ADVANTAGE®
MAKING WATER WORK

Bi-Temp & Tri-Temp Units

Bi-Temp and Tri-Temp units are designed for applications where independent zones of chilled water and temperature stabilized water are necessary.

Advantage Bi-Temp models (prefix BI-) include a chilled water circuit and one (1) tempered water circuit. Tri-Temp models (prefix RC-) include a chilled water circuit and two (2) tempered water circuits. With proper selection, the chilled water circuits can provide 48°F - 70°F cooling water when no glycol is used and down to 20°F when glycol is added to the system. The tempered water circuits can supply temperature stabilized water between approximately 10°F above the chilled water set point to 250°F by heating and cooling the process water as required.

PRODUCT FEATURES

REFRIGERANT CIRCUIT

- Hermetic scroll compressor
- Capacity control with Digital Scroll technology or hot gas bypass
- Stainless/copper brazed plate evaporator
- Air or water condensed models available
- Air conenseded models use high efficiency copper tube aluminum fin coils with fan or blower for air movement
- Water condensed models use high efficiency tube in tube or shell and tube condenser with water regulator valve
- Filter/dryer, Sight glass & moisture indicator

CHILLED WATER CIRCUIT

- Stainless steel centrifugal pump
- Insulated reservoir
- Advantage M1 or MG chiller instrument

TEMPERED WATER CIRCUIT

- Cast iron centrifugal pump
- Flanged bolt-in heater
- Cast iron tanks for 10 and 16 KW heaters
- Cooling solenoid valve (VE instrument) or modulating valve (Temptender & G-Series instruments)

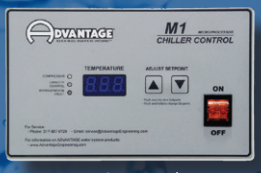
TEMPERED WATER CIRCUIT INSTRUMENTS

Temptender® – T Series

G Series

VE Series

CHILLED WATER CIRCUIT INSTRUMENTS



Maximum M1

Maximum MG

OTHER FEATURES

CHILLED WATER CIRCUIT INSTRUMENTATION
- Advantage M1 or MG chilled water microprocessor instruments
- Status indicators with error reporting
- Temperature display for to process & set point

TEMPERED WATER CIRCUIT INSTRUMENTATION
- VE microprocessor with solenoid valve for cooling
- G Series microprocessor with modulating cooling valve
- T Series microprocessor with modulating cooling valve
- General purpose microprocessor with solenoid valve for cooling
- Alternate control instrument to your specification

WARRANTY
- 1 year covering parts and labor

LIMITS
- Refrigerant high & low pressure
- Motor overload protection
- Tempered circuit water pressure relief valve
- Tempered circuit high temperature limit

PRESSURE & TEMPERATURE INDICATORS
- Refrigerant high & low pressure
- Chilled water pump pressure
- Tempered circuit pump pressure
- Chilled & tempered water temperature

ELECTRICAL
- NEMA 1 with power distribution block
- Branch circuit protection
- 5 kA RMS SSCR

GENERAL
- Rugged frame with casters for portability
- Enclosure panels

AVAILABLE OPTIONS

ELECTRICAL
- UL508A Enclosed electrical panel
- Primary disconnect switch

FLUID CIRCUIT
- TEFC pump motors
- Overhead piping kit
- Process line shut-off valves
- Non-ferrous construction
- Chilled water low flow by-pass
- Chilled water pressure reducing valve on supply to heating zone

INSTRUMENTATION
- Audible or audible/visual alarm

Contact factory for additional features and available options.

		Tri-Temp RC-									Bi-Temp BI-								
	Model[1]	1.5AD	2AD	4AD	5AD	5WD	7.5AD	7.5WD	10AD	10WD	1.5A	2A	4A	5A	5W	7.5A	7.5W	10A	10W
Chilled Water Circuit																			
Cooling	Capacity (tons)	1.5	2	4	5	5	7½	7½	10	10	1.5	2	4	5	5	7½	7½	10	10
Chiller Pump	HP	¾	¾	¾	2	2	2	2	2	2	¾	¾	¾	2	2	2	2	2	2
	GPM	3.6	4.8	9.6	12	12	18	18	24	24	3.6	4.8	9.6	12	12	18	18	24	24
	PSI	32	31	30	50	50	48	48	48	46	32	31	30	52	50	48	48	46	46
Reservoir Capacity	Gallons	7.5	7.5	25	25	25	25	25	25	25	7.5	7.5	25	25	25	25	25	25	25
Air-Cooled Condenser	Fan HP	¼	¼	¾	¾	n/a	¾	n/a	¾	n/a	¼	¼	¾	¾	n/a	¾	n/a	¾	n/a
	Fan Quantity	1	1	1	1	n/a	2	n/a	2	n/a	1	1	1	1	n/a	2	n/a	2	n/a
	CFM x 1000	2.4	2.4	5	5	n/a	10	n/a	10	n/a	2.4	2.4	5	5	n/a	10	n/a	10	n/a
Water-Cooled Condenser	Tower@85°F	n/a	n/a	n/a	n/a	15	n/a	23	n/a	30	n/a	n/a	n/a	n/a	15	n/a	23	n/a	30
Tempered Water Circuit(s)																			
Number Of Circuits		2	2	2	2	2	2	2	2	2	1	1	1	1	1	1	1	1	1
Process Heater (per circuit)	KW	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10	10
Process Pump (per circuit)	HP	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾	¾
	GPM	35	35	35	35	35	35	35	35	35	35	35	35	35	35	35	35	35	35
	PSI	30	30	30	30	30	30	30	30	30	30	30	30	30	30	30	30	30	30
General																			
Connection Size (inches)	Chilled Water	½	½	½	½	½	½	½	½	¼	½	½	¼	¼	¼	¼	¼	¼	¼
	Tempered Water	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼	1¼
	Make-Up	½	½	½	½	½	½	½	½	½	n/a	n/a	½	½	½	½	½	½	½
	Fill Port	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	1½	1½	n/a	n/a	n/a	n/a	n/a	n/a	n/a
	Condenser	n/a	n/a	n/a	n/a	¾	n/a	1	n/a	1	n/a	n/a	n/a	n/a	¾	n/a	1	n/a	1
Unit Amperage (FLA)	230/3/60	56	67	81	86	82	101	96	108	104	28	39	53	58	54	73	68	80	76
	460/3/60	28	34	40	43	41	51	48	54	52	14	20	26	29	27	37	34	40	38
Dimensions[2] (inches)	Height	57	57	61	61	57	61	57	61	57	41	41	61	61	57	61	57	61	57
	Width	42	46	34	34	34	34	34	34	34	33	33	34	34	42	34	42	34	42
	Depth	42	46	63	63	63	78	63	78	63	54	54	40	63	40	78	40	78	40
Weight (pounds)	Shipping	850	870	1300	1500	1050	1700	1100	1750	1125	600	620	1050	1250	800	1450	850	1500	875

1. Advantage Bi-Temp and Tri-Temp units are customized to meet specific customer requirements. Use this table above for reference only. Refer to your specific proposal for machine details.
2. Dimensions shown are approximate. Selection of options or customized configurations will change dimensions.
3. Approximate unit dimensions and weight crated for shipment. Not for construction purposes.

Proudly Made In The USA since 1977

Since product innovation and improvement is our constant goal, all features and specifications are subject to change without notice or liability.

525 East Stop 18 Road • Greenwood, IN 46142 • Phone: 317.887.0729 • www.AdvantageEngineering.com