

Cholera in Haiti

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The epidemic of cholera plaguing Haiti is a matter of concern because a large number of Haitians are dying of cholera daily. According to the United Nations (UN), as of 2010, nearly 5,000 Haitians had been killed by a South Asian strain that polluted a river used by thousands of people to bathe, wash, drink and play. Cholera had never been confirmed in Haiti before October 2010, but it is evident that the introduction of UN soldiers has led to the outbreak of this disease; however, Haitians should also be equally blamed for cholera's spread because even minimum standards of sanitation were ignored in earthquake-affected areas. Further investigation is required to determine the cause of cholera's spread, but multiple injustices such as not having access to clean water and the refusal of the government to take healthcare responsibilities seriously will result in more suffering for Haitian people. Preventive measures should be taken to fight cholera in Haiti by improving the standard of sanitation and providing vaccines, along with treating the patients effectively by rehydration, replacement of electrolytes and antibiotics ("The UN's Report on Origins of Cholera in Haiti," 2011).

Cholera

A contagious disease that is caused by a bacterial toxin that disturbs the absorption of water in the small intestine is known as cholera. When a substantial quantity of bacteria reaches the stomach in food, they accumulate, causing poisonous substances to be produced. The symptoms of the disease are caused by toxins, and a violent diarrhea can be produced within just a few days in severe cases, which in severe cases may cause a vast loss of fluid in a short period of time. Cholera can be extremely dangerous for children in underdeveloped nations. If not immediately treated, death can be caused within the first 24 hours due to loss of fluid. On the other hand, cholera can be simply treated by replacing the fluid with the right quantity of sugar and salts because water alone is not properly absorbed

by the body. However, the patient needs to be hospitalized in severe cases for directly administering fluids into the bloodstream with the help of an IV. Cholera is associated with poor standards of hygiene and the quality of drinking water, but it is not a tropical disease. Cholera can be simply fought by improving the sanitation and overall hygiene.

Transmission of Cholera

The bacteria are excreted in feces, and people can be infected if bacteria come in contact with drinking water. If hands are not properly washed by people after using the toilet, then bacteria can also spread to food. Cholera can also spread through shellfish and fish that come from the infected water. Large quantities of water are filtered by shellfish, and the bacteria are concentrated. Bacteria may also infect others via vomit, but that is not very common. An adequate amount of bacteria is required to affect people having normal quantities of stomach acid to catch the disease because stomach acid can kill small quantities of bacteria. Therefore, an opportunity is needed by the bacteria to multiply in water or food before a risk is actually constituted (Peters, pp 2-4).

Cholera in Haiti

The outbreak of cholera in Haiti seems to be much worse than expected. The disease was expected to affect 400,000 people, but it has been estimated that cholera has struck nearly twice as many as this. No cholera cases had been seen in Haiti for over a century before the devastating earthquake last year. From October to December 2010, nearly 150,000 Haitians were infected with cholera, and nearly 5,000 of them have died. According to the UN, the total number of people infected with cholera was expected to be nearly 400,000, but it is believed by the researchers of the University of California, San Francisco, that this is a gross underestimate. They think that nearly 779,000 will be infected with cholera and nearly 11,100 will die by the end of November 2011 (Roberts, 2011).

Although UN peacekeepers from South Asia working in Haiti have been blamed by many for the epidemic, it is believed that the outbreak was caused due to a confluence of circumstances. According to the report, cholera spread due to contamination of the Meye Tributary of the Artibonite River with a pathogenic strain of *Vibrio cholerae* of South Asia because of human activity. An explosive cholera epidemic was started by this contamination downstream in the Artibonite River Delta, which spread to other parts of Haiti. Cholera in Haiti spread due to a number of factors, such as the common use of river water for bathing, washing, recreation and drinking; everyday exposure of farmers to irrigation water from the infected river; and the salinity gradient in the Artibonite River Delta, providing suitable environmental conditions for the proliferation of *Vibrio cholerae*. Other factors include the lack of immunity of the people in Haiti to cholera, poor standards of sanitation and water, the migration of infected people, and the conditions in which treatments were received by cholera patients in medical facilities did not try to stop the spread of cholera to other people. These deficiencies, along with other suitable environmental and epidemiological conditions, allowed the disease to spread ("The UN's Report on origins of cholera in Haiti," 2011).

Preventing Cholera

The cholera epidemic faced by Haiti has defied every effort to control it so far. Nearly 2,000 people were killed during the first thirty days of the outbreak. The spread of cholera needs to be controlled, and the following ways can help prevent and control cholera in Haiti:

- Quality care should be delivered to those infected with cholera. However, a healthy adult can be killed in hours after a profuse diarrhea but lives of people can be saved by early detection and aggressive use of antibiotics.

Only oral rehydration or intravenous resuscitation is recommended by a few authorities but severe cases require antibiotics.

- Oral cholera vaccines which are another powerful tool against cholera should be given to people so that nearly 90% of people, who are fully vaccinated, are protected. But it is argued by some that the vaccine is too expensive or in short supply. But vaccines were not advised during the outbreak of cholera in Zimbabwe which claimed the lives of nearly 4,000 people in one year. Therefore, vaccines should be considered in Haiti to prevent the spread of cholera.
- Standards of sanitation need to be improved in Haiti and nearly \$57 has been allotted by the American government for cholera-relief efforts in Haiti. (Farmer & Rejouit, 2010)

It is clear that new methods of providing potable water and sanitary conditions must be explored not only in Haiti but in many underdeveloped countries so that the spread of waterborne diseases like cholera can be prevented.

The outbreak of cholera in Haiti has claimed thousands of lives. No cholera cases had been confirmed in Haiti for over a century before the devastating earthquake last year. Cholera is a contagious disease that is caused by a bacterial toxin that disturbs the absorption of water in the small intestine. From October to December 2010, nearly 150,000 Haitians were infected with cholera, and nearly 5,000 of them died. Haiti's cholera disaster should not be allowed to escalate; preventive measures should be taken to provide cholera vaccines and to improve the standard of sanitation. The patients should be effectively treated by replacing electrolytes, rehydration and antibiotics. It is essential to fight cholera aggressively and swiftly. If it is insisted that prevention and care are complementary and all

means available worldwide are utilized, then this emergency can be beaten, and the spread of this disease can be controlled.

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