ARKEMA
INNOVATIVE CHEMISTRY

FORANE® REFRIGERANTS BY ARKEMA

Saturation Pressure-Temperature Data for R-427A (psig)*

Temp. (°F)	Pressure Liquid	Pressure Vapor	Temp. (°C)	Temp. (°F)	Pressure Liquid	Pressure Vapor	Temp. (°C)	Temp. (°F)	Pressure Liquid	Pressure Vapor	Temp. (°C)	Temp. (°F)	Pressure Liquid	Pressure Vapor	Temp. (°C)
-49	*2.8*	*10.8*	-45.0	1	28.8	19.4	-17.2	51	95.4	78.0	10.6	101	219.0	192.9	38.3
-48	*2.1*	*10.2*	-44.4	2	29.7	20.2	-16.7	52	97.2	79.7	11.1	102	222.2	196.0	38.9
-47	*1.3*	*9.6*	-43.9	3	30.7	21.0	-16.1	53	99.1	81.4	11.7	103	225.4	199.1	39.4
-46	*0.5*	*9.0*	-43.3	4	31.6	21.8	-15.6	54	101.0	83.1	12.2	104	228.7	202.2	40.0
-45	0.1	*8.4*	-42.8	5	32.6	22.6	-15.0	55	102.9	84.8	12.8	105	232.0	205.4	40.6
-44	0.5	*7.8*	-42.2	6	33.5	23.4	-14.4	56	104.8	86.6	13.3	106	235.3	208.6	41.1
-43	0.9	*7.2*	-41.7	7	34.5	24.3	-13.9	57	106.8	88.4	13.9	107	238.7	211.8	41.7
-42	1.3	*6.5*	-41.1	8	35.5	25.1	-13.3	58	108.7	90.2	14.4	108	242.1	215.1	42.2
-41	1.8	*5.8*	-40.6	9	36.5	26.0	-12.8	59	110.7	92.0	15.0	109	245.6	218.4	42.8
-40	2.2	*5.1*	-40.0	10	37.6	26.9	-12.2	60	112.8	93.8	15.6	110	249.1	221.7	43.3
-39	2.6	*4.4*	-39.4	11	38.6	27.8	-11.7	61	114.8	95.7	16.1	111	252.6	225.1	43.9
-38	3.1	*3.7*	-38.9	12	39.7	28.7	-11.1	62	116.9	97.6	16.7	112	256.1	228.5	44.4
-37	3.5	*3.0*	-38.3	13	40.8	29.6	-10.6	63	119.0	99.5	17.2	113	259.7	231.9	45.0
-36	4.0	*2.2*	-37.8	14	41.8	30.6	-10.0	64	121.1	101.5	17.8	114	263.3	235.4	45.6
-35	4.5	*1.5*	-37.2	15	43.0	31.5	-9.4	65	123.3	103.4	18.3	115	267.0	238.9	46.1
-34	4.9	*0.7*	-36.7	16	44.1	32.5	-8.9	66	125.4	105.4	18.9	116	270.7	242.5	46.7
-33	5.4	0.1	-36.1	17	45.2	33.5	-8.3	67	127.6	107.5	19.4	117	274.4	246.1	47.2
-32	5.9	0.5	-35.6	18	46.4	34.5	-7.8	68	129.9	109.5	20.0	118	278.2	249.7	47.8
-31	6.5	0.9	-35.0	19	47.6	35.6	-7.2	69	132.1	111.6	20.6	119	282.0	253.4	48.3
-30	7.0	1.3	-34.4	20	48.8	36.6	-6.7	70	134.4	113.7	21.1	120	285.8	257.1	48.9
-29	7.5	1.7	-33.9	21	50.0	37.7	-6.1	71	136.7	115.8	21.7	121	289.7	260.9	49.4
-28	8.1	2.2	-33.3	22	51.2	38.7	-5.6	72	139.0	118.0	22.2	122	293.6	264.7	50.0
-27	8.6	2.6	-32.8	23	52.5	39.8	-5.0	73	141.4	120.1	22.8	123	297.5	268.5	50.6
-26	9.2	3.1	-32.2	24	53.7	40.9	-4.4	74	143.8	122.3	23.3	124	301.5	272.4	51.1
-25	9.7	3.5	-31.7	25	55.0	42.1	-3.9	75	146.2	124.6	23.9	125	305.5	276.3	51.7
-24	10.3	4.0	-31.1	26	56.3	43.2	-3.3	76	148.6	126.8	24.4	126	309.6	280.3	52.2
-23	10.9	4.5	-30.6	27	57.7	44.4	-2.8	77	151.1	129.1	25.0	127	313.7	284.3	52.8
-22	11.5	5.0	-30.0	28	59.0	45.6	-2.2	78	153.6	131.4	25.6	128	317.8	288.3	53.3
-21	12.1	5.5	-29.4	29	60.4	46.8	-1.7	79	156.1	133.8	26.1	129	322.0	292.4	53.9
-20	12.8	6.0	-28.9	30	61.7	48.0	-1.1	80	158.6	136.1	26.7	130	326.2	296.5	54.4
-19	13.4	6.5	-28.3	31	63.1	49.2	-0.6	81	161.2	138.5	27.2	131	330.4	300.7	55.0
-18	14.1	7.1	-27.8	32	64.6	50.5	0.0	82	163.8	141.0	27.8	132	334.7	304.9	55.6
-17	14.7	7.6	-27.2	33	66.0	51.7	0.6	83	166.5	143.4	28.3	133	339.0	309.2	56.1
-16	15.4	8.2	-26.7	34	67.5	53.0	1.1	84	169.1	145.9	28.9	134	343.4	313.5	56.7
-15	16.1	8.7	-26.1	35	68.9	54.3	1.7	85	171.8	148.4	29.4	135	347.8	317.8	57.2
-14	16.8	9.3	-25.6	36	70.4	55.7	2.2	86	174.5	151.0	30.0	136	352.3	322.2	57.8
-13	17.5	9.9	-25.0	37	71.9	57.0	2.8	87	177.3	153.6	30.6	137	356.7	326.7	58.3
-12	18.2	10.5	-24.4	38	73.5	58.4	3.3	88	180.1	156.2	31.1	138	361.3	331.2	58.9
-11	19.0	11.1	-23.9	39	75.0	59.8	3.9	89	182.9	158.8	31.7	139	365.8	335.7	59.4
-10	19.7	11.7	-23.3	40	76.6	61.2	4.4	90	185.7	161.5	32.2	140	370.5	340.3	60.0
-9	20.5	12.4	-22.8	41	78.2	62.6	5.0	91	188.6	164.2	32.8	141	375.1	344.9	60.6
-8	21.2	13.0	-22.2	42	79.8	64.1	5.6	92	191.5	166.9	33.3	142	379.8	349.6	61.1
-7	22.0	13.7	-21.7	43	81.5	65.5	6.1	93	194.4	169.7	33.9	143	384.5	354.3	61.7
-6	22.8	14.4	-21.1	44	83.1	67.0	6.7	94	197.4	172.5	34.4	144	389.3	359.1	62.2
-5	23.6	15.0	-20.6	45	84.8	68.5	7.2	95	200.3	175.3	35.0	145	394.1	363.9	62.8
-4	24.5	15.7	-20.0	46	86.5	70.1	7.8	96	203.4	178.1	35.6	146	399.0	368.8	63.3
-3	25.3	16.5	-19.4	47	88.2	71.6	8.3	97	206.4	181.0	36.1	147	403.9	373.7	63.9
-2	26.2	17.2	-18.9	48	90.0	73.2	8.9	98	209.5	184.0	36.7	148	408.9	378.7	64.4
-1	27.0	17.9	-18.3	49	91.8	74.8	9.4	99	212.6	186.9	37.2	149	413.9	383.7	65.0
0	27.9	18.7	-17.8	50	93.6	76.4	10.0	100	215.8	189.9	37.8	150	418.9	388.8	65.6

**Red Italics Indicate Inches of Mercury Below Atmospheric Pressure*

This data was generated using the NIST REFPROP Database

(Lemmon, E.W., Huber, M.L., McLinden, M.O. NIST Standard Reference Database 23: Reference Fluid Thermodynamic and Transport Properties-REFPROP, Version 9.0, National Institute of Standards and Technology, Standard Reference Data Program, Gaithersburg, 2010)