

PRODUCTS/ USE/ INSTALLATION/ COSTS

V. BIRD NET

➤ Bird Net 2000:

- Bird Net 2000 is the most efficient and effective method for total exclusion.
- It is manufactured from “super strong” knotted polyethylene twine.
- Flame-Resistant.
- Available in Black, Stone and White.

Note: Black Color Net should be used in direct sunlight situations.

➤ Species: All Birds. (See Bird Type)

➤ Bird Pressure: Light to Heavy.

➤ Bird Type:

- 2” Net: Pigeons and Larger Birds.
- 1-1/8” Net: Starlings, Pigeons.
- 3/4” Net: Sparrows and smaller birds.

➤ Application: For roofs and open areas such as warehouses, loading docks, airline hangars and other exposed enclosures.

➤ Positives:

- 100% Exclusion of Pest Birds.
- Long Term Bird Control.
- 10 Year Guarantee (black net, 3 yrs for stone & white).

➤ Negatives:

- Experience is required (Rarely a simple installation).
- Netting Structures is Labor Intensive.
- Since cost of netting structures is usually significant, there may be “sticker shock” to the customer.

➤ Common Mistakes:

- Taking on a netting job that you have not properly been trained to do!
 - Call for help!
 - Sub-Contract the Job.
- Under bidding the job!
 - Know your costs and mark-up accordingly!
 - Material
 - Lift Rental
 - Labor
 - Cleaning- prep

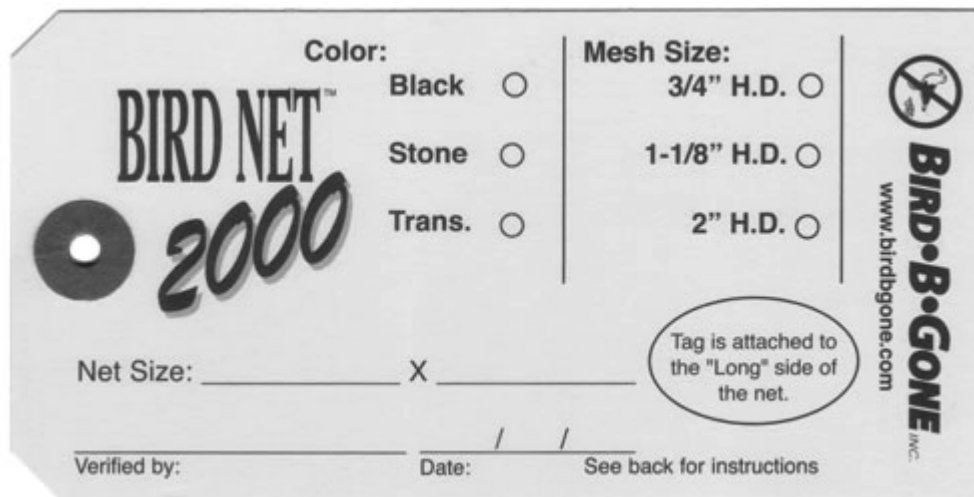
V. BIRD NET

Page 2

OPENING YOUR BIRD NET

➤ Identification:

- Most bird net comes in a bundle, which resembles a big pillow.
- Upon opening the bundle, you will notice an identification tag from Bird-B-Gone.



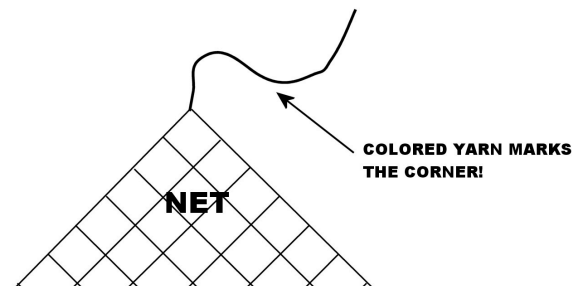
- This tag tells you:
 - Mesh Size
 - Color
 - Net Size.

➤ Identifying the Corner:

- It is important that upon opening up your net that you locate the most important **CORNER**.
- All corners are marked with a piece of colored yarn or string.

➤ Stretching the Net:

- The net will not appear to be “square”....**but it is!**
- Simply grab the corners (with help from a partner) and stretch the net into its original square/rectangular shape.
- If you have questions at this stage...Call 1-800-392-6915! – WE WILL HELP!



V. **BIRD NET**

Page 3

- Installation Time: It varies!

- Installation Overview:
 - It is important that you use the correct hardware for the surface into which you are securing your bird net.
 - Bird Net attached to a wood frame will take different hardware than Bird Net that is attaching to concrete or steel.
 - The most critical part to every netting job is securely attaching the tensioned cable to the affected structure.
 - Once the cable is secured, attach the netting to the cable frame with “hog rings”.

- Installation Instructions:
 - **Corner & Intermediate Attachments.**
 - **Corner attachments** are under the most pressure and must be the strongest part of the system...or the system will fail.
 - Corner attachments are used where the cable begins/ ends and where the cable turns corners.
 - Example: If you must net off a square or rectangular building, corner attachments would be placed/ secured in all four corners.
 - Examples of Corner Attachments Include:
 - Wood: Galvanized or Stainless Screw Eyes.
 - Concrete: Expanding Net Bolts.
 - Steel: Eye Bolts & Nut (This is the only item that needs to be drilled into the steel). Hilti Attachments.
 - **Intermediate attachments** also hold the cable to the structure.
 - Intermediate attachments must hold the cable TIGHT against the wall/ structure.
 - Properly spaced and secured, intermediate attachments will prevent the net from bowing and/ or giving the birds room to enter/ exit the area of coverage.
 - Installation of Intermediate attachments should be every 18 inches.
 - Otherwise, the birds may have the room to enter/ exit the area of coverage.

V. **BIRD NET**

Page 4

- Examples of intermediate attachments include:
 - Wood/ Concrete: Anchor Rivets & Split Pins, Net Spikes, Multi-Purpose Cable Brackets. These provide low visibility as well as strength.
 - Steel: Girder Clips & cable brackets with Hilti pins.
 - For Long Runs (Over 30'), it is advisable to use an M-6 Eye Bolt every 20' to 30' as an intermediate attachment for strength. You can also use these eye bolts to secure a support cable.
- **Straining Wire/ Cable**
- Once you have installed the corner and intermediate attachments, it is time to run your straining wire.
- Straining wire (or cable) is available in galvanized or stainless steel.
 - Stainless Steel cable (AND HARDWARE) is primarily used in areas that are near the ocean (i.e. salt air).
 - Most installations only require galvanized wire and hardware.
 - There are two (2) different sizes of cable/ wire:
 - 1/16" for most jobs.
 - 3/32" for bigger jobs which require long runs (in excess of 70')
- **Ferrules**
- Ferrules are used at the first corner attachment, and then later at the turnbuckle.
- Run **two (2)** aluminum or copper ferrules through the end of the cable.
 - Use aluminum ferrules for galvanized wire and copper ferrules for stainless steel.
 - Loop the cable through the first corner attachment and back through the ferrules.
 - Secure/ crimp the ferrules to lock cable into place with a ratchet crimper.
 - Use crimp tool to fully crush the ferrules around the cable.
 - This will create a strong loop.

- Run cable through all intermediate attachments and finally through the turnbuckle at the end of the cable run.
 - Secure/ crimp the ferrules to lock cable into place after looping through the turnbuckle.

V. **BIRD NET**

Page 5

○ **Turnbuckles**

- Turnbuckles are used to tighten your straining wire.
 - Use one turnbuckle for each “length” of cable.
 - For Example: If you are netting a square, there are 4 sides (or lengths) of cable. Use one (1) turnbuckle for each side (or a total of 4 turnbuckles for this example).

Turnbuckles are available in galvanized or stainless steel (in M6-Medium or M8-Large).

- Turnbuckles must be well anchored since they are exerting a great deal of tension on the cable/ straining wire.
- Medium turnbuckles (M6) are designed for cable runs up to 75 feet.
- Large turnbuckles are designed for cable runs 75 feet and above.
- **Make sure that turnbuckles are “fully open” prior to installing.**

○ **Hog Ringing the Net to the Cable**

The netting is secured with “hog rings” to the cable frame using a HOG RING TOOL. This tool loops a small metal ring (the hog ring) around the netting and cable. Each Hog Ring Manual Tool holds 50 Hog Rings. Hog Rings are packaged 2,500/ Box. The tool is easy to use and usage instructions are enclosed with every tool. We also have pneumatic hog ring tools available to speed up installation.

- For 2” and 1-1/8” Net: A hog ring should be attached for every square of netting to secure the net to the cable.
 - Failing to hog ring every square could allow enough room for birds to enter/ exit the area of coverage.
- For 3/4” Net: A hog ring can be used every other square to secure the net to the cable.

○ **Start Attaching the Bird Net in One Corner.**

- Starting several rows of mesh in, attach the netting to the cable with hog rings, starting in one corner and proceeding along a straight line (stay on the same mesh row!).
- Proceed about four (4) feet and stop.
- Then going back to the same corner, start attaching the net along the perpendicular side (the other direction) for four feet.

- Complete hog-ringing the “long side” of the net all the way to the next corner.
- Complete hog-ringing the short side of the net all the way to the next corner.
- At this point, one long side and one short side of the net should be hog ringed to the cable.
 - Proceed by hog-ringing the opposite “long side” to the cable.
 - Remember to stretch it tight and to **stay on the same mesh row** while hog-ringing.
 - If you do not stay on the same row, the net will appear “wavy” and crooked when installed.

V. **BIRD NET**

Page 6

- **Start Attaching the Bird Net (continued).**
 - Complete the job by attaching the final short side to the cable.
 - Trim off excess netting with scissors, leaving an extra 2” overlap of netting (this prevents persistent birds from trying to enter behind the cable).
 - Inspect all attachments as to strength.
 - Look for mistakes...and correct as necessary.
- **Zippers**

Once the net has been installed, there may be a need to access lighting, plumbing fixtures, safety equipment, etc. Installing a zipper offers easy “open & close” access for these purposes. Zippers come in three standard lengths – 1 ft.; 3 ft. & 6 ft. Longer zippers (custom sizes) are available upon request.

 - Choose the area for access (directly below lights, etc.).
 - Keep the zipper closed!
 - Hog ring the cloth part of the zipper through the material and around the strand of net.
 - Use one hog ring every square of net on both sides.
 - Assure that the zipper is in place and secure.
 - Open (un-zip) the zipper and cut the middle strands of net.
 - This creates a “hole”.
 - Now you have access!
 - Simply zip-up to close the area.
- **Support Cables:**

A support cable is simply additional sections of cable placed at various intervals to help strengthen the overall net structure.

 - They should support horizontal nets over 40’ in length.
 - *For example:* A support cable would be attached at 20’.
 - **CALL US** if you need advice on support cables: **1-800-392-6915.**

