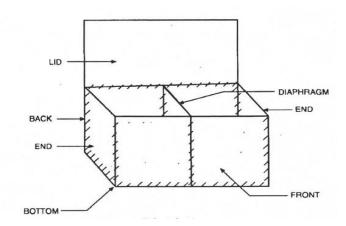


# **DURA-WELD 12 Gauge PVC Gabions**



## Scope:

This specification data sheet covers the use of galvanized steel with PVC coating welded wire mesh gabion baskets filled with stone and used for various applications including but not limited to retaining walls, mechanically stabilized soil retaining structures, stream bank protection, slope paving, outfall structures, weirs, drop structures, landscape walls, veneers, etc.

### **Fabrication:**

In accordance with ASTM A974, Dura-Weld gabions are manufactured with all panels mechanically connected at the production facility. They are supplied in collapsed form, stacked in bundles, for easy jobsite assembly. Where the length of the gabion exceeds the width, the length is divided equally into cells using diaphragm panels so that each cell is no greater than 1 cubic yard. Each Dura-Weld gabion is supplied with enough accessories (vertical spirals, temporary fasteners, lacing wire, and preformed stiffeners (3' high baskets only) to completely assemble and install, with minimal tools required – see gabion and mattress installation guide for details. In addition, all Dura-Weld gabions are made from materials made in the USA.

#### Mesh Detail:

Wire Mesh Opening: 3"x3"

Wire Mesh Diameter: 12 gauge (.106") Wire Mesh Galvanized: 0.8 oz / ft2

Wire Mesh Tensile Strength: 60,000 psi min. Wire Mesh Weld Shear Strength: 360 ft lbs Wire Mesh PVC Coating: .015"-.020"

Assembly Components:

Spiral Wire Diameter: 12 gauge (.106") Spiral Wire Galvanized: 0.8 oz / ft2 Spiral Wire PVC Coating: .015"-.020"

Spiral Wire Tensile Strength: 60,000 psi min. Lacing Wire Diameter: 13.5 gauge (.087")

Lacing Wire Galvanized: 0.8 oz / ft2

Lacing Wire Tensile Strength: 60,000 psi min.

Lacing Wire PVC Coating: .015"-.020"

### Gabion Fill:

The stone fill material used for filling the gabion units shall be clean, hard stone with pieces ranging from 4-8 inches on the greatest dimensions. Stone filling shall not exceed 24 inch vertical drop above the gabion basket. All effort shall be made to ensure that the stone fill material utilized in the design of the structure match the stone fill used in constructing the gabion structure.

## Assembling and placing:

- a. Each gabion unit shall be assembled by tying or fastening all connecting seams. The binding wire shall be tightly looped around every other mesh opening along the seams in such a manner that single and double loops are alternated. An alternative wire fastener may be used in lieu of lacing wire. The alternative wire fasteners shall be applied at approximately 4" 6" intervals on all vertical and horizontal seams. No less than 3 fasteners per one foot on any given seam.
- A line of empty gabions, shall be placed into position according to the contract drawings.
  Binding wire or alternative wire fasteners shall be used to secure each unit to the adjoining one

along the edges and the top. An approved corner closure tool can be used to adjoin adjacent gabions to insure a tight, neat seam and minimize gabion wired or fastened to the latter at front and back.

- To achieve optimum alignment and finish for retaining walls, a minimum amount of stretching c. may be required.
- d. Connecting wire or preformed stiffeners shall be inserted during the filling operation as follows: The connecting wires shall be installed according to manufacturer's instructions every 1' vertical lift of the gabion unit.

## Gabion Unit Standard Sizes:

SIZE	CELLS	CAPACITY (CU. YDS)	WEIGHT (LBS)
3'x3'x3'	1	1	36
6'x3'x3'	2	2	63
9'x3'x3'	3	3	90
12'x3'x3'	4	4	117
3'x3'x1.5'	1	0.5	26
6'x3'x1.5'	2	1	44
9'x3'x1.5'	3	1.5	63
12'x3'x1.5'	4	2	82
3'x3'x1'	1	0.33	22
6'x3'x1'	2	0.66	38
9'x3'x1'	3	1	54
12'x3'x1'	4	1.33	70

All our Gabion material is manufactured according to ASTM A974-79 guidelines.