GREEN STREET SPORTS COMPLEX FENCING
CITY OF MARION, SC - BID SHEET

The City of Marion Recreation Department is currently accepting sealed bids for new fencing at the Green Street Sports Complex. Bids must be received no later than **10:00 am on Thursday, February 08, 2024**, at Marion City Hall, 107 S Main St, P O Box 1190, Marion SC 29571.

For more information or to schedule a site visit, interested parties should contact Chasity Samuels at (843) 430-0875 or Ronnie Pridgen at (843) 423-5410.

The City of Marion has the right to accept or refuse any and all bids. The invitation to bid does not bind the City of Marion to purchase anything from the bidder. The contractor assumes responsibility for General Liability Insurance. The contractor must remove all debris. All work performed shall meet state and local codes.

Equal Opportunity Employer.

Scope of Work:

It is the contractor's responsibility to verify all quantities.

Please see the attached list of specifications for chain link fences and gates.

1. Install 1608ft of four-foot black chain link fencing to include:
   - (10) 2-1/2" x 6' SS20 end posts
   - (10) 2-1/2" x 6' SS20 corner posts
   - (2) 2-1/2" x 6' SS20 gate posts
   - (1) 4' x 4' walk gate
2. Install 485ft of six-foot black chain link fencing to include:
   - (1) 2-1/2" x 8' SS20 end post
   - (4) 2-1/2" x 8' SS20 corner posts
   - (2) 2-1/2" x 8' SS20 gate posts
   - (1) 4' x 4' walk gate
3. Install (1) 4' x 6' walk gate cut into line on Field 3.
4. Fencing includes posts, rails, tension wire, and accessories.
5. Gates include frame posts, accessories, and hardware.
6. Concrete foundation for all posts.
7. The contractor must remove all debris.

Total Bid Price: _____

Option:

8. Install 400ft of six-foot black chain link fencing to include:
   - (2) 2-1/2" x 8' SS20 end posts

Option Bid Price: _____

Contractor: _____

Signed: _____

Contractor Requirements:

1. Licensed by the State of South Carolina.
2. Proof of General Liability Insurance.

All bids must be sealed and delivered to Marion City Hall, Attn: Elizabeth Gray, Purchasing Director, 107 S Main St, PO Box 1190, Marion SC 29571, by **10:00 am on Thursday, February 08, 2024.**

Please mark "Green Street Sports Complex Fence" on the envelope.

CHAIN LINK FENCES AND GATES

PART 1 GENERAL

1.01 SECTION INCLUDES

A. Fence framework, fabric, and accessories

B. Excavation for post bases; concrete foundation for posts.

C. Manual gates and related hardware

1.02 RELATED REQUIREMENTS

A. Section 03300 - Cast-in-Place Concrete: Concrete anchorage for posts

B. Section 08710 - Door Hardware: Gate locking device.

C. Section 02590 - Site Grounding

1.03 PRICE AND PAYMENT PROCEDURES

A. Fencing: Measurement and payment by the linear foot, to the fence height specified, based on the specified post spacing. Includes posts, rails, tension wire, and, accessories.

B. Double Gates: Measurement and payment by each item. Includes frame posts, accessories, and hardware.

1.04 REFERENCE STANDARDS

A. ASTM A121 - Standard Specification for Metallic-Coated Carbon Steel Barbed Wire; 2013.

B. ASTM A123/A123M - Standard Specification for Zinc (Hot-Dip Galvanized) Coatings on Iron and Steel Products; 2012.

C. ASTM A153/A153M - Standard Specification for Zinc Coating (Hot-Dip) on Iron and Steel Hardware; 2009.

D. ASTM A392 - Standard Specification for Zinc-Coated Steel Chain-Link Fence Fabric; 2011a.

E. ASTM A428/A428M - Standard Test Method for Weight (Mass) of Coating on Aluminum-Coated Iron or Steel Articles; 2010.

F. ASTM A491 - Standard Specification for Aluminum-Coated Steel Chain-Link Fence Fabric; 2011.

G. ASTM A653/A653M - Standard Specification for Steel Sheet, Zinc-Coated (Galvanized) or Zinc-Iron Alloy-Coated (Galvannealed) by the Hot-Dip Process; 2011.

H. ASTM A1011/A1011M - Standard Specification for Steel, Sheet and Strip, Hot-Rolled, Carbon, Structural, High-Strength Low-Alloy, High-Strength Low-Alloy with Improved Formability, and Ultra-High Strength; 2012a

I. ASTM C94/C94M - Standard Specification for Ready-Mixed Concrete; 2013.

J. ASTM F569 - Standard Practice for Installation of Chain-Link Fence; 2011.

K. ASTM F569 – Cold rolled steel pipe for framework (SS40).

L. ASTM F1043 - Standard Specification for Strength and Protective Coatings on Steel Industrial Chain Link Fence Framework; 2011.

M. ASTM F1083 - Standard Specification for Pipe, Steel, Hot-Dipped Zinc-Coated (Galvanized) Welded, for Fence Structures; 2010.

N. CLFMI CLF 2445 - Product Manual; Chain Link Fence Manufacturers Institute; 1997.

1.05 SUBMITTALS

A. See Section 01300 - Administrative Requirements, for submittal procedures

B. Product Data: Provide data on fabric, posts, accessories, fittings and hardware.

C Shop Drawings: Indicate plan layout, spacing of components, post foundation dimensions, hardware anchorage, and schedule of components.

D Manufacturer's Installation Instructions: Indicate installation requirements, post foundation anchor bolt templates.

E Project Record Documents: Accurately record actual locations of property perimeter posts relative to property lines and easements.

1.06 QUALITY ASSURANCE

A Manufacturer Qualifications: Company specializing in manufacturing products specified in this section, with not less than three years of documented experience.

PART 2 PRODUCTS

2.01 MANUFACTURERS

A Chain Link Fences and Gates:
1 Master-Halco, Inc.; www.fenceonline.com.
2 Merchants Metals; www.merchantsmetals.com.
4 Substitutions: See Section 01600 - Product Requirements.

2.02 MATERIALS AND COMPONENTS

A Materials and Components: Conform to CLFMI Product Manual.

B Fabric Size: CLFMI Heavy Industrial service.

C Intermediate Posts: Type I round.

D Terminal, Corner, Rail, Brace, and Gate Posts: Type I round.

E Gates: Double gates, see plan for Pump Station detail.

2.03 MATERIALS

A Posts, Rails, and Frames: ASTM A1011/A1011M, Designation SS40; hot-rolled steel strip, cold formed to pipe configuration, longitudinally welded construction, minimum yield strength of 50 ksi; zinc coating conforming to ASTM F1043 Type B on pipe exterior and interior.

B Posts, Rails, and Frames: Formed from hot-dipped galvanized steel sheet, ASTM A653/A653M, HSLAS, Grade 50, with G90 (Z275) zinc coating.

C Wire Fabric: ASTM A392 zinc coated steel chain link fabric.

D Barbed Wire: Zinc-coated steel, complying with ASTM A121 Type Z Coating Class 1; 2 strands of 0.099 inch diameter wire, with 2-pointed barbs at 4 inches on center.

E Barbed Wire: Aluminum-coated steel, complying with ASTM A121; 2 strands of 0.099 inch diameter wire, with 4-pointed barbs at 3 inches on centers.

F Barbed Wire: PVC-coated steel, complying with ASTM F1665, 2 strands of 0.099 inch diameter wire, with 2-pointed barbs at 4 inches on center.

G Barbed Tape: Stainless steel, 0.025 inch thick x 1 inch wide, coil diameter of 24 inch, die stamped to produce 4 barbed points at 4 inch on center; cold clench over stainless steel core.

H Concrete: Type specified in Section 03300.

I Concrete: Ready-mixed, complying with ASTM C94/C94M; normal Portland cement; 3,000 psi strength at 28 days, 3 inch slump, nominal size aggregate.

2.04 COMPONENTS

A Line Posts: 1.9 inch diameter.

B Corner and Terminal Posts: 2.38 inch.

C Gate Posts: 3.5 inch diameter.

D Top and Brace Rail: 1.66 inch diameter, plain end, sleeve coupled.

E Gate Frame: 1.66 inch diameter for welded fabrication.

F. Fabric: 2 inch diamond mesh interwoven wire, 9 gage steel core wire with a fused and adhered vinyl coating for a total of 8 gage finish thickness , top selvage knuckle end closed, bottom selvage twisted tight to meet ASTM F668 class2B

G. Tension Wire: 6 gage thick steel, single strand.

H. Tension Band.

I. Tension Strap

J. Tie Wire: Aluminum alloy steel wire.

2.05 ACCESSORIES

A. Caps: Cast steel galvanized, sized to post diameter, set screw retainer.

B. Fittings: Sleeves, bands, clips, rail ends, tension bars, fasteners and fittings; steel.

C. Extension Arms: Cast steel galvanized, to accommodate 3 strands of barbed wire, single arm, vertical.

D. Hardware for Single Swinging Gates: 180 degree hinges, 2 for gates up to 60 inches high, 3 for taller gates; fork latch with gravity drop and padlock hasp, keeper to hold gate in fully open position.

E. Hardware for Double Swinging Gates: 180 degree hinges, 2 for gates up to 60 inches high, 3 for taller gates; drop bolt on inactive leaf engaging socket stop set in concrete, active leaf latched to inactive leaf preventing raising of drop bolt, padlock hasp; keepers to hold gate in fully open position.

2.06 FINISHES

A. Components (Other than Fabric): Galvanized in accordance with ASTM A123/A123M, at 1.7 oz/sq ft.

B. Components (Other than Fabric): Aluminum coated at 0.40 oz/sq ft, when measured in accordance with ASTM A428/A428M.

C. Components and Fabric: Polyester powder coated over coating of 1.2 oz/sq ft zinc coating.

D. Hardware: Zinc coating with polyester powder coating by ASTM F626

E. Accessories: Same finish as framing

F. Color(s): To be selected by Engineer from manufacturer's standard range

G. Color(s): Black.

PART 3 EXECUTION

3.01 INSTALLATION

A. Install framework, fabric, accessories and gates in accordance with ASTM F567.

B. Place fabric on outside of posts and rails.

C. Set intermediate posts plumb, in concrete footings with top of footing 2 inches above finish grade. Slope top of concrete for water runoff.

D. Line Post Footing Depth Below Finish Grade: ASTM F567.

E. Corner, Gate and Terminal Post Footing Depth Below Finish Grade: ASTM F567

F. Brace each gate and corner post to adjacent line post with horizontal center brace rail and diagonal truss rods. Install brace rail one bay from end and gate posts.

G. Provide top rail through line post tops and splice with 6 inch long rail sleeves.

H. Install center brace rail on corner gate leaves.

I. Do not stretch fabric until concrete foundation has cured 28 days.

J. Stretch fabric between terminal posts or at intervals of 100 feet maximum, whichever is less

K. Position bottom of fabric 2 inches above finished grade.

L. Fasten fabric to top rail, line posts, braces, and bottom tension wire with tie wire at maximum 15 inches on centers.

M. Attach fabric to end, corner, and gate posts with tension bars and tension bar clips.

N. Install bottom tension wire stretched taut between terminal posts.

O. Install support arms sloped inward and attach barbed wire; tension and secure.

P. Do not attach the hinged side of gate to building wall; provide gate posts.

Q. Install gate with fabric and barbed wire overhang to match fence. Install hardware.

R. Provide concrete center drop to footing depth and drop rod retainers at center of double gate openings.

S. Ground fence in accordance with Section 02590.

T. Install gate locking device specified in Section 08710 - Door Hardware.

3.02 TOLERANCES

A. Maximum Variation From Plumb: 1/4 inch.

B. Maximum Offset From True Position: 1 inch.

C. Components shall not infringe adjacent property lines.

3.03 MEASUREMENT AND PAYMENT

A. The payment will be made at the unit price "linear foot" as stated in the Bid Form for Chain link Fences and Gates.

END OF SECTION