



MDP 2019 Summer Practicums and the UN Sustainable Development Goals (SDGs)

> Avery Baker, Robert Hartwell, Jake Meyers, Abdul Sigal

The UN Sustainable Development Goals (SDGs) are: "the blueprint to achieve a better and more sustainable future for all."



"The SGDs address the global challenges we face, including those related to poverty, inequality, climate, environmental degradation, prosperity, and peace and justice."



The UA School of Geography and Development awarded small grants to students for research, collaboration, and engagement relating to the UN <u>Sustainable Development Goals</u> (SDGs) for summer 2019.

The program is supported by a grant from the UA Research Office to School of Geography and Development Director Professor Diana Liverman.







In summer 2019, several MDP students received awards to work on field practicums related to climate and environment in the context of the SDGs.

These following slides, developed by each award recipient, report on how their practicum work connected with specific SDGs.

MDP students and SDG award recipients (from left to right) Abdul Sigal, Robert Hartwell, Avery Julian Baker, and Jake Meyers.



Avery Julian Baker Improved Seed Distribution in Rural Nepal Community Profiles & Surveys

Avery's practicum was conducted in the Tanahun District of Nepal in conjunction with the USbased agency GreaterGood.org and the Nepali NGO Asta-Ja Research & Development Centre.

Phase I, Community Profile/Assessment: Examined topics including geography/infrastructure, living conditions, demographics, food security, agriculture/livelihoods, migration, and income/employment.

Phase II, Midline Evaluation Survey: Conducted household surveys to measure issues including income, land use and livestock, vegetable production, and use of seeds, fertilizers, and pesticides.





Avery Julian Baker Improved Seed Distribution in Rural Nepal Community Profiles & Surveys:

From interviews, Avery's project found that many families exist on **50,000 rupees or less annually.** Respondents in all five villages reported major concerns about lack of access to water, irrigation, and roads/infrastructure.

An extreme hail event had just destroyed crops in the villages. Subsistence agriculture communities are in jeopardy due to increasingly unpredictable weather.

Capacity building is difficult due to a heavy reliance on remittance income (money sent from family overseas) and the increasing prevalence of climate variability.

Projects like these are an *invaluable capacity-building tool* for communities. This theme came up time and time again in interviews!



Robert Hartwell Kenya Youth Employment & Skills Program Impact Evaluation







Robert Hartwell Kenya Youth Employment & Skills Program Impact Evaluation

During his practicum through RTI, an international NGO, Robert conducted an impact evaluation of the Kenya Youth Employment & Skills (K-YES) Program.

He focused on the effects of K-YES trainings on youth employment, social and personal development outcomes.

Robert assessed the impact of the program's Agribusiness, Business Skills & Entrepreneurship, Vocational and Life Skills trainings on youth outcomes.

The evaluation was used to enhance both current and future K-YES evaluations, leading to more informed future programmatic decision making.

Robert Hartwell Kenya Youth Employment & Skills Program Impact Evaluation





Steve Nderi (a K-YES youth beneficiary who now serves as a community leader in Nyeri county) and Robert developing culturally relevant survey questions for the impact evaluation.



K-YES staff participated in a variety of innovative team-building activities after a long day of presentations during the 2019 Fiscal Year Work Planning Retreat at Lake Nakuru National Park. Jake Meyers Programme for Climate-Smart Livestock Systems Applied Social Science







Jake Meyers Programme for Climate-Smart Livestock Systems Applied Social Science

Working with International Livestock Research Institute (ILRI) in Nairobi, Kenya, Jake studied the social dimensions of climate change adaptation. He focused on the ability of humans and natural systems to cope and adjust to the impacts of climate change.

Jake also examined how the institutional problem of "maladaptation," which is the concept of a project "doing more harm than good." Jake interviewed members of ILRI's Programme for Climate Smart Livestock (PCSL) team about interdisciplinary approaches to climate interventions.



Jake Meyers Programme for Climate-Smart Livestock Systems Applied Social Science



Jake visited Kapiti Research Ranch with ILRI staff to learn how bio-physical and social scientists are working together to mitigate greenhouse gas emissions in livestock systems while simultaneously adapting them to the impacts of climate change.



Jake worked with the Mazingara Institute to produce a digital story for public policy makers to become more aware of how urban agriculture can help tackle Nairobi's growing problem of climate change, population increase/urbanization, and food security.



Abdul Sigal, Sustainable Land Management for Pastoralists in Ethiopia, *Case-Study Evaluation*

Partnering with International Livestock Research Institute, Abdul conducted a case study on sustainable land management (SLM) practices by pastoralists in the Borana and Somali areas of Ethiopia.

He investigated the driving factors leading some farmers to make investments in SLM while others do not.

The findings of this study will contribute to improved sustainable land use planning in the region and towards achieving aspects of the SDGs.



Abdul Sigal, Sustainable Land Management for Pastoralists in Ethiopia *Case-Study Evaluation*

Intersections with SDGs:

- Halt and reverse land degradation leading to improved soil, forage, and water quality (SDG 15)
- Improved food security and income from better livestock production (SDG 1 & SDG 2)
- Mitigate the impact of climate change through SLMs such as tree planting (SDG 13)

Abdul Sigal, Evaluating Sustainable Land Management in Ethiopia *Case-Study Evaluation*





Degraded land with no sustainable land management practices on it in Borana, Ethiopia



Land rehabilitated land through sustainable land management practices in Borana, Ethiopia



