**LEVEL 4**

**Top Hinged**

**Steel NarrowLine Security Screen**

**Model: S-NR5-B**

**PART 1 GENERAL**

1.01 **Description**

The security screens shown on the plans and herein specified are the products of Kane Innovations, Erie, Pennsylvania. This manufacturer’s name and products have been used to establish the standards of construction and quality of workmanship required for this project. Manufacturers bidding on this project must be actively engaged in the fabrication of specified items for a minimum of five (5) years prior to the bid date. Manufacturers requesting approval to bid their products as equal must submit to the Architect full-size drawings, including details of construction, and a complete operating security screen sample, 10 days prior to the bid date.

1.02 **Submittals**

1. Manufacturer shall submit shop drawings, showing details of attachment to surround materials and elevations showing scope of the project.
2. Samples of materials may be requested without cost to owner; frame sections, infill sections, fasteners, corner section, etc.

1.03 **Warranty**

The operation of the security screen supplied by Kane Innovations on the designated project shall have a one (1) year warranty against any proven defective material or parts, as called for in the specifications and approved shop drawings. This warranty does not cover abuse by others.

**PART 2 PRODUCTS**

2.01 **Acceptable Manufacturers**

Kane Innovations, Erie, PA

🕿 (800) 773-2439

2.02 **Main Frame**

1. The main frame rails shall be not less than 16-gauge 1” x 1” seamless welded galvanized steel tubing with high strength die cast metal corners which are pneumatically inserted into the frame ends with an interference fit.
2. A removable concealment plate, extruded from 6063-T6 aluminum alloy, .062-inch thick, .177 lbs./ft., shall be attached to the main frame using square drive Tek screws.

2.03 **Finish**

1. The aluminum faceplates shall be thoroughly cleaned in a 5-step bonderizing process. An electrostatically applied thermoplastic, polyester powder coating (2.5 mil min. thickness) shall be applied and baked to a hard mar-resistant finish. Coating shall meet or exceed AAMA 2603.

 White

 Dark Bronze

 Gray

 Beige

 Black

 Custom colors are available at additional cost with submission of color sample.

1. The mainframe and Infill shall be thoroughly cleaned in a 5-step bonderizing process. An electrostatically applied ***black,*** thermoplastic, polyester powder coating (2.5 mil min. thickness) shall be applied and baked to a hard mar-resistant finish.

2.04 **Infill**

***Wire* *Cloth***

* + 12-mesh .028-inch diameter stainless steel
	+ 10-mesh .047-diameter stainless steel

# Perforated Panel

* + 16-gauge mill-galvannealed with 63% open area
	+ 14-gauge mill-galvannealed with 51% open area
	+ 18-gauge stainless steel with 63% open area

2.05 **Infill Attachment**

1. The wire cloth shall be hemmed 180 degrees and retained by hex-head Tek screws.
2. The Perforated steel panel shall lay flat against the main frame and retained by Hex-head Tek screws.
3. Hex-head Tek screws shall penetrate the infill and main frame approximately 4” on center.

2.06 **Emergency Egress Release**

Each screen shall have two stainless steel spring loaded slide/lock bolts for emergency egress from the inside.

2.07 **Hardware**

1. Each screen shall have an aluminum continuous piano hinge, 2 1/2-inch open, .060-inch thickness, 1/8” diameter stainless steel pin, factory attached to the main frame at the head with tamper resistant screws. An electrostatically applied thermoplastic, polyester powder coating (2.5 mil min. thickness) shall be applied and baked to a hard mar-resistant finish.
2. Each screen shall come fully assembled and tested from the factory.

**PART 3 EXECUTION**

3.01 **Inspection**

Verify that openings fit allowable tolerances, are plumb, level, provide a solid anchoring surface and comply with approved shop drawings.

3.02  **Installation**

1. Install in accordance with approved shop drawings and specifications.
2. Plumb and align faces in a single plane and erect screens square and true, adequately anchored to structure.
3. After completion of installation, screens shall be adjusted, in working order and cleaned.

**PART 4 ENVIROMENTAL REPORTING**

4.01 **Recycled Content: Aluminum, Steel and Stainless Steel Components**

 A. The recycled content of the steel materials can contribute to LEED Material and Credits 4.1 & 4.2.

 B. Regional Materials – Projects located within 500 miles of

 Manufacturing facility and material suppliers.