

# **ALTECH**

## **Water-Cooled Type Industrial Chiller**

*Low Noise / Energy Saving*



### **Special Features**

- *Suitable for long-term stable operation, automatic control with precision thermoelectric controllers.*
- *High effective heat exchanger, the loss of cooling capacity is minimized, it is easy for oil return and prevented from frost crack.*
- *Equipped with a powerful compressor imported from U. S. A. and Europe. The compressor operates smoothly and quietly at high EER value.*

## Working condition for nominal cooling capacity of Industrial Chiller.

### Water-Cooled Type

Chilled Water		Cooling Water	
Inlet Temperature	Outlet Temperature	Inlet Temperature	Outlet Temperature
15°C	10°C	30°C	35°C

### Coefficient chart for adjusting the cooling capacity of Water-Cooled Industrial Chiller.

Chilled Water Outlet Temperature °C	Cooling Water Outlet Temperature °C				
	25	30	35	37	40
3	0.88	0.84	0.80	0.79	0.77
5	0.94	0.90	0.86	0.84	0.82
7	0.99	0.96	0.92	0.90	0.87
9	1.05	1.01	0.97	0.95	0.92
10	1.08	1.04	1.00	0.98	0.95
11	1.11	1.07	1.03	1.01	0.98
13	1.17	1.13	1.09	1.07	1.04
15	1.23	1.19	1.15	1.13	1.09
17	1.28	1.25	1.20	1.18	1.15
19	1.34	1.31	1.26	1.24	1.20
20	1.37	1.34	1.29	1.27	1.23

### Specification

#### Technical parameters table of Water-cooled Industrial Chiller (part1)

Parameter		Model	HT-03W	HT-04W	HT-05W	HT-06W	HT-08WD	HT-10WD	HT-12WD	HT-15WD	
Cooling Capacity	KW		9.59	12.43	15.91	18.91	24.85	31.83	38.37	50.14	
	50HZ/60HZ		11.22	14.54	18.62	22.45	29.08	37.24	44.89	58.66	
Total Input	kcal/h		8251	10682	13690	16503	21375	27370	32994	43120	
	50HZ/60HZ		9654	12498	16018	19308	25009	32023	38603	50451	
Max. Running Current	KW		2.8	3.55	4.5	5.4	6.8	8.4	10.1	13.1	
	A		6.7	8.4	10.5	12.6	16.5	20.4	24.6	31.8	
Power Supply		3N ~ 380V / 415V 50HZ / 60HZ									
Refrigerant	Name		R407C								
	Charge	Kg	1.7	2.2	2.8	3.4	2.2 x 2	2.8 x 2	3.4 x 2	4.2 x 2	
	Control Type		Capillary Tube						External Balanced Thermostatic Expansion Valve		
Compressor	Type		Hermetic Scroll or Piston								
	Motor	KW	2.25	3	3.75	4.5	3 x 2	3.75 x 2	4.5 x 2	5.5 x 2	
Cooling Water	Flow	m <sup>3</sup> /h	2.06	2.67	3.42	4.13	5.34	6.85	8.24	10.78	
	P.D.	Kpa	2.41	3.12	4.00	4.83	6.25	8.01	9.64	12.61	
	In/Out Pipe Size		G3/4"	G3/4"	G1-1/2"	G1-1/2"	G1-1/2"	G1-1/2"	G2"	G2"	
Chilled Water	Flow	m <sup>3</sup> /h	1.65	2.14	2.74	3.30	4.27	5.47	6.59	8.62	
	Tank	m <sup>3</sup>	1.93	2.50	3.20	3.86	5.00	6.40	7.72	10.09	
	In/Out Pipe Size		G1/4" x 4	G1/4" x 4	G3/4"	G1"	G3/4"	G2"	G2"	G2"	
Pump	Motor	Kw	0.55	0.55	0.75	0.75	0.75	1.5	1.5	1.5	
	Pressure	KPa	242	242	290	290	290	205	205	205	
Dimension	Length	mm	830	830	1080	1080	1300	1300	1600	1675	
	Width	mm	460	460	580	580	610	610	750	750	
	Height	mm	1020	1020	1230	1230	1445	1445	1445	1608	
Weight		kg	120	140	150	200	210	290	310	400	

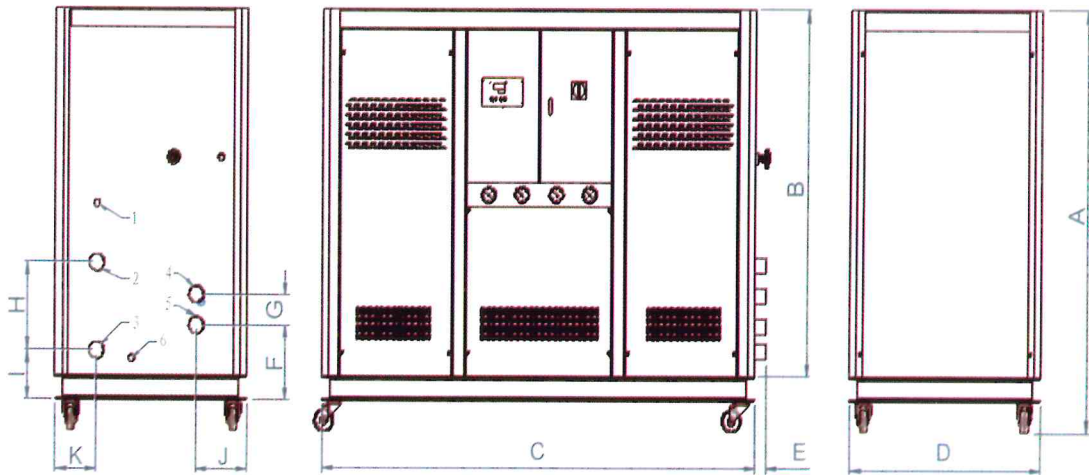
## Specification

*Technical parameters table of Water-cooled Industrial Chiller (part2)*

Parameter		Model	HT-20WD	HT-25WD	HT-30WD	HT-35WD	HT-40WD	HT-45WD	HT-50WD	HT-60WD	
Cooling Capacity	KW		67.14	81.53	99.19	117.28	129.06	148.68	153.91	198.12	
	50HZ/60HZ		78.56	95.39	116.05	137.22	151.00	173.95	180.07	237.75	
Total Input	kcal/h		57748	70120	85303	100869	110984	127868	132359	170383	
	50HZ/60HZ		67565	82040	99805	118016	129851	149605	154860	204460	
Max. Running Current	KW		17.3	21.3	25.6	29.4	33.1	38.6	42.5	59	
	A		42.1	48.5	58.3	65.4	75.4	80.6	88.4	101.92	
Power Supply		3N ~ 380V / 415V 50HZ / 60HZ									
Refrigerant	Name		R407C								
	Charge	Kg	5 x 2	6.3 x 2	7.5 x 2	9.2 x 2	10 x 2	11.3 x 2	12.5 x 2	15.6 x 2	
	Control Type		External Balanced Thermostatic Expansion Valve								
Compressor	Type		Hermetic Scroll or Piston								
	Motor	KW	7.5 x 2	9.4 x 2	11.3 x 2	13 x 2	15 x 2	16.9 x 2	18.8 x 2	22.5 x 2	
Cooling Water	Flow	m <sup>3</sup> /h	14.44	17.54	21.32	25.22	27.74	31.98	33.09	41.6	
	P.D.	Kpa	38	30	36	37	35	40	42	45	
	In/Out Pipe Size		G2"	G2"	G2-1/2"	G2-1/2"	G3"	G3"	G3"	G3"	
Chilled Water	Flow	m <sup>3</sup> /h	11.55	14.03	17.06	20.18	22.19	25.58	26.48	33.28	
	Tank	m <sup>3</sup>	0.285	0.405	0.405	0.405	0.61	0.61	0.61	0.61	
	In/Out Pipe Size		G2-1/2"	G2-1/2"	G2-1/2"	G3"	G3"	G3"	G3"	G3"	
Pump	Motor	Kw	2.2	2.2	4	4	4	4	4	4	
	Pressure	KPa	220	220	250	250	250	250	250	250	
Dimension	Length	mm	1880	1880	2130	2100	2200	2200	2200	2400	
	Width	mm	914	914	940	1020	1000	1070	1070	1150	
	Height	mm	1785	1790	1785	2000	1940	2100	2100	2200	
Weight	kg	440	620	690	760	850	950	1000	1100		

## Exterior Dimension

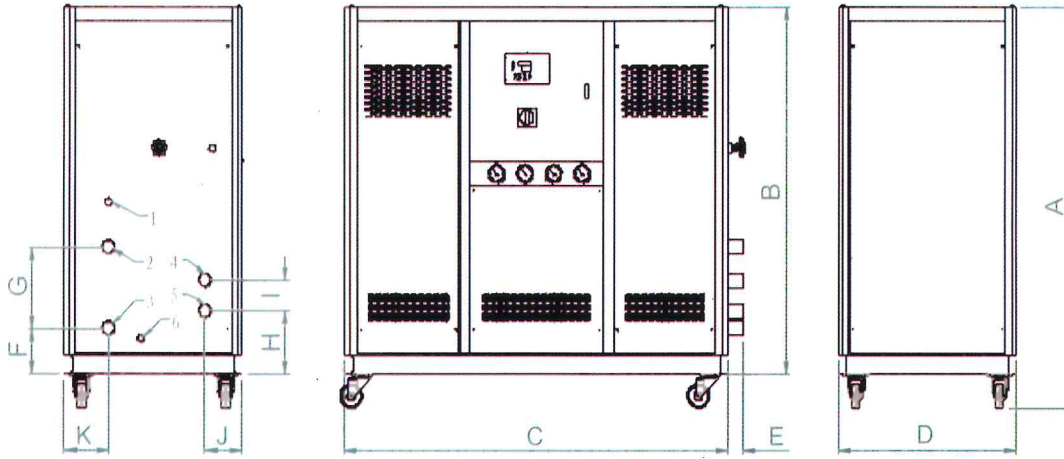
*Dimension of Water-cooled Industrial Chiller (HT-03W ~ HT-06W)*



Mark	Name	Model	HT-03W	HT-04W	HT-05W	HT-06W
1	Power Cable Connection		3/4"	3/4"	3/4"	1"
2	Chilled Water Inlet		1/4" x 4	1/4" x 4	1/4" x 4	1"
3	Chilled Water Outlet		1/4" x 4	1/4" x 4	1/4" x 4	1"
4	Cooling Water Outlet		3/4"	3/4"	3/4"	1-1/2"
5	Cooling Water Inlet		3/4"	3/4"	3/4"	1-1/2"
6	Sump Drain		1/2"	1/2"	1/2"	1/2"

Model	Dimensions (mm)							
	A	B	C	D	E	F	G	H
HT-03W	1020	930	830	460	85	75	85	100
HT-04W	1020	930	830	460	85	75	85	100
HT-05W	1230	1000	1080	580	80	110	80	130
HT-06W	1230	1000	1080	580	65	275	80	155

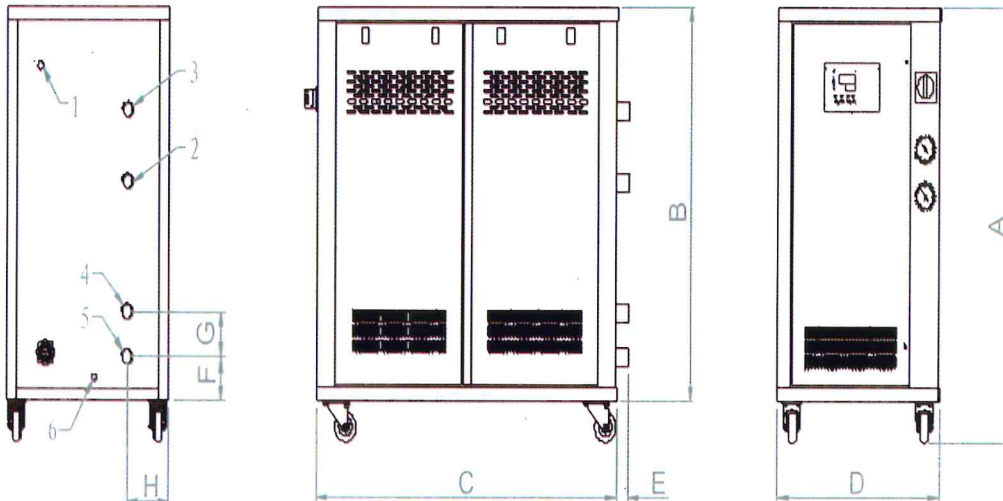
Dimension of Water-cooled Industrial Chiller (HT-08WD ~ HT-20WD)



Mark	Name	Model	HT-08WD	HT-10WD	HT-12WD	HT-15WD	HT-20WD
1	Power Cable Connection		1-1/2"	1-1/2"	1-1/2"	1-1/2"	1-1/2"
2	Chilled Water Inlet		1-1/2"	2"	2"	2"	2-1/2"
3	Chilled Water Outlet		1-1/2"	2"	2"	2"	2-1/2"
4	Cooling Water Outlet		1-1/2"	1-1/2"	1-1/2"	2"	2"
5	Cooling Water Inlet		1-1/2"	1-1/2"	1-1/2"	2"	2"
6	Water Tank Drain		1"	1"	1"	1"	1"

Model	Dimensions (mm)										
	A	B	C	D	E	F	G	H	I	J	K
HT-08WD	1445	1320	1300	610	75	140	450	120	80	165	150
HT-10WD	1445	1320	1300	610	75	160	520	130	80	145	150
HT-12WD	1445	1350	1600	750	75	160	520	130	80	145	150
HT-15WD	1608	1480	1675	750	75	190	345	215	130	235	190
HT-20WD	1785	1650	1880	914	75	225	240	220	130	270	215

Dimension of Water-cooled Industrial Chiller (HT-25WD ~ HT-60WD)



Mark	Name	Model	HT-25WD	HT-30WD	HT-35WD	HT-40WD	HT-45WD	HT-50WD	HT-60WD
1	Power Cable Connection		1-1/2"	1-1/2"	1-1/2"	1-1/2"	1-1/2"	2"	2"
2	Chilled Water Inlet		2-1/2"	2-1/2"	3"	3"	3"	3"	3"
3	Chilled Water Outlet		2-1/2"	2-1/2"	3"	3"	3"	3"	3"
4	Cooling Water Supply		2"	2-1/2"	2-1/2"	3"	3"	3"	3"
5	Cooling Water Supply		2"	2-1/2"	2-1/2"	3"	3"	3"	3"
6	Water Tank Drain		1"	1"	1"	1"	1"	1"	1"

Model	Dimensions (mm)										
	A	B	C	D	E	F	G	H	I	J	K
HT-25WD	1790	1650	1880	914	75	260	130	480	195	230	390
HT-30WD	1785	1650	2130	914	75	260	150	270	220	255	220
HT-35WD	2000	1860	2100	1020	75	230	130	480	275	250	170
HT-40WD	1940	1860	2200	1000	75	240	150	170	260	280	280
HT-45WD	2100	1960	1200	1070	75	260	150	455	230	260	190
HT-50WD	2100	1960	2200	1070	75	260	150	455	230	260	190
HT-60WD	2200	2060	2400	1150	75	260	150	455	230	260	190