SEA Scholarship Essay for Environmental Studies/Sciences Brittany Wienke 15 May 2018

In under 1000 words, "Why is keeping the ocean pollution free, and accessible to beachgoers important to you?"

I grew up in Stuart, Florida, a small coastal town on the St. Lucie River in southeast Florida. A few miles away from my home was the Atlantic Ocean. At the end of my street was a strip of mangroves that gave way to the brackish water of the St. Lucie, the most biodiverse estuary in North America. I was a member of a community that treasured the food, recreation, tourism dollars, and the special, priceless spiritual value that living on the coast provides. The near-yearly hurricanes were totally worth it.

Of course, Stuart had its water resource problems, like most communities do. The St. Lucie River was connected by a series of canals to Lake Okeechobee, the huge freshwater lake in the center of Florida. These canals served as a direct conduit for agricultural runoff from the farms and ranches around the lake, and in the twenty years I lived there, I saw red tide, huge jellyfish blooms, and, I kid you not, a three-eyed fish in the salt and fresh waters near my home. You could tell when water managers in the interior of the state had just released a new batch of runoff-tainted water from the lake--the local evening news would show helicopter footage of a dark brownish-blue patch of water near where the St. Lucie River met the ocean.

I picked puny, mutated fish that showed the negative effects of the ag runoff from my seining net; I heard urban legends about people who drowned in the river and could not be buried in the earth for fear of soil contamination; I read reports of annual decreases in sea turtle nests on the ocean shore. It was, is, tragic, but it was also an important lesson in the interconnectedness of these vital waterways, the environment around me, and the health of my community.

I think people who grow up near the water have an innate understanding of these connections between ourselves and the ocean. You know how delicately balanced a beach ecosystem is, and you see how easy it is to disrupt that balance. When you grow up by the water, you have a deep sense of how your actions affect the environment around you.

The first time I visited the Jersey shore, I was with my aunt and uncle, who have lived in South Jersey their whole lives. When my uncle dropped some money in a toll booth that blocked access to the water, I asked him about it. He told me that we had to pay a fee to get to the beach, and I gasped. I had never encountered a pay-to-enter beach, unless it was part of a national park. "But that's not fair!" I exclaimed. "How can they do that? The beach doesn't *belong* to anyone, so who could charge an entry fee?" My uncle drily suggested that if I put it that way to the city council, maybe they would change their minds.

Beach access is so much more than the chance to walk on the sand and swim in the ocean. Free, unfettered access to the beach gives people the opportunity to see themselves as part of the natural world, and provides an entry point to that understanding the interconnectedness of the ocean and human life.

I'm not the first person to say that water is life. But this is as true for salt water as it is for fresh: we came from the ocean, and we depend on the ocean in a profound way that escapes daily thought. It's a source of food, a source of oxygen, and the largest carbon sink on this rapidly overheating planet. Everything we toss in the ocean comes back to us eventually. Every piece of trash floating in the garbage gyres of the ocean; every dead zone at the mouth of rivers; every new molecule of carbon dioxide absorbed brings us a bit closer to a scary destination of our own making.

People who spend time at the beach, in nature, surrounded by the water and birds and fish and dune grass--they get it. Folks who can come back to the beach time after time feel more a part of the natural world.

In the end, I see beach access as being an intrinsic part to reducing ocean pollution. Until people feel they are a part of the natural world, and understand that what they do to the ocean comes back to them, we will be a frustrating impasse. It's all connected.

In under 500 words, describe your career plans, community activism, and personal ambitions.

I am attending Yale's School of Forestry and Environmental Studies in the fall with the goal of studying wetland ecosystem restoration. Additionally, I seek to learn how to reduce atmospheric carbon through wetland restoration, as a way to reduce the effect of climate change on coastal communities, and to shore up resilience of these communities in the face of climate change.

In my view, this work is best done in partnership with local communities, and wetland restoration must be equal parts good science and community engagement. At the end of my studies, I will be prepared to work with municipalities, land trusts, nonprofit organizations, and companies to restore wetlands for the benefit of the human, plant, and animal communities. I also recognize the social and economic benefits of ecological restoration, alongside the obvious environmental benefits.

My decision to pursue graduate-level education came about through my participation in the grassroots climate action movement in New York City. I spend my nights and weekends taking classes such as soil science, botany, and plant propagation at the Brooklyn Botanic Garden (BBG); working as a beekeeping instructor at community gardens or at BBG; or volunteering with local conservation groups to restore the wetlands of Jamaica Bay. These practical experiences have shown me exactly what it means to work with communities, and I have learned what it actually means to undertake ecological restoration.

Through these experiences, I've been introduced to a vast network of people working remediate soils, secure food justice, restore wetlands, and find common ground to meet the needs of the diverse communities that live together. Working with this group has also strengthened my conviction that lasting environmental change must come from in a bottom-up fashion, starting with communities. This is something I intend to incorporate into my graduate studies and future career as a restoration ecologist.