THE LONDON SCHOOL OF ECONOMICS AND POLITICAL SCIENCE

Case Study 1:
Outbreak of the Vaca virus

This simulation recreated the governance decisions of an outbreak of 'Vaca Virus' in the country of 'Esperanza'. To prepare for the simulation students had to familiarise themselves with the geographical, social, economic and political background of Esperanza and the symptoms, transmission, treatment and prevention of the Vaca Virus. Below you will find illustrative extracts from that background information.

Please note: the simulation was designed in August/September 2019 and students participated in the simulation in December 2019 i.e. before the COVID-19 pandemic.

Esperanza

Esperanza, officially the Socialist Republic of Esperanza, is the second-smallest sovereign state on the South American continent. Esperanza is landlocked and bordered by Paraguay, Argentina, Uruguay, Azacion and Brazil. According to the 2006 census Esperenza has a population of 3.5 million people.

Batista, the state's capital is located in the north of Esperanza it has a population of 1.2 million people. Esperanza's two other major cities are Trubea and Nivea. The multi-ethnic population includes people of European, Indigenous, African and Asian and heritage. The largest ethic group is the Mabaz indigenous group. Esperanza's official language is Spanish but it has a sizable population of Mabaz speakers, and also minority groups that also speak Portuguese and Guarani.

Spanish conquistadors arrived in 1529 establishing the city of Nivea. Numerous failed attempts to convert the local population to Christianity by Catholic missionaries led to the Nivea massacres of 1531. Estimates list the murder of 40 000 Mabaz by Spanish forces. Armed resistance was mounted by the local indigenous population, leading to the expulsion of the Spanish in 1534. Spanish forces re-entered Esperanza in 1750, after the spread of Christianity in neighbouring countries made the Esperanza population less resistant to foreign powers and Christian missions.

Dr Clare Wenham, LSE Department of Health Policy.

Esperanza was the last state on the South American continent to be colonised by European powers.

Esperanza overthrew the local Spanish administration in 1890. Esperanza's first dictator, Javier Diaz Santiago, was the son of an Mabaz mother and a Spanish general. Inspired by Jose Caspare Rodriguez de Francia of Paraguay, Diaz Santiago attempted to reduce the racial hierarchy established by the colonial-era elite and create a mixed-race race society. Diaz Santigo prohibited white colonial elites from marrying one another and only allowed marriage between races.

Diaz Santiago was assassinated in 1908 by the previous colonial elite. Raul Trubea Ruiz established a state that strongly emphasized segregation between ethnic groups, rooted in Catholicism and the neighbouring Argentinian discourse of "civilisation and barbarism".
Trubea Ruiz attempted to reinforce the political, economic and social divisions between the social groups based on early eugenics texts.

A continued political and social division within the country between different ethnic groups has meant a cycle of military dictatorships and populist leaders since the turn of 20th Century. According to historian, Sahba Vasquez Ghanbari, it has been the administrations of Diaz Santiago and Trubea Ruiz that have established the two predominant modern political cultures of Esperanza. The two factions are known as the Colectivo de Santiago and Hijo de Ruiz.

Racial hierarchies and tensions have been a significant factor of political movements in Esperanza. Ruha Guia identified that there have been three waves of civil rights movement in terms of racial equality in Esperanza in the twentieth and twenty-first century, the Nivea Riots of 1920, the political coup in 1967 and the two hundred day strike in 2015.

A national census has not occurred since 1954.

Health System

In 2000 the World Health Organisation ranked Esperanza 67 in the World Health Report. As of 2018, Esperanza's health outcomes have said to have dramatically declined. In 2000, the average life expectancy for a citizen in Esperanza was 68.56 years old (male) and 73.33 years-old (female).
In 2018, the average life expectancy is 58.88 years-old (male) and 60.33 years old (female). This life expectancy also varies by ethic group, with Mabaz populations experiencing poorer health than the white population.

Reports by journalist Tara May Gazza of the Australian cited that the proportion of healthcare workers to the population in Esperanza is 2.9 healthcare workers for every 1000 people (urban areas) with speculation that it is reduced to 1 healthcare worker to 1000 citizens in rural areas.
The elite Esperanzan population primarily consults with private healthcare workers due to the high rate of absenteeism and corruption in healthcare workers in the public health sector.

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Bribery is also a common feature of medical practice in Esperanza with patients often being charged additional fees for referrals, costs for prescriptions or duplicate tests. For example, patients are often charged twice for a blood test. Families that are middle-income prior to an illness in Esperanza or often reduced to poverty due to the high costs of health treatment. As a result patients from low and middle income families often delay seeking treatment.

In a 2016 report by the Esperanza Ministry of Health it noted the state was facing severe economic crisis due to the rising costs of noncommunicable diseases (NCDs) on the state's public health system. The 2016 report recorded that the Mabaz experience the highest rate of NCDs in Esperanza particularly diabetes, heart disease and kidney failure. NCDS are eight times more likely to impact the Mabaz versus the general population in Esperanza. This indigenous population also suffer from a number of Neglected Tropical Diseases, especially Chagas disease and Dengue Fever.

Vaca Virus

Currently the outbreak of the Vaca virus has mainly affected Esperanza. Some cases have also occurred in countries neighbouring Esperanza. It is a highly contagious virus; if not immediately treated.

Recent reports from the Ministry of Health estimate 9 000 cases and more than 3000 deaths in Esperanza. In countries neighbouring Esperanza there have been another 1000 cases reported and 400 fatalities.

Individuals are advised to restrict their travels to Esperanza to only essential trips. Caution is advised if travellers wish to also visit the affected areas in Azacion, Paraguay, Argentina, Uruguay and Brazil.

Symptoms of the Vaca virus

Symptoms start within 48 hours after becoming infected with an individual with the Vaca virus typically presenting the following symptoms:

- fever
- headache
- joint and muscle pain
- sore throat
- muscle weakness
- reduced auditory perception
- sudden, excessive sleepiness
- bleeding from the gums, eyes, nose and mouth.

If left untreated, reduced cardiac function can occur.

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Vaca Virus Transmission

Current advice is that the Vaca virus is spread via contact with the blood, body fluids or organs of a person or animal with the infection.

For example, it can be spread by:

- directly touching the body of someone with the infection who has symptoms or recently died – the virus can survive for several days outside the body
- cleaning up body fluids (blood, stools, urine or vomit) or touching the soiled clothing of an infected person
- handling unsterilised needles or medical equipment used in the care of the infected person
- handling or eating infected beef or cow products;
- unprotected sexual contact

Treatment for Vaca Virus

No licensed treatment or vaccine is currently available for the Vaca virus. New vaccines and drug therapies are being researched and tested for the Vaca virus.

Severe dehydration is common. It is essential that persons have access to fluids.

Individuals that begin displaying symptoms should be isolated, immediately. People confirmed to have the infection should be treated in isolation in intensive care.

Affected localities that have a high rate of cases should be quarantined.

Healthcare workers need to avoid contact with the bodily fluid of their infected patients by taking strict precautions, such as wearing protective equipment.

Prevention of Vaca Virus

There is a continued high risk of being infected with the Vaca virus in Esperanza.

If you are required to travel to Esperanza (and affected localities in Paraguay, Argentina, Uruguay and Brazil) precautions to reduce the risk of being infected with the Vaca virus are:

- disinfect your hands, either through washing your hands with soap and water or the use of disinfection products
- avoid close proximity to affected individuals or localities with a high rate of infection
- don't handle beef or cattle products, especially raw meat

Dr Clare Wenham, LSE Department of Health Policy.