

PlaySafe and Live Well!

Welcome to PlaySafe, LLC's informational column. Every month we will work hard to provide you with up-to-date information on topics related to parks, recreation, health, wellness, and physical education. Our hope is that by providing you with detailed information, you will go forward and positively change the world. If you have questions or comments, or if you would like to share your thoughts, please contact us through this web site. Thanks. Now PlaySafe and live well!

Learn about your Playground Amenities

By Butch DeFillippo, PlaySafe, LLC

Often, when playground safety is brought up in a discussion, the focus centers on the playground equipment and surfacing. The equipment and surfacing are extremely important elements of a playground and there are standards, laws, and guidelines that can and should be reviewed when designing, building, maintaining, and supervising playgrounds. But there are other areas of play that should be reviewed. Playgrounds often have amenities that should be designed and kept as safe as possible.

Follow manufacturer instructions!

You should always research what safety requirements should be met with what amenity you are planning to purchase. ASTM International, The Consumer Product Safety Commission, and the International Code Council are a few of the safety organizations that provide safety guidance. But, in the absence of any other agency to help you, the manufacturers of products are an outstanding, underutilized resource. The manufacturer of what you are buying understands the why, how, for whom, and what maintenance practices are required for what they create and sell.

Work with your public safety providers!

It is essential that you meet with your police and fire safety providers. The police and fire personnel have a different, essential point of view that must be incorporated into our decision-making. We want the amenities you are purchasing to be enjoyed by your user group and not endanger the men and women who keep us safe.

Keep things clean!

There are many ways in which we can endanger our guest. One way is for us to fail to keep things clean. Exposure to trash, waste, blood and other unknown sticky, dirty things are not only unpleasant and disgusting, but can be a safety hazard. While keeping things clean we must also keep our staff safe. The City of Miami FL Parks and Recreation Safety Handbook states:

1. Employees who use steam cleaners must first be trained and authorized.

2. The supervisor will maintain a current list of personnel and will turn the steam on for authorized personnel.
3. Hearing protectors, goggles and cuffed gloves are required to be worn. Two workers are required to be present during the cleaning process.
4. Before leaving the steam cleaner area, employees will clean the area, roll up the hose and turn in the protective equipment.

http://www.miamigov.com/RiskManagement/pages/safety_unit/Parks%20Handbook/12-P&R-IV-General%20Safety%20Rules.pdf

Some Amenities Examples!

The following are some items on which you may wish to conduct a safety review for your agency:

Water fountains – the following information is provided by Serenity Health & Home Décor

Make your water fountain last with proper maintenance and upkeep. Submersible pumps are the heart and soul of any indoor or outdoor water fountain. It doesn't matter what the fountains are made of, what size they are, or how much they cost, water fountain pumps are what make them tick, or, more accurately, flow. The secret to keeping your indoor or outdoor fountain in perfect working condition is in the pump. There's no big secrecy around it. It's really just a matter of common sense and basic know-how. Indoor pumps have somewhat different maintenance needs than outdoor pumps. For example, outdoor fountain pumps are more susceptible to becoming clogged with debris blown into the fountain by Mother Nature herself. They need to be taken right out of the fountain and periodically cleaned. That means that all debris (dirt, sand, leaves, grass, etc) should be wiped out of the fountain regularly. Indoor fountain pumps aren't exposed to harsh weather conditions, but may need to be adjusted or calibrated slightly (depending on the style of fountain) to adjust the noise level and make the most of the harmonious water sounds coming from the fountain. Be sure your fountain pump is completely submerged in water. When you first get your water fountain and run it for a few days you will see how often you will need to be adding water. This depends on your climate, atmosphere in your home etc. The size of your fountain will also be a factor as larger fountains such as a wall fountain will typically hold more water, thus no need to fill as often. Keep the fountain pump clean of debris and buildup. Your pump will be the first thing to see build up as this is what the water is flowing through and filtering the water. You can simply take the pump out of your fountain and wipe it clean with a sponge or cloth. Remove the cover of the pump and clean out the inside as well. If you have small areas in the pump try using a toothbrush to scrub these hard to reach areas. Keep your water fountains running all the time. This is a great tip for a couple reasons. First of all, if you keep your fountains on all the time it prolongs the life of the pump because it is not being turned on and off. If cared for properly, your pump should last at least a year, if not 3 to 5 years. Keeping it running as much as possible will extend the life of your pump. Secondly, your water

will stay cleaner. Still, stagnant water that is not moving will develop debris and buildup much faster. This is a great tip as many people think they need to shut their fountain off at night or when they leave for work. See our Fountain Pump Facts for more information on choosing the right pump for your fountain. Using Distilled Water. Distilled water is the best way to prevent algae build up in indoor water fountains. It is however, not required. If you don't have access to distilled water you can also try a fountain care product such as Algae Control, White Scale Control, or No more foam. There are also great all natural fountain care products that are completely safe for pets and wildlife. Try a fountain protector such as Fountain Cleanser or Bird Bath Cleanser. These work great for outdoor fountains because they are safe for wildlife and distilled water is not always possible for larger outdoor fountains. Regular use of a fountain care product will help prevent algae and white scale build up that happen from minerals and hard water. Clean your water fountain regularly. This will keep your water fountain beautiful on the outside, like a piece of art! Most fountains can simply be emptied and wiped clean on the inside and out with a cloth or sponge. If you have stainless steel or copper on your waterfall see the care instructions provided below. Fountain Cleaning Tips for Copper: You will find that water fountains made of copper will either be a natural copper or have a powder coat finish over the copper. Copper with a powder coat, or clear coat finish has a clear heat-baked finish applied to all surfaces of the copper. This protects the copper from getting that greenish (patina) tint. It also protects the beautiful (hand-applied) patina, and allows the copper to maintain its "New" and lustrous look over the years. NEVER USE COPPER CLEANER on copper with a powder coat finish. It will remove the finish and cause your fountain to show aging (patina) faster. You can simply clean the copper with Pledge or furniture cleaner and a soft sponge or cloth. You may also want to apply a turtle wax or car wax to the copper every couple months to protect the copper and keep it shining. If you experience white spots (white scale) on your copper they can be cleaned off with CLR (Calcium Lime Remover). Note: Powder coating does not completely stop the aging process of copper, over time, the copper will age and the powder coating will come off allowing your copper to oxidize as this is a natural material and a normal process. Care for Natural Copper Fountains: Simply use a furniture polish such as Pledge to keep your fountain clean and beautiful. You will want to be careful not to let water sit on the copper (all fountains have splash guard to minimize this) for a long period of time. NEVER USE Copper Cleaner or CLR as this will remove the patina finish that is hand applied to these copper fountains. Copper will oxidize and change color over time. You will see the copper on your fountain go through various stages of "weathering" typically starting with turning a darker color. The time it takes for this process to start is dependent on your climate. Fountain Care for Stainless Steel: Stainless Steel is very simple to care for and virtually maintenance free. Stainless Steel will not age like copper and has an excellent resistance to corrosion. Because stainless steel is a smooth surface it is more difficult for bacteria to settle. To clean your stainless steel fountain simply wipe it clean with a dry or wet cloth. Do not use a harsh abrasive cleaner or any abrasive sponges or other abrasive cleaning products. Never use a disinfectant such as bleach or anything containing bleach on your stainless steel because it could eat away at the

material. You can use a product such as No more White Scale if you start to notice white build up on your fountain. http://www.serenityhealth.com/wtr_water_fountain_care.html

Drinking fountains – the following article in Recreation Management by Stacy St. Clair, Jenny E. Beeh and Kelli Anderson is very helpful.

Dirty drinking fountains do more than just turn off visitors. They also threaten their health.

Recreation managers have a responsibility to provide their patrons with clean coolers that quench thirst and prevent contamination. Fortunately, with a little extra effort and the latest technology, clean drinking water can be within everyone's reach.

CHECK IT OUT

Studies show the public won't drink from fountains they perceive as even slightly unclean. Make fountain checks a part of your regular maintenance schedule. Have an employee check your fountains every two hours to ensure they are in clean, working condition. During big events, consider performing hourly inspections.

KEEPING IT CLEAN

Water fountains should be cleaned at least once a day. When cleaning, first check the water flow. For sanitary reasons, the stream should be at least three inches away from the bubbler. Next, spray disinfectant cleaning solution on the inside surfaces of the mouthpiece and protective guard. Using a grout brush, scrub the inside and outside of the mouthpiece and protective guard. Use a clean, damp cloth to wipe down drinking fountain surfaces.

LIME AID

Fountain maintenance also should include the removal of lime buildup. The first step is to spray descaler onto the bowl and back of the drinking fountain. Once you've done this, saturate a clean, lint-free cloth with lime remover solution. Run the cloth directly over any surfaces with lime buildup. When removing the solution, use a brush or hand pad to remove the hard buildup if necessary. Wipe the area dry with a clean, lint-free cloth.

INDOOR DON'T

If you're installing your water fountain inside a recreation facility, consider placing it in an area without carpeting. Spillage can create moisture problems that encourage mold growth.

NONPOTABLE PROBLEMS

With increased population and industrialization, the world's water resources become more stressed every day. The global challenge has given rise to the recycling of treated municipal waste water for non-potable uses such as park and golf course irrigation. Non-potable water

reuse often enables a community to supplement its water supply and reduce reliance on other pristine, yet quite limited, sources.

However, water reuse in park and recreational irrigation does not come without associated challenges. Wastewater, by its very nature, is highly contaminated. Only pathogens and some inorganic materials need to be removed for non-potable uses. Though the nutrient-rich water benefits the landscape, it poses a threat to patrons if it comes in contact with nearby water fountains.

It's critical that public drinking fountains located on or directly adjacent to irrigated areas have separate irrigation streams. When drinking fountains are located near irrigation heads, non-potable water can contact the drinking fountain's bubbler head, causing potential contamination problems. To remedy this, consider a device that shields the head.

The industry recently came up with a simple device that encases the bubbler head, protecting it from outside exposure and contamination, whether it be in a school room or on a irrigated ball field. When the fountain button is pressed, the water line pressure forces the shield up, exposing the bubbler head and clearing the water flow. When the button is released, the water pressure's elimination lowers the shield and once again encases the bubble

<http://www.recmanagement.com/features.php?fid=200511fe01&ch=21>

Benches –manufacturers provided the following information from their websites:

CARE & MAINTENANCE OF WOOD FURNITURE -Teak and balau are the premium choices of wood for outdoor furniture. Teak and balau are beautiful and durable hardwoods that require little or no care to preserve its natural good looks and strength for decades.

THE WEATHERING PROCESS- Remove any dust from manufacturing by lightly wiping your furniture with a damp cloth. New teak and balau furniture appears to have a polished sheen. This sheen is caused from the oil naturally occurring in balau wood. This surface oil will be washed away after a short time outdoors. The oils and resins that remain inside give teak and balau their lasting durability. In the first few week of sun exposure, your teak and balau will turn a beautiful golden color. Eventually, the weathering process will naturally age your furniture to a handsome sliver-gray, leaving your furniture with a look of ageless beauty. This gradual aging process usually takes up to twelve months, depending on the amount of sunlight and rain exposure to the wood. After the wood has been exposed to moisture, the surface grain may rise slightly. The grain will return to its original smooth finish after the initial weathering process. You may even notice a few small cracks at the end grain, called “checking”. This is a natural weathering effect. The slight separation of the grain has no effect on the strength and longevity of the furniture. This “checking” is caused when the wood expands and contracts slightly when left outdoors. Water spots or discoloration may also occur early in the weathering process. This spotting will

eventually disappear as the teak wood ages to its uniform silver-gray color. To quicken this aging process, simply clean the furniture as instructed in “annual cleaning”.

ANNUAL CLEANING- The only maintenance necessary for your furniture is a periodic cleaning. This cleaning should be done with a soft bristled brush and soapy water (mild detergent) to remove accumulated dirt. Most dirt and stains can be removed with soapy water and a brush. To eliminate any surface mold (black spots/color) add a half cup of household bleach to each one-gallon soapy water solution. Rinse well with clean water after washing. Avoid using pressure washers because they can scour and roughen the wood surface and drive out the natural wood oils. Also, avoid the use of steel wool as it can leave a residue that can produce rust spots. A bronze wool pad is ok.

STAINING-Teak and balau are porous materials and will absorb unwanted liquids and food oils that will cause staining. To reduce staining, immediately wipe off up any spills as soon as possible. Scrub stain with a wet sponge and let dry. For stubborn stains and burns, we recommend a light sanding in addition to cleaning. If previously sealed, follow sanding by resealing stained surface area.

WOOD SEALER- Should you prefer to keep the furniture the original golden color use a wood sealer. Oil based sealers will maintain the color for approximately one year and can be reapplied as needed. Wood sealers will also aid in reducing staining. Initial application of sealer should be applied after one or two weeks of outdoor exposure or after your furniture has been cleaned and completely dried. Avoid applying sealer in direct sunlight or extreme heat. Let dry for a day and buff with a clean towel.

DEEP CLEANING- To restore your furniture to its original color, use a wood cleaner/brighteners. Most cleaners/brighteners will restore the furniture to the original golden color regardless of age or surface condition. These cleaners require no heavy scrubbing, easy to use and will produce dramatic results.

WE DO NOT RECOMMEND USING TEAK OIL- Using teak oil on outdoor wood furniture can leave a greasy or sticky residue which provides an ideal living condition for mold and mildew. This creates black spots on your wood furniture. We also advise against the use of paint, varnish or other similar finishes. These finishes tend to crack and flake from the surface and are not suited for outdoor applications.

<http://www.parkbenchdesigns.com/docs/WoodMaintenancePBD.pdf>

Picnic Table & Park Bench Frames Maintenance Tips - Posted by Pilot Rock on August 19, 2015

All outdoor park equipment requires periodic maintenance and repairs as the exposure to weather conditions and the human element takes a toll. We have compiled a list of maintenance tips for

various pieces of park equipment. These tips are provided to advise you about what needs to be done, when and how to do it. These tips may not cover all situations under all conditions, but are general best-practice tips. In this series of four maintenance posts, we now review tips for picnic table and park bench frames.

Damage from Moving - If you move or relocate any picnic tables or park benches, look for any frame components that may get damaged during this handling. If diagonal braces that support the frame structure get damaged, they should be replaced to keep the structure sound. Be sure to check all fasteners. They can work loose over time, especially if the tables or benches are moved around.

Rust - The most durable frame finish for outdoor furniture is galvanized. A galvanized finish is more durable and resistant to scratching and exposure over time than a painted finish. The best galvanized finish is called hot dip galvanized after fabrication. This process involves submersing the fully assembled frame component into molten zinc to completely coat all surfaces – including the inside and outside of all pipe components and all welds. These dipped components have a shiny finish that will weather to a dull gray over time. This will require almost no maintenance under normal use. There are also frame components made of pre-galvanized steel. These parts are usually lightweight and perform quite well in many applications. However, any areas that have been cut or drilled will expose the underlying steel and may develop rust over time. Be most concerned about any points on pre-galvanized steel that have been welded. The welding heat can burn off the pre-galvanized finish exposing the steel. These weld points must be cold galvanized, which could be equated to a sprayed on painted finish. Painted frame finishes are also very popular because many color options are available. Most manufacturers now use a dry powder coat paint application process vs. liquid paint. In most common installations, the painted finish will serve well for many years. However, if the paint is chipped or scratched, the exposed metal can begin to rust. For example, if picnic tables are dragged across a concrete surface, the paint can be scratched off the underside of the frame pipe. It won't be visible on the bottom, but the steel will be exposed. These areas must be sanded and repainted before the rust expands too far. Use any spray paint that closely matches the color of the frame component. You should expect to do more touch up maintenance on painted steel components for park furniture used by the public. There are, however, environments where painted steel frame components do not hold up as well as galvanized finishes. We do not recommend painted finishes for steel in coastal and island environments, where there is a lot of humidity from the lake or ocean and a lot of salt exposure from that moisture. The combination of moisture and salt air will cause any steel exposed by a scratch in the paint to quickly rust and the rust will only grow bigger. This can require frequent repair and repainting. The hot dip galvanized finish is less susceptible to this corrosive environment.

<http://blog.pilotrock.com/blog/picnic-table-and-park-bench-frames-maintenance-tips>

I have provided some examples of playground amenities and some great information that is easily discoverable. I believe that any provider of playground amenities should have an understanding

of why they want to use an item at a playground and how to keep it maintained and safe. I understand that you and your staff are stretched thin, but you cannot allow yourselves to be pressed to the point that someone could be injured or killed!