

# Plug-and-Play Mobile Prefabricated Heat Pump System

## ES HeatBox Hydro & ES EcoStation 90 kW-EVI

### Prefabricated units containing everything to meet a building's heating and cooling needs

- Works for both temporary and permanent needs. HeatBox Hydro is developed for temporary needs while EcoStation is suitable for permanent needs.
- The product's mobility opens up new opportunities for new applications.
- For permanent installations, freed areas are obtained for other utility purposes, reduced operating costs, an increased property value and a strengthened environmental profile.
- Replaces today's cumbersome, time-consuming and costly installation processes that require multiple skill sets and project coordination.
- For temporary heating, and specifically building heating with improved control and climate control, the cost can be cut in half and the CO<sub>2</sub> footprint drastically reduced.
- Connects, for permanent installations, easily to electricity supply and the building's existing heating system.

### • EIS HeatBox Hydro

The Plug-in Module is perfect for temporary needs to save energy and reduce costs. A simple and efficient installation for a limited time and then removable to other environments.

Thanks to its mobility, ES HeatBox Hydro can be used for heating or cooling in case of temporary needs, such as building heating.



### • EIS EcoStation

ES EcoStation can be placed adjacent to the buildings's exhaust air to take advantage of the exhaust air's heat. The module is well suited for connection to cultural buildings and churches for energy efficiency and can be tailored to your environment.

ES EcoStation can also be supplemented with utility functions, such as here with a bicycle parking.



# Plug-n-Play

## Mobile prefabricated power stations

### ES HeatBox Hydro & ES EcoStation



The heat pumps in the power stations are equipped with EVI technology, which enables higher power outputs at lower outdoor temperatures, specially developed for our Nordic climate. The flexible, prefabricated power stations are available in two product versions:

#### • ES HeatBox Hydro

A mobile heat pump module that supplies heating fans with hot water for temporary heating of premises, construction sites and warehouses.

#### • ES EcoStation

When the Plug-in Module is tailor-made to match the existing environment, it is called ES EcoStation. It's as useful for connecting to cultural buildings as for innovative new architecture. An ES EcoStation can also be nicely complemented with utility functions that match the environment.

#### Flexibility and innovation

Our Plug-in Modules are innovative, flexible and complete – a tailor-made, prefabricated power station that is available in two product versions. In addition, an industrially stable quality is guaranteed through series production in the factory.

#### Temporary needs

For temporary use during the construction phase, the solution delivers cheap and environmentally friendly heat with easy installation. The building's energy performance and operating costs are improved, which together with the better environmental profile increases the property's value.

#### Flexible placement – permanent and temporary

A Plug-in Module can be placed nearby or on the roof of the building which it is going to heat up. The module does not have to be directly adjacent to the building. This creates space in the building and these useful areas can be used for other, more advantageous, purposes.

#### Benefits for property owners, managers and society

- Lower energy consumption
- Higher direct return
- Increased property value
- Smoother installation
- Better monitoring
- Conversion to greener energy delivery
- Increased useful areas

#### Benefits for new production projects

- Shorter construction time
- Reduced costs during the construction phase
- Better profitability in projects
- Reduced environmental impact
- Reduced energy consumption and better monitoring
- Increased utility space

#### HeatBox Hydro & ES EcoStation 90 kW

Min/max heat output (1)	kW	13.7 / 87.4
Heat output max when connected with double A63 (1)	kW	129.4
Power consumption heating, min/max (1)	kW	3.3 / 24.2
COP min/max (1)	W/W	3.62 / 4.42
Min/max heat output (2)	kW	13.6 / 86.4
Power consumption heating, min/max (2)	kW	4.2 / 28.6
COP min/max (2)	W/W	2.99 / 3.38
Min/max cooling output (3)	kW	35 / 64
Operational temp. range, heating (re. Heat pumps)		-25°C – +45°C
EU Energy label		A++
SCOP (4)		4,12
Max. water inlet temperature in heating mode		60 °C
Min. water inlet temperature in heating mode		10 °C
Min. water inlet temperature in cooling mode		5 °C

#### MEASUREMENTS, WEIGHT, REFRIGERANT, CONNECTIONS, ENVIRONMENTAL REGULATIONS

Dimensions of the module, 10' container (LxWxH)	mm	2918 x 2438 x 2896
Net weight	kg	ca 2.600
Gross weight, including water	kg	ca 3.200
Refrigerant		R410a
Power supply, grounded	V / Hz / A	400V-3PH/50Hz/63
Ground fault circuit breaker and surge protector		Required
Heat/cooling water connections		54 mm
Water inlet connections		22 mm
Environmental regulated installation, F-gas regulations	Environment regulations	Yes

#### EQUIPMENT

Inverter compressor technology, variable speed fans		Yes
Heat pumps with EVI technology		Yes
Heat pumps	2 pcs	AW45-EVI-M
Accumulator multi-functional tank	1 pcs	500 litres
ErP rated circulation pumps	2 pcs	Debe
Heat exchanger	kW	100
Piping system		Stainless steel / Copper / Aluminum / Black steel
Gates for protection of heat pumps		Yes
Lights in both compartments		Yes
Electrical sockets in both compartments		Yes

#### AVAILABLE OPTIONS

Electrical boiler 42 kW	
Dual 63A electrical connections to enable electric boiler as addition and/or tip	
Web-based monitoring including 4G modem for communication	
Locking devices for hatches, shutter doors and gates	
Electric meter	

(1) Heating conditions: water temperature in /out – 30°C / 35°C, ambient temperature – DB 7°C /WB 6°C. (2) Heating conditions: water temperature in /out – 40°C / 45°C, ambient temperature – DB 7°C / WB 6°C. (3) Cooling: water temperature in /out – 23°C / 18°C, ambient temperature – DB 35°C / WB 24°C. (4) At medium-temperate climates and low water inlet temperature. Specified manufacturers may change.

#### ES ENERGY SAVE HOLDING AB (PUBL)

Metallgatan 2–4, SE-441 32 Alingsås · Sweden · +46 322-790 50  
info@energysave.se · www.energysave.se

