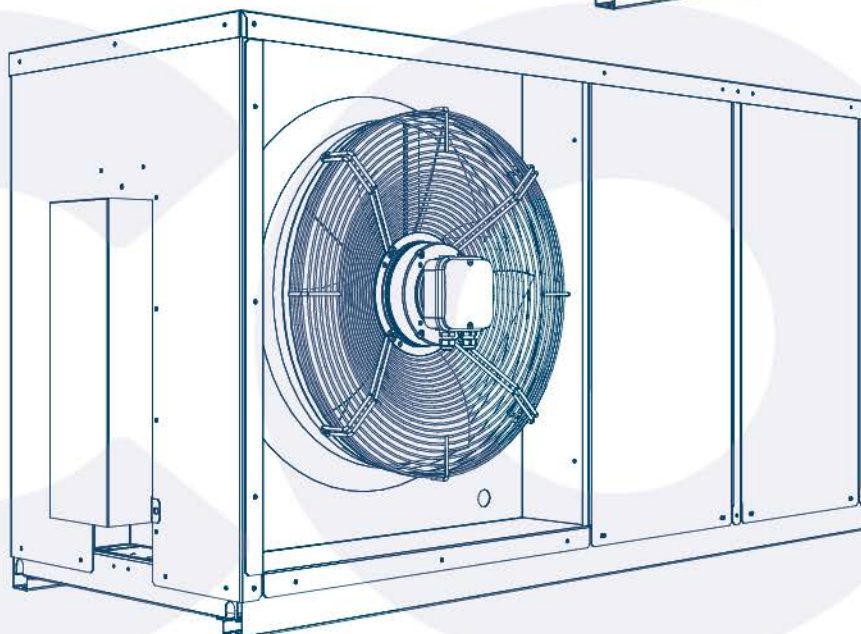
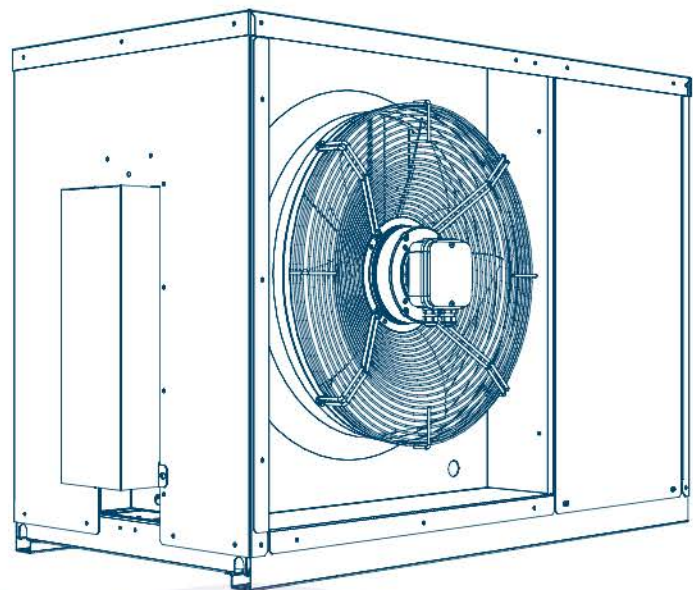




# *Sustainable* **Cold Solutions**

**CO<sub>2</sub>** condensing unit



According to SCM Natural Choice, we have developed a **range of CO<sub>2</sub> transcritical condensing units** with a very low carbon footprint and lower energy consumption than the traditional HFC solutions.

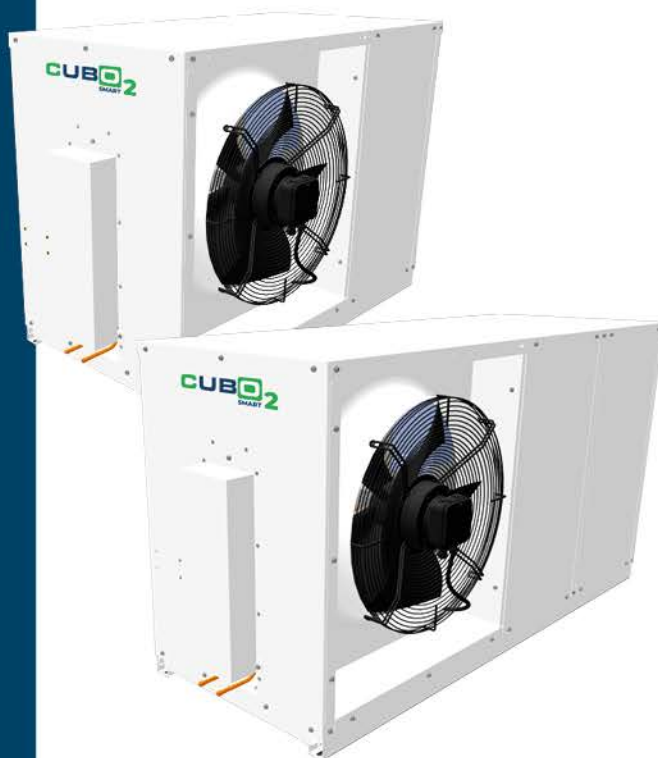
Design is compact and units are easy to install and maintain. Units are equipped with gas cooler and electrical panel, tested and factory programmed for an easy start-up.

## STANDARD CONFIGURATION

- ◇ **DC Brushless Rotary compressor**
- ◇ **Inverter modulation 25% - 100%**
- ◇ **EC fans**
- ◇ **Small footprint**
- ◇ **K65 connections**
- ◇ **Design pressure:**
  - 120 bar (high pressure side)
  - 80 bar (liquid line)
  - 80 bar (suction)

## OPTION ON REQUEST

- ◇ **Liquid Receiver 8 liter on MT (PED II)**
- ◇ **Water cooled gas cooler**
- ◇ **Adiabatic System**  
(suggested for ambient temperatures > +35°)



### Unità di refrigerazione a CO<sub>2</sub> per applicativi di Media e Bassa Temperatura

Sistemi transcritici ad espansione diretta

Modello UMT T MTDX. *Capacità frigorifera da 0,6 a 8,5 kW.*

Modello UMT T BTDX. *Capacità frigorifera da 0,65 a 6,6 kW.*

### CO<sub>2</sub>-Kälteanlage für die Anwendung im Mittleren und Tief- Verdampfungstemperaturbereich

Transcritisches System DX

Modell UMT T MTDX. *Kälteleistung von 0,6 bis 8,5 kW.*

Modell UMT T BTDX. *Kälteleistung von 0,65 bis 6,6 kW.*

### CO<sub>2</sub> Systems for medium and low temperature applications

Transcritical condensing units DX

Model UMT T MTDX. *Cooling Capacity from 0,6 up to 8,5 kW.*

Model UMT T BTDX. *Cooling Capacity from 0,65 up to 6,6 kW.*

### Groupes de condensation au CO<sub>2</sub> pour applications pour moyenne et basse température

Groupes de condensation transcritiques à détente directe

Modèle UMT T MTDX. *Puissance froid de 0,6 à 8,5 kW.*

Modèle UMT T BTDX. *Puissance froid de 0,65 à 6,6 kW.*

## MEDIUM TEMPERATURE

UMT T 030 MTDX	Evaporation Temperature [°C]														
	-15			-10			-5			0			5		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max		min	max	
40	429	2140	1,38	523	2507	1,58	575	2759	1,59	674	3143	1,79	787	3541	2,04
38	440	2165	1,44	526	2514	1,59	622	2889	1,80	727	3283	2,04	850	3704	2,31
32	455	2181	1,54	551	2548	1,76	653	2939	2,02	768	3362	2,32	905	3826	2,68
20	553	2490	2,25	671	2944	2,67	804	3454	3,20	959	4029	3,88	1145	4678	4,78
MEPS		1,76 (according to Ecodesign Directive EN 2009/125/EC)													
V/Ph/Hz		230/1+N+PE/50													
UMT T 045 MTDX	Evaporation Temperature [°C]														
	-15			-10			-5			0			5		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max		min	max	
40	648	3233	1,38	789	3785	1,58	868	4165	1,59	1018	4746	1,79	1188	5346	2,01
38	665	3270	1,46	794	3796	1,59	939	4362	1,80	1098	4957	2,04	1283	5593	2,31
32	686	3293	1,54	832	3847	1,76	986	4437	2,02	1160	5077	2,32	1366	5778	2,68
20	836	3761	2,25	1013	4445	2,67	1214	5215	3,20	1449	6084	3,88	1729	7064	4,78
MEPS		1,76 (according to Ecodesign Directive EN 2009/125/EC)													
V/Ph/Hz		230/1+N+PE/50													
UMT T 067 MTDX	Evaporation Temperature [°C]														
	-15			-10			-5			0			5		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max		min	max	
40	1038	4753	1,4	1242	5489	1,57	1459	6296	1,75	1690	7159	1,96	1822	8063	2,18
38	1061	4755	1,45	1266	5504	1,63	1485	6325	1,83	1721	7205	2,05	1975	8129	2,29
32	1094	4722	1,57	1307	5508	1,79	1541	6385	2,04	1796	7328	2,31	2042	8251	2,51
20	1375	5537	2,35	1647	6553	2,76	1952	7664	3,22	2291	8856	3,76	2581	9829	4,11
MEPS		3,44 (according to Ecodesign Directive EN 2009/125/EC)													
V/Ph/Hz		230/1+N+PE/50													
UMT T 100 MTDX	Evaporation Temperature [°C]														
	-15			-10			-5			0			5		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max		min	max	
40	1549	7904	1,56	1854	8193	1,57	2028	9113	1,57	2365	10366	1,75	2787	3652	1,51
38	1583	7098	1,45	1864	8202	1,58	2188	9411	1,77	2534	10704	1,98	2877	3652	1,56
32	1619	7047	1,53	1933	8211	1,73	2273	9491	1,97	2644	10866	2,25	2904	3904	1,81
20	1976	7997	2,22	2371	11096	3,05	2390	12834	3,52	3306	14670	4,05	3840	4324	2,56
MEPS		3,45 (according to Ecodesign Directive EN 2009/125/EC)													
V/Ph/Hz		400/3+N+PE/50													

### MTDX - Inverter modulation from 25 to 100% (1500 → 6000 rpm)

Dimensions: mm 1150x620x805 - PED: I Liquid receiver 2x2,4 liters; Optional PED: II Liquid receiver 8 liters - Weight: kg 150

Refrigeration connection: Suction inch 3/8" (exc. UMTT 100: 1/2") | Liquid inch 3/8"

Sound Pressure: dB(A) 44 (based on freefield area with semi-spherical sound emission in 10 m distance)

## LOW TEMPERATURE

UMT T 030 BTDX	Evaporation Temperature [°C]											
	-35			-30			-25			-20		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max	
40	511	2948	1,24	598	3089	1,29	705	3404	1,41	787	3652	1,51
38	511	2948	1,27	624	3214	1,38	737	3556	1,53	787	3652	1,56
32	511	2948	1,42	652	3344	1,56	760	3662	1,71	840	3904	1,81
20	511	2948	1,99	652	3344	2,13	760	3800	2,29	840	4324	2,56
MEPS		2,3 (according to Ecodesign Directive EN 2009/125/EC)										
V/Ph/Hz		230/1+N+PE/50										
UMT T 045 BTDX	Evaporation Temperature [°C]											
	-35			-30			-25			-20		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max	
40	772	4451	1,24	903	4664	1,29	1045	5048	1,39	1151	5337	1,46
38	772	4451	1,27	943	4852	1,38	1054	5141	1,46	1157	5563	1,58
32	772	4451	1,42	984	5049	1,56	1147	5331	1,64	1200	5700	1,76
20	772	4451	1,99	984	5049	2,13	1190	5738	2,29	1227	6309	2,48
MEPS		2,3 (according to Ecodesign Directive EN 2009/125/EC)										
V/Ph/Hz		230/1+N+PE/50										
UMT T 067 BTDX	Evaporation Temperature [°C]											
	-35			-30			-25			-20		
	T amb [°C]	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]		COP	Cooling Capacity [W]	
	min	max		min	max		min	max		min	max	
40	1676	6628	1,26	1751	6872	1,29	1860	7268	1,34	1932	7539	1,36
38	1676	6628	1,30	1827	7158	1,4	1897	7405	1,41	2002	7797	1,46
32	1676	6628	1,42	1827	7158	1,46	1897	7545	1,55	2002	7797	1,53
20	1676	6628	1,94	1908	7456	2,05	1897	8452	2,15	2002	7797	2,22
MEPS		2,24 (according to Ecodesign Directive EN 2009/125/EC)										
V/Ph/Hz		400/3+N+PE/50										

### BTDX - Inverter modulation from 25 to 100% (1500 → 6000 rpm)

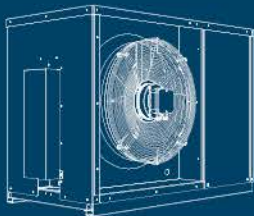
Dimensions: mm 1525x620x805 - PED: II Liquid receiver 8 liters - Weight: kg 176

Refrigeration connection: Suction inch 3/8" | Liquid inch 3/8"

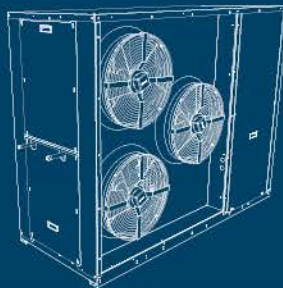
Sound Pressure: dB(A) 44 (based on freefield area with semi-spherical sound emission in 10 m distance)

# CO<sub>2</sub> RANGE

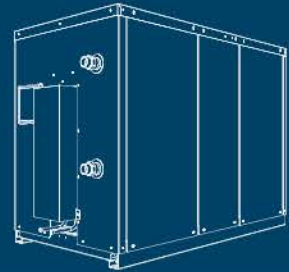
A solution for all applications



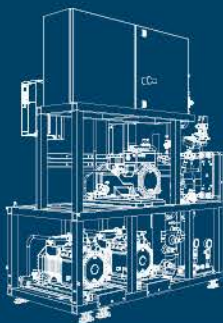
**CUBO<sub>2</sub>**  
SMART 2



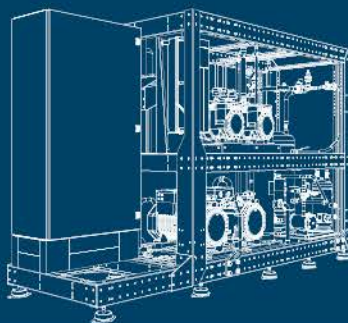
**CUBO<sub>2</sub>**  
PLUS 2



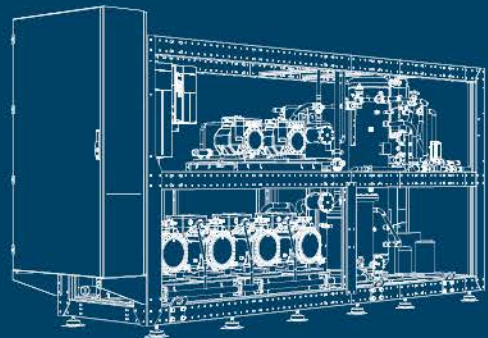
**CUBO<sub>2</sub>**  
AQUA



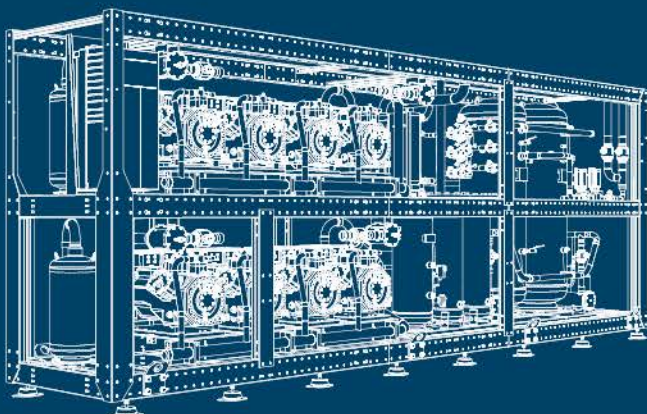
**SMART**  
**BOOSTER**



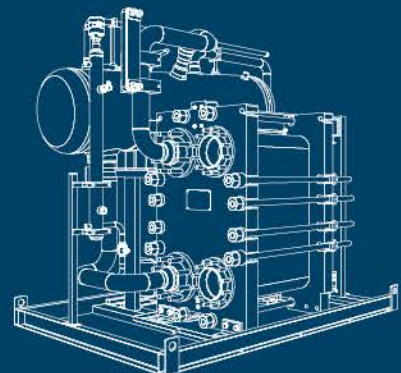
**LEAN**  
**BOOSTER**



**BOOSTER** SMKT



**BOOSTER** INDUSTRIAL



**CHILLER**

