Personal Fall Protection Systems

Working at heights is a common hazard in NCC T&D operations, particularly during substation construction, transmission line installation, and maintenance activities. Personal fall protection systems are critical when guardrails are not practical, and must be selected based on the hierarchy of fall protection methods.

NCC T&D Project Leaders Key Responsibilities

Project Leaders must ensure:

- System Selection: Choose appropriate fall protection based on hierarchy
- Training Implementation: Provide comprehensive fall protection training
- Documentation: Maintain training and inspection records
- Rescue Planning: Develop and maintain fall rescue procedures
- Equipment Management: Ensure proper inspection and maintenance

Fall Protection Hierarchy

NCC T&D implements fall protection in the following order of preference:

Travel Restraint System

- Full body harness with adequate attachment points
- Connection to fixed support
- Prevents worker from reaching fall hazard

Fall Restricting System

- Limits free fall to 0.6 meters
- Specially designed for specific applications
- Must meet manufacturer specifications

Fall Arrest System

- Full body harness with proper attachment points
- Shock-absorbing lanyard when appropriate
- Maximum arrest force of 8 kilonewtons
- Prevents contact with lower levels

Safety Net System

- Professional engineering design required
- Tested before initial use
- Regular inspection and maintenance

Worker Responsibilities

Workers must:

- Inspect Equipment: Check all components before each use
- Report Defects: Immediately report any defective equipment
- Follow Training: Use systems as per training received
- Maintain Certification: Keep fall protection training current
- Report Incidents: Immediately report any falls or near-misses

Additional Considerations for NCC T&D Projects

Given the specialized nature of electrical work, additional measures include:

- Pre-Use Inspection: Detailed equipment checks before each shift
- Environmental Factors: Consider weather impacts on equipment
- Electrical Hazards: Use appropriate equipment for electrical work
- Access Planning: Ensure safe access to work positions
- Emergency Resnance: Maintain readily available rescue equipment



Key Takeaways

- System Selection: Use highest level of protection practical
- Inspection: Daily inspection of all components is mandatory
- Training: Workers must be properly trained and certified
- Documentation: Maintain all required records
- Rescue Planning: Have documented rescue procedures ready

For more information, refer to NCC T&D's relevant IMS procedures or consult our HSE Department for expert guidance and training resources.

