



# Egea NCC R410A

**Air cooled water chillers and heat pumps with radial fans**

**Capacities from 40 to 80 kW**

The EGEA-NCC series offers an innovative product designed for the climate control of medium volume residential, commercial and industrial premises.

The use of hermetic scroll compressors with R410A refrigerant permits high efficiency performance in compliance with the most modern environment protection policies.

The radial fans of the condensing section make installation of this unit possible also inside technical compartments to give the customer greater versatility in the installations solutions.



## > Versions

- F** cooling only version available in 4 different sizes.
- H** heat pump version available in 4 different sizes.
- MF** condensing unit version

## > Accessories

### **Electronic fan speed control**

regulates the fan speed according to the unit cooling load.

**Hydraulic kit** Complete with pump, water filter, expansion tank, safety valve and air relief valve.

**Evaporator electric heater.**

**Coil protection grille.**

**Remote control panel.**


**Antivibration mounts.**


**Water filter.**





## > Main technical data

Version F-MF		40	50	70	80
Cooling capacity <sup>1</sup>	kW	40,0	50,1	63,9	70,3
Input power <sup>1</sup>	kW	13,4	18,5	24,9	28,9
Power supply	400V - 3 - 50 Hz				
Nominal input current	A	23	33	47	54
Compressors / Circuits	n°	2/1	2/1	2/1	2/1
Water flow	m <sup>3</sup> /h	6,9	8,6	11,0	12,1
Capacity control	%	50-100	50-100	50-100	50-100
Fans	n°	2	2	2	2
Total air flow rate	m <sup>3</sup> /h	22.000	22.000	22.000	22.000
Sound pressure 	dB(A)	71	71	71	71
Total maximum current	A	55	61	75	84
Starting current	A	137	171	206	213
Hydraulic connections		2" gas	2" gas	2" gas	2" gas


Version H		40	50	70	80
Cooling capacity <sup>1</sup>	kW	40	50,1	63,9	70,3
Input power <sup>1</sup>	kW	13,4	18,5	24,9	28,9
Heating capacity <sup>2</sup>	kW	40,4	50,8	66,8	74,3
Power supply	400V - 3 - 50 Hz				
Nominal input current	A	23	33	47	54
Compressors / Circuits	n°	2/1	2/1	2/1	2/1
Water flow	m <sup>3</sup> /h	6,9	8,7	11,5	12,8
Capacity control	%	50-100	50-100	50-100	50-100
Fans	n°	2	2	2	2
Total air flow rate	m <sup>3</sup> /h	22.000	22.000	22.000	22.000
Sound pressure 	dB(A)	71	71	71	71
Total maximum current	A	55	61	75	84
Starting current	A	137	171	206	213
Hydraulic connections		2" gas	2" gas	2" gas	2" gas

cooling

heating

<sup>1</sup> External air 35 °C, evaporator inlet/outlet 12/7 °C.

<sup>2</sup> Water temperature 40/45 °C, external air 5 °C - relative humidity 80%.

 Sound pressure at 1 m from fan free mouth.

## > Characteristics

**Compressors:** hermetic scrolls complete with internal thermal protection and direct start up. Cooling capacity control through capacity steps depending on the number of compressors installed. The compressors are housed in a special soundproof compartment. Standard phase sequence monitoring.

**Evaporator:** brazed plate AISI 316 stainless steel heat exchanger type with anti-condensate closed-cell polyurethane insulation. Differential pressure switch supplied as standard.

**Condenser:** Cu/Al coil with corrugated surface fins.

**Fans:** radial fans directly coupled to the electric motor with internal thermal protection and provided with protection mesh.

**Control and safety devices:** microprocessor type including the control of the cooling capacity on one or more capacity steps, setting of operating parameters, display of the evaporator inlet and outlet temperature, display and reset of the alarms, setting of the compressor protection timing functions, automatic start up after power failures and management of the circulation pump. Management of the defrosting cycles and inversion of the cycle for the heat pump version.

**Electrical panel:** made in double door execution, it includes: automatic general switch, secondary circuit protecting thermomagnetic switch, contactors for compressors and fans. Terminal plate.

### Cooling circuit

**Version F** thermostatic valve, drier-filter, manual reset high pressure switch, automatic reset low pressure switch, high and low pressure safety valves.

**Version H** thermostatic valve, drier-filter, manual reset high pressure switch, automatic reset low pressure switch, high and low pressure safety valves, four-way valve for cycle inversion, liquid receiver, no-return valve.

**Structure:** High-thickness galvanised steel panels, painted with polyester powders. Stainless steel bolts and screws.

Radial fan version for installation inside technical compartments



Scroll compressors and R410A refrigerant



Wide range of accessories



## > Sizes and weights

			40	50	70	80
Length	<b>L</b>	mm	2.097	2.097	2.097	2.097
Width	<b>W</b>	mm	1.079	1.079	1.079	1.079
Height	<b>H</b>	mm	1.716	1.716	1.716	1.716
Weights <b>F</b>		kg	682	692	801	820



## > Accessories compatibility

	40	50	70	80
Differential pressure switch	●	●	●	●
Door lock general switch	●	●	●	●
Microprocessor	●	●	●	●
Electronic fan speed control	○	○	○	○
Remote control panel	○	○	○	○
Refrigerant pressure gauges	○	○	○	○
Rubber anti-vibration mounts	○	○	○	○
Coil protection grille	○	○	○	○
Pump hydraulic kit 1	○	○	○	○
Evaporator electric heater	○	○	○	○
Crankcase heater	○	○	○	○
Water filter	○	○	○	○

● Standard, ○ Optional, – Not available.