



**SPECIFICATIONS FOR
FRAME TYPE BLEACHER – NON-ELEVATED**

PART I GENERAL

1.01 SYSTEM DESCRIPTION

- A. Design and fabrication of Frame Type Bleacher

1.02 QUALITY ASSURANCE

- A. Manufacturer Qualifications: Manufacturer must have ten years of experience in the manufacturer of bleachers and grandstands; welders must have AWS certified.
- B. Source Quality Control: Mill Test Certification.

1.03 BUILDING CODES

- A. Owner to confirm the national code and the version which applies to project for inclusion in specifications.

1.04 WARRANTY

1.05 WARRANTY

- 1.06 Bleachers International** warrants its Frame Type Bleacher to be free from defect in material and workmanship in the course of manufacturing for a period of one year beginning at day of Substantial Completion for Projects installed by **Bleachers International** beginning at Date of Initial Delivery of Product for Projects installed by others. This warranty excludes defects resulting from abnormal use, accidental or intentional damage, or any occurrences beyond **Bleachers International** control. Any exposed mill finish aluminum surface will become discolored due to oxidation which is a natural phenomenon. Bleacher manufacturer will not be responsible for discoloration of oxidized mill finish aluminum.
- 1.07 Bleachers International** beginning at Date of Initial Delivery of Product for Projects installed by others. This warranty excludes defects resulting from abnormal use, accidental or intentional damage, or any occurrences beyond **Bleachers International** control. Any exposed mill finish aluminum surface will become discolored due to oxidation which is a natural phenomenon. Bleacher manufacturer will not be responsible for discoloration of oxidized mill finish aluminum.

PART 2 - PRODUCTS

2.01 ACCEPTABLE MANUFACTURER

- A. Bleachers International, 33990 CR 27, Kiowa, Colorado 80117 U.S.A., (303) 646-1038 Fax: (303) 6246-0599
- B. Other manufacturer seeking to be approved must submit product literature on frame-type design to the Owner for review and receive approval from Owner via addendum ten days prior to bid date.

2.02 ANGLE FRAME BLEACHERS

- A. Product Descriptions
 - 1. Non-Elevated Bleachers:
 - a. Rise and Depth Dimensions: Vertical rise and horizontal depth per row: 8 inches x 24 inches. Seat is 17 inches above its respective tread.

- b. Framework: Prefabricate angle frames are space at 6-foot (max.) intervals and connected by crossbraces.
- c. Seats: Nominal 2 x 10 anodized aluminum plank with 2 x 10 anodized end caps.
- d. Treads: Two nominal 2 x 11 mill aluminum planks with 2 x 11 anodized end caps.
- e. Risers: nominal 1 x 6-1/2 anodized aluminum riser planks beginning at Row 2; two 1 x 6-1/2 aluminum riser plank on top row.
- f. Guardrails: Two lines of aluminum rail with chain link 42 inches above seat on both sides of bleacher and across back of bleacher.
- g. Aisle: aisle to be provided with 34" high handrail and intermediate rail at approximately 22" above tread. Handrails with rounded ends are discontinuous to allow access to sitting through a 24" wide space. Aluminum tread nosing of contrasting color on aisle steps.

- 2. Wheelchair Area (If required):
 - a. Wheelchair are to be 5'6" wide from two wheelchairs (33" each) and 36" for single.

B. Materials/Finishes

- 1. Framework:
 - a. Galvanized Steel: Structural fabrication with ASTM-A529 steel. Shop connections are seal welded. After fabrication, all steel is hot-dipped galvanized to ASTM-A123 specification.
 - b. Aluminum: Extruded aluminum angle alloy 6061-T6, mill finish.
- 2. Extruded Aluminum:
 - a. Seat Planks, Raiser Planks, Step Risers: Extruded aluminum alloy 6063-T6, clear anodized 204R1, AA-M10C22A31, Class II, and a wall thickness of .094".
 - b. Tread Planks: Extruded Aluminum alloy 6063-T6, mill finish and wall thickness of .094".
- 3. Accessories:
 - a. Channel End Caps: Aluminum alloy 6063-T6, clear anodized 204R1, AA-M10C22A31, Class II.
 - b. Hardware:
 - (1) Bolts, Nuts: Galvanized or plated.
 - (2) Hold Clip Assembly: Aluminum alloy 6061.T6
 - c. Guardrailing: Anodized aluminum rail 1-5/8" O.D. with galvanized chain link.
 - d. Crossbraces: Extruded aluminum angle alloy 6061-T6, mill finish.
 - e. Aisle Nose: Aluminum alloy, 6063-T6, black powder coat finish.

C Manufactured Units:

- 2 Line Chain link from Row 1 to Top
- (2) 2 x 11 Tread Planks on All Rows
- 1 x 6- 1/2 Riser Beginning @ Row 2, (2) 1 X 6 -1/2 Raiser on Top Row.
- Aisle (s) as Required

Wheelchair Seating Area(s) as Noted.

D. Fabrication:

1. Design Load:
 - a. Live Load: 100 psf gross horizontal projection
 - b. Lateral Sway Load: 24 plf seat plank
 - c. Perpendicular Sway Load: 10 plf seat plank.
 - d. Live load of Seat and Tread Plank: 120 plf
 - e. Guardrail: 100 plf vertical and 50 plf horizontal.
2. All connections made in shop to be shop welded.
 - a. Manufactured by certified welders conforming to AWS Standards.

PART 3 – EXECUTION

3.01 INSTALLATION

- A. Install bleacher unit in accordance with manufacturer's installation procedures.
- B. **IT IS HIGHLY RECOMMENDED** that the frame type bleacher unit be securely anchored to a flat, level concrete slab.

(all specifications are subject to change without notice to allow for product improvement.) (7/18/05)

