CHAPTER 2 SITE FURNISHINGS

Athletic Equipment | Badminton Net Systems Athletic Equipment | Base Plates Athletic Equipment | Basketball Goal Systems Athletic Equipment | Foul Pole Athletic Equipment | Futsal Goal Athletic Equipment | Field Hockey Goal Athletic Equipment | Lacrosse Goal Athletic Equipment | Soccer Goal Athletic Equipment | Tennis Net Systems Athletic Equipment | Volleyball Net Systems Bench | Natural Area Bench | Park Bench | Players **Bicycle Rack** Bleachers Bollard | Dog Exercise Area Bollard | Metal Bollard | Wood

Drinking Fountain Fitness Equipment Flagpole Grill Grill | Receptacle Ash/Coal Hand Rails | Stand Alone Hand Sanitizing Station Lighting Area Lighting | Athletic Facilities Lighting | Flagpole Lighting | Ground Recessed Lighting | Historic Pole Lighting | Street Pole Movable Furnishings Picnic Table | Option 1 Picnic Table | Option 2 Plaques | Adopt-A-Bench Receptacle | Recycling Receptacle | Trash Wheel Stop

BADMINTON NET SYSTEMS

Purpose

Badminton net systems shall be provided at outdoor sand and grass badminton facilities.

General Information

Net systems shall comply with National Collegiate Athletic Association standards or other governing authority.

Related Standards: Court Diagram | Badminton

Materials and Finish

Post size shall be $3\frac{1}{2}$ " inches minimum with $\frac{3}{6}$ " wall thickness aluminum with a powder coated black finish.

Netting shall be 4 inch square black mesh No. 24 nylon fabric, with vinyl coated steel top cables. Headband shall be 2 inch white vinyl-coated nylon.

Features

Systems shall have a heavy duty net tensioning reel with removable handle.

Installation

Posts shall be installed in ground with concrete footers. Footers shall be covered with 1 foot minimum vertical depth sand or top soil.

Life Cycle Expectations

A 2 year warranty is required for posts.

Nets are anticipated to require replacement annually with normal and ordinary use.

Posts are anticipated to require replacement after 10 years of normal and ordinary use.



Badminton Net System



SECTION

Image Footnotes

(1) https://douglas-sports.com/product/vbs-3-5-sqoutdoor-power-volleyball-system-3-5-sq-steel-black

BASE PLATES

Purpose

Ball field base equipment shall be provided at diamond fields as needed for play.

General Information

Base plate dimensions shall comply with National Federation of State High Schools or other governing authority.

Base plates shall be anchored in ground per manufacture's recommendation.

Related Standards: Infield Mix, Field Diagram | Baseball, Field Diagram | Softball.

Materials and Finish

Plate color shall be white with black trim.

Double first bases shall include a white base and an orange outside base.

Plates shall be manufactured from durable materials such as rubber, reinforced steel and polyurethane.

Materials shall be rated for exterior use and all-weather play.

Features

Home plate shall have a rubber waffle style interior. Plate shall be waterproof with a non-skid exterior surface.

Pitching rubber shall be four-way, adult size with inner support tubing.

Base plates shall be progressive release.

Base anchors and plugs shall be easily replaceable.

Installation

Locate plates, pitching rubbers and bases in compliance with field la youts.

Life Cycle Expectations

A 1 year minimum warranty is required.

Base plates are anticipated to require replacement after 2 years of normal and ordinary use, and annually for heavily programmed fields.







Pitching rubber

BASKETBALL GOAL SYSTEMS

Purpose

Competition style, heavy duty backstops shall be provided at outdoor basketball facilities.

General Information

Post systems shall comply with National Collegiate Athletic Association regulations or other governing authority.

Related Standards: Court Diagram | Basketball, Court Surfacing.

Materials and Finish

Upright posts and supports shall be 6 inches minimum square structural steel tubing with ¼ inch thick walls.

Steel components shall have a double powder coat finish. Color shall be black.

Square backboard shall be perforated steel and include acrylic official perimeter and target area markings.

Goals shall be a double 5% inch diameter solid steel rim, with a continuous net attachment system.

Nets shall be heavy duty, weather resistant nylon fiber. Color shall be white.

Features

Backstop shall provide an extension inside the baseline. The backboard shall be 4 feet outside the baseline and the rim shall be 10 feet above the playing surface.

Post and backboard padding shall be installed when upright posts are located on or within the lined playing surface.

Installation

Install posts consistent with manufacturer's recommendations. Position backstop consistent with NCAA standards.

Post foundation shall be flush to adjacent grade. Top of footing shall be sloped to shed water.

Posts shall be surface mount or embed mount.

Wind loading design shall comply with American Society of Civil Engineers (ASCE) 7-98.

Life Cycle Expectations

A 10 year minimum warranty is required.

Basketball Goal Systems are anticipated to require replacement after 10 years of normal and ordinary use.

Nets are anticipated to require annual replacement with normal and ordinary use.



Basketball goal



FOUL POLE

02

Purpose

Foul poles shall be utilized to identify play/foul territory on diamond ball fields.

General Information

Foul poles shall comply with National Collegiate Athletic Association standards, Little League International regulations, or other governing authority.

Poles greater than 15 feet vertical dimension from finished grade require a Special Use Permit.

Related Standards: Track/Warning Track Surfacing, Field Diagram | Baseball, Field Diagram | Softball, Signs, Fence | Chain Link.

Materials and Finish

Poles shall be 3½ inches minimum to 6 inches maximum outside diameter, galvanized steel pipe with powder coat finish. Color shall be yellow, PMS 113 or similar. Open Mesh shall be 1.5 inches by 1.5 inches.

Foul Pole height shall be determined by ball field needs. Standard height is 15 feet from adjacent finish grade.

Wing panels shall be 18 inch horizontal width and 15 feet vertical height. Panels shall be 11 gauge expanded and flattened $\frac{3}{4}$ inch steel fabric.

Features

Pole heights can be 12 feet, 15 feet, 30 feet and 40 feet from adjacent grade with changes to pole diameter and wing panels dimensions.

Installation

Install separate posts in-ground when existing fence posts cannot be used.

Pole shall be aligned with foul line and in line with outfield fence.

Pole foundation shall be designed to accommodate IBC Wind loading requirements.

Foul Pole footer to be sleeved for removal. Top of pole foundation shall be flush to adjacent grade. Top of footing shall be sloped to shed water.

Life Cycle Expectations

A 10 year minimum warranty is required.

Foul Poles are anticipated to require replacement after 30 years of normal and ordinary use.



Foul pole located external to outfield fence

FUTSAL GOAL

Purpose

Futsal Goals shall be provided for youth sports on a hard court surface.

General Information

Futsal Goals shall comply with National Collegiate Athletic Association standards, Alexandria Soccer Association, or other governing authority.

Related Standards: Court Diagram | Futsal

Materials and Finish

Goals shall be reinforced, unitized or welded for stability.

Nets shall be high tenacity polypropylene with a 120mm mesh and a 4mm solid braid, knotless rope.

Goal frame shall be constructed from 3 inch aluminum tubing with smooth welds, joints and corners.

Goal dimensions for 7v7 shall be 6.5 feet in height and 12 feet in length. Goal dimensions for 9v9 games shall be 7 feet in height and 18.5 feet in width.

Nets shall be white in color.

Frames shall be powder coated white in color.

Installation

Ground anchor shall be installed in ground prior to surface installation and court lining.

Top of post foundation shall be flush with bottom of final surface. Concrete ground anchor footers shall be 2 feet by 3 feet 7inches and 3 feet vertical depth minimum.

Life Cycle Expectations

A 1 year minimum warranty is required.

Goals are anticipated to require replacement after 8 years of normal and ordinary use.



Footing Diagram



Futsal goal

FIELD HOCKEY GOAL

Purpose

Field hockey goals shall be provided for a variety of age groups including youth and adult.

General Information

Goal construction shall comply with the National Federation of State High Schools, National Collegiate Athletic Association regulations, or other governing authority.

Goals shall be removable, stored on-site and secured in a protected area.

Related Standards: Synthetic Turf | Sports Field, Field Diagram | Field Hockey.

Materials and Finish

Goals shall be reinforced, unitized or welded for stability.

Integral nets shall be weather resistant, heavy duty nylon cord or webbing.

Goal crossbars and uprights shall be constructed from heavy wall aluminum tubing with smooth welds, joints and corners. Tubing shall be 2 inches by 2 inches by .090" thickness minimum. Backstays and stabilizing bars shall be galvanized steel and 1% inch minimum outside diameter.

Goal dimensions shall be 7 feet vertical height by 12 feet horizontal width by 4 feet deep.

Open tube bottoms shall not be permitted.

Frames shall be powder coated white in color.

Nets and bottom boards shall be black in color.

Features

Goals shall be portable with wheel transport systems.

Installation

Goals shall be installed with tie down stakes for natural turf fields.

Goals on synthetic infill turf systems shall be weighted with an anchoring system that does not puncture the turf surface.

Life Cycle Expectations

A 1 year minimum warranty is required.

Goals are anticipated to require replacement after 8 years of normal and ordinary use.



Field hockey goal

Image Footnotes

(1) https://www.sportsfield.com/products/goals/ field-hockey-goals#galleryf001d81608-2

LACROSSE GOAL

Purpose

Lacrosse goals shall be provided for a variety of age groups including youth and adult.

General Information

Goal construction shall comply with the National Federation of State High Schools, National Collegiate Athletic Association, or other governing authority.

Goals shall be removable, stored on-site and secured in a protected area.

Related Standards: Synthetic Turf | Sports Field, Field Diagram | Lacrosse Girls, Field Diagram | Lacrosse Boys.

Materials and Finish

Goals shall be one piece, reinforced, unitized or welded for stability.

Nets shall be 4mm, weather resistant, heavy duty nylon cord or webbing.

Goal frame shall be constructed from Schedule 40 steel tubing with smooth welds, joints and corners. Frames shall be 1.9 inches outside diameter with .145 inch thick steel minimum. Goal dimensions shall be 6 feet vertical height by 6 feet horizontal width by 7 feet deep.

Back base bars shall be constructed from 4 inch wide, $\frac{3}{2}$ inch thick flat steel bar with lacing bar.

Open tube bottoms shall not be permitted.

Nets shall be white in color.

Frames shall be powder coated orange in color.

Installation

Goals shall be installed with tie down stakes for natural turf fields.

Goals on synthetic infill turf systems shall be weighted with an anchoring system that does not puncture the turf surface.

Life Cycle Expectations

A 1 year minimum warranty is required.

Goals are anticipated to require replacement after 8 years of normal and ordinary use.



Lacrosse goal

Image Footnotes

(1) https://www.sportsfield.com/products/goals/ lacrosse-goals#galleryeb2b63c2dc-5

SOCCER GOAL

Purpose

Soccer goals shall be provided for a variety of age groups including youth and adult.

General Information

Goal construction shall comply with the National Federation of State High Schools, National Collegiate Athletic Association regulations, or other governing authority.

Goal dimensions will vary according to play level, and shall comply with the National Federation of State High Schools, National Collegiate Athletic Association regulations, or other governing authority.

Goals shall be removable, stored on-site and secured in a protected area.

Related Standards: Synthetic Turf | Sports Field, Field Diagram | Soccer.

Materials and Finish

Goals shall be one piece, reinforced, unitized or welded for stability.

Nets shall be 5mm, hexagonal or square, weather resistant, heavy duty nylon cord or webbing.

Goals shall be constructed from heavy wall aluminum tubing with smooth welds, joints and corners. Goal frame tubing shall be 4 inch outside diameter and .125 inches aluminum wall thickness minimum.

Open tube bottoms shall not be permitted.

Frames shall be powder coated white in color.

Features

Goals shall be portable with wheel transport systems.

Adult goals shall be 8 feet vertical height and 24 feet wide. Goals shall be 5 feet deep at the top and 10 feet deep at the bottom.

Youth goals shall be 6 feet vertical height and 18 feet wide. Goals shall be 4 feet deep at the top and 6 feet deep at the bottom.

Installation

Goals shall be installed with tie down stakes for natural turf fields or weighted down with sandbags.

Goals on synthetic infill turf systems shall be weighted with an anchoring system such as sandbags or other, that does not puncture the turf surface.

Life Cycle Expectations

A 5 year minimum warranty is required.

Goals are anticipated to require replacement after 8 years of normal and ordinary use.



Soccer goal

TENNIS NET SYSTEMS

Purpose

Regulation tennis net systems shall be provided at outdoor tennis facilities.

General Information

Regulation nets shall comply with United States Tennis Association (USTA) standards or other governing authority.

Related Standards: Court Surfacing, Court Diagram | Tennis, Signs.

Materials and Finish

Net posts shall be 8 gauge minimum and 3½ inches minimum diameter aluminum or galvanized steel with green powder coat finish with caps.

Net fabric shall be weather resistant No. 36 nylon. Nets shall have a galvanized top cable with a white headband. Protective net edging shall be provided at bottom and ends.

Center net straps shall be included.



Tennis net system

Features

Net tensioning reel shall be vandal resistant. Reel shall be heavy duty with lubrication impregnated parts and heat pinioned gears. Wheel handle shall be concealed or removable. Net posts shall dutyibe sleeved.

Center net anchors shall be provided.

Net posts shall be installed on top of piers as determined by soil conditions.

Installation

Posts shall be installed in ground prior to final surface installation and court lining.

Post layout shall comply with USTA athletic standards.

Top of post foundation shall be flush with bottom of final surface. Concrete net post footers shall be 3' foot diameter and 3 feet vertical depth minimum.

Center net anchors shall be set in 1 foot by 1 foot horizontal dimensions and 1 foot minimum vertical depth concrete footings.

Life Cycle Expectations

A 2 year minimum warranty is required for posts.

Nets are anticipated to require replacement annually with normal and ordinary use.

Posts are anticipated to require replacement after 10 years of normal and ordinary use.

TENNIS NET SYSTEMS



Tennis net end post

Not to scale

VOLLEYBALL NET SYSTEMS

Purpose

Volleyball net systems shall be provided at outdoor sand and grass volleyball facilities.

General Information

Net systems shall comply with National Collegiate Athletic Association standards or other governing authority.

Related Standards: Sand Mixes | Volleyball, Court Diagram | Volleyball.

Materials and Finish

Post size shall be $3\frac{1}{2}$ " inches minimum with $\frac{3}{16}$ " wall thickness aluminum with a powder coated black finish.

Netting shall be 4 inch square black mesh No. 24 nylon fabric, with vinyl coated steel top cables. Headband shall be 2 inch white vinyl-coated nylon.

Features

Systems shall have a heavy duty net tensioning reel with removable handle.

Installation

Posts shall be installed in ground with concrete footers. Footers shall be covered with 1 foot minimum vertical depth sand or top soil.

Life Cycle Expectations

A 2 year warranty is required for posts.

Nets are anticipated to require replacement annually with normal and ordinary use.

Posts are anticipated to require replacement after 10 years of normal and ordinary use.



Volleyball net system

Not to scale

BENCH | NATURAL AREA

Purpose

Natural Area benches shall be located along paths and trails. Natural Area benches shall be located in parks in the Carlyle Coordinated Development District, the Eisenhower East Coordinated Development District and are an option for designated natural areas.

General Information

A standard, free-standing bench shall have back support and two side rails.

The standard bench is the Victor Stanley, Classic Series, model C-96 (6 foot length) in black powdercoated cast iron with kiln-dried 6 inch wide Alaska yellow cedar slats, or City approved equal.

Related Standards: Plaques | Adopt A Bench

Materials and Finish

Benches shall be constructed of a sturdy, durable metal such as galvanized steel, ductile cast iron or other metals designed for commercial exterior use.

Metal finishing shall be of high-quality, permanently affixed powder coating, applied through a heatfinished process.

Metal elements of benches shall be black.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed.

Wood slat seating shall be kiln-dried, natural finished yellow cedar or composite.

Features

Benches may include a center rail.

Installation

Benches shall be permanently affixed to a hardscape surface (concrete, pavers, etc.). Surfacing shall be ADA slope requirements.

Provide 3 feet- 4 inches minimum hardscape clearance on the front side of bench.

Provide a solid surface of 3 feet- 4 inches by 3 feet-4 inches minimum accessible area directly adjacent to bench.

One out of every five benches per park is required to have the minimum accessible area. One bench with accessible area minimum per park.

Trash or recycling cans shall be placed 5 feet minimum from a bench.

Benches shall be located in seasonally shaded areas when possible.

Life Cycle Expectations

A 10 year warranty is required.

Bench slats are anticipated to require replacement after 10 years of normal and ordinary use.

Bench frames are anticipated to require replacement after 20 years of normal and ordinary use.



Natural area bench

Image Footnotes (1) https://www.victorstanley.com

BENCH | NATURAL AREA



Bench with ADA space, plan view

Not to scale

Bench Foundation, Permeable Concrete Not to scale

BENCH | PARK

Purpose

Park benches shall be located along paths and trails adjacent to activity areas.

General Information

A standard, free-standing bench shall have back support and two side rails.

The standard model is the Victor Stanley, Classic Series, model CR-96 (6 foot length), with vertical slats, backrest and two side handrails in black, or City approved equal.

The backless companion model is the Victor Stanley, Classic Series model CR-298.

Benches shall comply with City of Alexandria Small Area Plan Requirements.

Related Standards: Plaques | Adopt A Bench

Materials and Finish

Benches shall be constructed of a sturdy, durable metal such as galvanized steel, ductile cast iron or other metals designed for commercial and exterior use.

Metal finishing shall be of high-quality, permanently affixed powder coating, applied through a heat-finished process.

Metal elements of benches shall be black in color, semi-gloss finish.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed.

Benches shall contain a minimum of 70% post-consumer steel.

Features

Benches may include a center rail.

Installation

Benches shall be permanently affixed to a hardscape surface (concrete, pavers, etc.). Surfacing shall be ADA slope requirements.

Provide 3 feet- 4 inches minimum hardscape clearance on the front side of bench.

Provide a solid surface of 3 feet- 4 inches by 3 feet-4 inches minimum accessible area directly adjacent to bench.

One out of every five benches per park is required to have the minimum accessible area. One bench with accessible area minimum per park.

Trash or recycling cans shall be placed 5 feet minimum from a bench.

Benches shall be located in seasonally shaded areas when possible.

Life Cycle Expectations

A 10 year warranty is required.

Benches are anticipated to require replacement after 20 years of normal and ordinary use.



Park bench

BENCH | PARK





Bench plan view

Not to scale

Bench Foundation

Not to scale



Bench with ADA space, plan view Not to scale

BENCH | PLAYERS

Purpose

Player benches shall be located adjacent to athletic facilities and tennis courts in designated player areas.

General Information

Bench shall be free-standing or permanently installed with a back support.

The standard bench model is Alumagoal, 15 foot length players bench, or City approved equal.

Materials and Finish

Benches shall be constructed of durable metal such as anodized aluminum for commercial and exterior use.

Metal finishing shall be PVC coated or brushed aluminum. Metal surface shall be ribbed/non-slip.

Metal elements of benches shall be black, dark green or grey in color.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed.

Materials and parts shall contain recycled materials.

Bench supports shall be surface mounted in concrete where possible.

Features

Surface mounted and in-ground support posts are available. Support posts shall be $\frac{3}{6}$ inch outside diameter galvanized steel.

Benches are available in the following lengths: 8 feet, 10 feet, 15 feet and 21 feet.

Benches longer than 10 feet shall include bracing and supports to provide long term stability.

Portable benches are available for use on synthetic infill turf fields.

Installation

Benches shall be permanently affixed to a hardscape surface except on synthetic turf fields or temporary installations where a portable version shall be used.

Provide a 3 feet minimum horizontal hardscape clearance on accessible perimeters of benches where mounted on hardscape.

Permanent and portable benches shall include safety end caps on supports.

Life Cycle Expectations

A 10 year minimum warranty is required.

Benches are anticipated to require replacement after 15 years of normal and ordinary use.



Portable bench



Aluminum bench, permanent installation

BICYCLE RACK

02

Purpose

Bike racks shall be provided at parks and recreation facilities consistent with the "Alexandria Bicycle Transportation and Multi-use Trail Master Plan."

See Department of Transportation and Environmental Services "Bicycle Parking Rack Placement" for additional Information.

General Information

Bike racks shall be the "Inverted U" type bicycle rack, approximately 3 feet tall and 18 inches wide after installation.

Commercially produced bike racks meeting the standards identified in the "Bicycle Transportation and Multi-use Trail Master Plan" and this document shall be acceptable alternatives.

The standard bike rack is the Inverted U rack, Victor Stanley, Cycle Sentry Series, model BRWS-101, or City approved equal.

Standard capacity for Inverted U bike rack is 2 bikes.

Related Standards: Surfacing Section.

Materials and Finish

Inverted U bicycle racks shall be fabricated from 2% inch outside diameter Schedule 40 steel pipe. The bicycle racks shall not be welded in sections.

Racks shall be hot dipped galvanized steel and powder-coated.

Racks shall be black in color.

Metal products shall have smooth welds, joints and corners.

Bike rack construction, including baseplates if necessary, shall be theft and vandal proof.

Features

Alternative racks shall be subject to approval by the Director of Transportation and Environmental Services and the Director of Recreation, Parks and Cultural Activities.

Polished stainless-steel components are an available option on certain sites subject to approval by the Director of Recreation, Parks and Cultural Activities.

Installation

Racks shall be flange mounted on concrete, or imbedded consistent with the "Alexandria Bicycle Transportation and Multi-use Trail Master Plan". Concrete pad shall be sloped to drained.

Where flange mounted on concrete, a 5 inch diameter minimum steel base plate, $\frac{3}{4}$ inch thick, shall be used, with a minimum of 3 mounting anchor holes in each base plate. Anchor bolts per manufacture's specifications. Anchors shall be theft-proof.

Bike racks shall be set firm and plumb.

Where required, steel shims shall be installed prior to anchoring in place. Baseplates more than ¾ inch from grade shall require high-strength epoxy nonshrink grout.

Bike racks shall be installed consistent with the manufacturer's recommendations.

Multiple racks shall be installed parallel with adjacent units, 3 feet-0 inches apart.

Racks shall be located so that parked bikes do not impede pedestrians.

Racks shall be located 3 feet minimum from parallel or perpendicular walls.

Life Cycle Expectations

A 10 year minimum warranty is required.

Bike racks are anticipated to require replacement after 20 years of normal and ordinary use.

BICYCLE RACK



2-3%" 1'-10" -0"+-3'-0' HARDSCAPE 10" x 10" x 20" CONCRETE 鍿 FOOTER , N In ground mount Not to scale $2 - \frac{3}{8}$ " 1'-10" --3'--0"+ HARDSCAPE

Inverted U bicycle rack

Surface mount

Not to scale



City of Alexandria 2021

BLEACHERS

Purpose

Structural bleacher assemblies for small to medium spectator seating shall be installed to provide spectator seating at outdoor athletic facilities. Large spectator seating is not covered in this standard.

General Information

Bleachers shall comply with the most current building codes and ADA standards including requirements for guardrails and barriers, handrails, non-skid surfaces and easily accessible isles.

Related Standards: Surfacing Section.

Materials and Finish

Bleacher seats shall be constructed of anodized aluminum.

Bleachers with more than 5 rows of seats or seats more than 2 feet-6 inches above adjacent grade shall include a chain link guard rail.

Bleacher treads and seats shall be a slip resistant ribbed surface.

Furnished assembly shall be free from sharp edges, pinch points, corners or protrusions.

Seats shall be continuous bench style.

Installation

Comply with manufacturer's recommendations for assembly.

Bleachers shall be installed on a hardscape surface with 4 feet minimum clear horizontal distance from the edge of structure on accessible perimeter.

Where possible, bleachers shall be accessible by hardscape surface pathways.

Bleachers shall be stabilized with wedge anchors.

Bleachers shall be anchored to concrete as required by USBC.

Life Cycle Expectations

A 5 year minimum warranty is required.

Bleachers are anticipated to require replacement after 10 years of normal and ordinary use.



Typical bleachers

BLEACHERS



Typical bleachers, plan view

Not to scale

BOLLARD | DOG EXERCISE AREA

Purpose

Composite bollards shall identify boundaries in official unfenced City Dog Exercise Areas as designated in the Dog Park Master Plan.

General Information

Composite bollards shall be 4 inches by 4 inches square (nominal dimensions).

Materials and Finish

Composite resin shall be structural grade composed of 50% wood fiber and 50% polyethylene or fiberglass.

Bollard color shall be an earth tone or brown color.

Bollards shall be 3 feet in vertical height measured from finished grade after installation.



Typical bollard

Features

A 3 inch by 3 inch reflective aluminum sign with "Paw Print" graphic shall be displayed on two sides of each bollard.

A 2 inch wide continuous band of white or yellow reflective material shall be located at the top of each bollard.

Installation

Each bollard shall be permanently installed using a 1 foot-6 inches diameter by 2 feet-6 inches vertical depth concrete footing.

Bollards shall not prevent emergency or maintenance access to fields and parks.

Footings shall be flush to adjacent grade. Top of footing shall be sloped to shed water.

Life Cycle Expectations

Bollards are anticipated to require replacement after 20 years of normal and ordinary use.



Unfenced Dog Exercise Area bollard Not to scale

BOLLARD | METAL

Purpose

Bollards shall be used to limit unauthorized vehicular traffic without restricting the movement of pedestrians and cyclists in historic areas.

General Information

The standard bollard is the Fair Weather, B-1 Series 6 inch (5.56 inch diameter) bollard with two, 2 inch width collars in black powder-coated, Schedule 10 steel, or City approved equal. Collar relief from the surface of the bollard shall be ½ inches.

Materials and Finish

Bollards shall be a durable, corrosion resistant metal such as galvanized steel, designed for commercial exterior use.

Metal finishing shall be a high-quality, permanently affixed powder coating.

Bollard color shall be black.

Finished assembly shall have smooth welds, joints and corners.

Hinges, latches and moving parts shall be weather resistant and lubricated at time of installation.

Features

Eyebolts shall be provided in instances where chain will provide an additional barrier between bollards.

Metal bollards are available in heights of 2 feet-6 inches, 3 feet, 3 feet-6 inches, or 4 feet, and 4 inch and 8 inch diameter.

Mounting styles are permanent embedded, surface bolted and sleeved/removable.

Installation

Bollards shall be spaced 3 feet-4 inches clear minimum horizontal distance.

Removable installation shall be used where authorized and emergency access is needed.

Removable mounting requires a sleeve/casing installed 2 vertical feet into the ground. Removable bollards shall be secured with lock and key.

Bollards shall be marked with reflective tape between the decorative collars.

Life Cycle Expectations

A 10 year minimum warranty is required.

Bollards are anticipated to require replacement after 20 years of normal and ordinary use.



Metal bollard

BOLLARD | METAL



Bollard spacing

Not to scale



Bollard section

Not to scale

BOLLARD | W

Purpose

Wood bollards shall limit vehicular traffic without restricting the movement of pedestrians and cyclists in natural resource parks.

General Information

Wood bollards shall be constructed of 4 inch by 4 inch pressure treated lumber embedded into 1 foot-6 inches minimum solid subgrade material (nominal dimensions).

Vertical height shall be 2 feet-6 inches minimum and 4 feet maximum measured from finish grade.

Klin dried to less than 15%.

Materials and Finish

Wood bollards shall be constructed of pressure treated lumber. Pressure treated lumber shall be Alkaline Copper Quaternary (ACQ) or Copper Borate Azole (CA) type.

Bollard tops shall include a metal post cap with a 45 degree chamfer continuous at top.

A 2 inch wide continuous band of white or yellow reflective material shall be located at the top of each bollard.

Installation

Bollards shall be spaced 3 feet-4 inches minimum horizontal distance bollard face to bollard face.

Bollards shall not prevent emergency or maintenance access to fields and parks.

Wood bollards shall be mounted in concrete footing with 1 foot-6 inches minimum diameter and 2 feet-6 inches minimum vertical depth. Footing shall be flush to adjacent grade. Top of footing shall be sloped to shed water.

Removable installation shall be used where authorized and emergency access is needed.

Life Cycle Expectations

Bollards are anticipated to require replacement after 15 years of normal and ordinary use.



Bollard spacing

DRINKING FOUNTAIN

Purpose

Water fountains shall be provided in parks where water supply is desirable and potable, particularly near active park sites and playgrounds. Fountains with a ground level dog fountain shall be installed in parks dedicated pet areas and other areas receiving large amounts of pedestrian traffic.

General Information

Fountains shall be accessible for wheelchair and mobility devices at standard height.

Fountains shall provide 2 feet-3 inches minimum vertical clearance and 2 feet-10 inches maximum vertical clearance from adjacent finished grade.

The drinking bubbler height shall be 3 feet-2 inches maximum vertical distance from adjacent grade.

Fountains shall be activated by a low-weight, 5lbs or less, push-button operation mechanism located below the bowl.

Bubblers shall have a welded protector shield.

Fountains shall include a vandal proof panel for access to interior systems and filters.

The standard park drinking fountain is the Most Dependable Fountain Inc., Model 440SM drinking fountain or City approved equal. Fountains that require a bottle filler option, model 10145SM shall be used.

Materials and Finish

Fountains shall be constructed of standard steel or stainless steel, for commercial and exterior use.

Green or Black powder coated shall be the finish options for fountains. The bubbler, bowl and buttons shall be satin finish stainless steel.

Metal products shall have smooth welds, joints and corners.

Hinges, latches and mechanical parts shall be weather and rust resistant.

Features

Pet fountains, jug fillers, and interior hose bib with lockable cover shall be available options from fountain manufacture.

Installation

Fountains shall be mounted permanently to hardscape surfaces or in-ground mount per manufacturer's recommendations.

Provide a 3 feet-4 inch minimum horizontal dimension of hardscape surface at the accessible perimeter of each fountain.

Fountains shall be installed by a licensed plumber consistent with applicable City and State Codes.

Top of slab shall be sloped to shed water.

Fountains with jug fillers shall have adequate drainage.

Life Cycle Expectations

A 1 year minimum warranty is required.

Fountains are anticipated to require replacement after 5 years of normal and ordinary use.



Drinking fountain

FITNESS EQUIPMENT

Purpose

Fitness equipment shall maximize exercise and safety, while minimizing long-term maintenance.

General Information

Equipment shall be designed and manufactured to comply with the most current CPSC and ASTM safety standards and guidelines.

Equipment shall be reviewed and approved by the Director of Recreation, Parks and Cultural Activities.

Equipment shall have an approved safety surface.

Related Standards: Engineered Wood Fiber, Safety Surfacing.

Materials and Finish

Equipment shall be constructed of durable materials designed for frequent exterior use and high resistance to varied seasons and vandalism.

Products containing recycled materials shall be used.

Equipment surfaces shall be slip resistant and drain efficiently.

Main structural components shall be one-piece construction, with a minimum of bolts and fasteners. Structures with excessive joints, rough welded corners, pinch points, or other sharp edges or points shall not be used.

Use of light or bright colors shall be minimized on components subject to frequent wear or contact.

Hardware and fasteners shall be stainless steel or treated with a rust proof finish.

Maintenance kits shall be provided for each fitness apparatus.

Manufacturer and/or identification number shall be clearly displayed on each apparatus. Labels indicating the intended user age group shall be displayed on each play apparatus. Labels shall be located at transfer stations or other well visible areas.

Features

Equipment that has been recalled or not recommended by the Consumer Product Safety Commission shall not be used.

The use of the following items shall be minimized: ropes and PVC coated components.

PVC or other plastic coatings shall not be used on flexible components such as chains and cables.

Installation

Install equipment consistent with manufacturer recommendations and industry safety specifications.

Equipment shall be permanently ground anchored, or surface mounted to an approved surface.

Equipment footings shall be installed within the existing subgrade. Top of footings shall not be exposed above the approved safety surfacing.

Life Cycle Expectations

Replacement parts shall be readily available for the life of the equipment.

A warranty of 10 years minimum is required.

Fitness Equipment is anticipated to require replacement after 15-20 years based on normal and ordinary use.



Fitness Equipment

FLAGPOLE

Purpose

Flagpoles shall be installed to display local, state and federal flags in parks where the national anthem is played and where memorial or military services are held.

General Information

Flags and flagpoles shall be consistent with the United States Flag Code.

Flagpoles shall be 30 feet maximum vertical height without an approved Special Use Permit per City code Section 9-201(A)(1)(b).

The halyard and pulley system shall be interior and accessed by a locked panel at the base of the pole.

Related standard: Lighting | Flagpole, Lighting | Ground Recessed.

Materials and Finish

Flagpoles shall be constructed of seamless extruded aluminum alloy tubing, with a minimum wall thickness of $\frac{5}{32}$ inch, and a brushed satin finish.

Flagpoles and flashing collar shall have a directional, medium satin polish and be sealed with a clear, hard-coat wax.

Flagpoles shall be designed to fly a 6 feet by 10 feet American flag, a 5 feet by 8 feet Virginia State flag and a 4 feet by 6 feet City of Alexandria flag in combination.

Installation

Flagpoles shall not be located in conflict with active uses or vegetation.

Flagpoles shall be installed in locations that do not disrupt pedestrian traffic. Provide a 3 feet-4 inch minimum horizontal width hardscape surface adjacent to accessible pathway.

Flagpoles shall be located adjacent to accessible hardscape surfaces.

Concrete footings shall be consistent with manufacturer's recommendations and designed by a professional engineer. Top of footing shall be sloped to shed water.

Flagpole footings shall be designed for wind loading consistent with City of Alexandria Code.

Where multiple flagpoles are desired, space flagpoles using the largest flag to be flown on the pole plus four feet.

Flag sponsors external to the City shall provide three of each flag type.

Life Cycle Expectations

A 10 year minimum warranty is required.

Flagpoles are anticipated to require replacement after 20 years of normal and ordinary use.



Flagpole

GRILL

02

Purpose

Grills shall be located in areas where food consumption is encouraged.

General Information

Where grills are permitted, at least one grill in each park shall be wheelchair accessible, with a minimum 1 per every 5 installed at each park or 20% minimally of park seating.

The standard grill model is manufactured by Pilot Rock, Model Number N-24-B2, or City approved equal.

Grills shall be located based on prevailing winds, in relationship to pavilions or nearest picnic area. Grills shall be located to minimize impact of odors, noise, and fire in relation to adjacent uses.

Grills shall not be placed in RPAs.

Related Standards: Grill | Receptacle Ash/Coal.

Materials and Finish

Finish shall be black enamel.

Units shall not contain plastic, resin, wood or unfinished metal.

Metal products shall have smooth welds, joints, and rounded corners. Joint fasteners shall be embedded or sealed.

Units shall have a firebox dimension of 18 inches depth by 2 feet wide by 10 inches tall.

Features

Grill cover is optional from manufacture.

A rust resistive metal scoop shall be provided with each grill to dispose of ashes/coals.

Cooking grate shall be anti-theft.

Installation

Pedestal grills shall be permanently mounted on inground posts. Adjacent grade shall be covered by a surface layer of compacted stone dust 3 inches vertical depth over filter fabric and extending 3 feet-4 inches in each direction from the base of the pedestal.

ADA grills shall be mounted between 1 foot-7 inches and 2 feet from finished grade to the cooking surface. Standard grills may be mounted up to 4 feet from finished grade to the cooking surface.

Provide a solid surface of 3 feet-4 inches by 3 feet-4 inches minimum on all sides of the grill. Accessible grill units shall have a 5 foot minimum access at the front of the grill facing towards the accessible path.

Grills shall be located a minimum of 16 feet from any tree trunk and 60 feet from any playgrounds and dog areas.

Top of footing shall be sloped to shed water.

Life Cycle Expectations

A minimum warranty of 5 year is required.

Grills are anticipated to require replacement after 8 years of normal and ordinary use.



Grill

Image Footnotes

(1) https://www.pilotrock.com/charcoal-grills/n-24series-charcoal-grill/#prod-desc

GRILL



Accessible grill, plan view

Not to scale



GRILL | RECEPTACLE ASH/COAL

Purpose

Ash/coal receptacles shall be provided at each park grill for the safe and accessible disposal of ashes/coals.

General Information

Parks allowing the use of grills shall provide one ash/ coal receptacle per grill.

The standard receptacle size is 5 gallon. The top of the receptacle shall be 1 foot-6 inches minimum and 4 feet maximum vertical height.

Each receptacle shall include a lid.

Each lid and can shall be connected by a chain to prevent theft.

Each receptacle shall be clearly marked with red lettering indicating the specific use of the bin.

Related Standards: Grill.

Materials and Finish

The receptacle and lid shall be 25 gauge minimum galvanized steel, or other fire and heat retardant material.

Steel chains shall be $3\!\!\!/_{16}$ inch diameter welded, hot dipped galvanized.

The receptacle, lids and chains shall be factory applied silver/gray in color.

Material shall be of high tensile strength, suitable for heavy public use and exterior exposure.

Place 1"-2" of poured concrete in bottom of receptacle to prevent tipping over.

Features

Heat-resistant metal scoops shall be provided at each receptacle. Scoops shall be commercial grade and include a chain or other method of securing to the receptacle.

Installation

Ash/coal receptacles shall be secured to an inground mounted pole or grill post with a secure chain. Poles shall be 2½ inches outside diameter with a galvanized finish. Poles shall be 3 feet-6 inches, and include a cap and welded handle to accommodate locked chains for the receptacle.

Poles shall be mounted in a 1 foot-6 inches minimum diameter and 2 feet-6 inches minimum vertical depth concrete footer. Top of footing shall be sloped to shed water.

Bins shall be placed on a hardscape pad and accessible by a hard surface path with a 3 feet-4 inches minimum horizontal width on the side adjacent to the solid surface path.

Life Cycle Expectations

A 5 year minimum warranty is required.

Receptacles are anticipated to require replacement after 2 years of normal and ordinary use.



HAND RAILS | STAND ALONE

Purpose

Hand rails shall be placed in locations where ramps are required to accommodate 6 inches or more change in grade. Handrails may also be used in conjunction with walls totaling 1 foot-6 inches or more in vertical height.

General Information

Hand rails shall be installed consistent with state and local building code and federal ADA standards.

Guardrails and Handrails shall be continuous.

Materials and Finish

Handrails shall be constructed from rust resistance metals.

Metal finishing shall be of high-quality, permanent, powder coating, 4-6 mil minimum thickness, provided through a heat-finished process or polished surface for stainless steel. In historic districts, color shall be black.

Metal products shall have smooth welds, joints and properly treated corners with no sharp or rough edges. Joint fasteners shall be embedded or sealed.

Features

If site specific requirements cause changes to height, design configuration or finish color in conflict with these guidelines, the proposed design shall be submitted for compliance approval for accessibility by the Department of Recreation, Parks and Cultural Activities.

In heavy use areas, skateboard deterrents may be required, except when ADA compliance is mandated.

Installation

Secure rails through a permanent in-ground or surface method consistent with manufacturer's recommendations.

Provide hand rails on both sides of the path.

Handrails shall be 5 feet minimum horizontal length.

Engineer and anchor hand rails to withstand loads per USBC.

Life Cycle Expectations

A 5 year minimum warranty is required.

Hand rails are anticipated to require replacement after 20 years of normal and ordinary use.

HAND RAILS | STAND ALONE



Handrail at stair



Top Handrail Extension at Stairs



Handrail heights (1)



Handrail at stair



Bottom Handrail Extension at Stairs



Handrail extension at ramp (1)

Image Footnotes

(1) 2010 ADA Standards for Accessible Design, Department of Justice

HAND SANITIZING STATION

Purpose

Hand Sanitizing Stations shall be available in outdoor areas, playgrounds and in high traffic areas to keep hands clean.

General Information

Stations shall be placed in a visible location.

Stations shall be ADA compliant and bottom of housing shall be no more than 52 inches in vertical height from finished grade.

Stations shall be either wet towel, liquid, or foam type with built in reservoir.

Materials and Finish

Station post shall be constructed of heavy duty steel with powder coated finish.

Housing shall be 14 gauge steel with powder coated finish or Acrylonitrile butadiene styrene with UV inhibitors.

Station Colors shall be black or neutral in color.

Exposed fasteners, jagged edges, or sharp corners shall not be exposed.

Mounting hardware shall be stainless steel or galvanized.

Features

Stations shall have a lockable box.

Dispensing shall be push type or motion activated.

Installation

Stations shall be placed on a vertical surface or single post in ground.

Provide a solid surface of 3 feet- 4 inches by 3 feet-4 inches minimum accessible area directly in front of station.

Life Cycle Expectations

A 1 year minimum warranty is required.

Dispensers are anticipated to require replacement after 5-10 years of normal and ordinary use.
LIGHTING | AREA

Purpose

Lighting shall be used to illuminate portions of the park including parking lots, trails and designated areas.

General Information

Square, down light fixtures shall be installed in park locations subject to historic light guidelines or City of Alexandria small area plan approval may be modified.

Lighting in POS zoned properties requires a Special Use Permit.

Lighting levels to comply with the City of Alexandria lighting standards. Lights shields may be required by the City.

Light poles that exceed more than 15 feet in vertical height shall require approval from the City.

Materials and Finish

The lamp housing shall be die-cast aluminum with a black powder coat finish.

The lens frame shall be die-cast aluminum with a hinge assembly for maintenance. The lens shall be high impact, clear-tempered glass.

The metal pole and fixture shall be finished with a black powder coat finish.

Light fixtures shall be mounted on square aluminum poles with an extended pole mounting arm to offset the fixture.

Light poles shall be 15 feet in height from ground level and installed with an anchor base. The anchor bolts shall be recessed into an anchor base casting. Provide tamper resistant covers.

Foundations shall be designed by a professional engineer licensed in the Commonwealth of Virginia.

Features

Light fixtures that require separate ballast boxes are not permitted.

Lamps may include a wire guard.

Lamps shall be LED. Other lamp options may be installed with the approval of the Director of Recreation, Parks and Cultural Activities, and the Director of Transportation and Environmental Services.

Double fixtures shall be specified with approval from the City.



Square light fixture

LIGHTING | AREA



Installation

Light poles shall be located so as not to be in conflict with tree vegetation or plantings.

Lights shall be located a minimum of 3 feet clear from the edge of all shared-use paths or pedestrian walkways.

Top of Light pole foundations shall be flush to finished grade and sloped to shed water.

Connections installed beneath paving shall be sleeved with 2 inch diameter minimum PVC pipe.

Installation work shall be performed in conformity with USBC.

Luminaire shall not extend below fixture housing.

Provide grounding per local electrical codes.

As-built drawings shall be provided to the City following the completion of lighting projects. Drawings shall show field verified offset dimensions, pole locations, and underground electrical components.

Life Cycle Expectations

A 3 year minimum warranty is required on area light fixtures.

A 3 year minimum warranty is required on poles.

Lights are anticipated to require replacement after 20 years of normal and ordinary use.

LIGHTING | ATHLETIC FACILITIES

Purpose

Athletic field and court lighting systems shall be provided to ensure safe play environments where athletic field/court use is desired beyond normal daylight hours.

General Information

Athletic field and court lighting shall be provided as a complete sports lighting system.

The standard system is the Musco Light-Structure or City approved equal.

Lighting levels shall provide safe play for the programed sports. The average foot candle level on a rectangular playing surface shall be 50 fc and the uniformity shall be 2.0:1.0. The average foot candle level on a court playing surface shall be 30 fc and designated uniformity shall be 2.0:1.0.

Lighting in POS zoned properties requires a Special Use Permit.

A photometric analysis shall be required and approved by the Director of Recreation, Parks, and Cultural Activities.

Materials and Finish

Light poles and cross arms shall be galvanized steel, and shall meet wind loading requirements of the IBC Building Code and AASHTO Standard Specifications for Structural Supports for Highway Signs, Luminaires and Traffic Signals.

Bases shall be pre-stressed direct burial concrete. Foundations shall be designed by a professional engineer licensed in the Commonwealth of Virginia.

The mounting heights for athletic fields are 60-80 feet above the playing surface. Mounting heights for athletic courts are 20-40 feet above the playing surface.

Wiring shall be contained inside the cross arms and poles.

Light fixtures shall be 1500W or 1000W LED lamps with external visors to minimize light glare and spill.

Features

Light system shall include a remote monitoring system for performance tracking.

Lighting system shall include a remote lighting control system that allows operation via web site, phone, and email. System shall be programmable up to a year in advance and accept a seven day schedule.

Lighting system shall include an accessible on-off selector switch located on one of the poles.

Lighting shall include pegs on poles for maintenance access.

Ballasts shall be located on each individual pole.

System shall have a emergency shut off box.

Installation

Light pole installations require separate permits.

Coordinate player-activated switches and timers to minimize additional infrastructure.

Installation work shall be performed in conformity with USBC.

Poles shall include direct burial concrete bases.

Light pole installations shall require lighting strike grounding protection systems designed by a professional engineer.

Life Cycle Expectations

A 25 year warranty is required on athletic lighting systems.

Lighting systems are anticipated to require replacement after 40 years of normal and ordinary use.

LIGHTING | ATHLETIC FACILITIES



Typical athletic lighting

LIGHTING | FLAGPOLE

Purpose

Solar lighting shall be used to illuminate flags and flag poles during evening and park hours. Locations may require all night illumination.

General Information

Commercial grade square or round up light fixtures and solar panels shall be installed on flag poles. Fixtures shall be weather tight, vandal proof and have key access.

Related standard: Flagpole.

Materials and Finish

The lamp housing shall be die-cast aluminum with a black powder coat finish or stainless steel.

Lamps shall be LED.

Features

Fixtures shall have a dusk to dawn sensor with rechargeable battery pack.

Mounting hardware/shall be included.

Installation

Light fixtures shall be clamp mounted on poles with an extended pole mounting arm to offset the fixture from pole.

Light fixtures shall be mounted between 10 feet and 15 feet in height from ground level.

Life Cycle Expectations

A 1 year minimum warranty is required on solar pole light fixtures with a minimum lifespan of 40,000 hours.

Lights are anticipated to require replacement after 10 years of normal and ordinary use.

LIGHTING | GROUND RECESSED

Purpose

Ground recessed lights shall be used to illuminate significant park features or items of special interest such as art, pathways and signs.

General Information

Lighting installations require electrical permits.

Lighting in Public Opened Space zoned properties requires a Special Use Permit.

Materials and Finish

The lamp housing shall be composite material, resistant to ultraviolet degradation and corrosion or rust resistive metal.

Lamp housing and lens shall be weather tight and vapor proof.

The lens shall be ADA compliant, anti-slip material and able to withstand loads up to 200 PSI, with a commercial grade frame.

Lens frame material shall be bronze, aluminum or black finish.

Lamps shall be LED.

Features

Directional shields shall be provided where appropriate.

Installation

Lights shall be installed in locations with positive drainage away from lights.

Flush light fixtures shall be installed in hardscape surfaces.

Connections installed beneath paving shall be sleeved.

Installation work shall be performed consistent with USBC.

Fixture shall be ground faulted protected with city code requirements and applicable NEC requirements.

Install manufacturer's recommended drainage.

Life Cycle Expectations

A 1 year minimum warranty is required on ground recessed light fixtures.

Lamps are anticipated to require replacement after 2 years of normal and ordinary use.

Light fixtures are anticipated to require replacement after 7-10 years of normal and ordinary use.

LIGHTING | HISTORIC POLE

Purpose

The historic pole light shall be used as a street or park road light in the City's Historic Districts to illuminate portions of public land or right-of-way.

General Information

Gadsby light fixtures shall be installed in the Gadsby Light District within the Old and Historic District of Alexandria.

Lighting in Public Open Space zoned properties requires a Special Use Permit.

Materials and Finish

Lights shall be mounted on aluminum poles.

Poles and fixtures shall be finished with a black UV-resistant catalyzed urethane coating.

Light poles/fixtures/luminaires shall be 14 feet total height from finished grade and installed with an anchor base.

The ornamental base cover shall be designed to cover the anchor bolts with one or two pieces, be vandal resistant, and finished to match the post.

The pole top shall meet the requirements of the Department of Transportation and Environmental Services.

Fixture metal finishing shall be a high-quality, permanently affixed powder coating, done through a heat-finished process.

Lamps shall be LED.

Features

Light fixtures that require separate ballast boxes are not permitted.

Globes/post tops shall include full top reflectors.

Color temperature shall be between 3,000K and 4,000K.

Pole can include arms to hold flower baskets or banners as approved by the Director of Recreation, Parks, and Cultural Activities.

Installation

Light poles shall be located so as not to be in conflict with tree vegetation or plantings.

Lights shall be located a minimum of 3 feet clear from the edge of all shared-use paths or pedestrian walkways.

Top of light pole foundations shall be flush to finished grade. Top of footing shall be sloped to shed water.

Connections installed beneath paving shall be sleeved.Install ground fault protection at each pole.

Installation work shall be performed in conformity with USBC.

Lights shall be installed on a GFCI circuit.

Lights shall have photocell and time clock activation.

Life Cycle Expectations

A 3 year minimum warranty is required on historic light fixtures.

A 3 year minimum warranty is required on poles.

Lights are anticipated to require replacement after 20 years of normal and ordinary use.

02

LIGHTING | HISTORIC POLE



Gadsby historic pole light



Historic light fixture

Image Footnotes (1) http://www.hadco.com

LIGHTING | STREET POLE

Purpose

The street pole light shall be used to illuminate portions of the park system, including streets, park roads and trails.

General Information

Light fixtures shall be installed as a street or park road light in areas not guided by historic light fixture requirements or small area plan requirements.

Lighting in Public Open Space zoned properties requires a Special Use Permit.

The standard light fixture is Hadco, Inc., R53, or City approved equal.

Materials and Finish

The globe/post top shall be Type V, clear stabilized acrylic with a Victorian style roof.

The pole and fixture shall be finished with a black UV-resistant catalyzed urethane coating.

Lights shall be mounted on fiberglass, fluted and tapered decorative poles for post top lights.

Light poles/fixtures/luminaires shall be 14 feet total height from finished grade and installed with an anchor base.

The ornamental base cover shall be designed to cover the anchor bolts in one or two pieces, be vandal resistant and finished to match the post.

Lamps shall be LED.

Features

Light fixtures that require separate ballast boxes are not permitted.

Post tops shall include full top reflectors and may include a house side shield if warranted by the pole location.

Color temperature shall be between 3,000K and 4,000K.

Installation

Light poles shall be located so as not to be in conflict with tree vegetation or plantings.

Lights shall be located a minimum of 3 feet clear from the edge of all shared-use paths or pedestrian walkways.

Top of light pole foundations shall be flush to finished grade. Top of footing shall be sloped to shed water.

Connections installed beneath paving shall be sleeved. Install ground fault protection at each pole.

Installation work shall be performed in conformity with USBC.

Lights shall be installed on a GFCI circuit.

Lights shall have photocell and time clock activation.

Life Cycle Expectations

A 5 year minimum warranty is required on street pole light fixtures.

A 3 year minimum warranty is required on poles.

Lights are anticipated to require replacement after 20 years of normal and ordinary use.



Fiberglass fluted base

02

LIGHTING | STREET POLE





Street light fixture

Virginia Dominion Power - Fiberglass fluted street pole

Image Footnotes (1) http://www.hadco.com

MOVABLE FURNISHINGS

Purpose

Movable furnishings shall be located in parks where mobile furniture is desirable to create the most flexible arrangement possible.

General Information

Cafe table and chairs shall be grouped together in designated areas.

Adirondack style chairs shall be grouped together in designated areas.

Materials and Finish

Cafe tables and chairs shall be constructed of high density polyethylene or durable metal such as galvanized steel or other metals designed for commercial and exterior use. Metal finishing shall be a high-quality, permanently affixed powder coating, preferably done through a heat-finished process, or a high performance thermoplastic finish.

Cafe tables and chairs shall be green, blue, or gray.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed.

Adirondack chairs shall be heavy-duty high density polyethylene construction and shall be green in color.

Materials and parts shall contain recycled materials.

Features

Cafe tables shall be square in shape with straight corner legs, no flared legs.

Cafe chair shall be stackable and not foldable.

Cafe chairs shall have a mix of 50% chair with arms and 50% chair without arms per park.

Installation

Furnishings shall be located in seasonal shade where possible.

City of Alexandria Logos or branding per design guidelines shall be applied to Adirondack chairs to prevent theft.

Life Cycle Expectations

A 1 year minimum warranty is required.

Furnishings are anticipated to require replacement after 5 years of normal and ordinary use.



Adirondack Chair

PICNIC TABLE | OPTION 1

Purpose

Picnic tables shall be located in designated areas of parks.

General Information

One wheelchair accessible table is required for every five tables with a minimum of one per picnic area. Table top area shall be a minimum 36" wide.

The standard picnic table is the Victor Stanley, model A-365, or City approved equal.

The standard ADA compliant table is the Victor Stanley, model A-H-363, or City approved equal.

Materials and Finish

Tables shall be constructed of a sturdy, durable metal such as galvanized steel or other metals designed for commercial and exterior use.

Metal finishing shall be a high-quality, permanently affixed powder coating, preferably done through a heat-finished process, or a high performance thermoplastic finish.

Frames shall be dark green. Frames in Historic Districts shall be black.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed.

Materials and parts shall contain recycled materials.

Tabletop shall be perforated slot pattern with umbrella hole.

Seating material shall be 2x3 maple recycled plastic slats.

Features

Picnic tables are available in multiple configurations.

Installation

Tables shall be permanently surface mounted with anchor bolts or consistent with the manufacturer's recommended in-ground method.

Picnic tables shall be accessible by hard surface paths.

The hard surface pad shall have a minimum 1% and 3% maximum cross slope, and provide 3 feet-4 inches minimum clearance on all sides and 5 feet minimum clearance on the ADA accessible side.

Tables shall be located in seasonal shade where possible.

A trash/recycling can shall be located within 15 feet, but 5 feet minimum from the picnic table.

Life Cycle Expectations

A 10 year minimum warranty is required.

Picnic tables are anticipated to require replacement after 15 years of normal and ordinary use.

PICNIC TABLE | OPTION 1



Picnic table



Accessible picnic table

Image Footnotes

(1) http://www.victorstanley.com/

PICNIC TABLE | OPTION 2

Purpose

Picnic tables shall be located in designated areas of parks.

General Information

Tables shall be tip resistant.

Table design shall permit 'walk through' access.

The standard picnic tables is the Victor Stanley CM-565 or City approved equal.

Materials and Finish

Tables shall be constructed of galvanized steel or other durable metals designed for commercial and exterior use.

Metal finishing shall be a high-quality, permanently affixed powder coating done through a electrostatic process, or high performance thermoplastic finish.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed to avoid corrosion and personal injury.

Frame legs shall be 2% inch minimum outside diameter, 11 gauge tubular steel welded into a single piece. Cross members shall be 1% inch minimum outside diameter tubular steel.

Frames shall be dark green. Frames in Historic Districts shall be black.

Table tops and seats shall be extruded, UV resistant, recycled high-density polyethylene. Color shall be maple or wood tone.

Features

Picnic tables are available in multiple configurations.

Benches can be configured as an 8 feet long table with 6 feet long benches for compliance with ADA.

Installation

Tables shall be surface mounted permanently with anchor bolts, or consistent with the manufacturer's recommended in-ground method.

Picnic tables shall be accessible by hard surface paths.

The hard surface pad shall have a minimum 1% cross slope and provide a minimum of 3 feet-4 inches of clearance on all sides and a minimum of 5 feet on the ADA accessible side.

Tables shall be located in seasonal shade where possible.

A trash/recycling can shall be located within 15 feet, but 5 feet minimum from the picnic table.

Life Cycle Expectations

A 10 year minimum warranty is required.

Picnic tables are anticipated to require replacement after 15 years of normal and ordinary use.



Picnic tab**l**e

Image Footnotes

(1) http://www.victorstanley.com/ products/?mode=prodDetail&id=479&catId=2

PLAQUES | ADOPT-A-BENCH

Purpose

Community members and donors can adopt-a-bench through the Parknership Program. Personalized plaques are placed on adopted City benches.

General Information

The standard Adopt-a-Bench plaque size is 1.5"x 9" with 2 lines of text, and 2"x 9" with 3 lines of text. Plaque depth is $\frac{5}{6}$ ".

Lettering is raised copy, horizontal stroke, font style is Goudy Old Style.

Plaques shall have a single line border.

Related Standards: Bench | Natural Area, Bench | Park.

Materials and Finish

Plaques shall be cast bronze with leatherette finish.

Lettering and border shall be gold in color with a gloss black interior background.

Mounting hardware shall be black painted stainless steel.

Installation

For Park Benches, Adopt-A-Bench Plaques shall be installed center of backrest and 4" from top of the backrest. For Natural Area Benches, Adopt-A-Bench Plaques shall be installed center of backrest, top backrest slat.

Two pre-drilled mounting holes shall be located, ¾" from side edges, center of plaque.

Fasten plaque to bench with bolts and nuts.

Life Cycle Expectations

A 1 year minimum warranty is required.

Plaques are anticipated to require replacement after 20 years.



Adopt-A-Bench Plaque



Adopt-A-Bench Plaque Layout

RECEPTACLE | RECYCLING

Purpose

Recycling receptacles shall be located adjacent to activity centers, trail heads, exit points, and other high-traffic areas within and around parks/ open space.

General Information

Recycling is mandated by the City of Alexandria.

The standard recycling receptacle is the Victor Stanley Ironsites model SD-42 (36 gallon) unit with side-door in powder-coated blue steel (RAL5010), or City approved equal.

The top band of recycling bins and lid shall be marked with "Recycle" in white lettering.

Corresponding plastic interior liners shall be used in all receptacles.

Related Standards: Receptacle | Ash/Coal, Receptacle | Trash.

Materials and Finish

Receptacles shall be constructed of sturdy, durable metal such as galvanized steel, ductile cast iron or other metals designed for commercial and exterior use.

Metal finishing shall be of high-quality, permanently affixed powder coating, done through a heatfinished process.

Features

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be imbedded or sealed.

Hinges, latches and moving parts shall be weather resistant and oiled at the time of purchase.

Receptacles shall contain a minimum of 70% post consumer recycled steel.

Installation

Receptacles shall be affixed to hard surfaces consistent with manufacturer recommendations.

A hard surface of 3 feet-4 inches by 3 feet-4 inches minimum accessible area shall be provided adjacent to accessible paths.

Receptacles shall be no taller, or mounted higher, than 4 feet above adjacent grade at the tallest point of the unit.

Placement of the receptacles shall not inhibit the monitoring or emptying of the contents.

The manufacturer's recommendations shall be followed to ensure the receptacles are installed level.

Life Cycle Expectations

A 10 year minimum warranty is required.

Receptacles are anticipated to require replacement after 20 years of normal and ordinary use.



Recycling receptacle

RECEPTACLE | TRASH

Purpose

Trash receptacles shall be located adjacent to activity centers, trail heads, exit points, and other high-traffic areas within and around parks/open space.

General Information

Trash shall be contained in a durable metal, covered receptacle.

The City standard trash receptacles are Victor Stanley Ironsites model SD-42 (36 gallon) unit with side-door in powder-coated black steel (RAL9005), or City approved equal. The 'dome-top' style lid in black is required.

Corresponding plastic interior liners shall be used.

Recycling is mandated by the City of Alexandria. See "Recycling Receptacle" for appropriate container.

Related Standards: Receptacle | Ash/Coal, Receptacle | Recycling.

Materials and Finish

Receptacles shall be constructed of sturdy, durable metal such as galvanized steel, ductile cast iron or other metals designed for commercial and exterior use.

Metal finishing shall be of high-quality, permanently affixed powder coating, done through a heatfinished process.

Black is the required color for trash receptacles.

Metal products shall have smooth welds, joints and corners. Joint fasteners shall be embedded or sealed.

Hinges, latches and moving parts shall be weather resistant and oiled at the time of purchase.

Receptacles shall contain a minimum of 70% post consumer recycled steel.

Installation

Receptacles shall be affixed to hard surfaces consistent with manufacturer recommendations.

A hard surface of 3 feet-4 inches by 3 feet-4 inches minimum accessible area shall be provided adjacent to accessible paths.

Receptacles shall be no taller, or mounted higher, than 4 feet above adjacent grade at the tallest point of the unit.

Placement of the receptacles shall not inhibit the monitoring or emptying of the contents.

The manufacturer's recommendations shall be followed to ensure the receptacles are installed level.

Life Cycle Expectations

A 10 year minimum warranty is required.

Receptacles are anticipated to require replacement after 20 years of normal and ordinary use.



Trash receptacle

WHEEL STOP

Purpose

Pre-fabricated wheel stops shall be installed at vehicular parking areas located within park facilities. Wheel stops shall be used to define edges of parking spaces and to prevent vehicle encroachment.

General Information

Wheel stop size shall be 6 feet in length and 4 inches minimum vertical height.

One wheel stop shall be provided for each designated parking space. Wheel stop shall be located 3 feet minimum horizontal distance from the adjacent walkway/path.

Materials and Finish

Wheel stops shall be pre-fabricated concrete or gray in color, or City approved equal.

Wheel stops shall contain recycled materials.

Installation

Install wheel stops consistent with manufacturer's recommendations.

Wheel stops shall be installed on asphalt or other hard surface.

When installed in parking areas of compacted stone or other loose material, wheel stops shall be mounted on solid leveling pads at finish grade, with rebar spikes secured into subgrade.

Stops shall be secured with a minimum of 3 rebar spikes sunk into pavement and subgrade, consistent with manufacturer recommendations.

Installation of wheel stops shall not impede access of wheelchairs or other mobility devices through parking lots or to pathways.

Life Cycle Expectations

A 5 year minimum warranty is required.

Wheel stops are anticipated to require replacement after 20 years of normal and ordinary use.



Whee**I** stop