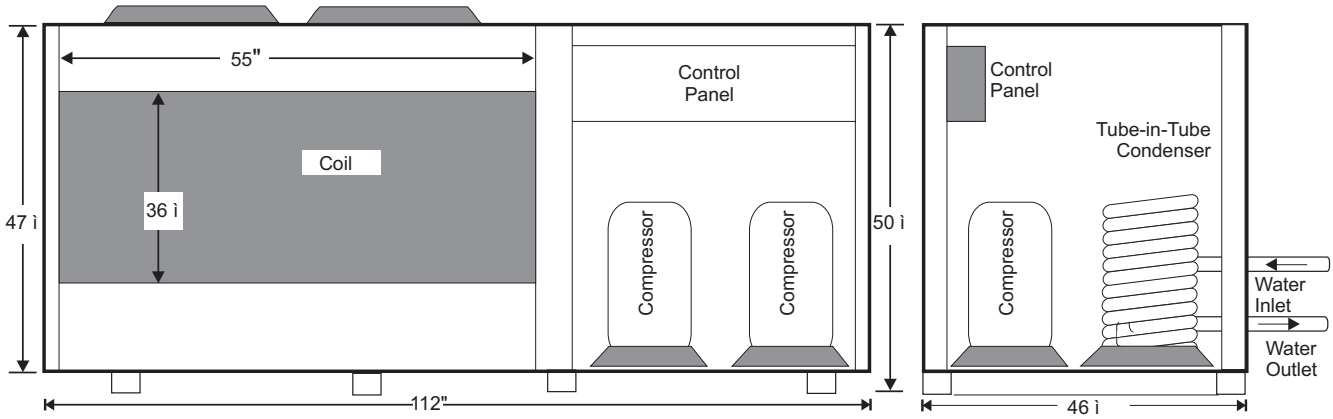

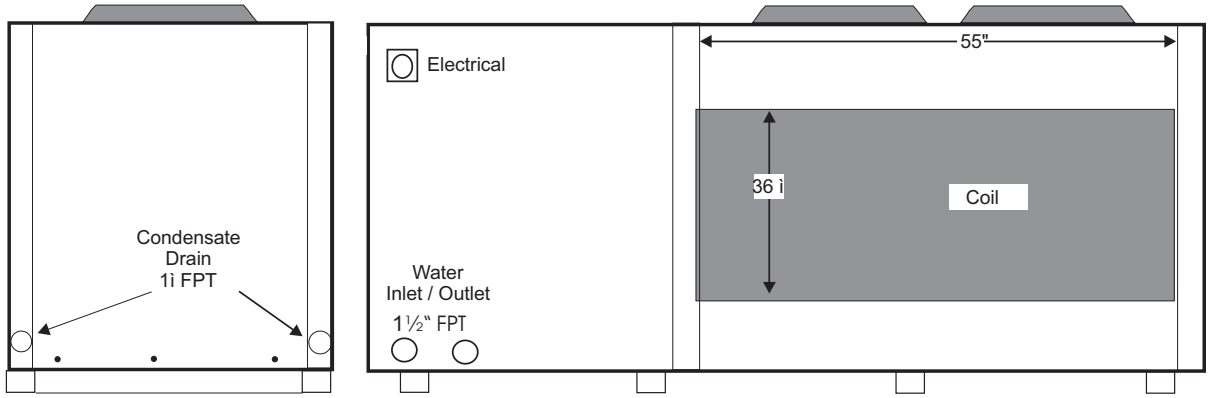

MODEL HPAS 2 DS 541

Heating Capacity	540,800 BTUH
Condenser Water Flow	100 GPM
Pressure Drop (cond.)	5.2 PSI
Entering Water Temp.	100 °F
Leaving Water Temp.	110.82 °F
COP	4.67
Compressors	(2) SM 160 Maneurop Scroll
Voltage	460/60/3Ø
RLA/LRA	26.0/175 ea.
Control Voltage	24 Volts
Minimum Circuit Amp.	40 compressor

Cooling Capacity	452,000 BTUH
Evaporator Construction	Copper/Aluminum
Cabinet Construction	Galvanized Steel
Entering Wet Bulb Temp.	72.0°F
Water Pump—2 - 1 HP	460/3/60 - 1.7 Amp ea
Cooling EER	15.84
Condensers	Double Wall Vented
Construction (Cond.)	Tube-in-Tube
Fan 2 - 1 HP	460/3/60 - 1.8 Amp ea
Refrigerant Type	R-22
Minimum Unit Amperage.	100 Amp.

STANDARD FEATURES

Liquid Receiver
Compressors Service Valves
Liquid Line Sight Glass
Insulated Compressor Compartment
Compressors Adjustable Time Delay Relay
Single Phase/ Voltage Protection
Five Year Compressor Warranty/One Yr. Parts
Liquid Line Dryer
Thermostatic Expansion Valves
Hinged Control Panel
Pre-wired Mechanical Controls
Insulated Suction Lines
High Side Pressure Control
Low Side Pressure Control

Options

Micro-Processor Based Control System
Painted Galvanize Cabinet
304 or 316 Stainless Steel Cabinet
Refrigerant Pump Down Solenoid Valves
Blower
TechniCoat 10-1 Evaporator Coating
Warranty on all Parts & Labor Year 2-5

Note: In View of Continuous Product Improvements, design and specification are subject to change without Notice

Heat Harvester Energy Efficient Products
Manufactured by
Environmentally Engineered Equipment, Inc.

MODEL HPA 2 DS 541

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
72 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	509,200	500,700	492,200	482,700	473,200	462,600	452,000	440,100	428,200	414,900	401,600	387,200	372,800
HMBTUH	575,685	570,496	565,306	559,493	553,679	547,277	540,875	533,719	526,563	518,519	510,475	501,911	493,347
WATTS	21,980	22,950	23,920	25,000	26,080	27,310	28,540	29,930	31,320	32,860	34,400	36,110	37,820
EER	23.17	21.82	20.58	19.31	18.14	16.94	15.84	14.7	13.67	12.63	11.67	10.72	9.86
COP	7.67	7.28	6.92	6.56	6.22	5.87	5.55	5.22	4.93	4.62	4.35	4.07	3.82
LV. WTR	81.52	86.41	91.31	96.19	101.08	105.95	110.82	115.68	120.54	125.37	130.21	135.04	139.87

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
67 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	469,400	461,500	453,600	444,700	435,800	425,800	415,800	404,600	393,400	380,900	368,400	354,700	341,000
HMBTUH	535,476	530,886	526,297	521,117	515,937	510,135	504,333	497,843	491,353	484,109	476,865	469,001	461,138
WATTS	21,860	22,830	23,800	24,890	25,980	27,210	28,440	29,820	31,200	32,740	34,280	35,990	37,700
EER	21.47	20.21	19.06	17.87	16.77	15.65	14.62	13.57	12.61	11.63	10.75	9.86	9.05
COP	7.18	6.81	6.48	6.13	5.82	5.49	5.2	4.89	4.61	4.33	4.08	3.82	3.58
LV. WTR	80.71	85.62	90.53	95.43	100.32	105.21	110.09	114.96	119.83	124.69	129.54	134.38	139.23

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
62 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	429,600	422,300	415,000	406,700	398,400	389,000	379,600	369,100	358,600	346,900	335,200	322,200	309,200
HMBTUH	495,266	491,277	487,287	482,742	478,196	472,994	467,792	461,968	456,144	449,700	443,256	436,092	428,928
WATTS	21,740	22,710	23,680	24,780	25,880	27,110	28,340	29,710	31,080	32,620	34,160	35,870	37,580
EER	19.76	18.6	17.53	16.41	15.39	14.35	13.39	12.42	11.54	10.63	9.81	8.98	8.23
COP	6.67	6.34	6.03	5.71	5.41	5.11	4.84	4.56	4.3	4.04	3.8	3.56	3.34
LV. WTR	79.91	84.83	89.75	94.66	99.57	104.46	109.36	114.24	119.13	124	128.87	133.73	138.58

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
57 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	392,200	385,400	378,600	370,800	363,000	354,300	345,600	335,800	326,000	315,000	304,000	291,700	279,400
HMBTUH	457,457	453,967	450,478	446,432	442,386	437,850	433,314	428,224	423,134	417,390	411,646	405,182	398,718
WATTS	21,620	22,590	23,560	24,660	25,760	26,980	28,200	29,580	30,960	32,500	34,040	35,750	37,460
EER	18.14	17.06	16.07	15.04	14.09	13.13	12.26	11.35	10.53	9.69	8.93	8.16	7.46
COP	6.2	5.89	5.6	5.3	5.03	4.75	4.5	4.24	4	3.76	3.54	3.32	3.12
LV. WTR	79.15	84.08	89.01	93.93	98.85	103.76	108.67	113.57	118.47	123.35	128.24	133.11	137.98

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
52 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	357,000	350,700	344,400	337,200	330,000	321,900	313,800	304,500	295,200	284,900	274,600	263,100	251,600
HMBTUH	421,847	418,858	415,868	412,388	408,909	405,007	401,105	396,480	391,856	386,812	381,768	376,104	370,441
WATTS	21,500	22,470	23,440	24,530	25,620	26,850	28,080	29,450	30,820	32,360	33,900	35,610	37,320
EER	16.6	15.61	14.69	13.75	12.88	11.99	11.18	10.34	9.58	8.8	8.1	7.39	6.74
COP	5.75	5.46	5.2	4.93	4.68	4.42	4.19	3.94	3.73	3.5	3.3	3.09	2.91
LV. WTR	78.44	83.38	88.32	93.25	98.18	103.1	108.03	112.93	117.84	122.74	127.64	132.53	137.41

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
47 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	324,000	318,200	312,400	305,700	299,000	291,400	283,800	275,200	266,600	256,900	247,200	236,400	225,600
HMBTUH	388,301	385,812	383,322	380,342	377,362	373,960	370,558	366,668	362,778	358,300	353,822	348,858	343,895
WATTS	21,340	22,310	23,280	24,370	25,460	26,690	27,920	29,300	30,680	32,210	33,740	35,450	37,160
EER	15.18	14.26	13.42	12.54	11.74	10.92	10.16	9.39	8.69	7.98	7.33	6.67	6.07
COP	5.33	5.07	4.82	4.57	4.34	4.11	3.89	3.67	3.46	3.26	3.07	2.88	2.71
LV. WTR	77.77	82.72	87.67	92.61	97.55	102.48	107.41	112.34	117.26	122.17	127.08	131.98	136.88

WB TE,P					ENTERING WATER TEMP. F @ 100 GPM								
42 DEG	70	75	80	85	90	95	100	105	110	115	120	125	130
CMBTUH	293,200	287,900	282,600	276,400	270,200	263,100	256,000	247,900	239,800	230,700	221,600	217,100	212,600
HMBTUH	357,023	355,000	352,976	350,496	348,016	345,114	342,212	338,822	335,432	331,554	327,676	329,149	330,622
WATTS	21,200	22,160	23,120	24,210	25,300	26,530	27,760	29,140	30,520	32,050	33,580	35,330	37,080
EER	13.83	12.99	12.22	11.42	10.68	9.92	9.22	8.51	7.86	7.2	6.6	6.14	5.73
COP	4.93	4.69	4.47	4.24	4.03	3.81	3.61	3.41	3.22	3.03	2.86	2.73	2.61
LV. WTR	77.14	82.1	87.06	92.01	96.96	101.91	106.85	111.78	116.71	121.63	126.56	131.59	136.62