

CAP FRAC 03 and 05 AIR COOLED CHILLER 1 & 3 PHASE









Standard Features

CAP's horizontal air discharge chillers Single Phase and three phase model "FRAC-03, and 05" are cost efficient packaged chillers, environmentally friendly R410A refrigerant. They include Bristol Compressors that are the choice in a wide range of applications that demand efficiency and reliability with low sound output, high efficiency coaxial counter balanced evaporators and copper tube aluminum fins air cooled condensers. A water pump is installed in the unit making this unit one of the most cost efficient for air conditioning applications. Many factory mounted options save expensive field labor and material, resulting in lower first costs.

Water Pump

The chiller water pump is carefully selected to fit most residential and small commercial applications, it's fully installed, piped and wired to the control box and piped to chiller system to save expensive field installation costs.

Condenser Air Fan

Unit is also designed to start and operate in higher ambient conditions, up to 115 degrees ^QF. The large surface, low speed, propeller fan for horizontal air flow fan is statically and dynamically balanced and operates at low tip speeds for low vibration and low sound levels.

Fan Guard:

Fan guard is chrome-plated to meet OSHA requirements.

Refrigerant Circuit

Each unit has one refrigerant circuit, with one single speed Reciprocating compressor. The refrigerant circuit includes compressor suction and discharge service ports, filter dryer, liquid line sight glass and expansion valve.

Power Connection

Unit is provided with single-point electrical power connection. Field wiring connection point will be at the outside junction box.



CAP CHILLER DESCRIPTION MODEL NUMBER NOMENCLATURE

		F	R	А	С	-	05		А
		REF	COMPR	TYPE	UNIT		CAPACIT	Υ	VOLT
REFRIGERANT TYPE									
F	R-410A								
М	NU-22								
В	R-134A								
х	SPECIAL								
COMPRESSOR TYPE	i								
S	SCROLL								
R	RECIP								
w	SCREW								
CONDENSER TYPE				I					
Α	AIR COOLED								
UNIT TYPE					I				
С	CHILLER								
UNIT CAPACITY (TO	N)					J			
03	3 TON (36,000 BTUH NON	1INAL)							
05	5 TON (60,000 BTUH NON	1INAL)							
UNIT VOLTAGE									
Α	208/230/1/60								
В	208/230/3/60								
С	460/3/60								
D	380/3/50								
E	575/3/60								



Bristol Compressors

Bristol Compressors are the choice in a wide range of applications that demand efficiency and reliability with low sound output. This time proven technology has been enhanced with continuous improvements and innovation in materials, machining, assembly techniques, and quality assurance. Bristol Compressors are durable, robust, and are used world-wide by leading manufacturers in applications across virtually every HVAC-R market segment

Chiller/Evaporator:

Coaxial counter flow high efficiency evaporators are UL listed. The evaporator has a uniquely built direct expansion distributor designed specifically for chillers.

Refrigerant Piping:

Refrigerant circuit includes:

- Liquid line valve with charging connection
- Sealed Filter drier
- Suction and discharge service connections
- Sight glass
- Expansion valve

Control Center:

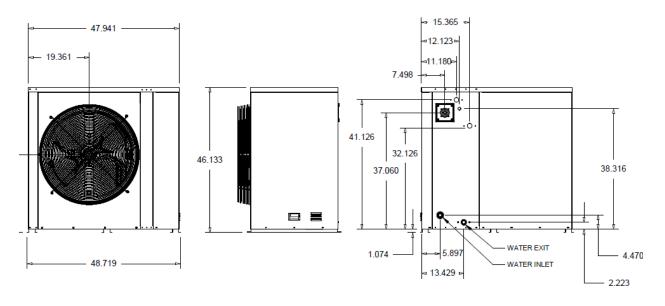
All power, operating and safety controls are mounted in a NEMA 3R enclosure.

- Single point electrical terminal block
- Compressors Contactor
- Fan Motor Relay
- High pressure switch per circuit with manual reset
- Low pressure switch per circuit with auto reset
- Chiller digital controller



UNIT DIMESIONS FRAC-03 and 05







	FRAC 03 and 05 Capacity														
	CAPACITY Compressor		Number of	Number of	Fans	FL EFF		II	PLV	Tons	Aguar				
FRAC	Tons.	Kw		Compressors	Fans					FSACS		Kw			
Size			(Kw)			(Kw)	EER	COP	EER						
03	3.4	4.5	4.5	1	1	0.34	9.92		12.45						
05	5.21	6.6	3.1	1	1	0.34	9.75		12.35						

This unit is rated in accordance with AHRI-550/590 standard rating conditions; options are not included in these ratings

EER Energy Efficiency Ratio
COP Coefficient of Performance
IPLV Integrated Part Load Value

	FRAC 03 and 05 Dimensions & Weights														
	We	ight	Length		Width		Height		Shipping		Shipping				
FRAC	D	ry							We	eight	Volume				
Size	LB	Kg	Inches	mm	Inches	mm	Inches	mm	lb	Kg	Cu ft	Cu mts			
03	490	222.7	48.00	1219	28.146	715	48.00	1219	521	236.8	40	1.13			
05	525	238.6	48.00	1219	28.146	715	48.00	1219	556	252.8	40	1.13			

	FSAC 03, and 05 ELECTRICAL DATA														
UNIT FSAC	COMPRESSOR DATA		•	FAN DATA	PUMP DATA				UNIT VOLTAGE	BREAK	ER SIZE				
SIZE	RLA	LRA	FLA	RPM	FLA	SIZE	RLA	LRA	FLA	RPM	FLA				
03-A	19.2	85	1.03	3450	3.8	3450	15.0	60	208/230/1/60	30	48				
03-B	8.5	48	1.03	3450	3.8	3450	15.0	60	208/230/3/60	20	30				
05-A	29.7	110	1.03	3450	3.8	3450	15.0	60	208/230/1/60	40	70				
05-B	14.8	88	1.03	3450	3.8	3450	15.0	60	208/230/3/60	30	50				
05-C	7.6	44	1.03	3450	3.8	3450	15.0	60	460/3/60	20	25				

	FRAC 005 COOLING PERFORMANCE DATA														
LWT					ENT	ERING AIR	TEMPERATI	JRE							
ºF		85 º F			95 º F			100 º F			110 º F				
	TONS	MBTU	GPM	TONS	MBTU	GPM	TONS	MBTU	GPM	TONS	MBTU	GPM			
35	4.92	59.07		4.78	57.41		4.65	55.81		4.52	54.24				
40	5.06	60.77		4.92	59.07		4.78	57.41		4.65	55.81				
42	5.21	62.52		5.06	60.77		4.92	59.07		4.78	57.41				
45	5.36	64.32	12.0	5.21	62.52	12.0	5.06	60.77	12.0	4.92	59.07	12.0			
46	5.51	66.17		5.36	64.32		5.21	62.52	Ī	5.06	60.77				
48	5.67	68.08		5.51	66.17		5.36	64.32		5.21	62.52				
50	5.84	70.04		5.67	68.08		5.51	66.17		5.36	64.32				
55	6.00	72.06		5.84	70.04		5.67	68.08		5.51	66.17				
60	6.18	74.13		6.00	72.06		5.84	70.04		5.67	68.08				

	FRAC 003 COOLING PERFORMANCE DATA														
LWT	ENTERING AIR TEMPERATURE														
ºF		85 º F			95 º F			100 º F		110 º F					
	TONS	MBTU	GPM	TONS	MBTU	GPM	TONS	MBTU	GPM	TONS	MBTU	GPM			
35	2.78	33.39		2.70	32.46		2.63	31.55		2.56	30.66				
40	2.86	34.35	Ī	2.78	33.39		2.70	32.46	Ī	2.63	31.55				
42	2.95	35.34	Ī	2.86	34.35		2.78	33.39	Ī	2.70	32.46				
45	3.03	36.36	7.5	2.95	35.34	7.5	2.86	34.35	7.5	2.78	33.39	7.5			
46	3.12	37.41		3.03	36.36		2.95	35.34		2.86	34.35				
48	3.21	38.48		3.12	37.41		3.03	36.36		2.95	35.34				
50	3.30	39.59	Ī	3.21	38.48		3.12	37.41	Ī	3.03	36.36				
55	3.39	40.73		3.30	39.59		3.21	38.48		3.12	37.41				
60	3.49	41.91		3.39	40.73		3.30	39.59		3.21	38.48				