

# COVID-19 GOOD PRACTICE GUIDE

for music stores / manufacturers and workshops / musicians



## STUDIO PA & COMPUTER MUSIC



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These recommendations are based on the current knowledge and are provided for the time needed to manage the COVID-19 pandemic.

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Always maintain a minimum distance of 1.50m from any other person.  
Wearing a mask is mandatory in public transportation and recommended when moving inside the shop or the workshop when several persons are present.



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ANY PA GEAR, MICROPHONES, MIXERS, OUTBOARD AND AMPLIFIERS, LOUDSPEAKERS, MONITORS, FLIGHT CASES AND AUDIO CABLES.

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# GENERAL PRINCIPLES

**IMPORTANT REMINDER:** This disinfection recommendation guidance must only be followed if you believe you have been in contact with the virus. We recommend, however, that you pay special attention to the different lacquers and parts of the instrument, and ideally contact your manufacturer.

When trying an instrument in a store or workshop, should the musician washes / disinfects their hands correctly, wears a face mask and washes / disinfects their hands once again after trying the instrument, the risks of virus transmission between the musician and the instrument will significantly be reduced.

These recommendations are based on the current knowledge and are provided for the time needed to manage the COVID-19 pandemic.

## 1/ PREAMBLE

Following are the situations when the instrument / accessory could be contaminated (these cases depend on whether you are a musician or work in a workshop or a music store):

- Purchase, rental
- Repair or maintenance
- Exhibition / trade show
- Bench trial in a workshop or a shop
- Loan, class, rehearsal or live performance
- Transportation
- Using / playing the instrument without prior hand washing / disinfecting
- If someone touches it or gets close to it (<2m and coughs or talks)

In any other case, disinfection is not necessary. Regular cleaning and maintenance of the instrument and its accessories remain the good practice, whether the virus is present or not.

## Good practice is common sense

- Prior to any disinfection, wash / disinfect your hands and clean every part of the instrument and accessories with a disinfected dry cloth<sup>1</sup>;
- Do not use any paper-based material such as paper towels which may scratch the lacquers and leave bits of lint on the surfaces
- If possible, quarantine the instrument and its accessories, for it will significantly help reduce the virus levels. The virus survival on the different surfaces depends on multiple parameters such as material, texture, humidity, presence of proteins and bio film. Preliminary data give a more accurate evaluation of the necessary quarantine duration according to the material. Please read Section 4 for further information about the quarantine.
- Before applying any of the products listed below on the entire instrument and its accessories, please try on a small part of it
- When multiple persons are playing or using an instrument and its accessories, encourage them to use at least a surgical face mask and wash / disinfect their hands.

*(1): Do not use the cloth multiple times without either disinfecting it with an effective product, or washing it at 60°C or higher for over 30 minutes. Otherwise, throw it away in an airtight container.*



# GENERAL PRINCIPLES

## 2/ DISINFECTANT PRODUCTS AND PROCESSES

The following products allow for disinfection which will significantly reduce the virus levels.

You will find in the second part of this document a list of products suited for the different parts of your instrument:

- Chlorate derivatives: bleach > 0.5%. The value represents the sodium hypochlorite concentration. It's usually available with a 2.6% concentration – or a 5 times maximum dilution – which means one dose of the 2.6% product for 4 doses of cold water.
- 70% Alcohol. Alcohol is a well-known virucidal agent. Here's a list of recommended alcohols:
  - Ethanol (the most common)
  - Isopropyl alcohol
  - Their concentration must be at least 70% (drugstores).
- NF EN 14476 standard compliant products (Sanytol®, Sani-Cloth®), in which hydrogen peroxide or quaternary ammoniums (didecyldimethylammonium chloride) are the most common active agents ; please strictly follow the instructions of use (e.g. contact time). These are often alcohol-free solutions.
- Soap. Certain soaps have proven effectiveness in deactivating the virus but only after 3 minutes of use. These are:
  - KLINTE DE® soap, diluted 10 times
  - Little Marcel Green Soap®, effective when diluted up to 10 times.

However, this effectiveness is not guaranteed for all soaps and application modes. Other products should therefore be preferred whenever possible. Most notably, soap cannot be applied on an instrument with a friction that is equivalent to that of the hands, nor with the same amount of water. It's probably not as efficient when only “applied” and wiped up.

### ⚠ Non-Validated Products

The following products have been tested against active SARS-CoV-2 but have not demonstrated sufficient efficiency as a disinfectant.

- 3% hydrogen peroxide (or 10 volumes).



# GENERAL PRINCIPLES

## Disinfection Processes

We can see, especially on the Internet, that UV- or ozone-based processes are used for disinfecting music instruments and other products. Extreme caution is required when using these methods to potential health risks, if they have not been certified by independent, scientific and professional organizations.

⚠ • Ultraviolet treatments can be efficient in certain contexts but they must be handled with extreme caution because they may be harmful to the skin and eyes and may form ozone, which is toxic. Moreover, these processes do not guarantee full efficiency, in particular when specific parts cannot be lit. It is important to take into account the UV-C light wave length (220 to 280nm), its power, distance and exposure duration. These treatments may also damage the lacquers, especially on string quartet instruments. In any case, the provider must present evidence of the effectiveness of such approach (in particular the time required to deactivate SARS-CoV-2).

⚠ • Ozone in gas phase may deactivate viruses, but at high concentrations only, which will be harmful to human beings. Its use requires very specific knowledge and skills. It is not particularly recommended to this day..

## 3/ CLOTHS AND CLEANSING WIPES

- Microfiber cloths that won't scratch the lacquers can be reused after being disinfected or washed (> 30 minutes, > 60°C, with a detergent product).
- Non-impregnated polishing cloths or wipes can be reused after disinfection or wash (> 30 minutes, > 60°C, with a detergent product).
- Pre-impregnated wipes, please ensure that these are NF EN 14476 standard compliant<sup>2</sup>, that they are not abrasive and follow their instructions of use. Please pay attention to the string quartet instrument lacquers and check compatibility, in particular when using alcohol products.
- Avoid any paper towels on the lacquers, but preferably use cotton cloths instead.

<sup>(2)</sup> NF EN 14476 standard means that the product inactivates 99.99% viruses (per 10,000 division) in the protocol provided by the manufacturer.

## 4/ QUARANTINE

Quarantine duration has not been clearly defined yet, because it depends on multiple factors (material of the surface to be decontaminated, room ventilation, humidity, temperature, and more).

Several results have emerged. Most notably, the common 3-day duration is in no way the generic rule. The instrument or accessory material must be taken into account. The list below describes the materials for which the viral load is sufficiently reduced. These results follow from trials carried out by a French Institute using SARS-CoV-2, for the purposes of the PIC Project (Protocoles pour les Instruments face au Coronavirus / Procedures against Coronavirus for Music Instruments). This is the second part of the PIC Project, the first one being the writing of these guidebooks.

# GENERAL PRINCIPLES

## **Materials on which the virus has been sufficiently deactivated (disinfection) after 3 days**

Silver  
Nickel  
Nickel Silver  
Gold Plating  
ABS Plastic  
Polyurethane Varnish  
Nitrocellulose Varnish

## **Materials on which the virus is still active in significant amounts after 3 days,** (quarantine during at least 6 days as a precaution)

Ebonite  
Brass  
Oil-Based Varnish  
Alcohol-Based Varnish  
Epoxy Resin-Based Varnish

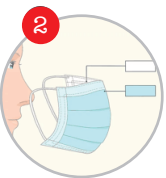
## 5/ FACE MASK USE

- Wearing a face mask is mandatory when being near other persons.
- Strictly follow the protocol to wear your mask:

### How do I put my surgical face mask on?



Wash your hands



Flip your mask to the right side (stiff edge is the top, white side towards your face)



Tie the top ties of your face mask



Pinch the stiff edge to adjust it to the shape of your nose



Tie the bottom ties of your face mask



To remove it, only touch the ties



Throw the face mask away and wash your hands

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## **PA & RECORDING GEAR**

**ANY PA GEAR,  
MICROPHONES, MIXERS, OUTBOARD AND AMPLIFIERS,  
LOUDSPEAKERS, MONITORS, FLIGHT CASES AND AUDIO CABLES.**

During a live performance or even in studio, equipment disinfection can quickly become a major logistic issue. You may have to deal with hundreds of feet – even miles! – of cables, dozens of microphones, quite moisture sensitive electronic devices. This equipment, mainly made of alloys, aluminum and plastic, generally remains sensitive to some aqueous chemical compositions.

Being able to set a quick, simple, efficient and affordable disinfecting solution is the main constraint. In any case, sprayable, non staining and faint odour solutions are to be preferred.

Ease of use and compatibility with the variety of devices to be cleaned are the main factors to be considered when choosing the right disinfecting product.



When disinfection is carried out on electrical / electronic equipment,  
it is mandatory to proceed when the devices are disconnected and turned off.



# PA & RECORDING GEAR

## 1/ MICROPHONES

When microphones are used by singers, windscreens which can be disinfected after each use are to be preferred.



The microphone must be disconnected and the phantom power disabled.

Once again, always test the selected compatible product on a small part of the device in order to check the result before applying it to the whole equipment.

### Process

1. Wash / disinfect your hands.
2. Spray the product directly onto the whole surface of the microphone. Caution: no not spray onto ribbon or condenser studio microphones. In this case, moisten a cloth with the disinfecting product and rub the whole surface of the microphone.
3. Wipe off any excess product.
4. Place the microphone in its pouch, carrying bag or case and make sure it's not humid anymore (which could cause condensation of the diaphragm once in its closed pouch).

Products / Disinfection Processes	Capsule Dynamic Microphone	Capsule Condenser Microphone	Microphone Body
<b>Chlorate derivatives coming from bleach &gt; 0.5%</b>	To be tested	To be tested	To be tested
<b>70% or higher Alcohol</b>	Yes	Yes	Yes
<b>14476 standard compliant products (Sanytol®, Sani-Cloth®, etc.)</b>	Yes, some leave greasy residue	Yes, some leave greasy residue	Yes, some leave greasy residue
<b>UV-C</b>	To be tested		





# PA & RECORDING GEAR

## 2/ MIXERS

Mixers, and specially all analog ones, are difficult to disinfect. Therefore, it's recommended to use a sprayable cleansing product.



Disinfection must be carried out on a disconnected and turned off device.

### Process

1. Wash / disinfect your hands.
2. Spray the product on to the whole surface of the mixer and around the connectors.
3. Use a moistened cloth or paper towel to remove the excess product around the knobs, buttons and specially the display.
4. Let it air dry before placing it back again into its flight case or travel bag.
5. Do not reuse the cloth after disinfecting the equipment (sanitize, wash or throw it away).

Products / Disinfection Processes	Buttons, Knobs, Plastic items	Touchscreen	Chassis, Metal parts
<b>Chlorate derivatives coming from bleach &gt; 0.5%</b>	To be tested	To be tested	To be tested
<b>70% or higher Alcohol</b>	Yes, can take the paint out	Please avoid	Yes, can take the paint out
<b>14476 standard compliant products (Sanytol®, Sani-Cloth®, etc.)</b>	Yes, some leave greasy residue	Yes, some leave greasy residue	Yes, some leave greasy residue
<b>UV-C</b>	To be tested		



# PA & RECORDING GEAR

## 3/ OUTBOARD AND AMPLIFIERS

All these devices can have numerous buttons, knobs, connectors and displays.



Disinfection must be carried out on a disconnected and turned off device.

### Process

1. Wash / disinfect your hands.
2. Spray the product onto the front and rear panels of the devices.
3. Use a moistened cloth or paper towel to remove the excess product around the knobs, buttons and specially the displays.
4. Let it air dry before placing it back again into its flight case or travel bag.
5. Do not reuse the cloth after disinfecting the equipment (sanitize, wash or throw it away).

Products / Disinfection Processes	Plastic Parts	Displays	Metal parts Connectors
<b>Chlorate derivatives coming from bleach &gt; 0.5%</b>	To be tested	To be tested	To be tested
<b>70% or higher Alcohol</b>	Yes, can take the paint out	Please avoid	Yes, can take the paint out
<b>14476 standard compliant products (Sanytol®, Sani-Cloth®, etc.)</b>	Yes, some leave greasy residue	Yes, some leave greasy residue	Yes, some leave greasy residue
<b>UV-C</b>	To be tested		



# PA & RECORDING GEAR

## 4/ LOUDSPEAKERS/MONITORS

Loudspeakers and monitors are made of lacquered and painted wood (birch plywood) or moulded plastic. They also feature metal parts (speaker grills, handles, connectors).



Disinfection must be carried out on a disconnected and turned off device.

### Process

1. Wash / disinfect your hands.
2. Spray the product directly onto the whole surface of the loudspeaker / monitor.
3. Use a cloth or paper towel to wipe off any excess product.
4. Let it air dry before placing it back again into its flight case or travel bag.
5. Do not reuse the cloth after disinfecting the equipment (sanitize, wash or throw it away).

Products / Disinfection Processes	Wood	Moulded Plastic	Metal parts
<b>Chlorate derivatives coming from bleach &gt; 0.5%</b>	To be tested	To be tested	To be tested
<b>70% or higher Alcohol</b>	Yes, can slightly bleach	Yes, can slightly bleach	Yes, according to the production quality
<b>14476 standard compliant products (Sanytol®, Sani-Cloth®, etc.)</b>	Yes, some leave greasy residue	Yes, some leave greasy residue	Yes, some leave greasy residue
<b>UV-C</b>	To be tested		



# PA & RECORDING GEAR

## 5/ FLIGHT CASES

Flightcases can be made of wood (multi-layer plywood), polycarbonate, Poly(methylmethacrylate) (PMMA or acrylic), ABS or composite mainly. They are completed with aluminum bracing as well as fasteners and handles (usually made of metal alloys).

### Process

1. Wash / disinfect your hands.
2. Spray the product directly onto the whole surface of the flight case.
3. Use a cloth or paper towel to wipe off any excess product.
4. Let air dry before closing.
5. Do not reuse the cloth after disinfecting the equipment (sanitize, wash or throw it away).

Products / Disinfection Processes	Wood	ABS	Metal parts Fasteners, handles...
<b>Chlorate derivatives coming from bleach &gt; 0.5%</b>	To be tested	To be tested	To be tested
<b>70% or higher Alcohol</b>	Yes, can bleach and damage the lacquer according to the production quality	Yes, can slightly bleach	Yes
<b>14476 standard compliant products (Sanytol®, Sani-Cloth®, etc.)</b>	Yes, some leave greasy residue	Yes, some leave greasy residue	Yes, some leave greasy residue
<b>UV-C</b>	To be tested		



# PA & RECORDING GEAR

## 6/ CABLES

With hundreds of feet – sometimes even miles of cables – cleaning each inch of these audio accessories (XLR, Jack, SpeakOn, and more) is hardly feasible.

Cables which are temporarily placed on the floor, directly used by musicians during performances or nearby, can be wiped with a cloth moistened with disinfecting product or disinfecting wipes when winding.

### Process

1. Wash / disinfect your hands.
2. Wind the cable, ready to be put away.
3. Spray the product directly onto the wound cable. Avoid spraying the connector (may cause moisture and condensation inside the plugs).
4. Place the cable in a previously disinfected flightcase or in its storage space.
5. Do not reuse the cloth after disinfecting the equipment (sanitize, wash or throw it away).

Products / Disinfection Processes	Cable	Metal plugs	Plastic plugs
<b>Chlorate derivatives coming from bleach &gt; 0.5%</b>	To be tested	To be tested	To be tested
<b>70% or higher Alcohol</b>	Yes	Yes	Yes
<b>14476 standard compliant products (Sanytol®, Sani-Cloth®, etc.)</b>	Yes, some leave greasy residue	Yes, some leave greasy residue	Yes, some leave greasy residue
<b>UV-C</b>	To be tested		



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