Woven Wire Mesh

Dutch Weave

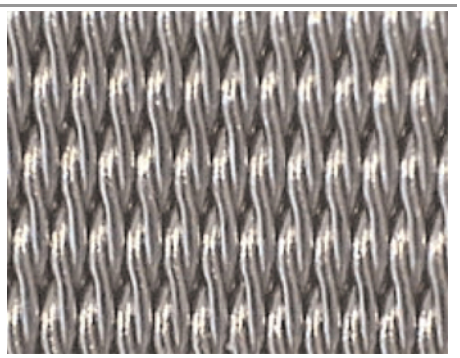
Dutch or Hollander Weave is a description applied to woven wire cloth where the diameter of the warp and weft wires, and the mesh count in the warp and weft directions, are different. The wires are driven up much closer during the weaving process, thus producing a more densely compacted mesh.

Mesh count per inch and aperture size in microns are the most commonly used methods of describing the various Dutch Weave specifications. We offer four standard weave types all available in Stainless Steel.

Plain Steel, Monel and non-ferrous alloys are available in a limited number of specifications.

Twill Dutch Weave

Each warp wire and each weft wire passes over and under the next two adjacent complementary wires, as in a normal Twill Weave, except the warp wires are larger in diameter than the weft wires.



This allows a greater mesh count in the weft direction. This weave pattern enables the weft wires to be woven more densely, and much smaller aperture sizes can be achieved without forsaking cloth thickness.

Specifications Listed by Absolute Micron Retention

Mesh count per 25.4mm	Absolute micron retention (mu)	Weight Kg/M²	Cloth Thickness (mm)
510 x 3600	4 - 5	0.3	0.06
400 x 2800	5 - 6	0.36	0.06
375 x 2300	6 - 7	0.39	0.08
325 x 2300	7 - 8	0.47	0.09
260 x 1550	8 - 10	0.68	0.12
250 x 1400	11 - 12	0.68	0.12
200 x 1400	11- 13	0.75	0.14
130 x 700	13 - 15	1.6	0.28
200 x 1120	15 - 17	0.95	0.16
165 x 1400	15 - 18	0.7	0.15
165 x 1100	20 - 21	0.9	0.16
80 x 700	34 - 36	1.2	0.26
40 x 560	71 - 80	1.7	0.39
30 x 360	95 - 106	2.6	0.54
30 x 250	100 - 112	3.2	0.65
20 x 260	110 - 120	3.1	0.67
28 x 560	106 - 112	1.95	0.46
24 x 300	112 - 118	2.85	0.63

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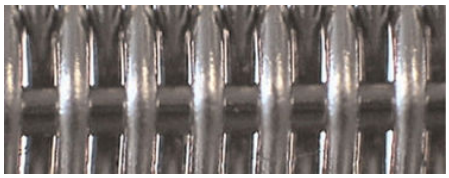
Plain Dutch Weave



Each warp wire and each weft wire passes over and under the next adjacent complementary wire, as in normal

Plain Weave, except the warp wires are larger in diameter than the weft wires. This allows a greater mesh count in the weft direction.

Specifications Listed by Absolute Micron Retention

Mesh count per 25.4mm	Absolute micron retention (mu)	Weight Kg/M²	Cloth Thickness (mm)
80 x 300	32 - 36	0.98	0.25
80 x 400	36 - 45	0.82	0.23
50 x 250	56 - 63	1	0.32
50 x 280	71 - 75	1	0.32
40 x 200	75 - 80	1.3	0.4
30 x 150	80 - 100	1	0.5
24 x 110	100 - 112	2.5	0.76
22 x 140	140 - 170	2.1	0.66
20 x 150	160 - 180	1.55	0.5
20 x 150	170 - 190	1.6	0.55
18 x 100	200 - 210	2.05	0.69
14 x 110	220 - 240	2.15	0.72
12 x 95	240 - 260	2.3	0.79
14 x 88	280 - 300	3.15	0.76
10 x 90	270 - 290	2.5	0.93
12 x 64	280 - 300	4.1	1.21
10 x 70	315 - 335	3	1.04
8 x 85	330 - 350	2.5	0.93

Absolute Micron Retention

In all types of Dutch Weaves the sum derived from multiplying the number of weft wires in a given measurement by their diameter, results, in theory, in a specification with no open space. Because the wires are driven together during the weaving process, the aperture size cannot be calculated in the normal manner.

There are two methods by which the aperture size can be determined:
BUBBLE POINT TEST- The pressure required to pass air bubbles through the mesh (covered by a test liquid) is measured. The average aperture size is then calculated by taking into account surface tension, liquid density, temperature and immersion depth.
GLASS BEAD TEST- A suspension containing glass beads is passed through the mesh - the diameter of the largest bead passing through is considered as the absolute micron retention.

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