

BOOMLESS SPRAY NOZZLES
2025 Catalog





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#### **BOOMINATOR® FEATURES**

- All nozzles are MADE IN THE U.S.A.
- All nozzles carry a 3-YEAR LIMITED WARRANTY against defects in materials and workmanship.
- All Eco Series nozzles are made of Acetal Copolymer and T6063-T6 aluminum. No small orifices or slots to get plugged up.
- All industrial nozzles are 5-Axis CNC Machined from high grade stainless steel.
   No plastic parts or soft metals to wear out, break or replace. No small orifices or slots to get plugged up.
- All nozzles feature a patented round covered orifice design which improves spray pattern and distribution.
- All nozzles feature patented anti-drift technology.
- All nozzles are laser measured to ensure proper flow rate and spray pattern.

### **BOOMINATOR® BENEFITS**

- Boominator® nozzles produce a very even large droplet pattern for minimal drift and better penetration.
- Boominator® nozzles can easily spray around obstacles & over uneven terrain.
- Boominator® nozzles eliminate the cost of spray booms & boom maintenance.
- Boominator® nozzles have superior wear and chemical resistance.
- Boominator® nozzles are designed to save time and money.

### **BOOMINATOR® APPLICATIONS**

- ATV sprayers, tow behind sprayers.
- De-Icing on roads, bridges, sidewalks, runways and parking lots.
- Spraying fence lines and right-of-ways.
- Dust suppression in mining, dirt track and street sweeping applications.
- Lawn, turf and nursery applications.
- Grass fire fighting.
- Ponds, lakes, canals. Aquatic pest and weed control.
- Insect control.
- Disinfecting and disease control in livestock and poultry barns.
- Pasture spraying.
- Roadside and Highway spraying.
- Forestry spraying.
- Ride-on sprayers.

## BOOMIN ATOR **BOOMLESS SPRAY NOZZLES**

### **Short Pattern Spray Nozzles**

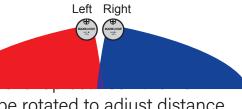
All Short Pattern Spray Nozzles were tested at a height of 18 inches. (Recommended operating height is between 12 & 36 inches.) These nozzles are designed for left-hand or right-hand mounting and provide an outward to straight downward spray pattern.



### **Regular Pattern Spray Nozzles**

All Regular Pattern Spray Nozzles were tested at a height of 36 inches. (Recommended operating height is between 18 & 48 inches.)

These nozzles are designed for left-hand or right-hand mounting and provide a wide spray pattern with approximately 15° of kickback under the nozzle. When using left-hand and right-hand nozzle together, adjust the nozzles to allow for enough kic



zles to prevent streaking in spray coverage. Nozzles can be rotated to adjust distance of spray pattern outward or amount of kickback under the nozzle.

### **Full Pattern Spray Nozzles**

All Full Pattern Spray Nozzles were tested at a height of 36 inches. (Recommended operating height is between 18 & 48 inches.) These nozzles are designed to provide a full left-hand to right-hand spray pattern from a single centrally mounted nozzle.



### **Roadside Spray Nozzles**

All Roadside Spray Nozzles were tested at a height of 36 inches. (Recommended operating height is between 18 & 48 inches.) These nozzles are designed for right-hand mounting ONLY and provide a wide spray pattern without kickback under the nozzle. These nozzles are designed for road-side and right-of-way spraying.



### **Spraying Safety**

ALWAYS WEAR PROTECTIVE CLOTHING WHEN SPRAYING AND / OR HANDLING ANY AND ALL CHEMICALS.



### **Nozzle Installation Tips and Operation**

#### **Nozzle Height Adjustment**

Nozzles can be used at various heights within the recommended range. However, this will affect the spray pattern width and the gallons per acre (GPA) applied.

#### **Multi-Pass Spraying**

When multi-pass spraying, be sure to overlap the ends of spray patterns 12 - 16 inches to ensure even coverage.



#### **Adverse Wind Conditions**

With boomless spray nozzles, as with other spraying methods, high or gusty wind conditions can cause drifting or pattern movements, adversely affecting spray coverage. If this occurs, wait for more favorable conditions before continuing.

#### **Plumbing Requirements**

Make sure that all plumbing and feed lines can properly supply the nozzle or nozzles at their rated GPM and PSI. The type of pump used and the length of the discharge hose will affect the volume and pressure delivered to the nozzle or nozzles.

#### Minimum hose size requirements are

1 - 1/4" MNPT Nozzle1/2" ID Hose	2 - 1/4" MNPT Nozzles5/8" ID Hose
1 - 1/2" MNPT Nozzle3/4" ID Hose	2 - 1/2" MNPT Nozzles1" ID Hose
1 - 1" MNPT Nozzle1-1/4" ID Hose	2 - 1" MNPT Nozzles1-1/2" ID Hose

### **Nozzle Mounting Center Distance**

To insure proper kickback overlap between the two nozzles and spray distance outward when mounting a pair of regular pattern nozzles together these are the recommended nozzle center distances.

2 - 1/4" Nozzles	3" - 4" Center Distance
2 - 1/2" Nozzles	6" - 7" Center Distance
2 - 1" Nozzles	8" - 9" Center Distance

#### Nozzle Combinations for Roadside and Right-of-Way Spraying

Nozzle Combination	Speed	Nozzle Combination
1 - 1255 Right	5 to 15 MPH	1 - 1876 Right
1 - 1871 Right		1 - 2651 Right
1 - 2650RS		1 - 3750RS
	1 - 1255 Right 1 - 1871 Right	1 - 1255 Right 5 to 15 MPH 1 - 1871 Right

For roadside and right-of-way spraying at these speeds, nozzles with patterns of 6 feet or less should be mounted 12" - 24" above the ground. Larger patterns should be mounted 18" - 48" above the ground.

### **Nozzle Spray Coverage Calculations**

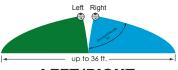
Gallons per 1,000 sq. ft.	=	GPM x 136  MPH x Spray width in inches
Gallons per Acre	=	GPM x 5940  MPH x Spray width in inches

## IINATOR

**ECO SERIES Spray Nozzles**All Eco Series Spray Nozzles were tested at a height of 36 inches. (Recommended operating height is between 12 & 36 inches.) Fresh water used for all testing.



### **SPRAY NOZZLES**

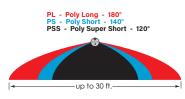


### LEFT/RIGHT **COMBINATION**

When Ordering, Please Specify **LEFT** or **RIGHT** Spray Pattern.

Example: 1200PSR = Right 1200PSL = Left

	•				0.00	G. G. G. G.			.9.	
1200PSL (Left)						SP	EED (MI	PH)		
1200PSR (Right)			SPRAY	1	2	3	4	5	6	7
	PSI	GPM	PATTERN			GALLO	NS PER	RACRE		
	20	1.0	14 ft.	35	18	12	9	7	6	5
	30	1.2	14 ft.	42	21	14	10	8	7	6
1/4" MNPT	40	1.4	14 ft.	49.5	25	16.5	12	10	8	7
1400PSL (Left)						SP	EED (MI	PH)		
1400PSR (Right)			SPRAY	1	2	3	4	5	6	7
	PSI	GPM	PATTERN			GALLO	NS PER	RACRE		
	20	1.7	15 ft.	56	28	19	14	11	9	8
	30	2.0	15 ft.	66	33	22	16.5	13	11	9.5
1/4" MNPT	40	2.5	15 ft.	82.5	41	27.5	20.5	16.5	13.5	12
1870PSL (Left)						SP	EED (MI	PH)		
1870PSR (Right)			SPRAY	1	2	3	4	5	6	7
	PSI	GPM	PATTERN			GALLO	NS PER	R ACRE		
	20	3.0	18 ft.	82	41	28	21	17	14	12
	30	3.5	18 ft.	96	48	32	24	19	16	14
1/4" MNPT	40	4.3	18 ft.	118	59	39	30	24	20	17



### **FULL PATTERN SPRAY NOZZLES**

1200	PSS				SPEED (MPH)								
FULL PA				SPRAY	1	2	3	4	5	6	7		
08		PSI	GPM	PATTERN			GALLO	NS PEF	ACRE				
	The same of the sa	15	0.9	10 ft.	44.5	22	15	11	9	7.5	6		
110		20	1	10 ft.	49.5	25	16.5	12	10	8	7		
1/4" N	INPT	25	1.1	10 ft.	54.5	27	18	13.5	11	9	7.5		
1200	PS						SPI	EED (MI	PH)				
FULL PA	TTERN			SPRAY	1	2	3	4	5	6	7		
		PSI	GPM	PATTERN			GALLO	NS PEF	RACRE				
1170		20	1.0	14 ft.	35	18	12	9	7	6	5		
of.		30	1.2	14 ft.	42	21	14	10	8	7	6		
1/4" N	INPT	40	1.4	14 ft.	49.5	25	16.5	12	10	8	7		
1400	PS						SPI	EED (MI	PH)				
FULL PA	TTERN			SPRAY	1	2	3	4	5	6	7		
		PSI	GPM	PATTERN			GALLO	NS PEF	R ACRE				
1170		20	1.7	14 ft.	60	30	20	15	12	10	8.5		
al		30	2.0	14 ft.	70	35	24	18	14	12	10		
1/4" N	INPT	40	2.5	14 ft.	88	44	29	22	18	15	12.5		
1400	PL						SPI	EED (MI	PH)				
FULL PA	TTERN			SPRAY	1	2	3	4	5	6	7		
OF.	(A)	PSI	GPM	PATTERN			GALLO	NS PEF	R ACRE				
1	NAME OF THE PARTY	20	2.0	25 ft.	49.5	25	16.5	12	10	8	7		
1		30	2.4	25 ft.	60	30	20	15	12	10	8.5		
1/4" N	INPT	40	2.8	25 ft.	70	35	23	17	14	11.5	10		



4	SPEED (MPH)													
RN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PEF	R ACRE				
	20	3.0	30 ft.	25	17	12	10	8	7	6	5.5	5	4.5	4
	30	3.5	30 ft.	29	19	14	12	10	8	7	6	5.5	5	4.5
Т	40	4.3	30 ft.	36	25	18	14	12	10	9	8	7	6.5	6

### SHORT Pattern Directional Spray Nozzles

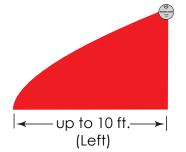
When Ordering, Please Specify *LEFT* or *RIGHT* Spray Pattern. Examples: 1165L = LEFT Pattern 1165R = RIGHT Pattern

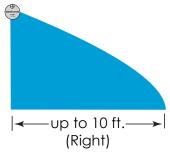


### **Short Pattern Spray Nozzles**

All Short Pattern Spray Nozzles were tested at a height of 18 inches. (Recommended operating height is between 12 & 36 inches.) Fresh water used for all testing.

These nozzles are designed for left-hand or right-hand mounting and provide an outward to straight downward spray pattern.





							•	0.71	/					
1165L (Left)								SP	EED (MI	PH)				
1165R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	R ACRE				
6 3	20	1.0	5 ft.	49.5	33	24.5	20	16.5	14	12	11	10	9	8
acat .	30	1.2	5 ft.	59.5	39.5	30	23.5	20	17	15	13	12	11	10
1/4" MNPT	40	1.4	5 ft.	69.5	46	34.5	27.5	23	20	17	15.5	14	12.5	11.5
1253L (Left)								SP	EED (MI	PH)				
1253R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	R ACRE				
( 3	20	1.5	3 ft.	124	83	62	50	41	35	31	28	25	23	21
The state of the s	30	1.7	3 ft.	140	94	70	56	47	40	35	31	28	26	23
1/4 MNPT	40	2.0	3 ft.	165	110	83	66	55	47	41	37	33	30	28
1255L (Left)								SP	EED (MI	PH)				
1255R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	R ACRE				
63	20	1.5	5 ft.	74	50	37	30	25	21	19	17	15	14	12
account of the same of the sam	30	1.7	5 ft.	84	56	42	34	28	24	21	19	17	15	14
1/4" MNPT	40	2.0	5 ft.	99	66	50	40	33	28	25	22	20	18	17
1404L (Left)								SP	EED (MI	PH)				
1404R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	R ACRE				
The same of the sa			. 4.	105	70	53	42	35	30	26	23	21	19	18
3	20	1.7	4 ft.	105	70	55	42	33	30	20	25		19	10
9	20 30	1.7 2.0	4 ft.	124	83	62	50	41	35	31	28	25	23	21

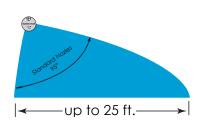
### SHORT Pattern Diretional Spray Nozzles

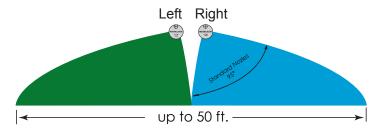
When Ordering, Please Specify LEFT or RIGHT Spray Pattern. Example - 2651L = Left Pattern

1406L (Left)								SPI	EED (MF	PH)				
1406R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
63	20	1.7	6 ft.	70	47	35	28	23	20	18	16	14	13	12
1000 C	30	2.0	6 ft.	83	55	41	33	28	24	21	18	17	15	14
1/4 MNPT	40	2.5	6 ft.	103	69	52	41	34	30	26	23	21	19	17
1876L (Left)		_	_		-	-	-	SDI	EED (MF	DH/		_	-	
1876R (Right)							_							
			SPRAY	2	3	4	5	6	7	8	9	10	11	12
Tra Ca	PSI	GPM	PATTERN	10.4	00		50		NS PEF		00	0.5		01
1 acceptance	20	3.0	6 ft.	124	83	62	50	41	35	31	28	25	23	21
1/4" MNIDT	30 40	3.5 4.3	6 ft. 6 ft.	144 177	96 118	72 89	58 71	48 59	41 51	36 44	32 39	29 35	26 32	24 30
1/4" MNPT	40	4.3	o II.	1//	110	69	/1		<b>3</b> 1	44	39	35	32	30
1871L (Left)								SPI	EED (MF	PH)				
1871R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
3	20	3.0	10 ft.	74	50	37	30	25	21	19	17	15	14	13
	30	3.5	10 ft.	87	58	43	35	29	25	22	19	17	16	15
1/4" MNPT	40	4.3	10 ft.	106	71	53	43	35	30	27	24	21	19	18
2651L (Left)								SPI	EED (MF	PH)				
2651R (Right)				2	3	4	5	6	7	8	9	10	11	12
	PSI	CDM	SPRAY		3		J		NS PEF		3	10		12
511/30	20	GPM 6.7	PATTERN 10 ft.	166	111	83	66	55	47	41	37	33	30	28
accentates.	30	7.5	10 ft.	186	124	93	74	62	53	46	41	37	34	31
1/2" MNPT	40	8.5	10 ft.	210	140	105	84	70	60	53	47	42	38	35
		0.0					<u> </u>							
3121L (Left)								SPI	EED (MF	PH)				
3121R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
57 da	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
300	20	7.2	10 ft.	178	119	89	71	59	51	45	40	36	32	30
	30	9.0	10 ft.	223	149	111	89	74	64	56	50	45	41	37
1/2" MNPT	40	10.6	10 ft.	262	175	131	105	87	75	66	58	52	48	44
3751L (Left)								SPI	EED (MF	PH)				
3751R (Right)			CDDAV	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	SPRAY PATTERN					GALLO	NS PEF					
33	20	12	10 ft.	297	198	148.5	119	99	85	74	66	59.5	54	49.5
Second Second	30	14	10 ft.	346.5	231	173	138.5	115.5	99	86.5	77	69	63	58
1/2" MNPT	40	15	10 ft.	371	247.5	185.5	148.5	124	106	93	82.5	74	67.5	62
								e Di	EED /MI	э <b>н</b> )				
4371L (Left) 4371R (Right)									EED (MF				4-	1.5
137 m (mgm.)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
6 (39)	PSI	GPM	PATTERN		04.5.	, a -	465 -		NS PEF					
- CONTROL OF	20	13.0	10 ft.	322	214.5	161	128.5	107	92	80.5	71.5	64	58.5	53.5
1/0// 1/10/7	30	15.5	10 ft.	383.5	256	192	153.5	128	109.5	96	85	76.5	70	64
1/2" MNPT	40	17.5	10 ft.	433	289	216.5	173	144.5	124	108	96	86.5	79	72

### REGULAR Pattern Directional Spray Nozzles

When Ordering, Please Specify *LEFT* or *RIGHT* Spray Pattern. Examples: 1870L = LEFT Pattern 1870R = RIGHT Pattern





### **Regular Pattern Spray Nozzles**

All Regular Pattern Spray Nozzles were tested at a height of 36 inches. (Recommended operating height is between 18 & 48 inches.) Fresh water used for all testing.

These nozzles are designed for left-hand or right-hand mounting and provide a wide spray pattern with approximately 15° of kickback under the nozzle.

When using left-hand and right-hand nozzle together, adjust nozzles to allow for enough kickback overlap between the nozzles to prevent streaking in spray coverage.

Nozzles can be rotated to adjust distance of spray pattern outward or amount of kickback under the nozzle.

1160L (Left)						SPEED	(MPH)			6				
1160R (Right)			SPRAY	2	3	4	5	6	7	@	aren			
	PSI	GPM	PATTERN		GA	LLONS	PER AC	RE		1	D'			
6 3	20	1.0	16 ft.	15.5	10	8	6	5	4.5	1				
	30	1.2	16 ft.	18.5	12.5	9	7.5	6	5.5					
1/4" MNPT	40	1.4	16 ft.	21.5	14.5	11	8.5	7	6					
1250L (Left)						SPEED	(MPH)							
1250R (Right)			000.01	2	3	4	5	6	7	79163				
	PSI	GPM	SPRAY PATTERN			LLONS	PER AC			- ///3				
63	20	1.5	16 ft.	23	16	12	9	8	7	- ///				
account.	30	1.7	16 ft.	26	18	13	11	9	8	- 14				
1/4" MNPT	40	2.0	16 ft.	31	21	16	12	10	9					
1400L (Left)								SP	EED (MI	PH)				
1400R (Right)				2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	SPRAY PATTERN		3	-	5		NS PEF		9	10		12
960	20	1.7	17 ft.	25	17	12	10	8	7 7	6	5.5	5	4.5	4
accentation	30	2.0	17 ft.	30	19	15	12	10	8	7	6.5	6	5	4.5
1/4" MNPT	40	2.5	17 ft.	36	24	18	15	12	10	9	8	7	6.5	6
										-				
1870L (Left)								SP	EED (MI	PH)				
1870R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
A STATE	20	3.0	18 ft.	41	28	21	17	14	12	10	9	8	7.5	7
	30	3.5	18 ft.	48	32	24	19	16	14	12	11	10	9	8
1/4" MNPT	40	4.3	18 ft.	59	39	30	24	20	17	15	13	12	11	10

### REGULAR Pattern Directional Spray Nozzles

When Ordering, Please Specify *LEFT* or *RIGHT* Spray Pattern. Examples: 1870L = LEFT Pattern 1870R = RIGHT Pattern

2280L (Left)								SPI	EED (MI	PH)				
2280R (Right)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	RACRE				
30	20	4.8	18 ft.	66	44	33	26	22	19	16	14	13	12	10
MCC ALP	30	6.0	18 ft.	83	55	41	33	28	24	21	18	16	15	14
1/2" MNPT	40	6.9	18 ft.	95	63	47	38	31	27	24	21	19	17	16
2650L (Left)								SPI	EED (MI	PH)				
2650R (Right)			000 AV	2	3	4	5	6	7	8	9	10	11	12
5	PSI	GPM	SPRAY PATTERN	_		_			NS PER			10		
33	20	6.7	20 ft.	83	55	41	33	28	24	21	18	16	15	14
BOOK	30	7.5	20 ft.	93	62	46	37	32	26	23	20	18	17	15
1/2" MNPT	40	8.5	20 ft.	105	70	52	42	35	30	26	23	21	19	17
3120L (Left)								SPI	EED (MI	PH)				
3120R (Right)				2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	SPRAY PATTERN	_					NS PER			10		12
33	20	7.2	21 ft.	85	56	42	34	28	24	21	19	17	15	14
BOOK	30	9.0	21 ft.	106	71	53	42	35	30	26	23	21	19	17
1/2" MNPT	40	10.6	21 ft.	125	83	62	50	41	36	31	28	25	23	21
3750L (Left)		-			-			SDI	EED (MI	DH/				
3750E (Eeft)				2		4	_		`		_	10	-11	12
	DOL	ODM	SPRAY	2	3	4	5	6	7 ONS PER	8	9	10	11	12
100	PSI 20	GPM 12.0	PATTERN 23 ft.	129	86	64	51	43	37	32	29	26	24	22
BEREITE	30	15.0	23 ft.	161	108	81	64	54	46	40	36	32	29	27
1/2" MNPT	40	16.3	23 ft.	175	117	88	70	58	50	44	39	35	32	29
4370L (Left) 4370R (Right)				_	_				EED (MI		_			
g,			SPRAY	2	3	4	5	6	7	8	9	10	11	12
600	PSI	GPM	PATTERN	407	01	00			NS PER		20	07	0.5	
ROCCEPATOR	20	13.8	25 ft.	137	91	68	54 62	45 51	39	34	30	27 31	25	23
1/2" MNPT	30 40	15.6 18	25 ft. 25 ft.	154 178	103 119	77 89	71	59	44 51	39 45	34 40	35	28 33	26 30
	40	10	25 11.	170	119	09					40	33	33	
5000L (Left) 5000R (Right)								SP	EED (MI	PH)				
SOUCH (HIGHT)			SPRAY	2	3	4	5	6	7	8	9	10	11	12
600	PSI	GPM	PATTERN						NS PER					
- Constant	20	17	25 ft.	168	112	84	67	56	48	42	37	34	31	28
	30	20	25 ft.	198	132	99	79	66	57	50	44	40	36	33
1" MNPT	40	23	25 ft.	228	152	114	91	76	65	57	51	46	41	38
6250L (Left)								SP	EED (MI	PH)				
6250R (Right)			SPRAY	4	6	8	10	12	14	16	18	20	22	24
5	PSI	GPM	PATTERN					GALLO	NS PER	RACRE				
- Care	20	21	25 ft.	104	69	52	42	35	30	26	23	21	19	17
	30	25	25 ft.	124	83	62	50	41	35	31	28	25	23	21
1" MNPT	40	29	25 ft.	144	96	72	57	48	41	36	32	29	26	24
1" MNPT	40	29	25 ft.	144	96	72	57	48	41	36	32	29	26	24

### FULL Pattern Spray Nozzles

### **Full Pattern Spray Nozzles**

All Full Pattern Spray Nozzles were tested at a height of 36 inches. (Recommended height is between 18 & 48 inches.) Fresh water used for all testing.

These nozzles are designed to provide a full left-hand to right-hand spray pattern from a single centrally mounted nozzle.

FL - Full Long - 180° FM - Full Medium - 160° FS - Full Short - 140° FSS - Full Super Short - 120°



1250FS						SP	EED (MI	PH)									
FULL PATTERN			SPRAY	1	2	3	4	5	6	7							
	PSI	GPM	PATTERN			GALLO	NS PER	RACRE				2 1/th					
3	20	1.5	16 ft.	46	23	16	12	8	7.5	6.5		26	3-8				
	30	1.7	16 ft.	53	26	18	13	11	9	8				de 12			
1/4" MNPT	40	2.0	16 ft.	62	31	21	16	12	10	9			P. HIVE	Mill L			
1400FS								SPI	EED (MI	PH)							
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12			
	PSI	GPM	PATTERN					GALLO	NS PEF	RACRE							
3	20	1.7	17 ft.	25	17	12	10	8	7	6	5.5	5	4.5	4			
	30	2.0	17 ft.	29	19	15	12	10	8	7	6.5	6	5	4.5			
1/4" MNPT	40	2.5	17 ft.	36	24	18	15	12	10	9	8	7	6.5	6			
1400FM								SPI	EED (MI	PH)							
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12			
	PSI	GPM	PATTERN					GALLO	NS PEF	R ACRE			4 05 0				
3	20	1.7	22 ft.	19	13	10	8	6	5.5	5	4.5	4	3.5	3			
	30	2.0	22 ft.	23	15	11	9	8	6	5.5	5	4.5	4	3.5			
1/4" MNPT	40	2.5	22 ft.	28	19	14	11	9	8	7	6	5.5	5	4.5			
1870FSS								SPI	EED (MI	PH)							
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12			
	PSI	GPM	PATTERN					GALLO	NS PEF	R ACRE							
9	20	3.0	10 ft.	74.5	49.5	37	29.5	25	21	18.5	16.5	15	13.5	12.5			
	30	3.5	10 ft.	86.5	57.5	43	34.5	28.5	25	21.5	19	17	16	14.5			
1/4" MNPT	40	4.3	10 ft.	106.5	71	53	42.5	35.5	30.5	26.5	23.5	21	19	17.5			
1870FS					SPEED (MPH)												
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12			
	PSI	GPM	PATTERN					GALLO	NS PER	R ACRE							
6 3	20	3.0	18 ft.	41	28	21	17	14	12	10	9	8	7.5	7			
	30	3.5	18 ft.	48	32	24	19	16	14	12	11	10	9	8			
1/4" MNPT	40	4.3	18 ft.	59	39	30	24	20	17	15	13	12	11	10			

### **FULL Pattern Spray Nozzles**

1870FM				SPEED (MPH)										
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	RACRE				
(3)	20	3.0	23 ft.	32	22	16	13	10	9	8	7	6.5	6	5
	30	3.5	23 ft.	38	25	19	15	13	11	9	8	7.5	7	6
1/4" MNPT	40	4.3	23 ft.	46	31	23	19	15	13	12	10	9	8	7.5
1870FL								SPI	EED (MI	PH)				
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	RACRE				
3	20	3.0	30 ft.	25	17	12	10	8	7	6	5.5	5	4.5	4
	30	3.5	30 ft.	29	19	14	12	10	8	7	6	5.5	5	4.5
1/4" MNPT	40	4.3	30 ft.	36	25	18	14	12	10	9	8	7	6.5	6
0000EN4	-	-	_		-	-	-	SDI	EED (MI	DH)	-	-	-	
2280FM							_					10	44	10
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
30	PSI	GPM	PATTERN		0.4	00	0.1		NS PER		44	10		0.5
RECORDER TO	20	4.8	23 ft.	52	34	26	21	17	15	13	11	10	9	8.5
1/OU MANDT	30	6.0	23 ft.	64	43	32	26	21	18	16	14	13	12	11
1/2" MNPT	40	6.9	23 ft.	74	50	37	30	25	21	19	16.5	15	13.5	12
2280FL				SPEED (MPH)										
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	RACRE				
30	20	4.8	30 ft.	40	26	20	16	13	11	10	9	8	7	6.5
Mary and a	30	6.0	30 ft.	49.5	33	25	20	16.5	14	12	11	10	9	8
1/2" MNPT	40	6.9	30 ft.	57	38	28	22	19	16	14	12.5	11	10	9.5
									/					_
2650FSS								SPI	EED (MI	PH)				
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
100	PSI	GPM	PATTERN					GALLO	NS PER	RACRE				
BOOM	20	6.7	10 ft.	166	110.5	83	66.5	55	47.5	41.5	37	33	30	27.5
	30	7.5	10 ft.	185	124	93	74	62	53	46.5	41	37	34	31
1/2" MNPT	40	8.5	10 ft.	210	140	105	84	70	60	52.5	47	42	38	35
265056								SPI	EED (MI	PH)				
FULL PATTERN				2	3	4	5	6	7	8	9	10	11	12
TOLLTATILING	PSI	GPM	SPRAY PATTERN						NS PER					12
00	20	6.7	16 ft.	104	69	52	41	34.5	30	26	23	21	19	17
acception	30	8.0	16 ft.	124	82.5	52	50	41	35	31	27.5	25	22.5	21
1/2" MNPT	40	10.0	16 ft.	155	103	77	62	51.5	44	39	34	31	28	26
1/2	-10	1010	10 111	100	100		02	0.10		00	04	0.		20
2650FM								SPI	EED (MI	PH)				
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PER	R ACRE				
TO STATE OF THE PARTY OF THE PA	20	6.7	23 ft.	72	48	36	29	24	20.5	18	16	14	13	12
	30	8.0	23 ft.	86	57	43	34	29	24.5	21.5	19	17	16	14
1/2" MNPT	40	10.0	23 ft.	108	72	54	43	36	31	27	24	21.5	19.5	18

### **FULL Pattern Spray Nozzles**

								<u> </u>						
2650FL								SP	EED (MI	PH)				
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
- CONTROL	20	6.7	38 ft.	43.5	29	22	17.5	14.5	12.5	11	10	9	8	7
	30	8.0	38 ft.	52	35	26	21	17	15	13	11.5	10.5	9.5	9
1/2" MNPT	40	10.0	38 ft.	65	43	32.5	26	22	18.5	16	14.5	13	12	11
040050	-				-		-	CD.	EED (MI	э <b>н</b> )			-	
3120FS								5P	EED (MI	2Н)				
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
( a 9	PSI	GPM	PATTERN						NS PEF					
- CONTRACTOR	20	11.3	23 ft.	122	81	61	49	40	37	30	27	24	22	20
	30	13.0	23 ft.	140	93	70	56	47	43	35	31	28	25	23
1/2" MNPT	40	15.0	23 ft.	161	108	81	65	54	50	41	36	32	29	27
2120EM								SP	EED (MI	PH)				
3120FM FULL PATTERN				2	3	4	5	6	7	8	9	10	11	12
- TOEL PAITENIN	PSI	GPM	SPRAY PATTERN		J	7	5		) NS PER		<b>3</b>	10	"	12
(00)	20	11.3	27 ft.	104	69	52	41	35	30	26	23	21	19	17
acceptable .	30	13.0	27 ft.	119	79	60	48	40	34	30	26	24	22	20
1/2" MNPT	40	15.0	27 ft.	138	92	69	55	46	39	34	30	28	25	23
1/2 WHAT	40	10.0	27 10	150	32	03	33	40	33	34	30	20	23	25
3120FL				SPEED (MPH)					PH)					
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
6 6	20	11.3	40 ft.	70	47	35	28	23	20	17.5	15.5	14	13	11.5
800	30	13.0	40 ft.	80	54	40	32	27	23	20	18	16	14.5	13.5
1/2" MNPT	40	15.0	40 ft.	93	62	46.5	37	31	26.5	23	20.5	18.5	17	15.5
0==0=0	-				-		-	CD	EED (MI	nu\	-	-	-	
3750FS						_								
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
(00	PSI	GPM	PATTERN						NS PEF					
1 acceptance	20	13.8	30 ft.	114	76	57	46	38	33	28	25	23	21	19
was a	30	16.4	30 ft.	135	90	68	54	45	39	34	30	27	25	23
1/2" MNPT	40	18.0	30 ft.	149	99	74	59	50	42	37	33	30	27	25
3750FM								SP	EED (MI	PH)				
FULL PATTERN			ODD AV	2	3	4	5	6	7	8	9	10	11	12
	PSI	GPM	SPRAY PATTERN	_		•	_		NS PEF					
00	20	13.8	40 ft.	85	57	43	34	28	24	21	19	17	16	14
access .	30	16.4	40 ft.	101	68	51	41	34	29	25	23	20	18	17
1/2" MNPT	40	18.0	40 ft.	111	74	56	45	37	32	28	25	23	20	18
=														
4370FL								SP	EED (MI	PH)				
FULL PATTERN			SPRAY	2	3	4	5	6	7	8	9	10	11	12
5	PSI	GPM	PATTERN					GALLO	NS PEF	ACRE				
- CONTRACTOR	20	16.3	44 ft.	92	61	46	37	31	26	23	20	18	17	15
-	30	20.0	44 ft.	113	75	56	45	38	32	28	25	23	20	19
1/2" MNPT	40	24.0	44 ft.	135	90	68	54	45	39	34	30	27	25	23

### **ROADSIDE Pattern Spray Nozzles**

Roadside Nozzles are available in *RIGHT* Spray Pattern models *ONLY*.

All Roadside Pattern Spray Nozzles were tested at a height of 36 inches. (Recommended operating height is between 12 & 48 inches.) Fresh water used for all testing.

rieigiit is bet	WEELL	12 03 40	o inches.)	11631	ı wateı	useu	ioi aii	testing	J.							
1250RS						SPEED	(MPH)							-		
RIGHT ONLY			SPRAY	1	2	3	4	5	6	7	B			2		
	PSI	GPM	PATTERN		GA	LLONS	PER A	CRE			100					
63	20	1.5	16 ft.	46	23	16	12	9	8	7	- 500					
accentate .	30	1.7	16 ft.	53	26	18	13	11	9	8	The same					
1/4" MNPT	40	2.0	16 ft.	62	31	21	16	12	10	9	100					
1400RS								SPI	EED (MI	PH)						
RIGHT ONLY			0000	2	3	4	5	6	7	8	9	10	11	12		
	PSI	GPM	SPRAY PATTERN	_		_			NS PER							
60	20	1.7	17 ft.	25	17	12	10	8	7	6	5.5	5	4.5	4		
accentance.	30	2.0	17 ft.	30	19	15	12	10	8	7	6.5	6	5	4.5		
1/4" MNPT	40	2.5	17 ft.	36	24	18	15	12	10	9	8	7	6.5	6		
											-	-		-		
1870RS					_		_		EED (MI		_					
RIGHT ONLY			SPRAY	2	3	4	5	6	7	8	9	10	11	12		
	PSI	GPM	PATTERN						NS PER							
16 3	20	3	18 ft.	41	28	21	17	14	12	10	9	8	7.5	7		
	30	3.5	18 ft.	48	32	24	19	16	14	12	11	10	9	8		
1/4" MNPT	40	4.3	18 ft.	59	39	30	24	20	17	15	13	12	11	10		
2650RS								SPI	EED (MI	(MPH)						
RIGHT ONLY			SPRAY	2	3	4	5	6	7	8	9	10	11	12		
5	PSI	GPM	PATTERN					GALLO	NS PER	RACRE						
33	20	6.7	20 ft.	83	55	41	33	28	24	21	18	16	15	14		
BOOK	30	7.5	20 ft.	93	62	46	37	32	26	23	20	18	17	15		
1/2" MNPT	40	8.5	20 ft.	105	70	52	42	35	30	26	23	21	19	17		
240000		-	_		-	-		SDI	EED (MI	DH)			-			
3120RS												10	44	10		
RIGHT ONLY			SPRAY	2	3	4	5	6	7	8	9	10	11	12		
C 2/9	PSI	GPM	PATTERN						NS PER							
- SCHOOL STATE	20	7.2	21 ft.	85	56	42	34	28	24	21	19	17	15	14		
4/0// MANIOT	30	9	21 ft.	106	71	53	42	35	30	26	23	21	19	17		
1/2" MNPT	40	10.6	21 ft.	125	83	62	50	41	36	31	28	25	23	21		
3750RS								SP	EED (MI	PH)						
RIGHT ONLY			SPRAY	2	3	4	5	6	7	8	9	10	11	12		
5	PSI	GPM	PATTERN					GALLO	NS PER	RACRE						
33	20	12	23 ft.	129	86	64	51	43	37	32	29	26	24	22		
access of the same	30	15	23 ft.	161	108	81	64	54	46	40	36	32	29	27		
1/2" MNPT	40	16.3	23 ft.	175	117	88	70	58	50	44	39	35	32	29		
4370RS								SP	EED (MI	PH)						
RIGHT ONLY				2	3	4	5	6	7	8	9	10	11	12		
- HIGHT ONLY	PSI	GPM	SPRAY	-	3	7	J		NS PER		J	10	**	12		
10	20	13.8	PATTERN 25 ft.	137	91	68	54	45	39	34	30	27	25	23		
BOOM	30	15.6	25 ft.	154	103	77	62	51	44	39	34	31	28	26		
1/2" MNPT	40	18	25 ft.	178	119	89	71	59	51	45	40	35	33	30		
-1/2 WINF1	40	10	23 II.	1/0	113	03	/ 1	23	J1	40	40	33	33	30		



## TROUBLESHOOTING GUIDE

PROBLEM	CAUSE	REMEDY				
	1. Spray pressure too low	1. Re-adjust spray pressure				
	2. Nozzle mounted too low	Verify/adust nozzle mounting height     Verify plumbing size. Replace if needed.				
- SPRAY PATTERN TOO SHORT	3. Plumbing components and lines too small	4. Verify pump size. Replace if needed.				
	4. Spray pump too small					
	1. Spray pressure too low	1. Re-adjust spray pressure				
- END OF SPRAY PATTERN TOO HEAVY	2. Plumbing components and lines too small	2. Verify plumbing size. Replace if needed.				
	3. Spray pump too small	3. Verify pump size. Replace if needed.				
	1. Spray pressure too high	1. Re-adjust spray pressure				
- CENTER OF SPRAY PATTERN TOO LIGHT	2. Spray pressure too low	2. Re-adjust spray pressure				
	3. Spray pump too small	3. Verify pump size. Replace if needed.				
	1. Spray pressure too low	1. Re-adjust spray pressure				
- SPRAY PATTERN DOES NOT MEET IN THE MIDDLE.	2. Plumbing components and lines too small	2. Verify plumbing size. Replace if needed.				
(for LEFT/RIGHT combination)	3. Nozzles spacing too great	Refer to nozzle spacing chart on Page 3.     Adjust as needed.				
	4. Incorrect nozzle alignment	4. Adjust nozzles for correct spray pattern overlap				
	1. Spray pressure too high	1. Re-adjust spray pressure				
- SPRAY PATTERN TOO LONG	2. Spray nozzle mounter higher than tested height	2. Verify nozzle height. Adjust as needed				
EVOCCOUSE DRIFT OF CREAV PATTERY	1. Spray pressure too high	1. Re-adjust spray pressure				
- EXCESSIVE DRIFT OR SPRAY PATTERN SHIFT	2. Adverse wind conditions	2. Wait for wind conditions to improve				

