WRITE THE WORLD

SAMPLE ENVIRONMENTAL AND CLIMATE WRITING

Sample Environmental and Climate Writing

Please find below a selection of environmental and climate writing produced by the Write the World community over approximately the last five years. These examples showcase the kind of writing that is possible through our global initiatives and competitions, as well as the diverse perspectives and representation our young writers bring to these topics.

- Featured on The World: The Big Fix
- Featured on Write the World Review
- From Climate Change Personal Narrative Competition 2022 - Prompt - Blog
  - The thing about water scarcity (Nigeria)
  - Singing in Grant Town (United States)
  - When fall is over (Mexico)
  - Prutehi I Tåsi: Protect the Sea (Guam)
  - Prayer to a Sinking City (United States)
- From Earthshot Advocacy Letter Writing Competition 2022 - Prompt - Blog
  - hollow hills (Malaysia)
  - The Oceans and Us (United States)
  - The Monster in Disguise: Single-Use Plastics (South Korea)
  - Our Oceans in Peril (Australia)
- From Nature and Environmental Poetry Competition 2021 - Prompt - Blog
  - To Everyone (and the future most likely) (Australia)
  - The singing lark (United States)
  - Small blaze in a roaring fire (Morocco)
- From Environmental Journalism Competition 2020 - Prompt - Blog
  - Slowing Down Fast Fashion (Australia)
  - Wake Up Call: A Nation on Fire (Australia)
- From Earth Day Writing Competition 2019 (multi-genre) - Prompt - Blog
  - Save the Sockeye (Canada)
  - As I write, the critically endangered Yangtze Softshell Turtle can disappear overnight (Singapore)
  - Entomophagy - Reshaping our Diets to Save the World (Australia)

Featured on PRX's The World

"Global network of young people writes poems to cope with climate crisis"
(Read and Watch Videos on The World)

The Big Fix, the climate solutions segment on The World, featured our environmental/climate poets reading their work.

India

Nigeria

United States

New Zealand

Featured on Write the World Review

Himalayas In Jalandhar
(Read on Write the World Review)

Written during the early months of the pandemic, by Neeraja Kumar, from India.

India

The thing about water scarcity

By: Holy_Grail (Nigeria)
Interview with Writer

When the first rain of 2017 fell in my city, the roof of my house stretched out like a tongue collecting the rain. The drops gathered themselves on the corrugations of the aluminum sheets, trailed down lithely and emptied into the buckets we had placed underneath it. The air tasted of petrichor. The earth, moistened by the rain soaked up as much water as it could, turning the hardened red clay earth to a bed of mud.

The previous months had been dry without any rain. Harmattan, the driest season in Nigeria regularly blooms in October and ends in early February of the next year. The winds are the prime indicators of the season, blowing sand thousands of miles from the Saharan Desert. You could always hear it unfold itself like it was unwrapping a gift, spreading around everything it could touch then grating the sand into dust. If you wore a skirt or oversized clothing, the wind walked through it and its coldness will sting your skin.

When the winds stretched into March, my family thought nothing much about the season persisting, thinking it would soon return to torpor. In April, weeds turned golden and thin, farmlands were brown with dust, all the water scurried away into the earth. The efforts of the winds were gradual, heaving every tincture of moisture left in the earth, taking with it most of the humidity in the air, turning our skins hard and dry, dusting on our eyelashes with films of dust. Our buckets ran empty of water quickly. Kitchen basins were filled with nothing more than dust, our clothes stood in piles every week, layered in dust every time. This new reality was a shift in normality, and like a shadow, it walked into our lives. Even birds and lizards came by frequently, tipping their tiny heads into the bowl of water we leave for our dogs.

By April, the winds had stilled and the air became warmer. Most leaves on trees that survived the Harmattan winds turned flaccid and brown. It became routine to rake the surrounding of dead leaves and dried fruits every morning. While we heavily relied on the well in our backyard as our source of water, what we had feared most dawned on us. The water became harder to reach when we tossed a bucket into the

The thing about water scarcity

well. Brown colored water touching the soil bed became our daily use till finally, one day, I remember looking down into the well and staring at the soil bed holding only mud.

It didn't take long before farmers voices reached the newspapers. Rice, a staple grain had turned to the new gold. Maize was silver. Their costs doubled and prices in the market fluctuated each week - hiking up until you could only eat according to your penny. This was the severest impact we had felt. Food was expensive. Hunger, a psychological and physical torture left a poor person's pocket empty and his belly unsatisfied. It was then the link between water scarcity, hunger and a nationwide economic recession led to a concrete phenomenon - climate change.

I learnt its meaning from lengthy Biology notes and articles. From those materials, I'd read about how ordered conditions of Earth's climate was changing and how global warming melts glaciers and causes sea levels to rise. It was from there I'd learned that the ozone layer was thinning. The accumulation of these information overtime has developed a sense of "awareness" to me. I ask myself; What will happen if rainfalls were only a few inches a year and the wells dried out? How will people survive in that condition? What can I do to prevent 2017 from happening again?

More communities will continue to face the harsh effects of water scarcity if nothing is done about this climate change impact. There are not many voices that can speak about it because they don't have the voices to.

To help victims of climate change impact, I believe steps have to be taken, whether small or big. By constructing boreholes, visiting and aiding people and environments impacted by climate change, these little steps can be taken by leaders in COP 27 to impel climate change activism. COP 27 will be another futile attempt to attend to environmental issues if these little steps are ignored. If our voices are not listened to again, this will be another one of our failures to humanity and our environment.

Singing in Grant Town

By: Davin Faris (US)

I stood in the street in an orange mesh vest, directing traffic, as sixteen protesters were arrested. The day before, at the campsite, they had all volunteered for the Red risk level: leaving only in handcuffs. The rest of us shielded them while they got in position and pipe-locked their arms across the gate of the Grant Town coal plant. Soon, they were taken away to the police cars which had descended like crows.
As one, we sang to them: We're! So! Proud of you! We're-so-proud-of-you!
I'd ridden in a shared van for hours to reach the small Appalachian town, the site of a power plant run on "gob," dirty waste coal. The surrounding community is exposed to highly polluted air and water, in a state that already has one of the worst respiratory death tolls in the nation. And all the while, millions of dollars from the plant's supplier go directly to a Senator blocking climate legislation.
Freezing rain fell on the hundreds of us arriving at HQ camp in the forest nearby. I could feel a frenetic excitement in the air, as we reviewed maps and painted banners; practiced de-escalation exercises for counter-protesters, plant workers, cops; rehearsed rally songs over and over. This was unlike any demonstration I'd experienced. Arrests were the stated goal, in order to draw press attention to the danger of gob pollution, and even in my Green risk-level, I felt out of my depth. This was real, direct, and electric. Watching the Red teams prepare, witnessing that dedication and joy, I was struck by their profound compassion for this world and each other.
The day of action brought police and news cameras. Civil disobedience has a storied place in the American tradition, and the "Coal Baron Blockade" proved no less effective in capturing the public's attention. Within hours, full-length pieces were running across major media—Democracy Now, Fox News, The Washington Post. People all over the country were watching us. Drivers crept past, shouting or waving in anger as often as support. A banquet of pizzas arrived. An enormous banner was laid across the pavement and everyone began singing again, as the sun dried us and I tried to take it all in, preserve every passing moment. I still couldn't believe I was here.

Singing in Grant Town

Two years earlier, when I was fourteen, I helped start a hub of the Sunrise Movement in my hometown. As a local part of a national, youth-led climate justice organization, we ran rallies in front of city hall, canvassed for candidates, spoke at public hearings. For students and youth, it's especially easy to disconnect from politics. There's no space for us ready-made. That's why it is so important to build communities centered on advocacy and the liberating joy of action. Creative spaces grounded in what we all have to lose. For me, growing up close to the land on my family's eco-farm made the destruction of climate change intimate and terrifying. Through organizing, however, I practiced hope. A deliberate belief that even if the future seemed bleak, I could make a difference by breaking from the passive social script and speaking up.

But that understanding was abstract, before I went to Grant Town.

The morning was long and cold, and I was focused on my role as an Action Marshal, monitoring the road, directing cars and people, so I only realized afterward that something had changed for me. Seeing the courage of those arrested had forced me to ask what I, too, might give to shift our national climate conversation. For my friends and my sister and our home. It's stuck with me since, like a refrain: What else does this moment demand?

When a call to action comes and I want to ignore it, I see the driver of our van returning to camp late that night after getting bailed out of jail. I see a Senator making more money than his constituents will ever have, from an industry that is killing them. No longer can I step away from a movement that builds community against that injustice, turns fear into the radiance of action, and takes risks for the land and streams and all the wild beautiful places I have grown up belonging to.

Four months after the Coal Baron action, I took a Red role in another peaceful blockade, in D.C. this time. Excited and scared in equal measure. Then, the night before, the Senate announced sudden legislation meeting many of our movement's demands. Instead of preparing for handcuffs, I celebrated the victory. But there is still much more to be done for our gorgeous, tortured, confused country. How can youth use our voices to lead and to build? What is demanded of our generation?

In Grant Town, we sang: Solid as a rock, rooted as a tree / I am here, standing tall / In my rightful place.

I will keep singing.

When fall is over

By: b.chaverri (Mexico)

Not so long ago, it used to be summer. Back then, it was all over the news. Stories of riots, and protests, and angry voices screaming to be heard. Stories of people being stuck on the street for whole days, waiting in their car, unable to move due to citizens blocking the way. People always judge one or the other. But I understand both sides. I understand the drivers that honk at the protesters, as well as the protesters that scream at the drivers. And I don't blame either of them. They're both victims who are sick of the same situation. They're both desperate to see change. Some act out, raise their voices, and sometimes even get violent. Others tolerate it, but how long will it be until they also break, and chaos ensues in our nation?

Because in Nuevo León, there is no water. There hasn't been for nearly a year. The faucets in this city are dry and rusty; not a single drop will fall from them. The land in itself seems dystopic. Everywhere, there's the sight of dry rivers, of wilting gardens, of empty Costco shelves, collecting dust where water bottles should be, and of these odd alien-looking objects called tinacos, which have seemingly appeared everywhere overnight. It's alarming how normal it's starting to become. We question what was even there before, because it's been so long that we can't seem to recall.

Yes, the land has changed, and along with it, so has the ambience. Everywhere, desperation is thick in the air. We feel it in our homes. We feel it at school. We feel it in ourselves. That tension on the 5th day without water, when we hear our parents anxiously whisper in the deep of the night, trying to come up with a plan on what to do once the water runs out. That fear we feel when we read the daily paper and realize that some families have gone fifteen consecutive days without water. Could that be us next? And then there's that unspoken question which gnaws at your mind day and night, driving you crazy: when will water come?

Will it come tomorrow? What about in three days? Three weeks? Three months? Once, this was our reality, something otherwise known as summer. But time has progressed, and right now, it's fall. That means rainy Season. It's been 8 months since the dryness started to get worse. But somehow, miraculously, we seem to have arrived at an oasis. There is water now, and that means that everything's okay.

When fall is over

On a good day, we go out, and in seconds we're drenched, covered head to toe in something we had not seen so much of since a year ago. Under the drizzling rain, a feeling of pure bliss can't help but overcome us, causing tears to leave our eyes. Salty and sweet water merge into a single stream as they traverse the length of our faces and then go on to fall and hydrate the brittle grass, which has not seen a single drop in ages. We're happy, we feel safe, and we feel heard. Above all, we feel something so foreign to us - peace. And to our aching hearts, that's enough for now. But in the back of our heads, a voice of reason and harsh truths sneaks up on us and ruins the moment. And now we can't help wondering - for how long is this ours? How much longer do we have until we all return to the never-ending age of dryness which seems to have disappeared overnight?

Because fall is deceiving: it comes with empty promises, guaranteeing to save a parched land. And many people trust it. Because the truth is, we're desperate to be saved. We're desperate for someone to come and give us comfort, solutions. To give us rain and to promise to keep the rain there. It's only human, I don't blame us. So, for now, we'll let it be our comfort. We'll let it be our refuge and our happiness. Since the arrival of fall, all the water cuts and the impending feeling of doom just seem like a blurry nightmare. It's like the water never left us, and somehow, in some messed up way, that knowledge subtracts from its value. So, we buy water and we waste it, because why shouldn't we? The horrible situation we passed through is gone, right? It even seems as if it never really happened, and it was just a product of an overactive imagination and a lack of sleep.

Yet time is a stealthy thief which goes on without stopping to consider our feelings, and we can't stay in comforting embrace of ignorance for much longer. As the clock ticks and the calendar pages turn, every time it gets progressively hotter in Nuevo León. Every year, the land gets drier, the rivers get smaller, and the rain becomes scarcer than ever. This isn't our first time experiencing this, and I doubt it'll be our last.

Because fall can't replace water. Its indulging rains will only pave the way for an unforgiving winter. So when fall and the sweet promise of today is over, and when we descend from autumn's comforting embrace into the gaping hole of tomorrow, what awaits us then when we finally realize that indeed, in Nuevo Leon there is no water?

Prutehi I Tåsi: Protect the Sea

By: b.chaverri (Guam)

Come March, I will have lived on this lush island for twelve years, a place that is not only the largest island in the Mariana archipelago but also competes with Hawaii as a tropical vacation spot. Guam has faced a lot through the centuries—Spanish colonization, American annexation, both world wars, introduction of non-native species, the Vietnam War, and more—but the scars are barely visible on its resilient face. In fact, even as one who has a passion for history, it took years for me to learn that Guam was not entirely safe—specifically, from the perils of climate change.

Around a month ago, we had a 5.7-magnitude earthquake, the largest in twenty-nine years. I was drifting off to sleep, smothered in the burnt umber darkness of my room, when there was a low growl that steadily crescendoed. My bed shivered, rocking like a cradle in a sudden gust of wind, and I heard the whine of trembling furniture and the skeleton of our house shaking. I lay immobile, a slab of human flesh atop a stack of jelly. The tremors were irregular, like a heart pulsing in spasms, and each jolt begat another seed of worry as I curled up in the sheets.

It stopped, eventually. The door opened and a blade of light sliced through the darkness, letting my mother in. I sat up. “That was so long.”

“Right? It was so unexpected. But it’s okay, nothing fell. Everyone's safe.”

From the hallway came my father’s voice, saying something about checking on the bookcases.

I clutched my mother’s hand. “Don’t tsunamis usually follow earthquakes?” A dot in the middle of the Pacific would be no match for a hungry sea.

“We have a coral reef. Any waves that gather break against that coral reef before they can reach us. We’re safe.”

Or so we had been, for a long time. The coral reef is where the shallow light blue waters are sewn to the larger expanse of dark blue. It naturally protects surfers from sharks, which can’t get past the reef. It provides the island with an economy, as tourists fly in to snorkel and dive. It was the reason why Guam only had three tsunamis in history that caused significant damage: once in 1849, then in 1892, and the last time in 1993.

Prutehi I Tåsi: Protect the Sea

But this may not be perpetuated. Rising sea temperatures make coral reject the algae that provide most of its energy.

This causes coral bleaching, turning coral into a fragile skeleton. Global warming also allows for natural disasters like typhoons and tsunamis to form more easily, which act as wrecking balls against reefs. In addition, farmers burn soil in the effort to enhance nutrient content; this not only raises carbon levels in the atmosphere but also clogs reefs with sediment.

Last year, I researched how Guam became a U.S. territory for my National History Day paper. The evening blushed as the sun kissed the horizon, giving my room a comforting dimness as I counted the primary sources in my bibliography. I sighed. I needed one more. I pulled out my phone and texted my classmate, whose mother was a senator and therefore a reliable source on Guam's political status, a long-term effect of American annexation.

The checkmarks on my WhatsApp text turned blue. Then a message appeared: my mom said you can email her your interview questions.

Later I found an email sitting in my inbox. Attached was a PDF file of my friend's mother's remarks to the UN on October 8, 2019. Quickly I clicked and scrolled through it, slowing as it dawned on me that it was more scientific than historically relevant. My brow knitted in confusion. Then I remembered that my friend's mother was a dedicated activist against climate change.

We may well be the first places erased from the maps, swallowed up by the sea.

No indigenous person alive today should have to ponder a future without a homeland.

It is imperative that island colonies be able to alter their course and substantively address the issues that confront them.

In these lines, I saw the tethers binding science to history. It was what happened that determined what was happening now—and what was happening now quickly became what happened, since time slips away so quickly and, with it, the earth as we know it. Even if Guam didn't entirely have autonomy over reversing climate change, it was the small acts that would ultimately make a difference.

Prutehi I Tåsi: Protect the Sea

If farmers stopped burning soil, if chemicals weren't dumped into the sea, if we were more environmentally conscious in whatever way possible: that was what would determine a small island's impact on climate change. And this wasn't unique to Guam—the world is 75% water. People everywhere could help protect the seas that swathed the land masses they called home by taking small steps in order to reach the destination of a stable globe.

As I read, a memory budded of when I saw my first coconut crab. It hobbled into our neighborhood on its enormous claws that could crack open a coconut, scrambling under a bush when the neighborhood kids and I teased it. We spent the evening trying to coax it out with a long stick. Twice it lashed out. Twice we jumped back, startled and a little frightened. When night fell we shined a flashlight under the bush. It was gone. It had disappeared, so utterly easily.

I realize now that the coconut crab disappeared as easily as the coral reef might. I see the sea every day: when I go to school, to piano lessons, to my house. It is still as beautiful as ever, but beneath it lies a reef that is fast fading into a white wasteland. And I wonder, how long will it be before the ocean comes to take back the land it gave birth to at the dawn of natural history?

Prayer to a Sinking City

By: Lyka_4 (United States)

In the cold and silent dawn, how many candles will it take to mourn each disembodied song that spoke of people and of home? I dream of a sky filled with fire.

In the bustling warmth of Café Du Monde, three cousins and two sisters crowd together around a tiny lacquered table, giggling and whispering over the shouting laughter of tourists, the resounding rush of Jazz from outside, the futile breeze. Someone blows on a beignet and sends up a flurry of powdered sugar that settles on our faces and our clothes. When we finish eating, we walk through a kaleidoscope, a tourist shop selling black-and-gold shirts sporting the words “Who Dat!” rubbing faces with a creole restaurant serving gumbo and a joke shop where chaotically colored items are etched with dirty jokes and swear-words. We run from the chaos and find ourselves in Audubon Park, where a tree larger than life spreads branches out in all directions, where little caves and divets in the vast roots serve as sitting-places for children. It seems those branches reach out and up and around the whole planet and hold the pieces together, and for a heavenly moment I am convinced all this is permanent.

I first moved into my dad’s art gallery in New Orleans when I was seven, but it was in 4th grade that I realized this city was sinking, on the last week of school, my classmates and I bent over sun-scorched concrete to plant cypress seeds in little black plastic pots, hoping to hold together the drifting land. The gravity of the realization was lost on me at the time — I accepted it in the same way I had accepted the careless power of Hurricane Isaac years before, waves rising from tranquil Lake Ponchartrain beaten senseless against the Twin Span Bridge by the wind, my eyes wide with fearless wonder. I did not yet see the global pattern in the pushing and pulling of land and storm.

By the start of 5th grade, our seeds had grown into ambitious saplings, and we donned rainboots and old bluejeans to trek out through squelching mud to the place where we would plant them.

Prayer to a Sinking City

This is important, the teachers told us, but we were preoccupied with the way the mud crept through our clothes, the way the sun sent slick sweat down our necks and the long trek back to the schoolbus that awaited us.There was a disconnect between that frantic swampland and my own New Orleans, city of mule-pulled Roman Candy trucks and live oaks trailing wisened moss and balmy Christmases. My father was born and raised here, and recounted memories of running down sidewalks and crawling over backyard gates with his pack of half-wild friends, and it seemed that those sidewalks must have been cemented to the earth, that each time water inundated this phoenix city it would rise up again in glorious redemption and brass bands would shake the streets each Mardi Gras for centuries to come.

Now, walking down the sidewalks, I see ghosts. I try to imagine a world in which we can never again walk past the little brick Prytania Theater, in which the ancient trees of Audubon Park are aquatic statues in a state of suspended decay and the green-and-white banner around Café Du Monde frays apathetically into the salt. I cannot.

Subsidence is at the root of the city's slow decline, the gradual sinking of the land while sea levels around it steadily rise. I stare up at the glorious mansions on St. Charles and State and I wonder about their inhabitants, how long it will be before they scoop up their children and sell their homes for braver souls to cling to the railings as if their wealth is Noah's Ark. For now they turn away. Another news article, another published study, a passage in another book, confirms my fears. All of us will be underwater if we do not run or fight. I imagine the water working its way in slowly like a virus, first picking off the poorest and most vulnerable who are abandoned by greed, then shaking the stone foundations of the great kings that line Audubon Park and the streetcar tracks, its rage provoked by the hubris of our levees and canals.

The truth is that this city took me in, took my family in centuries before, and perhaps we spoke but we did not listen, did not etch into our veins the curve of the river's body around the city, did not see the way we birthed a great being in the wake of the tide. Perhaps we did not respect the power of this place, seeing the densely complicated web of ecosystems and geology as clay to be bent and poked and prodded to our will.

Prayer to a Sinking City

On a uniquely cool October evening, I perch on the brick wall surrounding my family's little concrete yard. Sunset is fading quietly into dusk as cool clouds ripple across the sky. A lighter rests by my side and a small white candle balances on the ledge, its flame weakly protesting the dying light. I have brought the candle outside because there is a wordless prayer I want to give to this city, because as cars drone past and green anoles slink up wood fences and the leaves of plantain trees rustle and whisper century-old stories into the heavy, humid air I can hear a prayer rising up towards the darkening sky, a mounting begging, and I see a child running and running with arms outstretched as if chasing a distant song on the wind but stumbling and falling at last into the rhythmic lull of waves. And I pray the child will learn to swim. And I hope my candle speaks to this city who dances in the rain, in a language that my human voice cannot contain, and I hope that my candle is a lullabye in that racing night...
And tomorrow again the sinking city wakes.

hollow hills

By: joeD (Malaysia)
Interview with Writer

Prime Minister Anwar Ibrahim,

Remember the last time you visited the beaches, the rainforests, the waterfalls hidden within hills. Remember the highway scenery between states: stretches of palm oil plantations and hills ripped apart for limestone and marble.

At 17, I've passed the limestone hills near Ipoh over numerous years with my family. And each time I see their shorn sides, lined with red-brown streaks, I wonder what they'd look like covered in nothing but what nature chooses. I've never seen them any other way, but I wonder if— at some point in your past— you did.

Limestone mining is hazardous for people and the environment and even affects these hills' histories. Limestone hills aren't exactly safe construction sites, especially with heavy rainfall. Overly disturbing them is a risk: the deaths at Banjaran Hotsprings two years ago were only one example of countless fatal limestone hill rock falls. Blasting the karst to get to limestone destroys wildlife, including the critically endangered Kanthan Cave trapdoor spider and goat-like serow in Perak. Undiscovered historical sites may get demolished by mining, unlike the lucky Neolithic paintings in Tambun's limestone hills.

I know Malaysia's economy partly relies on the quarry industry, but these resources are only finite. Sustainable uses exist for these hills, such as eco-tourism, as seen in the Kinta Valley National Geopark. And if quarrying is necessary for the time being, source limestone through sub-surface quarrying instead of blasting hills open because it's the cheapest option. Monetary value is undoubtedly relevant but shouldn't be the decisive factor concerning ancient, biodiverse hills.

hollow hills

Hiking by towering trees and crimson rafflesias and vibrant flora and fauna— it's an experience I can't recreate. And I hope I don't have to lose that childlike wonder alongside nature's degradation. I wonder what it'd feel like if— when I get a driver's license— I could drive by untainted, rehabilitated hills.

This is only the surface of issues regarding nature's protection. Projects reclaiming land require mined materials, and clearing forests the size of KL pushes the environment's limit. Countless climate change and environmental issues must be tackled.

I'm only one voice, but you hold this country's speakerphone and the power to unite us in restoring Malaysia's natural beauty. Change disruptive quarrying permits; protect the hills. The odds you've overcome to lead and the odds you can overcome as a leader are boundless.

Sincerely,
a teenager dreaming of greener hills

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The Oceans and Us

By: Squishy! (United States)

Dear President Biden,

When you last visited Louisiana, did you notice the oil companies directly across from the Gulf?
I may be only 15, but my most profound shock was moving here from Illinois at age 10 and seeing the proximity between our natural world and the companies that destroy it.

Our oceans host a cosmos for marine life and act as a sinkhole for 95% of our carbon emissions.

However, every corner of coastal Louisiana is darkened by the potential and past harm of our fossil fuel energy sources. Reviving our oceans starts with eliminating their threats. Reconstruction and exploration can only occur if our oceans and the marine life there are secure. But with our high dependency on oil, natural gas, and coal companies, our energy consumption methods are hindering protection for our most important carbon storehouses.

So how can we protect our waters when we refuse to give up the dirty resources that kill us and the planet?

Here are two main ways to tackle this problem:

1) Limit emissions from transportation at the legislative level.
The big goal is to decrease our fossil fuel dependency and switch our power grid to clean renewables. With your limited time in office and interest in public transportation, I suggest harsher regulations on air and car travel. The U.S. leads the world as the highest CO2 emitter from cars and planes, something that is definitely not a happy title.

The Oceans and US

2) Reduce industry emissions.
One way to help the transition from fossil fuels to clean renewable energy is by diminishing the power of such companies. Moguls have no place to continue their trade and mass production without laws limiting their emissions. I am directly referring to companies like Coca-Cola, Shell, Exxon, energy companies, and even the U.S. government itself. We can still enjoy our lifestyles with minimal impact, but we need your leadership to get us there.

Louisiana is the 4th highest state in the nation for CO2 emissions per capita, yet it is also renowned for its marine life. The history and people of this great nation and state depend on coastal states like Louisiana, and as a concerned resident, I am certain that we should be making more significant progress.

Let the U.S. lead in ocean protection and revival, and let it start in Louisiana.

Thank you for your time,
Siyeon

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The Monster in Disguise: Single-Use Plastics

By: chloe__han (South Korea)

Dear President Yoon,

My name is Chloe Sehee Han, I am in 10th grade, and I am a citizen of the Republic of Korea. Korea prides itself on many things, such as food, entertainment, and convenience. It is the category of convenience where I focus my concern. Delivery, specifically food delivery, has always been popular in Korea. However, the monster that looms behind this convenience is single-use plastics.

My grandfather, Shin Eui-Soon, is a retired professor of Yonsei University who founded the Korean Association for Green Campus Initiative. My father, continuing this legacy, pushed for his office to go plastic-free. As a result, I was raised surrounded by role models who were aware of environmental issues our world was fighting and I grew up with a strong care for our planet.

In 2021, it was estimated that around 2.7 million food delivery orders were made daily, corresponding to around 8.3 million plastic containers, many of which were not recyclable. The problem with recycling food delivery plastic waste stems from the process that goes into making the plastic recyclable. Although citizens clean and separate their plastic waste from other discarded material, companies must go in again and sort them even further. Because companies cannot afford to spend all of their time separating every single plastic into their respective groups, a lot of plastic ends up being discarded.

While there are many possible solutions to this issue, the most realistic and feasible option would be to support a system that is already in place. Launched on October 7th, 2021, the Seoul Metropolitan Government partnered with Yogiyo to test a reusable food container project.

The Monster in Disguise: Single-Use Plastics

The project allowed customers to have their orders delivered in reusable food containers, have the containers picked up again after their meal, and thoroughly sanitized before getting returned back to restaurants to be used again. The expenses of collecting and washing the containers are all covered by the government. Instead of spreading resources thin over different solutions to attempt to tackle this problem, I suggest that the government invest as many resources as possible into this pre-existing solution while working to spread it throughout the city, and possibly even the whole country.

As the president of the Republic of Korea, I hope that you will sincerely put thought into this issue and take steps towards creating a greener, waste-free world. Thank you for your time.

Sincerely,
Chloe Sehee Han

Our Oceans in Peril

By: Annabelle1045___ (Australia)

Dear Mr Anthony Albanese,

Even though I'm only 13, I've heard many times on various news broadcasts about marine pollution. In less than 30 years, the Great Barrier Reef is expected to be dead. Forever. No turning back. This reef is one of Australia's most visited tourist sites, the largest coral reef on earth, and a favourite place of mine. With once vibrant, bright and colourful coral gradually becoming a melancholy shade of white, the reef's future looks grim unless we take immediate action and do something about it. Now.

Coral bleaching is the main reason why the Great Barrier Reef is in trouble. When a change in water temperature occurs, coral loses its nutrients and can become white in colour, hence dying. Coral Bleaching also has a devastating impact on inhabiting marine life. This is another consequence of global warming. The removal of one tree, the burning of a piece of coal, or a cow producing methane over time contributed to the situation we're now in. 60% of the Great barrier reef has experienced some form of bleaching. More than half of the reef being bleached is devastating.

I believe the Great Barrier reef is precious and must be preserved for future generations. The combination of turquoise water and rainbow coral is picturesque, however, it's a whole different story for the bleached areas. The dull water, bland coral, and lack of animals are distressing. Once again, this depressing view links back to the effects of global warming.

As long as this continues, the reef will suffer.

Our Oceans in Peril

The devastating impacts of global warming are unsustainable. What we're currently doing to save the reef now is not enough - I beg, plead, and beseech for change. Please! The reef cannot keep declining the way it is now.

In my view, by the time I have children, our oceans in general will be in great danger. I would love to visit the Great Barrier Reef with my own family someday, but would it even exist? Will all the world's oceans be polluted, with tons of plastic waste replacing the beautiful marine life? I'm going to leave that with you, Mr Albanese. What will the generation after mine have to appreciate if our pristine, blue oceans disappear? If we don't want this to happen, prompt action must be taken to save the reef.

Sincerely,
A person worried about the Great Barrier Reef's future.

To Everyone (and the future most likely)

By: OccasionalPoemDoer (Australia)
Interview with Writer

Hear the clock ticking down the hours
Until the end's upon the flowers
And all the grass that takes this world

Stop writing, leave yourself unheard.

The rhythm, rhyme, that surely stop
We're looking past the wretched clocks
And know we're diving into hell

Sit down and just enjoy the bells.

You think this poem will preserve the breeze
Preserve the dark and oaky trees
The snakes that like to bicker, hiss

We're stopping you, please don't do this.

Write your emotions, fears, beliefs
Engrave them onto paper sheets
Fight the abyss others often gaze

Enjoy the light these stars have made..

The singing lark

By: OceanWriter (US)

Once under the light of dawn
There sat a singing lark
The lark sang of the night before
And of the day to come
It sang under the rays of the morning sun
And will sing again when the day is done

When the day is done
The lark will sing again of dawn
Waiting and anticipating the rising sun
Upon the rising sun, there will sit a singing lark
Singing again of the day to come
And repeat the cycle from the day before

Just as before
When the day is done
The lark will come
And sing to the light of dawn
Then flies the lark
Into the morning sun

The passing cycles of the sun
Come & go as they have before
And night after night, comes singing the lark
The lark is soon spent and done
But another one will come like the sun at dawn
And it too, will come and come

The singing lark

This new lark too will come
And like the first, will sing to the sun
It will stay, like the first , from dusk to dawn
And like before
Its life will be open and done
And there will be a new signing lark

We people, like the lark
Will come and come and come
And we will live until our life is done
Each one of us will again face the sun
And like each one of us before
We will again see the dawn

Out of the sun
Like the one before
We face the dawn

Small blaze in a roaring fire

By: Amalou (Morocco)

My grandpa's house rose up
in smoke that domed like psychedelic
mushrooms or dark hot air balloons
towards the horizon, pink as the flames.
It used to be at the edge of the forest.
We think it was a lit cigarette
flicked off the wrist of a driver, racing past
coughing up puffs from engine and mouth.
It must have fallen on the crisp yellow
grass and dry December weeds
that have seen few drops of rain
since the month of July.
Must have set it ablaze like a witch's burning
at the stake, after a countdown
of crackling grass blades that inflated
into the roar of witnessing branches.
Witness the cries of the woods and the house.

The walls turned to ash.
The furniture turned to ash.
My grandpa's only picture from when he was a lad
Is somewhere on the ground, turned to ash.
The cold distance that stretched
like melting Antarctica between my house
in Rabat, and Australian woods,

Small blaze in a roaring fire

and Californian hells rose like mountains of ash,
flung into my mouth with the weight
of years churning with fuel that
darkened the clouds. The clouds now loom like acid
threats. And even the acid drops
won't deign to fall on the branch
that the pheasant lost,
on the glade that the toad and cactus lost,
on the voice-filled house, now voiceless
and dead and lost,
on tomorrow's parched up tongue
hanging for a lick of the sky's offering
like a weary dog waiting for its bad ending.

Slowing Down Fast Fashion

By: charlieashford (Australia)

My grandma washes glad wrap and Ziploc bags to get at least 5 uses out of each "single-use" plastic. This isn't because of the environmental gain – if it were – she would simply buy reusable containers. This is because wasting money counters her upbringing. Regardless of her reasons, she is making a positive impact on the environment. (But less so for her Ziploc-obsession!) Shopping sustainably through investing in quality clothing and thrifting is a simple way we can all make a positive impact on the environment. After years of my family joking about her being so stingy, everyone was shocked to find out she took me to Tommy Hilfiger and bought me a pair of $180 jeans. Protests tumbled from my lips as I held the price tag. Nonetheless, the woman who reuses glad wrap bought me a pair of Tommy jeans. I couldn't fathom why until she told me of her first pair of expensive jeans. Like me, she was 15 when her grandparents gifted them to her. 45 years on and she still struts her stuff in that exact pair of jeans. My grandma explained the importance of investing in quality clothing that will last decades. Going through two or three pairs of $20 jeans a year towers over a single pair of $180 jeans that will last decades. Older generations are taught to invest in quality clothing, but people my age weren't given this lesson. Investing in quality clothing sucked my grandma in with its economic rewards. However, it is even more environmentally rewarding. My grandma unknowingly refuses to buy into the market of fast fashion.

Fast fashion retailers cause landfills to pile up and exploit vulnerable workers in developing countries. The top players of fast fashion make trendy clothes cheap and accessible. As soon as that skater dress is released, a bodycon dress is already hot on its heels. Because of this, fast fashion brands don't design their clothing to last and they capitalise off consumerism. Many retailers introduce new stock weekly to keep up with what's trending. (Stanton, 2019). As we go through clothes faster, landfills pile up at unprecedented rates. In the U.S., approximately 85% of textile waste ends up in landfills. (McCarthy, 2018). This is 21 billion pounds of textile waste dumped into landfills annually. (McCarthy, 2018).

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Your polyester tube top with the Hot Cheetos logo on it isn't biodegradable and may not decompose for up to 200 years. (Uren, 2018). I wish I could be there to see the look on an archaeologist's face in 2220 when they find a Forever 21 top. A Bangladesh garment factory creates clothing for fast fashion brands. 80% of its workers work 12-14 hours a day, 7 days a week. (Alam and Blanch, 2011). Making as little as £32 pounds a month, workers are not in the financial position to decline overtime regardless of being ill or unfit for work. (Alam and Blanch, 2011). Workers have reported fires, injuries and disease to be common due to poor health and safety conditions. (Sustain Your Style, 2018). As I read more into these impacts of fast fashion, I understood the devastation caused to the environment and workers. My grandma's words had a massive impact on me. However, I work a minimum wage job and simply can't afford real leather Docs or Calvin Klein denim. My compromise is to take up thrifting. A few of my favourite thrift-finds so far are a button-down Levi's denim skirt for $6, a Japanese bomber jacket with real embroidery for $10 (I found the exact one online when I got home – it was worth $350!) and a designer red dress for $4. Thrifting is stigmatized as something shameful. However, I have influenced many friends and family members with the same stigmatized opinions to appreciate thrifting. Thrifting is not only a great way to buy quality clothing for cheap, but it's also sustainable. Purchasing clothing from Charity shops gives garments a new life rather than letting them end up in landfills. My appreciation for thrifting is fuelled by free bus rides on weekends and $2 bubble tea when I flash my student card. I became really good at thrifting – which I didn't think was something you could be good at. The beauty of thrifting is its accessibility to people of all financial situations. I encourage everyone to give it a go!

Charlotte's Official Thrifting Tips:

1. Bringing bubble tea seems like a good idea, but it's not. You want your hands free to flick through all the clothing; drinks just get in the way.
2. Earphones! An absolute lifesaver! Jam-along to some Taylor Swift as you browse.

Slowing Down Fast Fashion

3. Dress for the occasion – wear comfy clothes that are easy to take on and off, you'll do a lot of changing. Don't neglect shoes! I've had to re-lace my boots too many times because of this.
4. Please be nice to the workers! Most charity shop workers are volunteers. Make their job a bit easier by putting items back where you found them if you're not going to buy them.

Are we somehow inferior if we don't buy into fast fashion? Are we "so last season"? Or is that a mentality leading fast fashion retailers have engraved into us as a marketing ploy? Through not buying into fast fashion, you are refusing to fund exploitation of vulnerable workers and preventing more clothing from ending up in landfills. We can't all afford to drop more than a hundred dollars on every new item we buy. However, thrifting is something we can all get behind. Shopping sustainably is a simple way we can all make a positive impact on the environment. You don't need to reuse glad wrap and Ziploc bags to make a difference (just buy a reusable container!). Shopping sustainably, whether that be through investing in quality clothing or thrifting, is a simple way we can all make a huge difference.

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Wake Up Call: A Nation on Fire

By: Rose Mitch (Australia)

It is Christmas Day. Driving to our cousin's home in Tumbarumba, a small town in NSW, the car thermometer reads 40C. The black leather is scorching.
Outside, the bushland is bone-dry. Bleached limbs of gum trees moan overhead. Grass is yellow. Cavities lie in the dust where water-holes once were. Clay brown. The usual scurry of wildlife beside the road – wallabies, possums, wombats – is absent. Even the crickets have departed.
We arrive, eat lunch at a long table. Even with the doors closed and the fan pulsing beside us, the air is stifling. I listen, with a mouthful of pavlova, as the adults share mutual exclamations about the weather and the risk of a fire.
"It's not a question of if," my uncle says. "But a question of when."
But the colours and the silence of the bush were not the first warnings. The Bureau of Meteorology declared 2019 to be the hottest year on record for Australia, with temperatures soaring 1.52C above average. Many towns across Australia also experienced their lowest rainfall ever.
As far back as May, climate scientists and fire experts warned us that our nation was grossly underprepared for the Summer to come, but these cautions were ignored by the government.
The fire season began in winter. The first flames erupted in July near the popular tourist destination of Port Macquarie. By mid-August, three more fires began threatening towns in the South Coast. The Rural Fire Service warned that these early fires were a clue of the conditions to come.
And they were right. By October, the fires had consumed over 90, 000 hectares of bushland. Homes were being lost every day. The flames claimed their first lives.
In November, scientists from the Bureau of Meteorology spoke up about their fears that climate change will cause a once rare weather event to become more common. Between 1998 and 2018, there had been 62 events of pyro-cumulonimbus, commonly referred as firestorms. Firestorms occur when hot air, from fires, rise and take in cooler air. If the air cools enough, it can form a firestorm cloud. These clouds can then mix with ice and cause lighting, which can begin new fires up to 60km away. In three months, over 30 firestorms have been confirmed, increasing the frequency of the event by almost 50%.

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Scientists say that ground-level and upper-atmospheric temperatures have been altered by climate change, making conditions more likely to spark these phenomenal events in the future.

Back at home in Sydney, the bushfire smoke clutches the city skyline like a quivering fist. It conceals the peaks of buildings, stains the white teeth of the Opera House like coffee. People are told to stay indoors, and those who dare venture beyond their homes wear masks. The air quality has reached hazardous.

It is the morning of New Year's Eve when my mum receives the text. It is short. Only two lines. We have been evacuated. Leaving now.

It is from her sister in Tumbarumba. Two fires that burn either side of the small town – Green Valley and Dunns Road – are merging.

We switch on the news. Immediately, I am flooded with images of the flames. Mountainous curtains of smoke billow from pulsing orange furnaces. Skies are apocalyptic-red. The same clip of a fire-truck aflame is played over and over. The dead beat of statistics is endless: hectares, homes, lives lost.

There is one image – among the orange-red blur of flames – that remains clear in my head. Burnt bones of a home: iron sheets, melted metal, charred wood, blackened pots and pans. Beside the rubble is a bike. A white BMX, untouched. Not even a smudge on its polished surface. It reminds me just how unpredictable a fire is.

The wind turns and Tumbarumba is spared. But, the good luck of one family is another's misfortune.

For well over 10 years, scientists have warned that climate change could increase the risk of extreme bushfires. In an independent report written in 2008 (The Garnaut Climate Change Review), economist Ross Garnaut made a prophecy that has horrifyingly come true this summer. He stated that projections on climate change showed that fire seasons will start earlier and be more intense, as warmer weather increases the number of days each year on which there is a high or extreme bush fire risk. "This effect increases over time, but should be observable by 2020", he warned.

The government, however, dismissed the science.

Australia has the highest emissions per capita of all major nations, with an individual's carbon footprint four times the global average.

Wake Up Call: A Nation on Fire

With these alarming statistics, and as the leading exporter of coal, Australia surely has the responsibility to shift to renewable energy sources? The government says no.

"We know that Australia on its own cannot control the world's climate, as Australia accounts for just 1.3% of global emissions," prime minister Scott Morrison said in a conference early last year when he was asked whether the government was making changes to its mining policy.

Australia has a small population, but that does not mean that the positive changes we make will go unnoticed.

A voice is never too small to make a difference.

With no action on climate change, this brutal summer is just a prelude of what will become a regular occurrence in our lifetime. Although the fires have wreaked extreme devastation across Australia, they have certainly been a wake-up call to our nation, once asleep to the warming weather. Those who were once sceptical about the science saw it first-hand this summer, whether it be running from the flames or masking against the smoke. Even Scott Morrison revealed in a recent press conference that the government is acting upon climate change. Although refusing to give further details of his proposed environment policy, it's a start. Like the saying goes: you have to see it to believe it.

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Save the Sockeye

By: Purple Kitty 2001 (Canada)

Almost nine years ago, my family attended the Adams River Salmon Run outside of Salmon Arm, BC. We had been learning about salmon in science class, so this was the perfect opportunity to see a run firsthand. That Run turned out to be the biggest of the century, with 100 million salmon arriving. It was stunning to see all the fish, turning the water red and green and lying dead on the side of the river bank.

Years later, I am still amazed at how they can complete such a long journey (up to 1600 km) back to their spawning grounds. A difficult journey, of which most will die due to sickness or being eaten by predators. However, there are fewer fish making the journey back. The 100+ million salmon of 2010 dropped to 2.2 million in 2014, and 1.5 million last year. It is quite clear that something is wrong. The salmon population is endangered.

There are several reasons for this. The first one is human activity. This includes: logging; illegal dumping of contaminants and untreated sewage; and even trash being just thrown into the water. Hydropower dams are also a concern, as they disrupt water flow and raise the temperature of the water. (There is less oxygen in warm water than in cold water. This makes it more difficult for the fish to breathe.)

Second, and an ongoing problem, is overfishing. For decades, too many fish have been caught, sold, and consumed. As well, both demand and commercial fishing fleets have increased over the years. According to the Ministry of Agriculture, salmon numbers are down almost 80% from those in 1990. And they keep dropping.

Finally, some of the blame can be attributed to salmon farms. There is much pollution from the pile-up of uneaten fish food, excrement, and toxins used in cleaning agents. Sea lice from the farms swarm from the cages and sicken the juvenile salmon, weakening them and diminishing their chances of survival in the ocean. The net cages themselves are vulnerable to predator attacks, and farmed salmon have been known to escape and breed in the wild. Finally, farmed salmon, while maybe less expensive than wild salmon, is not as healthy. A study published in 2004 stated that, on average, PCB concentrations were 8 times higher in farmed salmon than in wild salmon! In case you're wondering, PCB (short for poly-

Save the Sockeye

chlorinated biphenyl) are chlorine compounds used in coolants and insulating fluids. They are very toxic and can cause cancer in adults, as well as movement and developmental problems in infants. Even after all that, you might be thinking, so what? They're just fish. Well, yes and no. The sockeye salmon is iconic for more than just its color (which, by the way, it gets after in the ocean). It also feeds many species in the wild. These include bald eagles, grizzly bears, and orcas. Then there is the journey back to the spawning grounds. Finally, the decaying bodies will both feed the babies and the soil. The nutrients enrich the soil, which in turn enriches the trees and other plants growing in the forests around the water. Not to mention that the Coast Salish indigenous people in those areas fed on wild salmon. As you can see, the salmon is a vital part of the ecosystem. It would be a great loss if it were to disappear due to a lack of response.

So, what can be done to help salmon? There are several things you can do. If you are near (or close enough to) a stream where salmon come to spawn, volunteer to help clean up garbage. Write to the government, asking for stricter regulations for fish farms and to decrease fishing fleets. Don't buy farmed salmon, but only natural wild salmon. Finally, bring your friends to the annual salmon run, so that they can also experience this event. Who knows? Maybe they will be inspired to help save the sockeye salmon.

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As I write, the critically endangered Yangtze Softshell Turtle can disappear overnight

By: LIN ZI XUAN HCI (Singapore)

My fingers hammer against this plastic keyboard, making a frenzy clicking noise that can never drown out the despondent cries I can imagine hearing from the doomed Yangtze Giant Softshell Turtles. But there will be no tears from the final three, not owing to their inability to perceive grief at their inexorable demise, but because only female turtles are known to produce tears, and the last one of their species passed away on April 16th, on this very year. I am enraged, distressed and mournful as I write.

The lacuna they will leave behind in our biodiversity can never be refilled. Let that fact evoke poignancy, that is hopefully, concomitant with a sense of urgency. We can attribute the Yangtze Softshells' demise to hunting, overfishing and the destruction of its habitat, human-caused problems that also plague other species of turtles all across the globe. In order to save these gentle giants from this terrible fate, drastic actions have to be taken, actions that will condemn, that will discriminate, actions that may appear to be over the top upon first glance, but is absolutely necessary.

The pernicious effects of urbanization and unbridled plastic usage are increasingly palpable, taking a toll on the ecosystem. But one iconic animal that seems to be perennially on the receiving end is turtles, who are particularly susceptible to this man-made blight. We, humans, possess the Midas' touch, but instead of everything turning into gold, they turn into a non-biodegradable, indestructible and death causing material. But it's low-cost, versatile and easy to produce, leading to its ubiquity that has brought about convenience and accessibility... all at the expense of the lives of turtles.

More than a 1000 turtles die every year due to them mistaking plastic for jellyfish. Ingesting a single piece of plastic is enough to be fatal to them. Insolence, indifference and perhaps a touch of ignorance has led to factories and individuals alike dumping their plastic trash into the ocean, making them directly responsible for the deaths. We are set on the path of having more plastics than fish in the oceans by 2050, which you can imagine, would guarantee the extinction of all turtles.

As I write, the critically endangered Yangtze Softshell Turtle can disappear overnight

We can make a difference simply by cutting down on plastic usages, such as saying "No" to plastic straws or simply bring a reusable bag for shopping. Deceptively easy, yet people are not so willing to give up on the convenience of plastic, which is why the government might have to step in and impose a ban on plastic. The Kenyan government is an exemplary example, completely banning plastic bags in 2017. If plastic consumption is kept in check and ocean clean up services are maintained, we might have a chance to reverse the fates of the turtles.

Our shelled friends are also hapless to the repugnant actions of the fishing industries. Turtles can get entangled in the indiscriminate fishing nets and often drown as they are unable to resurface. A fishing hook might also find its way into the roof of an unsuspecting turtle's mouth which will be permanently lodged there, hindering it from eating and hunting properly due to the constant excruciating pain it has to endure. Some commercial fishing industry prioritizes profit and disregards these unethical implications, and continues using trawl fishing to secure monetary gain, killing 250,000 sea turtles in the process. Hence, the fishing industry is also a malefactor in the imminent extinction of turtles and punitive measures have to be put in place that penalizes them for every turtle death they cause.

However, all of these are somewhat excusable as they can be written off as an unintended consequence of rapid modernization and there are active governmental efforts to rectify this now that the repercussions are manifesting.

What is not excusable, however, is the purposeful poaching of turtles that are apparently, legal. Approximately 42,000 threatened sea turtles are legally captured and killed around the world each year, despite their endangered status. Factoring in illegal hunting and the ever remunerative black market trading of critically endangered sea turtles, we will have well over 4% of the entire sea turtle population being hunted every year, an appalling number which will only increase if no action is taken.

To end the sufferings of our reptilian friends, it is imperative for us to condemn the actions of those who exacerbate this problem by refusing to cut down on plastic usage or allow for poaching of sea turtles to continue. It should be malfeasance, an absolute travesty of animal rights by the government to allow for this to continue!

As I write, the critically endangered Yangtze Softshell Turtle can disappear overnight

We have to pressure the government to correct this, through petitions, protests, personal phone calls .... anything to get them to act. The egregious waste treatment system in developing countries must also be dealt with and this responsibility falls to other world leaders and the United Nation, but first, we have to get them to notice this problem. Social media is a potent platform, and speaking out against authorities may be a daunting task at first, but is absolutely essential for the preservation of turtles.

The ramifications of humankind's industrialization, namely global warming, have also resulted in the desecration of their beautiful coral reefs and made it unbearable for them to continue living in some parts of the ocean. Indirectly and directly, we have made surviving magnitudes harder than nature has intended for turtles as many parts of the oceans are now inhabitable for them. Imagine trying to survive in a town where your houses are either heavily vandalized or set on fire, this is the predicament that plagues the turtles.

We can mourn for the soon to be extinct Yangtze Softshells but must keep fighting for the other species of turtles and never give up. I pray that our future generation can still gasp in wonder at the sight of these wondrous, regal creatures and live in a world where extinction of these creatures would be the last of their worries.

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Entomophagy - Reshaping our Diets to Save the World

By: ruzahk (Australia)

Entomophagy refers to the practice of eating insects, and most human societies throughout history have enjoyed insects as a major part of their diet. About 80% of the world's nations still practice entomophagy in some form (Carrington, 2010), and 2 billion people count it as a major part of their diet (Hallowran & Vantomme, 2013). The Western aversion and disgust towards insects is prevalent both in our everyday lives, and in the media we consume – such as the constant demonisation and depiction of insects as the 'other' in cinema and literature, particularly horror (Looy, Dunkel, & Wood, 2014). We only have to look at popular examples like Alien to witness our own bias. This aversion has been described as "irrational and fashion-driven" (Tabassum-Abbasi, Tasneem Abbasi, & Abbasi, 2016) and poses a major barrier to the potential advantages that can be accessed through entomophagy. I will use this proposal to outline the potential for entomophagy to provide a solution to some of the biggest food security and sustainability problems that the world faces in the future. My hope is that the United Nations Food and Agriculture Organisation (UNFAO) will respond to proposals and lobbying like this one, and make effort to introduce insect farming initiatives into developed countries, where meat production makes a major environmental impact, as an alternative protein source.

Conventional livestock agriculture for meat production is a major source of carbon emissions and environmental harm internationally, and in its current form is statistically unsustainable, and "environmentally catastrophic" (Heinrich Boll Foundation & Friends of the Earth Europe, 2014). Livestock accounts for more carbon emissions worldwide than transport, at about 14% of global emissions (Gerber et al., 2013). In the United States, it accounts for an estimated 42% of agricultural emissions. Water consumption through meat production is also unsustainably high, with beef production requiring about twenty times more water than most vegetables for the same amount of calories (Herrero et al., 2015). Meat production also requires massive areas of land– although meat accounts for only 15% of the world's energy consumption, it accounts for 80% of agricultural land

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usage (van Huis & Oonincx, 2017).
The industry also poses major threats to biodiversity, soil quality and ecological stability. The disparity between input and output of resources, as well as between environmental harm and overall benefit, makes it clear that we need major reform to this industry. If we are going to address the concerns raised by a rapidly growing population, and the climate challenges we face, this is a key area for change with "enormous potential and advantages" (Tabassum-Abbasi et al., 2016).
The current initiatives related to entomophagy put in place by the UNFAO are focussed on relieving protein-energy malnutrition in developing countries, by encouraging a return to traditional insect-based foods and setting up cheap local farms as economic and nutritional boosts to disadvantaged communities (Hallowran & Vantomme, 2013). However, my proposal is that UNFAO efforts towards insect farming could be expanded and incorporated as part of their sustainable agriculture goals that involve developed countries. 80% of meat consumption occurs in developed countries, and over 90% of meat production takes place for domestic usage as opposed to export (Heinrich Boll Foundation & Friends of the Earth Europe, 2014). If we are intending to tackle the environmental devastation the meat industry is forecasted to cause, then reform to developed meat industries in countries like the United States, China, India and even Australia, is an important place to start. It is mine and many others' strong belief that insect farming could hold an extremely important role in this process.
The key advantage of a hypothetical commercial insect farming model is that it uses far less resources than conventional livestock, and also results in generation of far less greenhouse gas emissions. A study on mealworm production in Thailand revealed that production of 1g of protein required 50% more water and two to three times more land through poultry farming than through mealworms (Oonincx et al., 2010). It's clear that insect farming can provide a valuable source of protein at a drastically reduced cost to the atmosphere, to our water reservoirs and at increased land-use efficiency.

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This could also lead to a reduced financial cost, potentially allowing insect farming to be a key player in solving protein malnutrition in developing countries. This provides potential for multiple aspects of the UNFAO Sustainable Agriculture goals to be addressed potentially through this one solution. Insect farming also has a much smaller impact on ecosystem stability and biodiversity, as well as on soil health and quality. Insects are also able to be used as feed for other livestock – such as fish, solving the issue of increasingly rare expensive fish feed, which is hampering the seafood industry and causing prices to rise. This would likely address some of the concerns about land use implicit in our current meat production model.
Of course, progress towards incorporating insect farming and benefitting from it is likely to be hindered by the attitudinal barriers of the West. Most people reading this article probably agree with the conceptual model, but might still balk when a plate of crickets is put down in front of them. This unacceptance disincentivises investment into developing entomophagy initiatives, stymying the growth of an industry that could potentially save our planet. In the minds of many affluent Western nations and individuals, the information and proposal laid out in this article (and ones like it) are just simply that – information, and a proposal. But on our current trajectory, for many disadvantaged nations, and for our future children, the consequences of the data reported is, or will be, their reality. The fact of the matter is that by revaluating our attitudes, and closing the gap between what we factually recognise we should be doing and what we are doing, we can change that trajectory. This proposal is primarily to add to the body of information that lobbies for UNFAO action, but it's also a call to arms to consumers and to the affluent everywhere. By re-evaluating your own attitudes to entomophagy and other unusual foods, seeking them out, and supporting organisations both scientific and commercial that are developing entomophagy strategies, consumers on a large scale can divert the machine of mass production away from environmental devastation. The key is for us to stop just agreeing with what the science is saying, and start actually investing in it, supporting it and living it.

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