

## Playground Review and Maintenance Process

**Line of Business:** General Liability

**Risk Control Strategy/Key Issues:** Establish procedures for existing playground equipment review to comply with current safety guidelines.

### Required Program Elements:

1. Management Policy Commitment:
  - Policy statement
  - Assigned responsibilities
  - Accountability established
  - Initial Audit
  - Playground supervision
2. Complete an initial audit:
  - Where required performed by a Certified Playground Safety Inspector
3. Prioritize audit recommendations:
  - Life threatening or severe permanent disability
  - Any condition which can be serious non-permanent disabling injury
  - A condition which may cause slight injury or a condition which does not comply with the current Consumer Product Safety Commission (CPSC)
4. Implementation Plan:
  - Designate individual accountable for implementation
  - Establish a "time line"
  - Create file for all follow up
  - Management review of plan
5. Maintenance Process: Frequency of inspections specific to the site:
  - Use
  - Materials
  - ClimateRepair requests:
  - Repair request form
  - Central reporting person
  - Follow up accountability assignedCentral File Documentation
  - All repair requests filed
  - All completed repairs filed
  - Purchase Orders & Manufacturing Books
  - Installation Contracts

6. Playground Supervision:

- Duties/accountability assigned
- During school hours
- Staffing per Department of Education Guidelines

**Program Activities Calendar:**

- Annual training of custodial, maintenance/operations staff
- Monthly equipment review
- Weekly inspections

**Web Site Links:**

- U.S. Consumer Product Safety Commission  
<http://www.cpsc.gov>
- National Recreation and Park Association  
<http://www.nrpa.org>
- National Program for Playground Safety  
<http://www.uni.edu/playground>
- International Play Equipment Manufacturers Association  
<http://www.ipema.org>

*Trident Insurance Services provides the above program information in order to reduce the risk of insurance loss and claims. The information provided is not intended to include all potential controls or address any insured specifically. Trident also does not warrant that all loss and/or claims will be avoided if the program information is followed. By providing this information, Trident in no way intends to relieve the insured of its own duties and obligations, nor is Trident undertaking, on behalf of or for the benefit of the insured or others, that the insured's property or operations are safe, healthful, or in compliance with any law, rule or regulation. Insureds remain responsible for their own efforts to reduce risks and should consult their own legal counsel for appropriate guidance.*

## Playground Safety Action Items

Is your public playground a safe place to play? Each year, more than 200,000 children go to U.S. hospital emergency rooms with injuries associated with playground equipment. Most injuries occur when a child falls from the equipment onto the ground.

1. Replace hard surfacing with fall attenuating material. Make sure surfaces around playground equipment have at least 12 inches of wood chips, mulch, sand, or pea gravel, or are mats made of safety-tested rubber or rubber-like materials.
2. Check that protective surfacing extends at least 6 feet in all directions from play equipment. For swings, be sure surfacing extends, in back and front, twice the height of the suspending bar.
3. Make sure play structures more than 30 inches high are spaced at least 9 feet apart.
4. Check for dangerous hardware, like open "S" hooks or protruding bolt ends.
5. Make sure spaces that could trap children, such as openings in guardrails or between ladder rungs, measure less than 3.5 inches or more than 9 inches.
6. Check for sharp points or edges in equipment.
7. Eliminate or locate exposed concrete footings below surfacing material. Look out for tripping hazards, like exposed concrete footings, tree stumps, and rocks.
8. Make sure elevated surfaces, like platforms and ramps, have guardrails to prevent falls.
9. Check playgrounds regularly to see that equipment and surfacing are in good condition.
10. Carefully supervise children on playgrounds to make sure they're safe.
11. Remove or repair known broken/non-operating equipment.
12. Remove any non-recommended public playground equipment
  - CPSC "Handbook for Public Playground Safety", 12.6.5
  - Animal Figure Swings
  - Multiple Occupancy Swings
  - Rope Swings
  - Swing Dual Exercise Rings and Trapeze Bars
13. Training program:
  - Playground maintenance inspection
  - Playground supervision
  - Document all training
14. Make immediate repairs and follow through with written work order procedures.
15. New equipment purchase and installation:
  - Use of International Playground Equipment Manufacturers Association members only
  - Installed per Manufacturers specifications
  - Inspected prior to use
  - No homemade equipment installed
  - All replacement parts from Original Equipment Manufacturers (OEM)
16. Manufacturer or representative/contractor to install equipment or:
  - If volunteers are used to install equipment then the manufacturers, representative supervise the installation.

## PLAYGROUND SAFETY CHECKLIST

NOTE: This checklist assumes the playground complies with U.S. Consumer Product Safety Commission guidelines. For more information contact your Risk Control Consultant.

District / School

Location

Date

Inspector

Time

Indicate 'yes' or 'no'. If 'no', recommendations or comments should be made on the line, or on the reverse side of the form identified by the number that corresponds to the question.

#	Target Issue	Yes	No
1.	Has the "fall cushion", sand, gravel or wood chips, under equipment been compacted or displaced?		
2.	Are there any foreign objects or obstructions in the fall zones under and around play equipment?		
3.	Are any concrete footings on play equipment sticking out above ground or not secure?		
4.	Are there any obstructions in the normal traffic patterns?		
5.	Are there any sharp edges, broken parts, or loose bolts?		
6.	Are there any frayed cables, worn ropes or chains that can pinch?		
7.	Is any wood part rotting, splitting, insect infested or excessively worn?		
8.	Does any play equipment need re-finishing (sanding, painting)?		
9.	Is the playground fence in good condition?		
10.	Are there any electrical hazards, low wires, transformers, uncovered outlets, etc. on the playground?		
11.	Are there any pools of contaminated water in the playground?		
12.	Are there any holes, which could cause a fall, in the playground?		
13.	Does the grass, trees or shrubs need care?		
14.	Are there any other fixtures / structures in the playground area that are not in good repair?		

Comments: \_\_\_\_\_  
\_\_\_\_\_

## TIPS FOR PUBLIC PLAYGROUND SAFETY

Each year, about 200,000 children are treated in U.S. hospital emergency rooms for playground equipment-related injuries - an estimated 148,000 of these injuries involve public playground equipment and an estimated 51,000 involve home playground equipment. Also, about 15 children die each year as a result of playground equipment-related incidents. Most of the injuries are the result of falls. These are primarily falls to the ground below the equipment, but falls from one piece of equipment to another are also reported. Most of the deaths are due to strangulations or falls. The following are some playground safety tips:

1. Protective Surfacing - Since almost 60% of all injuries are caused by falls to the ground, protective surfacing under and around all playground equipment is the most critical safety factor on playgrounds.
  - Asphalt and concrete are unacceptable. They do not have any shock absorbing properties. Similarly, grass and turf should not be used. Their ability to absorb shock during a fall can be reduced considerably through wear and environmental conditions.
  - Certain loose-fill surfacing materials are acceptable, such as the types and depths shown in the table:

### Fall Height In Feet From Which A Life-Threatening Head Injury Would Not Be Expected

TYPE OF MATERIAL	6" DEPTH	9" DEPTH	12" DEPTH
Double Shredded Bark Mulch	6	10	12
Wood Chips	6	7	12
Fine Sand	5	5	9
Fine Gravel	6	7	10

- Certain manufactured synthetic surfaces also are acceptable; however, test data on shock absorbing performance should be requested from the manufacturer.
2. Fall Zones - A fall zone, covered with a protective surfacing material, is essential under and around equipment where a child might fall. This area should be free of other equipment and obstacles onto which a child might fall.
    - Stationary climbing equipment and slides should have a fall zone extending a minimum of 6' in all directions from the perimeter of the equipment.
    - Swings should have a fall zone extending a minimum of 6' from the outer edge of the support structure on each side. The fall zone in front and back of the swing should extend out a minimum distance of twice the height of the swing as measured from the ground to the top of the swing support structure.
  3. Swing Spacing - To prevent injuries from impact with moving swings, swings should not be too close together or too close to support structures. Use the following guide:
    - No more than two swing seats suspended in the same section or bay of the support structure. Use the following clearances for conventional to-fro swings:
    - Horizontal distance between adjacent swing seats - at least 24 inches.

- Horizontal distance between swing seat and adjacent structural component - at least 30 inches.
  - No more than one tire swing suspended in same section or bay of support structure. Distance between the outer-most edge of a tire swing and the adjacent upright of the support structure - at least 30" when the tire is swung to a position closest to the support structure.
  - No swings attached to multi-activity equipment.
  - No heavy animal swings with rigid metal framework.
4. Elevated Surfaces - Platforms more than 30" above the ground should have guardrails to prevent falls.
  5. Potential Head Entrapment Hazards - In general, openings that are closed on all sides, should be less than 3-1/2" or greater than 9". Openings that are between 3-1/2" and 9" present a head entrapment hazard because they are large enough to permit a child's body to go through, but are too small to permit the head to go through. When children enter such openings, feet first, they may become entrapped by the head and strangle.
  6. Potential Entanglement Hazards - Open "S" hooks, especially on swings, and any protrusions or equipment components/hardware which may act as hooks or catch-points can catch children's clothing and cause strangulation incidents. Close "S" hooks as tightly as possible and eliminate protrusions or catch points on playground equipment.
  7. Pinch or Crush Points - There should be no exposed moving parts which may present a pinching or crushing hazard.
  8. Playground Maintenance - Playgrounds should be inspected on a regular basis. If any of the following conditions are noted, they should be removed, corrected or repaired immediately to prevent injuries:
    - Hardware that is loose or worn, or that has protrusions or projections.
    - Exposed equipment footings.
    - Scattered debris, litter, rocks, or tree roots.
    - Rust and chipped paint on metal components.
    - Splinters, large cracks, and decayed wood components.
    - Deterioration and corrosion on structural components which connect to the ground.
    - Missing or damaged equipment components, such as handholds, guardrails, swing seats.