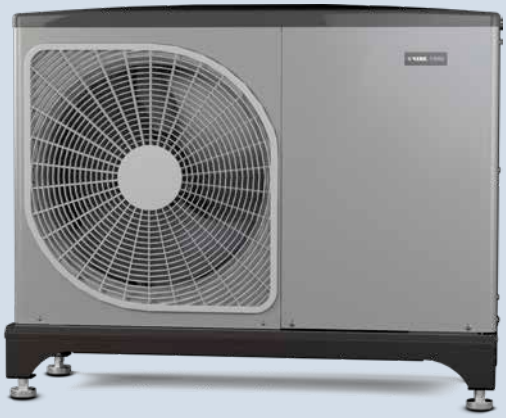
Air/water heat pump
NIBE F2050

NEW!



NIBE F2050 is an intelligent, compact and inverter-controlled air/water heat pump with a more climate-friendly refrigerant. The NIBE F2050 provides optimised savings as the heat pump automatically adapts to your home's output requirements all year round.

The heat pump operates at an outdoor temperature as low as –20°C and delivers a supply temperature of up to 58°C. The effective cooling function allows the heat pump to deliver a comfortable indoor climate even at high outdoor temperatures. It also has a more climate-friendly refrigerant to reduce its impact on the environment. Available in two sizes: F2050-6 and F2050-10.

Thanks to smart technology, the product gives you control over your energy consumption, and will be a key part of your connected home. The efficient control system automatically adjusts the indoor climate for great comfort, and you do nature a favour at the same time.

- **Compact heat pump that adapts to your home's requirements, with a more climate-friendly refrigerant for less impact on nature.**
- **High capacity even down to –20°C and effective cooling function.**
- **Energy-saving smart technology with user-friendly control.**

NIBE F2050 – part of your climate system

The NIBE F2050 is designed to be combined with a NIBE VVM indoor module or NIBE SMO control module to create a highly-efficient climate system for your home.

NIBE flexible indoor modules

NIBE VVM indoor modules provide efficient heating/cooling and hot water with high performance. They come with a smart, user-friendly control system, water heater, additional electricity and a self-regulating circulation pump. VVM S320 and NIBE VVM 225 also include a filling valve, manometer, safety valve and expansion vessel – everything that is needed for a standard installation.

- **Smart control system, advanced technology, easy to understand, and simple to use.**
- **Smart Energy Source for optimised integration of prioritised heat sources, such as woodburners.**
- **A part of your smart home – control your comfort online using NIBE Uplink or myUplink.**

NIBE F2050	VVM S320	VVM 225	VVM 310	VVM 500
				
Compatible with	All F2050 models	All F2050 models	All F2050 models	All F2050 models
Building's output requirements, coldest day	Up to 10 kW	Up to 9 kW	Up to 14 kW	Up to 22 kW
Built-in electric additional heat	9 kW	9 kW	12 kW	9 kW
Domestic hot water volume 40°C	240 l	210 l	250 l at 12 l/min	350 l at 12 l/min
Docking	External heat sources with high output and external accumulator tanks. Without built-in accumulator volume, 26 l buffer vessel.	External heat sources with high output and external accumulator tanks. Without built-in accumulator volume, no surge tank.	Smaller external heat sources without accumulator tank. Integrated accumulator volume, 270 l.	Smaller external heat sources without accumulator tank. Integrated accumulator volume, 500 l.
Connection	Top	Bottom	Top	Top
Height/width/depth (mm)	1800/600/615	1500/600/600	1800/600/615	1900/760/900

Heating capacity & heating system

The NIBE F2050 is compatible with NIBE's VVM indoor modules, as indicated in the table. Each NIBE VVM indoor module has a maximum recommended heating output for your climate system. When combined with a larger heat pump, the heat pump's output and energy coverage ratio, i.e. the bivalent temperature, decreases.

The NIBE VVM S320 and VVM 225 have a single-circuit system that requires the heating system's flow to be maintained above a minimum flow.

The NIBE VVM 310 and VVM 500 are two-circuit solutions in which the heating system flow is independent of the flow across the heat pump.

Domestic hot water

The NIBE VVM S320 and VVM 225 have an integrated water heater with a capacity of 185 litres. In the NIBE VVM 310 and VVM 500, domestic hot water is heated as required in a combined pre- and post-heating coil - for that reason the capacity is dependent on the flow.

Docking

The NIBE VVM 310 and VVM 500 enable simple and efficient docking of external heat sources to the built-in water volume. The NIBE VVM 500 also has a built-in solar coil for easy connection of thermal solar panels.

If the external heat source has a higher output and/or includes an accumulator which is larger than the accumulator volume of the NIBE VVM 310 and NIBE VVM 500, a solution with an external accumulator tank in combination with the NIBE VVM 320 and VVM 325 is a more suitable option.

NIBE SMO control modules

The NIBE SMO control modules provide a flexible solution which is easy to customise. For solutions which include NIBE SMO, system components such as water heater, additional heat sources and other accessories are selected for the specific installation. Up to eight NIBE F2120 models can be connected to a NIBE SMO S40 or NIBE SMO 40.

Choosing the right NIBE SMO for the climate system in your home

NIBE F2050	NIBE SMO S40	NIBE SMO 20	NIBE SMO 40
			
Controls	Up to eight heat pumps.	One heat pump.	Up to eight heat pumps.
Self-regulating circulator pump	Available in two sizes, CPD11.	Available in two sizes, CPD11.	Available in two sizes, CPD11.
External heat source	Three relays for immersion heater (up to 7 binary steps) or a boiler with a shunt valve. Makes it possible to prioritise heat sources.	Three relays for immersion heater (up to 7 binary steps).	Three relays for immersion heater (up to 7 binary steps) or a boiler with a shunt valve. Makes it possible to prioritise heat sources.
Accessories	Wide range, including additional climate system, pool, solar panel package, heat recovery ventilation, room display, etc.	Room sensor, solar panel package.	Wide range, including additional climate system, pool, solar panel package, heat recovery ventilation, room display, etc.

Specifications NIBE F2050

		6	10
System's efficiency class, room heating 35/55°C [1]		A+++/A++	
Product's efficiency class 35/55°C [2]		A+++/A++	A++/A++
$SCOP_{EN14825}$ Average climate, 35/55°C		5.08 / 3.58	4.6 / 3.4
$P_{designh}$ Average climate 35/55°C	kW	5.20 / 5.60	6.3 / 6.5
$SCOP_{EN14825}$ cold climate, 35/55°C		4.10 / 3.05	3.9 / 2.9
$P_{designh}$ Cold climate 35/55°C	kW	5.80 / 5.70	6.5 / 6.2
7/35 Heat capacity/COP, EN14511, nominal	kW	2.64/5.42	4.00/5.33
Sound level (L_{WA}), EN12102 at 7/45, nominal	dB(A)	53	53
Rated voltage	V	230 V 50 Hz, 230 V 2 AC 50 Hz	
CO_2- equivalent (hermetically sealed refrigerant circuit) [4]	tonnes	0.88	1.24
Height/width/depth	mm	791/993/383	905/1035/422
Weight (excluding packaging)	kg	76	83

[1] Scale for the system's efficiency class, room heating: A+++ to G. Reported system efficiency takes the product's temperature regulator into account.
[2] Scale for the product's efficiency class, room heating A+++ to D. [3] Scale for efficiency class, hot water: A+ to F. [4] NIBE F2050 does not require annual inspection, in accordance with the F-Gas Regulation.

M12961 CIL EN NIBE F2050 2346-1

Sustainable energy solutions

Since 1952, NIBE has been manufacturing energy-efficient and sustainable climate solutions for your home. It all started in Markaryd in Sweden and we value our Nordic heritage by harnessing the power of nature. We combine renewable energy with smart technology in order to offer effective solutions so that together we can build a more sustainable future.

Whether it's a chilly winter's day or a hot summer's afternoon, we need a well-balanced indoor climate for a comfortable everyday life, whatever the weather. Our wide range of products supplies your home with cooling, heating, ventilation and hot water, so that you can create a pleasant indoor climate with a low impact on nature.

The system's efficiency for room heating, 35°C

The system's efficiency for room heating, 55°C.

NIBE Energy Systems
BOX 14, 285 21 Markaryd, Sweden
Tel. +46 (0)433-27 30 00 | nibe.se