



REFRIGERATED AIR DRYER CDK SERIES

Stainless Steel Plate Heat Exchanger



D.I.T REFRIGERATED AIR DRYER

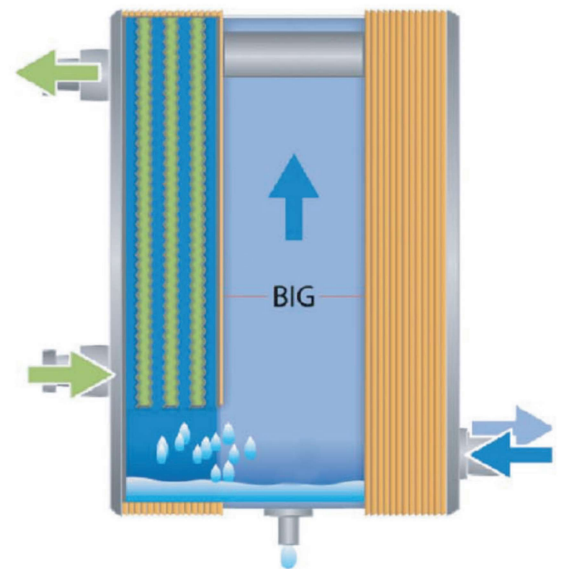
D.I.T Refrigerated Air Dryer offers the best solutions to minimize energy loss, reduce corrosion level, prolong life of compressed air systems and decrease maintenance costs.

About DIT Refrigerated Air Dryer

In compressed air systems, moisture is a huge problem and the prevention of corrosion caused by condensed water is an important issue. This is a critical factor as moisture and corrosion would minimize the performance and shorten the lifetime of compressed air systems and pneumatically controlled tools and equipment. To prevent this problem from occurring, the air dryer is the most commonly used solution. In these kinds of equipment, the main problems which affect the performance of compressed air systems are high volume, high pressure loss and complicated traditional types of heat exchangers which are not efficient. For this, DIT has successfully integrated the Brazed Heat Exchanger into our dryer system. This technology is supported by complete research and proven test data and the unique design has enabled DIT to obtain is being patented in France, USA, Taiwan and South-east Asia.

The Main Advantage of Plate Heat Exchanger

- A 3 in 1 configuration, the air-to-air exchanger, evaporators and demister separator are combined in one module.
- This ensures a very compact, robust and energy efficient design.
High efficiency heat transfer performance.
- Unique patents for cross-flow design features with the condensate being separated as soon as it is created along the cooling path.
- Energy saving application due to low pressure drop.
- Simple and easy maintenance.
- Dry air down to 3 °C pressure dew point at outlet.



- UL / CE / PED Certified
- Long life time durability
- Corrosion Resistant
- High Thermal Transfer Efficiency

- Easy Installation
- Proven and Reliable Quality
- Flexible Flows and Temp / Monitor Option
- Compact

Unique Design Separator

DIT's distinct non-mesh design separator has advantages of lower pressure drop, clogging free, maintenance free, and longer service life than other heat exchangers.

Oil Blockage Free

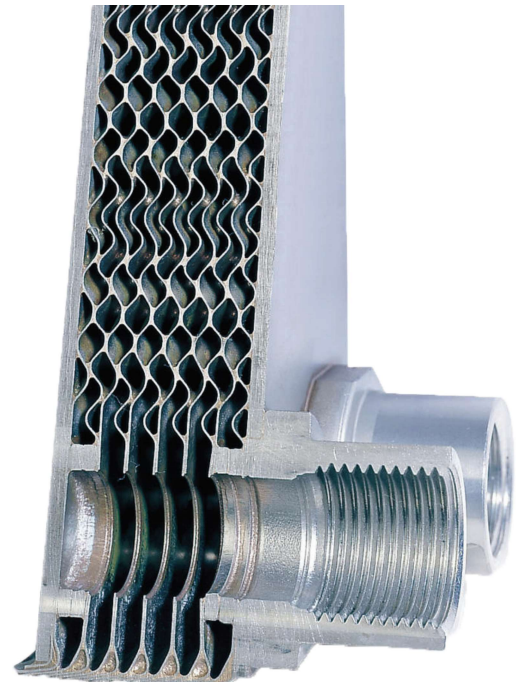
Patented plate design of evaporator, shorten the flow path of refrigerant by 30%, with the smooth surface of SUS 304, DIT can prevent lubricant oil residual which happens frequently in aluminum plate fin heat exchangers.

No Ice Blockage

With DIT patented plate design of evaporator, condensed water will not remain on the plates, but directly enters to a separation space of the evaporator, which effectively reduce the risk of ice blockage. (Need to check the drain valve regularly)

Equipped with Patented Leakage Testing Connector

Leading and multinational patent technology, exclusively ensures excellent quality of DIT 3-in-1 brazed plate heat exchanger residual which happens frequently in aluminum plate fin heat exchangers.





Internal UL/CE After Cooler & Condenser Fan

Provide qualified cooling fans with UL/ CE safety certification for long using life.

Powerful Blue Fin Air Condenser

DIT's large surface area heat exchanger contributes to higher performance on our reffridgerated air dryers when compared to other machines on the market.

Our anti-corrosive blue fins protect the condenser coils from different types of corrosion caused due to moisture, humidity, harsh weather conditions.

While improving the heat transfer process and increasing the cooling capacity, the blue-fin technology enhances the durability and longevity of DIT's Air Dryers.



Easy to Install

DIT's compact design and well-structured component layout provides extreme installation flexibility. The easily accessible components ensure that DIT dryer occupies less valuable plant floor space.

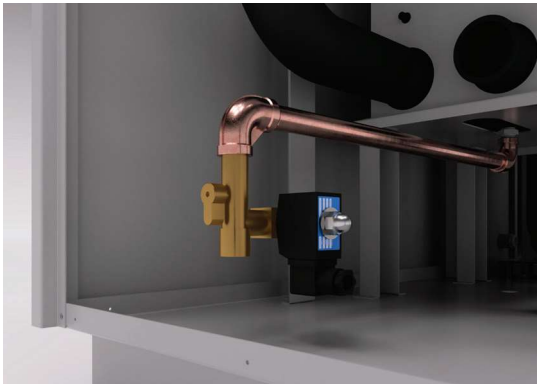


High Quality Refrigerant Compressor

Hermetic, Suction gas is cooled and protected against thermal and current overload. The compressor is mounted on anti-vibration rubber supports to ensure quiet running of the dryer.

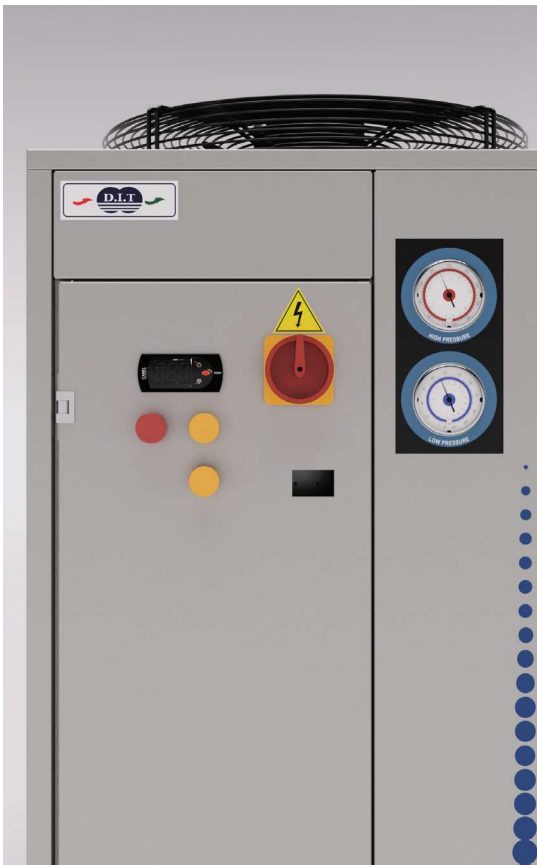
COPELAND | GMCC | MITSUBISHI

*Compressor brands vary from model to model.



Reliable Solenoid Valve

DIT's reliable solenoid valve is standard in all models. The discharge and pause timers are adjustable via the CAREL control panel. The flexible and adaptable operation of the valve ensures effective discharge of condensates.



Easy to Operate CAREL Control Panel

The advance digital display allows DIT's dryer operation to be easily monitored at a glance.



Use for model:
CDK 3-250



Use for model:
CDK 300-700



Use for model:
CDK 800 and up

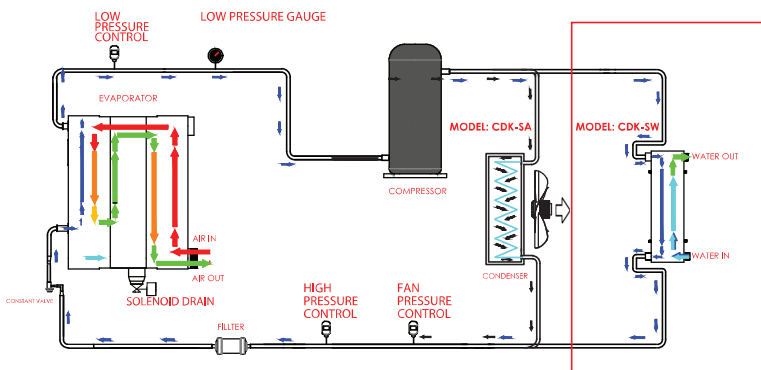
Technical Specifications: CDK-SAN & CDK-SA

MODEL	AIR FLOW		Power Supply V/PH/Hz	Nominal Power KW	Connection inch	Dimension (mm)			Weight Kg	Refrigerant	Pressure Bar(Max.)
	(m ³ /min)	(CFM)				W.	L.	H.			
CDK- 3SAN	0.5	16	230/1/50	0.19	1/2" PT	382	450	430	31	R134a	16
CDK- 5SAN	0.7	23	230/1/50	0.21	1/2" PT	382	450	430	32	R134a	16
CDK- 8SAN	0.9	32	230/1/50	0.25	1/2" PT	382	450	430	33	R134a	16
CDK- 3SA	0.5	16	230/1/50	0.19	1/2" PT	382	450	430	31	R134a	16
CDK- 5SA	0.7	23	230/1/50	0.21	1/2" PT	382	450	430	32	R134a	16
CDK- 8SA	0.9	32	230/1/50	0.25	1/2" PT	382	450	430	33	R134a	16
CDK- 10SA	1.4	49	230/1/50	0.37	1/2" PT	382	502	480	38	R134a	16
CDK- 15SA	1.8	64	230/1/50	0.42	3/4" PT	382	502	480	40	R134a	16
CDK- 20SA	2.7	95	230/1/50	0.57	3/4" PT	393	723	650	65	R134a	16
CDK- 30SA	4.3	152	230/1/50	0.73	1" PT	393	723	650	69	R134a	16
CDK- 40SA	5.5	194	230/1/50	1.08	1-1/2" PT	404	875	761	92	R134a	16
CDK- 50SA	6.8	240	230/1/50	1.28	1-1/2" PT	404	875	761	101	R407c	16
CDK- 60SA	8.1	286	230/1/50	1.51	1-1/2" PT	451	1190	882	115	R407c	16
CDK- 75SA	11	388	230/1/50	1.84	2" PT	451	1190	882	135	R407c	16
CDK- 100SA	15	530	400/3/50	2.68	2" PT	451	1190	882	145	R407c	16
CDK- 125SA	18	636	400/3/50	3.03	2-1/2" PT	451	1190	882	165	R407c	16
CDK- 150SA	23	812	400/3/50	3.55	2-1/2" PT	588	1204	1005	198	R407c	16
CDK- 175SA	28	989	400/3/50	4.20	2-1/2" PT	588	1204	1005	208	R407c	10
CDK- 200SA	30	1059	400/3/50	4.72	3" PT	588	1204	1005	225	R407c	10
CDK- 250SA	36	1271	400/3/50	5.05	3" PT	588	1204	1005	256	R407c	10
CDK- 300SA	43	1518	400/3/50	6.77	4" FL	1004	1560	1615	380	R407c	10
CDK- 350SA	48	1695	400/3/50	7.36	4" FL	1004	1560	1615	400	R407c	10
CDK- 400SA	61	2154	400/3/50	8.95	5" FL	1004	1560	1615	450	R407c	10
CDK- 500SA	72	2542	400/3/50	11.20	5" FL	1004	1560	1615	510	R407c	10
CDK- 600SA	89	3143	400/3/50	13.95	6" FL	1200	2200	1900	930	R407c	10
CDK- 700SA	96	3390	400/3/50	15.40	6" FL	1200	2200	1900	1050	R407c	10
CDK- 800SA	122	4308	400/3/50	19.90	6" FL	1200	2200	1900	1120	R407c	10
CDK- 1000SA	144	5085	400/3/50	22.80	8" FL	1200	2860	1900	1260	R407c	10
CDK- 1200SA	170	6003	400/3/50	26.80	8" FL	1200	2860	1900	1580	R407c	10
CDK- 1500SA	185	6532	400/3/50	39.70	10" FL	1200	3200	2050	2200	R407c	10
CDK- 2000SA	285	10063	400/3/50	44.80	12" FL	1200	5000	2050	2400	R407c	10
CDK- 2500SA	340	12005	400/3/50	52.80	12" FL	1200	5000	2050	3100	R407c	10

Technical Specifications: CDK-SW

MODEL	AIR FLOW		Power Supply V / PH / Hz	Nominal Power KW	Connection inch	Dimension (mm)			Weight Kg	Refrigerant	Pressure Bar(Max.)
	(m ³ /min)	(CFM)				W.	L.	H.			
CDK- 100SW	15	530	400/3/50	2.06	2" PT	451	1190	882	145	R407c	16
CDK- 125SW	18	636	400/3/50	2.50	2-1/2" PT	451	1190	882	165	R407c	16
CDK- 150SW	23	812	400/3/50	2.85	2-1/2" PT	451	1190	882	198	R407c	16
CDK- 175SW	28	989	400/3/50	3.30	2-1/2" PT	451	1190	882	220	R407c	10
CDK- 200SW	30	1059	400/3/50	3.95	3" PT	588	1204	1005	225	R407c	10
CDK- 250SW	36	1271	400/3/50	4.27	3" PT	588	1204	1005	285	R407c	10
CDK- 300SW	43	1518	400/3/50	4.60	4" FL	750	1204	1005	325	R407c	10
CDK- 350SW	48	1695	400/3/50	6.27	4" FL	750	1204	1005	390	R407c	10
CDK- 400SW	61	2154	400/3/50	6.86	5" FL	800	1204	1615	450	R407c	10
CDK- 500SW	72	2542	400/3/50	8.05	5" FL	800	1204	1615	750	R407c	10
CDK- 600SW	89	3143	400/3/50	10.30	6" FL	900	1800	1615	930	R407c	10
CDK- 700SW	96	3390	400/3/50	12.30	6" FL	900	1800	1615	1050	R407c	10
CDK- 800SW	122	4308	400/3/50	13.75	6" FL	900	1800	1615	1120	R407c	10
CDK- 1000SW	144	5085	400/3/50	18.25	8" FL	1200	1850	1800	1260	R407c	10
CDK- 1200SW	170	6003	400/3/50	20.60	8" FL	1200	2380	1800	1580	R407c	10
CDK- 1500SW	185	6532	400/3/50	24.60	10" FL	1200	2380	1800	1950	R407c	10
CDK- 2000SW	285	10063	400/3/50	36.50	12" FL	1200	2400	1800	2220	R407c	10
CDK- 2500SW	340	12005	400/3/50	41.20	12" FL	1200	2400	1800	2400	R407c	10

The specifications are subject to change without notice in advance



1. CDK-SAN & CDK-SA Series Air Inlet Temperature 65 °C (Max.)
2. Dew Point Temperature 3 - 10 °C
3. Ambient Temperature 5 - 43 °C (Max.)
4. CDK-SAN with Temperature Display
5. CDK-SA with Digital Controller
6. CDK-SAN & CDK-SW Series with no After Cooler
7. Air In-Out Pressure Drop < 3 Psig
8. 2 Years warranty for Compressor and Evaporator

Dryer maximum air flow = Dryer air flow x K1 x K2 x K3 x K4

Correction factor

Ambient temperature °C	28	30	32	35	38	40	42	43
Factor (K1) CDK-SAN/SA	1.14	1.10	1.06	1	0.94	0.91	0.88	0.86
Air inlet temperature °C	35	40	45	50	55	60	63	65
Factor (K2)	1.48	1.18	1	0.83	0.71	0.58	0.52	0.48
Working pressure Kg/cm ²	4	6	7	8	9	10	13	16
Factor (K3)	0.79	0.94	1	1.05	1.09	1.12	1.2	1.26
Dew point temperature °C	-	3	4	5	6	7	8	10
Factor (K4)	-	0.96	1	1.02	1.03	1.06	1.07	1.09
Water temperature °C	25	26	28	30	32	34	36	37
Factor (K1) CDK-SW	1.14	1.10	1.06	1	0.94	0.91	0.88	0.86



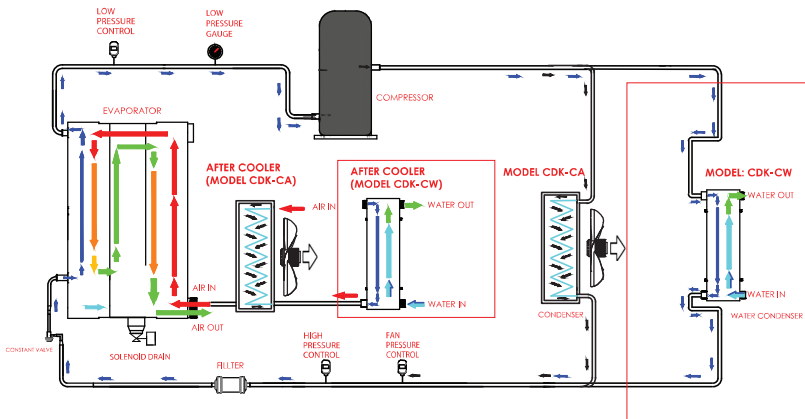
Technical Specifications: CDK-CA | Air Cooled

MODEL	Air Flow		Power Supply V/PH/Hz	Nominal Power (kw)	Connection inch	W.	Dimension (mm)			Weight Kg	Refrigerant	Pressure Bar (max)
	(m ³ /min)	(CFM)					L.	H.				
CDK-5CA	0.7	23	230/1/50	0.24	1/2" PT	380	500	750	60	R134a	16	
CDK-8CA	0.9	32	230/1/50	0.28	1/2" PT	380	500	750	65	R134a	16	
CDK-10CA	1.4	49	230/1/50	0.40	1" PT	388	718	880	80	R134a	16	
CDK-15CA	1.8	64	230/1/50	0.45	1" PT	388	718	880	88	R134a	16	
CDK-20CA	2.7	95	230/1/50	0.60	1" PT	388	718	880	91	R134a	16	
CDK-30CA	4.3	152	230/1/50	0.96	1-1/2" PT	388	868	1200	97	R134a	16	
CDK-40CA	5.5	194	230/1/50	1.22	1-1/2" PT	388	868	1200	113	R134a	16	
CDK-50CA	6.8	240	230/1/50	1.42	1-1/2" PT	388	868	1200	128	R407c	16	
CDK-60CA	8.1	286	230/1/50	1.65	2" PT	450	1200	1350	137	R407c	16	
CDK-75CA	11	388	230/1/50	1.98	2" PT	450	1200	1350	150	R407c	16	
CDK-100CA	15	530	400/3/50	3.00	2-1/2" PT	600	1200	1600	200	R407c	16	
CDK-125CA	18	636	400/3/50	3.35	2-1/2" PT	600	1200	1600	230	R407c	16	
CDK-150CA	23	812	400/3/50	4.20	2-1/2" PT	600	1200	1600	250	R407c	16	
CDK-175CA	28	989	400/3/50	4.85	2-1/2" PT	600	1200	1600	260	R407c	10	
CDK-200CA	30	1059	400/3/50	5.17	3" PT	1000	1500	1850	380	R407c	10	
CDK-250CA	36	1271	400/3/50	5.50	3" PT	1000	1500	1850	420	R407c	10	
CDK-300CA	43	1518	400/3/50	7.37	4" FL	1000	1800	2000	480	R407c	10	
CDK-350CA	48	1695	400/3/50	7.96	4" FL	1000	1800	2000	520	R407c	10	
CDK-400CA	61	2154	400/3/50	9.55	4" FL	1000	1800	2000	580	R407c	10	

Technical Specifications: CDK-CW | Water Cooled

MODEL	Air Flow		Power Supply V/PH/Hz	Nominal Power (kw)	Connection inch	W.	Dimension (mm)			Weight Kg	Refrigerant	Pressure Bar (max)
	(m ³ /min)	(CFM)					L.	H.				
CDK-100CW	15	530	400/3/50	2.06	2" PT	450	1200	1350	165	R407c	16	
CDK-125CW	18	636	400/3/50	2.50	2-1/2" PT	450	1200	1350	198	R407c	16	
CDK-150CW	23	812	400/3/50	2.85	2-1/2" PT	450	1200	1350	208	R407c	16	
CDK-175CW	28	989	400/3/50	3.30	2-1/2" PT	450	1200	1350	225	R407c	10	
CDK-200CW	30	1059	400/3/50	3.95	3" PT	600	1200	1600	256	R407c	10	
CDK-250CW	36	1271	400/3/50	4.27	3" PT	600	1200	1600	380	R407c	10	
CDK-300CW	43	1518	400/3/50	4.60	4" FL	600	1200	1600	400	R407c	10	
CDK-350CW	48	1695	400/3/50	6.27	4" FL	600	1200	1600	450	R407c	10	
CDK-400CW	61	2154	400/3/50	6.86	5" FL	650	1204	1350	510	R407c	10	
CDK-500CW	72	2542	400/3/50	8.05	5" FL	650	1204	1350	930	R407c	10	
CDK-600CW	89	3143	400/3/50	10.30	6" FL	800	1500	1900	1050	R407c	10	
CDK-700CW	96	3390	400/3/50	12.30	6" FL	800	1500	1900	1120	R407c	10	
CDK-800CW	122	4308	400/3/50	13.75	6" FL	800	1800	1900	1260	R407c	10	
CDK-1000CW	144	5085	400/3/50	18.25	8" FL	1200	1850	2000	1580	R407c	10	
CDK-1200CW	170	6003	400/3/50	20.60	8" FL	1200	1850	2000	1860	R407c	10	
CDK-1500CW	185	6532	400/3/50	24.60	10" FL	1200	1850	2000	2290	R407c	10	
CDK-2000CW	285	10063	400/3/50	36.50	12" FL	1200	2400	2100	2400	R407c	10	
CDK-2500CW	340	12005	400/3/50	41.20	12" FL	1200	2400	2100	2890	R407c	10	

The specifications are subject to change without notice in advance



Dryer maximum air flow = Dryer air flow x K1 x K2 x K3 x K4

Correction factor

Ambient temperature °C	28	30	32	35	38	40	42	43
Factor (K1) CDK-CA	1.14	1.10	1.06	1	0.94	0.91	0.88	0.86
Air inlet temperature °C	45	50	55	70	80	-	-	-
Factor (K2)	1.20	1.10	1	0.91	0.83	-	-	-
Working pressure Kg/cm ²	4	6	7	8	9	10	13	16
Factor (K3)	0.79	0.94	1	1.05	1.09	1.12	1.2	1.26
Dew point temperature °C	-	3	4	5	6	7	8	10
Factor (K4)	-	0.96	1	1.02	1.03	1.06	1.07	1.09
Water temperature °C	25	26	28	30	32	34	36	37
Factor (K1) CDK-CW	1.14	1.10	1.06	1	0.94	0.91	0.88	0.86

1. CDK-CA & CDK-CW Series Air Inlet Temperature 80 °C (Max.)
2. Dew Point Temperature 3 - 10 °C
3. Ambient Temperature from 5 - 43 °C (Max.)
4. CDK-CA & CDK-CW Series with After Cooler
5. Air In-Out Pressure Drop < 3 Psig
6. 2 Years warranty for Compressor and Evaporator

