

NOT Freshman B

Climate Change

**Introduction:**

Hello, my name is Kamran Shoaei and I’m going to be your committee chair for SOCOMUN this year! I’m a senior moving into my fourth year participating in MUN, and I can assure you it’s been nothing short of an amazing experience. Not only has MUN provided me knowledge on the world’s current issues and conflicts, but it has also helped my public speaking, overall writing ability, and how to properly research topics. This is because to succeed in MUN, it requires you to write quality position papers, make speeches, give comments, and thoroughly understand the topic you’re debating. The committees I tend to enjoy the most are Historic ones, such as Historic Security Council, where you discuss the specified topic in the midst of the conflict or immediately after it. This allows you to change the way the issue may have been resolved in the past, and I find the experience very unique. Over my time in MUN, I’ve travelled to a conference at UC Santa Barbara, and will be attending one in Prague, Czech Republic, this year too. Some other things about me are that I play basketball and that I enjoy filmmaking.

Considering SOCOMUN will be many of your first conferences, I really hope you enjoy it and that it brings you to enjoy MUN as much as I, and many of my peers, have come to. We look forwards to a positive learning experience for novice delegates, while stimulating insightful conversations and solutions. We will begin committee by going down the speaker’s list: there is no general debate at SOCOMUN, only substantive, meaning that only country policy and solutions are to be discussed in speeches. We encourage delegates to participate in unmoderated caucus, where delegates can freely share their ideas, and create a resolution. Formal caucus and voting bloc will follow, in which delegates will present and vote on resolutions. Please take the time to review the topic synopsis and conduct your own research. It is imperative that you are familiar with your country policy, and adequately represent it throughout committee. I wish you all the best of luck and if any of you have any questions or need anything, please feel free to reach out to me at [socomunnotb@gmail.com](mailto:socomunnotb@gmail.com). On a final note, I want to welcome you to MUN and thank you for attending SOCOMUN.

Hello! I am McKenna Andrew and I am your legal for SOCOMUN XXVI. I am currently a student here at Santa Margarita Catholic High School as part of the class of 2020. This will be my third year participating in the MUN program here at Santa Margarita. My experience in this program has been extremely beneficial as I have met so many amazing people, experienced so many new places.

Hello, my name is Sydney Montague, I am your Secretary for SOCOMUN XXVII. I am a student here at Santa Margarita Catholic High School and in the class of 2021. I will be in my second year of MUN, and it was one of the major reasons I came to SM. Since I started MUN it has been one of the most informative classes I have. In sports, I am in the girl’s golf program, I have played for about five years, and I plan on continuing throughout high school. On campus I am in women’s choir, an in the World Health Organization club. In MUN I normally participate with WHO to deal with medical crises all over the world. I have always wanted to work in the medical field, and as a sophomore I am still planning colleges, but I have a good idea of where I want to go. Outside of school I love travelling, ping pong, hanging out with friends, or just my dog, and like every teenager sleep.

**Background:**

Currently, our planet’s climate is going through a rapid warming period, of which a major component is human-induced. It has been found that over the past 100 years, temperatures are rising between 0.4-0.8 degrees Celsius annually. In addition, scientists’ predictions state that this annual increase could reach almost 6 degrees Celsius without change. In the long run, the increasing temperatures in the international community could have catastrophic effects like rising sea levels, melting of polar ice caps, and even sever weather events. Extensive research from scientists across the international community has proven that the main cause is the expansion of the “greenhouse effect”. This effect comes from the release of specific gases called “greenhouse gases” that are released into the stratospheric ozone. When greenhouse gases are released into the atmosphere, if there’s enough, ozone holes could develop too. The greenhouse gases include carbon dioxide, methane, nitrous oxide, and fluorinated gases. Each of these is released into the atmosphere in different ways. Of all the greenhouse gases, carbon dioxide is released the most. Moving to specific human-induced causes of the recent global warming, these gases enter the atmosphere through transportation in vehicles powered by fuel, electricity production, industrial development, commercial and residential lifestyles, and inadequate land use. The effect that the entrance of each of these gases has on the environment is dependent on how much is released, how long they remain in the atmosphere, and how potent they are. In total, if this issue fails to be resolved, the current temperature increase and potential increase can result in worse air quality from all of the greenhouse emissions, increased ocean acidification, rising sea levels, higher frequency of severe weather catastrophes like storms, and a higher death toll for both humans and animal species.

With what the global warming alludes to in the future, the UN has attempted to develop solutions, implementations, and even added brand new UN Panels. In 1992, the United Nations Framework Convention on Climate Change, UNFCCC, was introduced as a first step to notifying the public of the problem at hand. In 2013, the IPCC, Intergovernmental Panel on Climate Change, was added under the United Nations Environment Programme, UNEP, with a purpose of notifying the international community of how serious climate change is, and how heavily involved human activity is in the rising global temperatures. Delegations of the UN also negotiated instruments like the Kyoto Protocol. The Kyoto Protocol was first introduced in 1995, and it set emission targets for economically developed nations. It leaves off undeveloped nations, as they need the ability to advance, which often results in increased emissions. It’s targets were to reach approximately 5% less than their emission rates in 1995 by 2012. Unfortunately, this didn’t have much success. Another UN instrument is the Paris Agreement, in which the UNFCCC would agree to alter lifestyles and put forth more effort by focusing on the climate change problem, as all nations came to a consensus when agreeing that a sustainable future was necessary. To clarify, its purpose is to get all nations on board a plan to keep the temperature increase below 1.5 degrees Celsius, and that they’d help all nations reach this target. It was officially signed on April 22, 2016. Over time, the United Nations has shown its recognition of the issue, as seen through the examples provided above. In addition, new implementations, goals, agreements, and solutions are constantly being proposed or approved, as seen through the Paris Agreement being signed just three years after another significant implementation: The IPCC. This shows that the UN understands the precedence of the issue, and although progress hasn’t been made yet, considering temperatures are still rising, the international community cannot be blinded by the significant efforts made.

**Possible Solutions:**

With an understanding on what’s already been done and what efforts have been successful or failed, we’d like to provide the following solutions that we feel provide a short term and long term response to the ultimate goal of stopping the rising temperatures before the impacts have reached their tipping point. With that, the first solution is focused on carbon dioxide emissions, as it is the greenhouse gas being released the most. Since a major part of carbon dioxide emissions is transportation, one may propose a three step plan called “N.A.E” or “Notify, Act, Expand” that’d be develop in the nations with the highest carbon footprints. The first step, “Notify”, is to advertise and set media campaigns that show the international community of the human actions that can be done to reduce their carbon emissions like carpooling, bicycling, etc., and also set up signs in schools, billboards, and ad campaigns on online platforms like YouTube. This is an inexpensive, yet effective way to ensure every person is aware of what they have been doing and what they can do better. The second step, to “Act”, is to create legislation that makes it far more difficult to purchase inefficient vehicles and provides a far stricter and more frequent SMOG check on vehicles. If a tax is set on the developing lines of petrol-powered vehicles with engines larger than 6 cylinders that arithmetically increases with how much larger engines get, people would be more inclined to purchase hybrid or electric vehicles. In addition, to consider the vehicles that already have been produced, the stricter, more frequent SMOG checks would be able to ensure the least amount of emissions is coming out of cars with “straight-pipe” exhausts for example. Another component of this to make sure it works is the vehicle industry that would be impacted by the need to begin developing efficient, yet enjoyable vehicles. Since it is a time consuming process to transfer to an electric or hybrid majority market, a 20 year transition period will be set allowing these manufacturers to slowly move to this point. The final step, to “Expand” is just to simply spread this plan across all forms of carbon emissions, as the previous two steps focus on car or car-like vehicles. Once the time has come, a convention will be set in the future to discuss how to apply similar steps to the agricultural and industrial sectors of carbon emissions. This solution not only provides a feasible long term plan, but has short term success too, as the media campaigns would be implemented immediately.

Moving on, the second solution also focuses on carbon dioxide emissions, which represents over 75% of the greenhouse gas emissions into the atmosphere. Here, aircrafts are the main topic, as each hour, around 3500 gallons of fuel are used, which is far more than cars. Also, with travelling becoming a more important aspect of the working population, it is becoming more common, and more planes are being developed. In addition, jet fuel is far “dirtier” than the gasoline one would pump into their car. With that, as seen in multiple concepts and tests, we are reaching an era where electric air travel may be coming to the world soon. German industry, Siemens Magnus, presented a fleet of fully electric aircrafts on April 3, 2018. Though these were just two passenger tests, powered by 55kW electric batteries, it shows that in-air flight is possible. Also, Siemen Magnus predicts that their technology will be able to make electric air travel standard by 2050, and look to partner with major aircraft companies like Boeing or AirBus as soon as 2020. Considering this knowledge, our second solution is to invest as much as possible into Siemens Magnus, to speed up this process and make electric air travel happen as soon as possible. Though this is an extremely expensive solution, the effects would be immediately felt in just months, as far less carbon dioxide will be emitted, with aircrafts representing 24% of the carbon dioxide emissions globally.

Lastly, the final solution is focused on the short term ways to stop global warming as whole. Since building development/construction release an immense amount of greenhouse gases, working with LEED, the “Leadership in Energy and Environmental Design” standard could be set across the globe. Currently, they retrofit standings buildings in urban hubs like Los Angeles and New York City across America, and making the buildings currently being developed as efficient as possible. This is done by allowing as much natural light to come in as possible, using solar panels, and efficient construction material. These are just some of LEED’s ideas, but if this LEED standard is spread across the globe, a predicted 150 million metric tons of carbon would be kept out of the atmosphere by 2025; an unbelievable improvement to say the least.

With these following solutions, it is clear that though expensive and laborious, a greener future is possible, and this would ultimately lead to less greenhouse gas emissions, which ultimately mean a lower temperature increase and a significant diminishment of the climate change problem that the international community has been combatting for decades.

**Questions to Consider:**

Here, I’ve listed questions that will help you ensure all factors in this problem are addressed and identified. You by no means need to answer them; they are here to guide you.

1. What’s the timeline of this problem; how long has it been going on? When did it become serious?
2. What actions, both natural and human-induced, have led to the global warming epidemic?
3. What are greenhouse gases? How are they released? What do they do? (think big picture)
4. What is the greenhouse effect?
5. What has the UN done so far? (look for approved resolutions and proposed resolutions)
6. Where does your country stand on the issue and how have they recognized it? What have they signed or approved?
7. How has climate change impacted your nation altogether?
8. How heavily involved is your nation in the in the enhanced greenhouse effect?
9. What are feasible solutions to the issue?
   1. Consider the…
      1. Possibility that you could negatively impact nations’ industries or economies,
      2. Cost of your proposed solutions,
      3. Solutions proposed are aligned with your nation’s policy,
      4. And how effective they will be both in the short and long term.

Works Cited

1. “Climate Change Causes: A Blanket around the Earth.” NASA, NASA, 10 Aug. 2017, climate.nasa.gov/causes/.

This website clearly points out the direct and indirect causes of global warming. Not only does this website discuss the scientific causes but also the role that humanity plays on global warming. This source is reliable because it gives detailed, scientific explanations for what is stated and also comes from a well-known organization who can be trusted with factual information. This source is helpful because it gives a clue into the causes, which in turn allows more efficient solutions to be formulated.

1. “Climate Change Impacts.” Climate Change Impacts, National Oceanic and Atmospheric Administration, [www.noaa.gov/resource-collections/climate-change-impacts](http://www.noaa.gov/resource-collections/climate-change-impacts).

This source describes the specific impacts climate change has had on countries and the predictions on what future occurrences might take place as a result. This is a useful source because it aims at connecting this seemingly irrelevant issue to everyday occurrences. This source contains many unbiased and accountable pieces of information because they are referenced from other accountable sources. This source is helpful because it allows people to explore environmental catastrophes that have happened in the past and from there gain a better insight to the problem as a whole.

1. “Climate Change Indicators in the United States.” EPA, Environmental Protection Agency, 19 Dec. 2016, 19january2017snapshot.epa.gov/climate-indicators\_.html.

This website discusses the many climate change indicators that can be seen daily in various countries. With this information, many people are able to better connect this issue of climate change to their everyday lives and take precautionary measures to prevent this issue from worsening. This website may be bias to the EPA organization as it revolves around their purpose and previous actions taken, but this website can also be credible for the factual evidence it includes. This site is ultimately helpful for finding ways to better connect your audience to the overarching, worldwide issue. With this evidence one should create solutions that seem appealing to the various countries and people worldwide.

1. “Global Warming: News, Facts, Causes & Effects.” LiveScience, Purch, 2018, [www.livescience.com/topics/global-warming](http://www.livescience.com/topics/global-warming).

This website depicts the latest news, facts, and statistics of global warming. This website also discusses the basic definition of the term and how it affects everyday life. This is a credible source because it gives specific statistics that correspond to those of other sources, therefore also proving that this source is unbiased. This source is beneficial because it gives insight into the major role climate change plays on the earth, through the use of numbers and statistics.

1. MacMillan, Amanda. “Global Warming 101.” NRDC, NRDC, 8 Feb. 2018, [www.nrdc.org/stories/global-](http://www.nrdc.org/stories/global-)warming-101#weather.

This website displays the most asked questions about climate change and addresses these questions with evidence and thoroughly explained answers. This source is reliable because it addresses and references many studies and concrete evidence from well-known, reliable organizations. This is an extremely useful and helpful site to use as it answers many of the most frequently asked questions and can provide assistance in the creation of detailed and factually correct solutions.

1. “Brick-and-Mortar Solution to Global Warming.” *U.S. News & World Report*, U.S. News & World Report, [www.usnews.com/opinion/articles/2016-06-09/green-building-is-the-most-economical-short-term-answer-to-climate- change](http://www.usnews.com/opinion/articles/2016-06-09/green-building-is-the-most-economical-short-term-answer-to-climate-%20%20change).

This website provides valuable information that can be deduced to formulate solutions regarding industrial buildings and how inefficient they are. It shows an example of a way to reduce greenhouse gas emissions and specific statistics to how this plan leads to a brighter future. Also, it comes from a reliable source that features graphs and chart to guide the individual who’s viewing’s comprehension.

1. “Climate Change.” *United Nations*, United Nations, [www.un.org/en/sections/issues-depth/climate-change/](http://www.un.org/en/sections/issues-depth/climate-change/).

This website is the most reliable source for gathering date on the UN, as it is the UN’s website itself. It provides crucial information on previous UN efforts, implementations, and intentions along with examples of their previous actions. In addition, it’s organized extremely clearly and categorizes the different actions in an understandable manner. Whoever uses this source will find lots of key information on what the UN’s already done, so they don’t repeat a mistake or failed effort already attempted.

1. Denchak, Melissa. “Are the Effects of Global Warming Really That Bad?” *NRDC*, 9 Apr. 2018, [www.nrdc.org/stories/are-effects-global-warming-really-bad](http://www.nrdc.org/stories/are-effects-global-warming-really-bad).

This website also discusses the effects and outcome of the world if the climate change problem isn’t addressed, and the global warming continues to get worse. It gives vast amounts of detail to each effect that make it clear just how serious this issue is, and what human actions have caused this. It’s also filled with statistics and quotes coming from scientists that are valuable in writing a quality position paper. Lastly, being a well-respected organization, this source is seemingly reliable and is up-to-date being posted in 2016 with the current problem.

1. “Electric Aircraft Might Become an Industry Standard Sooner than Expected.” *Flying Magazine*, [www.flyingmag.com/electric-aircraft-might-become-an-industry-standard-sooner-than-expected](http://www.flyingmag.com/electric-aircraft-might-become-an-industry-standard-sooner-than-expected).

This website provides detail on an incredible innovation made by an industrial company that could be very valuable in forming solutions. It alludes to an era of electric air travel, and discusses targets, goals, and statistics on how the planes would work and how the powertrains would vary based on the size of the aircraft. By using this source, you can develop a solution on how to properly invest funds or engineer more efficient concepts inspired by this one from Siemens Magnus.

1. Richards, Cory. “What Is Global Warming?” *National Geographic*, 30 Jan. 2018, [www.nationalgeographic.com/environment/global-warming/global-warming-overview/](http://www.nationalgeographic.com/environment/global-warming/global-warming-overview/).

This website provides significant background and clarification to what exactly the issue is. It brings up what the greenhouse effect is, how greenhouse gases are released, and what this ultimately means on a world scale. It ensures the reader understands why the climate change problem is happening, defines multiple key terms on the topic, and comes from a source renowned for being reliable (National Geographic).