

5000/5000 Plus PRS Series Rotors

The Next Evolution in Rotor Performance

The 5000/5000 Plus PRS rotor combines Rain Bird's award-winning Rain Curtain™ Technology with an in-stem pressure regulator to provide a new standard in nozzle performance.

Features

- Five-year trade warranty
- In-stem pressure regulator (PRS) reduces operating pressure to 45 psi (3,1 bars) for optimal nozzle performance
- PRS saves water by:
 - eliminating head-to-head pressure variations
 - eliminating misting due to high pressure
 - improving nozzle distribution uniformity by operating the nozzle at optimum pressure
- Maintenance-free design can be easily retrofitted into existing 5000/5000 Plus, T-Bird™ and Hunter® PGP™ (using UPG model) rotor bodies without digging up the entire body
- The 5000/5000 Plus PRS Series Rotor is available in 4", 6", 12", Shrub, and Stainless Steel models (5000 Plus 4" & 6" only).
- Standard rubber cover for extra protection. 5000 Plus PRS features a green cover while the 5000 PRS features a black cover.
- Heavy-duty cover assembly for extra durability in residential or commercial applications
- Rain Curtain™ Nozzles
- Tree of nozzles including four low angle (Angle of Trajectory 10°) and eight standard angle Rain Curtain™ Nozzles (Angle of Trajectory 25°) provides 25 to 47 (7,6 to 14,3 m) distance of throw
- Optional award-winning MPR nozzle set simplifies design and installation by providing matched precipitation from 25' to 35' (7,6 to 10,7 m)
- The 5000 Plus PRS features a Flow Shut-Off device to stop the flow of water to a particular head while the system is still in operation.
- Heavy-duty retract spring assures positive pop-down
- Top-adjust arc adjustment requiring only a flat-blade screwdriver

- 40 - 360° Arc Rotation and reversing full circle rotation in one. (A non-reversing full circle only unit is also available)
- Radius adjustment screw allows up to 25% radius reduction without changing nozzles
- True 4" (10 cm) pop-up (measured from the cover to the nozzle)
- Pressure-activated multi-function wiper seal protects internals from debris and assures positive pop-up and retraction
- Optional stainless steel riser helps deter vandalism on public turf areas (4" and 6" 5000 Plus PRS models only)
- Optional Seal-A-Matic (SAM)™ check valve holds up to 7 feet (2,1 m) of elevation change, to prevent puddling and erosion caused by low head drainage
- Optional non-potable purple cover for easy identification of reclaimed water

Operating Range

- Precipitation rate: .20 to 1.01 inches per hour (5 to 26 mm/h)
- Radius: 25 to 47 feet (7,6 to 14,3 m)
- Pressure: 25-75 psi (1,7 to 5,2 bars)
- Flow Rate: .73 to 8.31 GPM (0,17 to 1,85 m³/h)

Specifications

- ¾" (20/27) NPT female bottom threaded inlet
- Reversing full and part circle adjustment 40° - 360°



Dimensions

- Pop-up height: Shrub: 4" (10 cm); 4" (10 cm); 6" (15 cm); 12" (30 cm)
- Overall body height: Shrub: 7 ¾" (19,7cm); 4": 7 ¾" (18, 5 cm); 6": 9 ½" (24,5 cm); 12": 16 7/8" (42,9 cm)
- Exposed surface diameter: 1 ½" (4,1 cm)

Note: Pop-up height measured from cover to the nozzle. Overall body height is measured popped down.

Models*

Part circle units (PC) are adjustable from 40 -360 degrees. Full circle units (FC) are 360 degrees only.

- 5000-S-R/5000+-S-R
 - 5004-R/5000+-R
 - 5004-R-2.0 or 3.0/5004+-R-2.0 or 3.0†
 - 5006-R/5006+-R
 - 5012-R/5012+-R
 - UPG-PL-PC-S-R
 - UPG-PL-PC-R
 - UPG-PC-S-R
 - UPG-PC-R
- † Pre-installed nozzle

* See last page for ordering information

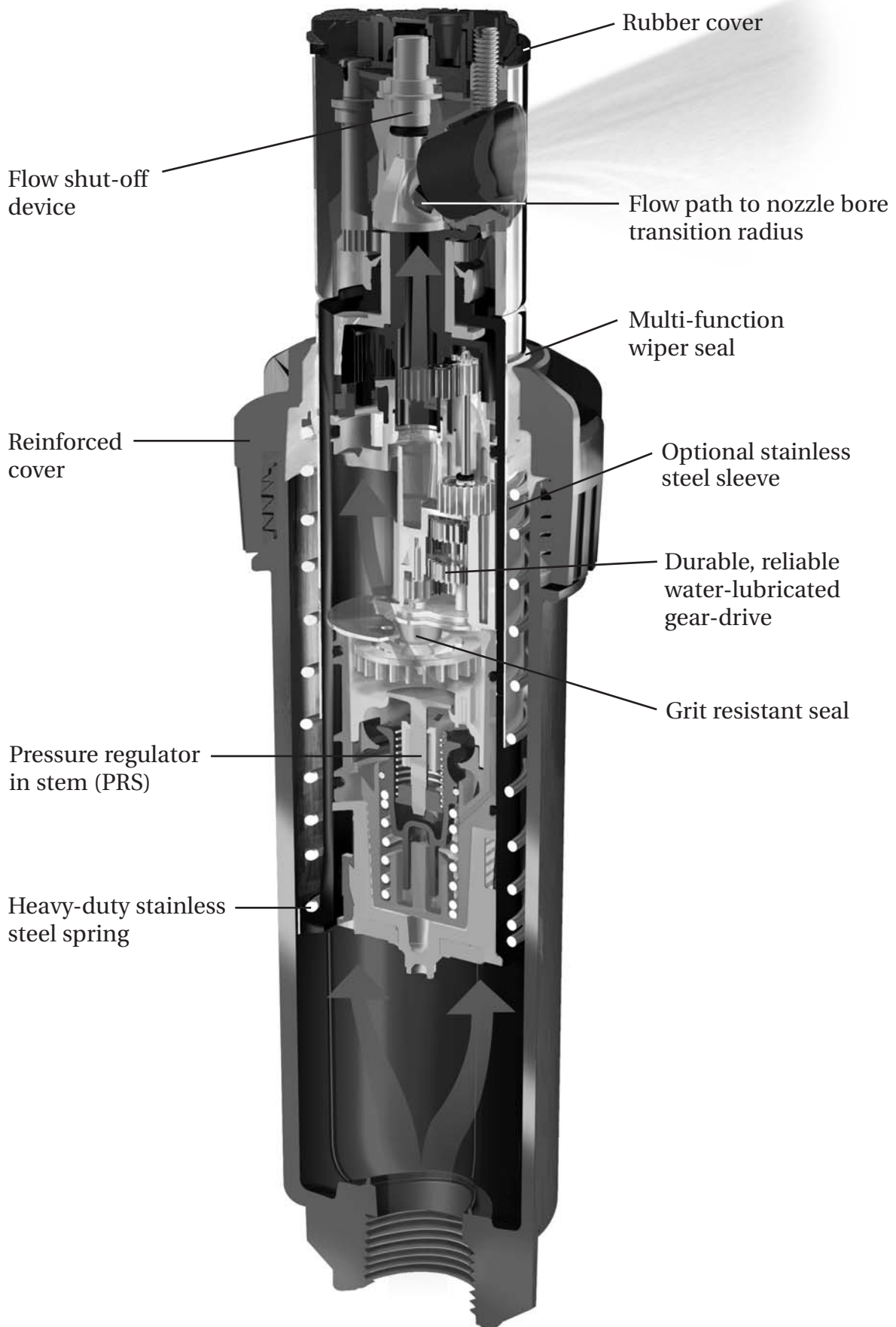
5000/5000 Plus MPR Nozzles

Achieve Matched Precipitation Rate Between 25' and 35'

Rain Bird 5000/5000 Plus MPR Nozzles simplify both the design process and the installation of rotors, because they reliably deliver matched precipitation rates within and between rotor radii from 25' to 35'. Without having to use fixed arc plates, designers and installers can achieve matched precipitation rates. Superior flexibility in arc adjustment minimizes the risks of over- or under-watering.

See Tech Spec D39541 for more information.

5000/5000 Plus PRS Series Rotor



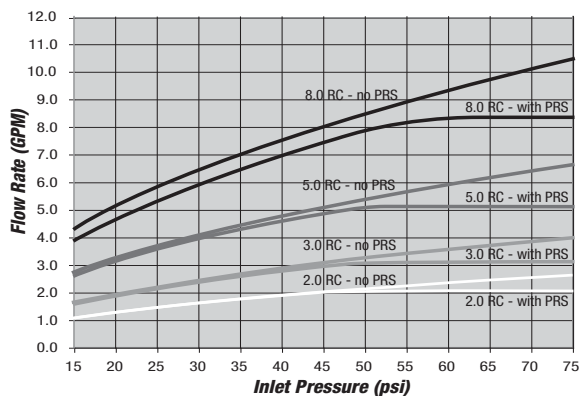
Standard Angle Rain Curtain Nozzle Performance

Inlet Pressure (psi)	Nozzle	Radius (ft.)	Flow (GPM)	■	▲
				Precip. (in/h) Square	Precip. (in/h) Triangular
25	1.5	33	1.12	0.20	0.23
	2.0	35	1.50	0.24	0.27
	2.5	35	1.81	0.28	0.33
	3.0	36	2.26	0.34	0.39
	4.0	37	2.91	0.41	0.47
	5.0	39	3.72	0.47	0.54
	6.0	39	4.25	0.54	0.62
	8.0	36	5.90	0.88	1.01
35	1.5	34	1.35	0.22	0.26
	2.0	36	1.81	0.27	0.31
	2.5	37	2.17	0.31	0.35
	3.0	38	2.71	0.36	0.41
	4.0	40	3.50	0.42	0.49
	5.0	41	4.47	0.51	0.59
	6.0	43	5.23	0.54	0.63
	8.0	43	7.06	0.74	0.85
45	1.5	35	1.54	0.24	0.28
	2.0	37	2.07	0.29	0.34
	2.5	37	2.51	0.35	0.41
	3.0	40	3.09	0.37	0.43
	4.0	42	4.01	0.44	0.51
	5.0	45	5.09	0.48	0.56
	6.0	46	6.01	0.55	0.63
	8.0	47	8.03	0.70	0.81
55 - 75	1.5	35	1.59	0.25	0.29
	2.0	37	2.14	0.30	0.35
	2.5	37	2.60	0.37	0.42
	3.0	40	3.20	0.39	0.44
	4.0	42	4.15	0.45	0.52
	5.0	45	5.27	0.50	0.58
	6.0	46	6.22	0.57	0.65
	8.0	47	8.31	0.72	0.84

Low Angle Nozzle Performance

Inlet Pressure (psi)	Nozzle	Radius (ft.)	Flow (GPM)	■	▲
				Precip. (in/h) Square	Precip. (in/h) Triangular
25	1.0 LA	25	0.76	0.22	0.26
	1.5 LA	27	1.15	0.30	0.35
	2.0 LA	29	1.47	0.34	0.39
	3.0 LA	29	2.23	0.51	0.59
35	1.0 LA	28	0.92	0.21	0.25
	1.5 LA	30	1.38	0.30	0.34
	2.0 LA	31	1.77	0.35	0.41
	3.0 LA	33	2.68	0.47	0.55
45	1.0 LA	29	1.05	0.23	0.26
	1.5 LA	31	1.58	0.32	0.37
	2.0 LA	32	2.02	0.38	0.44
	3.0 LA	35	3.07	0.48	0.56
55 - 75	1.0 LA	29	1.09	0.25	0.29
	1.5 LA	31	1.64	0.33	0.38
	2.0 LA	32	2.09	0.39	0.45
	3.0 LA	35	3.18	0.50	0.58

Flow Rate v Inlet Pressure – Rain Curtain Nozzles



Standard Angle Rain Curtain Nozzle Performance

Metric	Inlet Pressure (bars)	Nozzle	Radius (m)	Flow (m³/h)	Flow (l/s)	■	▲
						Precip. (mm/h) Square	Precip. (mm/h) Triangular
1,7	1,5	10,1	0,25	0,07	5	6	
	2,0	10,7	0,34	0,09	6	7	
	2,5	10,7	0,41	0,11	7	8	
	3,0	11,0	0,51	0,14	8	10	
	4,0	11,3	0,66	0,18	10	12	
	5,0	11,9	0,84	0,23	12	14	
	6,0	11,9	0,97	0,27	14	16	
	8,0	11,0	1,34	0,37	22	26	
2,0	1,5	10,2	0,28	0,08	5	6	
	2,0	10,8	0,36	0,10	6	7	
	2,5	10,9	0,44	0,12	7	9	
	3,0	11,2	0,55	0,15	9	10	
	4,0	11,6	0,71	0,20	11	12	
	5,0	12,1	0,91	0,25	12	14	
	6,0	12,4	1,05	0,29	14	16	
	8,0	11,8	1,45	0,40	21	24	
2,5	1,5	10,4	0,31	0,09	6	7	
	2,0	11,0	0,41	0,11	7	8	
	2,5	11,3	0,50	0,14	8	9	
	3,0	11,2	0,62	0,17	9	11	
	4,0	12,3	0,81	0,22	11	13	
	5,0	12,7	1,03	0,29	13	15	
	6,0	13,2	1,21	0,34	14	16	
	8,0	13,3	1,63	0,45	19	21	
3,0	1,5	10,6	0,34	0,10	6	7	
	2,0	11,2	0,45	0,13	7	8	
	2,5	11,3	0,56	0,16	9	10	
	3,0	12,1	0,69	0,19	9	11	
	4,0	12,7	0,89	0,25	11	13	
	5,0	13,5	1,13	0,31	12	14	
	6,0	13,9	1,34	0,37	14	16	
	8,0	14,1	1,79	0,50	18	21	
3,5 - 5,2	1,5	10,6	0,35	0,10	6	7	
	2,0	11,2	0,47	0,13	8	9	
	2,5	11,3	0,58	0,17	9	11	
	3,0	12,1	0,71	0,20	10	11	
	4,0	12,7	0,92	0,26	12	13	
	5,0	13,5	1,17	0,32	13	15	
	6,0	13,9	1,39	0,38	14	17	
	8,0	14,1	1,85	0,52	18	21	

Low Angle Nozzle Performance

Metric	Inlet Pressure (bars)	Nozzle	Radius (m)	Flow (m³/h)	Flow (l/s)	■	▲
						Precip. (mm/h) Square	Precip. (mm/h) Triangular
1,7	1,0 LA	7,6	0,17	0,05	6	7	
	1,5 LA	8,2	0,26	0,07	8	9	
	2,0 LA	8,8	0,33	0,09	9	10	
	3,0 LA	8,8	0,51	0,14	13	15	
2,0	1,0 LA	8,0	0,18	0,05	6	6	
	1,5 LA	8,6	0,28	0,08	8	9	
	2,0 LA	9,1	0,36	0,10	9	10	
	3,0 LA	9,3	0,55	0,15	13	15	
2,5	1,0 LA	8,6	0,20	0,06	5	6	
	1,5 LA	9,2	0,32	0,09	8	9	
	2,0 LA	9,5	0,41	0,11	9	10	
	3,0 LA	10,1	0,62	0,17	12	14	
3,0	1,0 LA	8,8	0,22	0,06	6	7	
	1,5 LA	9,4	0,35	0,10	8	9	
	2,0 LA	9,7	0,45	0,13	10	11	
	3,0 LA	10,6	0,68	0,19	12	14	
3,5 - 5,2	1,0 LA	8,8	0,23	0,06	6	7	
	1,5 LA	9,4	0,36	0,10	8	10	
	2,0 LA	9,7	0,47	0,13	10	12	
	3,0 LA	10,6	0,70	0,20	13	15	

Note:

Precipitation rates calculated at 50% diameter head to head spacing, half circle operation.



**5000/5000 Plus PRS Series Rotor
Technical Specification**

**5000/5000 Plus PRS Series Full and
Reversing Full/Part Circle Sprinkler**

The full and/or part circle sprinkler shall be a single-stream, water-lubricated, gear-drive type capable of covering a ___ foot (xx meter) at ___ pounds per square inch (psi) or (bars) with a discharge rate of ___gallons per minute (___ gpm) (___ m³/h). The sprinkler shall include an integral pressure regulator to reduce operating pressure to 45 psi (3,1 bars) for optimal nozzle performance. The pressure regulator shall be located downstream of the sprinkler's filter basket and shall require no field adjustment. The sprinkler shall have a flow shut-off device (5000 Plus PRS only) that is integrated into the flow path of the rotor as well as adjustable arc coverage of 40 to 360 degrees. Arc adjustment can be performed with or without the sprinkler in operation and shall require only a flat-blade screwdriver.

The sprinkler shall have a smoothed flow path entrance to enhance the flow characteristics of the rotor. In addition, the sprinkler shall feature a flow path to nozzle bore transition radius to minimize pressure loss and assure peak nozzle radius is achieved(5000 Plus PRS only).

The sprinkler shall have a pressure activated, multi-function wiper seal that positively seals against the pop-up stem to keep debris out of the rotor and to clean debris from the pop-up stem as it retracts.

This wiper seal shall prevent sprinkler from sticking up, and be capable of sealing the sprinkler cap to sprinkler body under normal operating pressures.

The sprinkler shall have a screen installed in the pop-up stem to filter inlet water, protect the drive from clogging and simplify its removal for cleaning and flushing of the system. It shall have a 3/4" (FNPT) bottom inlet.

The sprinkler shall have a standard rubber cover and a strong stainless steel retract spring for positive pop down. Pop-up height as measured from the top of the cap, at normal installation, to the middle of the nozzle orifice shall be ___ inches or ___ cm.

The rotor's overall height shall be ___ inches (___cm), with an exposed surface diameter of 1 3/8" (4,1 cm).

The sprinkler shall have 12 interchangeable nozzles: 8 Rain Curtain nozzles for superior coverage and, 4 Low Angle nozzles for reduced radius of throw and superior wind resistance with all nozzles containing Micro-Ramp™

technology for superior close-in watering. The angle of trajectory shall be 25 degrees for the Rain Curtain nozzles and 10 degrees for the low angle nozzles. The sprinkler shall come with a stainless steel adjusting screw capable of reducing the radius up to 25%.

The sprinkler shall be as manufactured by Rain Bird Corporation, Glendora, California.

Optional Feature Specification

5000/5000 Plus PRS Series SAM, Full and Reversing Full/Part Circle Sprinkler SAM unit

When so indicated on the design, the sprinkler shall have a spring-loaded Seal-A-Matic™ (SAM) device in the base of the case. The device shall hold back at least 7' (2,13 m) of elevation change to prevent puddling, run-off and erosion caused by low-head drainage. The SAM unit shall cause no pressure loss during normal operation.

5000/5000 Plus PRS Series Full and Reversing Full/Part Circle Non-Potable

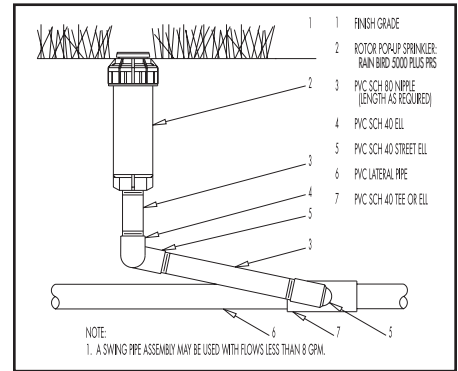
When so indicated on the design, the sprinkler shall have a purple rubber cover to indicate to the user that non-potable water is being used. There shall be no difference between the black/green and the purple covers, except for the color.

5000 Plus PRS Shrub Series Full and Reversing Full/Part Circle Sprinkler (SAM)

When so indicated on the design, the shrub model shall contain all of the specifications of the standard 5000 series rotor plus a locking screw to fasten the shrub unit to the riser. Additionally, the shrub base unit will feature Secure Ribs™ that are designed to assist in the staking of the shrub model if so specified on the design. When the Seal-A-Matic™ (SAM) model is indicated on the design, the device shall hold back at least 7' (2,13m) of elevation change to prevent puddling, run-off and erosion caused by low head drainage. The SAM unit shall cause no pressure loss during normal operation.

5000 Plus PRS Series Stainless Steel

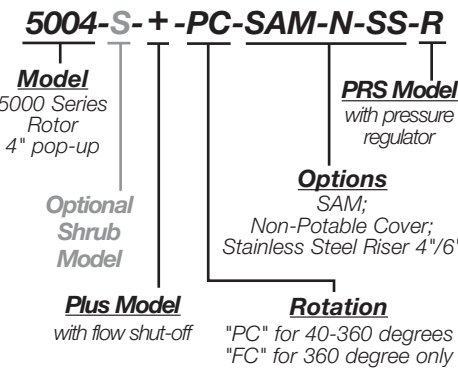
When so indicated on the design, the rotor shall have a stainless steel covered nozzle turret and riser stem. This riser stem shall be tapered and perform equal to the standard plastic riser in all other ways.



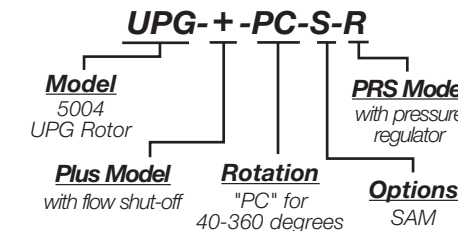
5000 MPR Nozzle Specification

The MPR Nozzles shall be capable of covering a ___foot radius (FT.RAD.)/(meter) at ___pounds per square inch (psi)/(bars) with a discharge rate of ___gallons per minute (GPM)/(m³/h, l/s). The MPR Nozzles shall have a matched precipitation rate of 0.6 in/hr (15 mm/h) at 45 psi (3,1 bars). The MPR Nozzles shall be color-coded by radius and shall contain Micro Ramp™ technology for superior close-in watering. The MPR Nozzles shall be manufactured by Rain Bird Corporation, Azusa, California.

How to Specify/Order:



How to Specify/Order:



Rain Bird Corporation
6991 E. Southpoint Road, Tucson, AZ, 85706, U.S.A
Phone: (520) 741-6100 Fax: (520) 741-6522

Rain Bird Corporation
970 W. Sierra Madre Avenue, Azusa, CA, 91702, U.S.A
Phone: (626) 812-3400 Fax: (626) 812-3411

Rain Bird International, Inc.
145 North Grand Avenue, Glendora, CA, 91741, U.S.A
Phone: (626) 963-9311 Fax: (626) 963-4287

Technical Service and Support
(800) RAINBIRD (U.S. and Canada only)

Specification Hotline
(800) 458-3005 (U.S. and Canada only)

www.rainbird.com

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