

Air Sampling User Manual



LUNGFISH



About Lungfish

Lungfish is a research collaborative that uses environmental sampling to monitor pathogens in communities. By analyzing genetic material from air and water, we can detect what is circulating before outbreaks are visible through clinical testing.

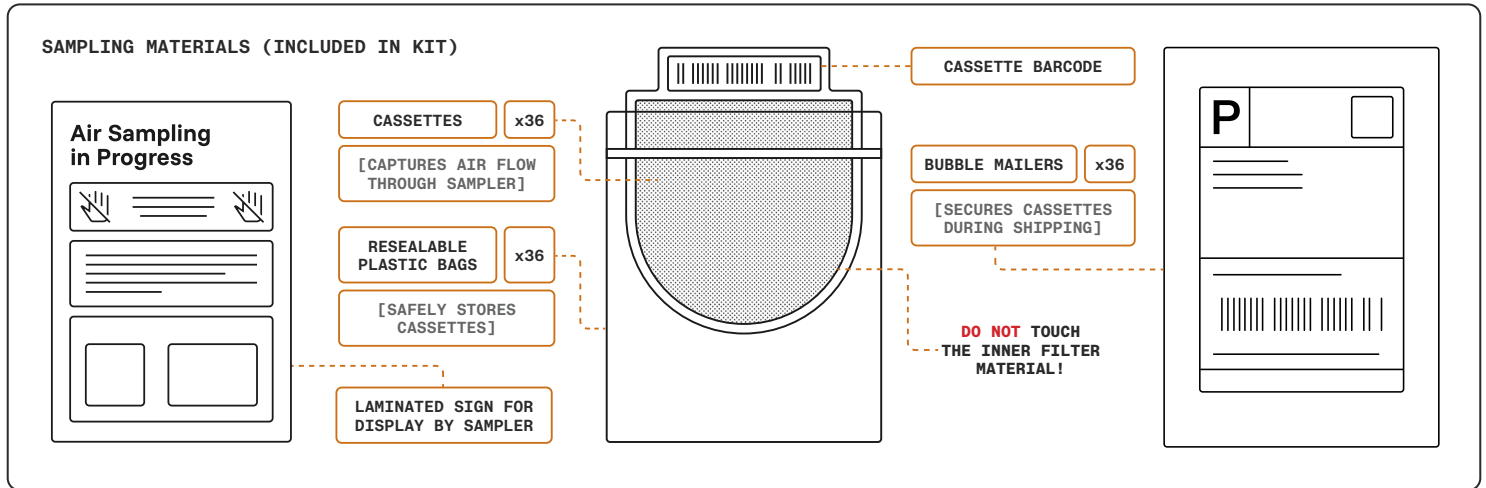
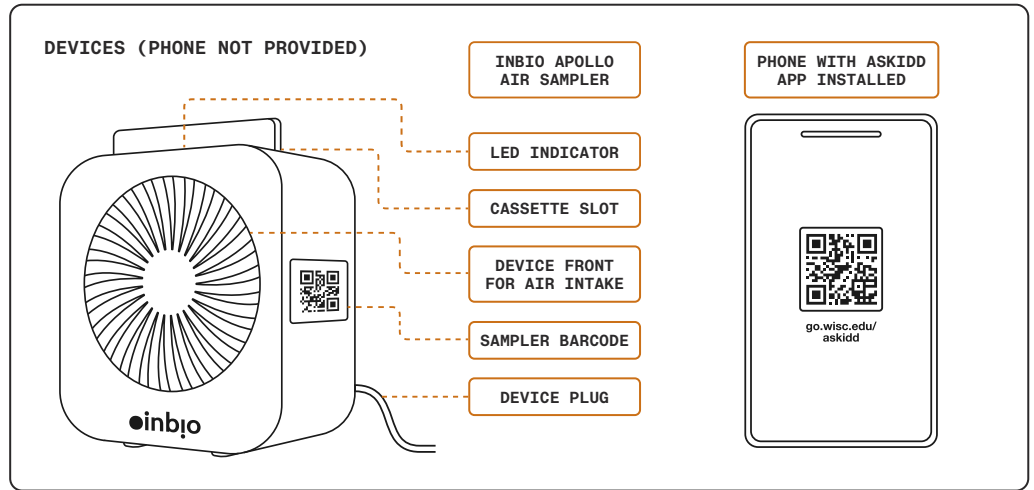
Why air sampling?

Respiratory viruses spread through shared air, often before symptoms appear. Air sampling provides a near real-time, privacy-preserving view of what is present in indoor environments, helping organizations understand risks and act proactively, all without disrupting daily activities.

We monitor change to generate insights that inform action.

Kit Overview

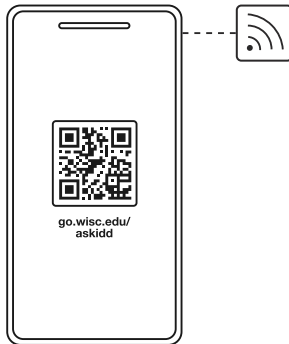
The InBio Apollo Air Sampler comes with an adapter. The sampling materials come pre-packed in sampling sets. One sampling set contains a Cassette inside a resealable plastic bag, inside a mailer, and covers a complete sampling session, from collection to return shipping.





Download our app

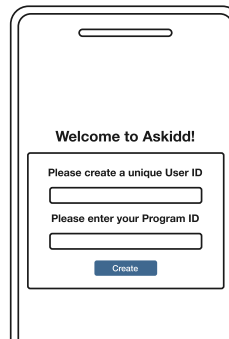
01



DOWNLOAD THE ASKIDD APP

Download the Askidd app to your smartphone or tablet by scanning the QR code above or visiting <http://go.wisc.edu/askidd>. Make sure your device has an internet connection (Wi-Fi or mobile data).

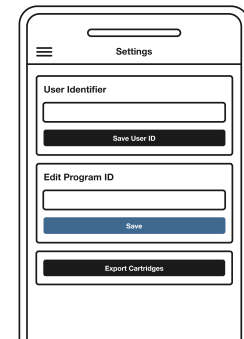
02



LOG INTO THE APP

Your site's User ID and Program ID were sent to you by email. Enter these details in the Askidd app and click create to log in. If you cannot find your login information, contact Lungfish support at info@lung.fish.

03



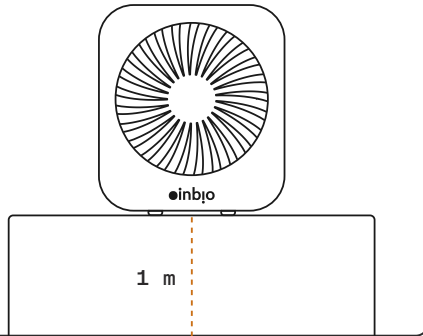
UPDATE PROGRAM ID

If sampling at a new site with a different Program ID, update it by opening the menu in the upper left corner, going to Settings, entering the new site's Program ID in the "Edit Program ID" field, and tapping SAVE.



Setting up your InBio Apollo Air Sampler

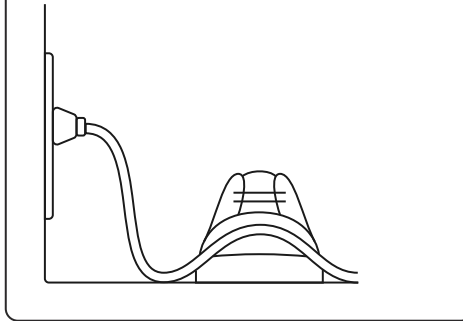
01



CHOOSE LOCATION

Place the Sampler on a flat, stable surface approximately one meter (3 ft.) off the ground with easy access to a power outlet.

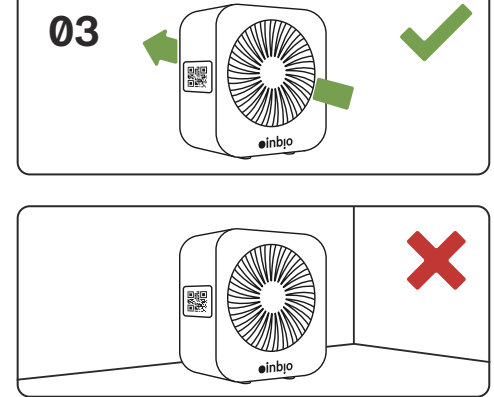
02



SECURE CORD

Make sure the cord is secure and cannot be pulled or tripped over.

03



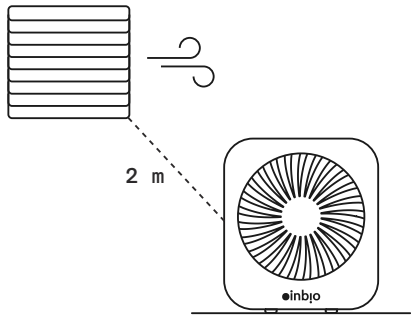
POSITION AIR SAMPLER

The front of the Sampler is the air intake. It should face the room or area you want to monitor. Make sure airflow is not blocked. Do not place the Sampler against a wall or in a corner.



Setting up your InBio Apollo Air Sampler

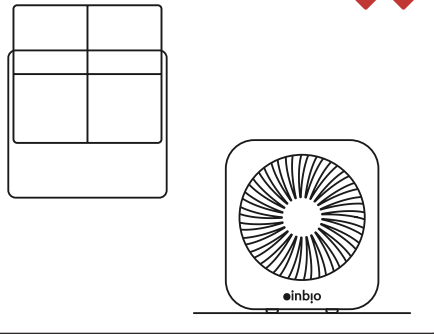
04



SAMPLER LOCATION

Keep the Sampler two meters (6 ft.) away from heating or air conditioning vents.

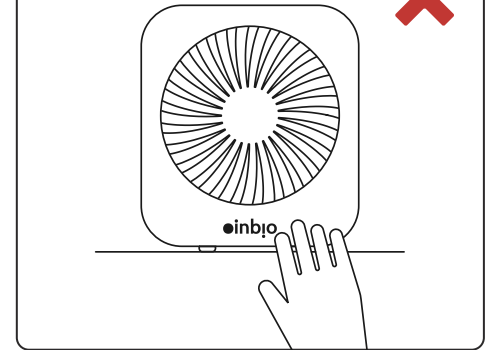
05



SAMPLER LOCATION

Do NOT place the Sampler in a room with open windows. If windows cannot be closed, place the Sampler as far away from them as possible.

06



SAMPLER SAFETY

Keep the Sampler out of reach of children and animals.



Starting a sampling session

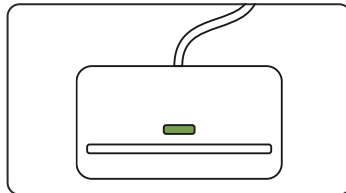
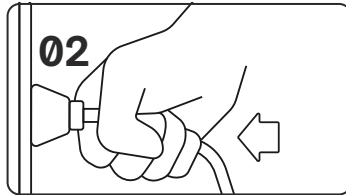
01



LOG INTO THE APP

Have your phone or tablet with you, connected to the internet and logged into the Askidd app.

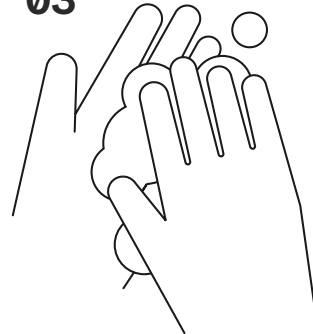
02



POSITION SAMPLER

Confirm the Sampler is properly positioned, then plug it into a power outlet. The LED light on top confirms the Sampler is running.

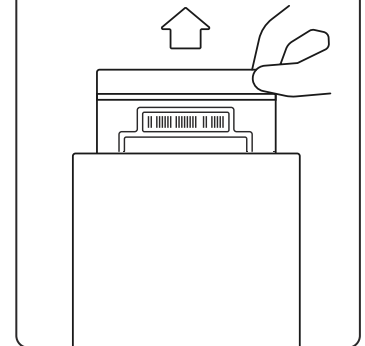
03



WASH HANDS

Wash your hands before handling sampling materials.

04



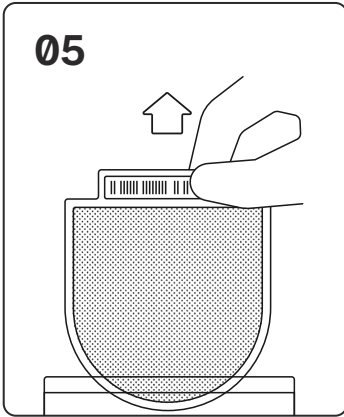
UNPACK SAMPLING SET

Grab one unused mailer from the kit, open it and take out the plastic bag inside.



Starting a sampling session

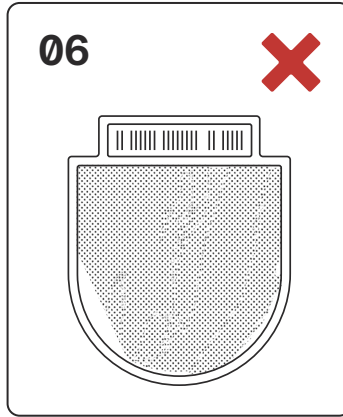
05



RETRIEVE CASSETTE

Take the new Cassette out of the plastic bag. Hold the Cassette only by its outer frame. **Do not touch the inner filter.**

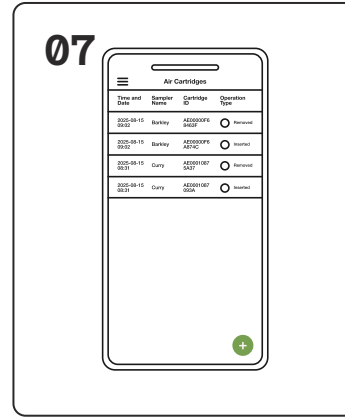
06



INSPECT CASSETTE

Visually inspect the Cassette. Do not use it if it appears damaged or contaminated. Instead, use a new Cassette.

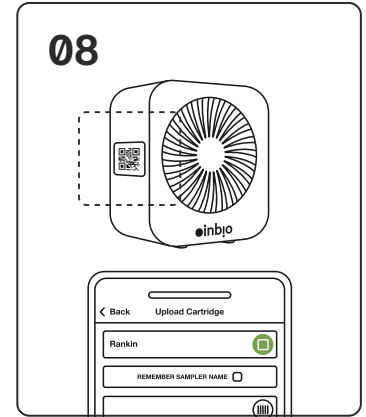
07



LOG SESSION

Open the Askidd app and tap “+” in the lower right corner to log a new sampling session. Allow the app to access your camera and location.

08



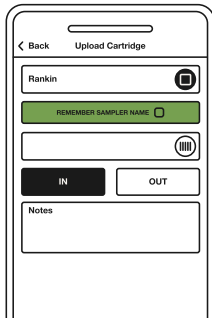
SCAN SAMPLER

Tap the barcode button in the first field and scan the Sampler barcode using your camera.



Starting a sampling session

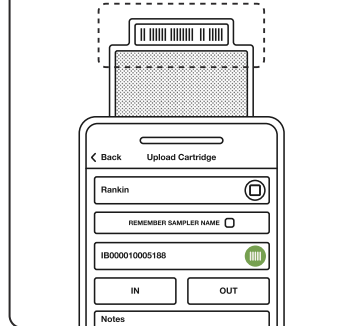
09



NAME SAMPLER

Scanning will automatically fill in the Sampler's name. If you always use the same Sampler, select 'Remember Sampler name'.

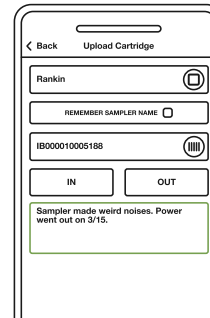
10



SCAN CASSETTE

Tap the barcode button in the second field and scan the Cassette barcode.

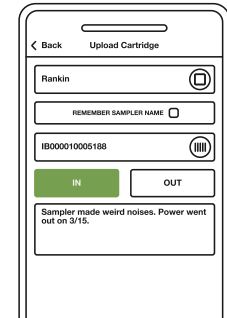
11



RECORD OBSERVATIONS

In the notes field, record anything noteworthy. Additional details about the sampling space may optionally be entered in the 'Advanced Options' section.

12



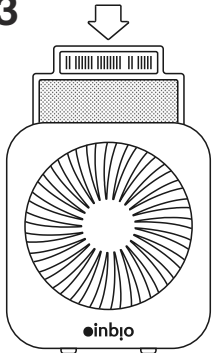
SAVE LOG

Tap IN, then tap SAVE.



Starting a sampling session

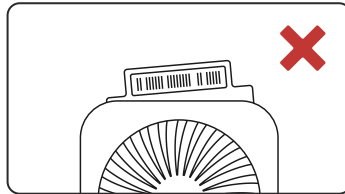
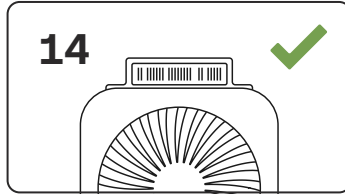
13



INSERT CASSETTE

Insert the Cassette into the slot at the top of the Sampler. Slide it in with the curved end facing down. If needed, gently push on the Cassette's plastic corners to help it in.

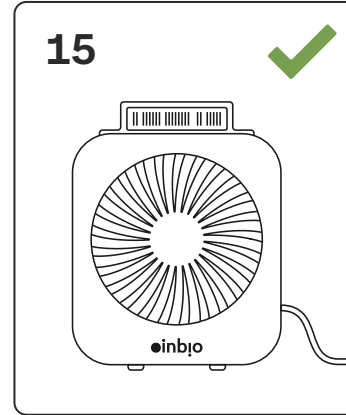
14



CHECK CASSETTE

Check that the Cassette is fully inserted and does not stick out.

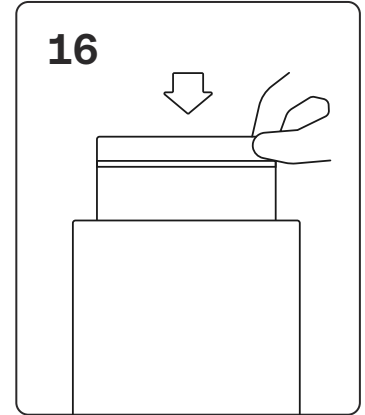
15



RUN SAMPLER

Leave the Sampler on and running the entire time you are sampling. The sampler **MUST NOT** be turned off at any part of the process.

16



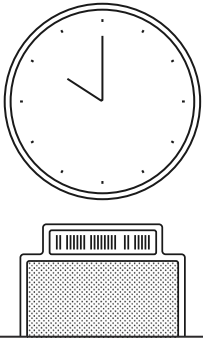
STORE MATERIALS

After inserting the Cassette, return the plastic bag and mailer to the kit box. These will be re-used later for shipping back the Cassette.



Ending a sampling session

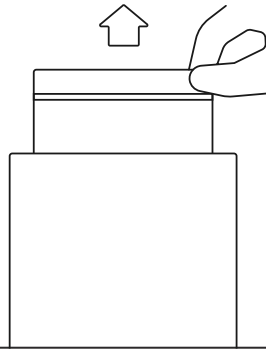
01



REPLACE CASSETTE

Once your sample has been running for a while (the sampling session time can be ~1-3 days, depending on your site), replace the Cassette. Keep the Sampler ON the entire time.

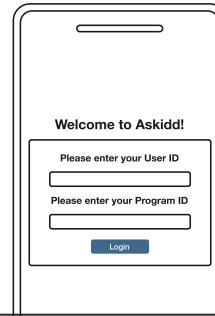
02



RETRIEVE MATERIALS

Grab the previously opened plastic bag and mailer from the kit box.

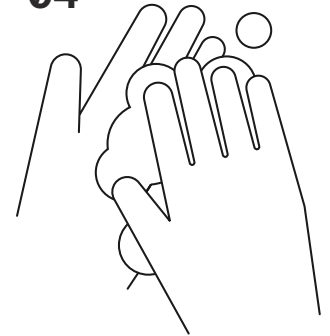
03



LOG INTO THE APP

Have your phone or tablet with you, connected to the internet and logged into the Askidd app.

04



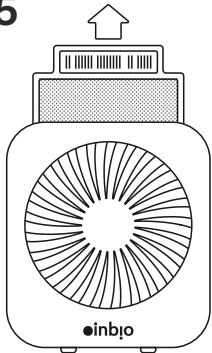
WASH HANDS

Wash your hands before handling sampling materials.



Ending a sampling session

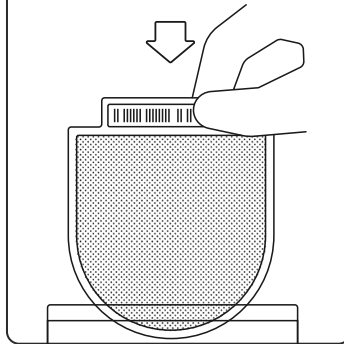
05



REMOVE CASSETTE

Remove the used Cassette from the Sampler by pulling up and out on the plastic tab. Hold the Cassette only by its outer frame. **Do not touch the inner filter.**

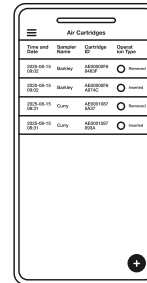
06



SEAL CASSETTE

Put the used Cassette directly into the plastic bag and seal it tightly.

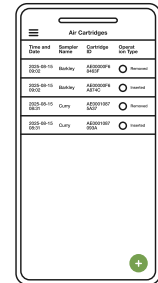
07



CONFIRM ENTRY

On the Askidd app, check the previous entries on the "Air Cartridges" page and confirm the Sampler and Cassette barcodes match those logged as "IN" at the start of the session.

08



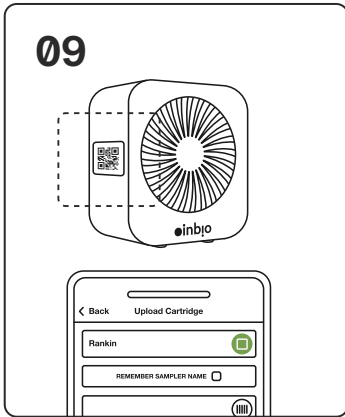
LOG SESSION

On the Askidd app, tap "+" in the lower right corner to begin logging the end of the sampling session.



Ending a sampling session

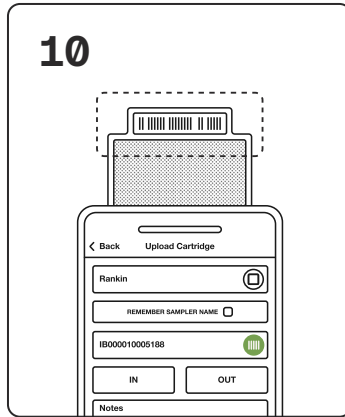
09



SCAN SAMPLER

Tap the barcode button in the first field and scan the Sampler barcode.

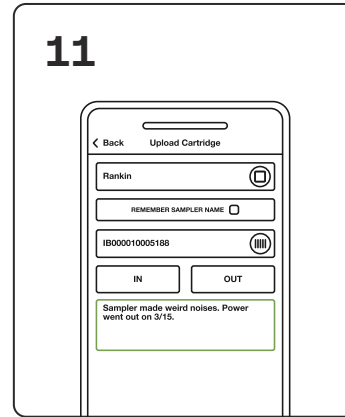
10



SCAN CASSETTE

Tap the barcode button in the second field and scan the used Cassette barcode.

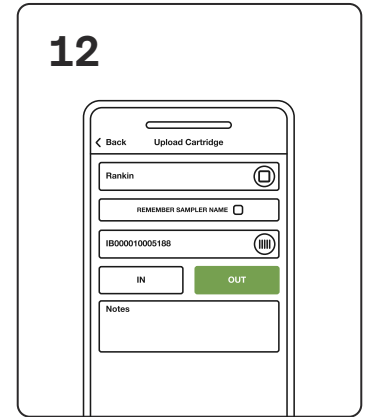
11



RECORD OBSERVATIONS

In the notes field, record any unusual events or observations, including the filter condition (e.g., color, debris, damage).

12



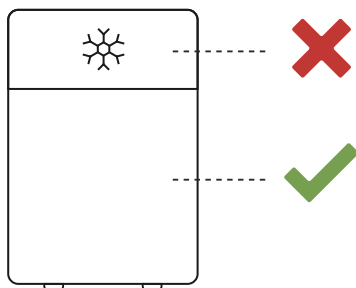
SAVE LOG

Tap OUT, then tap SAVE.



Ending a sampling session

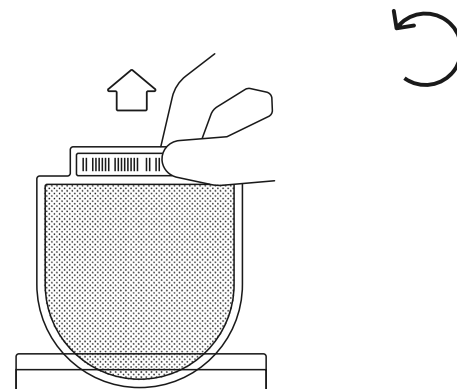
13



STORE CASSETTE

Store the bagged Cassette at room temperature (15–25°C / 59–77°F) if shipping within 48 hours, and in the refrigerator (2–8°C / 36–46°F) if shipping will take longer than 48 hours. **Do not freeze.**

14



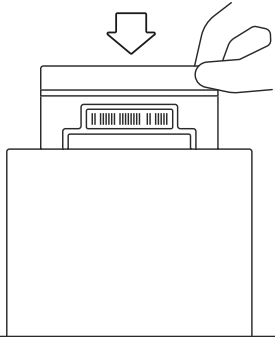
START NEW SESSION

Immediately start a new sampling session by repeating Part 01 with a new Cassette.



Shipping your samples

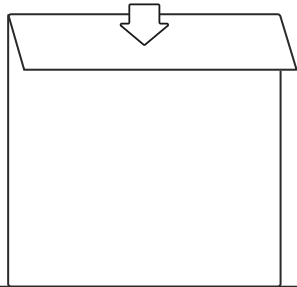
01



PLACE IN MAILER

Put the plastic bag containing the used Cassette into the mailer.

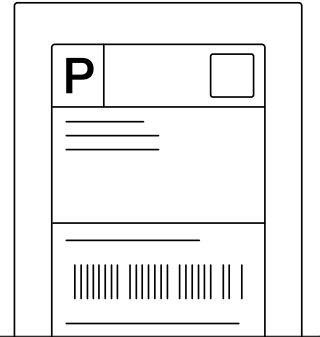
02



SEAL MAILER

Seal the mailer tightly.

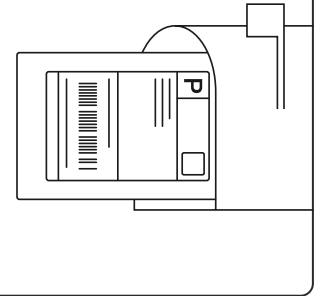
03



LABEL MAILER

Attach the shipping label (included in your kit or sent by email).

04

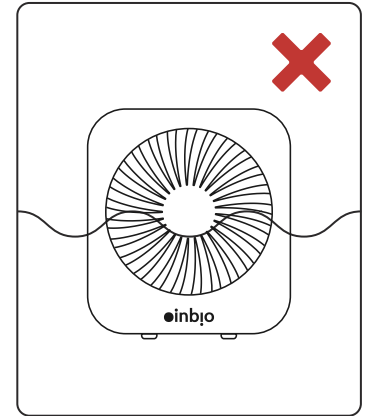
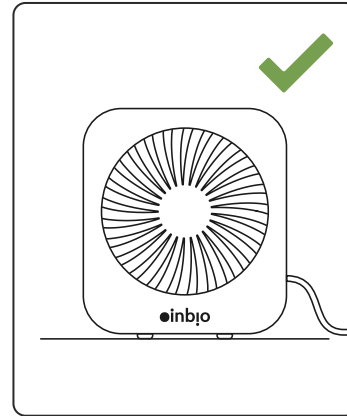
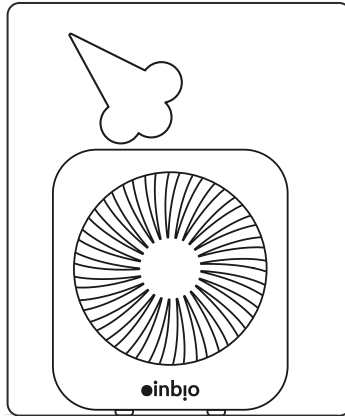
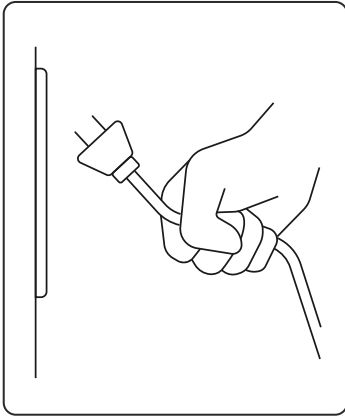


SHIP MAILER

Ship the mailer according to the carrier's instructions.



Sampler maintenance



DUST REMOVAL

If dust accumulates on the device, turn the Sampler off by unplugging it, then use compressed air to remove loose dust.

CLEANING SAMPLER

After dusting, run the Sampler for 10 minutes without a Cassette to clear any loose particles. **Never immerse the Sampler in water or other liquids.**



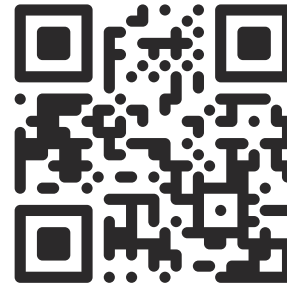
Contact

For any questions or issues with your kit or Sampler
— including setup, sampling, shipping, or your sampling
schedule — contact info@lung.fish

This manual and additional information are available at
<https://lung.fish>

Scan the QR code on the right to learn more.

For research purposes only.





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