

# ASTM A795 GR-A

## SCHEDULE - 10 FOR BLACK AND HOT DIP GALVANIZED STEEL PIPES

SIZE		OD (Minimum)		OD (Maximum)		WALL THICKNESS		Weight of Tube (Plain End)		PRESSURE GR-A	Pieces Per Bundle
INCH	NB (mm)	INCH	MM	INCH	MM	INCH	MM	lb./Ft	Kg./Mtr.	PSI	
3/4"	20	1.035	26.30	1.070	27.10	0.083	2.11	0.860	1.28	700	120
1"	25	1.300	33.00	1.330	33.80	0.109	2.77	1.410	2.09	700	84
1 1/4"	32	1.645	41.80	1.680	42.60	0.109	2.77	1.810	2.69	1000	61
1 1/2"	40	1.885	47.90	1.920	48.70	0.109	2.77	2.090	3.11	1000	42
2"	50	2.350	59.70	2.400	60.90	0.109	2.77	2.640	3.93	1000	37
2 1/2"	65	2.850	72.30	2.900	73.70	0.120	3.05	3.530	5.26	1000	29
3"	80	3.460	88.00	3.530	89.80	0.120	3.05	4.340	6.46	1000	19
3 1/2"	90	3.960	100.60	4.040	102.60	0.120	3.05	4.980	7.41	1200	19
4"	100	4.450	113.20	4.540	115.40	0.120	3.05	5.620	8.37	1200	14
5"	125	5.507	139.90	5.620	142.70	0.134	3.40	7.780	11.58	1200	7
6"	150	6.560	166.60	6.690	169.98	0.134	3.40	9.300	13.85	1000	7
8"	200	8.540	216.91	8.712	221.29	0.188	4.78C	16.960	25.26	800	4
10"	250	10.644	270.37	10.859	275.83	0.188	4.78C	21.230	31.62	700	2

- 1. TOLERANCES:**
- a) On Thickness: The minimum wall thickness at any point shall be not more than 12.5% under the specified wall thickness.
  - b) On Diameter: For NPS 11/2" & under any point shall not vary more than +0.4 mm -0.8 mm.  
For NPS 2" & above shall not vary more than ± 1% from the standard specified
  - c) On Weight The weight of the pipe shall not more than ±5 % of the specified weight.
- 3. INTERNAL DEBEADING :** 2" and above - Internal beads to be removed completely.
- 4. CHEMICAL COMPOSITION:** GR.A % MAX -C - 0.25%, Mn - 0.95%, S - 0.035%, P - 0.035%
- 5. MECHANICAL (MIN.):** GR.A Yield Strength-205 N/mm2, Tensile Strength-330 N/mm2, Elongation-25-30%
- 6. FLATTENING TEST :**
- Stage-1 : Weld located 0 & 90 degree from line of direction of force.
  - Stage-2 : For weld ductility until 2/3 of outside dia of specimen tube.
  - Stage-3 : For ductility of steel until 1/3 of outside dia of specimen tube.  
Full flattening for testing of laminated and unsound material.
- 7. LEAK TIGHTNESS TEST:**
- a) : On line NDT(Eddy Current)
  - b) : Hydro testing at pressure as per above Table and holding time Min. 5 Second.
- 8. BLACK VARNISH :** Tubes are uniformly varnished externally over their full length.
- 9. ZINC COATING :** The Average 460 gm/m2 but one side should not be less than 400 gm/m2 or Specified by customer  
Free from bare Spot,Black spot,rough,overcoating, Peel off or anyother surface defect.
- 10. THREADING :** For 1/2" & 3/4" - 14 TPI, 1" to 2" - 11.5 TPI and 2 1/2" to 6" - 8TPI.  
Check with standard ASTM ring and plug gauges.
- 11. MARKING :** On line stenciling as per this standard & as per customer needs at one meter interval
- 12. PACKING :** Hexagonal Type
- 13. MILL TEST CERTIFICATE :** We can issue a MTC, certifying that the tubes supplied comply with this ASTM A 795 Standard