Alison Murrell Braham Area Highschool Cambridge, Minnesota Haiti-Food Insecurity

The Republic of Haiti

Between the Caribbean Sea, the North Atlantic Ocean and west of the Dominican Republic lies the country of Haiti. Haiti may be familiar to many because of a catastrophic earthquake that occurred on the island in 2010. Many people from the U.S aided the country. Some helped by supporting organizations that were sending aid, going to Haiti to help with recovery efforts, educating people on what earthquakes were like, and how catastrophic they are. Some volunteered at organizations such as "Feed My Starving Children" to send food and supplies to the country. The country had buildings ruined, lives lost, crops lost, and jobs lost. The efforts to help Haiti were very helpful to the beautiful country, but like all countries it still faces some challenges. (Haiti Outreach Ministries)

Haiti has a population of 11.26 million. There is a 5% rate of urbanization movement in Haiti (World Bank). The amount of the population living in rural areas is 43.81%. Approximately 56.19% of the population is located in an urban location (Ward, Hadley). Haiti has a Semi-Presidential Government. This was established after it broke free from France's control in 1804, on January 1st. January 1st is now known as Independence Day throughout the country. The Napoleonic code is used as Haiti's Civil Law legal system; the Napoleonic Code was created by Napoleon Bonaparte (CRF). The Code is also followed in France and other countries which were controlled by the French; previously Haiti and Italy as well as a few other countries (CIA World Fact Book). Until his assasination on July 7th, 2021 Jovenel Moïse was the current president of Haiti, however the current acting president is Ariel Henry. (Ariel Henry...)

Agriculture land takes up 58% of Haiti's land space (Country Profiles). However not all of the land actually grows crops due to dump piles and unfertile soil. Where crops can grow, the crops that are commonly planted are: corn, sweet potatoes, and rice (Soil Nutrient Management in Haiti). The average farm size is 2.5 hectares which is equal to 6.2 acres (Haiti). In America, the average farm size is 179.7 hectares or 444 acres (United States Department of Agriculture). In contrast to the United States, the farms are extremely small. Even the state of Massachusetts, which is slightly smaller than Haiti, has an average farm size of 69 acres. This is detrimental to the country, as agriculture could help the country thrive in many ways. Agriculture is extremely important, countries that do not utilize it correctly struggle.

The climate is tropical and in the east, it is semi-arid where the mountains intercept the trade winds. Haiti and the Dominican Republic share the island of Hispaniola. The western third belongs to Haiti and the eastern two thirds is the Dominican Republic. The geographic coordinates are 1,900 N, 7,225 W. The lowest point is the Caribbean Sea at 0 m and the highest point is Chaine de la Selle at 2,680 m. (CIA World Fact Book)

A typical family size is around four to five people. Families live in shacks made out of mud, palm leaves, strong local grasses, and sometimes from plastic. By law, the minimum age to get married in Haiti is

fifteen years old for females and eighteen years of age for males (United Nations). The diet of a family typically consists of starches. Many families are not able to buy food, resulting in starvation for many families. 59% of families are living off of \$2.42 a day. Some of the foods that are common in their diets include rice, pork, sweet potatoes, cornmeal, and akee. Sometimes in desperate times when they can't afford food they will make "Mud Cakes" which is sunbaked mud. Haitians get their food at local marketplaces and sometimes in tough times from dumps, as well as crops harvested from fields. Food is cooked over open fires. (UNE)

The careers that are common in Haiti are working in finance and trade. The average salary for an educated worker is \$907 (USD) a month. However, for a career such as being a janitor/housekeeper, which would be a common job, the wage is \$328 a month. (Salary Explorer)

Education in Haiti is a challenge. This is due to the cost of private schools and the amount of available room in public schools. Most schools are private schools. Unfortunately most families do not have enough money to pay tuition for their children. There is an 88% enrollment rate of primary school age children (Global Partnership). Many youth that should be high school students are in primary school, due to it having less fees, or that it is all the family can afford, or they haven't had enough education to move to highschool (World Bank). 20% enrollment rate for secondary school aged youth, for the more wealthy families. (Global Partnership)

40% of the population has access to electricity. 72% of urban areas have access, and 15% in rural areas have access to electricity. In urban areas, telephones are everywhere. 95% have the ability to use telephones (World Bank). The government owns 40% of the phone service Natcom with Vietnam owning the remaining 60%. (UniFun)

Most families have access to roads in Haiti, however the roads are not well kept and have potholes. People generally either drive a car, ride a bike, or walk to reach their destination. (Global Security)

An important mineral many in Haiti lack is Iron. Iron is very important to the body. Iron plays a role in red blood cells, when there is a lack of red blood cells it is called anemia. Anemia is when muscles do not receive enough oxygen resulting in improper muscle function. Iron deficiency is most prominent in women who are pregnant, however this can be a common problem in others. 1.9% of the population has been fatally affected by Aids/HIV which is a disease of the immune system (UNAIDS). This disease causes the immune system to weaken, making the person unable to fight off life threatening viruses and different types of cancers (MedlinePlus). There were 160,000 people living with Aids/HIV in 2018. (UNAIDS)

It is often the women in a family who shop in the local markets. Affording the products is one of the restrictions of whether a family has access to markets or not. (HearttoHeart)

The amount of the population with access to clean water that is from an improved water source is 69% of the population. A mere 17% of the population has access to bathrooms. (NCBI)

Malnourishment is a very serious problem for the community, one in every fourteen children die from malnourishment under the age of 5, and 53% of the country's population is malnourished (Meds and Food For Kids). Most men, women, and children are lacking essential nutrients. However pregnant women and children are the most challenged with needing more nutrients than a grown, non-lactating, non-pregnant, adult. Some of these lacking nutrients are calcium which is needed to strengthen/harden bones, along with iron, and vitamin A. (WFP 2016). When people are affected by these things, it causes systems of the body to become less functional; example: When someone doesn't ingest enough vitamin A, their body cannot absorb iron, and iron deficiency makes for a lack of hemoglobin. Hemoglobin is found in red blood cells. Making the person anemic. Food insecurity does not have a large affect on the environment. However garbage and waste are everywhere in towns.

Haiti's main food source is rice, however, eighty percent of the rice is imported from other countries (International Trade Administration). Haiti does have foods that grow there such as yams and some other crops (Agriculture and Food Security). The country still depends strongly on imports. Many people struggle with financing for food. Some families have to resort to making "Mud Cakes" for their children who ask for food when they are hungry. The mud cakes are exactly what they sound like, dried mud. When a child or anyone is hungry, they are given a mud cake. These have little to no nutritional value and can actually cause health problems. Dirt contains parasites and bacteria that can be life threatening.

Haiti is aided by organizations that help with providing food for families in need and helping create water wells to help the situation improve. The 2010 earthquake in Haiti lessened resources and money, however the country has slowly recovered and the country's food insecurity problems are lessening. The urban populations in Haiti have reported that 32% of households are food insecure. 59% of the population lives on only two dollars a day. The rural areas of Haiti are even more food insecure than the urban areas. 100,000 children that are 5 years old or younger are underweight and malnourished. (Booth, 2018)

The efforts being made to end food insecurity in Haiti are being made by external organizations. These organizations are providing food and money for Haitians. Meanwhile, the government continues to import food from other countries, despite the government not truly being able to afford it. The country is in great debt to other countries with a sum of 4.8 billion U.S dollars being owed (Statista). Haiti did not earn the title "Poorest Country in the Western Hemisphere" for no reason (World Bank). The country can not afford to import food without help. Though organizations send food to those starving and in need of food, this is not a permanent solution and families are still left struggling. Haiti needs to reach the root of their problem and grow out of debt and food insecurity. The way to fix this is by utilizing agriculture.

My solution is to either have the government buy seeds and/or use the seeds from the crops already grown in Haiti to plant more crops. However, buying more seeds and going further in debt is not wise. Haiti may have to continue to lean on organizations to donate the supplies and seeds. If missionaries, government employees, or volunteers can set apart pieces of land for each town, a "community garden" could be made. The cities can range from being scarcely populated, to having large numbers of people. Arable land

could be selected throughout the city, so people from all areas could have access, and there would be enough produce to feed the community. Government officials can work together to form an organized plan of who will take care of the crops at scheduled times and when planting season comes a committee of 15-35 people (and volunteers) can plant the crops. Volunteers and committee members can care for the crops throughout the year. Haiti has a wet and a dry season. Different crops can be rotated, depending on the season. The various crops could be banana trees, which are high in nutrients and perennial. Sweet potatoes which are high in vitamin A and grow in the wet season. Carrots are high in Carotene and grow in the dry season. Rice has minerals and carbohydrates for energy, and corn is planted in the wet and harvested in the dry season. When harvesting time arrives, the same group with preferably more volunteers can harvest the food and it can be distributed and eaten for the next year. The process would repeat every year. In time, people could begin to plant their own crops with a goal to sell them, helping the country work its way out of food insecurity and debt.

My solution has both strengths and weaknesses. One example of a strength is, my solution does not put all the work on one person, the work load is distributed to volunteers. This method can also recover whole communities from food insecurity. It aims at agriculture which is the very best way to fix food insecurity problems. Agriculture practices grow food, and when grown in large amounts large strides can be made to improve the way of life. Agriculture also has a long term effect. After Haiti grows more crops they can begin trading. As stated in the solution, Haiti can bring itself out of debt by trading, and no longer relying on other countries. The weakness is that Haiti is a poor country. If they took a community donation of 5% of the monthly salary, there would not be enough money to buy necessities. Necessities include buying equipment and seeds. The government could pay for supplies, but it may make the country even more in debt. The very best way would be to recieve aid from the USAID, an organization that is already working to help improve Haiti's economy.

My second solution is for Haiti to establish groups of people to do various community services. These services include collecting and growing food and cleaning up the country. For instance, Haiti does not have a structured disposal system. The towns have many trash piles and dumps sitting on arable and non land. A group of 100+ people can clean up the garbage and dispose of it properly, the land can then be used for useful purposes. Arable land can be turned into a field for crops. Non arable land can be treated to become arable land, or become an organized trash disposal site. Another group can collect plant crops to feed and sell them for a low cost. The extras can be donated to those who can not afford to buy the food. However, to ensure people are truthful of how much food is needed, a census can be tallied to determine how many people and who needs more food than others. The careers and family size would make an impact.

The strengths of this solution are that it has a focus on two major problems; with solutions for both garbage disposal and food insecurity. Eventually land could have a long term useful purpose and food insecurity rates would go down. However there are weaknesses to this solution. First off, community members may not be willing to volunteer to pick up and move trash. It would take a great deal of time, and people. It is a long process, where many could instead spend time working, earning money, rather than volunteering. Missionaries, and volunteers from other countries would likely have to be utilized. Another problem is educating people on how to garden, how to distribute the food, and how to dispose of the trash. This solution also calls for a great deal of money for both projects. As previously stated in the first solution, the country would need aid from an outside organization.

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