CHILLER TANK SYSTEMS



Budzar's ICE (Industrial Chilling Equipment) CTS Series Chiller Pump Tank Systems deliver superior performance to your central chilled water system. Designed to operate compatibly with any central chiller module, this unit integrates a chilled water reservoir factory-piped and matched by Budzar Engineers to your process operation on demands.

CTS units are capable of handling chiller capacities from 25 to 200 nominal tons.

Budzar Industries also designs and manufactures specialized equipment for non-standard applications. Our engineers have extensive experience in process chilling and heating applications for such industries as: rubber, plastics, chemical, food and metal working. We take the time to understand your current and future needs and design a solution targeted at high quality and fast payback.



EXCELLECT RETURN ON INVESTMENT

- Each Budzar unit is designed to maximize the productivity of your process. Budzar quality and reliability provide excellent value for each dollar invested.
- Optional stand-by pumps eliminate down time and keep your process running

LOW-COST, SIMPLE OPERATION AND MAINTENANCE

- Console-mounted high temperature, low pressure audible and visual alarms for process fluid supply allow you to attain peak process performance at all times
- Insulated dual well reservoir is constructed of heavy gauge, epoxy coated mild steel or optional stainless steel
- Close-coupled, centrifugal pumps with mechanical seals are selected for non-overloading conditions. Long-coupled, base-mounted pumps are optional
- All pumps include log-type isolation valves that remain stationary to permit complete pump removal without the inconvenience of water or fluid spillage

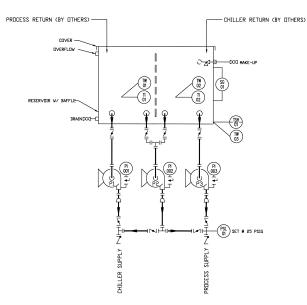
LOW-COST, SIMPLE OPERATION AND MAINTENANCE

- Completely factory assembled pump decks on as common skid minimize the time needed for field set-up—simply connect supply and return water mains electrical power
- All units are factory tested prior to shipment









CTS "DUAL PUMP" - "HIGH FLOW" - DH CHILLER TANK

Minimizes Δ T at your Process

CIS DUAL FUMF - HIGH FLOW - DH CHILLER TANK											
MODEL CTS		CTS-025DH	CTS-050DH	CTS-075DH	CTS-100DH	CTS-150DH	CTS-200DH				
Nominal Duty	TONS	25	50	75	100	150	200				
Tank Size L x W x H	FEET	2.5 x 5 x 3	4 x 5 x 4	4 x 6 x 6	4 x 6 x 6	5 x 7 x 6	6.5 x 7.5 x 7				
Tank Capacity—Overflow	GALLONS	220	500	950	950	1,400	2,250				
-Operating	GALLONS	140	300	600	600	900	1,400				
Chiller Pump—Flow	GPM/PSI	60/23	120/19	180/24	240/27	360/24	480/25				
Pump Motor	HP	1.5	3	5	7.5	10	15				
Discharge Connection	INCHES	2 NPT	2.5—125#	3—125#	4—125#	6—125#	6—125#				
Process Pump—Flow @ 60 PSIG	GPM	120	240	360	480	720	960				
Pump Motor	HP	7.5	15	20	25	40	60				
Discharge Connection	INCHES	2.5—FLG	4—FLG	6—FLG	6—FLG	6—FLG	8—FLG				
Nameplate Amps @ 460/3/60—		13.6	25.8	34.6	45.0	66.0	98.0				
@ 230/3/60—		27.2	51.6	69.2	90.0	132.0	196.0				
Connections (NPT) Overflow—	INCHES	2	3	4	4	4	4				
Makeup—	INCHES	1/.2	1/2	1/2	1/2	1/2	1/2				
Drain—	INCHES	1 1/2	1 1/2	2	2	2	2				
Shipping Weight (Approx)	LBS	950	1,700	2,000	2,400	4,200	7,100				
Operating Weight (Approx)	LBS	2,800	5,900	10,000	10,500	15,900	25,800				
Dimensions (Approx) W x L X H	INCHES	64x76x60	64x92x75	64x100x82	76x102x82	88x122x82	94x142x94				

NOTE: Standby pumps are available for all models (mounted, piped and wired) as a recommended options. Standby pumps available to match chiller pump, process pump or both.

CTS "DUAL PUMP" - "HIGH FLOW" - DH CHILLER TANK SYSTEMS

MODEL CTS		CTS-025DE	CTS-505DE	CTS-081DE	CTS-125DE	CTS-187DE	CTS-250DE	CTS-356DE
Chiller Pump—Flow	GPM/PSI	60/23	120/19	195/20	300/23	450/22	600/26	855/26
Pump Motor	HP	1.5	3	5	7.5	10	15	20
Process Pump—Flow @ 60 PSIG	GPM	60	120	195	300	450	600	855
Pump Motor	HP	5	7.5	10	150	25	30	40
Nameplate Amps @ 460/3/60-		10.2	15.8	21.6	32	48	61	79
230/3/60-		20.4	31.6	43.2	64	96	122	158

NOTE: Standby pumps are available for all models (mounted, piped and wired) as a recommended options. Standby pumps is identical to Process Pump

CTS "SINGLE PUMP" - S CHILLER TANK SYSTEMS

MODEL CTS		CTS-025S	CTS-050S	CTS-081S	CTS-125S	CTS-187S	CTS-250S	CTS-356S
Process/Chiller Pump—Flow @ 60 PSIG	GPM	60	120	195	0300	450	600	855
Pump Motor	HP	5	7.5	10	15	25	30	40
Nameplate Amps @ 460/3/60		76	11	14	21	34	40	52
230/3/60		15.2	22	28	42	68	80	104

NOTE: Standby pump is available for all models (mounted, piped and wired) as a recommended option. Standby pump is identical to Process/Chiller pump.





CROSSFLOW COOLING TOWERS



CT-M Cooling Towers

ICE CT-M Series Cooling Towers are designed for low maintenance. The induced draft design assures that a low-static, low-energy fan will do the job. It avoids the water leaks typical in forced draft towers. The fan will operate in a arm atmosphere even in winter, so users won't have to face frozen mechanical equipment.

The CT-M Series is designed to provide chilled water for industrial processes requiring +85°F fluid temperatures.

Budzar also designs and manufactures specialized equipment for non-standard applications. Our engineers have extensive experience in process chilling and heating applications for such industries as: rubber, paper, plastics, chemical, food, and metal working. We take the time to understand your current and future needs and design a solution targeted at high quality and fast payback.



Bulletin #50

PRECISION

EXCELLENT RETURN ON INVESTMENT

- Each Budzar unit is designed to maximize the productivity of your process. Budzar quality and reliability provide excellent value for each dollar invested.
- Rugged equipment and proven design mean long service life and low maintenance costs.

LOW-COST, SIMPLE OPERATION AND MAINTENANCE

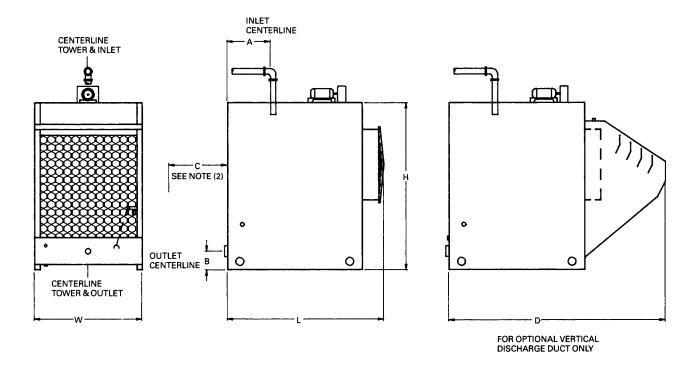
- The crossflow design saves on pump horsepower. You don't have to pay to force water through an internal spray system. You pay only to pump water to the top of the tower cell, gravity does the rest.
- The mechanical equipment and water distribution system are easily accessible.
- The drift eliminators and louvers are molded right on the long-lasting PVC fill sheets so water is kept inside the tower cell and off your roof.
- Housed in a galvanized casing for many years of dependable service.
- All CT-M models include air inlet screen, top basin cover and starter package.

QUICK AND EASY INSTALLATION

- All units are shipped ready for immediate connection to existing power and water lines.
- All units are factory tested prior to shipment.







CTM COOLING TOWERS

MODEL NUMBER	CT-10M	CT-15M	CT-20M	CT-25M	CT-30M	CT-40M	CT-50M	CT-60M	CT-75M	CT-85M	CT-95M	CT-110M	CT-125M	CT-160M	CT-175M
Nominal Tons (1)	10	15	20	25	30	40	50	60	75	85	95	110	125	160	175
Dimensions - Width "W" Length "L" Height "H" "A" "B" "C" (2)	2'-11 ¹ / ₂ 4'-2 ¹ / ₄ 4'-3 ⁷ / ₈ 1'-3 ¹³ / ₁₆ 6 ⁷ / ₈ 2'-0 (3)	2'-11 ¹ / ₂ 4'-2 ¹ / ₄ 4'-3 ⁷ / ₈ 1'-3 ¹³ / ₁₆ 6 ⁷ / ₈ 2'-0 (3)	3'-11 ¹ / ₂ 5'-1 ¹ / ₁₆ 6'-5 1'-5 9 ¹ / ₂ 4'-0	3'-11 ¹ / ₂ 5'-1 ¹ / ₁₆ 6'-5 1'-5 9 ¹ / ₂ 4'-0 (3)	3'-11 ¹ / ₂ 5'-1 ⁵ / ₁₆ 6'-5 1'-5 9 ¹ / ₂ 4'-0 (3)	3'-11 ¹ / ₂ 5'-1 ⁵ / ₁₆ 6'-5 1'-5 9 ¹ / ₂ 4'-0	5'-11 ¹ / ₂ 5'-2 ³ / ₁₆ 6'-5 1'-5 9 ¹ / ₂ 5'-0 (3)	5'-11 ¹ / ₂ 5'-2 ³ / ₁₆ 6'-5 1'-5 9 ¹ / ₂ 5'-0 (3)	5'-11 ¹ / ₂ 6'-7 ¹ / ₈ 7'-10 ⁵ / ₈ 1'-11 ¹⁵ / ₁₆ 11 ¹ / ₂ 6'-0 10'-10 ¹ / ₁₆	5'-11 ¹ / ₂ 6'-7 ¹ / ₈ 7'-10 ⁵ / ₈ 1'-11 ¹⁵ / ₁₆ 11 ¹ / ₂ 6'-0 10'-10 ¹ / ₁₆	5'-11'/ ₂ 6'-7'/ ₈ 7'-10 ⁵ / ₈ 1'-11 ¹⁵ / ₁₆ 11'/ ₂ 6'-0 10'-10 ¹ / ₁₆	7'-11 ¹ / ₂ 6'-7 ⁵ / ₁₆ 7'-10 ⁵ / ₈ 1'-11 ¹⁵ / ₁₆ 11 ¹ / ₂ 7'-0 10'-10 ¹ / ₁₆	7'-11 ¹ / ₂ 6'-7 ⁵ / ₁₆ 7'-10 ⁵ / ₈ 1'-11 ¹⁵ / ₁₆ 11 ¹ / ₂ 7'-0 10'-10 ¹ / ₁₆	9'-11 ¹ / ₂ 6'-7 ¹¹ / ₁₆ 8'-6 ³ / ₄ 1'-11 ³ / ₁₆ 11 ¹ / ₂ 9'-0 11'-1 ³ / ₄	9'-11 ¹ / ₂ 6'-7 ¹¹ / ₁₆ 8'-6 ³ / ₄ 1'-11 ³ / ₁₆ 11 ¹ / ₂ 9'-0 11'-1 ³ / ₄
Weights (lbs.) - Shipping - Operating (6) -	360 670	360 670	590 1200	590 1200	600 1210	600 1210	800 1750	800 1750	1230 3000	1230 3000	1230 3000	1600 4000	1600 4000	1980 5010	1980 5010
Motors (4) - Phase - HP -	Single	Three 1	Three 1	Three 1	Three 1	Three 2	Three 2	Three 3	Three 2	Three 3	Three 5	Three 5	Three 7 ¹ / ₂	Three 7 ¹ / ₂	Three 10
Hydraulic Data - GPM Limits - Inlet - Outlet (side) - Cell Number -	30 2 2 (F) 4811	45 2 2 (F) 4812	60 4 4 (M) 4821	75 4 4 (M) 4822	90 4 4 (M) 4831	120 4 4 (M) 4832	150 4 4 (M) 4841	180 4 4 (M) 4842	225 6 6 MC 4851	255 6 6MC 4852	285 6 6MC 4853	330 6 6MC 4861	375 6 6MC 4862	480 6 6MC 4871	525 6 6MC 4872

NOTES:

- 1 Nominal Tons are based upon 95°F HW, 85°F CW, 78°F WB, and 3 GPM/Ton.
- (2) Minimum clearance for adequate air supply.
- ③ Vertical discharge ducts are not available on these models.
- 4 Motor and belt guard are shipped separately for mounting at the job by others.
- 5 Fractional HP motors are 115/230 volt TENV. 1 HP through 10 HP motors are 230/460 volt TEFC.
- (6) This weight applies to applications not utilizing a remote sump, instead using the tower cold water basin.

Budzar Industries reserves the right to discontinue or change specifications without notice, consistent with sound engineering practice and current industrial standards.



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TOWER TANK SYSTEMS



TTS COOLING TOWER PUMP TANK SYSTEMS

ICE TTS Series Cooling Tower Pump Tank Systems deliver superior performance to your central chilled water system. A TTS System provides central pumping needs and control of cooling tower water in a pre-engineered package matched by Budzar Engineers to your process operation demands.

TTS units are capable of handling chiller capacities from 20 to 250 nominal tons.

Budzar also designs and manufactures specialized equipment for nonstandard applications. Our engineers have extensive experience in process chilling and heating applications for such industries as: rubber, paper, plastics, chemical, food and metal working. We take the time to understand your current and future needs and design a solution targeted at high quality and fast payback.



engineering PRECISION

Bulletin #42

EXCELLENT RETURN ON INVESTMENT

- Each Budzar unit is designed to maximize the productivity of your process. Budzar quality and reliability provide excellent value for each dollar invested.
- Optional stand-by pumps eliminate down time and keep your process running

LOW-COST, SIMPLE OPERATION AND MAINTENANCE

- Console-mounted high temperature, low pressure audible and visual alarms for process fluid supply allow you to attain peak process performance at all times.
- Close-coupled, centrifugal pumps with mechanical seals are selected for nonoverloading conditions. Long coupled, base-mounted pumps are optional.
- All pumps include Lug-type isolation valves that remain stationary to permit complete pump removal without the inconvenience of water or fluid spillage.
- Installation cost is lowered by combining our chillers with water reservoir assemblies. Our units arrive at your plant prepiped and pre-wired.
- Multiple-stage thermostat monitors process water temperature and controls tower fan and pump to prevent tower cell icing during winter months.
- Each Budzar unit is constructed with non-proprietary parts.

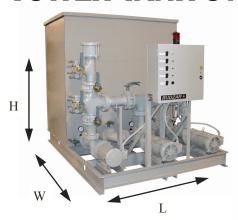
QUICK AND EASY INSTALLATION

- Completely factory-assembled pump decks on a common skid.
- All units are factory tested prior to shipment.

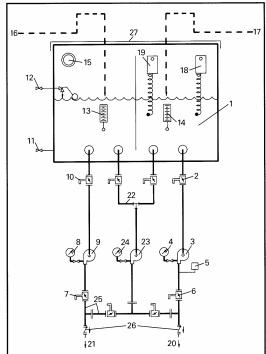




TOWER TANK SYSTEMS



Model TTS-150D with individual standby pumps and manifolding. Unit has NEMA 1 electrical panel with high pressure/low temperature alarm system.



- . Insulated Reservoir and Baffle
- 2. Suction Shut-Off Valve
- 3. Process Pump
- 4. Process Water Pressure Gauge
- 5. Low Pressure Alarm Switch
- 6. Process Water Flow Control/Shut-Off Valve
- 7. Tower Water Flow Control/Shut-Off Valve
- 8. Tower Water Pressure Gauge
- 9. Tower Water Pump
- 10. Suction Shut-Off Valves
- 11. Drain Valve
- 12. Make-Up Water Float Valve with Shut-Off Valve
- 13. Process Return Thermometer
- 14. Tower Return Thermometer
- 15. Overflow Port
- 16. Return from Process
- 17. Return from Tower
- 18. High Temperature Alarm Thermostat
- 19. Tower Fan and Tower Pump Cycling Thermostat (Two Stages)
- 20. Process Water Supply
- 21. Tower Water Supply

Options As Shown

- 2. Standby Pump suction Manifold
- 23. Standby Pump
- 24. Standby Pump Pressure Gauge
- 25. Standby Pump Discharge Manifold
- 26. Discharge Check Valve
- 7. Reservoir Cover

TTS DUAL PUMP COOLING TOWER TANK SYSTEMS

MODEL TTS		TTS-020D	TTS-040D	TTS-065D	TTS-100D	TTS-150D	TTS-200D	TTS-285D
Maximum Duty	TONS	20	40	65	100	150	200	285
Tank Size L x W x H	FEET	2.5 x 5 x 3	4 x 5 x 4	4 x 5 x 4	4 x 6 x 6	5 x 7 x 6	5 x 7 x 6	6.5 x 7.5 x 7
Tank Capacity—Overflow	GALLONS	220	500	500	950	1,400	1,400	2,250
Operating	GALLONS	140	300	300	600	900	900	1,400
Tower Pump—Flow @ PSIG	GPM/PSI	60/23	120/27	195/26	300/27	450/22	600/26	855/26
Pump Motor	HP	1.5	3.0	5.0	7.5	10	15	20
Discharge Connection	INCHES	2 NPT	2 ¹ / ₂ FLG	4 FLG	4 FLG	6 FLG	6 FLG	8 FLG
Process Pump—Flow @ 60 PSIG	GPM	60	120	195	300	450	600	855
Pump Motor—	HP	5.0	7.5	10	15	25	30	40
Discharge Connection	INCHES	2 NPT	2 ¹ / ₂ FLG	4 FLG	4 FLG	6 FLG	6 FLG	8 FLG
Nameplate Amps @ 460/3/60		10.2	15.8	21.6	32	48	61	79
230/3/60		20.4	31.6	43.2	64	96	122	158
Connections (NPT) Overflow—	INCHES	2	3	3	4	4	4	4
Make-Up-	INCHES	1/2	1/2	1/2	³ / ₄	³ / ₄	3/4	³ / ₄
Drain —	INCHES	1 ¹ / ₂	1 ¹ / ₂	1 ¹ / ₂	2	2	2	2
Shipping Weight (Approx.)	LBS	950	1,700	1,750	2,000	4,200	4,300	7,100
Operating Weight (Approx.)	LBS	2,800	5,850	5,900	10,000	15,900	16,000	25,500
Dimensions (Approx.) WxLxH—	INCHES	63x75x60	63x92x74	63x99x81	75x101x81	87x121x81	87x121x81	93x141x93

NOTE: Standby pumps are available for all models (mounted, piped and wired) as a recommended option. Standby pumps are identical to process pump.

TTS SINGLE PUMP COOLING TOWER TANK SYSTEMS

MODEL TTS		TTS-020S	TTS-040S	TTS-065S	TTS-100S	TTS-150S	TTS-200S	TTS-285S
Process/Tower—Flow @ 60 PSIG	GPM	60	120	195	300	450	600	855
Pump Motor	HP	5.0	7.5	10	15	25	30	40
Nameplate Amps @ 460/3/60		7.6	11	14	21	34	40	52
230/3/60		15.2	22	28	42	68	80	104

NOTE: Standby pump is available for all models (mounted, piped and wired) as a recommended option. Standby pump is identical to process pump.



