

**Researchers**

Mushfiq Mobarak  
Yale University

C. Austin Davis  
Yale University

Paula López-Peña  
Yale University

Shabib Raihan  
Senior Research Associate

**Timeline**

2020

**Sample Size**

909 households

**Research Implemented by IPA**

Yes

# COVID-19's Prevalence Among Rohingya Refugees and Host Communities in Cox's Bazar, Bangladesh

## Abstract

Forcibly displaced people often live in overcrowded camps in countries with struggling health systems, making this population highly vulnerable to COVID-19. In the Cox's Bazar district of Bangladesh, where large numbers of Rohingya refugees have settled in recent years after fleeing Myanmar, researchers worked with IPA to administer a phone-based survey to households in both refugee camps and nearby host communities. Preliminary results show a high prevalence of common COVID-19 symptoms, with 25 percent of camp residents and 13 percent of host community members reporting at least one. While respondents generally reported high levels of knowledge about respiratory hygiene and COVID-19 transmission, attendance at religious and social events remained common, threatening efforts to contain the spread of the disease and suggesting that social influence interventions may be effective.

## Policy Issue

The global population of forcibly displaced people is highly vulnerable to COVID-19. Eighty percent of the world's 25.9 million refugees reside in low- and middle-income countries, often in overcrowded camps, with health systems struggling to cope with the needs of the host population.<sup>1</sup> Since these places lack adequate diagnostic tests, personal protective equipment, and treatment infrastructure, promoting behavior that minimizes the pandemic's spread is critical. However, to design effective behavioral interventions, decision-makers

need baseline information often unavailable in refugee settlements and their host communities—namely, about the prevalence of COVID-19 symptoms and associated risk factors, and about behavior such as information-seeking and prevention practices.

## Context of the Evaluation

Since August 2017, over 742,000 Rohingya refugees have fled Myanmar for Bangladesh. Most of these people have settled in the Cox's Bazar district, near Bangladesh's southern border with Myanmar, and refugees now constitute more than a third of Cox's Bazar's population.<sup>2</sup> Rohingya refugees in Cox's Bazar are an economically vulnerable population, with lower earnings and educational attainment and higher numbers of dependents relative to working-age household members on average than members of the Bangladeshi host community.<sup>3</sup> The vast majority of refugees in the district live in densely populated camps and depend on emergency aid to cover their daily needs.

To better understand the impacts of the recent arrival of this large number of refugees, researchers have been collecting detailed social, economic, and health data from both refugees and Bangladesh nationals in the region in an ongoing project called the [Cox's Bazar Panel Survey](#) (CBPS). In this project, researchers returned to CBPS participants during the COVID-19 crisis in April 2020.

## Details of the Intervention

Researchers worked with IPA to administer a phone-based survey to 909 households in Cox's Bazar to better understand the prevalence of COVID-19 symptoms in refugee and host communities and their correlates with current and pre-COVID-19 living conditions. All participants were chosen from a household panel representative of Rohingya refugees and the host population and asked about a COVID-19 symptoms checklist (consisting of fever, dry cough, and fatigue or tiredness), returning migration, employment, and food security. A random subset of 460 households were also asked about health knowledge and behaviors.

## Results and Policy Lessons

*Note: Results are preliminary and may change after further analysis.*

Overall, COVID-19 symptoms were highly prevalent in Cox's Bazar, particularly in refugee camps. While most respondents reported good respiratory hygiene knowledge and practices, attendance at religious and social gatherings threatened to accelerate the spread of the disease.

**Living conditions:** Housing conditions conducive to community transmission of COVID-19 are more prevalent in refugee camps than in host communities; households in refugee camps are significantly more likely to share toilets and water sources, and as many as 31 percent of households in camps share a toilet with more than 25 people (compared to zero percent in the host community).

**Access to food:** In both refugee camps and host communities, over half of respondents were unable to buy essential food items in the previous seven days (72 and 59 percent, respectively). Over half of those households in both groups resorted to buying lower quality or cheaper food items (54 and 63 percent, respectively), and nearly half skipped meals or reduced food portions (43 and 47 percent, respectively).

**Prevalence of COVID-19 symptoms:** 25 percent of camp residents and 13 percent of host community residents reported at least one of the three most common COVID-19 symptoms. Households reporting inability to buy essential food items reported higher prevalence of symptoms, as did households where a migrant had returned in the two weeks prior.

**Treatment-seeking behavior:** Pharmacies were the first stop for advice and treatment among those who experienced at least one symptom; among refugees, health information providers in camps were the second most common healthcare provider.

**Knowledge about COVID-19 and health behaviors:** The vast majority of respondents were aware of the importance of good respiratory and household hygiene practices; for example, 85.9 percent of respondents in camps and 79 percent in host communities knew that exposure to asymptomatic carriers can spread the virus, and the vast majority of respondents had a surgical or homemade mask to wear outside the home. However, large numbers of respondents also reported attending social gatherings; 77 percent of respondents in camps and 52 percent of respondents in host communities had attended a special religious event in the week before the survey. Camp dwellers were more likely to attend non-religious social gatherings, with 53 percent reporting avoiding social events compared to 66 percent of host community members.

These results suggest that refugee camps render their dwellers vulnerable to infectious diseases like COVID-19, posing risks both to refugees and host communities. While most respondents understand how COVID-19 is transmitted and practice good respiratory hygiene, engagement in risky social gatherings and communal prayers remains common, suggesting that social influence campaigns encouraging people to share information about COVID-19 and encourage others to adhere to public health recommendations may be an effective response. In addition to trusted friends, neighbors, and acquaintances, religious leaders and pharmacists are promising outlets to disseminate life-saving information.

## Sources

Lopez-Pena P, Austin Davis C, Mushfiq Mobarak A & Raihan S. Prevalence of COVID-19 symptoms, risk factors, and health behaviors in host and refugee communities in Cox's Bazar: a representative panel study. [Preprint]. *Bull World Health Organ*. E-pub: 11 May 2020. doi: <http://dx.doi.org/10.2471/BLT.20.265173>

<sup>1</sup> UNHCR, "[Q&A: Access to health services is key to halting COVID-19 and saving refugee lives](#)" (2020); UNHCR, "[UN Refugee Agency steps up COVID-19 preparedness, prevention and](#)

response measures” (2020).

<sup>2</sup> UNDP, “Impacts of the Rohingya Refugee Influx on Host Communities” (UNDP Report, 2018).

<sup>3</sup> Davis et al., “Socioeconomic Characteristics of Rohingya Refugees from Myanmar Living in Bangladesh.” (IPA Policy Brief, 2020).

May 19, 2020