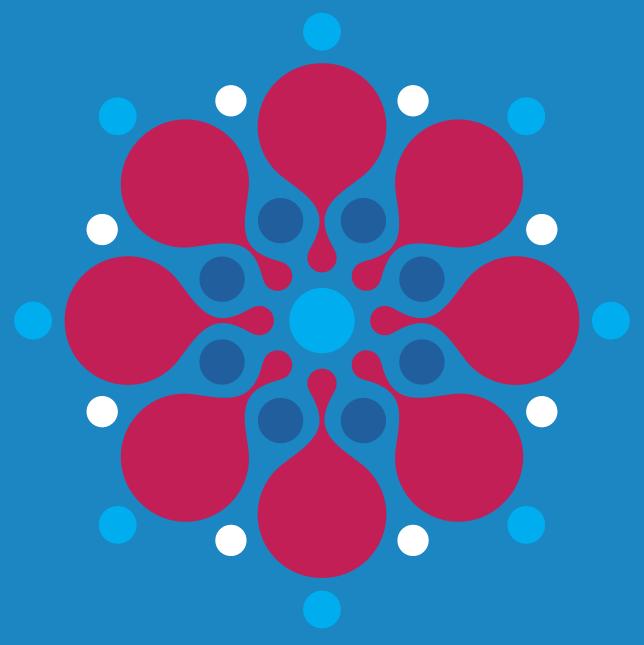
# THE SANITATION FIGHT AGAINST AMR



**TOOLKIT FOR** 

Public Toilet Owners, Operators and Users







# ANTIMICROBIAL RESISTANCE (AMR): WHAT YOU NEED TO KNOW

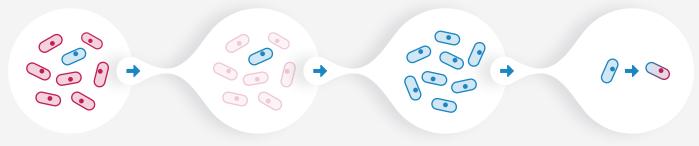
#### What is AMR?

AMR is a phenomenon that describes the non-susceptibility of microbes (bacteria, fungi, viruses and parasites) to antimicrobial drugs. AMR occurs when such microbes change over time and no longer respond to medicines. This makes infections harder to treat, increasing the risk of disease spreading, severe illness and death.

Antibiotics are a special category of antimicrobial drugs for treating bacterial infections that underpin modern medicine as we know it: if they lose their effectiveness, key medical procedures, such as gut surgery, caesarean sections, joint replacements, and treatments that depress the immune system (eg chemotherapy for cancer), could become too dangerous to perform. Most of the direct and indirect impacts of AMR will fall on low- and middle-income countries.

## How does AMR occur?

Antibiotic resistance (a form of AMR) happens when antibiotics do not kill the targeted bacteria due to drug resistance.



Sensitive bacteria
Drug resistant bacteria

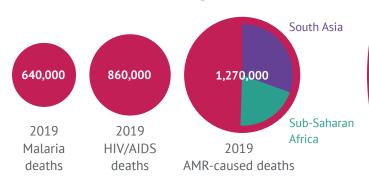
The antibiotics kill the bacteria that cause the illness, plus good bacteria that protect the body from infection.

The drug-resistant bacteria are then able to grow and take over the space left by those killed by the antibiotic.

Also, some bacteria may transfer their drug resistance to other bacteria, causing more problems.

#### Who is at risk of AMR?

Everyone is at risk of drug-resistant infections.





Est. 10 Million

AMR-cause deaths per year

by 2050





## TACKLING AMR:

## WHAT IS THE ROLE OF SANITATION AND HYGIENE IN THE FIGHT AGAINST AMR?

#### **Infection Prevention:**

- Safe water, sanitation and hygiene (WASH) reduce the risks of getting bacterial infections, which are usually treated with antibiotics.
- They also decrease the chance of acquiring non-bacterial infections for which antibiotics may be inappropriately prescribed.
- Every year, hundreds of millions of diarrhoea cases are treated with antibiotics.

## **Infection Control:**

- Poor sanitation and hygiene practices in public toilets contributes to the spread of antibiotic-resistant infections, as they are easily transmitted through faecal matter and other bodily fluids.
- Just 1 gram of faeces may contain 10 million viruses, 1 million bacteria, 1,000 parasite cysts and 100 parasite eggs.
- Safely-managed WASH helps stop the spread of infections.



Access to WASH in communities prevents infection and can eliminate 60% of WASH-related antibiotic use.

WASH-related

#### **AMR Sanitation Toolkit**

In the following pages we detail the roles and responsibilities toilet owners, operators and users each have in the fight against AMR.



#### **Toilet Owners:**

refer to the government bodies (national or local), businesses or entrepreneurs who are responsible for the management of public toilets, either as the owner or the 0&M contractor.



## **Toilet Operators:**

refer to the staff who handle the daily running of the facility. They include janitors, cleaners, caretakers and toilet attendants.



#### **Toilet Users:**

refer to people who use public toilets.

These are organised into three themes:

**AMPLIFY AWARENESS** of AMR and its dangers

> **MINIMISE RISKS** of infection

**REDUCE THE SPREAD** of infection through proper sanitation and hygiene practices







## **AMPLIFY AWARENESS** of AMR and its dangers through the management team and staff

Align with the local government, non-government organisations or medical professionals on antimicrobial stewardship.
Appoint a Health and Hygiene Champion, trained in AMR and infection prevention and control.
Support regular education and training on AMR and infection prevention and control for staff and operators.
Support implementation of AMR public awareness campaigns through social media and other channels.
Provide educational posters and materials on AMR throughout operations.



## MINIMISE RISKS of infection through infrastructure

Follow international or national technical standards for the design and layout of public toilets (eg STAR Rated Toilet Guidelines, ASEAN Public Toilet Standard, Government of
<u>India's Advisory on Public And Community Toilets</u> ).
Explore innovations in sanitation that may help tackle AMR, such as aerosols, microbial
surveillance, diagnostics, self-cleaning toilets, sensors and UV.
Ensure the public toilet is equipped with a proper waste management system and
standardised water treatment system, approved by the local government/authority/entity.

Explore innovations or partner with entrepreneurs that operate surveillance systems (eq



## REDUCE THE SPREAD of infection

epidemiology-based wastewater testing).

## through proper sanitation and hygiene practices

- Institute a cleaning and disinfection manual and guidelines for toilet operators and cleaners. As a minimum, it should include:
  - Cleaning schedule and frequency
  - Cleaning and disinfection routines and procedures
  - Safe use of cleaning and disinfection products, equipment and solutions
  - Use of personal protective equipment (PPE)
  - Care and storage of supplies, equipment and PPE
- Conduct a risk assessment and map out possible pathways of infection to strengthen cleaning and disinfection guidelines.
- Train public toilet operators and cleaners on proper cleaning and disinfection. (You may refer to the <u>E-Learning Modules for CT and PT Operators</u>.)
- Ensure water and handwashing facilities are installed and operational.
- Develop visual educational materials (eg posters, videos) on proper hand hygiene techniques for toilet users. Refer to <a href="WHO's steps">WHO's steps for hand washing and hand rubbing</a>.









## **AMPLIFY AWARENESS** of AMR and its dangers through the management team and staff

- Participate in training, awareness, and education programmes on AMR and infection prevention and control.
- Ensure that staff equipped with AMR knowledge (Health and Hygiene Champion) are available for questions from toilet users by phone or messages.



## MINIMISE RISKS of infection through infrastructure

- Keep toilets open during set operational hours.
- Replenish toilet essentials regularly.
- Ensure proper upkeep and maintenance of public toilets.
- Ensure rubbish bins are available in every cubicle and on general premises.
- Avoid contact with waste. Use gloves when discarding rubbish.



## **REDUCE THE SPREAD** of infection

## through proper sanitation and hygiene practices

- Practise regular cleaning and disinfection of the toilets according to set standards and quidelines.
- Put special emphasis on cleaning frequently-touched surfaces, such as taps, sinks, door handles, flush, etc.
- Use appropriate personal protective equipment (eg gloves, masks) while cleaning. All disposable PPE must be discarded properly after use.
- Increase the frequency of cleaning and disinfection when there is an infection outbreak.
- Discard disposable cleaning supplies properly.
- Properly clean and disinfect reusable supplies, such as cleaning cloths, mops and rags.
- Wash your hands with soap and water regularly, especially after cleaning.
- Put up posters or material on proper hand hygiene.
- Ensure sinks are working and water, soaps and hand sanitisers are available for hand washing or hand rubbing.





# ANTIMICROBIAL RESISTANCE (AMR)



Feeling under the weather? Sneezing, stuffy and runny nose?

You might have a cold. The good news is you may not need antibiotics. Viral infections, including flu and COVID-19, do not need antibiotics.

Currently, a global threat, called antimicrobial resistance (AMR), is killing 1.27m people in the world every year. This could go up to 10 million yearly by 2050. AMR happens when bacteria, fungi and parasites change over time and no longer respond to medicines. This makes infections harder to treat and increases the risk of disease spreading, severe illness and death.

To combat this, we need your help to prevent getting and spreading diseases. Curious about what to do? Here's how.

Antimicrobial Resistance (AMR) is killing

**1,270,000**people in the world every year

## YOUR ANTI-AMR CHECKLIST

#### **AMPLIFY AWARENESS**

of AMR and its dangers

Remember **antibiotics** only work against **bacteria** — they do not work for colds and flu, which are caused by **viruses**.

Only use antibiotics when prescribed by a certified health professional.

Follow your health professional's instructions when you are prescribed antibiotics.

Spread awareness. Share this information with your family, friends and loved ones.

Never share or use leftover antibiotics. Your health professional can advise how best to dispose of leftover antibiotics. Do not put them in a toilet.











MINIMISE RISKS of getting infected

Maintain a healthy lifestyle.



Keep up to date with vaccinations.



Prevent infection by regularly washing your hands.

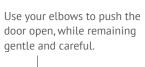


## **REDUCE THE SPREAD** of infection through proper sanitation and hygiene practices

Practise proper hand washing and hand rubbing before and after using the toilet.

The less contact with any surface, the better. Use tissue when touching any surface, if possible.

Do not flush any products (eg feminine products, tissues, napkins, baby wipes) and, especially, antibiotics down the toilet. Put them properly into the rubbish bin nearest you.









Remember to flush, once you are done. It is also advisable not to inhale while flushing

Keep the toilet clean. Check for any stains or spills and clean up before leaving.





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## **ABOUT TOILET BOARD COALITION**



Founded in 2015, the Toilet Board Coalition accelerates business solutions to the sanitation crisis. The Coalition facilitates partnerships between small- and medium-sized enterprises (SMEs), corporates, NGOs, investors and governments, who share a commitment towards sanitation for all by 2030 (SDG 6.2). Its world-renowned Accelerator for Sanitation Economy entrepreneurs offers business model design, corporate mentorship and access to investment. The Coalition has graduated 58 SMEs to date, impacting 2.4 million people daily and unlocking US\$22 million in finance. Its 80+ Members' approach to sanitation leads to innovation in toilet design, circular recovery of biological resources and smart digital technologies.

The Toilet Board Coalition and its work is made possible by the generous support of its Membership. The Toilet Board Coalition is steered by leading Members: Unilever, Kimberly-Clark, LIXIL, USAID and Aqua for All. The contents of this document are the responsibility of the Toilet Board Coalition and do not necessarily reflect the views of the Members.

## **ABOUT AMR INDUSTRY ALLIANCE**



The AMR Industry Alliance is one of the largest private sector coalitions set up to provide sustainable solutions to curb antimicrobial resistance, with over 100 biotechnology, diagnostics, generics, and research-based pharmaceutical companies and associations joining forces. It facilitates collaboration, reports on the industry's contribution to the fight against AMR and engages with external stakeholders.



