



# K2 Air Systems

K2 Marine Air Conditioning have been designed and developed to optimize performance for your boat air conditioning needs.





# K2 Air Systems

K2-KKSC SERIES

---

## User Manual



DC Self Contained Unit

# OVERVIEW

Nowadays it is an increasingly common trend to install equipment that can work directly powered by the boat's batteries. Without the need for the power supply from the port, and without the uncomfortable noise of the generator set. Although the purchase price of this equipment is higher due to the high cost of the new technology they use, the total cost of the installation is lower because the generator set is not necessary.

For an air conditioner to work efficiently and thus achieve maximum comfort without wasting battery capacity, it must use an inverter-type compressor. They are compressors with lower than normal energy consumption, but they also have a main difference compared to 220 volt compressors. Conventional compressors have a very high consumption in the moments of startup. After a few seconds that consumption is reduced to normal values, but those seconds are long enough to need a powerful electrical supply to support that maximum current. However, modern inverter compressors have a progressive start, they accelerate little by little with an almost imperceptible noise and with an electrical consumption that increases little by little.

Additionally, when the air conditioning unit Inverter conditioner reaches the desired temperature, its compressor reduces the power consumed.

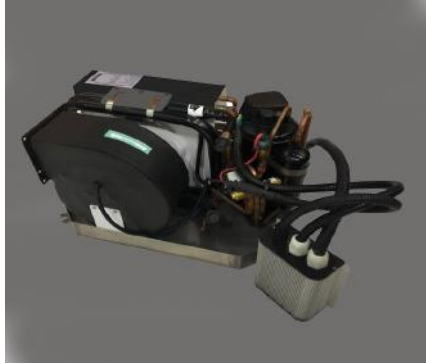
This is how modern 12-volt direct current equipment manages to increase its operating hours by making the most of the capacity of the batteries..

- DC marine Air Conditioning Units Available in 12V, 24V, 48V
- Fitted with anti vibration mounts
- B10 Cupronickel sea water condensers
- Low Amp draw and quiet operation
- Rust-free Stainless Steel drain pan
- Environmentally safe R410A refrigerant
- CE certified product range
- Reverse inclined Impeller Blowers for Compact installation, high air flow and near silent motor running
- Copeland and Toshiba compressors

# K2-KKSC Series

DC Air Conditioning Units  
from 5,000 BTU/h to 12,000 BTU/h

Designed & Manufactured to Middle  
East Specifications



Ideal for small boats with a cuddy cabin. The KKSC Series can be operated with batteries or at the dockside with a battery charger. The range varies from 5000 Btu all the way up to 12000 Btu with very low Amp consumption.

DC marine Air Conditioning Units  
Available in 12V, 24V, 48V

Fitted with anti vibration mounts

B10 Cupronickel sea water condensers

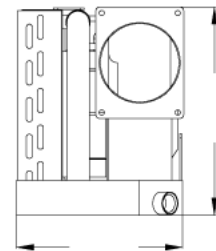
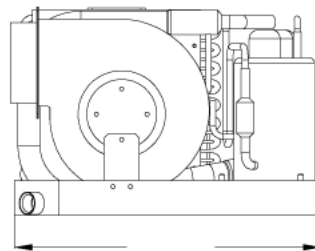
Low Amp draw and quite operation

Rust-free Stainless Steel drain pan

CE certified product range

Scroll Blowers

Copeland and Toshiba compressors



MODEL	BTU	VOLTS	AMP
K2KKSC3.5-12V	3500 BTU	12 V	27
K2KKSC07-12V	7000 BTU	12 V	28
K2KKSC12-12V	12000 BTU	12 V	44
K2KKSC3.5-24V	3500 BTU	24 V	13
K2KKSC07-24V	7000 BTU	24 V	23
K2KKSC12-24V	12000 BTU	24 V	30
K2KKSC08-48V	8000 BTU	48 V	11.5
K2KKSC12-48V	12000 BTU	48 V	20

# TECHNICAL PARAMETERS



**K2 AIRSYSTEMS**

Australia Office Level 1, 296 Collins  
Street 3000 Melbourne, VIC, Australia

E: [Sales@k2airsystems.com](mailto:Sales@k2airsystems.com)

W: [WWW.K2airsystems.com](http://WWW.K2airsystems.com)

## DC SELF CONTAINED UNIT

Model		K2KKSC12-03	K2KKSC12-07	K2KKSC12-12	K2KKSC24-08	K2KKSC24-12	K2KKSC48-16
Cooling Capacity	BTU/hr	3500	7000	12000	8000	12000	16000
Heating Capacity	BTU/hr	3800	7500	12500	8500	12500	16900
Power source		DC12V	DC12V	DC12V	DC24V	DC24V	DC48V
Input power(W)	Cooling	320	550	720	560	840	1200
	Heating	360	580	840	600	880	1440
Amp Draw(A)	Cooling	26	45	60	23	35	25
	Heating	30	48	70	25	37	30
Air flow	m <sup>3</sup> /h	210	350	550	350	550	700
Refrigerant		R134a					
Dimension	height	250	280	320	300	298	328
	width	380	400	480	480	480	520
	Depth	200	238	280	285	285	315
Minimum air duct SizeΦ (mm)		100	100	125	100	125	150
Minimum Return air grille Size(cm <sup>2</sup> )		150	150	215	150	215	215
Minimum Supply air grille Size(cm <sup>2</sup> )		300	300	415	300	415	415
Seawater pipe Dia.		5/8"	5/8"	5/8"	5/8"	5/8"	3/4"
Net Weight	KG	13	18	26	18	26	31

# TYPICAL INSTALLATION

## 24 Volt DC Air Conditioner

System runs on electrical energy stored in batteries.  
Higher DC voltage allows for a more powerful unit.

### At the Dock

Shore power gets converted to battery power through a battery charger.

### Underway

Engine power gets converted to battery power through the engine alternator.

