

1-800-GRAINGER (472-4643)

Universal Electronic Water Level Controllers



- NEMA 4X enclosure
- Enclosure is 8 3/4" H x 10 1/2" W x 6" D

Provide precise control that compensates for wave action and manages water levels to within 1/8" of operating range. Sensor rods will not plate foul or deteriorate, no matter the water quality. Digital circuitry easily integrates with existing building automation systems. Modular, quick-connect design. Control panel has water level and fault indicators and diagnostic self-test button. 15-yr. duty cycle. For cooling towers, water and stormwater holding and storage tanks, irrigation lakes, and sewage water systems. Each includes 20" L x 3" dia. PVC pipe containing 1/4" stainless steel probes, 50-ft. sensor wire, mounting bracket, and U-bolts.



Sensors Incl.	Operating Range	Switch Type	Input Voltage			
			110V AC 50/60 Hz Mfr. Model	110V AC 50/60 Hz Item No.	220V AC 50/60Hz Mfr. Model	220V AC 50/60Hz Item No.
Fill Height Only	1 1/2 in	SPST	WLC3000-120VAC	4GHK3	WLC3000-220VAC	4GHK8
Fill Height w/ High Level Alarm	1 1/2 and 3 in	(2)SPST	WLC4000-120VAC	4GHK4	WLC4000-220VAC	4GHK9
Fill Height w/ Low Level Alarm	1/2 and 6 in	(3)SPST	WLC4500-120VAC	4GHK5	---	---
Fill Height w/ High & Low Level Alarm	1 1/2, 3, and 6 in	(3)SPST	WLC5000-120VAC	4GHK6	WLC5000-220VAC	4GHL1
Fill Height w/ High & Low Level Alarm & Low Heat Cut Off	1 1/2, 3, 6, and 10 in	(4)SPST	WLC6000-120VAC	4GHK7	WLC6000-220VAC	4GHL2

Shell and Tube Heat Exchangers

Standard Xchange®

BRASS

- Max. working pressure: shell side 300 psi; tube side 150 psi
- Max. temp.: shell side 300°F; tube side 300°F

316 STAINLESS STEEL

- Max. working pressure: shell side 225 psi; tube side 150 psi
- Max. temp.: shell side 425°F; tube side 425°F

Max. BtuH (Water to Water)*	Max. BtuH (Oil to Water)**	Connection	H (in.)	L (in.)	W (in.)	BRASS		316 STAINLESS STEEL	
						Mfr. Model	Item No.	Mfr. Model	Item No.
240,000	12,700 BtuH	Shell 1 in NPT, Tube 3/4 in NPT	4.8 in	10.375 in	4.5 in	SN503003008005	5TNV3	SN516003008006	5TNW4
270,000	28,000 BtuH	Shell 1 in NPT, Tube 3/4 in NPT	4.8 in	17.125 in	4.5 in	SN503003014005	5TNV4	SN516003014006	5TNW5
330,000	56,000 BtuH	Shell 1 in NPT, Tube 3/4 in NPT	4.8 in	27.125 in	4.5 in	SN503003024005	5TNV5	SN516003024006	5TNW6
525,000	42,700 BtuH	Shell 1 1/2 in NPT, Tube 1 in NPT	7 in	18.812 in	6.75 in	SN503005014005	5TNV6	SN516005014006	5TNW7
1,350,000	134,000 BtuH	Shell 2 in NPT, Tube 1 1/2 in NPT	8.375 in	29.125 in	7.75 in	SN503006024005	5TNV7	SN516006024006	5TNW8
1,600,000	239,000 BtuH	Shell 2 in NPT, Tube 1 1/2 in NPT	8.375 in	41.125 in	7.75 in	SN503006036005	5TNV8	SN516006036006	5TNW9
2,400,000	280,000 BtuH	Shell 3 in NPT, Tube 2 in NPT	11 in	30.625 in	10.5 in	SN503008024005	5TNV9	SN516008024006	5TNX0
2,750,000	400,000 BtuH	Shell 3 in NPT, Tube 2 in NPT	11 in	42.625 in	10.5 in	SN503008036005	5TNW0	SN516008036006	5TNX1
3,100,000	516,000 BtuH	Shell 3 in NPT, Tube 2 in NPT	11 in	54.625 in	10.5 in	SN503008048005	5TNW1	SN516008048006	5TNX2
3,450,000	631,000 BtuH	Shell 3 in NPT, Tube 2 in NPT	11 in	66.625 in	10.5 in	SN503008060005	5TNW2	SN516008060006	5TNX3
3,800,000	649,000 BtuH	Shell 3 in NPT, Tube 2 in NPT	11 in	78.625 in	10.5 in	SN503008072005	5TNW3	SN516008072006	5TNX4

* Based on cooling 180°F water with 85°F cooling water and 10 psi pressure differential. ** Heat removed for max. flow (150 SSU oil @ 100°F) exiting @ 120°F with cooling water @ 85°F and 10°F rise.



Brazed Plate Heat Exchangers



- Max. pressure: 435 psig design (6RGF1 to 6RGF6 are 390 psig design)

- Temp. range: -40° to 300°F

a xylem brand

Max. BtuH* (Water to Water)	Max. BtuH** (Oil to Water)	Max. BtuH† (R22 to Water)	Connection	W (in.)	ASTM 316L STAINLESS STEEL, COPPER			316L STAINLESS STEEL, NICKEL BRAZE				
					H (in.)	L (in.)	Mfr. Model	Item No.	H (in.)	L (in.)	Mfr. Model	Item No.
135,000	12,725	---	1 in MNPT	4.37 in	12.2 in	1.37 in	BP410-10-LCA	2NXR4	12.2 in	1.64 in	BPN410-10 LCA	6RGD9
350,000	25,450	---	1 in MNPT	4.37 in	12.2 in	2.34 in	BP410-20-LCA	2NXR5	12.2 in	2.61 in	BPN410-20 LCA	6RGD0
500,000	50,900	---	1 in MNPT	4.37 in	12.2 in	3.31 in	BP410-30-LCA	2NXR6	12.2 in	3.58 in	BPN410-30 LCA	6RGD1
700,000	76,350	---	1 in MNPT	4.37 in	12.2 in	4.28 in	BP410-40-LCA	2NXR7	12.2 in	4.55 in	BPN410-40 LCA	6RGD2
1,200,000	127,250	---	1 in MNPT	4.37 in	12.2 in	6.22 in	BP410-60-LCA	2NXR9	12.2 in	6.49 in	BPN410-60 LCA	6RGD4
1,100,000	190,875	---	2 in MNPT	7.48 in	24.3 in	3.853 in	BP422-30-LCA	2NXT7	24.3 in	4.123 in	BPN422-30 LCA	6RGF1
2,000,000	279,950	---	2 in MNPT	7.48 in	24.3 in	6.155 in	BP422-50-LCA	2NXT9	24.3 in	6.425 in	BPN422-50 LCA	6RGF3
2,500,000	281,750	---	2 in MNPT	7.48 in	24.3 in	7.306 in	BP422-60-LCA	2NXU1	24.3 in	7.576 in	BPN422-60 LCA	6RGF4
5,900,000	509,000	---	2 in MNPT	7.48 in	24.3 in	9.608 in	BP422-80-LCA	2NXU2	24.3 in	9.878 in	BPN422-80 LCA	6RGF5
5,900,000	636,250	---	2 in MNPT	7.48 in	24.3 in	11.91 in	BP422-100-LCA	2NXU3	24.3 in	12.18 in	BPN422-100 LCA	6RGF6
Oil, Double Wall												
85,835	32,000	---	1 in MNPT	4.37 in	12.2 in	2.65 in	BP410-10-LCA	6RGC2	---	---	---	---
134,881	50,000	---	1 in MNPT	4.37 in	12.2 in	3.78 in	BP410-20-LCA	6RGC3	---	---	---	---
139,610	35,000	---	1 in MNPT	4.37 in	20.7 in	1.37 in	BP410-10-LCA	6RGC6	---	---	---	---
183,929	65,000	---	1 in MNPT	4.37 in	12.2 in	4.91 in	BP410-40-LCA	6RGC4	---	---	---	---
282,024	98,000	---	1 in MNPT	4.37 in	12.2 in	7.16 in	BP410-60-LCA	6RGC5	---	---	---	---
317,243	78,000	---	1 in MNPT	4.37 in	20.7 in	2.65 in	BP410-10-LCA	6RGC7	---	---	---	---
492,134	123,000	---	1 in MNPT	4.37 in	20.7 in	3.78 in	BP410-20-LCA	6RGC8	---	---	---	---
661,587	170,000	---	1 in MNPT	4.37 in	20.7 in	4.91 in	BP410-30-LCA	6RGC9	---	---	---	---
831,000	210,000	---	1 in MNPT	4.37 in	20.7 in	6.04 in	BP410-40-LCA	6RGD0	---	---	---	---
995,110	242,000	---	1 in MNPT	4.37 in	20.7 in	7.16 in	BP410-50-LCA	6RGD1	---	---	---	---
1,225,875	320,000	---	1 in MNPT	4.37 in	20.7 in	9.42 in	BP410-60-LCA	6RGD2	---	---	---	---
1,452,663	395,000	---	1 in MNPT	4.37 in	20.7 in	11.67 in	BP410-80-LCA	6RGD3	---	---	---	---
1,566,533	450,000	---	1 in MNPT	4.37 in	20.7 in	13.92 in	BP410-100-LCA	6RGD4	---	---	---	---
Refrigerant												
---	---	6,000	1 in MNPT, 1/2 in SW	4.37 in	12.2 in	1.37 in	BPR410-10-LCA	2NXU4	12.2 in	1.64 in	BP410-10 LCA	6RGF7
---	---	12,000	1 in MNPT, 1/2 in & 1/2 in SW	4.37 in	12.2 in	1.76 in	BPR410-14-LCA	2NXU5	12.2 in	2.028 in	BP410-14 LCA	6RGF8
---	---	30,000	1 in MNPT, 1/2 in & 1/2 in SW	4.37 in	12.2 in	3.7 in	BPR410-34-LCA	2NXU6	12.2 in	3.968 in	BP410-34 LCA	6RGF9
---	---	60,000	1 in MNPT, 3/4 in & 1/2 in SW	4.37 in	20.7 in	3.12 in	BPR415-28-LCA	2NXU7	20.7 in	3.386 in	BP415-28 LCA	6RGG0
---	---	90,000	1 in MNPT, 3/4 in SW	4.37 in	20.7 in	4.47 in	BPR415-42-LCA	2NXU8	20.7 in	4.744 in	BP415-42 LCA	6RGG1
---	---	120,000	1 in MNPT, 3/4 in SW	4.37 in	20.7 in	6.67 in	BPR415-56-LCA	2NXU9	20.7 in	6.102 in	BP415-56 LCA	6RGG2
---	---	204,000	2 in MNPT, 1 1/2 in & 1 1/2 in SW	7.48 in	24.3 in	6.155 in	BPR422-50-LCA	2NXV1	24.3 in	6.425 in	BP422-50 LCA	6RGG3
Water												
45,000	---	---	1 in MNPT	4.37 in	12.2 in	2.34 in	BP411-20-LCA	2NXT1	---	---	---	---
60,000	---	---	3/4 in MNPT	3.18 in	8.2 in	1.21 in	BP400-10-LCA	2NXP9	8.45 in	1.45 in	BPN400-10 LCA	6RGD5
150,000	---	---	3/4 in MNPT	3.18 in	8.2 in	2.02 in	BP400-20-LCA	2NXP1	8.45 in	2.23 in	BPN400-20 LCA	6RGD6
225,000	---	---	3/4 in MNPT	3.18 in	8.2 in	2.83 in	BP400-30-LCA	2NXP2	8.45 in	3.01 in	BPN400-30 LCA	6RGD7
350,000	---	---	3/4 in MNPT	3.18 in	8.2 in	3.64 in	BP400-40-LCA	2NXP3	8.45 in	3.79 in	BPN400-40 LCA	6RGD8
70,000	---	---	1 in MNPT	4.37 in	12.2 in	3.31 in	BP411-30-LCA	2NXT2	12.2 in	3.58 in	BPN411-30 LCA	6RGE6
180,000	---	---	1 in MNPT	4.37 in	12.2 in	2.34 in	BP412-20-LCA	2NXT3	12.2 in	2.61 in	BPN412-20 LCA	6RGE7
295,000	---	---	1 in MNPT	4.37 in	12.2 in	3.31 in	BP412-30-LCA	2NXT4	12.2 in	3.58 in	BPN412-30 LCA	6RGE8
350,000	---	---	1 in MNPT	4.37 in	---	---	---	---	12.2 in	2.61 in	BPN411-20 LCA	6RGE5
415,000	---	---	1 in MNPT	4.37 in	12.2 in	4.28 in	BP412-40-LCA	2NXT5	12.2 in	4.55 in	BPN412-40 LCA	6RGE9
535,000	---	---	1 in MNPT	4.37 in	12.2 in	5.25 in	BP412-50-LCA	2NXT6	12.2 in	5.52 in	BPN412-50 LCA	6RFD0
900,000	---	---	1 in MNPT	4.37 in	12.2 in	5.25 in	BP410-50-LCA	2NXP8	12.2 in	5.52 in	BPN410-50 LCA	6RGE3
1,500,000	---	---	2 in MNPT	7.48 in	24.3 in	5.004 in	BP422-40-LCA	2NXT8	24.3 in	5.274 in	BPN422-40 LCA	6RFD2



* 180°F boiler water inlet, 130°F outlet, 50°F domestic water inlet, 140°F outlet. ** ISO VG. 46 oil cooled to 125°F using a 2:1 oil-to-water flow rate and 85°F water. † Cool 2.4 gpm per ton of water from 54° to 44°F using R22 at 35° and 8°F superheat.