Specialized pastoralism emerged in Kenya around 3000 years ago and has adapted with changes in the social and ecological landscape to this day. In Kenya’s Central Rift Valley and neighboring plains, pastoralist groups co-existed with indigenous foraging populations for centuries before the arrival of iron-using and –producing farmers in the region. Here, I use stable isotope analysis of archaeological cattle and caprine teeth from Savanna Pastoral Neolithic sites in Kenya to examine how crucial mobility was in maintaining herds before the appearance of agricultural groups. Through intratooth sequential sampling of tooth enamel, which presents an isotopic record of diet during tooth formation, movements across the landscape may be tracked. Carbon isotopes indicate vertical mobility along the escarpments that flank the Rift Valley, and strontium isotopes track movements across different geologies. Together with oxygen isotopes, these data signal seasonal mobility, as well as exchange of livestock among herding, and possibly foraging, groups. Zooarchaeological analyses of livestock teeth, including mortality and hypoplasia data, further inform on herd management strategies of early pastoralists. Through these techniques a more textured view of early herding practices comes to light.

I am currently a research associate and lecturer at UCSC in the Department of Anthropology. I completed my BA in Anthropology and Integrative Biology at UC Berkeley in 2007, and my PhD at UCSC in 2015. Most of my research focuses on the diversity and origins of food production, particularly pastoralism. In addition to my dissertation research, since 2009, I have collaborated with the Later Prehistory of West Turkana Project looking at middle Holocene monumental ceremonial sites in northwestern Kenya. This research focuses on the social changes during and after the advent of herding in this region without sedentary farming. Most recently, I’ve started work in California on Mission Period sites, examining neophyte foodways and livestock management at Mission San Antonio de Padua.