

IAEA

Introductions from your IAEA Dais

Dear delegates,

Welcome to IAEA! My name is Tejas Narayan, and I'll be your chair for this committee - for those of you that don't know, that means I'll be the one in the front banging the gavel. I'm a junior at Stuyvesant High School, and I joined our school's Model UN team after transferring in sophomore year. Though I was intrigued by the activity in middle school, I didn't have an opportunity to try it out for myself until freshman year, where I instantly fell in love with it while struggling to reunite Korea - which we did! Ever since then, I've seized every opportunity to participate in as many conferences as I can. This will be my second experience at the front of the committee room, and my first as a chair - I previously was a co-director for Stuy's newly introduced beginner-oriented conference miniMUNC earlier this year. Outside of MUN (though junior year serves well to stifle such pastimes) I enjoy writing fiction, and am coming close to publishing my first fantasy novel. Additionally, I try to spend my summers on high-altitude treks whenever I get the chance, and I have a special passion for computer science.

Another of my interests is physics, which brings the topic to this committee in particular. However much or little anyone knows about current events, it would be hard to miss the relevance of nuclear power, and the fine line separating it from the most destructive weapon humanity has ever created. As delegates of the IAEA, it will be your job to navigate that line, ensuring that countries around the globe are able to harness the energy of the nucleus without paving the way for a war that could exterminate humanity. There are many different ways every one of you can take this committee, and I look forward to seeing the solutions and viewpoints each delegate brings to the table.

Best wishes, Tejas Narayan tnarayanoo@stuy.edu

Welcome Delegates,

My name is Leon Maksin, and I will be your director for the International Atomic Energy Agency. I'm currently a junior at Stuyvesant High School, and have been part of the Model UN team since my Sophomore year. In addition to MUN, I am also the co-president and co-founder of our rocketry team, and have an immense passion for physics. I can't wait to watch delegates from all around the city take part in this committee on nuclear energy, a relevant topic in both modern physics and politics. I wish you all the best of luck, I hope you find this topic as fun and as interesting as I do.

All the best, Leon Maksin lmaksinoo@stuy.edu

Committee Information

Although the actual IAEA consists of 170 members, we have reduced this number to thirty so as to provide for a more workable committee. In addition, though the DPRK left the Agency in 1994, it has been included on the roster for the purposes of this committee.

This committee is specialized, which means that it is mainly run using the procedure of a GA, but tends to center on more specific topics (such as regional conflicts) and in this case, incorporate some crisis elements as well. Over the course of the day, depending on the flow of debate, delegates may expect to see anywhere between one and four crises. In addition, delegates will be able to send crisis notes and directives, but are advised not to let this take precedence over frontroom debate as it is not the focus of the committee. When sending crisis notes, no delegate has individual portfolio powers, but can recommend any action to the head of his or her country's head of government who will then decide whether to execute it or a variant of it. In addition to directives, the committee should attempt to pass at least one resolution by the end of the second session.

Though position papers are not required for this conference, delegates are strongly encouraged to write them as country stance plays a vital role regarding our topic. Position papers and how delegates complement them in committee will be considered while choosing awards. All position papers are to be submitted in .docx or .pdf format to tnarayanoo@stuy.edu or lmaksinoo@stuy.edu before the beginning of the first committee session on April 13th. Alternatively, delegates may hand in print copies of their position papers at the start of committee. **Please do not share Google Docs with us.** Any delegate wishing to receive feedback on his or her position paper should submit them by 11:59 PM on Tuesday, April 9th, four days before committee.

Committee Background

The IAEA is an organization comprised of representatives from most countries currently recognized by the United Nations. The purpose of the IAEA is to is to promote the peaceful and developmentally beneficial use of nuclear technology. Originally founded in 1957 in response to the growing tensions regarding the relatively recent use of the atomic bomb and the subsequent developments in its branch of physics, it was inspired by U.S. President Dwight D. Eisenhower's "Atoms for Peace" speech to the UN General Assembly four years prior.

Following the Chernobyl disaster in 1986, the IAEA started to direct most of its focus to the field of nuclear safety. The IAEA heavily enforces safety and protection for nuclear plant workers and facilities. A large priority of the IAEA is knowledge management, as nuclear energy research is important for the safety and efficiency of nuclear energy use. Countries are encouraged to uploaded any new findings to the knowledge base, improving nuclear energy use for technology. The IAEA launched a Nuclear Knowledge Management (NKM) program in 2002.

Historical Example - The Iranian Nuclear Deal

On July 14th, 2015, a nuclear deal was negotiated between China, France, Germany, Russia, the United Kingdom, and the United States. This deal allowed Iran to pursue nuclear energy and research plans, while imposing heavy restrictions, such as allowing inspectors from the IAEA and limiting Iran's uranium to 3.66% enrichment. This deal allowed Iran to improve infrastructure through more efficient power generation. However, many aspects of the deal also appeared problematic, and that these limits will not hold. Iran requires a 24-day notice from IAEA inspectors, so Iran can easily cover up broken terms of their agreement. Iran has also made many threats against Israel, and is clearly unafraid to go to war with them. In May 2018, the U.S., under president Donald J. Trump's administration, the Iran nuclear deal was abandoned.

Saudi Arabia and Iran are on bitter terms, and have no diplomatic relation with each other. Therefore, there is a great fear in giving either country tools to develop nuclear weaponry, as if one country were to develop them the other would be sure to follow. The Iran deal also holds a precedent for other middle eastern countries regarding nuclear deals, and may make Saudi Arabia feel entitled to a deal as well. This same concept applies the other way around, and if Saudi Arabia's deal were to go through Iran would also immediately try to negotiate another deal.

Topic - Saudi Arabia's Nuclear Contract

Close to the start of 2018, Crown Prince Mohammed bin Salman of Saudi Arabia announced his country's plans to transition to nuclear power, primarily eyeing United States firm Westinghouse for the construction of the first plant. Over the next twenty-five years, fifteen plants are expected to follow in an investment of over 80 billion USD.

Currently, Saudi Arabia is in talks with energy firms from more than ten countries around the world, but both national governments must agree on a nuclear cooperation agreement before any purchase is finalized. Such an agreement would ideally prevent the further expansion of nuclear weapons, but would be hard to enforce. What makes matters more difficult for countries like the United States is that Riyadh insists on manufacturing its own nuclear fuel domestically, rather than outsourcing it at lower prices, and refuses to agree to UN inspections for signs indicating the development of a bomb. Additionally, Prince Mohammed's claim that "Saudi Arabia does not want to acquire any nuclear bomb, but without a doubt, if Iran developed a nuclear bomb, we will follow suit as soon as possible" has sent a worldwide signal regarding the dangers of providing his country with nuclear technology as well as the threat that Iran's nuclear situation poses towards the problem of further proliferation.

A nuclear power plant operates by utilizing the energy radiated by splitting uranium-235 nuclei to boil water - however, most natural uranium is in the non-fissile form uranium-238. This means that viable nuclear fuel must be enriched, or purified to

a higher concentration of uranium-235 before use. Uranium is typically enriched to a maximum of 20% U-235 in reactors, but if it is further enriched to around 60 to 90%, it is considered of weapons grade and can be used in a bomb. As a result of this, Riyadh's demand for local enrichment is deeply worrying to many countries around the world, as it gives them one of the most important facilities required to develop nuclear armaments.

In 2011, Saudi Arabia negotiated a similar nuclear deal with South Korea - however, this agreement did not entail the actual construction of any reactors, and served mainly to place restrictions on any fuel or equipment received. By the terms of the agreement, Saudi Arabia could not enrich any uranium obtained past 20%, but due to enriched uranium's lower mass per unit U-235, it is far easier to further enrich at this stage than it is to get it there. It is from here, primarily, that the fear of a growing arsenal sprouts - with atomic weapons so close to Saudi Arabia's grasp, the danger that they might seize upon this opportunity is too dangerous for most countries to ignore. Especially now, in light of the murder of vocal Saudi government critic Jamal Khashoggi (a killing attributed to the government itself), the question continues to stand: can Prince Mohammed be trusted with the power of the atom itself, the power that ended the Second World War?

Possible Stances

As is the case with most any scenario involving nuclear weapons, the tense balance across the world means that every country has its own agenda, its own plan for how best to defuse the situation. However, to push those agendas on an international scale, it is important for countries to compromise and find common ground, especially in the case of a dispute this delicate. Here, you can find some examples of positions you and your fellow delegates will be likely to agree on.

Firstly, many countries that currently employ nuclear power and have relatively free access to atomic weaponry hold considerable influence over the rest of the world, by means of military supremacy, energy and scientific advancement leading to development, and the use of nuclear plants as bargaining chips in trade with their neighbors. These countries will likely advocate for free trade without restrictions involving nuclear energy, so as to fully exercise this power. Though they would typically include the United States, China, and Russia, the former nation may hope for these restrictions to be implemented to avoid competition from other countries less likely to impose conditions on a planned nuclear deal. In addition, countries seeking out these deals, like Saudi Arabia and Iran, would advocate for absolute free trade in order to advance their own nuclear programs without external interference.

Instead of this, another position that may be taken by the United States in particular is that of restricted access to nuclear fuel. As described above, a part of the controversy surrounding the deal currently in progress is Saudi Arabia's demand that they be allowed to domestically enrich the uranium to be used in their reactors, which the U.S. is reluctant to allow. Countries that support the propagation of nuclear energy to less developed states, but still want some safeguards against weapons development, may opt for this solution. Alternately, these restrictions could be implemented in the form of regular inspections, or requiring the approval of certain countries or organizations (for instance, the IAEA itself) to complete any given nuclear deal. Depending on how involved they are and the power they hold, countries may choose to support one, several, or all of these plans, resulting in possible divisions during

committee. Most of the delegates present will find this an attractive compromise, but we would like to emphasize that each nation's future goals might not align with this, and many of the IAEA member states have been specifically chosen to oppose the simple answer of restricted trade!

Some of these countries, like Germany, Belgium, and Italy, have over time moved to phase out nuclear power entirely. Countries like this, who share the opinion that the political environmental dangers of atomic energy outweigh the scientific and economic benefits, are more likely to support the promotion of non-nuclear renewable energy sources, such as solar or wind power than that of nuclear trade restrictions. These countries, who oppose nuclear energy and wish to eliminate it entirely, will most probably propose ways to guide countries seeking nuclear deals towards safer alternatives.

Another route that such countries might take is that of attempting to eliminate nuclear technology entirely, by placing bans on its use, development, and expansion. Although this will almost certainly not happen during committee, delegates moving for this solution can pass directives taking smaller steps towards this end goal.

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