

Tanya Carney
Nelson Institute for Environmental Studies
Environment & Resources M.S.

Scott Kloeck-Jenson 2020 International Internship Fellowship Report

Thanks to the generous support of the Scott Kloeck-Jenson International Internship Fellowship I was able to successfully conduct my thesis research in Senegal. Although awarded in 2020, I was unable to travel until the fall of 2021 due to COVID-19 restrictions. The fellowship made it possible for me to spend four months in the field collecting data to contribute to my research on the intersection of climate change, agriculture, and technology as it relates to international development. Specifically my research explores how climate information services (CIS, essentially the dissemination of meteorological and other science-based, agriculture-relevant climate information to farmers) impact smallholder farmer knowledge and behavior in West Africa, including how CIS is used in conjunction with other forms of knowledge to make decisions. While there is a lot of research and existing scholarship related to user demographics and specific outcomes of CIS adoption, there is very little literature on how CIS changes how farmers think about climate/weather and how their knowledge and actions are impacted by the receipt of new, science-based information. My research hopes to fill this gap.

During my stay in Senegal I was an intern at the International Crop Research Institute for the Semi-Arid Tropics where I collaborated on the Accelerating the Impact of CGIAR Climate Research for Africa (AICCRA) project, a World Bank-funded initiative aimed at enhancing access to climate information services and validated climate-smart agriculture technologies in Africa. The program spans six countries in East and West Africa—Senegal, Ghana, Mali, Ethiopia, Kenya, and Zambia—and I had the pleasure of working closely with the entirety of the Senegal team.

While in Senegal I split my time between Dakar, the capital, and Meouane, my field site. In Dakar I was able to meet the heads of the AICCRA program as well as important members of collaborating organizations and representatives of the World Bank. I was also able to attend high-level conferences where I was able to expand my network through introductions to scholars, representatives from ANACIM (the meteorological agency of Senegal), and other local and global stakeholders. These meetings and interactions increased my understanding of the AICCRA program, the work of ANACIM, the role of local organizations, and the intricacies of working within the climate change and agricultural sectors in Senegal. They also helped me ground my research by gaining a historical understanding of previous work that has influenced the design and implementation of AICCRA. In Dakar I was also able to recruit five research assistants who traveled with me to Meouane to conduct surveys in Wolof and later translate the responses into French for analysis. My time in Meouane allowed me to not only gather survey data, but to also understand the context and constraints farmers in the region operate within. I also benefitted from side conversations with interlocutors and other community members who spoke French which gave me detailed insight into current concerns, recent weather phenomenon, and hopes for the future, among other things.

The outcome of this research will help inform AICCRA strategies and programming through a stronger understanding of the potential and constraints of CIS and the realities subsistence farmers face in rural Senegal. Further, by better understanding how science-based information received through CIS impacts farmer knowledge and behavior, I hope this research can contribute towards developing strategies to increase the local and regional capacity of farmers to combat the effects of climate change and increase their food security.

This research would not have been possible without the support of this fellowship and for that I am indebted to the kindness of the Scott Kloeck-Jensen family. I sincerely hope this research helps contribute to Scott's legacy.