CLIMATE-INDUCED MIGRATION FROM CENTRAL AMERICA

Honors Thesis

Presented in Partial Fulfillment of the Requirements
For the Degree of Bachelor of Science in Political Science

In the College of Arts and Sciences
at Salem State University

By

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Commonwealth Honors Program
Salem State University
2021

Abstract

This study examines the extent to which climate change is acknowledged as a major driver of migration from Central America, both by experts in the field and by people working for organizations assisting migrants. It relies on secondary sources (including recent reports by the International Organization for Migration), two case studies of Honduras and Guatemala, and primary evidence in the form of semi-structured interviews conducted with a variety of experts. Overall, my interviewees believe that climate change is increasingly a push factor for migration from Central America, especially as it combines (and worsens) other factors. Additionally, they understand that climate refugees should be recognized at the international level. My study confirms experts' findings that the contemporary drivers of global migration are complex and intertwined.

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Acknowledgments

To Dr. Vanessa Ruget: Thank you for your support and motivation throughout this entire process. I could not have done this without your help. I am grateful to have worked with you on this project.

To my respondents: Thank you for your contributions to my study.

Introduction

All around the world “The Great Climate Migration" has begun (Lustgardten, 2020). By 2070, more than 19% of the land will become uninhabitable from a warming planet (Lustgardten 2020). In fact, a 2008 report by the International Organization for Migration estimated that 20 million people have already relocated due to extreme weather events (Flanagn, 2020). In comparison, 4.6 million people have been displaced by conflict and violence. As the range of places where people can live decreases, millions will have to choose between death or risking their lives to find a home elsewhere. People will most likely migrate to somewhere nearby and accessible, either within their borders or to a close country (Newland, 2011).

Though people have been migrating to better climates for centuries (Skinner 2018: 151), the current situation is much different. For the first time in history, people are being forced to leave their homes due to anthropogenic changes in the climate (Skinner 2018: 151). Experts have different estimates regarding how many people worldwide will be displaced by climate change (Newland, 2011), with numbers ranging from 100 to 200 million by 2050. Additionally, although the entire planet will be affected by climate change, certain places are more vulnerable than others. In particular, while developing countries aren’t the main contributors to climate change, they will be the first to experience its impact (United Nations, 2019). According to Ishann Tharoor (2019) for example, Central American countries have seen an influx of climate-related changes in recent years. The longer drought season has reduced farmers' growing season, and in turn

increased food insecurity throughout the region (Tharoor, 2019). Thus, climate change could force up to 1.4 million people to flee from Central America over the next couple decades. People will most likely migrate to somewhere nearby and accessible, either within their borders or to a close country (Newland, 2011). Eventually, many families will be forced to seek asylum in the United States or elsewhere. In response to this influx of migrants due to climate change, countries may allow climate refugees to enter, or choose to secure their borders. Yet, according to Leah Trotman, the current definition of a refugee leaves out those fleeing their homes due to climate change (Trotman 2020: 2). Therefore, migrants are unable to get legal recognition for being displaced and can't cross the border.

My thesis explores how much knowledge people working with migrants (and experts in the field) have about the connection between climate change and migration from Central America. My working hypothesis was that these individuals would have almost direct knowledge of the push factors of migration in Central America. Additionally, if they have that knowledge and advocate for migrants, they could be part of the solution as well. I used interviews to better understand what staff at organizations understand about the factors driving migration. In the first section, I summarize the main findings in this field through my literature review. I then detail my methodology and present my two case studies of Honduras and Guatemala, both countries within the northern Triangle. Next, I summarize my findings from the interviews. I conclude with an analysis of my results.

My study contributes to a new set of theories, called "environmental and climate theories." These theories argue that migration results from "Persons or groups of persons who, for compelling reasons of sudden or progressive changes in the environment that

adversely affect their lives or living conditions, are obliged to leave their homes or choose to do so, either temporarily or permanently, and who move either within their country or abroad." (International Organization for Migration, 2014: 13). Such compelling factors include natural disasters, environmental degradation, and climate change.

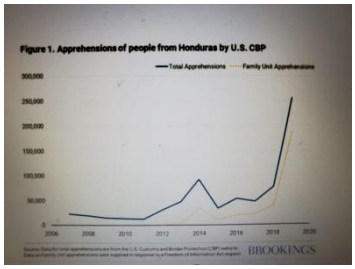
Literature review

My review of the literature uncovered four main themes. These include climate change as a cause of migration, how Central America is specifically affected, the current lack of legal recognition for climate refugees, and potential avenues at the global level for addressing this issue.

Climate-induced migration

Researchers are seeking to understand how the patterns of migration are connected to climate change. There are various methodologies used to study climate-induced migration. Berlemann and Steinhard (2017: 1) distinguish between slow-onset climate change and suddenly occurring disaster events, which might differ in their migration consequences. One of their major findings was that societies that are primarily agricultural will be significantly impacted by climatic changes, like rising temperatures, and heatwaves. Therefore, farmers' crop yields and harvest will be greatly reduced.

Another factor that will play a role in migration is potential increase in violence. Sarah Bermeo and David Leblang (2021) argue that climate change and violence are interconnected drivers of migration from Honduras to the U.S. According to Bermeo et al., between 2012 and 2019, migrants arriving from Honduras at the U.S.-Mexico grew from 513 to 188,368. Findings from a study conducted by Bermeo et al., found that as precipitation decreases, migration flows increase. Amelia Cheatham (2019) writes about who is leaving the Northern Triangle, where they are going, and why they are leaving. Cheatham found that although some migrants go to other parts of Latin America or in Europe, a majority migrate to the U.S. In contrast to prior years when migrants would try to cross the border illegally, as of recently they're surrendering to U.S. border patrol agents to claim asylum. According to Cheatham, in 2018, 13% of all asylum applicants were granted, nearly twice the amount compared to 2015. Cheatham said that the reasons migrants are leaving the Northern Triangle include violence, corruption, and lack of job opportunity --in addition to food insecurity from "unpredictable weather" patterns.



Source: Bermeo et al., 2021

Understanding the roots of migration is a key aspect to seeing the whole picture of climate-induced migration. Kathleen Newland (2011) writes about the importance of using migration dynamics as a way to fully understand the impact of climate change. According to Newland, migration dynamics recognizes the various reasons driving people's movement. Although climate change is not the sole reason for migration, it exacerbates already existing issues and vulnerabilities within a country. Researchers Kathleen Neumann and Henk Hilderink also found that environmental change is rarely

the only reason why people migrate (Neumann et al. 2015: 1) but that it often works in combination with other causes of migration. This makes the relation between migration and climate change difficult to study, especially considering the lack of data on the connections between these factors.

Researcher Adam Wernick agrees with Neumann and Hilderink that climate change is often an overlooked driver of migration from Central America. Although there are many other factors, such as violence and poverty, climate change as an underlying reason is ignored. For example, the so-called “caravans” in 2018, filled with migrants fleeing to the US, came because of a five- year long drought (Wernick, 2019). The drought caused farmers to struggle with massive amounts of crop loss. As Wernick explains, farmers don’t want to have to leave and give up land that they became attached to. It’s therefore usually out of desperation that people choose to migrate to the U.S. Therefore, it’s important to recognize climate change as a driving factor of migration. Another example when climate change caused migration was during the Syrian war. According to Tom Daschle and Michael Werz, between 2006 and 2011, over 60 percent of the Syrian territory experienced the worst long-term drought in history (Daschle et al., 2016). Similarly, as Andrea Milan and Sergio Ruano point out, although migration may seem to be mainly caused by economic issues and food insecurity, at the core it can also be spurred by climate change (Milan et al. 2014: 64).

Opinion polls show that many people agree with these academic findings. A Lloyd's Register Foundation World Risk poll report found that “the majority of people globally believe that climate change poses a threat to the next generation in their countries,” (Rzepa et al., 2020). The

survey, conducted face-to-face and by phone, included over 154,000 adults in 142 countries. Respondents who were most likely to see climate change as a real threat were in Latin America, the Caribbean, and Southern Europe. Despite the fact that the U.S. is one of the largest contributors to climate change, the poll reported a high amount of climate change skeptics from there.

Background on climate refugees from Central America

The Northern triangle, which consists of Honduras, Guatemala, and El Salvador, is especially susceptible to climate change. Researchers are exploring how climate change is driving migration from these countries in Central America. Mendez (2020: 436) describes what's happening in Honduras as a "silent violence." According to Mendez, climate change has impacted Honduras through an increase in extreme weather, and conditions such as droughts, hurricanes, flooding, and landslides. In order for a migrant to seek asylum status, they need to provide evidence that they're being persecuted in their home country. However, climate change does not fall into that category, so, as a result, climate refugees aren't recognized legally (Mendez 2020: 438).

Another country in the Northern Triangle, Guatemala, is also vulnerable to a changing climate. Specifically, the Western Highlands region of Guatemala, which extends from Antigua to the Mexican border, is seeing devastating effects already (Blitzer, 2019). Farmers in the area are suffering from longer periods of droughts and extreme weather events. The dry corridor is continuing to expand, even into the west of Guatemala. In recent years this has led to an increase in Guatemalan migration. According to Blitzer

(2019), there were fifty thousand families detained at the U.S.-Mexico border in 2018, which is twice the amount from a year prior. A majority of these migrants have come from the Western Highlands. Blitzer describes how climate change is fueling the U.S. border crisis. Former President Trump's response was to ban asylum all together (Blitzer, 2019).

According to Ishann Tharoor (2019), a writer from *The Washington Post*, longer periods of droughts in Central America have significantly reduced farmers' growing season. According to Tharoor, a 2016 United Nations' Food and Agriculture Organization report found that close to 1.6 million people in Central America face food insecurity because of climate change. Eventually, families are forced to leave their homes and to attempt to cross the border. A 2017 survey from the World Food Program on Central American migrant families similarly found that almost half of them had migrated from their country because of food insecurity (Tharoor, 2019). Tharoor says that climate change could force up to 1.4 million people to flee from Central America over the next couple decades. Finally, a 2018 World Risk poll, done by Julie Ray and Neli Esipova, estimated how many migrants would like to come to the U.S. They found that 33% of Central Americans, or around 10 million adults, said they would like to move here. It is unclear from this poll whether or not climate change is a major push factor.

Lack of international legal recognition for climate refugees

According to Shea Flanagan (2020), climate refugees are not protected at the international level. The 1951 Geneva Refugee Convention defines a refugee as "someone

who is unable or unwilling to return to their country of origin because of a well-founded fear of being persecuted for reasons of race, religion, nationality, membership of a particular social group or political opinion, is outside the country of his nationality and is unable or, owing to such fear, is unwilling to avail himself of the protection of that country" (United Nations High Commissioner for Refugees). In comparison to a refugee, an asylum seeker is “someone who is seeking international protection but whose claim for refugee status has not yet been determined” (Phillips, 2011). Crucially, climate disruption, which has displaced millions of people, is not covered by that definition. The U.S. also uses UN conventions and protocols to define what a refugee is (American Immigration Council, 2020).

Flanagan further argues that the U.S., which has contributed to climate change more than most countries in the world, should take action to mitigate the impact for countries that have contributed less. In order to do so, asylum law needs to include climate change refugees. Shea says it would be “unethical and unjust” if the U.S. doesn’t incorporate those fleeing from climate disruption (Flanagan, 2020). Additionally, Flanagan says that Temporary Protected Status, which is a status given to nationals from certain countries affected by armed conflict or natural disaster,
would be insufficient because it’s only a temporary solution. Climate refugees won’t necessarily be able to move back to their home country after coming to the U.S.

Leah Trotman (2020: 7), agrees with Flanagan that the current definition of a refugee leaves out those fleeing their homes due to climate change. One consequence of climate refugees not being included, is that they’re unable to be recognized internationally by the UN and receiving countries when migrating. On the U.S-Mexico border this has become

a problem for migrants. Trotman insists on using the term climate refugees throughout her article to talk about climate-induced migration. Lea Merone and Peter Tait (2018: 1) also discuss the current debate about the term climate refugees, and its legal implications. They compare definitions of the terms refugees and migrants. Similarly to Trotman (2020), Merone and Tait discuss how the current definition of a refugee leaves out those who are displaced by climate change. Therefore, these migrants can't access the same protection as others who are included in the definition. One example is that, in recent years, farmers have been suffering from a coffee rust disease caused by warmer temperatures. The question is how farmers could prove this to an immigration officer.

Potential legal solutions

Experts have explored various legal solutions to the growing issue of climate-induced migration. Frank Biermann and Ingrid Boas (2008) discuss a potential global protocol for climate refugees. According to Biermann et al., at a United Nations Charter meeting in April 2007, UN officials recognized climate-induced migration as a potential threat to future stability. They argue that the UN Security Council is inadequate for dealing with climate refugees for a number of reasons (Biermann et al. 2008: 12). Additionally, the United Nations High Commissioner for Refugees is currently not well equipped to deal with the influx of refugees from climate change.

Instead, Biermann et al. propose a regime specifically made for climate refugees. There are five main principles to this agreement. Firstly, there needs to be a concrete plan to resettle climate refugees over a span of years. Second, they must be acknowledged as permanent immigrants, since it's unlikely they'll be able to return home. Third, instead of

focusing on individuals like the UN currently does, whole populations need to be taken into consideration. Fourth, protection and support will be concentrated on those inside territories. Lastly, climate refugees must be recognized internationally.

To summarize, evidence suggests that climate change is causing an influx of migrants from all around the world and that certain regions, like Central America, are more vulnerable to this evidence suggests that climate change is causing an influx of migrants from all around the world and that certain regions, like Central America, are more vulnerable to this evolving crisis. Yet, the existing international framework has not kept pace with these changes, leaving climate refugees unorganized and unprotected. Additionally, it is still unclear how much climate change is recognized as a major driver of migration from Central America, including by organizations that are assisting them.

Methodology

To explore this topic, I completed two case studies of how climate change has impacted migration in Guatemala and Honduras. Additionally, I collected primary evidence in the form of ten semi-structured, qualitative, interviews conducted with experts in the field, and with staff at organizations that work with migrants from Central America. Interviews were conducted remotely on Zoom in March and April 2021. At first, I contacted organizations within Massachusetts. However, most of them didn't get back to me. Therefore, I reached out to personal contacts and was able to arrange interviews with

organizations located in Chicago, Illinois, San Francisco, California, New York City, and Easthampton, Massachusetts--including private law practices and migrant support organizations such as the Immigrant Legal Resource Center of San Francisco, Sanctuary Neighborhood of NYC, Bethany House of Hospitality of Chicago, and Community Health Academy of the Heights in New York City. Additionally, I spoke with three Salem State professors who are experts in the field: Dr. Noel Healy, Dr. Avi Chomsky, and Dr. Robert McAndrews. I received IRB approval in order to conduct these interviews.

Case Studies

Honduras and Guatemala, similarly to other developing countries, have contributed considerably less to climate change than most developed countries. Yet, they will be feeling its impact first. These two countries are part of the Northern Triangle, which is especially susceptible to a changing climate and longer periods of droughts. By 2050, 4 million people from Mexico and Central America could become climate migrants (Gustin, 2019). However, the most vulnerable will be unable to migrate and become "trapped" in certain areas (World Bank, 2018).

Guatemala

Since the 1990s, migration has played a key role in Guatemala. According to the Migration Data Portal, as of 2020, Guatemala's migration stock abroad was 1.4 million. The estimated number of Guatemalans in the United States as of 2016 was 927,593 (IOM). In 2019, remittances represented 13.1% of the country's GDP (Migration Data Portal). Also in 2019, 119.5 thousand Guatmealans attempted to gain asylum in the U.S.

(Migration Data Portal). The Groundswell report from the World Bank (2018) describes where environmental migrants are going and where they are coming from in Guatemala. Researchers found that migrants moving outside the country tend to originate from places that are facing lack of access to water and lessening crop productivity, as well as cities that are impacted by sea-level rise, such as the Pacific coast of Guatemala (World Bank). In addition to external migration, there is also significant in-country migration. Guatemalans are migrating from hot and low-lying areas to more livable climates (World Bank, 2018). These internal migrants tend to be from the highlands of Guatemala.

A National Geographic article, written by Gena Steffens (2021), reported that Guatemala is listed in the top 10 countries most at risk to be impacted by climate change (2018). This is in part due to the geographic location of the country. The so-called "Dry Corridor," which passes through Guatemala, Honduras, and El Salvador, is susceptible to global warming. This has impacted crops such as corn, which is a key part of the diet in that region (Gustin, 2019). According to the Food and Agricultural Organization (FAO) of the United Nations, "The Dry Corridor in Central America, in particular Guatemala, Honduras and El Salvador is experiencing one of the worst droughts of the last ten years with over 3.5 million in need of humanitarian assistance" (Werrel et al., 2019). A study done by the Food and Agriculture Organization (FAO) and UN World Food Programme (WFP), found that 8 percent of families in the Dry Corridor, many of whom were farmers, intended to migrate in response to harsh weather conditions (Pons, 2021).

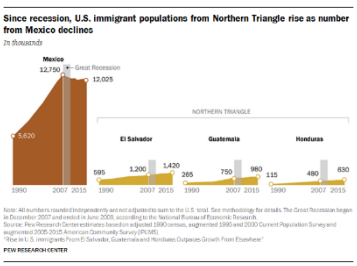
Source: Migration Policy Institute

Furthermore, El Niño, which happens every 2-7 years, is becoming more intense, powerful, and unpredictable (Steffens, 2018). One effect of El Niño is to worsen droughts. As Abrahm Lustgarten wrote in a *New York Times* article (2020), "Rainfall is expected to decrease by 60 % in some parts of the country, and the amount of water replenishing streams and keeping soil

moist will drop by as much as 83 percent." With droughts worsening, food insecurity increases as well. As Steffens reported, "Guatemala has the fourth-highest level of chronic malnutrition in the world, and the highest in Latin America" (Steffens, 2018). Another study from the World Food Program found that the main driving factor of migration for families living in the Dry Corridor was drought related consequences. These include a lack of food, money, and work (Steffens, 2018).

Honduras

Migration also plays an important, and increasing, role in Honduras. According to the Migration Data Portal, in 2020, Honduras' migrants stock was around 985 thousand. The estimated number of Hondurans in the United States as of 2016 was 599,030 (IOM).

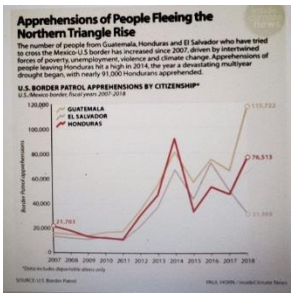


Source: Cohn et al., 2017

Additionally, the Pew Research Center found that from 2007 to 2015, the number of immigrants in the United States from El Salvador, Guatemala and Honduras rose by 25% (Cohn et al., 2017). In terms of economic benefits, in 2019, remittances represented 22% of the country's GDP (IOM).

Although all of Honduras will be impacted by climate change, the Western part of the country in particular is predicted to see rising temperatures detrimental to people's livelihood (Gustin, 2019). One factor that is contributing to rising temperatures in the country is deforestation. It's estimated that between 1990 and 2005, the country lost at least 30 percent of its tree cover (Gustin, 2019). When there were large pine forests throughout the country, the trees helped lower temperatures, limited erosion, and prevented rainfall from going down the hillsides and taking important soil with it (Gustin, 2019).

Another factor contributing to the changing climate in Honduras is El Niño. Experts have found that there is a connection between the onset of El Niño in 2014 and an increase in emigration to the U.S. from Honduras (Barreto, 2017). El Niño has negatively affected food security at the local level and reduced work opportunities in agriculture. Even after El Niño, Honduras was hit by another drought (Werrell, 2019). The World Food Program found that "families affected by the drought are 1.5 percent more likely to emigrate than similar households elsewhere" (Werrell,2019). Although this may seem like a low percentage, it shows that there is a connection between the drought and emigration. According to Gustin, in 2007, 52,000 migrants were apprehended at the U.S.- Mexico border. In comparison, in 2018, there were 224,000 apprehended. Furthermore, 91,000 of those 224,000 were Hondurans.



Source: U.S. Border Patrol

The most recent examples of a climate disaster in Honduras were hurricanes Eta and Iota, which hit the country within a two-week span in 2020 (Pons, 2021). These were

devastating hurricanes that left millions without access to basic necessities such as food, water, and shelter (Tucker et al., 2020). Such events have forced people to attempt to migrate towards the U.S.-Mexico border (Tucker et al., 2020). One caravan of migrants involved 8,000 Hondurans in early 2021 that was stopped in Guatemala (Pons, 2021). Some Hondurans feel that the government's response to the hurricanes hasn't been sufficient. Tucker (2020) reported that "Two days before the first hurricane arrived, the Honduran government was still promoting a tourism fair to revive the economy, instead of warning the population to take preventive measures."

To sum up, climate change is beginning to push people out of both Guatemala and Honduras, which are a part of the Northern Triangle. The number of environmental migrants will only continue to rise as the climate becomes unlivable in this region. Droughts and natural disasters, such as hurricanes, are already worsening and creating food insecurity within these countries. By 2050 the number could increase to 4 million throughout Mexico and Central America (Gustin, 2019).

Interviews

I interviewed people working in various fields. These include two teachers, two directors of organizations, two lawyers, one professor, and one graduate student. There were both similarities and differences among what they had to say. In this section of the paper, I discuss the key findings that emerged from these interviews.

I asked respondents what they thought were the main pull factors for migrants. Most interviewees agreed that gang violence, poverty, domestic violence, and natural disasters

were reasons people left Central America. Andrew Craycroft[1], lawyer at the Immigrant Legal Resource Center in San Francisco, added that family reunification for young people is another reason[1]. None of the interviewees mentioned climate change at first. However, once I asked about it, they admitted it might be one of the driving factors. For example, Darlene Gramigna[2], Executive Director at the Bethany House of Hospitality in Chicago, said "Some have come from areas where there have been volcanoes erupting, flooding, and hurricanes. They don't have a place to live anymore and the government doesn't have the infrastructure to support them."[2] Pamela Kallimanis[3], a Graduate student at SUNY in the International Migration Studies program, concurred that "A lot of climate change is going to affect the southern hemisphere. It'll be interesting to see who's fleeing and why." Elsabel Rincon[4], founder of the Welcome Immigrant Network since 2012, explained "While a single factor might be the main driver, it's usually a combination." She added "I think the impact of climate is one of those factors that can be added to the mix but doesn't act alone."[4] Rincon further explained "If there's a hurricane or flooding, and someone lives in an agricultural area, that could have a greatly negative impact on that year's crop. That is a whole year's worth of earnings that the family loses. For a very low-income family, it could be starvation."

Another question I asked respondents was about the lack of legal international recognition for climate migrants. Rebecca Stanton[5], ENL Educator and Department Co-Chair of Community Health Academy of the Heights, said "Climate refugees not being

[1] Interview with Andrew Craycroft March 15, 2021
[2] Interview with Darlene Gramigna, March 5, 2021
[3] Interview with Pamela Kallimanis, March 23, 2021
[4] Interview with Elsabel Rincon, April 4, 2021
[5] Interview with Rebecca Stanton, March 10, 2021

recognized internationally is a huge issue. People from the United States have a responsibility to these countries that we have oppressed because we are a major contributor to environmental issues." In comparison, Tara Geer[6] observed that "At first I thought that climate didn't play a role but it does. When you have that kind of upheaval in a country where there is no solid good government, or no structures in place to deal with it, it ends up resulting in really dangerous chaos." She added that "you can't get asylum in the United States if you are poor or if you are hungry. There's a whole bunch of reasons why people come and then there's what they have to tell people when they get here."[6] In response to the question about legal recognition, Rincon said "It's going to end up changing soon as we advocate more for strategic action around climate change." She added "When you look at the definition of a refugee, these individuals are escaping incredibly unstable countries where they are exposed to violence and persecution through organized crimes. Then you add the climate component to it and I just don't understand why we're not treating these individuals as refugees and providing them some humane protection."

On the topic of climate refugees not being recognized, Craycroft thought that "the law doesn't provide us a space to do that. We don't have a reason to talk to our clients about that because there's no legal protection which is really disappointing." Craycroft added "Climate is another example of one of those grounds where asylum should absolutely be granted but the U.S. just won't do it." Cristina Carrier[7], an immigration lawyer, thinks that climate change being recognized legally is "a conversation we should all be having." From her experience she knows that "There are so many groups of people that need

[6] Tara Geer, March 11, 2021
[7] Interview with Cristina Carrier, March 20, 2021

asylum for so many reasons that aren't recognized." She explained that "When it gets to the economy that's when people start paying attention."

Several of my respondents also brought up the subject of the United States immigration system. Stanton said that through the current immigration system "We're creating more trauma for these migrants instead of welcoming them like we should." Geer said something similar, which was "The way the U.S. is using immigration now is punitive. We're traumatizing and harming people in an attempt to keep them away. It's not humane, it's just not right." Kallimanis also said "There's sort of this impression in the public that there's like a line of people [*seeking to enter the United States*] and that's not really what's happening. People come to visit and overstay their visas. That's really how most people are arriving. Although there are people crossing the border through the desert and coming through Mexico, by and large, most people just come to visit relatives and just stay."

Respondents provided other interesting context. For example, Kallimanis said, "People tend to move into big cities when they first arrive, although there are trends where migrants are coming and going right into suburbs like working in a meat packing plant in Pennsylvania somewhere." In particular, Miami, Texas, Houston, and NYC have been hotspots for migrants coming from Central America to the U.S. (Budiman, 2020). Kallimanis concluded by saying that "The global
elite will keep finding ways to avoid climate change and resettle, because they will be able to do that." In other words, the ability to avoid the impacts of climate change doesn't apply to people who are not from the elite.

Analysis and Conclusion

This study suggests that climate change will increasingly become, and be recognized as, a major driver of migration, often in combination with other factors. Specifically, my case studies of Guatemala and Honduras show that the geographic location of these two countries make them more susceptible to a changing climate. In particular, conditions are worsening in the Western part of Honduras and the Dry Corridor that runs through Guatemala, driving migration. Both countries have been hit hard by a more intense and longer El Niño. As mentioned above, El Niño has negatively affected food security at the local level and reduced work opportunities in agriculture.

According to CNN, close to 100,000 migrants arrived at the US - Mexico border in February of 2021, which is 24,000 more than in February 2019 (Alvarez, 2021). The current "crisis" at the border is in part driven by climate-related disasters. For example, Honduras was hit by two devastating hurricanes in the Fall of 2020, which has impacted at least four million people throughout the country, or close to half the population (Kitroeff, 2021). As President Biden mentioned in his Address to Congress on Wednesday, April 28, 2021, it's not only violence, corruption, political instability and gangs that are pushing people to migrate out of Central America--but also a changing climate and environmental disasters. Recently, President Biden announced that he would dedicate $4 billion to tackling the root causes of migration. Additionally, he chose Vice President Kamala Harris to "work with Central American leaders to better conditions in those countries" (Kitroeff, 2021). As President Biden mentioned in his Address to Congress on Wednesday, April 28, 2021, it's not only violence, corruption, political instability and gangs that are pushing people to migrate out of Central America--but also

a changing climate and environmental disasters. Recently, President Biden announced that he would dedicate $4 billion to tackling the root causes of migration. Additionally, he chose Vice President Kamala Harris to "work with Central American leaders to better conditions in those countries" (Kitroeff, 2021).

There were two overarching lessons from my semi-structured interviews. First, they revealed that people who work with migrants understand the connection between climate change and migration. My interviewees did not always immediately bring up a changing climate as a cause of migration --but they always concurred with me after I did. The second main take-away is that the current immigration system has flaws and needs significant changes. In particular, my interviewees agreed that legal recognition for climate refugees is long overdue. However, there is little room in the current legal system to do so, as Craycroft mentioned, a lawyer at the Immigrant Legal Resource Center in San Francisco.

Currently, climate change on its own is not sufficient ground for people to claim asylum. As mentioned by one of my interviewees, experts and advocates in the field should organize to bring about change. For example, Biermann et al. recommend creating a specific regime that would protect climate refugees (Biermann et al., 2008: 12). The implementation of this Protocol would be through already existing UN agencies. It's a significant step to take for a number of reasons. First, it could help climate refugees by connecting their protection to the climate regime, including "future advances in climate science in defining risks for people in certain regions" (Biermann et al., 2008: 12). Second, the protocol could add to the political support from many countries as "parties to the climate convention" (Biermann et al., 2008: 12). Third and finally, since there's more

pressure from developed nations to include developing nations in a global “mitigation regime” with certain goals, this protocol could give developing nations a chance to negotiate (Biermann et al., 2008: 12). According to Biermann, the protocol would rest on the five principles that I described above.

There were two limitations to my study. The first is the relatively small number of experts that I was eventually able to interview. Additionally, my data is not sufficient to provide a historical perspective on the push factors of migration from Central America to the United States. Instead, my study only offers a snapshot of this topic. Lastly, I learned that climate-induced migration is a very complex issue. For instance, there is no clear way to tell whether or not someone migrated solely because of climate change, since there can be so many different factors involved.

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