

Trouble shooting your Arctic Breeze 12 volt air conditioning system

Nothing works, not even blower

1	With blower switch turned on, push and momentarily hold the reset button.	Blower now works but quickly stopped again.	Battery voltage below 12.1 volts,--- recharge battery
		Does not reset.	Go to next step.
2	With a 12 volt test light, check for power at each side of the battery guard switch.	No power available on system side.	Battery voltage low (charge battery) Reset button or wire harness may be faulty, go to Step 4.
		No power on the either side.	Battery connection may need cleaning.
		Power on both sides.	Battery guard OK, Check 80 Amp breaker reset button. Go to Step 3.
3	Check 7.5 amp ATO fuse inside condenser\ compressor box.	Fuse was blown.	Replace fuse, and check blower operation.
		Fuses OK.	Go to next step.
4	Manually reset battery guard by disconnecting the weather pack connector and jumpering the two wires together on the battery guard side, bypassing the reset button.	Resets as soon as wires connected.	Trace faulty reset wire or faulty reset button. (see wiring diagram.)
		Still does not reset.	Check small ground wire at negative post.
			Battery guard may be faulty----replace it.

Blower works but compressor does not start.

1	Turn thermostat knob all the way clockwise to max cold position. The compressor and condenser fans should start to operate.	Yes they do.	Check to ensure both condenser fans operate.
		No, the compressor does not start.	Go to step 2.
2	Check 20 amp fuse for condenser fans.	Fuse was blown.	Replace fuse and check system operation.
		Fuses OK.	Go to step 3.
3	Check for 12 volt power at the binary switch, located on dryer.	Yes, 12 volt in and out of switch.	Go to step 4.
		12 volt found on one side only.	System may be low/empty of refrigerant or may have faulty binary switch. If system is low, find and repair leak.
4	Check for 12 volt power and proper ground at small wires of the 75 amp relay. Relay should click as evaporator blower is turned on and off.	Relay has power and clicks, but compressor still does not start. Note: condenser fans should also engage the same time as comp.	Compressor motor may be faulty or require new brushes. Check all cable connections to ensure good contact and 12v power present.
		Relay does not click but 12 volt is available on small white wire and ground is ok.	Check to ensure good ground available.
			Relay may be faulty ----- replace it.

Everything runs, but the system does not blow cold air.

1	Check to ensure the coils are both clean, evap coil located in cab and condenser coil located in compressor box.	Both coils are clean and have lots of air flow.	Go to step 2.
		Coils require cleaning.	Clean the coils and try again.
2	Check system over for refrigerant leaks. Some refrigerant may have leaked out.	Found leaks.	Repair and refill.
		No leaks found.	Check pressures and feel return line temperature. Should be cold.
3	Check belt tension to ensure compressor is operating at proper speed.	Yes, the belt is tight.	
		Belt may have been slipping.	Replace and tension belt.