Section 11 6833 - OUTDOOR BATTING CAGE SYSTEM

PART 1 - GENERAL

1.1 SECTION INCLUDES

- A. GSS BC200 Series Outdoor Batting Cage System
- B. Batting cage system poles, netting, and accessories.
- C. Excavation for support pole foundations or concrete slab, concrete pile foundations for sleeved support poles or concrete slab for flange mounted support poles.

1.2 RELATED REQUIREMENTS

- A. Section 312000 Earthwork: Excavation, filling, and compacting around post foundations.
- B. Section 033000 Cast-in-Place Concrete: Concrete pile foundations or concrete slab and anchorage for posts.

1.3 REFERENCE STANDARDS

- A. ASTM A36/A36M Standard Specification for Carbon Structural Steel
- B. ASTM A53/A53M Standard Specification for Pipe, Steel, Black and Hot Dipped, Zinc-Coated, Welded and Seamless.

1.4 ADMINISTRATIVE REQUIREMENTS

- A. Large Components: Ensure the components can be moved into final position without damage to other construction.
- B. Concrete Foundations: Coordinate foundation design(per supplied loads), foundation characteristics, and locations.

1.5 SUBMITTALS

- A. See Section 013000 Administrative Requirements, for submittal procedures.
- B. Product Data: Provide manufacturer's data showing configuration, sizes, materials, finishes, hardware, and accessories; include:
 - 1. Foundation characteristics and locations.
 - 2. Manufacturer's installation instructions.
- C. Shop Drawings: For custom fabricated equipment indicate, in large scale detail, construction methods; method of attachment or installation; type and gage of metal, hardware, and fittings; plan front elevation; elevations and dimensions; minimum one cross section; utility requirements as to types, sizes, and locations.
- D. Erection Drawings: Detailed dimensional requirements for proper location of equipment.

- E. Samples: Submit samples of batting cage materials in manufacturer's available range of colors.
- F. Operating and maintenance data, for each operating equipment item.
- G. Warranty: Submit manufacturer warranty and ensure that forms have been completed in Owner's name and registered with manufacturer.

1.6 QUALITY ASSURANCE

- A. Manufacturer Qualifications: Company specializing in manufacturing products specified in this section, with not less than three years of documented experience.
- B. Installer Qualifications: Company specializing in performing work of the type specified with minimum two years of experience.

1.7 WORK BY OTHERS

- A. Support pole foundation or concrete slab design and sizing based on local soil conditions and supplied loading.
- B. Foundation or Slab Installation
 - i. Concrete foundations or slab installation per foundation design characteristics and supplied layout. Foundations to include supplied sleeves and/or anchor bolts per foundation details.

1.8 DELIVERY, STORAGE, AND HANDLING

- A. Deliver products to the project site in manufacturer's original packaging with factory original labels attached.
- B. Store products in a sheltered location and elevated above the ground; prevent warping, twisting, or sagging.
- C. Store products in accordance with manufacturer's instructions; protect from extremes of weather, temperature, moisture, and other damage.

1.7 WARRANTY

- A. Batting Cage netting and rope components shall be warranted free of defects in material and workmanship for a period of one (1) year.
- B. Batting Cage steel components shall be warranted for a period of five (5) years against all defects of material and workmanship..
- C. This warranty does not cover: Cost of removing or reinstalling defective parts; fading or discoloration to padding or vinyl-coated mesh parts caused by exposure to sunlight; vandalism, misuse or acts of God (such as but not limited to hurricanes, lightning strikes, tornados, hailstorms); product malfunction resulting from improper product installation/manipulation by customer, and; damage caused by metal cleats.

PART 2 - PRODUCTS

2.1 OUTDOOR BATTING CAGE SYSTEM

- A. Supply and install outdoor batting cage system as manufactured by *Grand Slam Safety*, *LLC*. or an approved equal to be complete in all respects with netting, support poles, and lifting hardware.
- B. Other suppliers or manufacturers wishing to bid products other than product specified herein shall submit to the Architect 7 days prior to the bidding a list of 3 past installations similar to the proposal, complete catalogue data along with deviations from the product specified. The manufacturer guarantees the proposed substitute product to comply with the product specified and as detailed on the drawings unless the deviations are so noted in the submittal for approval.

2.2 MATERIAL AND FABRICATION

- A. Support Poles: ASTM A53, steel pipe, welded construction, minimum yield strength of 25 ksi. The side support poles are set back 30" from the center of the pole to the side of the batting cage to minimize ball contact with the support poles. Double or triple batting cage arrays shall have center support poles set back 18" on both sides from the center of the pole to the side of the batting cages. The support pole shall be a two (2) piece system for ease of installation and removal with the top portion being 2-1/2" schedule 40 pipe steel pipe and the bottom portion being 3" sch 40, both powder coated black. The top portion shall have dring attachment points for securing the lift pulley and optional center and/or soft toss net pulleys. The bottom portion shall have a cleat and hook for securing the lift rope, a set screw to secure the top and bottom portions together, and a captive pin shackle to secure net rope border and bottom tension rope.
 - i. Support pole base options:
 - 1. Sleeved pole: 3" sch 40 is extended to direct embed into supplied sleeves.
 - 2. Flanged base: ASTM A36 steel 10" x 10" base plate with 8" x 8" bolt pattern for ½" anchors.
- B. Concrete: Type specified in Section 03 3000.
- C. Batting Cage Net
 - i. Size Options:
 - 1. Standard for baseball 70'L x 14'W x 12'H
 - 2. Standard for softball 55'L x 14'W x 12'H
 - 3. Custom sizes available contact manufacturer
 - ii. Materials Options
 - 1. #42, 1-3/4" Mesh, UV Stabilized, 372lbf break strength, High Tenacity Knotted Nylon netting
 - 2. #42 HDPE, 1-3/4" Mesh
 - 3. #36, 1-3/4" Mesh, UV Stabilized, 340lbf break strength, High Tenacity Knotted Nylon netting
 - 4. #36 HDPE, 1-3/4" Mesh
 - 5. Other options available contact manufacturer

- D. Lift Rope: 3/8" polyester/nylon (cover/core), UBS 4300 lbs, accessory cord with snaplink to connect to batting cage, one 1-1/2" rigid eye pulley with snaplink, and 2" open loop to secure to cleat.
- E. Optional Manual Retractable Center Divider: The center divider shall allow the batting cage to be divided into two (2) sections for maximizing space during drills that do not require the full length of the batting cage. The center divider shall be made of 14'W x 12'H net (same material as batting cage net) with sewn in rope border lashed to 3/8" accessory cord draw rope routed through 1-1/2" double and single pulleys and terminated between support poles. Customer shall specify to which side of the cage divider is to retract towards.
- F. Optional Soft Toss Net: The soft toss net shall be installed between any two center side support poles. The soft toss net shall be made of 14'W x 12'H net (same material as batting cage net) with sewn in rope border. The soft toss net shall be raised by 3/8" accessory cord draw ropes attached at the top corners, routed around 1-1/2" pulleys attached to the support poles and terminated to the support pole leg. The soft toss net shall also be secured to the poles by 36" length of 1/4" polyester bungee cords with snap links on both ends clipped to the rope border.
- G. Optional Batting Cage Backdrop: The backdrop material shall be either 18oz psy sold vinyl or double layered 8oz vinyl coated polyester mesh within manufacturers available range of colors. The backdrop shall have #4 9/16" diameter rolled rim grommets in each corner and every 12" along top for connection to batting cage net rope border. Backdrop size to be selected by the customer.
 - i. Optional Strike Zone: Strike zone to be made of 1" white perimeter and cross lines 17" wide by customer specified height to be selected on submittal drawings.

2.3 DESIGN CRITERIA

- A. Batting cage netting must be removable to allow storage during off season to maximize life of netting.
- B. The Sleeved Batting Cage option must be completely removable to allow space to be used for other sports.

2.4 FINISHES

- A. Support Poles: Powder coated black
- B. Netting per selection, color: black, contact manufacturer for options.
- C. Hardware: Hot-dip galvanized or Zinc coated

2.5 MANUFACTURERS:

A. Grand Slam Safety, LLC: www.grandslamsafety.com; Tel: 315-301-4039; Fax: 315-301-4031

PART 3 - EXECUTION

3.2 EXAMINATION AND MEASUREMENT

- A. When the job is sufficiently advanced to permit the installation of the batting cage system, visit the site and check the actual conditions where the fence is to be installed, to ascertain whether the preparation work by the preceding trades is acceptable.
- B. Check and record all dimensions that affect the manufacture and installation of the units. Incorporate these dimensions into the Shop Drawings.
- C. Delivery to the job site shall be co-coordinated by the Contractor. Proper storage of the batting cage before installation and continued protection during and after installation shall be the responsibility of the Contractor.

3.3 INSTALLATION

- A. Install the batting cage system in accordance with the manufacturer supplied installation manual.
- B. A *Grand Slam Safety, LLC*. factory trained installer shall carry out this installation.
- C. Contractor responsible for foundations will provide completed foundations free of debri.
- D. Do not install the batting cage system until the concrete foundations have cured for a minimum of 2 weeks.

3.3 OPERATION

- A. The batting cage netting shall be capable of being raised and lowered for seasonal use.
- B. The batting cage netting, lift ropes, support poles, and hardware should be checked periodically to maintain and prolong the life of the system.
- C. Use of the optional batting cage backdrop is highly recommended for batting cages that pitching machines will be used in to reduce wear on the batting cage net since pitching machines create a concentrated wear point.