

# OCA 500/1200/1500 Family

Air Purification Machines

Operation and Maintenance Manual





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### WARNING SAFETY WARNING INSTRUCTIONS

#### READ AND SAVE THESE INSTRUCTIONS

This equipment to be operated only after reading this Quick-start Guide.



Do not use near combustible or explosive material. Fire may occur.



Do not expose to water or rain. Electrical shock may occur.



Connect only to grounded outlet.



Disconnect power for cleaning and servicing.



Disconnect power cord before moving.



Be careful not to tip the unit when moving, as this may cause injury.



Do not operate if cord or plug is damaged. Contact an authorized service facility for examination and/ or repair.



Arrange cord away from traffic areas and where it is not a tripping hazard. Do not cover with rug or carpet.



High-intensity ultraviolet light inside. Avoid eye and skin exposure.

## L'AVERTISSEMENT INSTRUCTIONS D'AVERTISSEMENT DE SÉCURITÉ

LIRE ET CONSERVER CES INSTRUCTIONS Cet équipement ne doit être utilisé qu'après avoir lu les instructions.



Ne pas utiliser à proximité de matériaux combustibles ou explosifs. Un incendie peut se produire.



Ne pas exposer à l'eau ou à la pluie. Un choc électrique peut se produire.



Connecter uniquement à une prise mise à la terre.



Débranchez l'alimentation pour le nettoyage et l'entretien.



Débranchez le cordon d'alimentation avant de vous déplacer.



Veillez à ne pas renverser l'appareil lorsque vous le déplacez, car cela pourrait causer des blessures.



Ne pas utiliser si le cordon ou la prise est endommagé. Contactez un centre de service agréé pour examen et/ou réparation.



Disposez le cordon loin des zones de circulation et où il n'y a pas de risque de trébuchement. Ne pas recouvrir de tapis ou de moquette.



Lumière ultraviolette à haute intensité à l'intérieur. Éviter l'exposition des yeux et de la peau.



CONFORMS TO UL STD 507 CERTIFIED TO CAN/CSA STD C22.2 NO. 113-M1984

EPA Est. No: 103241-WA-1

#### **Product Description**

The OmniClean OCA500, OCA1200, and OCA1500 Professional Series air sanitizing machines are equipped with medical grade 99.99% HEPA filters and optional SureUVCTM UV-C germicidal lights, which work together to eliminate sub-micron particulates and microbial contamination for healthcare services, dentist offices, personal care facilities, and other work environments.

The OCA500, OCA1200, and OCA1500 are designed to purify air in public and professional environments and are not suitable for abatement or restoration projects. They all feature variable air flow, quiet operation, upright housings for a small footprint, and locking medical grade casters for easy mobility.

#### **Receiving & Unpacking Instructions**

Carefully remove unit from packaging. Remove Quick-Start Guide for assistance in setting up the machine for operations. Visually inspect the unit for damage.

If there is any visible damage or missing parts, please contact OmniClean immediately.

#### OCA 500/1200/1500 Specifications

Machine	OCA500 / OCA510	OCA1200 / OCA1210	OCA1500 / OCA1510	
Dimensions	14" x 14.5" x 36"	16.25" x 20.5" x 50"	20" x 18" x 48"	
MIN CFM	100	655	800	
MAX CFM	450	1200	1500	
CADR**	450.0 CFM	1199.9 CFM	1499.9 CFM	
Sound level	45-59dB	57-59dB	57-66dB	
UVC Bulb Spec	2 x 16W* (OCA510 only)	4 x 16W* (OCA1210 only)	4 x 16W* (OCA1510 only)	
Electrical input	120V/220V	120V/220V	120V/220V	
Power requirement	120 VAC / 60 Hz / 1.7A (1.7A OCA500 only)	120 VAC / 60 Hz / 7.1A	120 VAC / 60 Hz / 7.1A	
Weight	50 lbs./22.5kg	110 lbs./50kg	110 lbs./50kg	
HEPA Dimensions	12" x 12" x 12"	16" x 16" x 12"	16" x 16" x 12"	
PreFilter dimensions	12" x 12" x 2"	16" x 16" x 2"	16" x 16" x 2"	
Warranty	2 years	2 years	2 years	



## **Accessories & Filters**

Gold Care Membership*	GCM-1	GCM-1	OCA1500 / OCA1510
UVC bulbs, Pack of 2 or 4	SureUVC-2pk (OCA510)	SureUVC-4pk (OCA1210)	SureUVC-4pk (OCA1510)
HEPA filter	HEPA-500H	HEPA-1200H	HEPA-1500H
PreFilter, Pack of 4	M11PF-500-4pk	M11PF-1200-4pk	M10PF-1500-4pk

\* Gold Care Membership renewed annually; per machine, delivering over \$1000 in value each year. Benefits include once per year FREE shipment of replacement filters and UV-C light bulbs for that machine, extended warranty for as long as Gold Care Membership is maintained, free loaner units whenever a machine needs to be returned to us for in-warranty repair, discounts on future product purchases and more.

For more information, see www.omnicleanair.com/Gold-Care-Membership.

\*\* We fully seal our HEPA and properly match it to motor design. This means our CADR effectively matches CFM. Beware of products with significantly lower CFM or unpublished specs, they may underperform.

## **Display and Monitoring Panel**

User interface with UVGI (OCA510, OCA1210, OCA1510)



User interface without UVGI (OCA500, OCA1200, OCA1500)





# Quick Start Guide OCA500/1200/1500 | Air Purification Machines

#### WARNING SAFETY WARNING INSTRUCTIONS

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Disconnect power cord before moving.



Be careful not to tip the unit when moving, as this may cause injury.



Do not operate if cord or plug is damaged. Contact an authorized service facility for examination and/ or repair.



Arrange cord away from traffic areas and where it is not a tripping hazard. Do not cover with rug or carpet.



High-intensity ultraviolet light inside. Avoid eye and skin exposure.

## **First Time Setup**

- Carefully remove OCA unit from packaging. Inspect for damage and make sure that the HEPA filter is installed correctly.
- Place the OCA unit in a suitable and effective spot. The Placement Guides on our website can assist you in finding the right location for your space.
- Plug OCA unit into appropriate power source (see manual for more information). The power button will flash white.
- Press power button. The unit will perform an internal safety/maintenance check. If there are any safety or maintenance issues, one or more of the HEPA, UVGI or PreFilter indicators will turn red and the housing light for that area will flash blue. If this occurs, consult the Operations and Maintenance Manual.



You will then access the **Enter Guided Setup** (See Fig. 1) screen. Press OK to enter room size and room ID information, or select **Do this later** to bypass setup. (Note: if the Guided Setup is not completed, machine cannot display Air Changes per Hour).

**Enter Units** (*See Fig. 2*) prompts to select either US Standard (ft., in.) or Metric (M,cm ). You can also enter "Go Back" to return to the previous menu.

**Enter Room Size** (See Fig. 3) lets you either enter the dimensions of the room the unit will be in, the volume of the room (if known), or select **I Don't Know**. I Don't Know sets the unit at its highest output.

If DIMENSIONS or VOLUME is chosen, use the UP/ DOWN (*See Fig. 4*) arrows to increase or decrease the highlighted dimension or room size. Press OK to enter and when complete.

**Enter Room ID** (See Fig. 5) allows you to assign a 3 digit alpha-numeric code to the space the unit is located in. This is helpful if you plan to move it frequently. Use the UP/DOWN arrows to change; OK to select.

The display will then read Guided Setup is complete, and the machine will enter operational mode. The display will show Cubic Feet per Minute (CFM) or Cubic Meters per Minute (CMM). This can be adjusted using the UP/DOWN arrows. (See Fig. 6)

Press OK to return to the Main Menu. Select Activate Safety Lock (See Fig. 7), then press OK again to lock the current settings. This will prevent tampering. Press OK twice again to unlock and adjust settings.

In addition to the above, from the **Main Menu** there is also an option for **Passcode Setup** (*See Fig. 8*). This feature is reserved for administrators or authorized users to provide additional security. Contact your administrator for more information.

Welcome! PREFILTER Enter Guided Setup UVGI OK Do this later HEPA Setup Menu PREFILTER Enter Units UVGI 0K Enter Room Si: Enter Room ID Size HEPA Enter Room Size PREFILTER Dimensions UVGI OK Volume I don't know HEPA Enter Room Dimensions PREFILTER Length: 3ft Width: 21ft UVGI HEPA Height: Oft PREFILTER Enter Room ID: UVGI OK 820 HEPA PREFILTER CFM ACH UVGI 0K 500 22 HEPA PREFILTER CFM ACH UVGI OK 500 ??? HEPA Ģ Main Menu PREFILTER Passcode Setup UVGI OK Machine Status Enter Setup Mode HEPA

In addition to the CFM/CMM reading, this menu also shows you the current number of Air Changes per Hour (ACH), based on your fan settings and the room size you have entered. For instance, if you had a 2500 cubic foot room and your fan was set at 500cfm, your ACH would be 12 (60 minutes divided by 2500/500). The example above shows an **ACH** of "**???**"; this would be the reading if you skipped the Guided Setup or entered "I Don't Know" in the Enter Room Size menu.

# ComniClean Operation & Maintenance Manual

# OCA 500/1200/1500 Family

Air Purification Machines



## **First Time Setup**

Plug OCA unit into appropriate power source. The power button will flash white.

Press power button. The unit will perform an internal safety/maintenance check. If there are any safety or maintenance issues, one or more of the HEPA, UVGI or PREFILTER indicators will turn red and the housing light for that area will flash blue. If this occurs, consult the Troubleshooting section of this manual.

You will then access the **Enter Guided Setup** screen. Press OK to enter room size and room ID information, or select **Do this later** to bypass setup. (Note: if the Guided Setup is not completed, machine cannot display Air Changes per Hour).

**Enter Units** prompts to select either US Standard (ft., in.) or Metric (M,cm). You can also enter "Go Back" to return to the previous menu.

**Enter Room Size** lets you either enter the dimensions of the room the unit will be in, the volume of the room (if known), or select **I Don't Know**. I Don't Know sets the unit at its highest output.

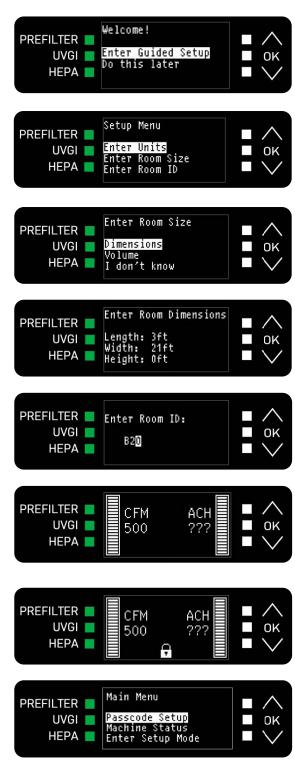
If DIMENSIONS or VOLUME is chosen, use the UP/DOWN arrows to increase or decrease the highlighted dimension or room size. Press OK to enter and when complete.

**Enter Room ID** allows you to assign a 3 digit alphanumeric code to the space the unit is located in. This is helpful if you plan to move it frequently. Use the UP/ DOWN arrows to change; OK to select.

The unit will then go into operational mode. The display will show Cubic Feet per Minute (CFM) or Cubic Meters per Minute (CMM). This can be adjusted using the UP/DOWN arrows.

Press OK to return to the Main Menu. Select **Activate Safety Lock**, then press OK again to lock the current settings. This will prevent tampering. Press OK twice again to unlock and adjust settings.

In addition to the above, from the **Main Menu** there is also an option for **Passcode Setup**. This feature is reserved for administrators or authorized users to provide additional security. Contact your administrator for more information.



In addition to the CFM/CMM reading, this menu also shows you the current number of Air Changes per Hour (ACH), based on your fan settings and the room size you have entered. For instance, if you had a 2500 cubic foot room and your fan was set at 500cfm, your ACH would be 12 (60 minutes divided by 2500/500). The example above shows an ACH of ???; this would be the reading if you skipped the Guided Setup or entered "I Don't Know" in the Enter Room Size menu.

## **Normal Operations**

Now that Guided Setup has been completed, your unit will return to those settings each time it is turned on. To change these settings, press OK and toggle to Enter Setup Mode. Make desired changes and select Go Back to return to normal operating status.

The machine must be operated with a HEPA and pleated PreFilter in place.

#### **Machine Information Check**

Information about your OCA machine can be reached from the Main Menu by pressing OK; then using the UP/DOWN arrows and selecting Show Machine Info. The display will show Model Number, Serial Number, Software Revision and Date of Manufacture. Press OK to return, then UP/DOWN to Go Back to Main Menu.



#### **HEPA Filtration**

The HEPA filter purifies the air and will gradually become loaded with sub-micron particulates. Even when the HEPA filter is fully loaded, the filter is still removing particulates from the air at the rated efficiency, yet at a reduced airflow. This will affect the ability of the machine to provide positive or negative pressure within the containment. We recommend changing the HEPA filter after no more than 365 days of operation.

#### SureUVC<sup>™</sup> Germicidal Lights

UVGI lights are installed in the compartment below the HEPA filter. The air passing by the UVGI lights is sterilized and the bio-contaminants captured on the HEPA are killed or deactivated. To maintain the full effectiveness of the UV Germicidal we recommend replacing the lights after 365 days of operation.

#### PreFilter

Near the bottom of the machine and right above the air intake grate is an access door for the pleated PreFilter. The PreFilter is rated Minimum Efficiency Reporting Value (MERV) 11, and is designed to remove dust, pollen, mold spores and other small particles from the air before it passes through the HEPA filter. This will significantly extend the usable lifetime of the HEPA filter, which is much more costly to replace. We recommend changing the PreFilter after no more than 90 days of operation.

#### **Machine Status**

You can check the status of the unit at any time from the Main Menu by pressing OK; then using the UP/ DOWN arrows and selecting Machine Status. This will show the number of days the unit has been in operation, as well as the number of days of use for

PREFILTER UVGI HEPA	Run Meters (Days): UNIT: 372 HEPA: 372 <mark>REPLACE</mark> UV: 144 PreF: 10 Press OK to return	■ ∧ ■ ок ■ ∨
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the HEPA filter, UV lamps and PreFilter. The HEPA filter and UV bulbs each have a usage life span of 365 days before replacement is required; the PreFilter has a 90 day life span. The example shows that the HEPA filter has been in use for 372 days, and therefore should be replaced.

## **Maintenance and Troubleshootin**

#### **Machine Status**

The OCA Series machines continuously monitor the UVGI, HEPA and PreFilter systems for failures, errors and scheduled replacement times. If any of these systems require attention, the Display screen will show a "Check Status" advisory and "Warning"



triangle symbol. At the same time, the panel status indicator LEDs and the lights in the corresponding areas on the front casing will alert the user and describe the issue. The table below lists the errors in order of their priority. If more than one error occurs simultaneously, the display will show the higher priority error first; then move on to the next when the first one is resolved.

#### **Troubleshooting Error and Status Table**

Priority	HEPA	UV	PreFilter	HEPA	UV	PreFilter
1 Error: HEPA Install Error	Red 📕	On 📕	On 📕	Flash 🗖	Off	Off
2 Error: HEPA Filter Change	Red 📕	On 🔳	On 🔳	Flash 🗖	On 🗖	On 🗖
3 Error: UV Door Open	On 🗖	Red 📕	On 🔳	Off	Flash 🗖	Off
4 Error: UV Bulb Burned Out	On 📕	Red 📕	On 📕	On 🗖	Flash 🗖	On 🗖
5 Error: UV Bulb Change	On 📕	Red 📕	On 📕	On 🗖	Flash 🗖	On 🗖
6 Error: PreFilter Install Error	On 🗖	On 🗖	Red 📕	On 🗖	On 🗖	Flash 🔳
7 Error: PreFilter Change	On 📕	On 📕	Red 📕	On 🗖	On 🗖	Flash 🗖

#### **HEPA Filter Installation/Replacement**

To replace the HEPA filter, unplug the machine and remove the top grill. You will see 4 filter tabs holding the HEPA filter in place. These tabs are secured with 1/4-20 Nylock nuts, which require a 7/16" wrench or socket. **WARNING: Unplug the unit before opening filter compartment.** Remove all 4 filter tab retaining nuts and remove the filter tabs and set aside. Lift HEPA filter out. Replace with new HEPA filter and replace the filter tabs. Be sure to tighten the locknuts securely to ensure a tight seal with the filter gasket. ALWAYS TREAT THE USED HEPA FILTER AS HAZMAT AND PROCESS IT ACCORDING TO YOUR ESTABLISHED HAZMAT PROCEDURES.

#### **Replacing UV Germicidal lights**

If the UVGI indicator light turns red, you will need to access the lights to replace the bulbs. We recommend changing all bulbs simultaneously. **WARNING – Skin or eye damage may result from directly viewing the light produced by the lamp in this apparatus. Always disconnect power before relamping or servicing. Replace the lamp with Lamp Model TUV 16W 4P-SE, Manufactured by Philips.** 

For the OCA1210 and OCA1510, remove the 2 screws on each side of the SureUVC<sup>™</sup> compartment and gently slide the drawer forward to access the bulbs. The lights are each held in with (2) clips; gently pull the light out of the two U-clips, then disconnect the 4-pin connector. Replace the 4 bulbs and return the drawer to its original position. Reinstall the light compartment door.

For the OCA510, remove follow the above directions to remove the HEPA filter. With the HEPA filter out of the unit, you will have access to the SureUVC<sup>™</sup> compartment. The lights are each held in with (2) clips; gently pull the light out of the two U-clips, then disconnect the 4-pin connector. Replace the 2 bulbs, and replace the HEPA and top grill per the instructions above.

Plug in and turn the unit back on; if the UVGI indicator is still red, the problem could be one or more of the ballasts. Call OmniClean Technical Support for additional assistance.

#### **PreFilter Replacement**

The pleated filter should be changed when it becomes loaded with dust. To change the filter, turn off the machine, remove the 2 screws on each side of the PreFilter compartment and remove the compartment cover. Remove the dirty filter and replace; then reinstall the cover.

#### **Resetting the Machine Status**

After completing the above required maintenance, you will need to reset the Machine Status for the affected item. From the Main Menu press OK; then use the UP/DOWN arrows to select the Maintenance Menu. Scroll to the desired reset and press OK. This will turn the status back to day 0 for that item. The sample screen shows resetting the UV Bulb age.

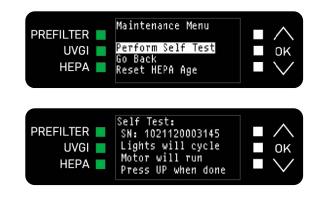
DO NOT reset other fields; only the one you have performed maintenance/replacement on.



#### System Self-Test

You can confirm that all of your indicator lights are performing correctly by performing a system selftest. To access the self-test, press OK to enter the main menu.

The self-test alternates illuminating the Status Indicator LEDS in green and red, while simultaneously flashing the Front Casing Lights.



#### **Additional Troubleshooting**

#### 1. The machine does not start

- a. Check that the unit is plugged in and there is sufficient power available.
- b. Check the power button, which should glow white.
- c. Check all error indicators and confirm that all functions are operating correctly.
- d. Contact OmniClean Technical Support to troubleshoot further.

#### 2. The machine just hums when turned on

- a. Unplug the unit.
- b. Contact OmniClean Technical Support for further information.

#### 3. The machine vibrates excessively when running

- a. Unplug the unit
- b. Contact OmniClean Technical Support for further information.

# **OmniClean Limited Warranty Policy**

#### This warranty policy covers Air Purification Systems sold by OmniClean.

OmniClean warrants that our products are free from defects in workmanship and materials under normal use during the warranty period

All OmniClean Air Sanitizing machines, excluding the consumables including the MERV prefilter, HEPA filter and UV light bulbs, come with a standard two (2) year warranty.

#### The warranty extends to the following parties:

- Customers (individuals or companies) to whom OmniClean directly sells covered products.
- Customers (both individuals and companies) who purchase OmniClean products from an authorized distributor or reseller.

This limited warranty is not transferable or assignable to any subsequent purchaser, and only applicable in the country where the product was originally purchased.

#### The following circumstances are not covered by this warranty policy

- Damage caused by an act of nature such as flood, fire, wind, earthquake or lightning.
- Damage caused during shipping or an impact event with other objects.
- Damage caused by improper care or negligence.
- Damage caused by misuse, abuse, mishandling or misapplication.
- Damage caused by alteration or adjustments by unauthorized personnel.

Under no circumstances shall OmniClean or any supplier of OmniClean be liable for any loss, damage or expense, including, but not limited to, loss or damage arising out of the failure of the products to operate for any period of time, inconvenience, the use of rental or replacement equipment, loss of profits or other economic loss, or general, direct, special, indirect, incidental or consequential damages or property damages.

OmniClean offers extended warranty through the Gold Care Membership Program, for as long as membership status is maintained.

For more information, please visit www.omnicleanair.com/Gold-Care-Membership.

# **To Submit a Warranty Claim**

Contact our Technical Support department. Hours are Monday through Friday 7:30am - 4:00pm PST

Phone: 425-512-0379

Email: support@omnicleanair.com

For ease of service, please have the product model name and serial number available, along with the purchase date and invoice number, if applicable.

Our service technicians will work with you to diagnose your technical issue and recommend a suitable course of action to solve your problems swiftly and to your satisfaction.

If it is determined that your product is defective and under warranty, OmniClean will repair or replace, at our discretion, any faulty parts or equipment.

A Return Merchandise Authorization (RMA) will be issued for the defective product.

Upon receipt of the RMA, securely package the item being returned, in its original packing material if possible, and write the RMA number on the outside of the box. Include a copy of the RMA with the return.

Contact OmniClean for pickup of the defective product. Failure to return defective products in a timely manner may result in additional shipping charges.



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