Bird Exclusion Netting





Haverford stocks Australia's largest range of anti bird netting options. Our "Quatra" brand bird netting is of the highest quality and is a high strength, light weight option for protecting your assets.

When you are buying from us, you are dealing direct with the importer, this ensures you enjoy large savings, as well as being sure of experienced bird net consultants. Together we have over 100 years combined experience installing and selling bird nets.

As the chosen wholesale supplier to over 30 Bird Netting Installers and resellers across Australia, Haverford can also recommend you the most appropriate installers in your location.

Our large premises ensures large scale orders required urgently can be filled immediately, without the need to wait for overseas supply. Haverford can also import to suit custom Bird Netting for your specifications, ensuring accuracy and low bulk prices.



White Diamond Mesh Bird Netting

Specs:

- Manufacture: Knotless Polyethylene
- Mesh Size: 16mm x 16mm
- GSM (Grams per Sq Metre): 31
- UV Treated

Bundle Sizes: 10m x 10m, 100m x 5m, 100m x 10m, 50m x 20m, 25m x 25m

Applications:

- Orchards (commercial and residential)
- Vineyards
- Vegetable Gardens
- Backyard Fruit trees
- *Not suitable for VICTORIAN household use

General comments:

One of our most popular options based on affordability and effectiveness. It is used in all rural scenarios from large vineyards through to residential backyards. The fact that most birds can clearly see the white colour (from a distance), ensures that is just as much a visual deterrent as a physical barrier. We stock a large range of sizes in this material, and can also import to your custom requirements. (subject to minimum qty's)



Black Diamond Mesh Bird Netting

Specs:

- Manufacture: Knotless Polyethylene
- Mesh Size: 16mm x 16mm
- GSM (Grams per Sq Metre): 31
- UV Treated

Bundle Sizes: 5m x 5m, 10m x 10m, 100m x 5m, 100m x 10m, 50m x 20m, 25m x 25m

Applications:

- Orchards (commercial and residential)
- Vineyards
- Vegetable Gardens
- Backyard Fruit trees
- *Not suitable for VICTORIAN household use

General comments:

Another popular rural option based on affordability and effectiveness. Users often select this material when they are looking to maintain the visual aesthetics of their property (as black is harder to see from a distance). It is also used in large vineyards/orchards through to backyard residential vegetable gardens. We stock a large range of sizes in this material, and can also import to your custom requirements. (subject to minimum qty's)



X-Weave 70gsm Bird / Hail Net

Specs:

- Colour: Black or White
- Manufacture: 380D High Density Polyethylene Knotless
- Mesh Size: 17mm x 17mm (+ additional interior Cross Weaves)
- GSM (Grams per Sq Metre): 70
- UV Treated

Applications:

- Small Mesh Anti Bird Netting
- Heavy Duty Bird netting for Vineyards / Orchards
- Added Hail Protection due to the X-Weave pattern
- *Not suitable for VICTORIAN household use

General comments:

A versatile and strong bird netting option, the X-Weave offers bird exclusion with many additional benefits. At 70 GSM, it is double the strength of your average hardware variety. The small x-weave pattern gives added protection against hail and smaller pests, whilst still allowing bees a passage of entry. It offers these advantages whilst still maintaining a low wind and shade rating.



Crossweave Netting: White 70gsm

Specs:

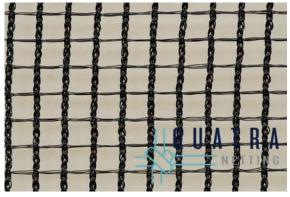
- Manufacture: Polyethylene
- Mesh Size: 10mm Primary Lines with Additional Cross Weaves (approx size 2-3mm)
- GSM (Grams per Sq Metre): 70
- Other: 25% shade, UV treated & 40mm reinforced edging

Applications:

- Hail Netting
- Small Mesh Bird Netting
- Socially responsible wildlife choice of netting.

General comments:

A wildlife friendly option, this netting offers excellent protection against smaller pests AND hail damage. At 70GSM, it is a strong material, however keep in mind this construction will provide 25% shade coverage and an increased wind rating. It is most commonly used where hail and small pests are the primary concern, however keep in mind it results in a difficult passage for bees.



Crossweave Netting: 105gsm

Specs:

- Manufacture: Polvethylene
- Mesh Size: 5mm x 5mm
- GSM (Grams per Sq Metre): 105
- UV treated
- · Black or Blue

Technical Data:

PROPERTIES | TEST RESULT (Warp/Weft)

- •TENSILE STRENGTH 615.7N/841.4N (ASTM D 5034-2009)
- ELONGATION 126.1%/139.6% (ASTM D 5034-2009)
- BURSTING STRENGTH 585.6N (ASTM D 3787-2015)
- TEARING STRENGTH 338.2N/124.5N(ASTM D 4533-2015)

Applications:

- Small Mesh Anti Bird Netting
- Hail Protection netting

Available with or without Fire Rating

General comments:

At 105GSM, it is one of the stronger materials available in a cross-weave pattern. It is most commonly used where hail and small pests are the primary concern. Available in Black OR Blue, it is a specialised netting tailored to very specific requirements. The crossweave pattern (as opposed to diamond), makes it very simple to work with.



Premium Diamond Mesh: Black

Specs:

- Manufacture: 800/4 Knotless Polyethylene
- Other: UV Treated / Reinforced Edging along the length of the net

Mesh Sizes: 5mm, 10mm, 20mm GSM:

- 20mm 72 Grams Per Square Metre
- 10mm 140 Grams Per Square Metre
- 5mm 280 Grams Per Square Metre

Applications:

- Premium Bird Netting
- Commercial Bird Netting
- *Not suitable for VICTORIAN household use

General comments:

A common orchard netting choice, the premium diamond mesh offers strength primarily (with high GSM's across the range of mesh sizes). We stock a 5mm, 10mm and 20mm range all with high strength and UV properties. It is best suited to users who are comfortable working with diamond mesh, and require high GSM strength. Keep in mind that the 10mm and 5mm will create some shade and wind loading.



6Ply Heavy Duty Knotted Polyethylene

Specs:

- Manufacture: 500denier / 6ply High Density Polyethylene
- Mesh Size: 19mm x 19mm
- Twine Thickness: 1.0mm
- GSM: 54 Grams Per Square Metre
- UV Treated
- Twine Breaking Strength: 15.3 KGF
- Knot Breaking Strength: 20.0 KGF

Applications:

- Warehouse / Factory Bird Control
- Commercial Bird Netting Application
- Building rooftop stone access prevention for birds
- Domestic Sheds and Verandah bird control netting
- Commercial Installation for Orchard Bird Protection
- General Purpose

General comments:

At 19mm square, this is a very popular option due to the hard wearing properties of the twisted/knotted design. The fact that it is square mesh design (ensuring simple installation), makes it the first choice for commercial buildings, as well as making it perfect for permanent COMMERCIAL structures over orchards and vegetable gardens. This net is a great choice when you have aggressive birds, are looking for a simple installation that looks great, and want something that will last the test of time.



Specs:

Fire Retardant Specifications:

- Colour: Black with Red Fleck
- Test Method: ISO 1805
- FR treatment: UL-94, V2 rating

General Specifications:

- · Colour: Black with Red Fleck
- Manufacture: 500denier / 6ply High Density Polyethylene
- Mesh Size: 19mm x 19mm
- Twine Thickness: 1.0mm
- GSM: 54 Grams Per Square Metre
- UV Treated

Applications:

- Warehouse / Factory Bird Control where FR netting is specified
- Commercial Bird Netting Application
- Building rooftop stone access prevention for birds
- Domestic Sheds and Verandah bird control netting
- Commercial Installation for Orchard Bird Protection
- Ideal for Sparrow sized birds & larger

General comments:

As mentioned above, the 6ply Heavy Duty Knotted is the first choice for Commercial Bird Netting installations in warehouses, awnings etc. With new regulations being implemented regarding fire safety, we now also carry this range of 19mm netting with an added flame retardant. It is easily identified by the red coloured fleck throughout.





9Ply Heavy Duty Knotted Polyethylene

Specs:

- Manufacture: 500denier / 9ply High Density Polyethylene
- Mesh Size: 19mm x 19mm
 Twine Thickness: 1.25m
- GSM: 84 Grams Per Square Metre
- UV Treated
- Twine Breaking Strength: 21.6 KGF
- Knot Breaking Strength: 25.0 KGF

Applications:

- Warehouse / Factory Bird Control
- · Commercial Bird Netting Application
- Building rooftop stone access prevention for birds
- Domestic Sheds and Verandah bird control netting
- Commercial Installation for Orchard Bird Protection
- General Purpose

General comments:

At 19mm square, this is a heaver duty version of the above 6ply. Boasting 9 strands, it is commonly used in scenarios where there are aggressive birds or "other" animals accessing the netting. The fact that it is square mesh design makes it perfect for permanent COMMERCIAL structures over orchards and vegetable gardens. This net is a great choice when you have aggressive birds, are looking for a simple installation that looks great, and want something that will last the test of time. It is also the most common netting used for Cat containment and exclusion.



Stainless Steel Reinforced Netting

Specs:

- Manufacture: 500denier / 9ply High
 Density Polyethylene + 0.16mm Stainless
 Steel Wire Intertwined through mesh
- Mesh Size: 19mm x 19mm
- Twine Thickness: 1.3mm
- GSM: 115 Grams Per Square Metre
- UV Treated

Applications:

- High volume Warehouse / Factory Bird & Possum Control
- Heavy Commercial Bird Netting Application
- Building rooftop stone access prevention for birds
- Domestic Sheds and Verandah bird and possum control netting
- Commercial Installation for Orchard Bird / Possum Protection
- Aviary Netting

General comments:

A revolutionary advance in netting technology, our Stainless Steel Reinforced netting is an advanced blend of netting and stainless steel. Whilst still maintaining the many advantages of working with a netting product, the added S/Steel ensures added strength and durability. Perfectly at home in a rural or industrial setting, it is an extremely durable product where you want the best protection for your assets. Often specified into projects where Possums and "other" animals can be of concern.



Stainless Steel Wire-Core Braided Netting

Specs:

- Manufacture: 1.8mm HDPE Braided + with 0.16mm Stainless Steel Wire core
- Mesh Size: 19mm x 19mm
- Twine Thickness: 1.8mm
- GSM: 360 Grams Per Square Metre
- Twine Breaking Strength: 60 KGF
- Knot Breaking Strength: 80 KGF
- UV Treated

Applications:

- High volume Warehouse / Factory animal control (eq: cat & Possum)
- Heavy Duty industrial Applications
- Animal Enclosures
- Aviary Netting

General comments:

A similar concept to the above netting, however it has 2 specific advantages. The Stainless Steel Wire is "enclosed" by the Polyethylene netting, as well as the fact that the braided pattern provides greater strength than traditional twisted nets. A very strong netting product, most commonly used as an enclosure net to keep animals "in", as opposed to a bird exclusion product. It is easy to work with and won't require any specialist tools, offering strength whilst maintaining an attractive & soft aesthetic.



Large Mesh: 40mm Square Netting

Specs:

- Manufacture: 400denier / 12ply High Density Polyethylene
- Mesh Size: 40mm x 40mm
- Twine Thickness: 1.3mm
- GSM: 38 Grams Per Square Metre
- UV Treated
- Square Mesh Design

Applications:

- Pond and dam covering net
- Pond and Pool Cover netting
- Duck exclusion net
- Boat Cover Netting
- Warehouse / Factory Bird Control
- Commercial Bird Netting Application
- Domestic Sheds and Verandah bird control
- General Purpose

General comments:

Our "larger" mesh netting is used when targeting larger bird species (such as pigeons and seagulls). The primary reason for using a larger mesh is to reduce the visibility of the netting, whilst having the added advantage of reducing the overall weight. It is most commonly used as a bird exclusion net in warehouses, on boats or as a Predator Bird barrier over dams/ponds.



Large Mesh: 50mm Square Netting

Specs:

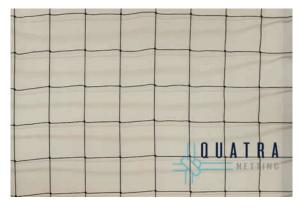
- Manufacture: 500Denier / 6ply High
- Density Polyethylene
 Twine Thickness: 1.0mm
- GSM: 17
- Mesh Size: 50mm x 50mm
- UV Treated

Applications:

- Pond and dam covering net
- Pond and Pool Cover netting
- Duck exclusion net
- Boat Cover Netting
- Warehouse / Factory Bird Control
- Commercial Bird Netting Application
- Domestic Sheds and Verandah bird control
- General Purpose

General comments:

A similar concept to the above netting, this 50mm/ 6ply netting most commonly finds its home in commercial buildings/ware-house excluding pigeons and seagulls. It also has the advantage of being discreet and light weight, so can similarly be used over ponds OR pools to exclude ducks.



Large Mesh: 60mm & 75mm Square Netting

Specs:

- Manufacture: 400Denier / 12ply High Density Polyethylene
- Twine Thickness: 1.3mm
- GSM: 24
- Mesh Size: 60mm x 60mm
- UV Treated

Applications:

- Pond and dam covering net
- · Pond and Pool Cover netting
- Duck exclusion net
- Boat Cover Netting
- Warehouse / Factory Bird Control
- Commercial Bird Netting Application
- Domestic Sheds and Verandah bird control
- General Purpose

General comments:

Our 60mm and 75mm varieties have been specifically developed as a pond/pool covering. They offer strength, are low-weight, are discreet, and don't allow the birds/ducks a footing to stand on (as opposed to making themselves comfortable on a small mesh bird netting). Good UV properties ensure it can be left outdoors permanently. This is the best choice for excluding predator birds from your dam, keeping ducks out of your pool, or keeping larger birds off your boat.

As detailed above, there is a large range of Bird Netting options available. Not all will work in all situations, so it is critical to find the netting type that will suit your specific application. Although the GSM (Grams per Square metre) can give an indication to the strength, it should not be the only decisive factor on if a particular net is correct for your space. It is important to consider the following factors among others:

- Durability (UV and Bird considerations)
- Ease of installation
- Mesh (hole size) to suit your targeted species
- Wind and Shade considerations of the material
- Available bundle sizes (to minimise joins)
- Price
- Wildlife safety considerations
- Hail / small pests
- Aesthetics of the installed netting

If you are still unsure which netting is best for your application, please do not hesitate to visit the website: www.haverford.com.au or call our staff on (02) 97715288.

BIRD NETTING INSTALLATION INSTRUCTIONS

The following pages consist of 2 different installation instructions:

1) Installation Instructions for SQUARE Mesh Bird Netting

- 6Ply Heavy Duty Knotted Polyethylene
- 6ply Heavy Duty w/ Fire Retardant
- 9Ply Heavy Duty Knotted Polyethylene
- Stainless Steel Reinforced Netting
- Stainless Steel Wire-Core Braided Netting
- Large Mesh: 40mm Square Netting
- Large Mesh: 50mm Square Netting
- Large Mesh: 60mm & 75mm Sq Netting
- Crossweave Netting: White 70gsm
- Crossweave Netting: 105gsm

2) Installation Instructions for DIAMOND Mesh Bird Netting

- White diamond Mesh Bird Netting
- Black Diamond Mesh Bird Netting
- X-Weave 70GSM Bird / Hail Net

Installing the Perimeter and Support Cable System

The most common method of attachment is utilising perimeter wires, which act as an attachment point for your netting. This preparation in terms of wire guides, anchor points and tension is the cornerstone of a professional and effective finished project.

Step 1:

To hold the wire in position (close to your perimeter surfaces), the first step is to install a series of Cable Eyelet Brackets. These eyelets hold the wire close to the surfaces, and allow the wire to travel around corners and confirm to custom shapes.

- Our Multi Surface Eyelet Cable Brackets are our most popular option. They can be supplied in Bulk commercial quantities (without a screw), so the installer can use their screw of choice.
- Eyelet Cable brackets should be placed at minimum spacing of 500mm apart. Spacing greater than this amount will result in Net-Bowing between each bracket when the net is pulled tight (across to the opposing side)

Step 2:

The next step is to feed the wire through the brackets to create the perimeter and intermediate support.

- 1.8mm or 3mm Varieties available
- Maximum length of any individual run of wire approx. 20m

In the instance where there is no over-head attachment points, intermediate support cables should also be installed.

- Maximum lengths of bird netting with wire support should not exceed approximately 15metres.
- The wire rope is required to be tensioned to be effective.
- 5mm Turnbuckles for 1.8mm Wire / 6mm Turnbuckles for 3mm Wire

For terminating the wire at each end of an individual run, the wire is crimped into position. They are a quick, economical, neat and effective option that can be secured using our Crimping Pliers. The wire passes though the crimp, travels around the adjacent Eyelet and then returns back into the crimp for termination.

- 2mm Crimps for 1.8mm Wire / 3.3mm Crimps for 3mm Wire
- Available in Copper or Aluminium











Installing the Netting

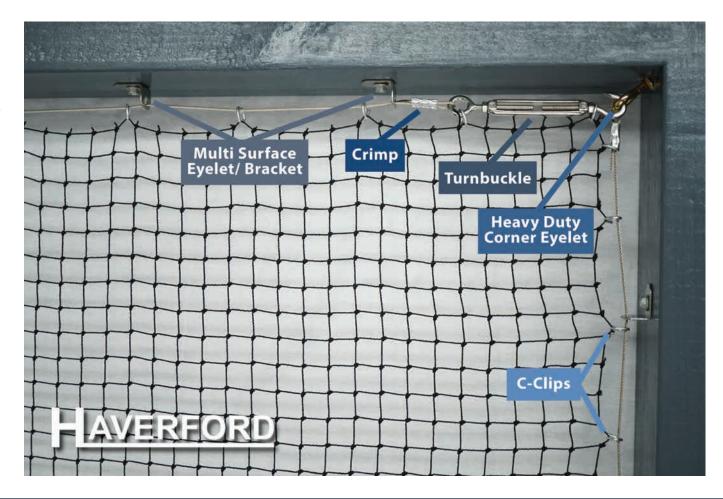
Once you have a taught and secure wire framework in position, you can commence the process of attaching your netting. Your main objective in terms of installing your netting should always be:

- Install the netting as taught as practical, with sag and creases kept to a minimum where possible.
- No Gaps: Birds will give your netting installation a thorough inspection and look for any point of access at joins and around the perimeter... so beat them to the point and ensure all spaces are enclosed securely.

Joins:

A major advantage of our Quatra Bird Netting range, is the large number of bundle size options. With bundles up to 100m x 20m, we recommend opting for bundles that will require the least amount of joins. Joins are time consuming, create a visible line, and create a potential weak point in your installation. When unavoidable however, you have a few options to create a secure join:

- Option 1: Overlap the two nets that you wish to join by approximately 30cm. You can then use C-Clips / Hog Ring Staple to attach the two nets together securely.
- Option 2: Overlap the two nets that you wish to join by approximately 30cm, and then weave a rope/cord alternatively in and out of the two nets to create a rope join. A C-Clip>Hog Ring staple can be placed around the rope intermittently to stop the rope slipping in either direction. This process is more time consuming, however it does provide a very secure and neat finish with very minimal bowing effect.



Attachment:

The recommended attachment method is to use our C-Clips / Hog Ring method. There are 2 levels of installation device that can be used (based on your experience, budget and install frequency for professionals).

- Manual load and operated C-Clip System
 - o Suitable for smaller and 1 off jobs
- Cartridge Loaded C-Clip System
 - o Load a large quantity into the chamber and then install your rings at a much faster rate. This tool has a higher initial outlay in terms of cost, however results in significant time savings for medium, large and ongoing work using this method

Our standard ring supply is in Galvanised Steel. If you have a requirement for Stainless Steel please contact our staff.

Based on a need for efficiency, in commercial applications the netting is simply attached directly to the perimeter and support wires. In smaller, more critical or more precise installs, the netting can be edged using 5mm Black Rope prior to attachment. This process involves weaving a rope through the perimeter of the netting (creating a rope seam), which in turn provides a more substantial point of attachment. The clip is then placed over the rope and netting together, and joined to the cable.





Securing and Cutting around Obstructions

Often in the real world, obstructions including pipes and bulkheads will dictate the need for odd shape installations. No two installs are the same, so when negotiating an obstacle you may choose to use it to your advantage (as an attachment point itself using cord or cable ties). More commonly however, this is when the flexibility of the "Wire-Rope" cabling system is pronounced, as the wire can navigate around the obstacles.

The most common method of cutting your netting around "narrow" pipes and obstacles is to use the "slitting method". As opposed to measuring precisely the dimensions of the obstacle and pre-cutting exactly, it is recommended to simply cut a slit in the netting, and then slide the netting on both sides of the obstacle and then pull the netting tight to fasten.

Cut with excess

When cutting your netting to fit specific areas, it is always recommended to cut with allowable excess, and then simply trim to fit whilst attaching. This is much preferred to coming up slightly short and having to create a small join.

Zippers

Access to commercial lighting and other utilities is a common aspect of a netting installation project. Our range of Zippers provide the most economical and effective method of creating a reusable access point.

We offer a range of Zipper products including:

- Bulk 100m Reels / Sliders
- Premade (closed end) Zippers in varied lengths
- Large L-Shaped premade Zipper Panels
- Quick to install "Easy-Fit" Zipper panels



CAUTION: DO NOT PRECUT YOUR NET TO SIZE BEFORE INSTALLING. DO NOT CUT YOUR NET UNTIL IT HAS BEEN INSTALLED AND YOU ARE COMPLETELY SATISFIED IT HAS COVERED THE REQUIRED AREA.

Being diamond mesh design, the diamonds can be stretched lengthwise and widthwise. This design dictates the fact that the net MUST be pulled out to the required WIDTH once taken out of the packaging. For example if you have purchased a 50m X 20m net, when taken out of the packaging you must pull the net out widthwise to 20m BEFORE you attach the net along the length. If you attach the net along the length of one entire side, the net WILL NOT stretch across the full 20m.

An example is below, illustrating a 50m X 20m property and net.



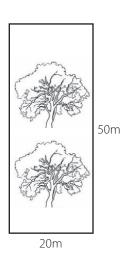
1: Locate end of net bundle & pull part way out of packaging

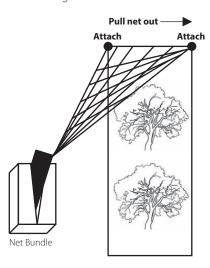
2: To achieve the FULL width, the net must be pulled ACROSS to the required width BEFORE it is attached along the side.

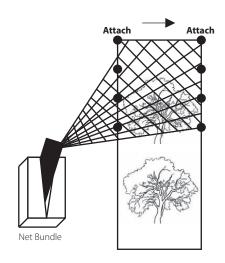
3: Work your way along the length a metre or two at a time, continuing to pull across to required width.

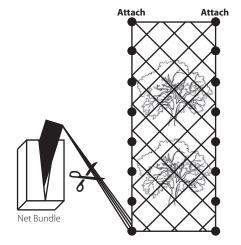
4: Continue to the end using this method, and you will achieve the required coverage.









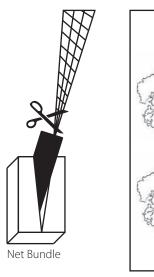


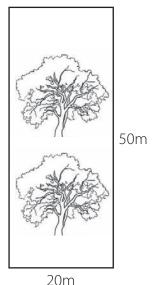


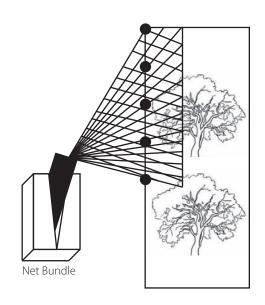
1: Once you have located the end of the net bundle, **DO NOT** simply pull out the length you require and cut.

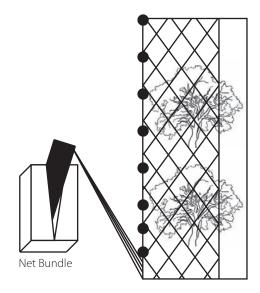
2: DO NOT start by attaching one entire side of the LENGTH. If you do this you will not be able to later pull the net across to the full width. Although you may think that this will be an easier and quicker method, we can assure you that the intended coverage will not be as intended.

3: This example shows one side being attached at a time. You can see from the illustration that the net CANNOT be pulled far enough across to the other side.









Bird Exclusion Netting Comparison Table

				(1) (1) (1)	, Jua Ra	•	(0 II ATT (A)						a obtan	30010
Name:	White Diamond Mesh	Black Diamond Mesh	X-Weave 70gsm	Crossweave Netting: White 70gsm	Crossweave Netting: 105gsm	Premium Diamond Mesh: Black	6ply Heavy Duty Knotted Polyethylene	6ply Heavy Duty with Fire Retardant	9ply Heavy Duty Knotted Polyethylene	Stainless Steel Reinforced Netting	Stainless Steel Wire-Core Braided Netting	Large Mesh: 40mm Square Netting	Large Mesh: 50mm Square Netting	Large Mesh: 60mm & 75mm Square Netting
GSM: (Grams per Sq Metre)	31gsm	31gsm	70gsm	70gsm	105gsm	72gsm up to 280gsm	54gsm	54gsm	84gsm	115gsm	360gsm	38gsm	17gsm	24gsm
UV Treated:	~	✓	~	~	✓	✓	~	✓	~	~	~	~	~	✓
Mesh Size:	16mm x 16mm	16mm x 16mm	17mm x 17mm	10mm + Crossweaves	5mm x 5mm	5x5mm up to 20x20mm	19mm x 19mm	19mm x 19mm	19mm x 19mm	19mm x 19mm	19mm x 19mm	40mm x 40mm	50mm x 50mm	60mm & 75mm
Colours:	White	Black	Black or White	White	Black or Blue	Black	Black	Black with Red Spec	Black or Stone	Black	Black	Black	Black	Black
Construction:	Woven Diamond	Woven Diamond	Woven Diamond	Crossweave Pattern	Crossweave Pattern	Woven Diamond	Knotted Square	Knotted Square	Knotted Square	Knotted Square	Knotted Square	Knotted Square	Knotted Square	Knotted Square
Fire Retardant Option:					~			~						
Available By-the-metre:							~		~	~				
Bulk Buy Discount:	~	~	~	~	~	~	~	~	~	~	~	~	~	✓

Give our staff a call: **(02) 9771 5288**

Visit our website:

www.haverford.com.au