Dear Earth Systems Community,

I hope you are all well and adapting to our new reality. The pace of change has been dizzying over the past two weeks, but I hope you are all finding ways to cope and connect with each other, and your friends and families. Please know that your dedicated Earth Systems team is here for you and is working tirelessly to support your education in these uncertain times.

We know that everyone’s situation is unique, and you must all be feeling different pressures and stressors. Please reach out to myself, or any of the Earth Systems staff, student advisors, academic advisors, and faculty if you need help. We may not have all the answers, but we will do our best to find them for you. Indeed, hearing from you will help us craft appropriate support structures for our Earth Systems community.

In the meantime, we are working to implement guidance from the University for our spring quarter courses. We know that course cancellations will be a challenge for some of you, and we are committed to finding flexible and creative solutions to these issues as they arise. If you have questions about a particular course, please contact us.

Finally, I have been heartened by the spirit of our community, and know that we will weather these challenges together. Stay tuned for more information about how to stay in touch with us and our amazing student advisors through virtual office hours and our virtual ‘Earth Systems Office’.

Take care,

Karen Casciotti
Stanford University Associate Professor, Department of Earth System Science Victoria and Roger Sant Director, Earth Systems Program

Julie Kennedy Public Service Scholars

Sadie Cwikiel
B.S. ’19; M.S. ’20

Casey Mullins
B.S. ’20

Elena Press
B.S. ’20
On March 10th, Earth Systems seniors presented their capstone projects from EARTHSYS 210P via Zoom. The projects spanned topics and mediums, showcasing the diverse interests and skills of the students. Below is a list of the presenters:

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<thead>
<tr>
<th>Name</th>
<th>Title</th>
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<tr>
<td>Katie Holmes</td>
<td><em>Dropps at Stanford</em></td>
<td>Human Environmental Systems</td>
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<tr>
<td>Hannah Shabb</td>
<td><em>Investigating the Impacts of Biophilic Design on Stanford Campus</em></td>
<td>Land Systems</td>
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<td>Fiona O’Keeffe</td>
<td><em>Burrowing mammals on Stanford lands: distribution and environmental factors</em></td>
<td>Biosphere</td>
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<td>Ricardo Ramon Sanchez</td>
<td><em>Tiny House: The Solution We Might Be Looking For</em></td>
<td>Biosphere</td>
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<tr>
<td>Deirdre Francks</td>
<td><em>Colorado Climate Papers</em></td>
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<td>Kendall Kissel</td>
<td><em>An athlete’s guide to transitioning to a vegan diet</em></td>
<td>Biosphere</td>
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<tr>
<td>Cole Shepherd</td>
<td><em>Climate Change in Florida State Legislative Districts</em></td>
<td>Oceans, Atmosphere, and Climate</td>
</tr>
<tr>
<td>Ashley Song</td>
<td><em>Earth in Color: Narratives on the environment, family history, space, and community</em></td>
<td>Human Environmental Systems</td>
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ES Wellness Corner:
Yoga @Windhover

For Winter Quarter, the Wellness Liaisons from Earth Systems and Sustainability Science and Practice joined together to host YOGA @WINDHOVER with guest instructor Lizzie Frankel! Nutritious snacks were provided to participants afterwards! Missed out? There are plans to host similar events in the future! Be on the lookout for emails from your Wellness Liaison, Tran Lam!
O'Donohue Family Stanford Educational Farm: News and Highlights

Spring has just arrived at The O'Donohue Family Stanford Educational Farm, and the pretty pink blossoms of the stone fruit orchard are in bloom. This is the first year these trees will bear fruit, and we are looking forward to peaches, nectarines, plums, apricots, and cherries in a couple of months. This winter quarter, student projects on the farm included developing chicken and composting worm curriculum, designing signs for the Muwekma Ohlone educational garden, and creating farm outreach flyers for CoOps.

-Amy Bolan '20
It may have been only a single red-tailed hawk darting a touch too close, but the snow geese sense danger and rise. They are a cloud. They are a wind. They are bird made weather made bird once more. Looking through my binoculars, my eyes blind with their white thrumming mass. You can hear the noise of it, even from where we stand, a symphony of wingbeat and birdsong that swells and sinks and swells once more with the geese, who seem, as one feathered creature, to be searching for something, the edges of the mass brushing the ground, and then swinging upwards once more. Eventually they settle exactly where they took off from, in Merced Wildlife Refuge, three hours away from Stanford in the Central Valley. I have come here for the first time, on a field trip with the Stanford Birdwatching Club. “I wonder if we’ll be able to see that in thirty years,” someone says. “I wonder if we’ll be able to see that in ten,” I say. The cynicism is instinctive now: after all, the world is burning and climate change can’t be stopped and ecological devastation rages largely unchecked and so on and so forth. But as we drive away, I look back at where a smaller flock has startled upwards. They smudge over the horizon line. We pass through corn rows and cow pastures where groups of geese have settled at the edge of ponds; people have planted these fields for the birds, so they do not destroy the fields of nearby farmers, and so they return, year on year, in their great gorgeous storm.

From a grounding discussion held by Black Earth Farms, students learned how growing the food for our communities need to be healthy is a form of active resistance against racism, capitalism, and patriarchy. Putting the liberation ethic into work, Black Earth Farms had attendees break up into workshops on land rematriation, creative writing, practicing yoga and meditation, planting vegetables and harvesting flowers, and around healing intergenerational trauma. At closing, we gathered in a circle and Black Earth Farms encouraged attendees to reflect on the spaces held. To the beat of a drum, we danced for our ancestors. A few Saturdays later (the 22nd), fifteen students traveled to the East Bay to harvest, weed, and plant with Black Earth Farms. Going up to work the land with them after they had visited us in the South Bay felt like we were visiting each other’s homes. Gathering to work, talk, and share a meal together allowed us to practice sacred ways of organizing and being in community with one another. Thank you to our sponsors-- the Woods Institute, the Center for Ethics in Society, the Center on Comparative Studies in Race & Ethnicity, the Center on Food Security and the Environment, Black Student Union, Students for a Sustainable Stanford, the Haas Center, the Outdoor Center, Stanford Residential Education, Columbæ, 576 Alvarado, and Enchanted Broccoli Forest-- for supporting students’ engagement with food sovereignty and collective organizing.

- Nancy Chang ‘20

Merced Wildlife Refuge with the Stanford Birdwatching Club

It may have been only a single red-tailed hawk darting a touch too close, but the snow geese sense danger and rise. They are a cloud. They are a wind. They are bird made weather made bird once more. Looking through my binoculars, my eyes blind with their white thrumming mass. You can hear the noise of it, even from where we stand, a couple hundred meters away: a symphony of wingbeat and birdsong that swells and sinks and swells once more with the geese, who seem, as one feathered creature, to be searching for something, the edges of the mass brushing the ground, and then swinging upwards once more. Eventually they settle exactly where they took off from, in Merced Wildlife Refuge, three hours away from Stanford in the Central Valley. I have come here for the first time, on a field trip with the Stanford Birdwatching Club. “I wonder if we’ll be able to see that in thirty years,” someone says. “I wonder if we’ll be able to see that in ten,” I say. The cynicism is instinctive now: after all, the world is burning and climate change can’t be stopped and ecological devastation rages largely unchecked and so on and so forth. But as we drive away, I look back at where a smaller flock has startled upwards. They smudge over the horizon line. We pass through corn rows and cow pastures where groups of geese have settled at the edge of ponds; people have planted these fields for the birds, so they do not destroy the fields of nearby farmers, and so they return, year on year, in their great gorgeous storm.

- Tanvi Gupta ‘23
Before I began my M.A. in environmental communication, I wasn’t sure what to expect. What would I study? What would I do after graduation? So, I asked several of the alumni of the program. Based on those interviews, I compiled the M.A. directory. The directory briefly describes what each M.A. alum studied and what they were doing in Fall 2019. I learned that M.A. alumni studied many different topics and have pursued many different careers, including journalism, strategic communication, consulting, and medical research. Each alum has also provided some advice for current and future students. Highlights include getting a moped and becoming friends with Tom—not to worry, these are not causally linked. All of the alumni were incredibly generous with their time and thoughts, and they would be happy to talk with others. I hope that students can use the directory as a launching point for further conversation.

A working draft can be found on the Earth System's webpage and at the link here:
https://docs.google.com/document/d/13a1dZZ1KKIEnYfoDx5uK-MrvLxYQJKx0TA18klvP8/edit?usp=sharing

DEADLINES:
- Apr 15 - ES 10 Head TA Apps
- Apr 30 - Honors Program Apps
- May 1 - Student Advisor Apps
- May 12 - Spring Qtr. Coterm Apps
- TBD - Coterm Orientation

School of Earth Updates for Spring 2020:
https://earth.stanford.edu/covid-19

Questions? Concerns?
We're here for you!

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