

ADS POTABLE WATER SERVICE PIPE (IPS) PIPE SPECIFICATIONS

Scope

This specification describes ADS Potable Water Service Pipe (IPS) pipe SIDR 19, SIDR 15, SIDR 11.5, SIDR 9, and SIDR 7 for use in potable water service applications.

Pipe Requirements

ADS potable water service pipe shall meet the requirements of ASTM D2239, AWWA C901 and NSF Standards 14 and 61. Pipe dimensions shall meet ID controlled Iron Pipe Size (IPS) standards.

Material Properties

Pipe material shall be high-density polyethylene conforming to the minimum requirements of cell classification 445574C or 445574E as defined and described in ASTM D3350, except that carbon black content should not exceed 3.0%. The resin shall have a material designation code of PE4710 by the Plastic Pipe Institute.

Disinfection/Maintenance

The active chlorine content of disinfecting solutions shall not exceed 12%. All disinfecting solution must be flushed from all lines within the system. Industry accepted procedures, like ANSI/AWWA C651 *Disinfecting Water Mains*, should be followed for both new and repaired potable water lines.

Installation

Installation is similar to other flexible pipe products. Methods including direct bury, plowing or pulling are applicable per local, state or federal guidelines for the application.

Pipe Properties

		1/2"	3/4"	1"	1 1/4"	1 1/2"	2"
SIDR 19	Inside Diameter in (mm)	0.622 ±0.01 (15.8 ±0.25)	0.824 ±0.015 (20.9 ±0.38)	1.049 ±0.02 (26.6 ±0.51)	1.380 ±0.02 (35.1 ±0.51)	1.610 ±0.02 (40.9 ±0.51)	2.067 ±0.02 (52.5 ±0.51)
	Wall Thickness in (mm)	0.060 +0.02 (1.5 +0.51)	0.060 +0.02 (1.5 +0.51)	0.060 +0.02 (1.5 +0.51)	0.073 +0.02 (1.9 +0.51)	0.085 +0.02 (2.2 +0.51)	0.109 +0.020 (2.8 +0.51)
	Pressure Rating @ 73°F psi (kPa)	100 (689)	100 (689)	100 (689)	100 (689)	100 (689)	100 (689)
	Weight gm/ft (gm/m)	28 ±2 (92 ±7)	38 ±2 (125 ±7)	47 ±2 (154 ±7)	80 ±3 (262 ±10)	96 ±3 (315 ±10)	190 ±5 (623 ±16)
SIDR 15	Inside Diameter in (mm)	0.622 ±0.01 (15.8 ±0.25)	0.824 ±0.015 (20.9 ±0.38)	1.049 ±0.02 (26.6 ±0.51)	1.380 ±0.02 (35.1 ±0.51)	1.610 ±0.02 (40.9 ±0.51)	2.067 ±0.02 (52.5 ±0.51)
	Wall Thickness in (mm)	0.060 +0.02 (1.5 +0.51)	0.060 +0.02 (1.5 +0.51)	0.070 +0.02 (1.8 +0.51)	0.092 +0.02 (2.3 +0.51)	0.107 +0.02 (2.7 +0.51)	0.138 +0.020 (3.5 +0.51)
	Pressure Rating @ 73°F psi (kPa)	125 (862)	125 (862)	125 (862)	125 (862)	125 (862)	125 (862)
	Weight gm/ft (gm/m)	30 ±2 (98 ±7)	39 ±2 (128 ±7)	56 ±2 (184 ±7)	97 ±3 (318 ±10)	129 ±3 (423 ±10)	200 ±5 (656 ±16)
SIDR 11.5	Inside Diameter in (mm)	0.622 ±0.01 (15.8 ±0.25)	0.824 ±0.015 (20.9 ±0.381)	1.049 ±0.02 (26.6 ±0.51)	1.380 ±0.02 (35.1 ±0.51)	1.610 ±0.02 (40.9 ±0.51)	2.067 ±0.02 (52.5 ±0.51)
	Wall Thickness in (mm)	0.060 +0.02 (1.5 +0.51)	0.072 +0.02 (1.8 +0.51)	0.091 +0.02 (2.3 +0.51)	0.120 +0.02 (3.0 +0.51)	0.140 +0.02 (3.6 +0.51)	0.180 +0.020 (4.6 +0.51)
	Pressure Rating @ 73°F psi (kPa)	160 (1103)	160 (1103)	160 (1103)	160 (1103)	160 (1103)	160 (1103)
	Weight gm/ft (gm/m)	30 ±2 (98 ±7)	50 ±2 (164 ±7)	72 ±2 (236 ±7)	125 ±3 (410 ±10)	146 ±3 (479 ±10)	248 ±5 (814 ±16)

Pipe Properties (continued)

SIDR 9	Inside Diameter in (mm)	0.622 ±0.01 (15.8 ±0.25)	0.824 ±0.015 (20.9 ±0.38)	1.049 ±0.02 (26.6 ±0.51)	1.380 ±0.02 (35.1 ±0.51)	1.610 ±0.02 (40.9 ±0.51)	2.067 ±0.02 (52.5 ±0.51)
	Wall Thickness in (mm)	0.069 +0.02 (1.8 +0.51)	0.092 +0.02 (2.3 +0.51)	0.117 +0.02 (3.0 +0.51)	0.153 +0.02 (3.9 +0.51)	0.179 +0.02 (4.5 +0.51)	0.230 +0.028 (5.8 +0.71)
	Pressure Rating @ 73°F psi (kPa)	200 (1379)	200 (1379)	200 (1379)	200 (1379)	200 (1379)	200 (1379)
	Weight gm/ft (gm/m)	32 ±2 (105 ±7)	53 ±2 (174 ±7)	88 ±3 (289 ±10)	155 ±3 (509 ±10)	185 ±5 (607 ±16)	330 ±5 (1083 ±16)
SIDR 7	Inside Diameter in (mm)	0.622 ±0.01 (15.8 ±0.25)	0.824 ±0.015 (20.9 ±0.38)	1.049 ±0.02 (26.6 ±0.51)	1.380 ±0.02 (35.1 ±0.51)	1.610 ±0.02 (40.9 ±0.51)	2.067 ±0.02 (52.5 ±0.51)
	Wall Thickness in (mm)	0.089 +0.02 (2.3 +0.51)	0.118 +0.02 (3.0 +0.51)	0.150 +0.02 (3.8 +0.51)	0.197 +0.02 (5.0 +0.51)	0.230 +0.03 (5.8 +0.71)	0.295 +0.035 (7.5 +0.89)
	Pressure Rating @ 73°F psi (kPa)	250 (1724)	250 (1724)	250 (1724)	250 (1724)	250 (1724)	250 (1724)
	Weight gm/ft (gm/m)	38 ±2 (125 ±7)	71 ±2 (233 ±7)	116 ±3 (381 ±10)	210 ±5 (689 ±16)	227 ±5 (745 ±16)	440 ±8 (1443 ±26)

* Additional SDRs may be available. Contact an ADS Representative for regional availability.