

# AOSC200: Weather and Climate Discussion

Sections 0101, 0102

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DEPARTMENT OF  
ATMOSPHERIC &  
OCEANIC SCIENCE

# Group Project #2

## Project #2: Weather and Climate Advisory Team

Please refer:

<https://www.aosc.umd.edu/~asengupta/AOSC200/AOSC200.Project2.Directions.pdf>

# Group Project #2

## **Weather and Climate Advisory Team**

**Description:** You have created a consulting team that deals with communicating the current and future impacts of weather and climate. You have marketed your services to a wide range of public and private sector entities. You've started to receive contract offers and now you must decide who you're going to work with. You're starting to get offers for your services. Your current offers are from

- 1) CEO of a Fortune 500 company
- 2) Head of a large investment firm
- 3) A state or federal government official
- 4) The head of a large nonprofit that works on environmental issues
- 5) ???

Your TA will act as the person you have contracted with. This person (your TA) is extremely busy and needs complex information presented in a clear, concise manner by people who are able to answer detailed questions.

# Group Project #2 Summary

- **Prepare a presentation** relevant to the person you are working for to make them aware of their current and future weather and climate risks
  - Discuss the economic, political, and social ramifications in your analysis
  - Your topic must be approved by your TA by next week
  - Some examples are provided in the next slide. We strongly encourage you to pick an individually researched topic.
  - Your presentation will last 15 minutes (10-12 minutes for the presentation and 3-5 minutes for questions). This is an important meeting so be sure to rehearse beforehand and offer equal speaking time to each group member. Each team member should focus on one aspect of your topic and be prepared to answer questions or clarify information.
- Each person must submit **a draft of their individual portion** of the presentation in two weeks.
- The group must also submit **a draft of the overall presentation** at this time
  - For your final presentation, you will be allowed to use presentation software

# Group Project #2 (...continued)

- **Your group** must turn in an organized outline of your presentation for the contract holder to read before the briefing.
- **Individually**, you must prepare a properly cited, in depth written analysis for the person to read in their free time. The person your contracting with is very particular about these things and expects a **2 page, single spaced document with 1" margins.** Citations (minimum of 5 per person) do not count toward the length of the document.
- Each group member must present their portion of the project and submit a final write-up on it.

### **Some ideas for topics:**

*Severe Weather:* Inform the President of the impact from a recent weather event. This could be a severe snow storm, hurricane, tornado outbreak, drought, etc. Some things to discuss: the meteorological conditions that led to the event, the number of lives affected, the economic impact, the cost of recovery, the federal response and any recommended improvements, the role climate may have played and the likelihood of this happening again, etc.

*Climate Policy:* Recently, representatives of world governments assembled to create the Paris Agreement on Climate, [http://unfccc.int/paris\\_agreement/items/9485.php](http://unfccc.int/paris_agreement/items/9485.php). This climate agreement is now in the process of ratification. Pick a country, other than the United States, and prepare a report on how this country plans to meet the ambitious goals set forth by the agreement, including any specific goals set for this country. Include the economic, societal, and military impacts for this country and the United States (if any). Will this country rely on the transfer of technology or financial investments from other countries? If so, how will this happen? Is there anything this country is doing that can be implemented successfully in the United States?

*Climate and Weather:* It is important that the United States be prepared for possible impacts of a changing climate. Major insurance companies have reported increases in the losses associated with extreme weather events. Present the data that support these claims and future forecasts for these events. Other topics you may wish to include are forecasted costs from these events, the societal, economic, and military impacts, how the country should prepare, and how to communicate this information.

*Energy, human health, and the Environment:* With energy demands continuing to rise, it is imperative to find ways to realistically ensure affordable and reliable energy for the long term needs of the country. The real difficulty is accomplishing this goal without threatening the physical, environmental, and economic health of the country. Keep in mind that physical, environmental, and economic health are very closely connected. Prepare a realistic energy plan that maximizes economic benefit and minimizes health risks and environmental damage. Discuss a timeline that this may happen on. You may wish to include what technologies are available and/or those that still need to be created and efforts to improve energy efficiency.

# Project #2 Resources

- The most recent IPCC report (<http://www.ipcc.ch/report/ar5/wg1/>) and the summary for Policy Makers ([http://www.ipcc.ch/pdf/assessment-report/ar5/wg1/WG1AR5\\_SPM\\_FINAL.pdf](http://www.ipcc.ch/pdf/assessment-report/ar5/wg1/WG1AR5_SPM_FINAL.pdf))
- Congressional report on climate and military readiness:

<http://archive.defense.gov/pubs/150724-congressional-report-on-national-implications-ofclimate-change.pdf?source=govdelivery>

- DoD Climate directives (<http://www.dtic.mil/whs/directives/corres/pdf/471521p.pdf>)
- COP21 (<http://www.cop21paris.org/>)
- COP22 (<http://www.cop22-morocco.com/>)
- MunichRE (<https://www.munichre.com/en/group/focus/climate-change/index.html>)
- There are LOTS of places to get information from past weather events. Pick an event and “google” it. Here some places you may be able to find more detailed information: National Weather Service (<http://www.weather.gov/>), Weather Underground (<https://www.wunderground.com/>)

# Group Project #2

## Individual Rough Draft- Due April 17th

- Individually you must submit a draft on your portion of the presentation, i.e., on the exact aspect of the broader group topic that you're working on.
- This document needs to have three reputable sources (peer-reviewed scientific journal, a government, or a University website). The document needs to have proper in-text citations and a bibliography at the end.
- 1-page, font size 12, Times New Roman, 1" Margins.
- Paragraph form with proper grammar and spelling strongly encouraged.
- The bibliography at the end does not count towards the length of document.



# Group Project #2

## Group Rough Draft- Due April 17th

- Highlights only the main points of the presentation. This should be clear and concise. It is okay if some ideas are a work in progress but they should be written in complete sentences with proper grammar.
- This should be an abridged version of the individual draft and should only focus on the key points of the group presentation.
- Designate one member of the group to make sure all groupmates are in uniform format (indents, bullet type, font type and size, etc)
- The document needs to have proper intext citations and a group bibliography at the end.

# Project#2: Important Dates

- Before Presentations

- 4-17

- Group Rough draft due (ELMS)
- Individual Rough draft due (ELMS)
- ½ way Peer Evaluations due (ELMS)

- Presentations

- 5-1 (1<sup>st</sup> Day of Presentations)

- All groups should be prepared; Final Group Paper containing Annotated Bibliography must be turned in BEFORE discussion.

- 5-8 (2<sup>nd</sup> Day of Presentations)

- Individual Write-ups due
- Final Peer Reviews Due

# Group Project #2

## Today you will:

1. Pick a group (a student must be present to be placed in a group)
  - a) 6 groups, 5 people in each group (no more, no less)
  
2. Start discussing with your fellow group members potential research topics
  - a) Some topic ideas can be found on our “Project #2 Directions” document on the class website (<https://www.aosc.umd.edu/~asengupta/AOSC200/>), however unique ideas are encouraged.
  - b) Get your topic approved by me by 4/10 via email. Remember to cc all other group members and list their individual subtopics when you email me.
  - c) Subject of Email: AOSC200 Section 010x Project #2 Topic: Group XX
  
3. Collect **1** group contract form per group and submit before leaving:
  - a) Member Names, contact information, and signatures.
  - b) Plan your next out-of-class team meeting (date and place).
  - c) Member Responsibilities (list potential subtopics); it is okay if these change.

Thank  
you



Questions ?

Email me: [agnivs@umd.edu](mailto:agnivs@umd.edu)