

BVE DX

12 – 302 kW

Air cooled condensers with axial fans.
Outdoor installation.



AC AXIAL

EC AXIAL

R HFC R410A

The picture of the unit is indicative and may vary depending on the model

- OUTDOOR INSTALLATION
- 3 SOUND LEVELS
- AXIAL FANS WITH AC (DX-A) OR EC (DX-E) ELECTRIC MOTOR

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MEHITS CERTIFICATIONS

SYSTEM CERTIFICATIONS



ISO 9001 CERTIFICATION – MEHITS S.p.A.
Quality Management System



ISO 14001 CERTIFICATION – MEHITS S.p.A.
Environmental Management System



BS OHSAS 18001 CERTIFICATION – MEHITS S.p.A.
Occupational Health and Safety Management System

PRODUCT CERTIFICATIONS BY COUNTRY



CE MARKING

MEHITS units are in compliance with the European Directives in force.



CCC – CQC CERTIFICATION
(People's Republic of China)



EAC CERTIFICATION
(Russian Federation, Belarus, Kazakhstan)



GENERAL CHARACTERISTICS

Air cooled condenser with axial fans and horizontal air flow.
The machines are made for outdoor installation.
The constructive solutions allow high application flexibility.
2 series with 19 models each with capacity from 12 to 302 kW are available.
The series has an independent power supply from the indoor unit.
Among the indoor unit and the condenser is necessary the refrigerant connection and electrical connection of the condensing proportional control signal and the alarms.

PRODUCT FEATURES AND BENEFITS

- Suitable for any type of plant
- Independent power supply from the indoor unit;
- Horizontal air flow – from coil to fan.
- Vertical air flow (optional).
- 3 sound levels and quiet operation particularly suitable for applications in urban areas.
- Operating life of the project exceeding 10 years

F-GAS DIRECTIVE

The units highlighted in this publication contain <HFC R410A [GWP₁₀₀ 2088]> fluorinated greenhouse gases.

MODEL IDENTIFICATION

BVE DX-A STD M 14	
BVE DX	Air cooled condensers
-A	Series with axial fans with AC electric motor
-E	Series with axial fans with EC electric motor
STD	Sound level STD – standard LNO – low noise (Nominal air flow at 85%) ELN - extremely low noise (Nominal air flow at 70%)
M	Power supply M – Single-phase T – Three-phases
14	Capacity (kW)

WORKING LIMITS

AMBIENT AIR TEMPERATURE	
50°C	Maximum ambient air temperature
POWER SUPPLY	
± 10%	Maximum tolerance of the supply voltage (V)

STORING TEMPERATURE

If the machine is not installed on receipt and is stored for a long time, store it in a protected place, at temperatures ranging between -30°C and 50°C in absence of superficial condensation and direct sun light.



MAIN COMPONENTS



FRAMEWORK

- Base, self-supporting frame and panelling in steel plate with protective surfaces treatment in compliance with UNI ISO 9227/ASTMB117 and ISO 7253, and painted with epoxy powders.
- Removable lateral panels.
- Lateral compartment for electrical panel with direct access to control and regulation devices;
- Colour: RAL 9002

FAN SECTION – BVE DX-A

- Axial fans with sickle-shaped blades, fan guard and optimized for low noise levels.
- AC electric motor with external rotor.
- Phase-cut electronic regulator for continuous variation of the rotation speed.
The motor rotation control is obtained according to the 0÷10V proportional signal coming from the internal unit microprocessor control.
- IP54 enclosure class

FAN SECTION – BVE DX-E

- Axial fans with sickle-shaped blades, fan guard and optimized for low noise levels.
- External rotor EC type electric motor with step-less variable speed control. The motor rotation control is obtained according to the 0÷10V proportional signal coming from the internal unit microprocessor control.
- IP54 enclosure class.

CONDENSING COIL

- Condensing coil with internally corrugated copper tubes and high efficiency aluminium fins, specifically developed to provide high heat transfer and lower pressure drops. The combination of two factors, special tubes and fins, allow to optimally combine the following aspects:
 - Maximum capacity relative to the size of the exchanger.
 - Minimum charge of refrigerant.
 - Reduction of the air flow required for the heat exchange.
- Frame in galvanized steel.

REFRIGERANT CIRCUIT - TEAM MATE

- The condenser is supplied with seal charge.
- Schrader valve on the heat exchanger coil collector.
- Valves on gas and liquid line for coupling to refrigerant pipe. The valves are supplied in mounting kit. The condenser is supplied with nitrogen seal.

ELECTRICAL PANEL

In accordance with EN60204-1 norms, suitable for outdoor installation, IP54 enclosure class, complete with:

- Terminals for power supply:
 - 230/1/50 for models "M"
 - 400/3+N/50 for models "T"Independent power supply from the indoor unit.
- Terminals for electrical connections:
 - 0÷10V signal for condensing control system (connect to indoor machine).
 - alarm signal (connect to indoor machine).
- Electronic phase-cut regulator for fans speed control, for BVE DX-A only.

OPTIONAL ACCESSORIES

- Support legs for vertical air flow.
- Coil with Blygold treatment.
- Coil with cataphoresis treatment.

TECHNICAL DATA

BVE DX-A

MODEL		M 11	M 14	M 17	M 20	M 25	M 30	M 35
STD version								
CAPACITY (1)	kW	11,9	14,4	18,2	20,6	24,0	32,4	37,0
Air flow	m³/h	4900	4500	5200	6400	9600	9500	9100
Fans engaged power	kW	0,25	0,25	0,25	0,39	0,53	0,53	0,53
LNO version								
CAPACITY (1)	kW	10,8	12,9	16,2	18,4	21,7	28,9	32,6
Air flow	m³/h	4165	3825	4420	5440	8160	8075	7735
Fans engaged power	kW	0,21	0,21	0,21	0,33	0,45	0,45	0,45
ELN version								
CAPACITY (1)	kW	9,5	11,2	14,1	16,0	19,1	25,1	27,9
Air flow	m³/h	3430	3150	3640	4480	6720	6650	6370
Fans engaged power	kW	0,18	0,18	0,18	0,27	0,37	0,37	0,37
COMMON DATA								
POWER SUPPLY	V/ph/Hz	230/1/50	230/1/50	230/1/50	230/1/50	230/1/50	230/1/50	230/1/50
AC AXIAL FANS	Nr.	1	1	1	1	1	1	1
External static pressure	Pa	0	0	0	0	0	0	0
Max absorbed current (FLA)	A	1,2	1,2	1,2	1,8	2,9	2,9	2,9
DIMENSIONS								
Length	mm	875	875	1200	1200	1400	1400	1400
Width	mm	540	540	540	540	665	665	665
Height	mm	727	727	727	727	1027	1027	1027
NET WEIGHT	kg	51	55	66	72	102	111	120

MODEL		M 45	M 50	M 60	M 70	M 95	M 110	M 130
STD version								
CAPACITY (1)	kW	47,1	54,6	61,3	73,0	97,7	109,4	130,8
Air flow	m³/h	12000	17000	16000	18000	28200	27200	37800
Fans engaged power	kW	0,78	1,08	1,08	1,08	1,59	1,59	2,12
LNO version								
CAPACITY (1)	kW	41,6	48,9	54,4	62,4	87,1	96,7	116,6
Air flow	m³/h	10200	14450	13600	15300	23970	23120	32130
Fans engaged power	kW	0,66	0,92	0,92	0,92	1,35	1,35	1,80
ELN version								
CAPACITY (1)	kW	35,8	42,8	47,0	55,2	75,6	83,0	101,2
Air flow	m³/h	8400	11900	11200	12600	19740	19040	26460
Fans engaged power	kW	0,55	0,76	0,76	0,76	1,11	1,11	1,48
COMMON DATA								
POWER SUPPLY	V/ph/Hz	230/1/50	230/1/50	230/1/50	230/1/50	230/1/50	230/1/50	230/1/50
AC AXIAL FANS	n.	2	2	2	2	3	3	4
External static pressure	Pa	0	0	0	0	0	0	0
Max absorbed current (FLA)	A	3,6	5,7	5,7	5,7	8,5	8,5	11,4
DIMENSIONS								
Length	mm	1600	1850	1850	2320	3490	3490	4540
Width	mm	665	665	665	665	665	665	665
Height	mm	1027	1027	1027	1140	1150	1150	1150
NET WEIGHT	kg	153	175	188	214	240	270	320

1. Referred to condensing temperature at 50°C and outdoor air temperature at 35°C.

The units highlighted in this publication contain <HFC R410A [GWP₁₀₀ 2088]>



TECHNICAL DATA

BVE DX-A

MODEL	M 140	T 185	T 210	T 250	T 280
STD version					
CAPACITY (1)	kW	147,0	198,6	226,7	269,7
Air flow	m ³ /h	36000	56000	54000	74600
Fans engaged power	kW	2,12	3,18	3,18	4,24
LNO version					
CAPACITY (1)	kW	130,0	177,1	200,4	240,7
Air flow	m ³ /h	30600	47600	45900	63410
Fans engaged power	kW	1,8	2,7	2,7	3,6
ELN version					
CAPACITY (1)	kW	111,7	153,7	172,0	209,0
Air flow	m ³ /h	25200	39200	37800	52220
Fans engaged power	kW	1,48	2,23	2,23	2,97
COMMON DATA					
POWER SUPPLY	V/ph/Hz	230/1/50	400/3+N/50(*)	400/3+N/50(*)	400/3+N/50(*)
AC AXIAL FANS	n.	4	6	6	8
External static pressure	Pa	0	0	0	0
Max absorbed current (FLA)	A	11,4	17,1	17,1	22,8
DIMENSIONS					
Length	mm	4540	3490	3490	4540
Width	mm	665	665	665	665
Height	mm	1150	2250	2250	2250
NET WEIGHT	kg	350	470	520	630

1. Referred to condensing temperature at 50°C and outdoor air temperature at 35°C.

(*) Available also with 230/1/50 power supply. Please refer to the wiring diagram of the unit.
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REMOTE CONDENSERS WITH AXIAL FANS WITH “EC” ELECTRIC MOTORS – BVE DX-E



The “EC” axial fans are equipped with a brushless type synchronous motor with integrated electronic commutated system.

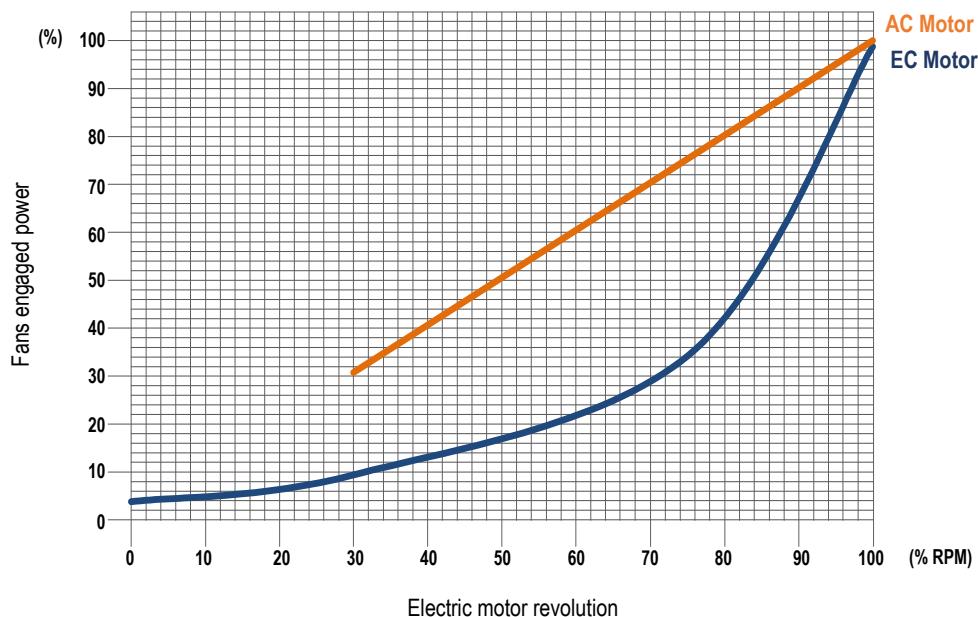
The motor rotation control is obtained with the EC system (Electronic Commutation) that manage the motor according to the 0÷10V proportional signal coming from the microprocessor control.

Characteristics of “EC” motors:

- no electromagnetic noise
- efficiency 83÷86%
- minimum power input

Characteristics comparison between an “AC” asynchronous electric motor with phase-cut control (voltage controller) and “EC” brushless type synchronous motor.

FAN MOTOR POWER INPUT COMPARISON



WARNING

The graphs are referred to working condition with null available static pressure (0 Pa).

TECHNICAL DATA

BVE DX-E

MODEL	T 11	T 14	T 17	T 20	T 25	T 30	T 35
STD version							
CAPACITY (1)	kW	11,9	14,4	18,2	20,6	24,0	32,4
Air flow	m³/h	4900	4500	5200	6400	9600	9500
Fans engaged power	kW	0,17	0,18	0,18	0,30	0,35	0,40
LNO version							
CAPACITY (1)	kW	10,8	12,9	16,2	18,4	21,7	28,9
Air flow	m³/h	4165	3825	4420	5440	8160	8075
Fans engaged power	kW	0,11	0,11	0,11	0,18	0,21	0,24
ELN version							
CAPACITY (1)	kW	9,5	11,2	14,1	16,0	19,1	25,1
Air flow	m³/h	3430	3150	3640	4480	6720	6650
Fans engaged power	kW	0,06	0,06	0,06	0,10	0,12	0,14
COMMON DATA							
POWER SUPPLY	V/ph/Hz				380-480/3/50-60		
AC AXIAL FANS	Nr.	1	1	1	1	1	1
External static pressure	Pa	0	0	0	0	0	0
Max absorbed current (FLA)	A	1,0	1,0	1,0	1,5	1,4	1,4
DIMENSIONS							
Length	mm	875	875	1200	1200	1400	1400
Width	mm	540	540	540	540	665	665
Height	mm	727	727	727	727	1027	1027
NET WEIGHT	kg	51	55	66	72	102	111
kg							120

MODEL	T 45	T 50	T 60	T 70	T 95	T 110	T 130
STD version							
CAPACITY (1)	kW	47,1	54,6	61,3	73,0	97,7	109,4
Air flow	m³/h	12000	17000	16000	18000	28200	27200
Fans engaged power	kW	0,61	0,83	0,87	0,81	1,21	1,28
LNO version							
CAPACITY (1)	kW	41,6	48,9	54,4	62,4	87,1	96,7
Air flow	m³/h	10200	14450	13600	15300	23970	23120
Fans engaged power	kW	0,37	0,51	0,53	0,50	0,74	0,79
ELN version							
CAPACITY (1)	kW	35,8	42,8	47,0	55,2	75,6	83,0
Air flow	m³/h	8400	11900	11200	12600	19740	19040
Fans engaged power	kW	0,21	0,28	0,30	0,28	0,41	0,44
COMMON DATA							
POWER SUPPLY	V/ph/Hz				380-480/3/50-60		
AC AXIAL FANS	n.	2	2	2	2	3	3
External static pressure	Pa	0	0	0	0	0	0
Max absorbed current (FLA)	A	3,0	2,8	2,8	2,8	4,2	4,2
DIMENSIONS							
Length	mm	1600	1850	1850	2320	3490	3490
Width	mm	665	665	665	665	665	665
Height	mm	1027	1027	1027	1140	1150	1150
NET WEIGHT	kg	153	175	188	214	240	270
kg							320

1. Referred to condensing temperature at 50°C and outdoor air temperature at 35°C.

The units highlighted in this publication contain <HFC R410A [GWP₁₀₀ 2088]>

TECHNICAL DATA

BVE DX-E

MODEL		T 140	T 185	T 210	T 250	T 280
STD version						
CAPACITY (1)	kW	147,0	198,6	226,7	269,7	301,7
Air flow	m³/h	36000	56000	54000	74600	72000
Fans engaged power	kW	1,68	2,41	2,53	3,20	3,37
LNO version						
CAPACITY (1)	kW	130,0	177,1	200,4	240,7	266,4
Air flow	m³/h	30600	47600	45900	63410	61200
Fans engaged power	kW	1,03	1,48	1,55	1,97	2,07
ELN version						
CAPACITY (1)	kW	111,7	153,7	172,0	209,0	242,9
Air flow	m³/h	25200	39200	37800	52220	50400
Fans engaged power	kW	0,58	0,83	0,87	1,10	1,15
COMMON DATA						
POWER SUPPLY	V/ph/Hz		380-480/3/50-60			
AC AXIAL FANS	n.	4	6	6	8	8
External static pressure	Pa	0	0	0	0	0
Max absorbed current (FLA)	A	5,6	8,4	8,4	11,2	11,2
DIMENSIONS						
Length	mm	4540	3490	3490	4540	4540
Width	mm	665	665	665	665	665
Height	mm	1150	2250	2250	2250	2250
NET WEIGHT	kg	350	470	520	630	690

1. Referred to condensing temperature at 50°C and outdoor air temperature at 35°C.

(*) Available also with 230/1/50 power supply. Please refer to the wiring diagram of the unit.

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Axial fans with EC electric motor with single phase power supply 230/1/50 are available under request.

REFRIGERANT CHARGE

The condenser is supplied with seal charge. **Refrigerant must be charged.**

The following table shows the refrigerant charge that must be introduced for the condenser only. Internal unit, connections pipes and optionals are excluded.

MODEL	M 11	M 14	M 17	M 20	M 25	M 30	M 35	M 45	M 50	M 60
REFRIGERANT	R410A									
Refrigerant charge (1)	kg	0,8	1,2	1,7	1,7	2,0	3,0	4,0	4,7	4,1
HFC R410A - F Gas - CO ₂ equivalent	t	1,67	2,51	3,55	3,55	4,18	6,26	8,35	9,81	11,48

MODEL	M 70	M 95	M 110	M 130	M 140	T 185	T 210	T 250	T 280
REFRIGERANT	R410A								
Refrigerant charge (1)	kg	7,7	8,7	11,6	11,6	15,4	20,8	27,7	37,0
HFC R410A - F Gas - CO ₂ equivalent	t	16,08	18,17	24,22	24,22	32,16	43,43	57,84	77,26

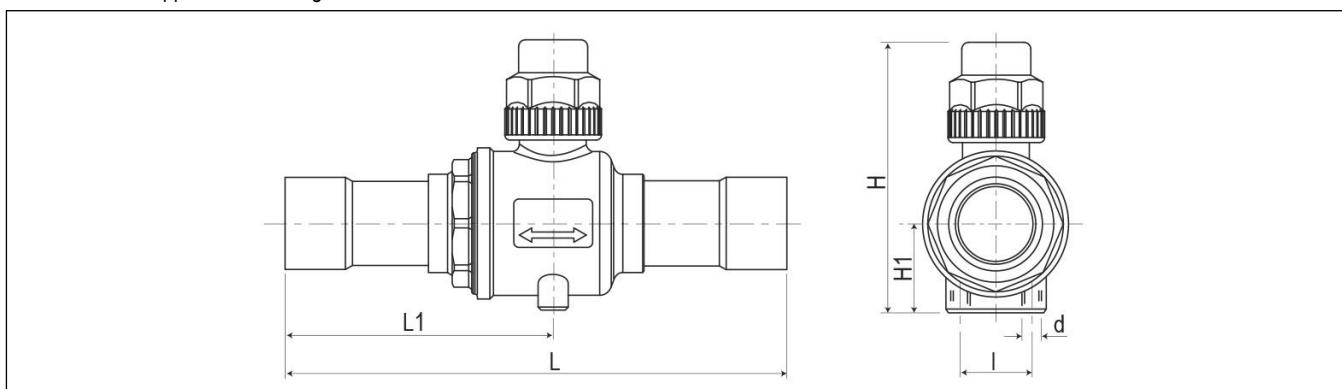
1. Refrigerant charge required for the condenser operation only. Internal unit, connections pipes and optionals are excluded.

REFRIGERANT CONNECTIONS

MODEL	M 11 T 11	M 14 T 14	M 17 T 17	M 20 T 20	M 25 T 25	M 30 T 30	M 35 T 35	M 45 T 45	M 50 T 50	M 60 T 60	
REFRIGERANT CONNECTIONS											
Liquid – ODS	Ø mm	12	12	12	12	16	16	16	16	18	
Gas - ODS	Ø mm	16	16	16	16	18	18	18	22	22	
MODEL	M 70 T 70	M 95 T 95	M 110 T 110	M 130 T 130	M 140 T 140	T 185	T 210	T 250	T 280		
REFRIGERANT CONNECTIONS											
Liquid – ODS	Ø mm	18	22	22	28	28	35	35	42	42	
Gas - ODS	Ø mm	22	35	35	35	35	42	42	54	54	

BALL VALVES FOR REFRIGERANT CONNECTIONS

The valves are supplied in mounting kit with the condenser.



Nr. catalogue		Connections ODS		Kv Factor [m³/h]	PS [bar]	PED.	Dimensions [mm]					Weight [g]				
Without access fitting	With access fitting	Ø [in.]	Ø [mm]				H	H1	L	I	d					
6590/M6	--	---	6	0,8	Art. 3.3	45	73	20	121	18	M5	260				
6590/2		1/4"	---													
6590/3	6590/3A	3/8"	—	3			80	24	141			300				
6590/M10	6590/M10A	—	10													
6590/M12	6590/M12A	—	12	5			95,5	27,5	175			290				
6590/4	6590/4A	1/2"	—													
6591/5	—	5/8"	16	14,5			101,5	30	206	30	M6	410				
6590/M15	6590/M15A	—	15													
6590/5	6590/5A	5/8"	16	24			117	37	210			450				
6590/M18	6590/M18A	—	18				127	44	239			760				
6590/6	6590/6A	3/4"	—	40								800				
6591/7	—	7/8"	22	148			54	275				1050				
6590/7	6590/7A	7/8"	22	68			172,5	62	330	75	M10	1518				
6591/M28	—	—	28													
6591/9	—	1.1/8"	—	100			196,5	75	350			2470				
6590/M28		6590/M28A	---													
6590/9	6590/9A	1.1/8"	—	178			148	380	400			2520				
6591/11	—	1.3/8"	35													
6590/11	6590/11A	1.3/8"	35	293			172,5	62	330			4360				
6591/13	—	1.5/8"	—													
6591/M42		—	42													
6590/13	6590/13A	1.5/8"	—	430			196,5	75	350			4400				
6590/M42	6590/M42A	---	42													
6591/17	—	2.1/8"	54	42			148	54	275			8120				
6590/17	6590/17A	2.1/8"	54				172,5	62	330			8090				
6591/M64	6591/M64A	—	64	42			196,5	75	350			8310				
6591/21	6591/21A	2.5/8"	—				148	380	400			8350				
---	6590/M64A	—	64	293			172,5	62	330			12400				
	6590/21A	2.5/8"	—													
	6591/24A	3"	—				196,5	75	350			12450				
	6591/25A	3.1/8"	—													
	6590/25A	3.1/8"	80	430			172,5	62	330			12500				
	6591/28A	3.1/2"	89													
	6591/29A	3.5/8"	—				196,5	75	350			12500				
	6591/33A	4.1/8"	105													
	6591/34A	4.1/4"	108													

ACOUSTIC DATA

The series is available in 3 versions:

Standard units – STD: Standard noise level. No air flow reduction

Low Noise units – LNO: Reduced noise level. Nominal air flow reduction at 85%.

Extremely low noise units – ELN: Extremely reduced noise level. Nominal air flow reduction at 70%.

WARNING

It is pointed out that a reduction of air flow on the condenser coils causes a reduction in the capacity of the condenser and a greater energy engagement of the compressors.

ACOUSTIC DATA

STD VERSION

MODEL	M 11	M 14	M 17	M 20	M 25	M 30	M 35	M 45	M 50	M 60
Sound power level [Lw] (1)	dB(A)	76,8	76,8	77,1	79,1	81,8	81,8	81,8	82,4	84,5
Average sound pressure level [Lpm] (2)										
At 1m	dB(A)	63,0	63,0	63,0	65,0	67,0	67,0	67,0	67,4	69,4
At 5 m	dB(A)	51,3	51,3	51,5	53,5	56,1	56,1	56,1	56,6	58,7
At 10 m	dB(A)	45,6	45,6	45,9	47,9	50,5	50,5	50,5	51,1	53,2
MODEL	M 70	M 95	M 110	M 130	M 140	T 185	T 210	T 250	T 280	
Sound power level [Lw] (1)	dB(A)	85,0	86,9	86,9	88,1	88,1	88,8	88,8	90,1	90,1
Average sound pressure level [Lpm] (2)										
At 1m	dB(A)	69,4	70,5	70,5	71,1	71,1	71,5	71,5	72,2	72,2
At 5 m	dB(A)	59,0	60,6	60,6	61,6	61,6	62,3	62,3	63,3	63,3
At 10 m	dB(A)	53,6	55,3	55,3	56,4	56,4	57,1	57,1	58,2	58,2

LNO VERSION

MODEL	M 11	M 14	M 17	M 20	M 25	M 30	M 35	M 45	M 50	M 60
Sound power level [Lw] (1)	dB(A)	72,9	72,9	73,2	75,2	77,9	77,9	77,9	78,5	80,7
Average sound pressure level [Lpm] (2)										
At 1m	dB(A)	59,1	59,1	59,1	61,1	63,1	63,1	63,1	63,6	65,5
At 5 m	dB(A)	47,4	47,4	47,7	49,7	52,2	52,2	52,2	52,7	54,8
At 10 m	dB(A)	41,7	41,7	42,0	44,0	46,6	46,6	46,6	47,2	49,3
MODEL	M 70	M 95	M 110	M 130	M 140	T 185	T 210	T 250	T 280	
Sound power level [Lw] (1)	dB(A)	81,1	83,0	83,0	84,2	84,2	84,9	84,9	86,2	86,2
Average sound pressure level [Lpm] (2)										
At 1m	dB(A)	65,5	66,6	66,6	67,2	67,2	67,7	67,7	68,3	68,3
At 5 m	dB(A)	55,1	56,7	56,7	57,7	57,7	58,4	58,4	59,4	59,4
At 10 m	dB(A)	49,7	51,4	51,4	52,5	52,5	53,2	53,2	54,3	54,3

ELN VERSION

MODEL	M 11	M 14	M 17	M 20	M 25	M 30	M 35	M 45	M 50	M 60
Sound power level [Lw] (1)	dB(A)	68,2	68,2	68,6	70,6	73,3	73,3	73,3	73,9	76,0
Average sound pressure level [Lpm] (2)										
At 1m	dB(A)	54,5	54,5	54,5	56,5	58,5	58,5	58,5	58,9	60,8
At 5 m	dB(A)	42,8	42,8	43,0	45,0	47,5	47,5	47,5	48,1	50,2
At 10 m	dB(A)	37,1	37,1	37,4	39,4	42,0	42,0	42,0	42,6	44,7
MODEL	M 70	M 95	M 110	M 130	M 140	T 185	T 210	T 250	T 280	
Sound power level [Lw] (1)	dB(A)	76,5	78,4	78,4	79,6	79,6	80,3	80,3	81,5	81,5
Average sound pressure level [Lpm] (2)										
At 1m	dB(A)	60,8	61,9	61,9	62,5	62,5	63,0	63,0	63,7	63,7
At 5 m	dB(A)	50,5	52,1	52,1	53,1	53,1	53,7	53,7	54,8	54,8
At 10 m	dB(A)	45,1	46,8	46,8	47,9	47,9	48,5	48,5	49,7	49,7

1. Sound power level [Lw] according to ISO EN 9614 - 2.
2. Average sound pressure level [Lpm] according to ISO EN 3744



CONDENSING CONTROL

Unit with axial fans with AC electric motor

Units are equipped with phase-cut electronic regulator for continuous variation of the rotation speed of the fan motor for condensing pressure control according to the 0÷10V proportional signal coming from the internal unit microprocessor control.

Unit with axial fans with EC electric motor

Units are equipped with external rotor EC type electric motor with step-less variable speed for condensing pressure control according to the 0÷10V proportional signal coming from the internal unit microprocessor control.

The units with low noise emission LNO and ELN have the air flow rate reduced respect to the nominal one:

- LNO version: reduction at 85% of the nominal
- ELN version: reduction at 70% of the nominal

In severe operating conditions, such as with high ambient air temperatures, the condensing control system bypasses the LNO and ELN set to provide the condensing coil the maximum air flow.

Clearly this logic does increase the noise level but guarantees the indoor unit operation.

POWER SUPPLY

The power supply is independent from the indoor unit.

The supply line must be equipped with all the protections and controls required by current regulations.

ELECTRICAL CONNECTION WITH THE INDOOR UNIT

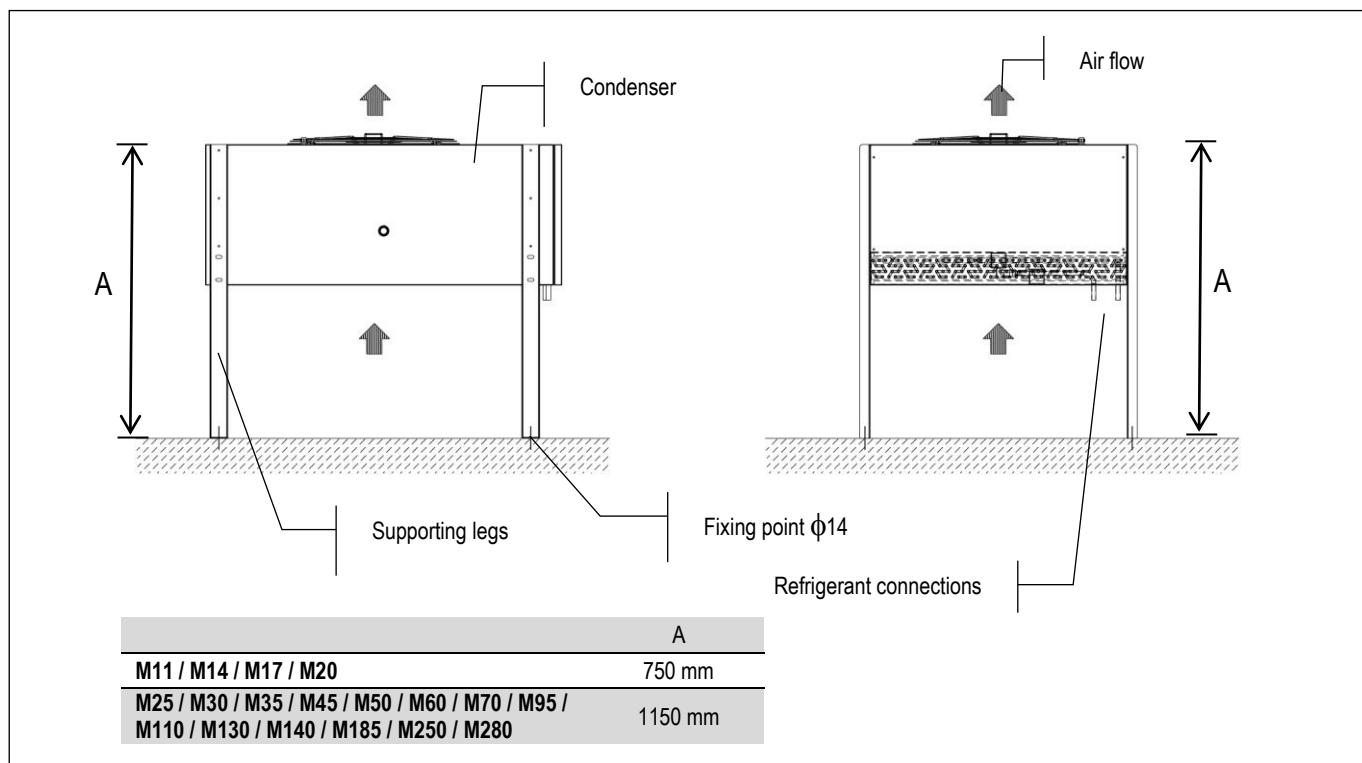
The electrical connection with the indoor unit is provided by the installer.

OPTIONAL ACCESSORIES: SUPPORTING LEGS FOR VERTICAL AIR FLOW

The units can be supplied with supporting legs for a vertical airflow.

The supporting legs are supplied in mounting kit

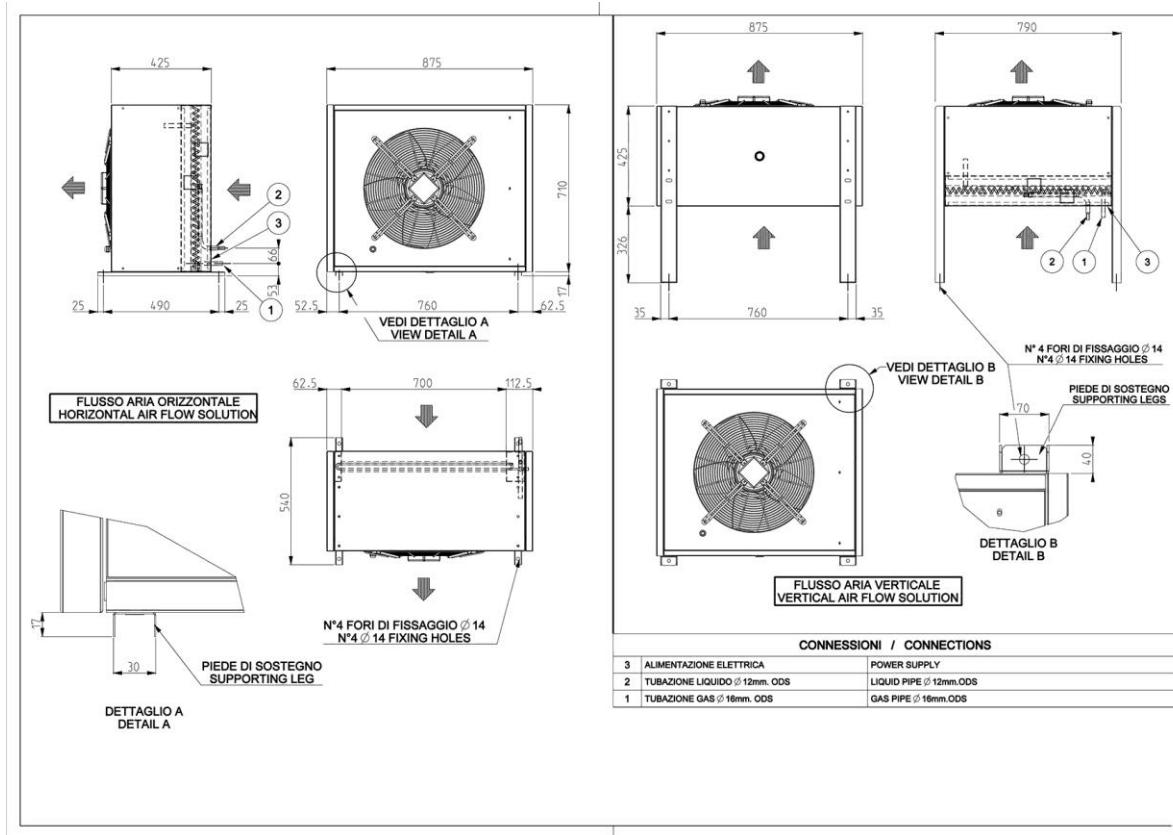
Always fix the unit to the floor



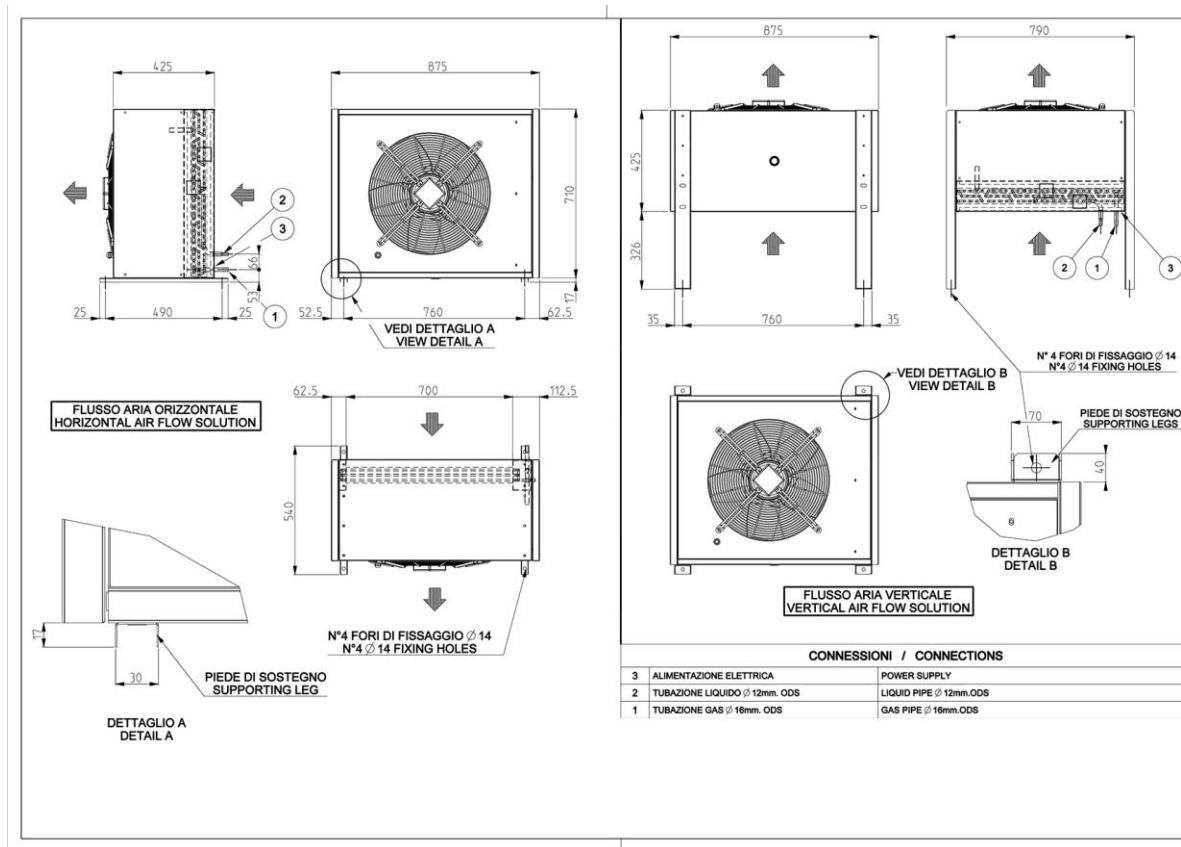
MACHINE DRAWINGS

Dimensions in mm

M 11 – T11



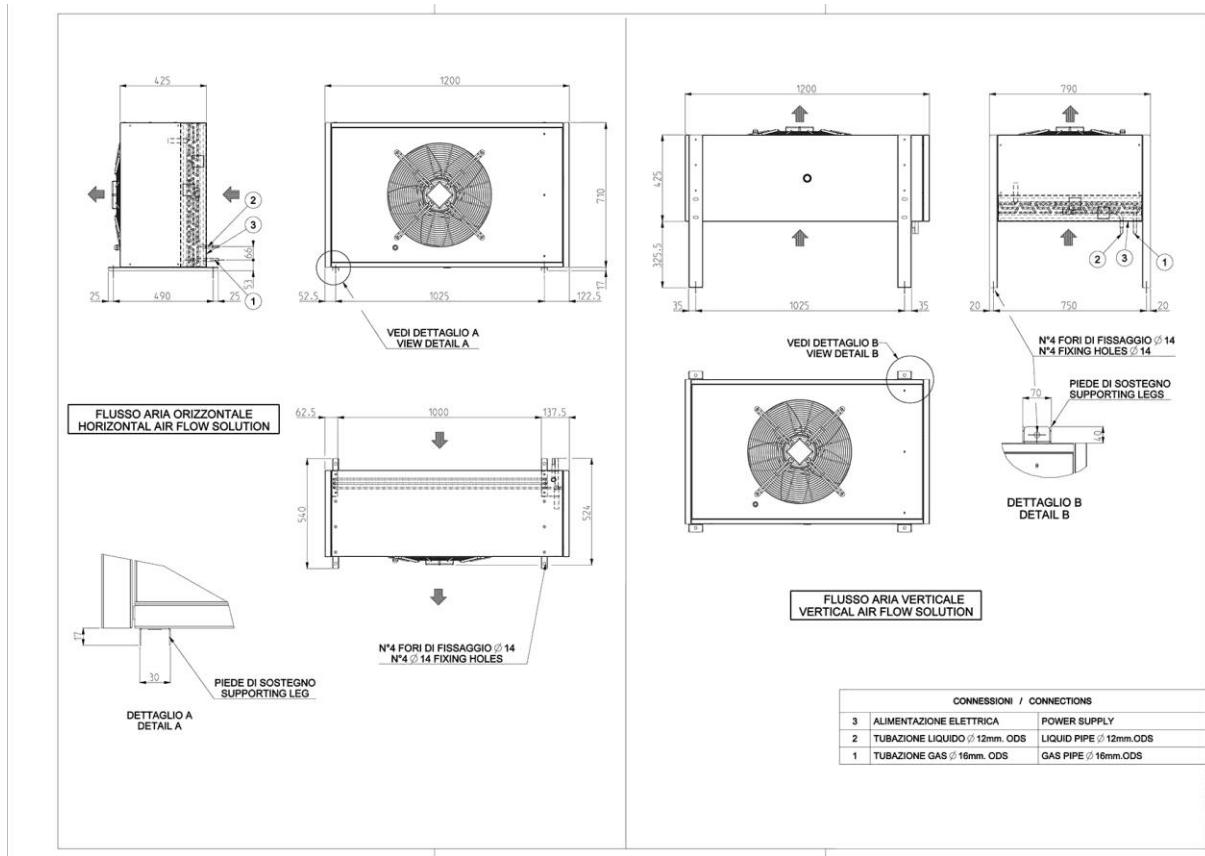
M 14 – T14



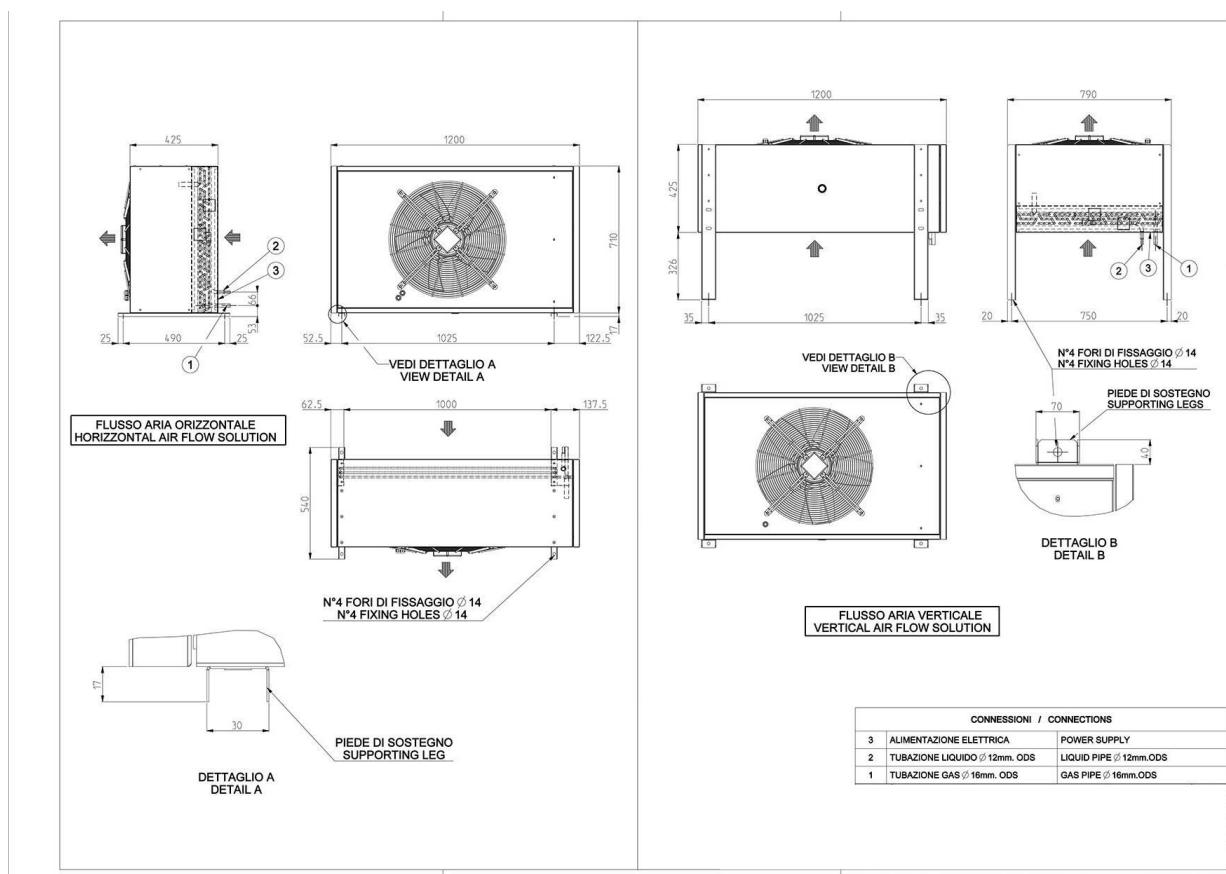
BVE DX

MACHINE DRAWINGS Dimensions in mm

M 17 – T 17



M 20 – T 20

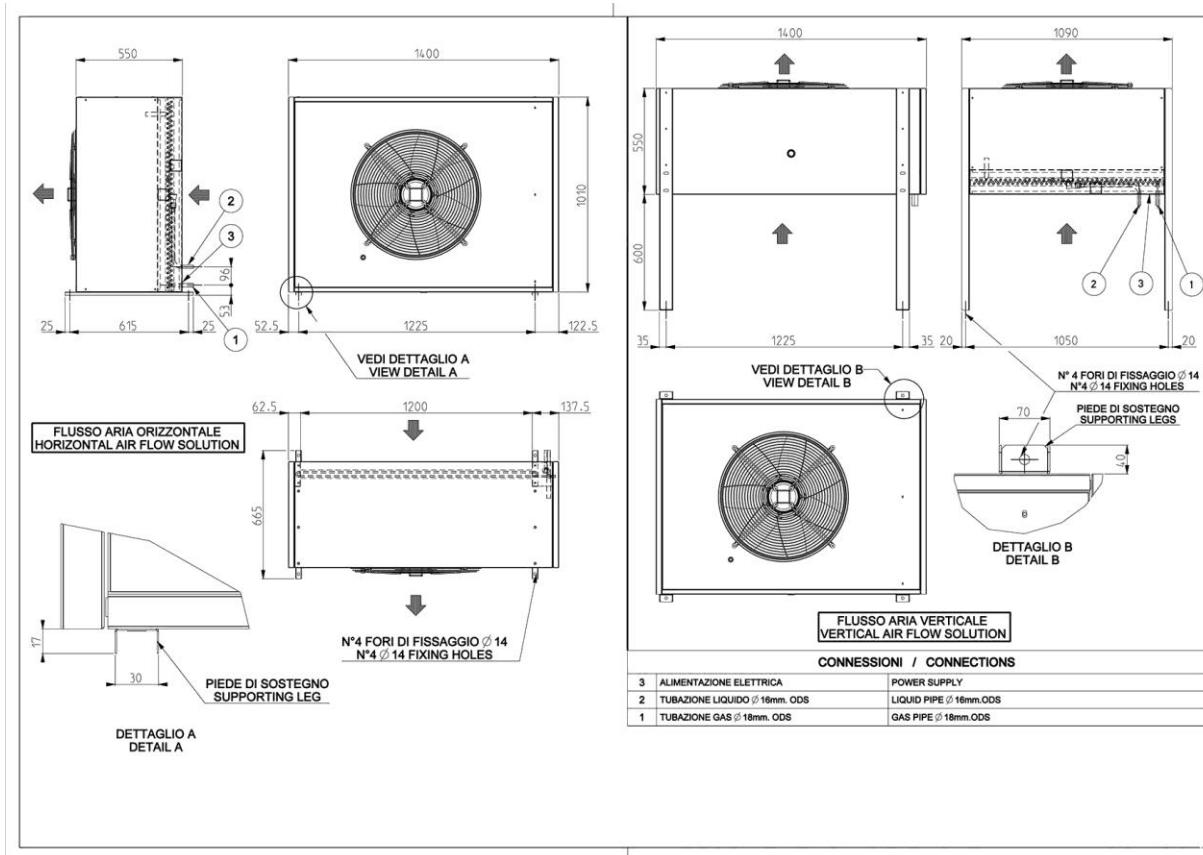


BVE DX

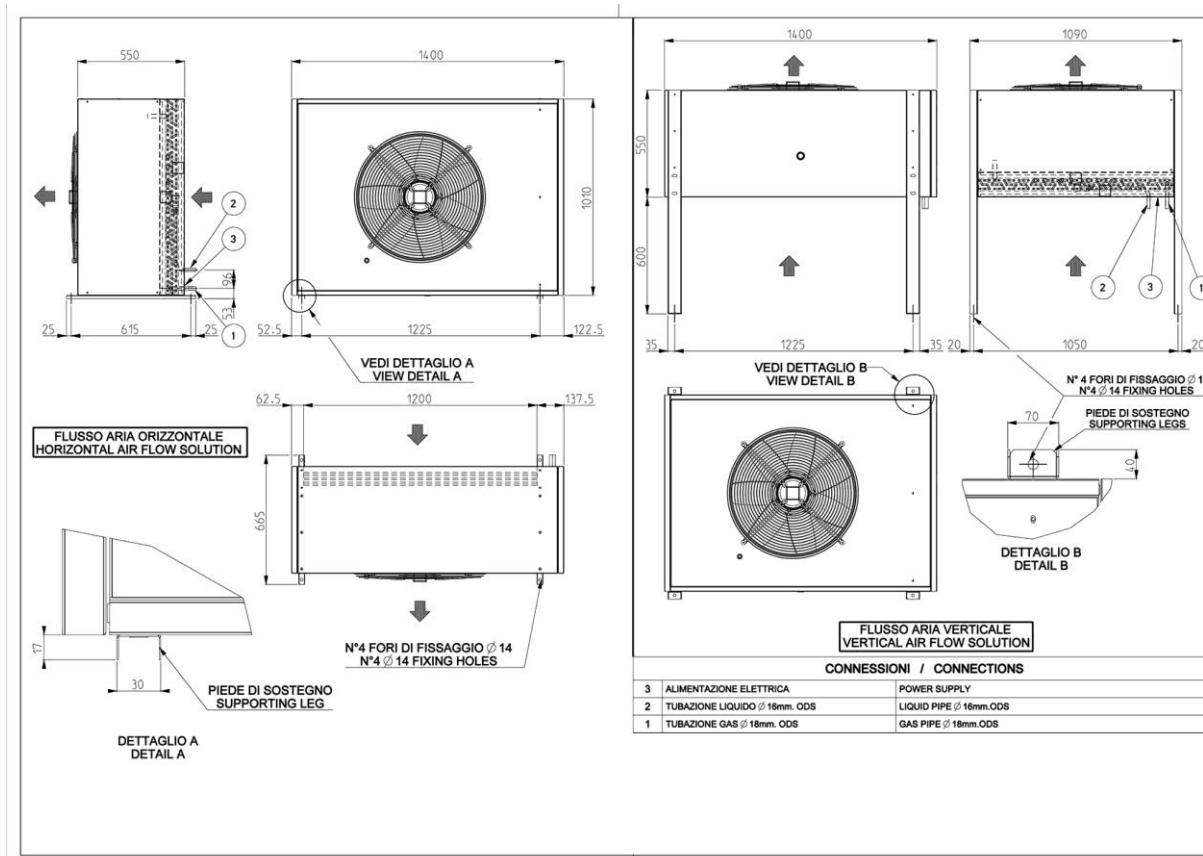
MACHINE DRAWINGS

Dimensions in mm

M 25 – T 25



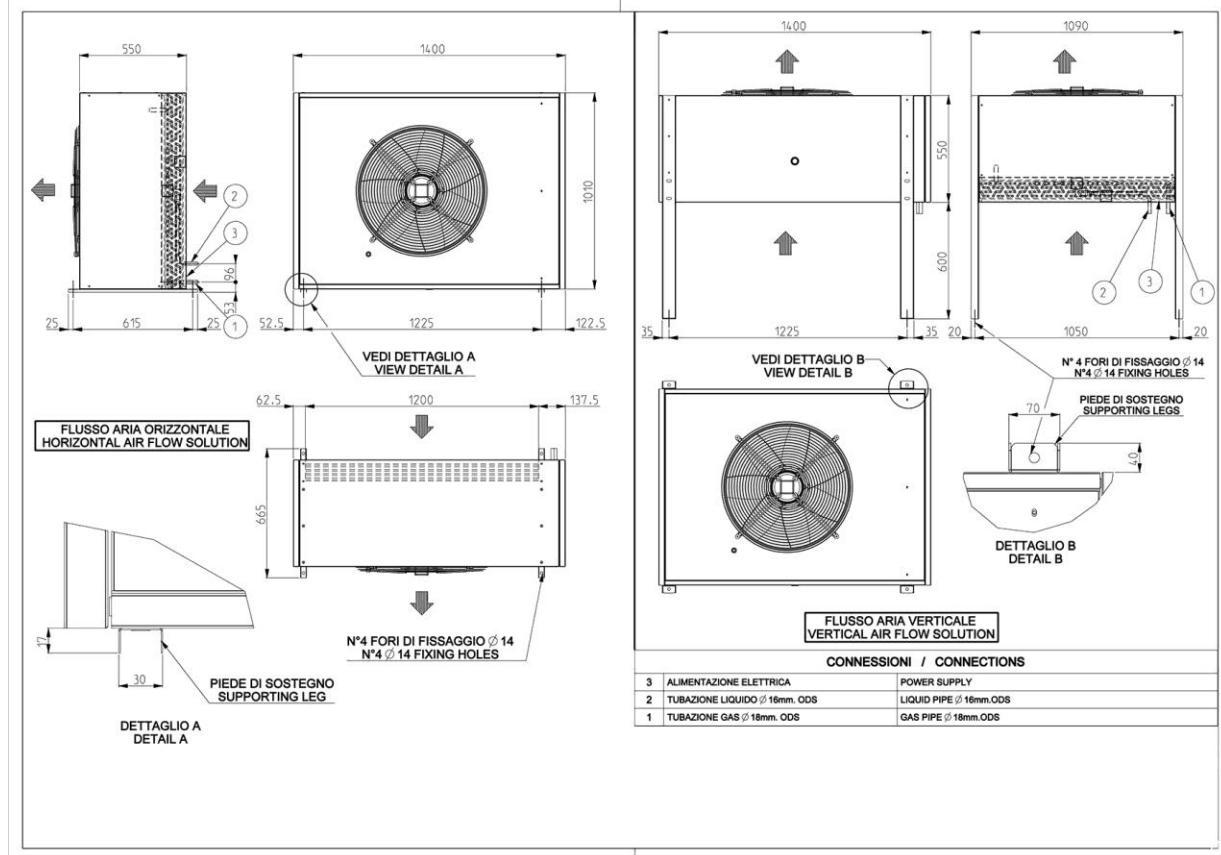
M 30 – T 30



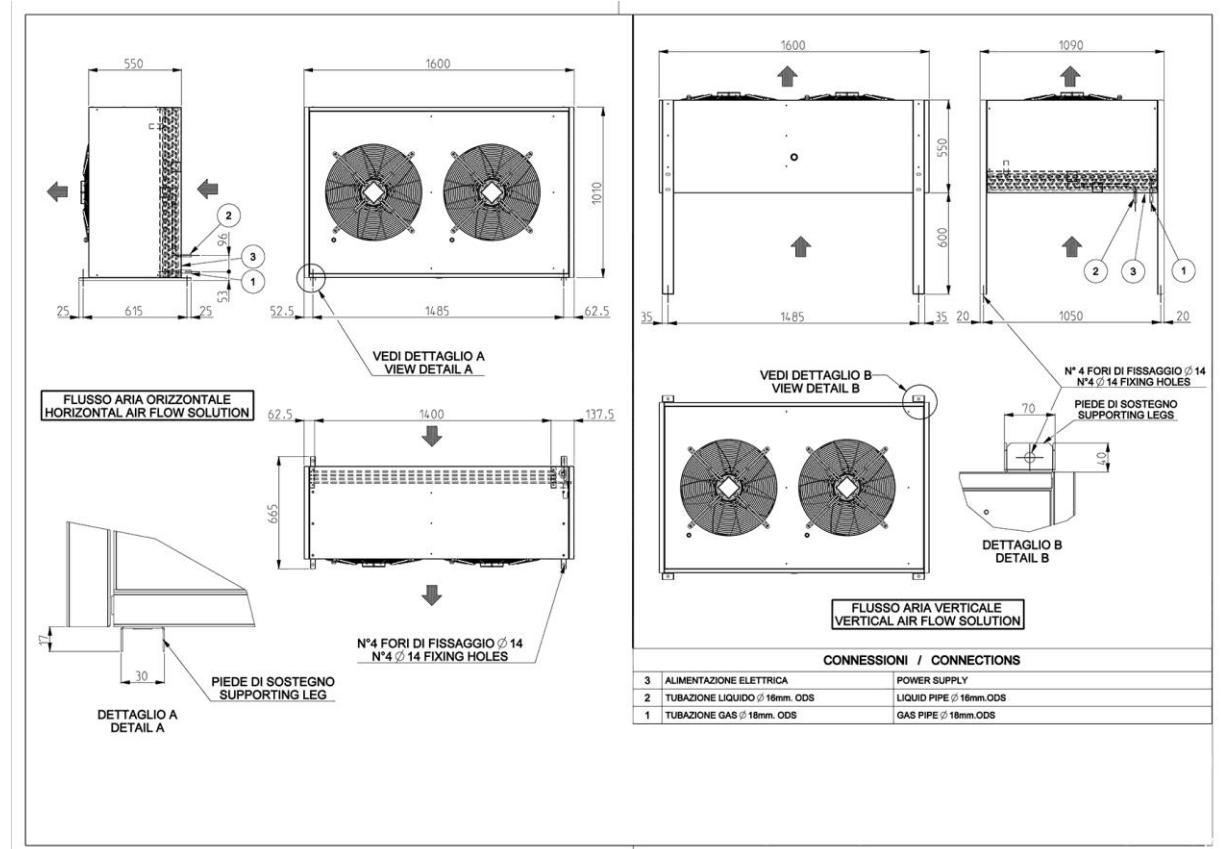
BVE DX

MACHINE DRAWINGS Dimensions in mm

M 35 – T 35



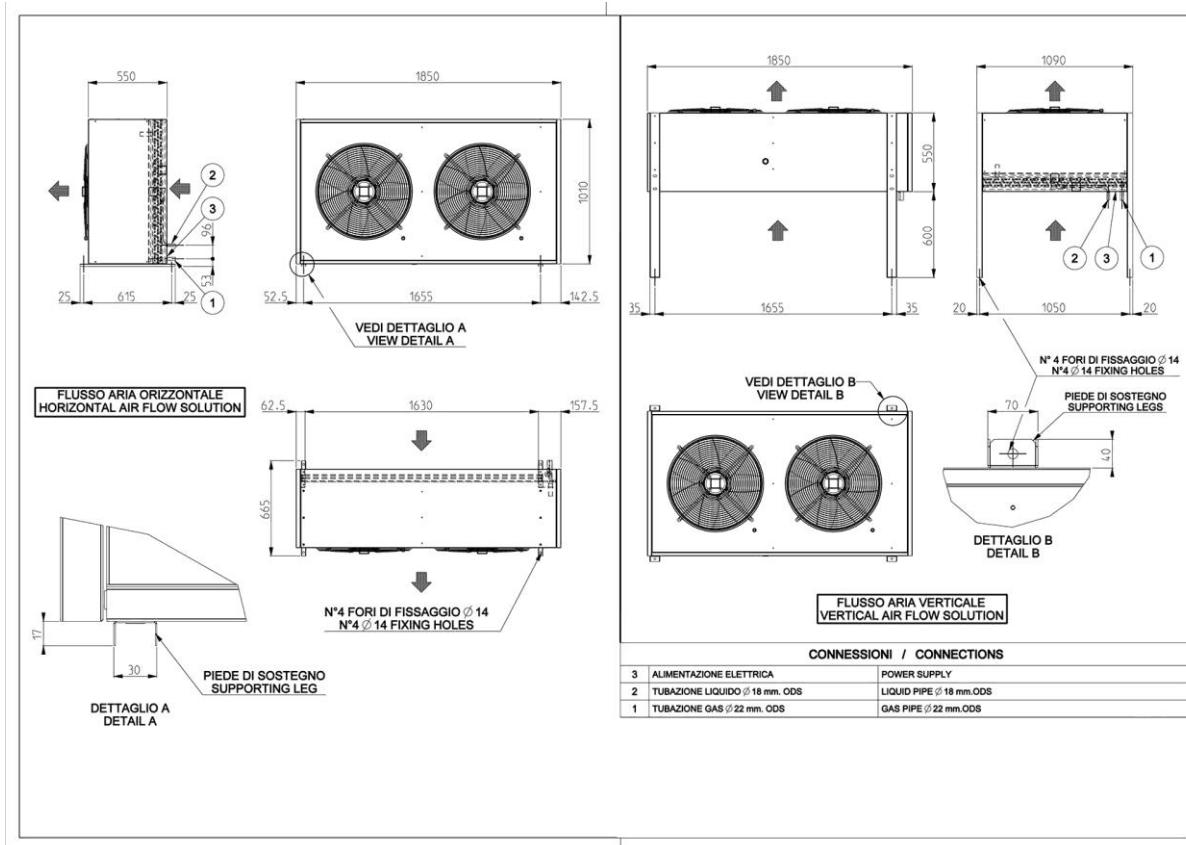
M 45 – T 45



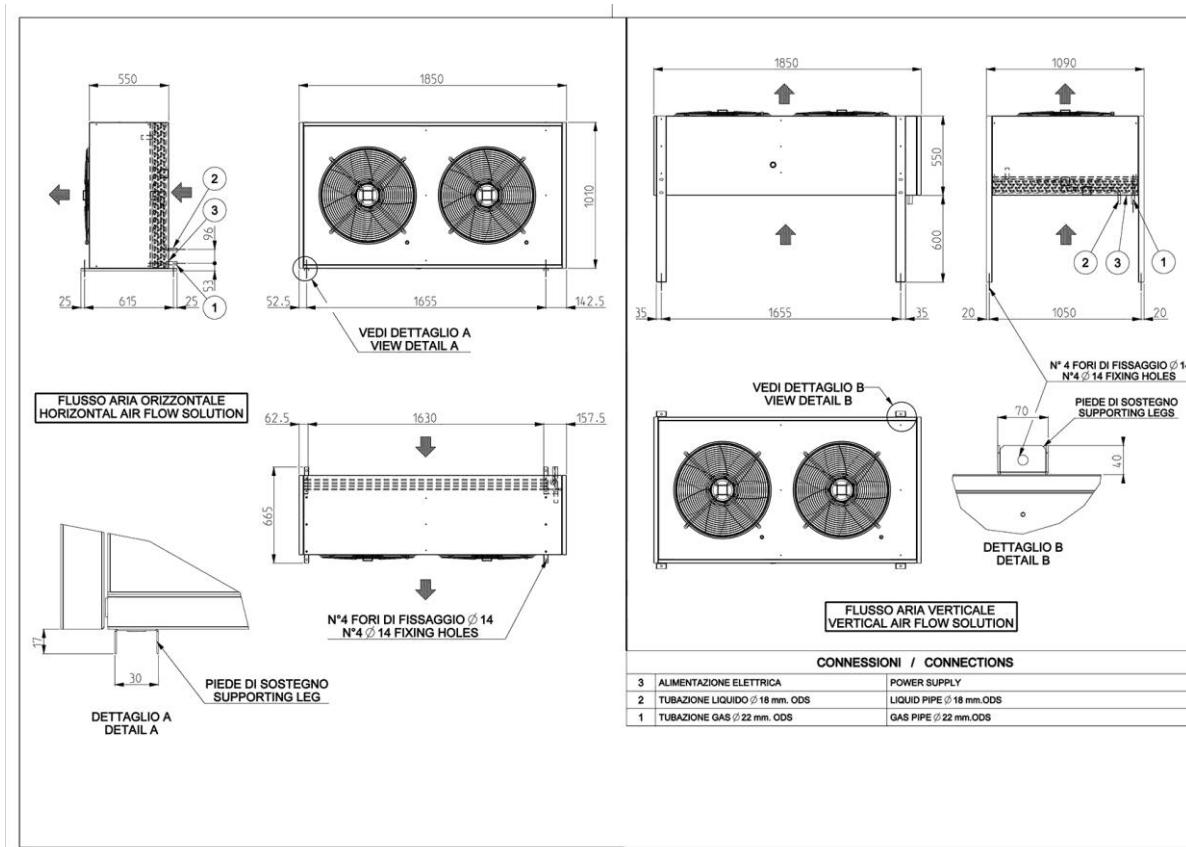
BVE DX

MACHINE DRAWINGS Dimensions in mm

M 50 – T 50



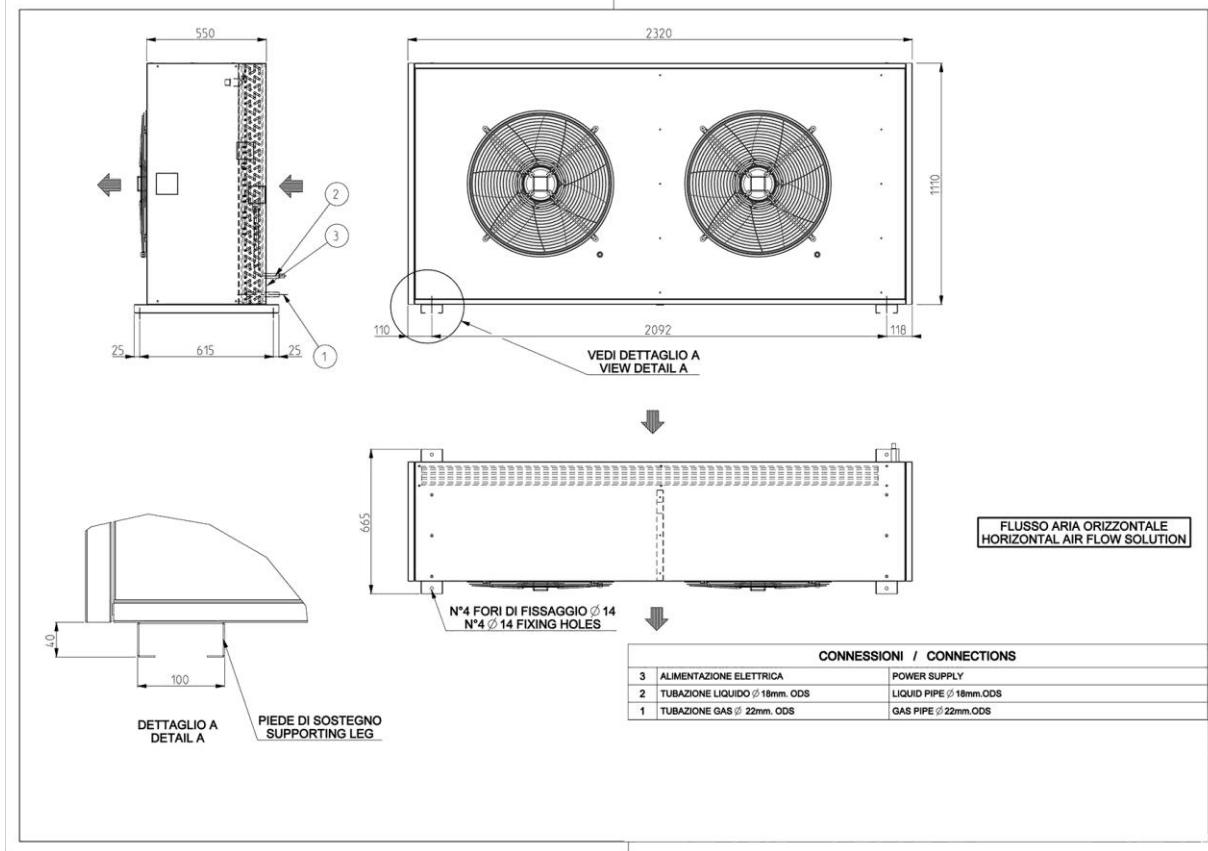
M 60 – T 60



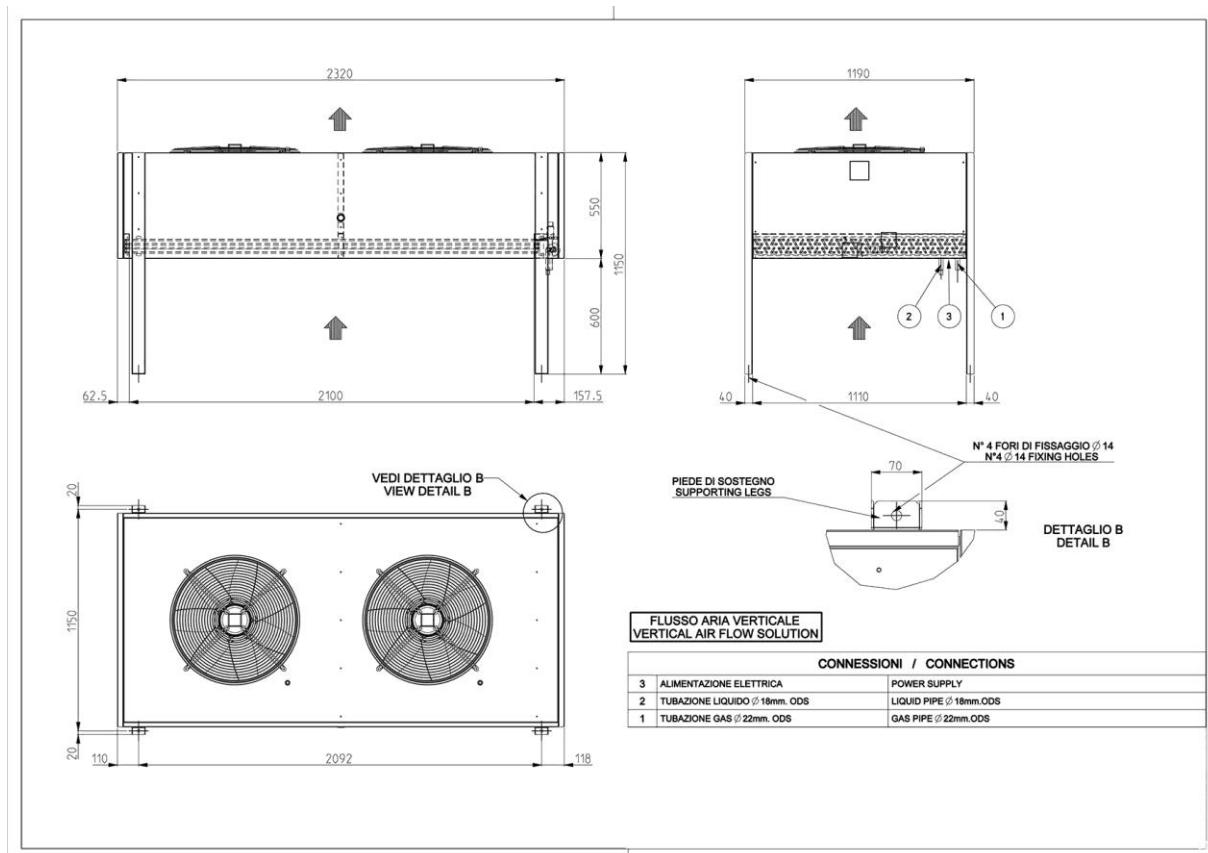
BVE DX

MACHINE DRAWINGS Dimensions in mm

M 70 – T 70 – HORIZONTAL AIR FLOW



M 70 – T 70 – VERTICAL AIR FLOW (OPTIONAL)

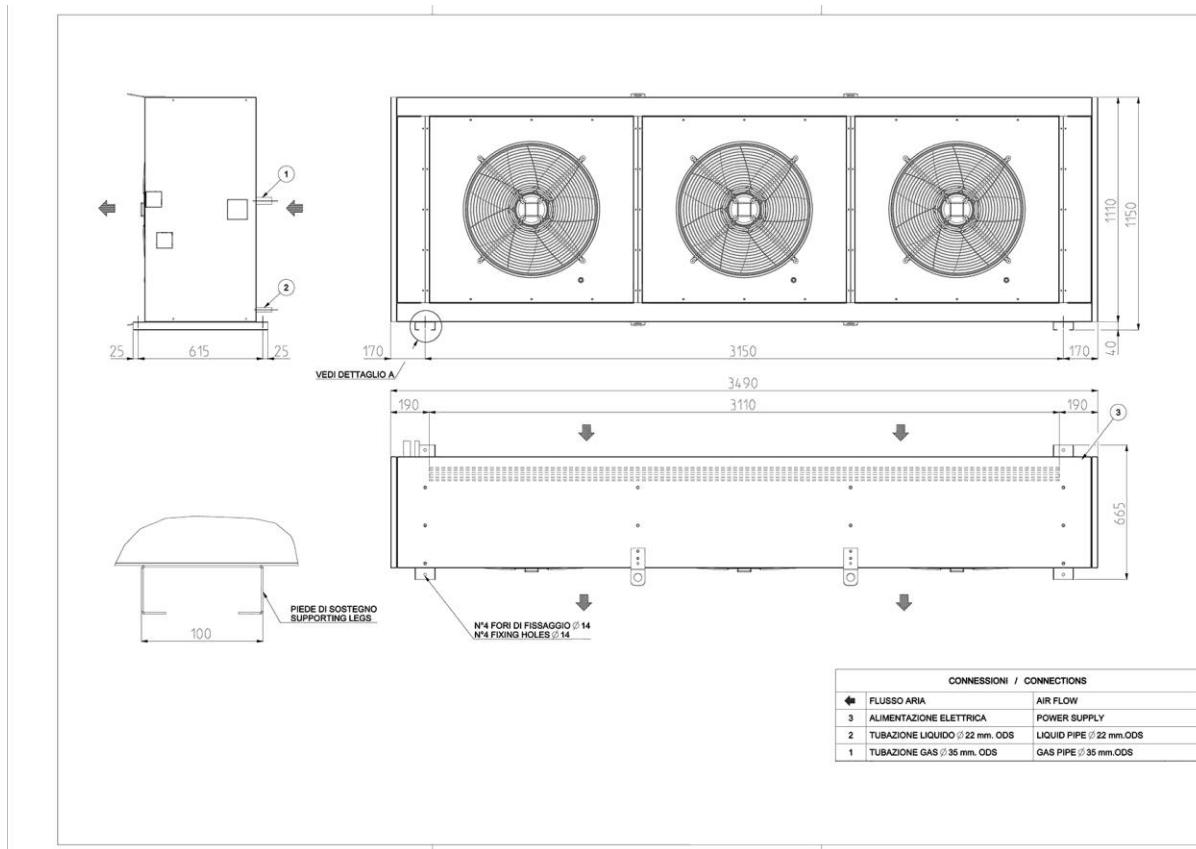


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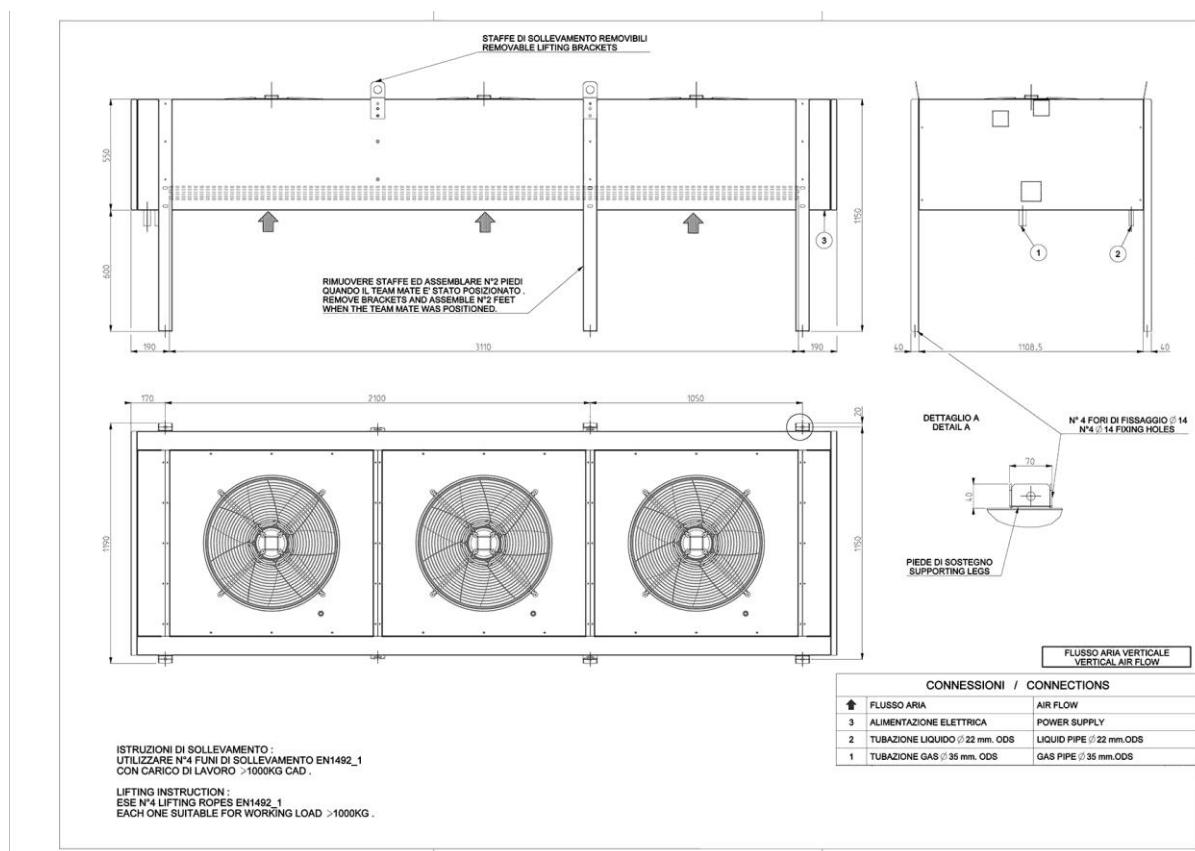
MACHINE DRAWINGS

Dimensions in mm

M 95 – T 95 – HORIZONTAL AIR FLOW



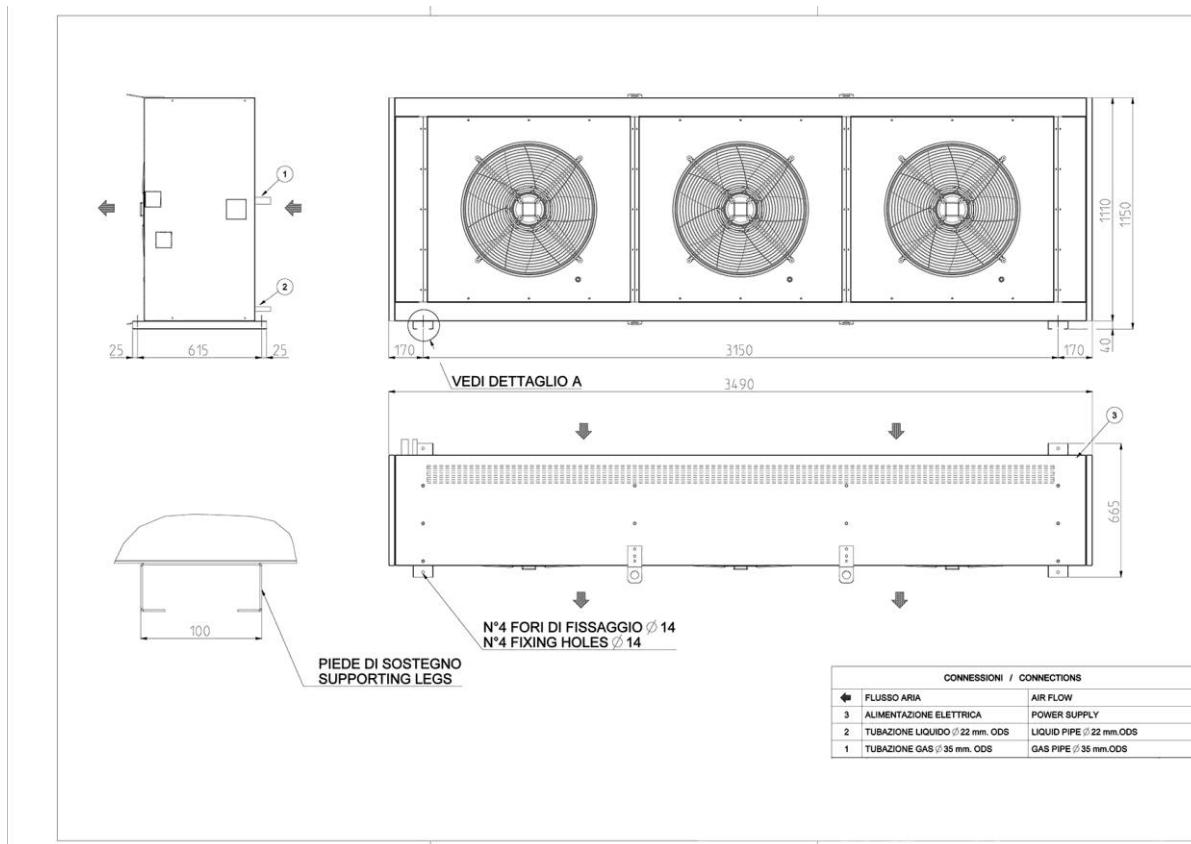
M 95 – T 95 – VERTICAL AIR FLOW (OPTIONAL)



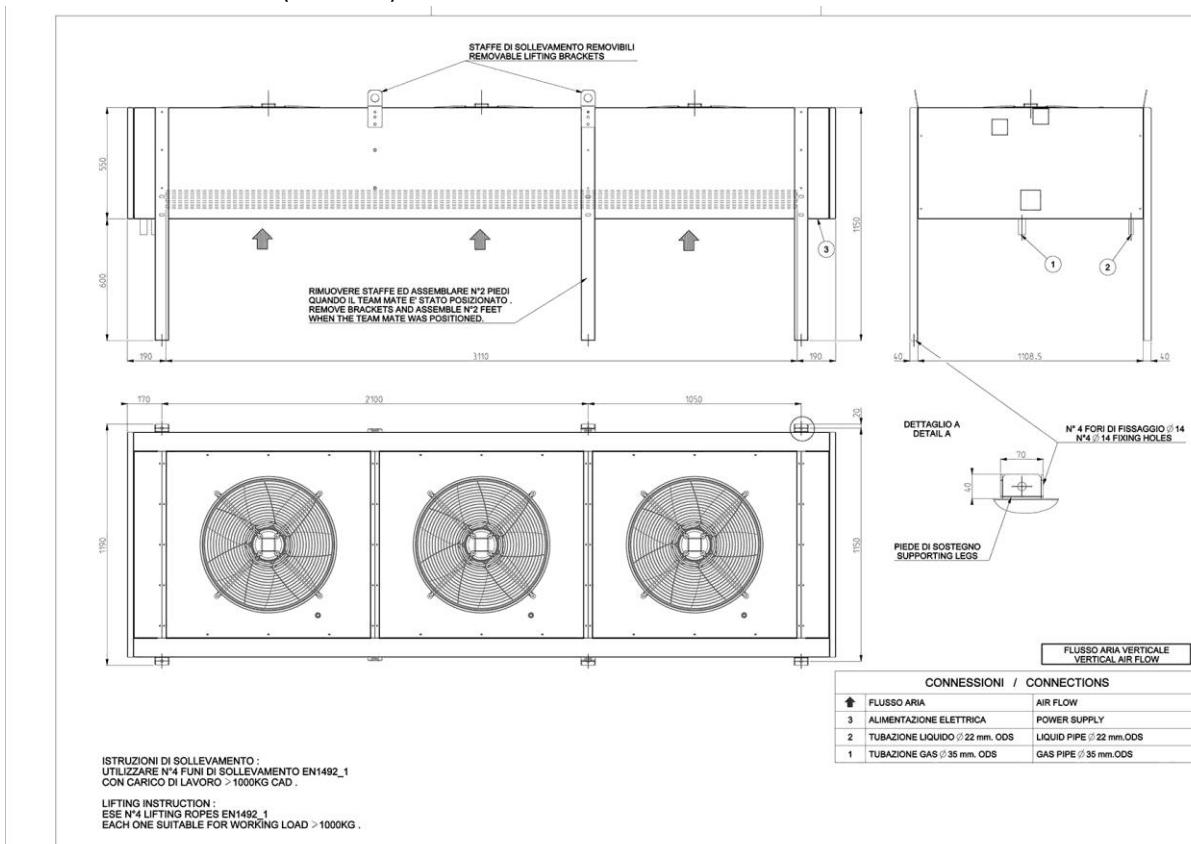
MACHINE DRAWINGS

Dimensions in mm

M 110 – T 110 – HORIZONTAL AIR FLOW



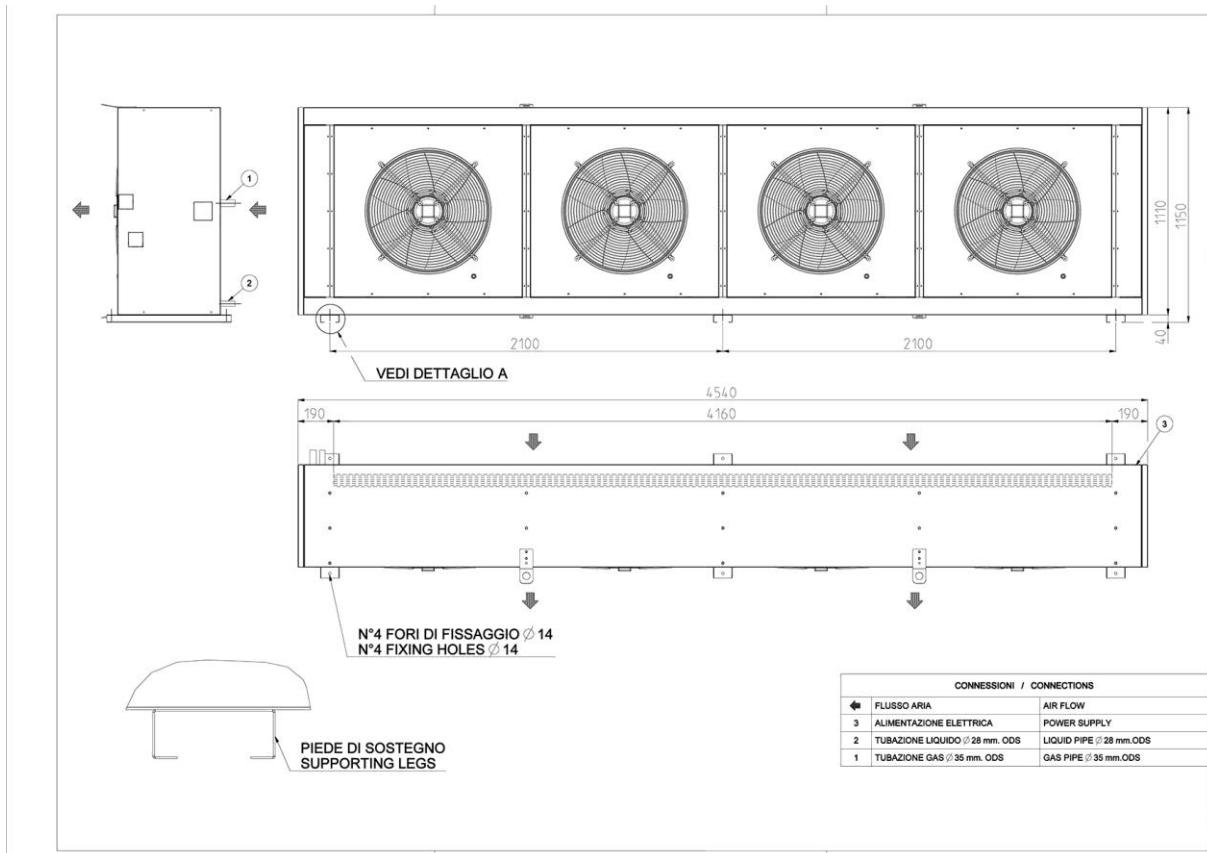
M 110 – T 110 – VERTICAL AIR FLOW (OPTIONAL)



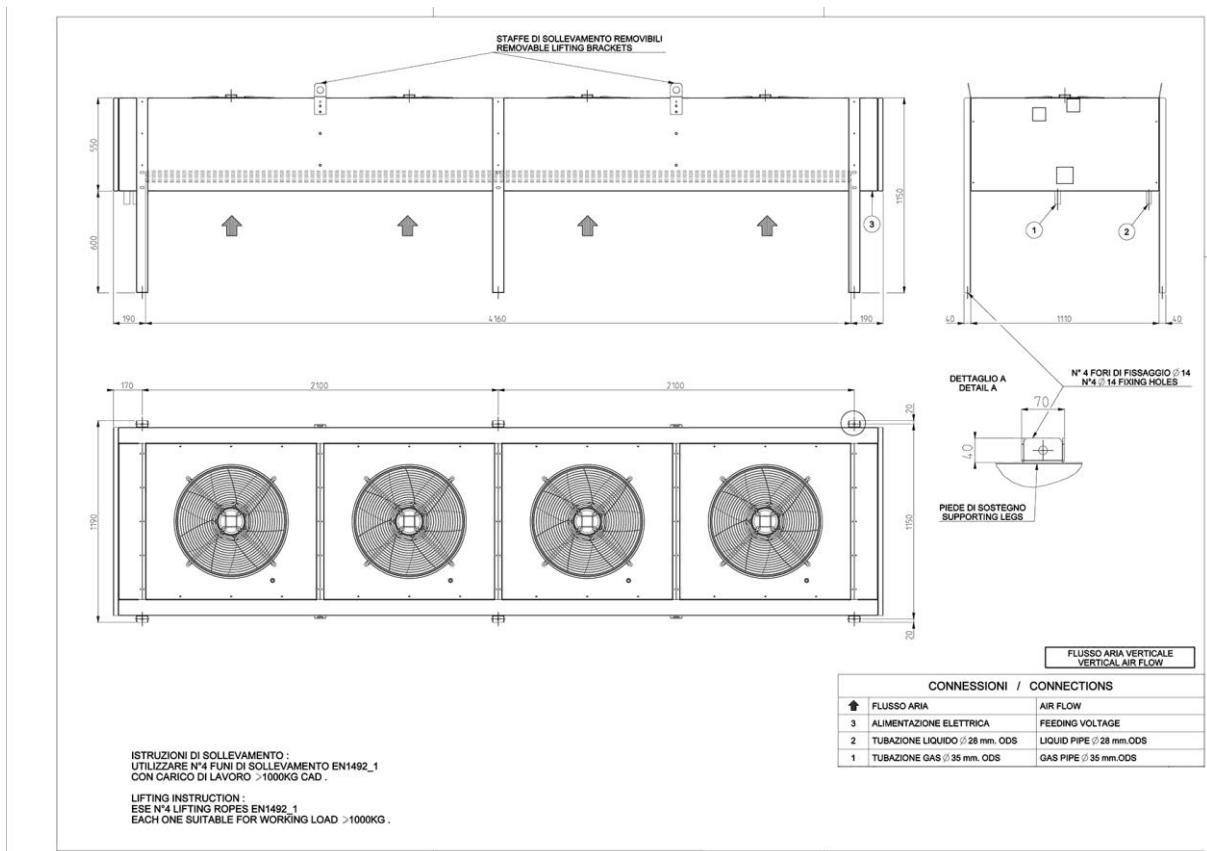
MACHINE DRAWINGS

Dimensions in mm

M 130 – T 130 – HORIZONTAL AIR FLOW



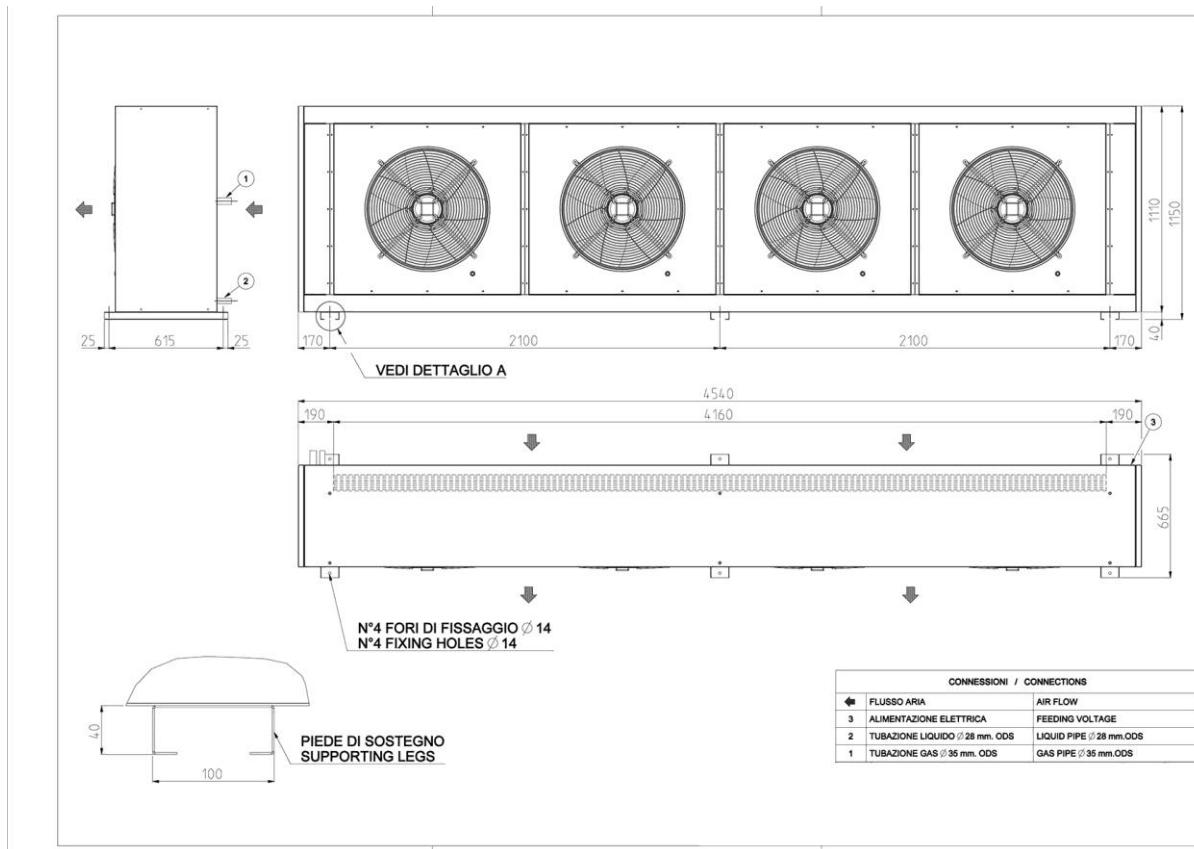
M 130 – T 130 – VERTICAL AIR FLOW (OPTIONAL)



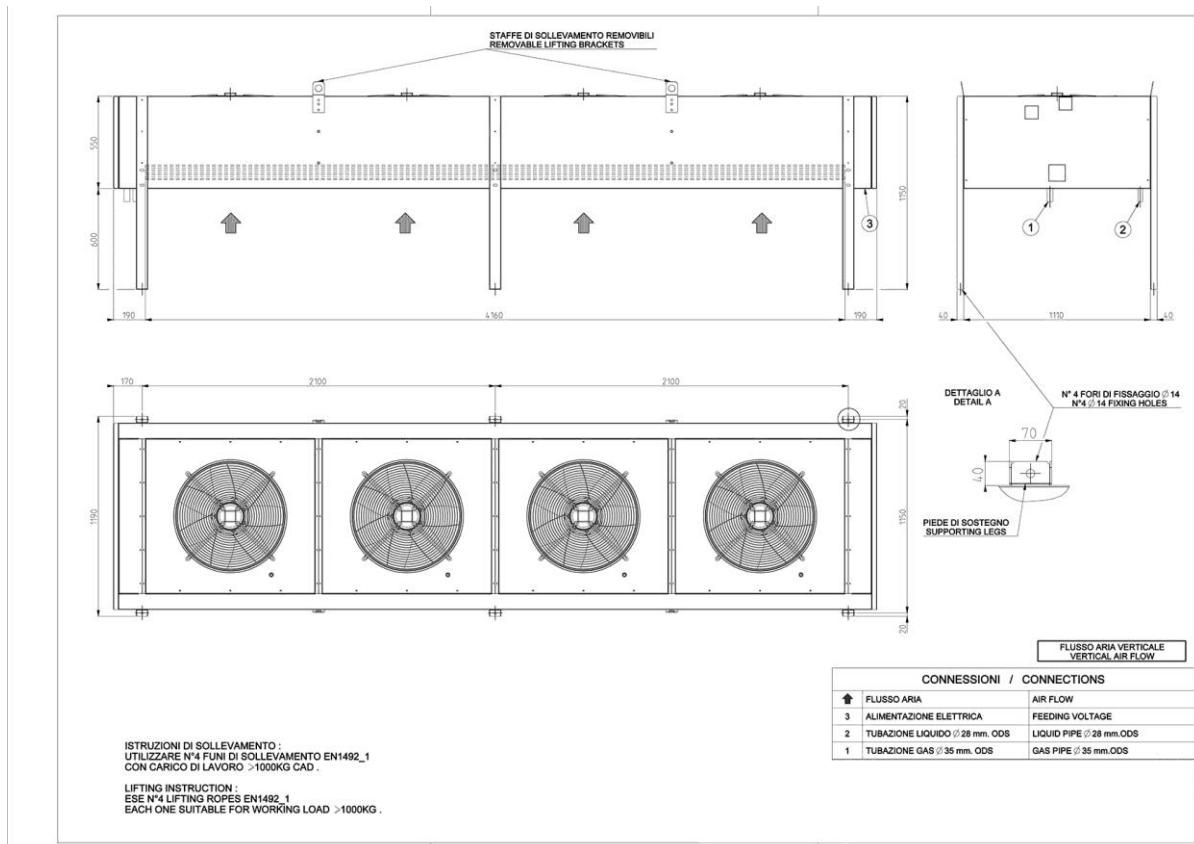
MACHINE DRAWINGS

Dimensions in mm

M 140 – T 140 – HORIZONTAL AIR FLOW

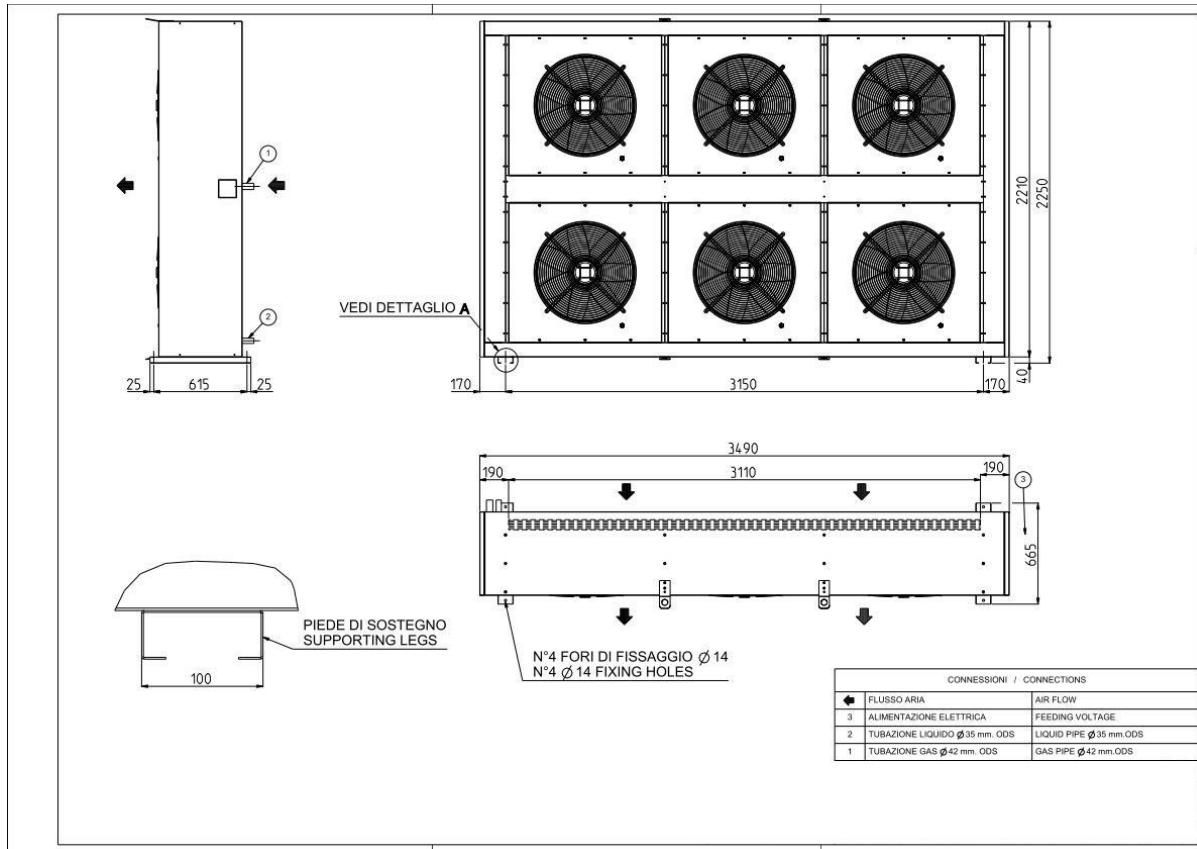


M 140 – T 140 – VERTICAL AIR FLOW (OPTIONAL)

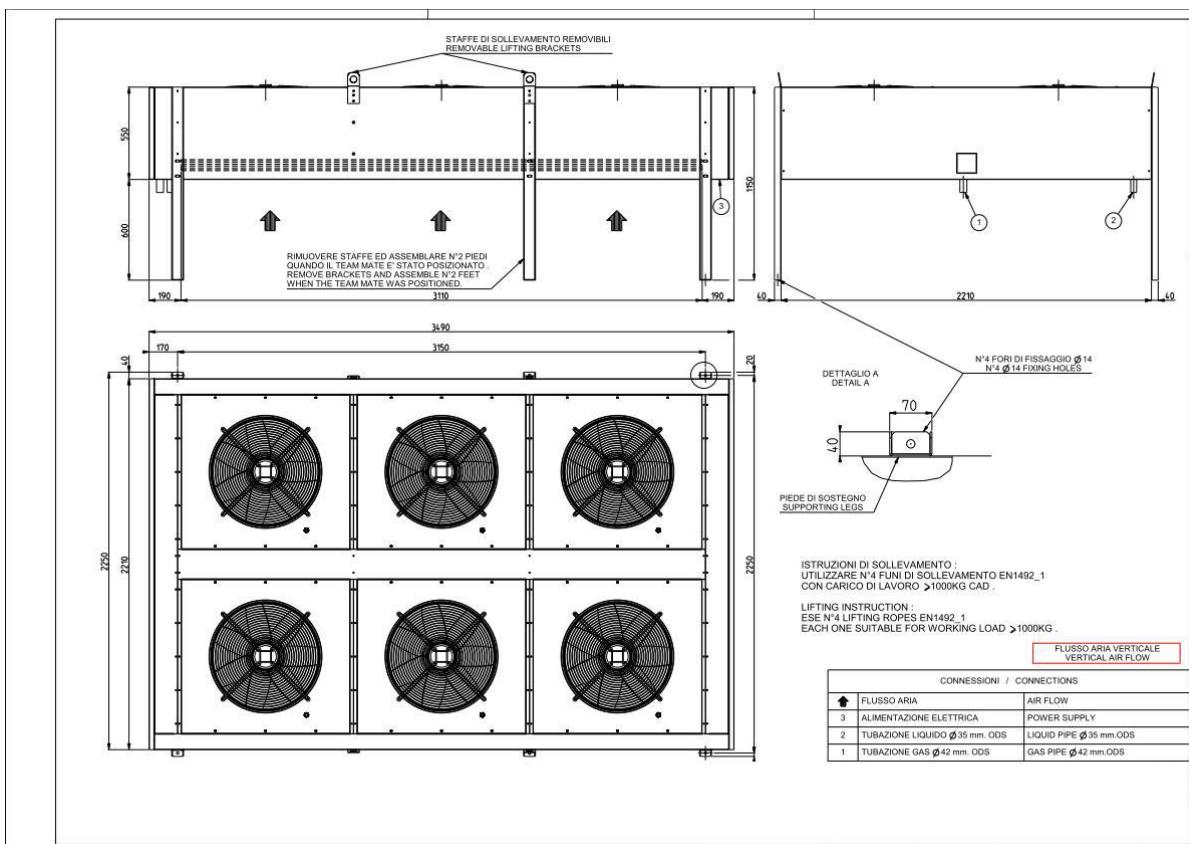


MACHINE DRAWINGS Dimensions in mm

T 185 – HORIZONTAL AIR FLOW



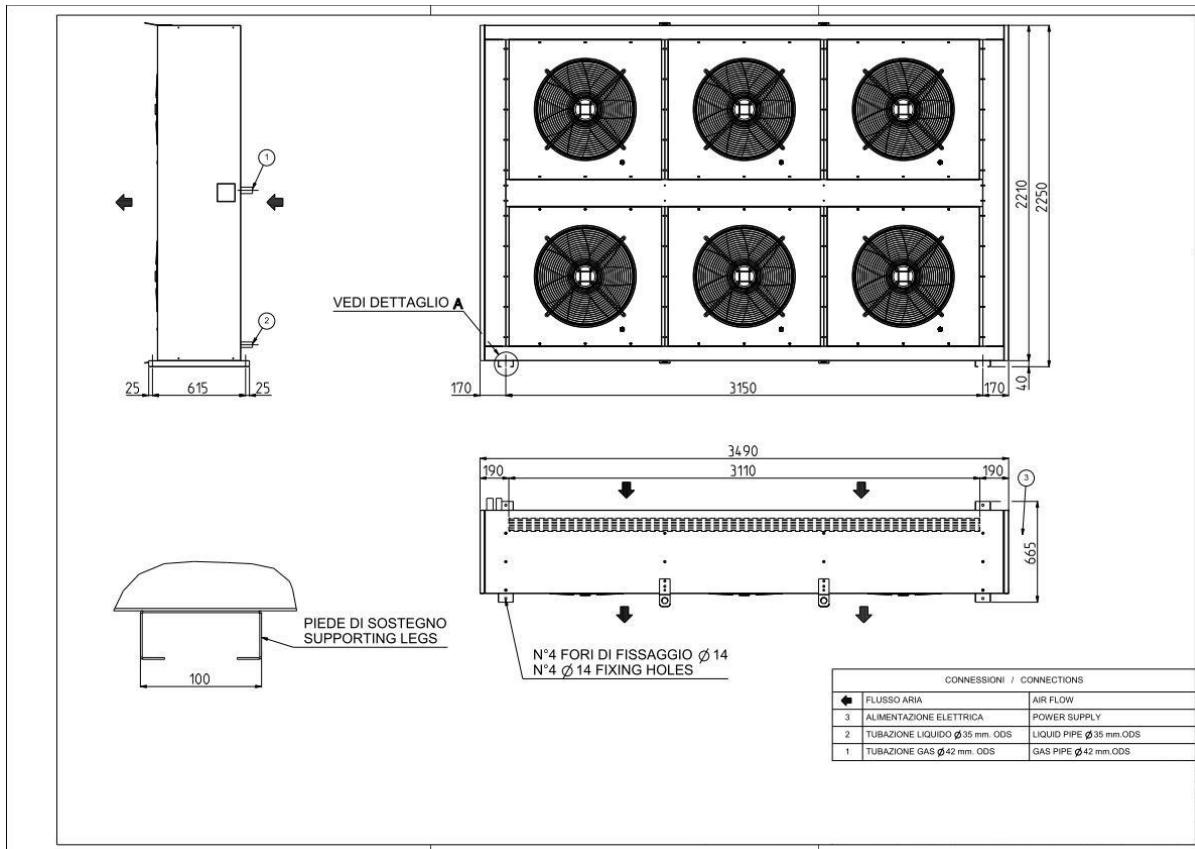
T 185 – VERTICAL AIR FLOW (OPTIONAL)



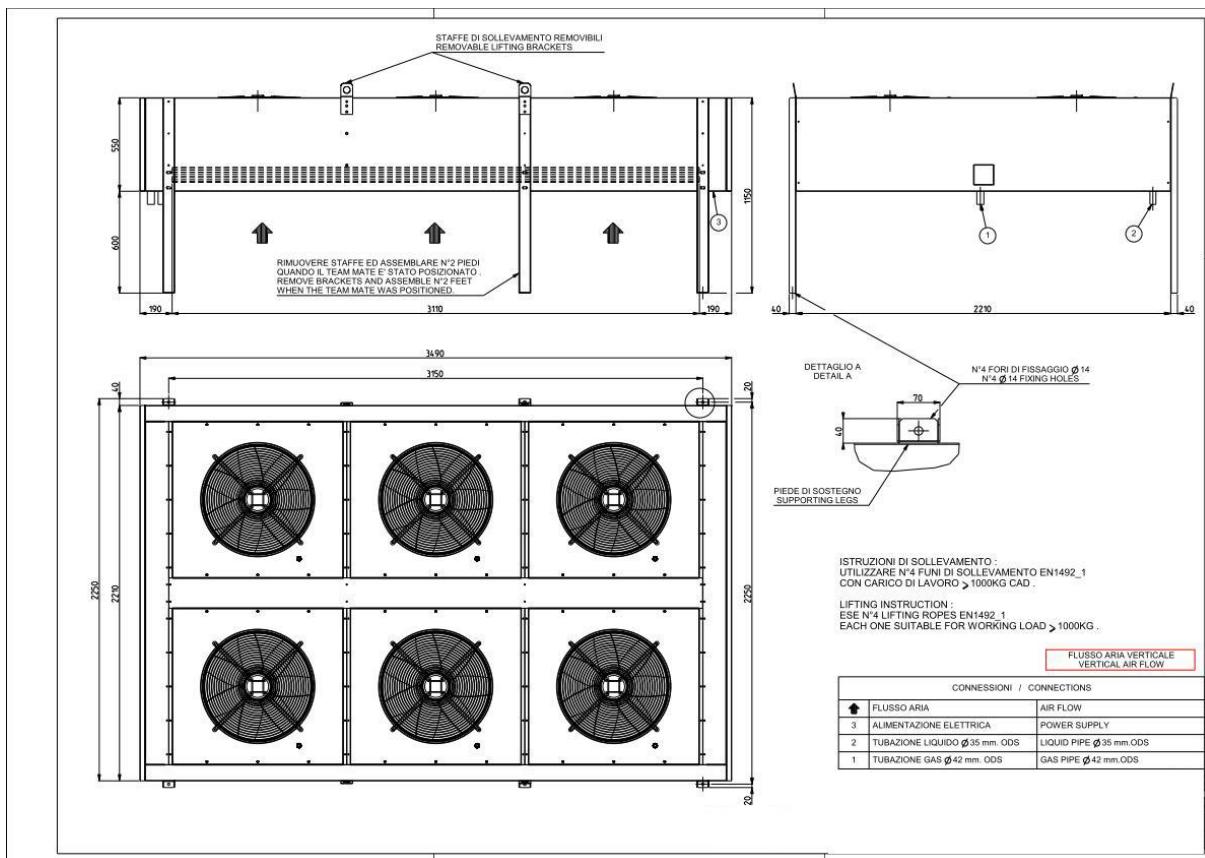
BVE DX

MACHINE DRAWINGS Dimensions in mm

T 210 – HORIZONTAL AIR FLOW



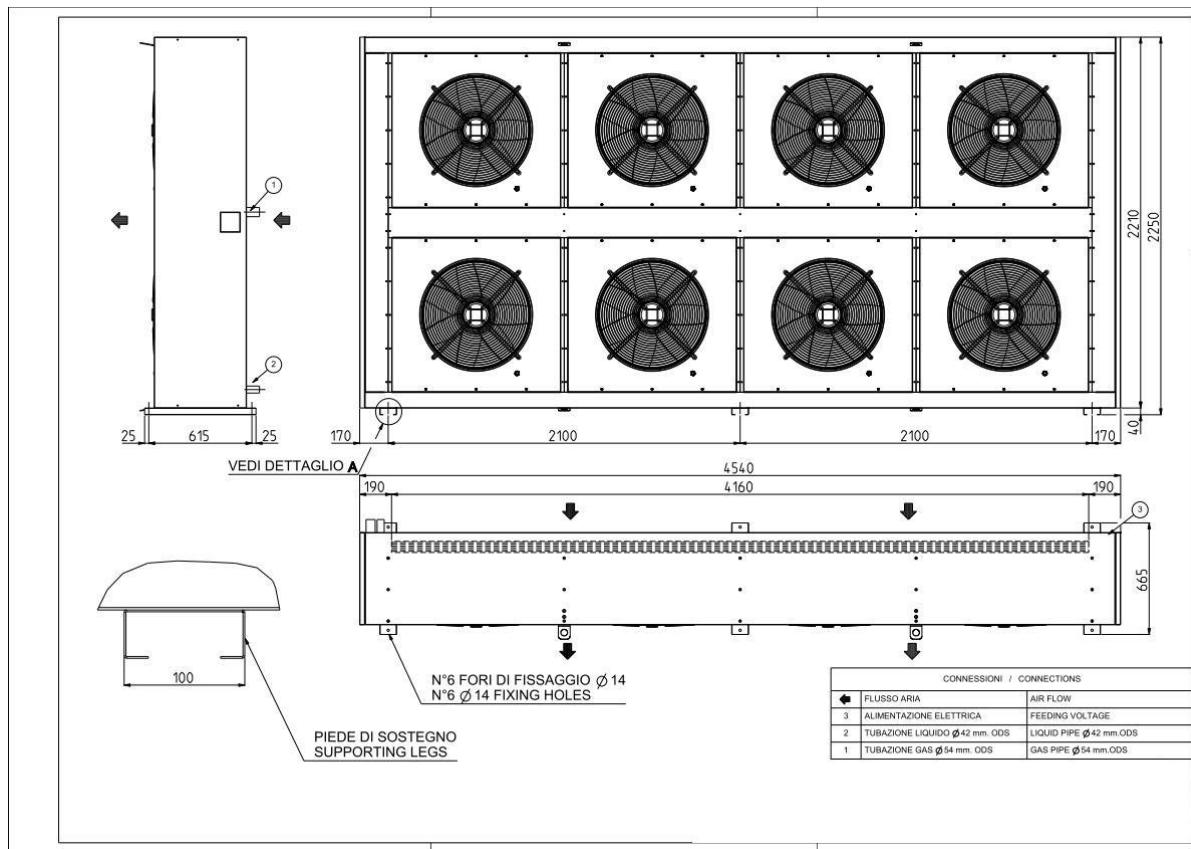
T 210 – VERTICAL AIR FLOW (OPTIONAL)



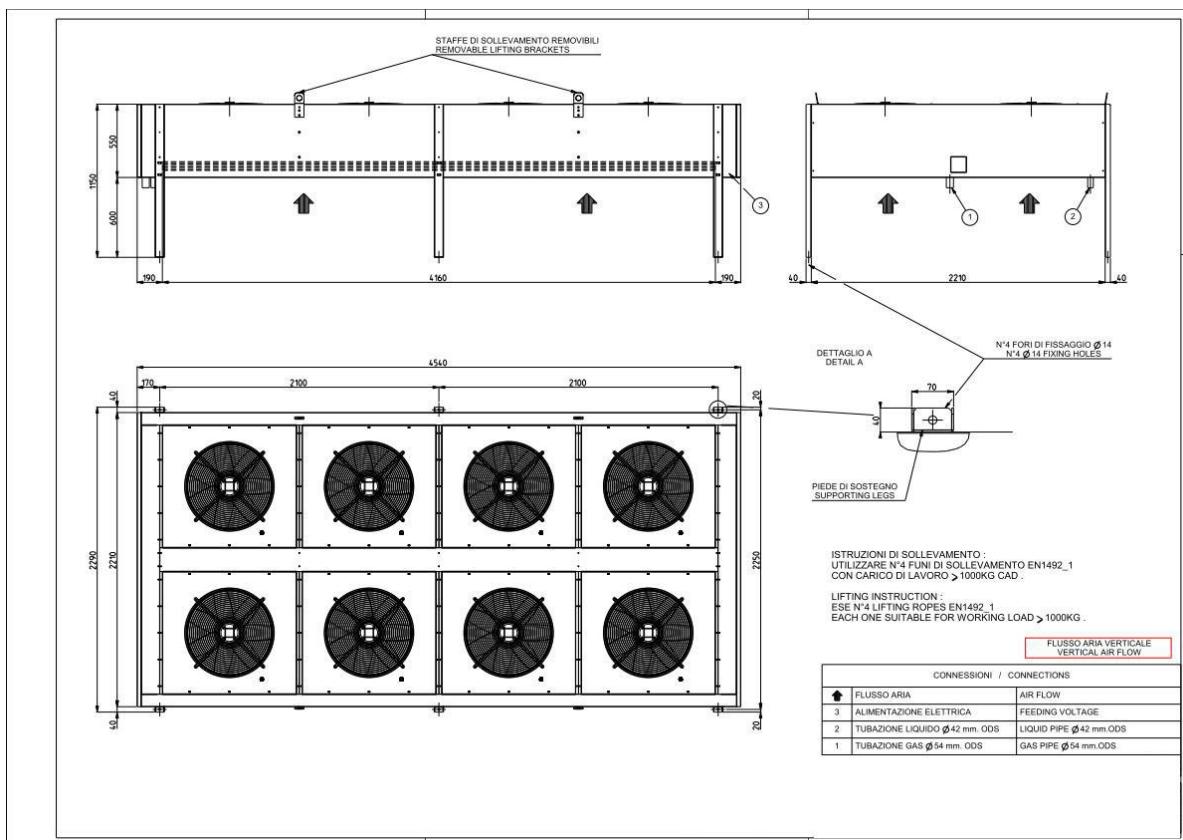
BVE DX

MACHINE DRAWINGS Dimensions in mm

T 250 – HORIZONTAL AIR FLOW



T 250 – VERTICAL AIR FLOW (OPTIONAL)

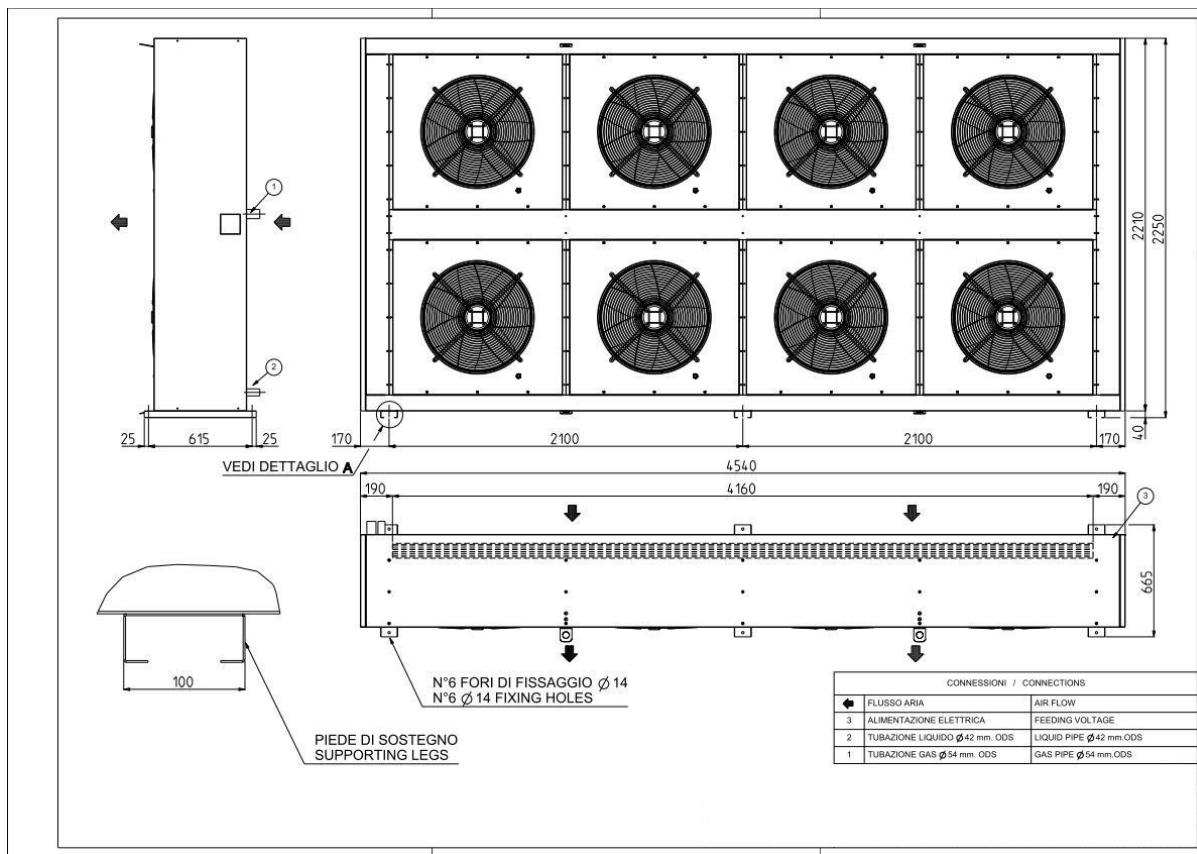


BVE DX

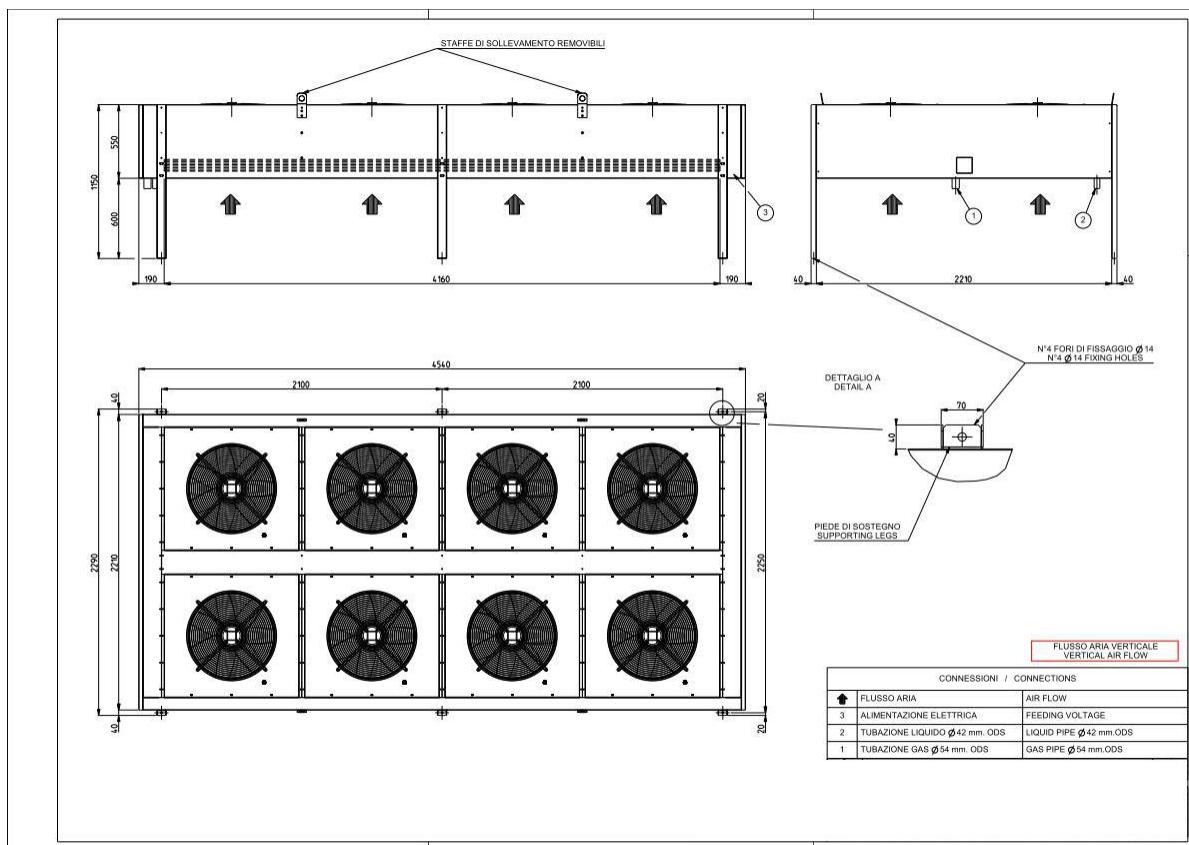
MACHINE DRAWINGS

Dimensions in mm

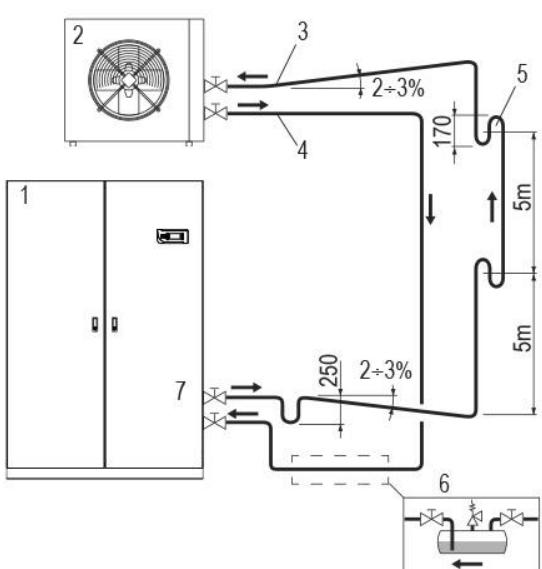
T 280 – HORIZONTAL AIR FLOW



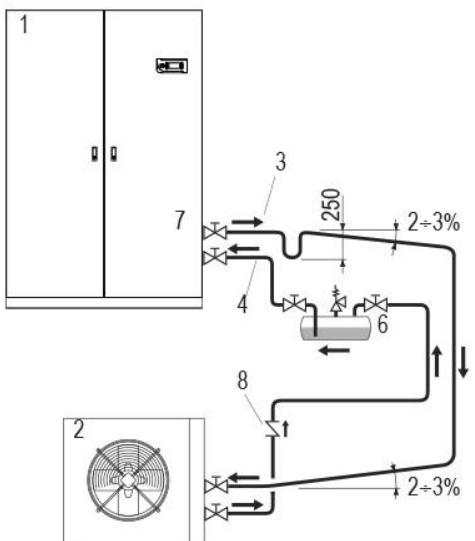
T 280 – VERTICAL AIR FLOW (OPTIONAL)



INSTALLATION DIAGRAM

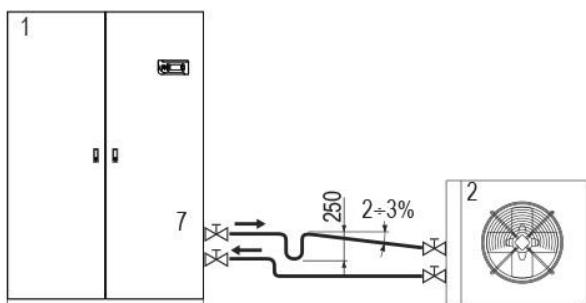


REALIZE THE REFRIGERANT LINE WITH THE INDICATED INCLINATIONS TO EASE THE RETURN TO THE COMPRESSOR OF THE LUBRICANT OIL



LEGENDA

1. Air conditioner
2. Remote air cooled condenser
3. Gas discharge line
4. Liquid return line
5. Trap. Foresee a trap every 5m of the rising pipe.
6. Additional liquid receiver external to the air conditioner, provided by the installer.
 - Refrigerant line longer than 25 equivalent meters.
 - Plant operation with ambient temperature lower than 0°C with refrigerant line any length.
7. Solenoid valve of the liquid line. It is an optional accessory of the air conditioner for refrigeration plants with refrigerant pipe longer than 10m.
8. Non- return valve, provided by the installer. The valve must be installed near the condenser on liquid return line. The valve avoids the return of the liquid inside the condenser, in particular in case of plant stop during the winter season.



THIS DIAGRAM APPLIES TO EACH REFRIGERANT CIRCUIT OF THE UNIT.

WARNING

It is necessary to provide the refrigerant charge for the connection pipes and for the remote air-cooled condenser.

Charge refrigerant in the suitable quantity and lubricant oil in 10% ratio of charged refrigerant.

Lubricant oil must be the same type as the charged one as shown on the compressor plate.



for a greener tomorrow

Eco-Changes è il motto per l'ambiente del gruppo Mitsubishi Electric ed esprime la posizione dell'azienda relativamente alla gestione ambientale. Attraverso le nostre numerose attività di business diamo un contributo alla realizzazione di una società sostenibile.

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