



## Sanitation Overview

Sanitation and clean water access are recognized as human rights by the [United Nations](#), but access to well-managed sanitation systems is a global challenge. Sanitation refers to having clean water available for drinking and cleaning, and having a system in place for handling human waste. While people have struggled to have proper sanitation throughout history, it is increasingly difficult with a growing population. Ancient civilizations buried their waste away from living environments and over time, [improvements in sanitation](#) have progressed from latrines, to toilets, to fully managed sanitation systems. Even with improvements, [billions of people lack access to well-managed sanitation systems](#) and many people live without private toilets or the resources for sanitary handwashing.

Improved access to clean water, sanitation, and hygiene [could save 1.4 million lives a year](#). The majority of these deaths are happening in low and middle income countries but there are challenges with sanitation in higher income countries too. The challenges include lack of access to basic sanitation, inadequate or poorly managed sanitation systems, and contaminated water. Open defecation is still a problem in the present day but it has [decreased significantly since 2000](#). Sanitation infrastructure cannot keep up with the rapid growth of cities but even though there are many sanitation challenges in urban areas, [66 percent of people without access to basic sanitation live in rural areas](#). Poor sanitation has an impact on human wellbeing and is a public health concern. Lack of access to sanitation is costly and can [limit a country's economic growth](#) while contributing to multidimensional poverty.

Global access and the sustainable management of sanitation and water is Goal 6 of the [United Nations Sustainable Development Goals](#) (SDGs). Even with the global focus on sanitation, none of the targets for SDG 6 are on track to be met by the 2030 deadline. And some targets are especially behind - to reach the goal of 'safely managed sanitation systems worldwide' by 2030, current progress would need to quadruple. New construction of [sanitation facilities is needed for more than 800 million people](#) to have access to adequate sanitation systems. And many areas will need improvements to make their current sanitation infrastructure [resilient to a changing climate](#).

[World Toilet Day](#) helps raise awareness about sanitation access worldwide. While making sure all people have access to basic sanitation would be a great step in the right direction, more will need to be done to reach and maintain SDG 6's targets in the future.

## Narrow Your Focus

Sanitation is a broad global topic and encompasses a lot of challenges, but your video can only be 60 seconds. Rather than taking on the entire topic, we recommend to focus on one part of the topic (a subtopic). **Remember to connect how human population growth impacts that challenge and offer a sustainable solution.**

We've put together a list of suggested subtopic angles (see below) you could take, and linked them to a variety of credible sources. But there are many other sanitation subtopics, and tons of other sources, so no need to limit yourself to what's included here!

As you conduct your [research](#), remember to keep a [works cited list](#) so you have that handy if your video is chosen as a finalist.

Click on the colored tiles below to navigate to information about each subtopic, or click the bottom rectangle for a planning document to help generate your own ideas!



Looking for more resources to help you plan your video? Check out the [full video project organizer](#) or the [abbreviated version, the video project guide](#).

## Sanitation Access

Access to sanitation is a challenge everywhere but especially difficult in low-income regions. Billions of people worldwide are lacking access to the sanitation resources and systems required to keep them healthy. Work is being done to improve sanitation access for all, but rapid progress is needed to achieve [Sustainable Development Goal 6](#).

- Over 1.5 billion people do not have private access to basic sanitation including a toilet. (Source: [World Health Organization](#))
- Close to half the world's population, approximately 3.6 billion people, lack access to safely-managed sanitation services where sewage is treated before it is released back into the environment. (Source: [UNICEF](#))
- In order to achieve SDG Goal 6 of universal access to basic sanitation, current progress worldwide would need to double. (Source: [UNICEF](#))
- In 2022, approximately 2 billion people globally lacked soap and clean water for handwashing. (Source: [World Health Organization](#))
- Women and girls globally face many barriers to obtaining menstrual products and having safe spaces to manage hygiene while menstruating. (Source: [UN Women](#))
- Globally, 18 percent more people in urban areas have access to safely managed sanitation than those in rural areas. (Source: [WHO/UNICEF, 2021](#))

## Sewage Treatment Infrastructure

Sanitation infrastructure, like indoor plumbing, underground sewers and water treatment facilities, is crucial for treating waste before it is released into the surrounding environment. In developing countries, wastewater is often not treated before it is released. And even where there are wastewater treatment systems, many worldwide are overloaded, causing waste to be unintentionally released into the environment.

- How does water get treated? Check out the eight phases of water treatment. (Source: [Cole Palmer](#))
- In developing countries, less than 8 percent of wastewater is treated before being released in the environment. (Source: [United Nations Africa Renewal](#))
- Globally, 4.2 billion people use sanitation services that do not treat human waste. (Source: [UNICEF](#))
- It is estimated that there are at least 23,000 - 75,000 sanitary sewer overflows (SSOs) every year in the U.S. A SSO is when raw sewage is released from a sewer system without being treated. (Source: [Environmental Protection Agency](#))
- Most water treatment plants in the United States are operating near their design capacity. 15 percent of U.S. plants are working at, or even over, their maximum capacity. (Source: [American Society of Civil Engineers](#))

## Water Contamination

When water becomes contaminated, it is often because there is no access to sanitation or solid sanitation infrastructure. Untreated sewage can wind up in bodies of freshwater, impacting the surrounding environment and human health. Climate change events like increased flooding, droughts, and extreme weather can lead to more water contamination, especially in areas with poorly-managed sanitation systems.

- If human waste is not managed well, it can end up in waterways including rivers, lakes, and aquifers. (Source: [International Groundwater Resources Assessment Center](#))
- Globally, 1.7 million people or more use drinking water that is contaminated with feces. (Source: [World Health Organization](#))
- Sewage released into waterways can lead to algal blooms causing a lack of oxygen for species living there. (Source: [Natural History Museum](#))
- Wastewater is used to irrigate the food consumed by 10 percent of people on the planet. (Source: [World Health Organization](#))
- An increase in droughts and floods caused by climate change can lead to less available water, and available water becoming contaminated. (Source: [Water Aid](#))

## Urbanization

Rapidly growing cities can create many sanitation challenges. Urban areas may have [informal settlements with no sanitation systems](#) in place. Or the city's growing population may outpace its current sanitation infrastructure, causing system breakdowns. Low-income areas within cities are often most impacted by subpar sanitation infrastructure that cannot withstand additional strain, including natural disasters.

- Close to 40 percent of people who live in urban areas do not have access to safely managed sanitation services. (Source: [World Health Organization](#))
- India is home to about 1.5 billion people and sanitation infrastructure in the country's cities can't keep up with the growing population. (Source: [Arch Daily](#))
- Urban sanitation systems tend to be closer to capacity compared to rural areas and are more likely to contaminate groundwater. (Source: [Nature Portfolio Journal](#))
- Poorer urban neighborhoods are most vulnerable to sanitation system breakdowns after natural disasters like flooding, earthquakes, etc. (Source: [United Nation Water](#))
- City Wide Inclusive Sanitation (CWIS) solutions are being implemented in areas where population has grown faster than the building of adequate sanitation systems. (Source: [World Bank](#))

## Public Health

Sanitation is essential to public health. Well-managed sanitation systems separate human waste from the clean water used to drink and clean, preventing the spread of many diseases, improving child health, and protecting the surrounding environment. Access to well-managed sanitation systems can prevent the premature death of billions of people by reducing the amount of diarrheal diseases each year.

- Safe drinking water, sanitation and hygiene are foundational to public health. (Source: [World Health Organization](#))
- Some benefits of improved sanitation include reduced spread of disease, fewer cases of malnutrition, a decrease in antimicrobial resistance, and increased community resilience to environmental shocks. (Source: [World Health Organization](#))
- Poor sanitation can cause many public health diseases including cholera and typhoid fever. (Source: [Center for Disease Control](#))
- Diarrhea from contaminated water causes 2 million deaths every year and contributes to child mortality. (Source: [World Wildlife Fund](#))
- Sanitation infrastructure is often damaged in areas of conflict creating public health crises. (Source: [Global Citizen](#))

## Economic Impacts

Poor sanitation has many negative impacts on individual, community, and national economies. The productivity losses, healthcare costs, environmental cleanup costs, and economic growth losses are profound. This also contributes to [multidimensional poverty](#), which is a measurement of poverty that goes beyond monetary poverty and includes lack of education, and basic infrastructure services. Many countries around the world spend a significant portion of their gross domestic product (GDP) on sanitation challenges.

- The absence of reliable clean water and sanitation is a major contributor to multidimensional poverty and impacts women and children more than a lack of wealth alone. (Source: [World Resources Institute](#))
- Wealth impacts access to sanitation facilities. Check out this graph to see how GDP and sanitation services are connected. (Source: [Our World in Data](#))
- “A WHO study in 2012 calculated that for every US \$1.00 invested in sanitation, there was a return of US \$5.50 in lower health costs, more productivity and fewer premature deaths.” (Source: [World Health Organization](#))
- Poor sanitation has cost countries like Bangladesh, India, and Cambodia 6 percent of their GDP. (Source: [Aljazeera](#))
- Nigeria loses 1.3 percent of its GDP annually because of poor sanitation. (Source: [Water Aid](#))



## Generating Your Own Subtopic

Coming up with your own subtopic can be intimidating if you don't know where to start. To help, we've created the following list of questions and reminders to help you formulate your own subtopic. Ask yourself these questions, and as you answer them, notice what stands out or find repeating trends in your answers. Those are what you should focus on to generate your subtopic!

### Probing questions

1. Have you noticed anything related to this global topic in your community? If so, how does what is happening locally connect to challenges globally?
2. Does this topic connect to an area of interest to you? If so, how does it connect?
3. What does this topic first bring to mind when you think about it? What emotions does this topic make you feel?
4. What do you already know about this topic? What do you want to know?
5. Have you read any books or articles, or listened to podcasts about this topic? If so, what did you learn from them?

### Keep in mind that the subtopic you choose should be:

- Connected to human population growth - *how does population growth impact it?*
- Focused on a single problem or issue
- Researchable using primary and/or secondary sources
- Feasible to answer within the timeframe of 60 seconds
- Specific enough to answer thoroughly