

WESTERN KANSAS IRRIGATION

SEPTEMBER 22, 2025

WISH-119609

CUSTOMER : M & G FARMS

LINDSAY GEN II - 30 UNDERSLUNG
7 TOWER - 1300.47 FT
SYSTEM 300 GPM @ 14 PSI

LEGAL : NW 1/4 6-28-40
P.O. NO. : INV169951

SENNINGER HD LOW DRIFT SPRAY NOZZLES
SENNINGER 10 & 6 PSI REGULATORS
NO ENDGUN
ELEVATION 5 FT UP, 5 FT DOWN

125 N. FRONTAGE ROAD
JOHNSON, KANSAS 67855
(620)492-2362

WARRANTY

WATER APPLICATION UNIFORMITY OBTAINED WITH THIS SYSTEM CAN BE ADVERSELY AFFECTED BY MANY VARIABLES INCLUDING THE IMPROPER MAKEUP OR INSTALLATION OF THE SPRINKLER OR SPRAY NOZZLE PACKAGE, OBSTRUCTED NOZZLES, MAINTAINING INCORRECT PIVOT PRESSURE, UNFAVORABLE CLIMATIC CONDITIONS, TIGHT AND/OR SLOPING SOILS, IMPROPER END GUN ARC SETTINGS, ERRATIC AND IMPROPER OPERATING SPEED OF THE SYSTEM, POOR QUALITY OF WATER WITH ABRASIVES, CORROSIVES, AND/OR SOLIDS WHICH CAN CAUSE PLUGGING AND JAMMING, AS WELL AS INHERENT VARIABLES IN THE MANY COMPONENTS COMPRISING THE SYSTEM. THEREFORE WESTERN IRRIGATION SUPPLY HOUSE, INC., MAKES NO WARRANTY AS TO THE UNIFORMITY OF COVERAGE OBTAINED FROM THIS WATER APPLICATION PRINTOUT OTHER THAN ITS MATHEMATICAL ACCURACY.

IT IS THE RESPONSIBILITY OF THE END USER TO DETERMINE IF ANY INCOMPATIBILITY EXISTS BETWEEN THE WATER DISTRIBUTION DEVICES AND THE CROP, THE SOIL, AND THE PHYSICAL STRUCTURE OF THE MECHANICAL MOVE SYSTEM. WESTERN IRRIGATION SUPPLY HOUSE, INC., THEREFORE, DISCLAIMS ANY LIABILITY FOR DAMAGES DUE TO FAILURE OF THE SYSTEM TO PERFORM AS CONTEMPLATED.

FIGURES PRESENTED ON THIS COMPUTER PRINTOUT ARE BASED ON THE FOLLOWING:

1. DATA FURNISHED TO WESTERN IRRIGATION SUPPLY HOUSE, INC., ON PIPE LENGTH, DIAMETER, SURFACE FINISH, OUTLET SPACINGS, WATER FLOW, PIVOT PRESSURE AND ALL OTHER APPLICABLE INFORMATION.
2. THERE IS 100% WATER APPLICATION EFFICIENCY (ZERO WIND VELOCITY AND NO EVAPORATION).
3. PIVOT PRESSURE IS MEASURED ON THE MAIN HORIZONTAL DISTRIBUTION PIPE JUST AFTER THE LAST ELBOW.
4. MAIN PIPE PRESSURE IS CALCULATED AS IF THE PIVOT IS ALWAYS ON LEVEL GROUND.
5. SPRINKLER OR SPRAY NOZZLE BASE PRESSURE MAY BE LESS THAN MAIN LINE PIPE PRESSURE DUE TO THE USE OF PRESSURE REGULATORS. WHERE DROP PIPES ARE USED THE STATIC HEAD IS ADDED TO AND FRICTION LOSS IS SUBTRACTED FROM THE MAIN LINE PIPE PRESSURE TO DETERMINE INLET PSI. REGULATORS ARE CONSIDERED MOUNTED AT THE SAME HEIGHT AS THE SPRINKLING DEVICE UNLESS NOTED.

LINDSAY GEN II - 30 UNDERSLUNG		SEPTEMBER 22, 2025		WISH-119609			
<u>DEALER</u>		<u>IRRIGATOR</u>					
WESTERN KANSAS IRRIGATION		M & G FARMS					
125 N. FRONTAGE ROAD		NW 1/4 6-28-40					
JOHNSON, KANSAS 67855		INV169951					
TOTAL TARGET GPM	300.00	FRICTION FACTOR USED	138	SPAN #	LENGTH	PIPE I.D.	# OF HEADS
TOP OF PIVOT PRESSURE	14.00	TOTAL LENGTH	1300.47	1	181.60	5.84	22
NO ENDGUN		NUMBER OF TOWERS	7	2	179.00	5.84	24
NUMBER OF OUTLETS	530	NUMBER OF SPRINKLERS	236	3	179.00	5.84	36
				4	179.00	5.84	36
SENNINGER HD LOW DRIFT SPRAY NOZZLES - CONCAVE GROOVED PADS				5	179.00	4.28	36
SENNINGER PSR 10 & 6 PSI SERIES REGULATORS				6	179.00	4.28	36
DROPS AVERAGE 8.5 FT OF 3/4 INCH SCHEDULE 80 UV RESISTANT PVC PIPE FIRST TWO SPANS				7	179.00	4.28	36
DROPS AVERAGE 9.5 FT OF 3/4 INCH SCHEDULE 80 UV RESISTANT PVC PIPE BALANCE				OH	44.87	4.28	10
ELEVATION IS 5 FT UP AND 5 FT DOWN							

CAUTIONS AND WARNINGS

1. Over watering at beginning of system due to practical limitations on smallest nozzle sizes available and/or allowable for proper operation.

2. When using spray nozzles with five foot ground clearance or less, nozzle should travel between crop rows and spacing should not exceed 80 inches.

3. This system designed for minimum pressure. Failure to deliver indicated pressure at the top of pivot point will adversely affect regulator and/or sprinkler/spray performance. Elevations, pipe sizes and type of drop pipe must be as shown.

OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE					SPRK NO.	REG SIZE	PLUG NO.
144	7.34	353.19	1.09	1.04	12.82	11.39	SN	LD	NOZ	6.5	GOLD/LIME	46	SPSR10	
145		355.69	-	-	-	-	-	-	-	-	-	-	-	99
146		358.02	-	-	-	-	-	-	-	-	-	-	-	100
TOWER 2	179.00	360.60												
147		360.92	-	-	-	-	-	-	-	-	-	-	-	101
148	10.31	363.50	0.96	0.96	12.79	7.28	SN	LD	NOZ	7	LIME	47	SPSR06	
149		365.83	-	-	-	-	-	-	-	-	-	-	-	102
150	4.83	368.33	0.63	0.58	12.77	7.29	SN	LD	NOZ	5.5	BEIGE/GOLD	48	SPSR06	
151		370.83	-	-	-	-	-	-	-	-	-	-	-	103
152	4.92	373.25	0.64	0.58	12.65	7.29	SN	LD	NOZ	5.5	BEIGE/GOLD	49	SPSR06	
153		375.67	-	-	-	-	-	-	-	-	-	-	-	104
154	4.92	378.17	0.65	0.71	12.53	7.28	SN	LD	NOZ	6	GOLD	50	SPSR06	
155		380.59	-	-	-	-	-	-	-	-	-	-	-	105
156	4.84	383.01	0.66	0.71	12.41	7.28	SN	LD	NOZ	6	GOLD	51	SPSR06	
157		385.51	-	-	-	-	-	-	-	-	-	-	-	106
158	4.92	387.93	0.67	0.71	12.31	7.28	SN	LD	NOZ	6	GOLD	52	SPSR06	
159		390.35	-	-	-	-	-	-	-	-	-	-	-	107
160	4.92	392.85	0.67	0.71	12.20	7.28	SN	LD	NOZ	6	GOLD	53	SPSR06	
161		395.27	-	-	-	-	-	-	-	-	-	-	-	108
162	4.84	397.69	0.69	0.71	12.11	7.28	SN	LD	NOZ	6	GOLD	54	SPSR06	
163		400.19	-	-	-	-	-	-	-	-	-	-	-	109
164	5.00	402.69	0.69	0.71	12.02	7.28	SN	LD	NOZ	6	GOLD	55	SPSR06	
165		405.02	-	-	-	-	-	-	-	-	-	-	-	110
166	4.81	407.50	0.69	0.71	11.95	7.28	SN	LD	NOZ	6	GOLD	56	SPSR06	
167		409.83	-	-	-	-	-	-	-	-	-	-	-	111
168	4.83	412.33	0.70	0.71	11.88	7.28	SN	LD	NOZ	6	GOLD	57	SPSR06	
169		414.83	-	-	-	-	-	-	-	-	-	-	-	112
170	4.92	417.25	0.72	0.71	11.81	7.28	SN	LD	NOZ	6	GOLD	58	SPSR06	
171		419.67	-	-	-	-	-	-	-	-	-	-	-	113
172	4.92	422.17	0.72	0.71	11.75	7.28	SN	LD	NOZ	6	GOLD	59	SPSR06	
173		424.59	-	-	-	-	-	-	-	-	-	-	-	114
174	4.84	427.01	0.73	0.71	11.70	7.28	SN	LD	NOZ	6	GOLD	60	SPSR06	
175		429.51	-	-	-	-	-	-	-	-	-	-	-	115
176	4.92	431.93	0.74	0.71	11.66	7.28	SN	LD	NOZ	6	GOLD	61	SPSR06	
177		434.35	-	-	-	-	-	-	-	-	-	-	-	116
178	4.92	436.85	0.75	0.71	11.63	7.28	SN	LD	NOZ	6	GOLD	62	SPSR06	
179		439.27	-	-	-	-	-	-	-	-	-	-	-	117
180	4.84	441.69	0.76	0.71	11.60	7.28	SN	LD	NOZ	6	GOLD	63	SPSR06	
181		444.19	-	-	-	-	-	-	-	-	-	-	-	118
182	5.00	446.69	0.77	0.83	11.58	7.28	SN	LD	NOZ	6.5	GOLD/LIME	64	SPSR06	
183		449.02	-	-	-	-	-	-	-	-	-	-	-	119
184	4.81	451.50	0.76	0.71	11.56	7.28	SN	LD	NOZ	6	GOLD	65	SPSR06	
185		453.83	-	-	-	-	-	-	-	-	-	-	-	120
186	4.83	456.33	0.78	0.83	11.56	7.28	SN	LD	NOZ	6.5	GOLD/LIME	66	SPSR06	
187		458.83	-	-	-	-	-	-	-	-	-	-	-	121
188	4.92	461.25	0.80	0.83	11.56	7.28	SN	LD	NOZ	6.5	GOLD/LIME	67	SPSR06	
189		463.67	-	-	-	-	-	-	-	-	-	-	-	122
190	4.92	466.17	0.80	0.83	11.56	7.28	SN	LD	NOZ	6.5	GOLD/LIME	68	SPSR06	

OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE					SPRK NO.	REG SIZE	PLUG NO.
191		468.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	123
192	4.84	471.01	0.81	0.83	11.58	7.28	SN	LD	NOZ	6.5	GOLD/LIME	69	SPSR06	
193		473.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	124
194	4.92	475.93	0.82	0.83	11.60	7.28	SN	LD	NOZ	6.5	GOLD/LIME	70	SPSR06	
195		478.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	125
196	4.92	480.85	0.82	0.83	11.63	7.28	SN	LD	NOZ	6.5	GOLD/LIME	71	SPSR06	
197		483.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	126
198	4.84	485.69	0.84	0.83	11.67	7.28	SN	LD	NOZ	6.5	GOLD/LIME	72	SPSR06	
199		488.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	127
200	5.00	490.69	0.84	0.83	11.71	7.28	SN	LD	NOZ	6.5	GOLD/LIME	73	SPSR06	
201		493.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	128
202	4.81	495.50	0.84	0.83	11.77	7.28	SN	LD	NOZ	6.5	GOLD/LIME	74	SPSR06	
203		497.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	129
204	4.83	500.33	0.85	0.83	11.82	7.28	SN	LD	NOZ	6.5	GOLD/LIME	75	SPSR06	
205		502.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	130
206	4.92	505.25	0.87	0.83	11.89	7.28	SN	LD	NOZ	6.5	GOLD/LIME	76	SPSR06	
207		507.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	131
208	4.92	510.17	0.87	0.83	11.96	7.28	SN	LD	NOZ	6.5	GOLD/LIME	77	SPSR06	
209		512.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	132
210	4.84	515.01	0.88	0.83	12.04	7.28	SN	LD	NOZ	6.5	GOLD/LIME	78	SPSR06	
211		517.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	133
212	4.92	519.93	0.90	0.96	12.13	7.28	SN	LD	NOZ	7	LIME	79	SPSR06	
213		522.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	134
214	4.92	524.85	0.90	0.96	12.23	7.28	SN	LD	NOZ	7	LIME	80	SPSR06	
215		527.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	135
216	4.84	529.69	0.91	0.96	12.33	7.28	SN	LD	NOZ	7	LIME	81	SPSR06	
217		532.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	136
218	5.00	534.69	1.20	1.23	12.32	7.27	SN	LD	NOZ	8	LAVENDER	82	SPSR06	
219		537.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	137
TOWER 3	179.00	539.60												
220		539.92	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	138
221	7.81	542.50	1.20	1.23	12.30	7.27	SN	LD	NOZ	8	LAVENDER	83	SPSR06	
222		544.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	139
223	4.83	547.33	0.93	0.96	12.29	7.28	SN	LD	NOZ	7	LIME	84	SPSR06	
224		549.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	140
225	4.92	552.25	0.95	0.96	12.17	7.28	SN	LD	NOZ	7	LIME	85	SPSR06	
226		554.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	141
227	4.92	557.17	0.95	0.96	12.05	7.28	SN	LD	NOZ	7	LIME	86	SPSR06	
228		559.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	142
229	4.84	562.01	0.96	0.96	11.94	7.28	SN	LD	NOZ	7	LIME	87	SPSR06	
230		564.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	143
231	4.92	566.93	0.98	0.96	11.83	7.28	SN	LD	NOZ	7	LIME	88	SPSR06	
232		569.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	144
233	4.92	571.85	0.98	0.96	11.73	7.28	SN	LD	NOZ	7	LIME	89	SPSR06	
234		574.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	145
235	4.84	576.69	0.99	0.96	11.64	7.28	SN	LD	NOZ	7	LIME	90	SPSR06	
236		579.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	146
237	5.00	581.69	1.00	0.96	11.56	7.28	SN	LD	NOZ	7	LIME	91	SPSR06	

OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE							SPRK NO.	REG SIZE	PLUG NO.
238		584.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	147
239	4.81	586.50	0.99	0.96	11.48	7.28	SN	LD	NOZ	7	LIME			92	SPSR06	
240		588.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	148
241	4.83	591.33	1.01	0.96	11.41	7.28	SN	LD	NOZ	7	LIME			93	SPSR06	
242		593.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	149
243	4.92	596.25	1.03	1.09	11.35	7.27	SN	LD	NOZ	7.5	LIME/LAV			94	SPSR06	
244		598.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	150
245	4.92	601.17	1.03	1.09	11.30	7.27	SN	LD	NOZ	7.5	LIME/LAV			95	SPSR06	
246		603.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	151
247	4.84	606.01	1.04	1.09	11.25	7.27	SN	LD	NOZ	7.5	LIME/LAV			96	SPSR06	
248		608.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	152
249	4.92	610.93	1.05	1.09	11.21	7.27	SN	LD	NOZ	7.5	LIME/LAV			97	SPSR06	
250		613.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	153
251	4.92	615.85	1.05	1.09	11.18	7.27	SN	LD	NOZ	7.5	LIME/LAV			98	SPSR06	
252		618.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	154
253	4.84	620.69	1.07	1.09	11.15	7.27	SN	LD	NOZ	7.5	LIME/LAV			99	SPSR06	
254		623.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	155
255	5.00	625.69	1.07	1.09	11.13	7.27	SN	LD	NOZ	7.5	LIME/LAV			100	SPSR06	
256		628.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	156
257	4.81	630.50	1.06	1.09	11.12	7.27	SN	LD	NOZ	7.5	LIME/LAV			101	SPSR06	
258		632.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	157
259	4.83	635.33	1.08	1.09	11.12	7.27	SN	LD	NOZ	7.5	LIME/LAV			102	SPSR06	
260		637.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	158
261	4.92	640.25	1.10	1.09	11.12	7.27	SN	LD	NOZ	7.5	LIME/LAV			103	SPSR06	
262		642.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	159
263	4.92	645.17	1.10	1.09	11.14	7.27	SN	LD	NOZ	7.5	LIME/LAV			104	SPSR06	
264		647.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	160
265	4.84	650.01	1.11	1.09	11.15	7.27	SN	LD	NOZ	7.5	LIME/LAV			105	SPSR06	
266		652.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	161
267	4.92	654.93	1.13	1.09	11.18	7.27	SN	LD	NOZ	7.5	LIME/LAV			106	SPSR06	
268		657.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	162
269	4.92	659.85	1.13	1.09	11.21	7.27	SN	LD	NOZ	7.5	LIME/LAV			107	SPSR06	
270		662.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	163
271	4.84	664.69	1.15	1.09	11.25	7.27	SN	LD	NOZ	7.5	LIME/LAV			108	SPSR06	
272		667.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	164
273	5.00	669.69	1.15	1.09	11.30	7.27	SN	LD	NOZ	7.5	LIME/LAV			109	SPSR06	
274		672.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	165
275	4.81	674.50	1.14	1.09	11.36	7.27	SN	LD	NOZ	7.5	LIME/LAV			110	SPSR06	
276		676.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	166
277	4.83	679.33	1.16	1.09	11.42	7.27	SN	LD	NOZ	7.5	LIME/LAV			111	SPSR06	
278		681.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	167
279	4.92	684.25	1.18	1.23	11.49	7.27	SN	LD	NOZ	8	LAVENDER			112	SPSR06	
280		686.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	168
281	4.92	689.17	1.18	1.23	11.56	7.27	SN	LD	NOZ	8	LAVENDER			113	SPSR06	
282		691.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	169
283	4.84	694.01	1.19	1.23	11.65	7.27	SN	LD	NOZ	8	LAVENDER			114	SPSR06	
284		696.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	170
285	4.92	698.93	1.20	1.23	11.74	7.27	SN	LD	NOZ	8	LAVENDER			115	SPSR06	

OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE						SPRK NO.	REG SIZE	PLUG NO.
286		701.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	171
287	4.92	703.85	1.20	1.23	11.84	7.27	SN	LD	NOZ	8	LAVENDER		116	SPSR06	
288		706.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	172
289	4.84	708.69	1.22	1.23	11.94	7.27	SN	LD	NOZ	8	LAVENDER		117	SPSR06	
290		711.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	173
291	5.00	713.69	1.60	1.55	11.93	7.26	SN	LD	NOZ	9	GREY		118	SPSR06	
292		716.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	174
TOWER 4	179.00	718.60	PIPE ID CHANGES FROM 5.840 TO 4.280												
293		718.92	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	175
294	7.81	721.50	1.60	1.55	11.87	7.26	SN	LD	NOZ	9	GREY		119	SPSR06	
295		723.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	176
296	4.83	726.33	1.24	1.23	11.83	7.27	SN	LD	NOZ	8	LAVENDER		120	SPSR06	
297		728.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	177
298	4.92	731.25	1.26	1.23	11.69	7.27	SN	LD	NOZ	8	LAVENDER		121	SPSR06	
299		733.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	178
300	4.92	736.17	1.26	1.23	11.54	7.27	SN	LD	NOZ	8	LAVENDER		122	SPSR06	
301		738.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	179
302	4.84	741.01	1.27	1.23	11.40	7.27	SN	LD	NOZ	8	LAVENDER		123	SPSR06	
303		743.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	180
304	4.92	745.93	1.29	1.23	11.27	7.27	SN	LD	NOZ	8	LAVENDER		124	SPSR06	
305		748.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	181
306	4.92	750.85	1.29	1.23	11.15	7.27	SN	LD	NOZ	8	LAVENDER		125	SPSR06	
307		753.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	182
308	4.84	755.69	1.30	1.23	11.03	7.27	SN	LD	NOZ	8	LAVENDER		126	SPSR06	
309		758.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	183
310	5.00	760.69	1.31	1.23	10.92	7.27	SN	LD	NOZ	8	LAVENDER		127	SPSR06	
311		763.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	184
312	4.81	765.50	1.30	1.23	10.82	7.27	SN	LD	NOZ	8	LAVENDER		128	SPSR06	
313		767.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	185
314	4.83	770.33	1.32	1.23	10.73	7.27	SN	LD	NOZ	8	LAVENDER		129	SPSR06	
315		772.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	186
316	4.92	775.25	1.34	1.42	10.64	7.26	SN	LD	NOZ	8.5	LAV/GREY		130	SPSR06	
317		777.67	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	187
318	4.92	780.17	1.34	1.42	10.57	7.26	SN	LD	NOZ	8.5	LAV/GREY		131	SPSR06	
319		782.59	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	188
320	4.84	785.01	1.34	1.42	10.50	7.26	SN	LD	NOZ	8.5	LAV/GREY		132	SPSR06	
321		787.51	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	189
322	4.92	789.93	1.36	1.42	10.43	7.26	SN	LD	NOZ	8.5	LAV/GREY		133	SPSR06	
323		792.35	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	190
324	4.92	794.85	1.36	1.42	10.38	7.26	SN	LD	NOZ	8.5	LAV/GREY		134	SPSR06	
325		797.27	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	191
326	4.84	799.69	1.38	1.42	10.33	7.26	SN	LD	NOZ	8.5	LAV/GREY		135	SPSR06	
327		802.19	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	192
328	5.00	804.69	1.38	1.42	10.29	7.26	SN	LD	NOZ	8.5	LAV/GREY		136	SPSR06	
329		807.02	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	193
330	4.81	809.50	1.37	1.42	10.26	7.26	SN	LD	NOZ	8.5	LAV/GREY		137	SPSR06	
331		811.83	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	194

	OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE							SPRK NO.	REG SIZE	PLUG NO.
TOWER 6	427	4.92	1047.17	1.79	1.73	9.80	7.26	SN	LD	NOZ	9.5	GREY/TURQ		185	SPSR06	243	
	428		1049.59	-	-	-	-	-	-	-	-	-	-	-	-		-
	429	4.84	1052.01	1.80	1.73	9.88	7.26	SN	LD	NOZ	9.5	GREY/TURQ		186	SPSR06		
	430		1054.51	-	-	-	-	-	-	-	-	-	-	-	-		-
	431	4.92	1056.93	1.82	1.91	9.97	7.25	SN	LD	NOZ	10	TURQUOISE		187	SPSR06	244	
	432		1059.35	-	-	-	-	-	-	-	-	-	-	-	-		-
	433	4.92	1061.85	1.81	1.73	10.07	7.26	SN	LD	NOZ	9.5	GREY/TURQ		188	SPSR06	245	
	434		1064.27	-	-	-	-	-	-	-	-	-	-	-	-		-
	435	4.84	1066.69	1.84	1.91	10.17	7.25	SN	LD	NOZ	10	TURQUOISE		189	SPSR06	246	
	436		1069.19	-	-	-	-	-	-	-	-	-	-	-	-		-
	437	5.00	1071.69	2.40	2.47	10.17	7.22	SN	LD	NOZ	11.5	YEL/RED		190	SPSR06	247	
	438		1074.02	-	-	-	-	-	-	-	-	-	-	-	-		-
		179.00	1076.60														248
	439		1076.92	-	-	-	-	-	-	-	-	-	-	-	-	-	
	440	7.81	1079.50	2.38	2.47	10.15	7.22	SN	LD	NOZ	11.5	YEL/RED		191	SPSR06	249	
	441		1081.83	-	-	-	-	-	-	-	-	-	-	-	-		-
	442	4.83	1084.33	1.85	1.91	10.14	7.25	SN	LD	NOZ	10	TURQUOISE		192	SPSR06	250	
	443		1086.83	-	-	-	-	-	-	-	-	-	-	-	-		-
	444	4.92	1089.25	1.87	1.91	10.03	7.25	SN	LD	NOZ	10	TURQUOISE		193	SPSR06	251	
	445		1091.67	-	-	-	-	-	-	-	-	-	-	-	-		-
	446	4.92	1094.17	1.86	1.91	9.91	7.25	SN	LD	NOZ	10	TURQUOISE		194	SPSR06	252	
	447		1096.59	-	-	-	-	-	-	-	-	-	-	-	-		-
	448	4.84	1099.01	1.87	1.91	9.80	7.25	SN	LD	NOZ	10	TURQUOISE		195	SPSR06	253	
	449		1101.51	-	-	-	-	-	-	-	-	-	-	-	-		-
	450	4.92	1103.93	1.89	1.91	9.70	7.25	SN	LD	NOZ	10	TURQUOISE		196	SPSR06	254	
	451		1106.35	-	-	-	-	-	-	-	-	-	-	-	-		-
	452	4.92	1108.85	1.89	1.91	9.61	7.25	SN	LD	NOZ	10	TURQUOISE		197	SPSR06	255	
	453		1111.27	-	-	-	-	-	-	-	-	-	-	-	-		-
	454	4.84	1113.69	1.91	1.91	9.52	7.25	SN	LD	NOZ	10	TURQUOISE		198	SPSR06	256	
	455		1116.19	-	-	-	-	-	-	-	-	-	-	-	-		-
	456	5.00	1118.69	1.91	1.91	9.44	7.25	SN	LD	NOZ	10	TURQUOISE		199	SPSR06	257	
	457		1121.02	-	-	-	-	-	-	-	-	-	-	-	-		-
	458	4.81	1123.50	1.89	1.91	9.37	7.25	SN	LD	NOZ	10	TURQUOISE		200	SPSR06	258	
	459		1125.83	-	-	-	-	-	-	-	-	-	-	-	-		-
	460	4.83	1128.33	1.92	1.91	9.31	7.25	SN	LD	NOZ	10	TURQUOISE		201	SPSR06	259	
	461		1130.83	-	-	-	-	-	-	-	-	-	-	-	-		-
	462	4.92	1133.25	1.94	1.91	9.25	7.25	SN	LD	NOZ	10	TURQUOISE		202	SPSR06	260	
	463		1135.67	-	-	-	-	-	-	-	-	-	-	-	-		-
	464	4.92	1138.17	1.93	1.91	9.20	7.25	SN	LD	NOZ	10	TURQUOISE		203	SPSR06	261	
	465		1140.59	-	-	-	-	-	-	-	-	-	-	-	-		-
466	4.84	1143.01	1.94	1.91	9.16	7.25	SN	LD	NOZ	10	TURQUOISE		204	SPSR06	262		
467		1145.51	-	-	-	-	-	-	-	-	-	-	-	-		-	
468	4.92	1147.93	1.97	1.91	9.13	7.25	SN	LD	NOZ	10	TURQUOISE		205	SPSR06	263		
469		1150.35	-	-	-	-	-	-	-	-	-	-	-	-		-	
470	4.92	1152.85	1.96	1.91	9.10	7.25	SN	LD	NOZ	10	TURQUOISE		206	SPSR06	264		
471		1155.27	-	-	-	-	-	-	-	-	-	-	-	-		-	
472	4.84	1157.69	1.99	1.91	9.08	7.25	SN	LD	NOZ	10	TURQUOISE		207	SPSR06	265		
473		1160.19	-	-	-	-	-	-	-	-	-	-	-	-		-	

OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE					SPRK NO.	REG SIZE	PLUG NO.
474	5.00	1162.69	1.99	2.07	9.07	7.25	SN	LD	NOZ	10.5	TURQ/YEL	208	SPSR06	267
475		1165.02	-	-	-	-	-	-	-	-	-	-	-	
476	4.81	1167.50	1.96	1.91	9.07	7.25	SN	LD	NOZ	10	TURQUOISE	209	SPSR06	268
477		1169.83	-	-	-	-	-	-	-	-	-	-	-	
478	4.83	1172.33	2.00	2.07	9.07	7.25	SN	LD	NOZ	10.5	TURQ/YEL	210	SPSR06	269
479		1174.83	-	-	-	-	-	-	-	-	-	-	-	
480	4.92	1177.25	2.02	2.07	9.08	7.25	SN	LD	NOZ	10.5	TURQ/YEL	211	SPSR06	270
481		1179.67	-	-	-	-	-	-	-	-	-	-	-	
482	4.92	1182.17	2.01	2.07	9.10	7.25	SN	LD	NOZ	10.5	TURQ/YEL	212	SPSR06	271
483		1184.59	-	-	-	-	-	-	-	-	-	-	-	
484	4.84	1187.01	2.02	2.07	9.12	7.25	SN	LD	NOZ	10.5	TURQ/YEL	213	SPSR06	272
485		1189.51	-	-	-	-	-	-	-	-	-	-	-	
486	4.92	1191.93	2.04	2.07	9.16	7.25	SN	LD	NOZ	10.5	TURQ/YEL	214	SPSR06	273
487		1194.35	-	-	-	-	-	-	-	-	-	-	-	
488	4.92	1196.85	2.03	2.07	9.20	7.25	SN	LD	NOZ	10.5	TURQ/YEL	215	SPSR06	274
489		1199.27	-	-	-	-	-	-	-	-	-	-	-	
490	4.84	1201.69	2.06	2.07	9.24	7.25	SN	LD	NOZ	10.5	TURQ/YEL	216	SPSR06	275
491		1204.19	-	-	-	-	-	-	-	-	-	-	-	
492	5.00	1206.69	2.06	2.07	9.30	7.25	SN	LD	NOZ	10.5	TURQ/YEL	217	SPSR06	276
493		1209.02	-	-	-	-	-	-	-	-	-	-	-	
494	4.81	1211.50	2.03	2.07	9.36	7.25	SN	LD	NOZ	10.5	TURQ/YEL	218	SPSR06	277
495		1213.83	-	-	-	-	-	-	-	-	-	-	-	
496	4.83	1216.33	2.06	2.07	9.43	7.25	SN	LD	NOZ	10.5	TURQ/YEL	219	SPSR06	278
497		1218.83	-	-	-	-	-	-	-	-	-	-	-	
498	4.92	1221.25	2.09	2.07	9.51	7.25	SN	LD	NOZ	10.5	TURQ/YEL	220	SPSR06	279
499		1223.67	-	-	-	-	-	-	-	-	-	-	-	
500	4.92	1226.17	2.08	2.07	9.59	7.25	SN	LD	NOZ	10.5	TURQ/YEL	221	SPSR06	280
501		1228.59	-	-	-	-	-	-	-	-	-	-	-	
502	4.84	1231.01	2.09	2.07	9.68	7.25	SN	LD	NOZ	10.5	TURQ/YEL	222	SPSR06	281
503		1233.51	-	-	-	-	-	-	-	-	-	-	-	
504	4.92	1235.93	2.11	2.07	9.78	7.25	SN	LD	NOZ	10.5	TURQ/YEL	223	SPSR06	282
505		1238.35	-	-	-	-	-	-	-	-	-	-	-	
506	4.92	1240.85	2.11	2.07	9.89	7.25	SN	LD	NOZ	10.5	TURQ/YEL	224	SPSR06	283
507		1243.27	-	-	-	-	-	-	-	-	-	-	-	
508	4.84	1245.69	2.14	2.07	10.00	7.25	SN	LD	NOZ	10.5	TURQ/YEL	225	SPSR06	284
509		1248.19	-	-	-	-	-	-	-	-	-	-	-	
510	5.00	1250.69	2.63	2.69	10.00	7.21	SN	LD	NOZ	12	RED	226	SPSR06	285
511		1253.02	-	-	-	-	-	-	-	-	-	-	-	
TOWER 7	179.00	1255.60												
512	7.02	1257.71	2.60	2.69	10.00	7.21	SN	LD	NOZ	12	RED	227	SPSR06	286
513		1260.04	-	-	-	-	-	-	-	-	-	-	-	
514	4.83	1262.54	2.14	2.07	10.00	7.25	SN	LD	NOZ	10.5	TURQ/YEL	228	SPSR06	287
515		1265.04	-	-	-	-	-	-	-	-	-	-	-	
516	4.92	1267.46	2.17	2.25	10.00	7.23	SN	LD	NOZ	11	YELLOW	229	SPSR06	288
517		1269.88	-	-	-	-	-	-	-	-	-	-	-	
518	4.92	1272.38	2.15	2.07	10.00	7.25	SN	LD	NOZ	10.5	TURQ/YEL	230	SPSR06	289
519		1274.80	-	-	-	-	-	-	-	-	-	-	-	
520	4.84	1277.22	2.18	2.25	10.00	7.23	SN	LD	NOZ	11	YELLOW	231	SPSR06	

OUTLET NO.	LAST OUTLET	DISTANCE TO PIVOT	GPM NEED	GPM DEL.	PIPE PSI	NOZZLE PSI	SPRINKLER LABEL AND NOZZLE SIZE					SPRK NO.	REG SIZE	PLUG NO.
521		1279.72	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	290
522	4.92	1282.14	2.19	2.25	10.00	7.23	SN	LD	NOZ	11	YELLOW	232	SPSR06	
523		1284.56	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	291
524	4.92	1287.06	2.16	2.25	10.00	7.23	SN	LD	NOZ	11	YELLOW	233	SPSR06	
525		1289.48	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	292
526	4.84	1291.90	2.15	2.07	10.00	7.25	SN	LD	NOZ	10.5	TURQ/YEL	234	SPSR06	
527		1294.40	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	293
528	5.00	1296.90	2.13	2.07	10.00	7.25	SN	LD	NOZ	10.5	TURQ/YEL	235	SPSR06	
529		1299.23	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	- - - -	294
530	3.57	1300.47	2.09	2.07	10.00	7.25	SN	LD	NOZ	10.5	TURQ/YEL	236	SPSR06	
OVERHANG	44.87	1300.47												

TOTAL GPM = 300.59

GPA = 2.46

MINIMUM RECOMMENDED REGULATOR INLET PRESSURE IS 11.00 PSI

WITH GRADUATED ELEVATION OF 5.00 FT THE INLET PRESSURE IS 11.22 PSI FOR SPRINKLER 236

THIS POSITION IS THE CLOSEST TO THE MINIMUM RECOMMENDED INLET PRESSURE

HYDRAULICS SUMMARY

TOWER NUMBER	ACRES UNDER SPAN	GPM NEED	ACTUAL GPM	PERCENT DEVIATION	GPM PER ACRE	AVERAGE IN. PER HR DELIVERED UNDER SPAN	AVERAGE IN. DELIVERED FOR REVOLUTION TIME		
							36 HR	48 HR	60 HR
1	2.38	5.85	8.65	48%	3.64	0.008	0.29	0.39	0.48
2	7.00	17.22	16.91	-2%	2.42	0.005	0.19	0.26	0.32
3	11.62	28.58	28.33	-1%	2.44	0.005	0.19	0.26	0.32
4	16.24	39.95	39.42	-1%	2.43	0.005	0.19	0.26	0.32
5	20.86	51.32	50.87	-1%	2.44	0.005	0.19	0.26	0.32
6	25.49	62.69	61.91	-1%	2.43	0.005	0.19	0.26	0.32
7	30.11	74.05	73.01	-1%	2.43	0.005	0.19	0.26	0.32
OVERHANG	8.27	20.34	21.48	6%	2.60	0.006	0.21	0.28	0.34
TOTAL	121.97	300.00	300.59		2.46				

SUMMARY OF SPRINKLERS

20 SN LD NOZ 4 LT BLUE
3 SN LD NOZ 4.5 LT BL/BEIGE
9 SN LD NOZ 5 BEIGE
10 SN LD NOZ 5.5 BEIGE/GOLD
20 SN LD NOZ 6 GOLD
15 SN LD NOZ 6.5 GOLD/LIME
14 SN LD NOZ 7 LIME
18 SN LD NOZ 7.5 LIME/LAV
18 SN LD NOZ 8 LAVENDER
18 SN LD NOZ 8.5 LAV/GREY
18 SN LD NOZ 9 GREY
22 SN LD NOZ 9.5 GREY/TURQ
19 SN LD NOZ 10 TURQUOISE
24 SN LD NOZ 10.5 TURQ/YEL
4 SN LD NOZ 11 YELLOW
2 SN LD NOZ 11.5 YEL/RED
2 SN LD NOZ 12 RED

294 PLUGS**SUMMARY OF REGULATORS**

46 Senn PSR 10 psi
190 Senn PSR 6 psi

TOTAL OF 236 REGULATORS

NOZZLE POSITION CHART

SN LD NOZ 4 LT BLUE	1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20
SN LD NOZ 4.5 LT BL/BEIGE	21, 24, 25
SN LD NOZ 5 BEIGE	22, 23, 26, 27, 28, 29, 30, 31, 32
SN LD NOZ 5.5 BEIGE/GOLD	33, 34, 35, 36, 37, 38, 39, 40, 48, 49
SN LD NOZ 6 GOLD	41, 42, 43, 44, 45, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 65
SN LD NOZ 6.5 GOLD/LIME	46, 64, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78
SN LD NOZ 7 LIME	47, 79, 80, 81, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93
SN LD NOZ 7.5 LIME/LAV	94, 95, 96, 97, 98, 99, 100, 101, 102, 103, 104, 105, 106, 107, 108, 109, 110, 111
SN LD NOZ 8 LAVENDER	82, 83, 112, 113, 114, 115, 116, 117, 120, 121, 122, 123, 124, 125, 126, 127, 128, 129
SN LD NOZ 8.5 LAV/GREY	130, 131, 132, 133, 134, 135, 136, 137, 138, 139, 140, 141, 142, 143, 144, 145, 146, 147
SN LD NOZ 9 GREY	118, 119, 148, 149, 150, 151, 152, 153, 156, 157, 158, 159, 160, 161, 162, 163, 164, 165
SN LD NOZ 9.5 GREY/TURQ	166, 167, 168, 169, 170, 171, 172, 173, 174, 175, 176, 177, 178, 179, 180, 181, 182, 183, 184, 185, 186, 188
SN LD NOZ 10 TURQUOISE	187, 189, 192, 193, 194, 195, 196, 197, 198, 199, 200, 201, 202, 203, 204, 205, 206, 207, 209
SN LD NOZ 10.5 TURQ/YEL	154, 155, 208, 210, 211, 212, 213, 214, 215, 216, 217, 218, 219, 220, 221, 222, 223, 224, 225, 228, 230, 234, 235, 236
SN LD NOZ 11 YELLOW	229, 231, 232, 233
SN LD NOZ 11.5 YEL/RED	190, 191
SN LD NOZ 12 RED	226, 227

WESTERN KANSAS IRRIGATION
125 N. FRONTAGE ROAD
JOHNSON, KANSAS 67855

SEPTEMBER 22, 2025
WISH-119609
M & G FARMS
NW 1/4 6-28-40
300 GPM @ 14 PSI

LINDSAY GEN II - 30 UNDERSLUNG
SENNINGER HD LOW DRIFT SPRAY NOZZLES
SENNINGER 10 & 6 PSI REGULATORS
3/4 INCH SCHEDULE 80 UV RESISTANT PVC PIPE
HEAD

Rotation time at 100% = 10.52 Hours Or 631 minutes

Installation Chart Page 1

Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg								
1	PLUG	1	4	PSR10	61	PLUG	19	4	PSR10	47	38	5.5	PSR10	33	PLUG	63	6	PSR06	19	PLUG	92	7	PSR06									
2	PLUG				62					48				PLUG	34					20												
3	PLUG				63	PLUG				49				PLUG	35					21				PLUG								
4	PLUG				64	PLUG				50					39				5.5	PSR10				36	64	6.5	PSR06	22	PLUG	93	7	PSR06
5	PLUG				65					51				PLUG	37				PLUG	23				PLUG								
6	PLUG				66	PLUG				52				PLUG	38				65	6				PSR06	24	PLUG	94	7.5	PSR06			
7	PLUG				67	PLUG				53					40				5.5	PSR10				39	PLUG	25	PLUG	95	7.5	PSR06		
8	PLUG	2	4	PSR10	68	21	4.5	PSR10	54	41	6	PSR10	40	66	6.5	PSR06	26	PLUG	96	7.5	PSR06											
9					69				PLUG				55				PLUG					41	67	6.5	PSR06	27	PLUG					
10	PLUG	3	4	PSR10	70	22	5	PSR10	56	42	6	PSR10	42	68	6.5	PSR06	28	PLUG	97	7.5	PSR06											
11					71								57				PLUG					43	PLUG	29	PLUG							
12	PLUG				72				PLUG				58				PLUG					44	PLUG	30	PLUG							
13	PLUG	4	4	PSR10	73	23	5	PSR10	59	43	6	PSR10	45	69	6.5	PSR06	31	PLUG	98	7.5	PSR06											
14													60				PLUG					46	PLUG	32	PLUG							
15	PLUG				1				TOWER 1				61				PLUG					47	PLUG	33	PLUG							
16	PLUG				2								62									48	6	PSR10	34	PLUG	99	7.5	PSR06			
17					3				PLUG				63				PLUG					49	PLUG	35	PLUG							
18	PLUG				4				PLUG				64									50	71	6.5	PSR06	36	PLUG	100	7.5	PSR06		
19	PLUG				5				4				PSR10				5					24	4.5	PSR10	65	44	6	PSR10	51	PLUG	37	PLUG
20		6	4	PSR10	6	25	4.5	PSR10	66	45	6	PSR10	52	72	6.5	PSR06	38	PLUG	102	7.5	PSR06											
21	PLUG				7				PLUG				67				PLUG					53	PLUG	39	PLUG							
22	PLUG				8								68									54	73	6.5	PSR06	40	PLUG	103	7.5	PSR06		
23		7	4	PSR10	9	26	5	PSR10	69	46	6.5	PSR10	55	74	6.5	PSR06	41	PLUG	104	7.5	PSR06											
24	PLUG				10				PLUG				70				PLUG					56	PLUG	42	PLUG							
25	PLUG				11								71									57	PLUG	43	PLUG							
26		8	4	PSR10	12	27	5	PSR10	72	47	7	PSR06	58	75	6.5	PSR06	44	PLUG	105	7.5	PSR06											
27	PLUG				13				PLUG				73				TOWER 2					59	PLUG	45	PLUG							
28	PLUG				14								60									61	PLUG	46	PLUG							
29		9	4	PSR10	15	28	5	PSR10	1	48	5.5	PSR06	62	77	6.5	PSR06	47	PLUG	106	7.5	PSR06											
30	PLUG				16				PLUG				2									63	PLUG	48	PLUG							
31	PLUG				17								3				PLUG					64	PLUG	49	PLUG							
32		10	4	PSR10	18	29	5	PSR10	4	50	6	PSR06	65	80	7	PSR06	50	PLUG	107	7.5	PSR06											
33	PLUG				19				PLUG				5				PLUG					66	PLUG	51	PLUG							
34	PLUG				20								6									67	PLUG	52	PLUG							
35		11	4	PSR10	21	30	5	PSR10	7	51	6	PSR06	68	81	7	PSR06	53	PLUG	108	7.5	PSR06											
36	PLUG				22				PLUG				8									69	PLUG	54	PLUG							
37	PLUG				23								9				PLUG					70	PLUG	55	PLUG							
38		12	4	PSR10	24	31	5	PSR10	10	52	6	PSR06	71	82	8	PSR06	56	PLUG	109	7.5	PSR06											
39	PLUG				25				PLUG				11									72		57	PLUG							
40	PLUG				26								12									73	TOWER 3	58	PLUG							
41		13	4	PSR10	27	32	5	PSR10	13	53	6	PSR06	1	83	8	PSR06	59	PLUG	110	7.5	PSR06											
42	PLUG				28				PLUG				14									2		60	PLUG							
43	PLUG				29								15				PLUG					3	PLUG	61	PLUG							
44		14	4	PSR10	30	33	5.5	PSR10	16	54	6	PSR06	4	84	7	PSR06	62	PLUG	111	8	PSR06											
45	PLUG				31				PLUG				17									5	PLUG	63	PLUG							
46	PLUG				32								18									6	PLUG	64	PLUG							
47		15	4	PSR10	33	34	5.5	PSR10	19	56	6	PSR06	7	85	7	PSR06	65	PLUG	112	8	PSR06											
48	PLUG				34				PLUG				20									6	PLUG	66	PLUG							
49	PLUG				35								21				PLUG					7	PLUG	67	PLUG							
50		16	4	PSR10	36	35	5.5	PSR10	22	57	6	PSR06	8	86	7	PSR06	68	PLUG	113	8	PSR06											
51	PLUG				37				PLUG				23									9	PLUG	69	PLUG							
52	PLUG				38								24									10	PLUG	70	PLUG							
53		17	4	PSR10	39	36	5.5	PSR10	25	58	6	PSR06	11	87	7	PSR06	71	PLUG	114	8	PSR06											
54	PLUG				40				PLUG				26									12		72	PLUG							
55	PLUG				41								27									13	PLUG	73	PLUG							
56		18	4	PSR10	42	37	5.5	PSR10	28	59	6	PSR06	14	88	7	PSR06	74	TOWER 4	1	PLUG	9	PSR06										
57	PLUG				43				PLUG				29										15	PLUG	75	PLUG						
58	PLUG				44								30										16		76	PLUG						
59		18	4	PSR10	45	38	5.5	PSR10	31	60	6	PSR06	17	89	7	PSR06	77	PLUG	115	8	PSR06											
60	PLUG				46				PLUG				32									18	PLUG	78	PLUG							

WESTERN KANSAS IRRIGATION
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300 GPM @ 14 PSI

LINDSAY GEN II - 30 UNDERSLUNG
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Rotation time at 100% = 10.52 Hours Or 631 minutes

Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg	Out #	Drop Len	Sprk #	Noz Size	Reg
4		120	8	PSR06	64		150	9	PSR06	50		179	9.5	PSR06	36		208	10.5	PSR06
5	PLUG				65	PLUG				51	PLUG				37	PLUG			
6		121	8	PSR06	66		151	9	PSR06	52		180	9.5	PSR06	38		209	10	PSR06
7	PLUG				67	PLUG				53	PLUG				39	PLUG			
8		122	8	PSR06	68		152	9	PSR06	54		181	9.5	PSR06	40		210	10.5	PSR06
9	PLUG				69	PLUG				55	PLUG				41	PLUG			
10		123	8	PSR06	70		153	9	PSR06	56		182	9.5	PSR06	42		211	10.5	PSR06
11	PLUG				71	PLUG				57	PLUG				43	PLUG			
12		124	8	PSR06	72		154	10.5	PSR06	58		183	9.5	PSR06	44		212	10.5	PSR06
13	PLUG				73	PLUG				59	PLUG				45	PLUG			
14		125	8	PSR06	TOWER 5					60		184	9.5	PSR06	46		213	10.5	PSR06
15	PLUG				1	PLUG				61	PLUG				47	PLUG			
16		126	8	PSR06	2		155	10.5	PSR06	62		185	9.5	PSR06	48		214	10.5	PSR06
17	PLUG				3	PLUG				63	PLUG				49	PLUG			
18		127	8	PSR06	4		156	9	PSR06	64		186	9.5	PSR06	50		215	10.5	PSR06
19	PLUG				5	PLUG				65	PLUG				51	PLUG			
20		128	8	PSR06	6		157	9	PSR06	66		187	10	PSR06	52		216	10.5	PSR06
21	PLUG				7	PLUG				67	PLUG				53	PLUG			
22		129	8	PSR06	8		158	9	PSR06	68		188	9.5	PSR06	54		217	10.5	PSR06
23	PLUG				9	PLUG				69	PLUG				55	PLUG			
24		130	8.5	PSR06	10		159	9	PSR06	70		189	10	PSR06	56		218	10.5	PSR06
25	PLUG				11	PLUG				71	PLUG				57	PLUG			
26		131	8.5	PSR06	12		160	9	PSR06	72		190	11.5	PSR06	58		219	10.5	PSR06
27	PLUG				13	PLUG				73	PLUG				59	PLUG			
28		132	8.5	PSR06	14		161	9	PSR06	TOWER 6					60		220	10.5	PSR06
29	PLUG				15	PLUG				1	PLUG				61	PLUG			
30		133	8.5	PSR06	16		162	9	PSR06	2		191	11.5	PSR06	62		221	10.5	PSR06
31	PLUG				17	PLUG				3	PLUG				63	PLUG			
32		134	8.5	PSR06	18		163	9	PSR06	4		192	10	PSR06	64		222	10.5	PSR06
33	PLUG				19	PLUG				5	PLUG				65	PLUG			
34		135	8.5	PSR06	20		164	9	PSR06	6		193	10	PSR06	66		223	10.5	PSR06
35	PLUG				21	PLUG				7	PLUG				67	PLUG			
36		136	8.5	PSR06	22		165	9	PSR06	8		194	10	PSR06	68		224	10.5	PSR06
37	PLUG				23	PLUG				9	PLUG				69	PLUG			
38		137	8.5	PSR06	24		166	9.5	PSR06	10		195	10	PSR06	70		225	10.5	PSR06
39	PLUG				25	PLUG				11	PLUG				71	PLUG			
40		138	8.5	PSR06	26		167	9.5	PSR06	12		196	10	PSR06	72		226	12	PSR06
41	PLUG				27	PLUG				13	PLUG				73	PLUG			
42		139	8.5	PSR06	28		168	9.5	PSR06	14		197	10	PSR06	TOWER 7				
43	PLUG				29	PLUG				15	PLUG				1		227	12	PSR06
44		140	8.5	PSR06	30		169	9.5	PSR06	16		198	10	PSR06	2	PLUG			
45	PLUG				31	PLUG				17	PLUG				3		228	10.5	PSR06
46		141	8.5	PSR06	32		170	9.5	PSR06	18		199	10	PSR06	4	PLUG			
47	PLUG				33	PLUG				19	PLUG				5		229	11	PSR06
48		142	8.5	PSR06	34		171	9.5	PSR06	20		200	10	PSR06	6	PLUG			
49	PLUG				35	PLUG				21	PLUG				7		230	10.5	PSR06
50		143	8.5	PSR06	36		172	9.5	PSR06	22		201	10	PSR06	8	PLUG			
51	PLUG				37	PLUG				23	PLUG				9		231	11	PSR06
52		144	8.5	PSR06	38		173	9.5	PSR06	24		202	10	PSR06	10	PLUG			
53	PLUG				39	PLUG				25	PLUG				11		232	11	PSR06
54		145	8.5	PSR06	40		174	9.5	PSR06	26		203	10	PSR06	12	PLUG			
55	PLUG				41	PLUG				27	PLUG				13		233	11	PSR06
56		146	8.5	PSR06	42		175	9.5	PSR06	28		204	10	PSR06	14	PLUG			
57	PLUG				43	PLUG				29	PLUG				15		234	10.5	PSR06
58		147	8.5	PSR06	44		176	9.5	PSR06	30		205	10	PSR06	16	PLUG			
59	PLUG				45	PLUG				31	PLUG				17		235	10.5	PSR06
60		148	9	PSR06	46		177	9.5	PSR06	32		206	10	PSR06	18	PLUG			
61	PLUG				47	PLUG				33	PLUG				19		236	10.5	PSR06
62		149	9	PSR06	48		178	9.5	PSR06	34		207	10	PSR06					
63	PLUG				49	PLUG				35	PLUG								

PRECIPITATION CHART FOR FULL CIRCLE

WISH-119609

SEPTEMBER 22, 2025

DEALER - WESTERN KANSAS IRRIGATION

IRRIGATOR - M & G FARMS

FIELD - NW 1/4 6-28-40

TOTAL LENGTH PIPE = 1300.47 SYSTEM PRESSURE = 14 PSI
GPM UNDER PIPE = 300.59 TOTAL GPM = 300.59
ACRES UNDER PIPE = 121.97
RANGE OF ENDGUN = .00 RUN FOR MINIMUM PRESSURE
GPM OF ENDGUN = .00
ACRES UNDER ENDGUN = .00

MOTOR SIZE (HP) = 3/4
LOADED MOTOR RPM = 1750
CENTER GEAR BOX RATIO = 40
WHEEL GEAR BOX RATIO = 50
TIRE SIZE = 11.2 X 38
LAST TOWER SPEED (FPM) = 12.50

PRECIPITATION BASED

% TIMER BASED

PRECIPITATION INCHES	% TIMER SETTING	TIME HOURS	% TIMER SETTING	PRECIPITATION INCHES	TIME HOURS
.06	100.00	10.52 - 631(min)	100.00	.06	10.52 - 631(min)
.10	57.28	18.36	90.00	.06	11.69
.20	28.64	36.73	80.00	.07	13.15
.25	22.91	45.91	70.00	.08	15.03
.30	19.09	55.09	60.00	.10	17.53
.40	14.32	73.46	50.00	.11	21.04
.50	11.46	91.82	45.00	.13	23.38
.60	9.55	110.19	40.00	.14	26.30
.70	8.18	128.55	35.00	.16	30.05
.75	7.64	137.73	30.00	.19	35.06
.80	7.16	146.92	25.00	.23	42.08
.90	6.36	165.28	20.00	.29	52.59
1.00	5.73	183.64	15.00	.38	70.13
1.25	4.58	229.56	10.00	.57	105.19
1.50	3.82	275.47	5.00	1.15	210.38

CAUTION: The relationship between precipitation rate, timer setting, and hours per revolution provided above are theoretical numbers based on the data list at the top of the page. Actual precipitation rates may vary due to the following field and machine conditions: wind drift; evaporation; tire slippage, tire loaded radius; drive train efficiency; elevation changes; soil type. Due to these varying field and machine conditions the above chart should be used as a guide only.