolition operations, including any heavy equipment used.
  - Prepare the work area:
  - Electrical/water shut off
  - Gas (call 811)
  - Sources of combustion and ignition
  - Sources of chemical exposure
  - Identification and protection against other toxic materials
    - Asbestos and/or Lead
- First Aid & Emergency Planning: Sometimes, even the best-planned demolitions go wrong. It is essential to plan for on-site injuries by having first aid supplies available for workers. Emergency services should also be made aware of planned activities, and demolition teams should have quick access to communication equipment so they can call for help if needed. It is also essential to have escape routes planned in and around demolition areas in the event of emergencies like fires, unplanned structural collapses, or other hazards.



### **During the Demolition**

- All workers should maintain a high degree of situational awareness, both for themselves and others.
   Demolition areas can create visibility obstructions in the form of debris mounds or dust. Ensure that all workers are accounted for and that the path is straightforward when using heavy equipment.
- Begin the demolition of walls, floors, and levels from the top down.
- Be aware of your physical and mental state. Workers should be alert and in good physical condition before taking on demolition jobs. If you are sick, tired, or otherwise compromised – go home!

### Highway Demolition Specific Considerations

Demolition work is difficult enough, but demolition operations around traffic create a heightened danger level. Highway and public works employees should take the extra steps necessary to ensure they are safe when performing demolition activities on or near public roads.

Work Zone Safety and Proper Flagging: Ensure that road work zones are appropriately designated, marked, and secured. Post-well-trained flaggers to direct traffic and provide adequate advanced warning for oncoming traffic. Wear ANSI-approved high-visibility safety apparel.

Prepare for typical highway and road construction hazards, including:

- Dust
- Flying Debris
- Environmental Stress

### Conclusion

It is an employer's responsibility to provide a safe work environment for all employees. Even though demolitions are inherently unpredictable, taking the proper steps above can go a long way toward mitigating risks and ensuring everyone goes home safe and injury-free.

### Resources

### **NYSLTAP-CLRP Manuals & Pocket Guides:**

- Work Zone Traffic Control cornell.box.com/clrp-ws-wztc
- Work Zone Safety Pocket Guide cornell.box.com/clrp-pb-wzpg
- Flaggers Handbook Pocket Guide cornell.box.com/clrp-pb-fpg
- FHWA Report: Safety and Health on Bridge Repair, Renovation, and Demolition Projects
   www.fhwa.dot.gov
- OSHA Demolition Information www.osha.gov/demolition

www.osha.gov

The Constructor.org
 theconstructor.org/practical-guide



#### Video

Removal/Demolition Safety - Iowa DOT 1999

This video shows the hazards associated with demolishing and removing roads, structures, and utilities in preparation for new construction. Emphasis is on personal responsibility for safety by being knowledgeable about the job, the equipment, and the plan, avoiding surprise hazards. With footage from operating work zones, good safety practices, actual safety hazards, and unsafe working conditions and procedures are illustrated.

www.youtube.com/watch?v=Y8ihEENL1pY

