

6 Maintenance

6.1 Service Life

The expected service life of this product is five years of operation when used in accordance with the safety instructions, maintenance intervals and correct use, stated in this manual. The effective service life can vary according to frequency and intensity of use. Refer to the procedures in this chapter.

6.2 Cleaning the Cabinet



DANGER!

Risk of Injury or Damage

Invacare oxygen concentrators are specifically designed to minimize routine preventative maintenance.

To prevent injury or damage:

- Only qualified personnel should perform preventative maintenance on the oxygen concentrator.
- DO NOT remove cabinet.



DANGER!

Risk of Injury or Damage

Liquid will damage the internal components of the concentrator. To avoid damage or injury from electrical shock:

- Turn Off the concentrator and unplug the power cord before cleaning.
- DO NOT allow any cleaning agent to drip inside the air inlet and outlet openings.
- DO NOT spray or apply any cleaning agent directly to the cabinet.
- DO NOT hose down the product.




CAUTION!

Risk of Damage

Harsh chemical agents can damage the concentrator. To avoid damage:

- DO NOT use products that contain ammonia on the brass patient outlet fitting.

 At a minimum, preventative maintenance **MUST** be performed according to the maintenance record guidelines. In places with high dust or soot levels, maintenance may need to be performed more often. Refer to *1.1 preventative Maintenance Checklist, page 1*.

Periodically clean the concentrator's cabinet as follows:

1. Use a damp cloth, or sponge, with a mild detergent such as Dawn dish washing soap to gently clean the exterior case.
2. Allow the concentrator to air dry, or use a dry towel, before operating the concentrator.

6.3 Disinfecting the Cabinet

The following disinfectants have been evaluated and may be used to disinfect the concentrator's cabinet:

- Barbacide
- Virex II 256
- MadaCide-FD
- Ethyl Alcohol (Up to 95%)
- Isopropyl Alcohol (Up to 99%)

 Follow the manufacturer's disinfecting instructions for each disinfectant.

6.4 Cleaning the Cabinet Filter



CAUTION! Risk of Damage

To avoid damage to the internal components of the unit:
-DO NOT operate the concentrator without the filter installed or with a dirty filter.



CAUTION! Risk of Damage

To avoid breaking the filter assembly:
-DO NOT remove the filter material from the filter holder.

There are two cabinet filters, one located on each side of the cabinet.

There are two ways to clean the cabinet filter:

- Vacuum the filter.
- Remove the filter door assembly and wash the filter.

6.4.1 Vacuum the Filter

1. Use the vacuum hose to remove the dirt from the filter.
2. If the dirt is not removed with the vacuum, follow the instructions in the next procedure for washing the filter.

6.4.2 Washing the Filter

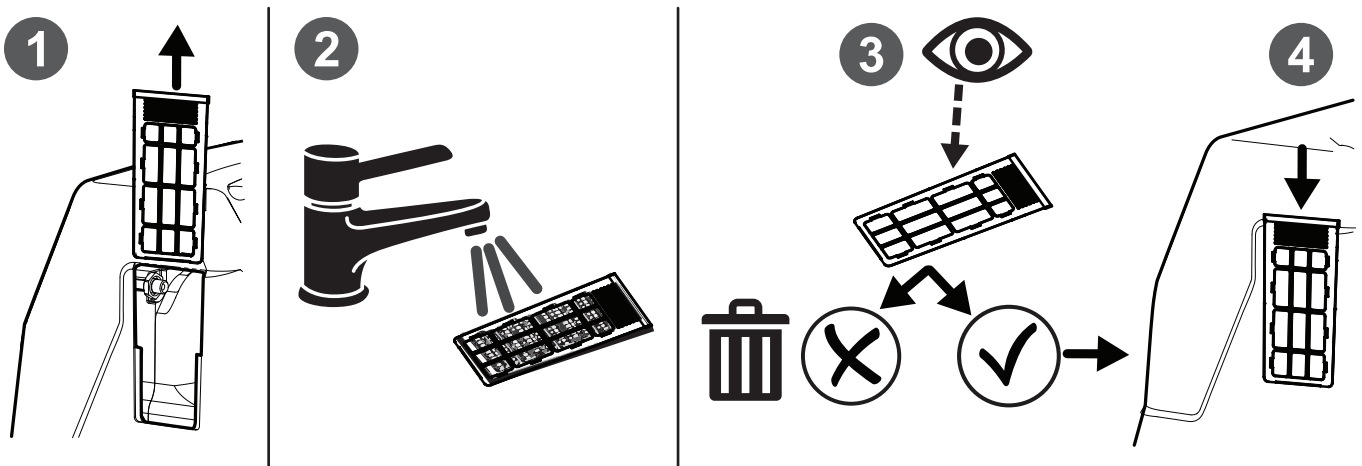


Fig. 6-1 Washing the Filter


1. Press the filter assembly on both sides of the concentrator and slide up to remove to clean as needed.




Environmental conditions that may require more frequent inspection and cleaning of the filter include, but are not limited to: high dust, air pollutants, etc.

2. Clean the cabinet filter assembly with a vacuum cleaner or wash with a mild liquid dish detergent (such as Dawn) and water. Rinse thoroughly. Thoroughly dry the filter assembly .
3. Inspect for fraying, crumbling, tears, and holes. Replace filter assembly if any damage is found.
4. Reinstall the cabinet filter assembly on both sides of the concentrator.

6.5 Humidifier Bottle Cleaning and Thermic Disinfection

 Clean and disinfect the oxygen humidifier bottle daily to reduce limestone deposits and eliminate possible bacterial contamination. Follow the instructions provided by the manufacturer. If none are provided, follow these steps:

1. Wash humidifier bottle in soapy water and rinse with a solution of ten parts water and one part vinegar.
2. Rinse thoroughly with hot water.
3. Air dry thoroughly.

 To limit bacterial growth, air dry the humidifier bottle thoroughly after cleaning when not in use. Refer to *5.4 Setting Up the Concentrator, page 20*.

6.6 Preventative Maintenance - Patient Checklist

Use the table below for routine maintenance.

	Frequency		
	Daily	Weekly	Monthly
Clean Humidifier Bottle (if prescribed)	✓		
Check that the fire break (if provided) is installed between the cannula and extension tubing	✓		
Clean humidifier bottle tubing and connector (if prescribed)		✓	
Clean cannula/mask and tubing		✓	
Clean cabinet filter		✓	
Clean cabinet			✓