myCOOLMAN Caravan Roof Air Conditioner:

Tips, Hints & Operational Advice

Follow simple tips to maintain your myCOOLMAN roof-mounted air-conditioning unit for maximum performance, efficiency and lifespan.

1. Caravan/Vehicle Tips

Keep cool air in and hot air out with a well-insulated caravan, reducing the workload on your myCOOLMAN air conditioner. Better insulation & parking in the shade means improved cooling efficiency, lower energy consumption, and longer run times when running your air conditioner on an inverter powered by a battery bank

- **Use reflective blinds or curtains:** Use/Fit window shades or thermal curtains to block the sun's heat from entering your caravan or vehicle.
- **Start Cooling Early:** On very hot forecast days, keep blinds, windows, vents and doors closed early in the day. Start the air conditioner as soon as you can, allowing it to maintain a comfortable environment rather than having to cool down a heated space. The myCOOLMAN air conditioner will adjust the compressor speed to match the cooling required, so they use the least amount of energy required to maintain a comfortable temperature.
- **Roll out your awning & other shades:** This keeps the hot sun off the panels of the caravan and keep the internal area from heating up too much.

2. Select the right temperature and fan speed

Selecting a realistic temperature and fan speed helps maintain a comfortable environment without overworking your air conditioner.

- **Simple Tip:** Set the desired temperature to a comfortable 22°C (higher in extreme heat) and adjust the fan speed according to the outside temperature. A higher fan speed cools the area faster, but a steady low speed efficiently maintains the temperature and reduces power consumption. Setting the desired temperature too low (like 16°C) won't cool the space any faster **and will waste energy** as the unit will likely run continuously.

3. Keep Air Output Vents and Intake Openings/Vents Clear

Good airflow is essential for any air conditioner to work efficiently. Ensure nothing is obstructing any air vents or intakes.

- **Warning:** Blocked vents can reduce efficiency and may cause overheating or mechanical issues.
- **Clean filters regularly:** Dirty filters will reduce airflow & unit performance – pull them out & clean regularly

  (refer to owners manual on how to remove/clean filters)

4. Check the rooftop unit regularly for dirt/insect nests

If a reduction of performance/increase in operating noise is noticed during operation please follow steps 1-3

If issue persists it's recommended to have the rooftop unit inspected for excessive dirt/insect nests etc as this can also effect performance & operational noise

5. Operating myCOOLMAN AC from an Inverter or Generator

If operating the myCOOLMAN AC from and Inverter (via battery bank) or Generator we strongly recommend the following minimum requirements:

Inverter – Pure Sine Wave Output 2000W

Generator – Pure Sine Wave Output 2KVa/2000W

We expect the myCOOLMAN AC will consume on average 60-80 amps per hour from a battery bank on cool mode when unit set to 22-23 degrees & the ambient temperature is 30-35 degrees – This will depend on various factors, but if you follow the steps above it is very achievable

6. Running myCOOLMAN AC on Batteries (via Inverter)

Battery Capacity	Recommended Runtime (no charge input)	Probable runtime to flat (no charge input)
200ah	1 hour	2-3 hours
300ah	1.5 hours	3.5-5 hrs
400ah	2.5 hours	4.5-6.5 hrs
600ah	4 hours	7-9.5 hrs
900ah	6 hours	10-14 hrs

Calculations based off using quality lithium batteries with myCOOLMAN AC set to 22-23 degrees and ambient temperature 30-35 degrees and steps 1-3 above followed – various factors can affect the estimates above – always monitor battery charge levels

The table above shows our **recommended runtime** without any form of charging (eg overnight – no solar) from a fully charge battery bank, while ensuring a usable level of battery capacity remains for other appliances

It is always best to have some battery capacity remaining for operating other appliances on your travels as any discharge that occurs from the batteries must be replaced somehow via (solar/AC/DC) charging

If you have a form of charge input, the **recommended runtime** would increase inline with amount of charge input

In the last column it shows **the probable runtime to flat** from a fully charged battery bank via an inverter with the AC consuming 60-80 amps per hour

This would leave very little battery capacity for other appliances but provides an estimate on probable runtime if 'saving' battery capacity is not an issue

***All of this information is an estimate only and will depend on many variables –**

- **Caravan Size/Style**
- **Insulation**
- **Ambient Temperature**
- **Intelligent use of the Air Con (turn on early/set realistic temps)**