11/15/16 ARCCA Learning Session: Virtual Adaptation Tools Salon

Remaining Questions Answered

Cal-Adapt: Susan Wilhelm, California Energy Commission

Can you review how uncertainties, projections other than LOCA, and the LIMITATIONS of the data presented on Cal Adapt site are made clear to decision makers when they use the site?

Uncertainties are not explicitly given in global climate models (GCMs) or, therefore, the downscaled (higher resolution) data derived from GCMs. Cal-Adapt endeavors to offer at least a glimpse into inter-model variability by presenting visuals for temperature and precipitation with a gray "envelope" of model variability where the envelope represents the maximum and minimum from the total CMIP5 ensemble. While not representing the literal uncertainty in future climate-- which is not knowable at this point in time-- this inter-model variability does bound the "min" and "max" aassociated with our current "best" ensemble of models.

At present, Cal-Adapt 2.0 only presents LOCA climate projections. Pending funding, we are interested in also displaying the dynamically downscaled projections developed by Alex Hall (UCLA). You can learn about both LOCA and the UCLA dynamically downscaled data at the second and third bullets in the link below, respectively: http://www.energy.ca.gov/2016_energypolicy/documents/2016-06-21_workshop/2016-06-21_documents.php

Regarding limitations of the data presented-- links to peer-reviewed sources are included for datasets on Cal-Adapt and there is a primer on how to interpret climate projections at this link: http://beta.cal-adapt.org/resources/using-climate-projections/

Ultimately, we are working to include more "plain-English" information to help users of Cal-Adapt grapple with uncertainty, variability, appropriate use/interpretation of projections *without* having to become climate experts. The link above is our first cut at this. Pending additional resources falling into place (any day now), we will further enhance those efforts.

When is Cal-Adapt 2.0 expected to be launched officially? And I assume it will replace 1.0?

Ca. January 1, 2017. Yes, it will "replace" Cal-Adapt 1.0 but our vision is to continue to support access to visualizations and data presented on Cal-Adapt 1.0, as "continuous/stable access to datasets" is a core/guiding principal for Cal-Adapt.... even though Cal-Adapt will evolve as the science of climate change improves, we would like to have prior resources available via some archive or site.

Adaptation Clearinghouse: Melissa Deas, Georgetown Climate Center

Could you comment on how this is different from other climate portals like CAKEx?

CAKEx and the Adaptation Clearinghouse are similar and certainly have overlap, and we are currently working with the creators of CAKE to better link the two sites to decrease any duplication. There are a couple of

differences, however: CAKE includes many more self-authored case studies. The AC does include case studies written by others, and case studies that we have written for other projects, but this is not our focus. Another difference is that the AC focuses much more on the legal and policy aspects, so we may have more legislation and land use type resources. The final difference is that we write all of our resource summaries rather than copying executive summaries.

For users, I suggest using whichever you find easier, and then maybe checking the other site if you are not finding what you are looking for.

How are resources gathered? Do you feel as though most adaptation resources are being uploaded?

Over the years our team has become pretty good at following major environmental media outlets, organizations, and other sources to find new resources. Traditionally, we have focused on a few areas where we have more widespread resources, which include: federal, state and local laws and policies, coastal issues, water, public health, transportation, and urban adaptation. For our newer sectors, we have been working with sector experts from federal agencies or other organizations to help identify any resources we are missing. That being said, our team does not always find everything and we encourage users to submit anything that they see we are missing. Additionally, we tend to find more resources than we have time to summarize, so sometimes we need to prioritize what goes in. That means that we may have a resource in our queue that responds to whatever you are looking for, so please feel free to email and ask if you have a specific research question in mind.

The Atlas: Elle Hempen, The Atlas

Do the solutions discuss any challenges, lessons learned, or tips for success?

Right now, the best way to learn about challenges, lessons learned, and tips for success is to use the integrated messaging system to connect with the city where the project was built and ask questions. That said, we have heard this from a number of users and are working on two things to improve that functionality. First, we are reworking the project details pages to capture that type of information at the outset when a project is posted. Second, we are working to integrate a function that would allow users involved in a project to add commentary. We hope to roll out the expanded functionality in the coming months - so more soon!

I know that standard metrics for measuring resilience building have not been developed, but do the projects share any experienced or anticipated impacts from completed projects?

Right now the project details pages are fairly high-level with regard to technical information and benefits. That said, we are working on a couple of adjustments to better capture local experience and anticipated benefits. First and foremost we are reworking the project details pages to better capture and display that type of information, and allow users involved in a project to add commentary. In addition, we are working with a third-party to evaluate and tag certain projects which are particularly innovative and/or provide exceptional resilience benefits so that we are driving communities towards more modern, integrated solutions.