THE BROOKINGS INSTITUTION

FALK AUDITORIUM

THE 2022 NATIONAL DEFENSE STRATEGY A CONVERSATION WITH COLIN KAHL

Washington, D.C.

Friday, November 4, 2022

PARTICIPANTS:

Opening Remarks:

SUZANNE MALONEY

Vice President and Director, Foreign Policy, The Brookings Institution

Discussion:

MICHAEL E. O'HANLON, Moderator Philip H. Knight Chair in Defense and Strategy Senior Fellow and Director, Strobe Talbott Center For Security, Strategy, and Technology The Brookings Institution

ROBERT EINHORN

Senior Fellow, Arms Control and Non-Proliferation Initiative, The Brookings Institution

AMY J. NELSON

David M. Rubenstein Fellow, Strobe Talbott Center For Security, Strategy and Technology The Brookings Institution

COLIN KAHL

Under Secretary of Defense for Policy, U.S. Department of Defense

MELANIE W. SISSON

Fellow, Strobe Talbott Center for Security, Strategy, and Technology The Brookings Institution

* * * * *

PROCEEDINGS

MS. MALONEY: Good afternoon, all. Thank you so much for joining us here in person in

our Falk Auditorium, and those of you who are joining us online, or on television. I'm Suzanne Maloney.

I'm vice president and director of Foreign Policy here at the Brookings Institution. And on behalf of all of

my colleagues in Foreign Policy, and especially in our Strobe Talbott Center for Security, Strategy, and

Technology, I'm delighted to welcome you here today to this very special event on the 2022 National

Defense Strategy.

We are sincerely honored to be joined by one of the Biden administration's most senior

and most thoughtful officials, Undersecretary of Defense for Policy, Colin Kahl. The 2022 National

Defense Strategy was released just last week. The document sets forth the department's strategic

priorities, and details how it plans to protect and advance vital U.S. national security interests, including

defending a stable and open international system around the globe.

Consistent with the 2022 National Security Strategy, the NDS identifies the People's

Republic of China as America's main strategic competitor and pacing challenge and identifies Russia as

an acute threat. The NDS also outlines how the United States will continue to address heightened risks

posed by North Korea, Iran, violent extremist organizations, and emerging challenges such as climate

change.

In an effort to link strategy and resources, it's notable that this time, for the first time ever,

the department released the NDS together with the Nuclear Posture Review and the Missile Defense

Review. And by centering Secretary of Defense Lloyd Austin's concept of integrated deterrence, the NDS

reinforces the exigency of effective coordination and utilization of all of the instruments of U.S. national

power to address the monumental challenges facing this country.

We are deeply grateful to have the opportunity to come together today to discuss how the

newly released NDS positions the United States to meet the challenges of what the document describes

as this decisive decade, and to address the critical elements of the 2022 Nuclear Posture Review and the

2022 Missile Defense Review.

We'll begin our event today with Dr. Colin Kahl in conversation with Brookings senior

fellow and director of research, Mike O'Hanlon, and with Brookings fellow, Melanie Sisson. A panel

discussion featuring Brookings experts, including both Mike and Melanie, as well as senior fellow Bob

Einhorn, and Rubenstein fellow Amy Nelson will follow.

I'm really delighted to welcome Colin back to Brookings. We've been very fortunate to

engage with him over the years on a number of issues around our policy research. Dr. Kahl was sworn in

as Undersecretary of Defense for Policy on April 28, 2021. He is responsible for the formulation and

coordination of national security policy within the Department of Defense.

Prior to rejoining government, Dr. Kahl was most recently the codirector of the Center for

International Security and Cooperation, the inaugural Steven C. Házy senior fellow at the Freeman Spogli

Institute for International Studies, and a professor in the Department of Political Science at Stanford

University. He previously served as deputy assistant to the President, a national security adviser to the

Vice President from 2014 to 2017, advising President Obama, and then Vice President Biden on all

matters related to U.S. foreign policy and national security affairs.

And now, as our session today gets underway, a final reminder that we are on the record,

and we're also streaming live. So, those who are viewing virtually, please send your questions to us via

email to events@brookings.edu or on Twitter using the hashtag #NationalDefenseStrategy. For those in

the room, we'll reserve the last few moments of each panel for Q&A. Staff with microphones will come

around. Now over to you, Mike and Melanie, for the conversation. Thank you.

MR. O'HANLON: Suzanne, thank you. And thank you, everybody, for being here,

especially Dr. Kahl. It's really a pleasure. I just want to put in a word of personal gratitude and admiration

for all you've been doing for the country, and all I've learned from you over the years and the opportunity

now to collaborate today and hear about the National Defense Strategy.

So, I thought I'd begin just with a broad question, which is, for those who haven't yet read

it -- or for those who have but want to know what's most important to you -- what would you say are two or

three of the most important findings or arguments or themes of this review, which just came out last

month?

MR. KAHL: Well, first, thanks, Suzanne, for the kind introduction. Thanks, Mike. It's

great to be here. It's wonderful to be with all of you. And for those of you online, and you -- when you

submit your questions, just know that all the microchips that the vaccines have put in my head will also

broadcast them in real time.

So, look, I think the central challenge or premise of the National Defense Strategy is the need to sustain and strengthen deterrence at a time when the geopolitical landscape is fundamentally

changing. You have a rapidly rising China. You have a more aggressive Russia. You have persistent

threats from Iran, North Korea, and violent extremist groups.

But you also have a technological revolution, which is informing all of those trends, and a

set of transboundary challenges -- climate change, pandemics, and others -- which are generating real

international security challenges, but also real demands on the Department of Defense. So, the National

Defense Strategy has to grapple with that landscape.

Consistent with the National Security Strategy, it defines the People's Republic of China

as our pacing challenge. That term, pacing challenge, basically just is meant to reflect the reality that the

PRC is really the only country with both the intention -- and increasingly, the capability -- to completely

reorder international politics, and to challenge the United States, you know, militarily, but also

technologically, economically, diplomatically. And so, it's a challenge. And as we think about the

activities of the department, and the world that we have to be prepared to interact in, not just now, but in

the decades ahead, we need to pace to that challenge.

That doesn't mean that we're, you know, ignoring other challenges. And the most acute

challenge at the moment is obviously Russia, which is defined as an acute threat in the document -- the

National Security Strategy discusses it similarly. That word acute is very intentional, because it means

both immediate and sharp.

Russia simply does not have the capability to remake the international order in the way

that China does. It does have the capability to blow up the world, though. And Vladimir Putin has shown

himself to be reckless and capable of profound miscalculation and is directly threatening the security

order in Europe and beyond through his aggression toward Ukraine. And so, the strategy takes the

Russian challenge very seriously as well.

I would say, you know, there are a lot of core concepts in the document which we can

talk about. I think one that I would highlight is this concept -- you've written about this as well, Mike -- of

integrated deterrence, and what that means. In some ways, it's a way to remind ourselves that

deterrence activities have to be integrated in various ways, so integrated across domains. So, not just air, sea, land, but also cyberspace, the informational domain space, as in outer space.

Integrated across theaters, because the challenges we face, especially with other major powers, are global. China is obviously, you know, first and foremost a challenge perhaps in the Indo-Pacific, but they have real interest in Africa and the Middle East, in Latin America. Increasingly, in the Arctic, Russia's similarly a global challenge.

Integrated across the spectrum of conflict, because we know that the competitors, rivals, and adversaries that we have to contend with are, you know, on the one hand, challenging us every single day in the gray zone, capable of conventional conflict, but also the shadow, the specter of nuclear conflict also lingers in the background. So, we have to deter across that spectrum.

But the point -- but we also need to make sure that we're integrated across the tools of the U.S. government. The U.S. military needs to remain the most potent military in the world, and it will, but we have other potent tools in our toolkit, too, to include U.S. dominance of the global financial system, and our unmatched political power. And the other aspect that needs to be integrated are allies and partners.

So, the integrated part of integrated deterrence is important, but the last point I will make -- and sorry for going on for so long -- is to try to actually think of the way in which we deter and the various logics that inform that in meaningful ways. So, in a lot of the scenarios that we have to plan against, we have to contend with the possibility of a potent regional actor that engages in a very short, sharp lunge at an ally or partner, to kind of create facts on the ground, and essentially dares to start World War III, to roll them back, and so, those kinds of fait accompli scenarios. So, how do you design a strategy around our ability to deny that type of theory of victory to deter it from happening? So, strategies of denial matter a lot.

Another core concept is resilience. And the reason resilience is important is that our adversaries have gone to school on the American way of war. They understand the American reliance on various networks in cyber, in space, in the informational domain. And they have spent hundreds of billions of dollars to try to hold those networks at risk. And so, these are -- you know, the attack surface is too wide to defend every point of it, so you have to make sure your networks are resilient so that you

could fight through the inevitable disruptions that your adversaries plan for you. So, resilience is at the

heart of it.

And then the last but not least of course is cost imposition. The ability to credibly signal

to adversaries that if you threaten the United States, our allies, our partners, our homeland, we have the

ability to make you pay a cost far in excess to the benefits of aggression. And obviously, the ultimate

backstop of that is our nuclear arsenal, but there are other capabilities -- potent conventional capabilities

that fit that bill, too. So, that's -- there's a lot more in the document. I suspect some of you have already

had a chance to read it, but those are some things I'd highlight.

MR. O'HANLON: Thank you. Fantastic first answer. Let me just probe on a couple of

the specific ideas. And you spent some time on integrated deterrence, so let me ask you about that and

actually pick up on the way it's starting to reach the political debate where some Republicans are saying -

- this is an excuse by the Biden administration -- not to adequately fund defense, because what you're

trying to do is pass the buck to other agencies instead of relying on the armed forces to prevent a war,

you know, themselves. How do you respond to that critique? How do you think of it? And are there any

particular kinds of scenarios -- besides the gray zone -- but any particular scenarios that are really on

your mind when you're thinking about integrated deterrence?

MR. KAHL: Yeah. So, first of all, I think it's hard to say that the Biden administration is

shortchanging the military when we've proposed a \$773 billion defense budget. Now, of course,

Congress hasn't funded that budget yet and I hope that that happens soon, because every day we don't

fund the budget, we're living off continuing resolutions. And so, you know -- and there's a debate on the

hill about whether it needs to be north of \$773 billion, and, you know, my guess is it probably will end up

north of \$773 billion. But it's hard to argue we're underinvesting in the military.

I'll also say we are making major investments in those military aspects of integrated

deterrence. So, our nuclear arsenal, which is the ultimate backstop and guarantor of our security, \$34

billion for modernizing the triad and nuclear command and control and communications are in just the

FY23 budget as part of our commitment to modernize the triad.

There's \$11 billion in there for cyber. And a lot of that is on cyber defense, but also

building up other cyber capabilities, because it is a domain of competition, and potentially, of conflict. And

the gray zone is alive and well every single day in cyberspace. Almost \$28 billion dollars for space.

MR. O'HANLON: Right.

MR. KAHL: And so -- and then there's, you know, other areas -- 7 billion for long-range

fires. There's a whole of -- a lot of these theories of resilience and denial and cost imposition, they're in

our budget. And one of the reasons why we released the NDS in classified form much earlier this year --

and we're grateful to the President for allowing us to do that, even though it kind of got ahead of the public

release of the National Security Strategy -- was precisely so that we could link to Congress our strategy

and our budget.

So, people can see our homework. And, you know, we can debate about whether we

have it calibrated exactly right, and that's completely fair game. But people should at least see that we're

trying to be thoughtful about the investments we're making and tying it to the strategy.

The only thing I would -- and as a comeback to this notion that, like, integrated

deterrence is passing the buck is -- in addition to the fact that we are putting ample resources towards our

military -- is that integrated deterrence is not an argument for our interagency partners doing more -- or

allies and partners doing more so we can do less. It's an argument that we need to do more, and others

need to do more alongside us. And as we all do more together, we have to integrate those efforts

together. And I would hope that that would be relatively non-controversial.

MR. O'HANLON: So, applying some of these big ideas to the specifics of China -- and

specifically, even further burrowing down to the Taiwan question, which I assume is one of your most

important considerations when you think about China as a potential military adversary -- what kind of

scenarios are on your mind most when you think about China and Taiwan? Are you worried primarily

about an amphibious assault where China tries to seize the island?

And by the way, if you are worried about that most, are we doing enough to, you know,

buy things that David Ochmanek and others have recommended, the sort of survivable sensors and anti-

ship weapons that can be based in the region without having to depend on aircraft carriers or airfields?

So, that's the amphibious side.

The other one is -- what I worry about more sort of the blockade contingency, whether it's

a tight blockade or a leaky blockade or something in between. Could you explain, in terms of the Taiwan

contingency, what do you worry about most? And could you apply any of these concepts or investments to one of those scenarios or the other?

MR. KAHL: Sure. I mean, first of all, I think the -- I mean, part of the reason why the PRC is described as a pacing challenge is because we perceive that this is a challenge that we confront right now, but it's a challenge that's also going to grow and change over time. So, you know, in the near-term, I don't -- you know, despite the reaction that the PRC had to Speaker Pelosi's visit, which was quite profound reaction, I don't think in the near-term that China is planning to invade Taiwan.

I think they want to apply coercive pressure on Taiwan. I think they want to establish a new normal around Taiwan. I think they want to put pressure on the international community to acquiesce to China's policy toward Taiwan. I am confident they want to do all of those things. I don't think in the next, you know, couple of years they're likely to invade Taiwan, but you never know.

In the next couple of years, I think there could be an incident. I think one of the things we're watching very closely is that, you know, the PLA Navy and the PLA Air Force have been -- especially the Air Force -- have been increasingly engaged in unsafe and unprofessional activities in the air. They come up and say hello, and we have surveillance aircraft in the region. They do the same with the Australians, with the Canadians in other cases. And sometimes, they do this in quite profoundly dangerous ways.

Back at the end of May, for example, there was a Australian reconnaissance aircraft operating in international airspace that a PLA fighter aircraft intercepted, flew right in front of the Australian aircraft, and released flares and chaff back into the engine of the Australian aircraft. That could have been a catastrophic outcome. All this is already in the public, whether you've heard about it in the past before.

But that's not a one-off. China is increasingly doing that. They're doing it over international airspace. And when you confront them with, why are you doing this over international airspace, they were like, well, you're too close to China. And they're just like, well, but it's international airspace. And they're just like, you're too close to China. If you don't want these incidents to happen, don't come close to China. And it's indicative, I think, of an effort by the PRC to establish a kind of sphere of influence. So, I think in the near-term, we have to be mindful that an incident could occur.

I think, you know, in the period after that, you know, clearly some of the ways in which the PRC reacted to the Speaker Pelosi visit were meant to test drive, you know, various maritime, air, and missile activities that might be involved in a blockade of Taiwan. And, you know, they bracketed the island in ways, so perhaps that's a scenario.

You know, I don't think that Xi Jinping has made a decision to forcefully, you know, take - you know, force reunification, but he has certainly given his military the charge to have that capability by the end of this decade, and probably by 2027. Again, not because a decision has been made to launch an amphibious invasion, but so his military has the capability to execute that, were here to make that decision. So, I think when you hear that 2027 timeframe, that kind of -- that's important to keep in mind.

Look, our policy has been consistent. We have a one-China policy. We would oppose a unilateral change in the status quo by either the mainland or Taiwan. Consistent with the Taiwan Relations Act, we will continue to provide Taiwan with the capabilities to defend itself, and also maintain our capabilities to maintain peace across the strait, because a conflict across the strait would have profound consequences for our national interest, but frankly, for the world. The economic consequences alone of a war with Taiwan would be cataclysmic for the international community. So, we all have a vested interest in that not happening.

In terms of our own investments, you know, China has really spent hundreds of billions of dollars to generate anti-access/area-denial capabilities, the ability to use long-range fires -- so, missiles, ballistic missiles, cruise missiles, surface-to-land, anti-ship, but also, you know, drones, advanced fighter aircraft, to try to increasingly track, and if necessary, target U.S. forces to the first island chain and beyond. So, we have to make investments in order to sustain deterrence to show that we can fight inside and through anti-access area/denial bubbles, whoever the adversary in that context might be, and we're making a lot of investments.

We have to continue to make investments undersea, because I think this is one of those areas, frankly, where American advantage has the opportunity to persist for a long time, and it is a real advantage. We have to think differently about the capabilities of the Marines and the Army. And, you know, the Marines have fundamentally remade themselves, kind of coming out of Iraq and Afghanistan, to refocus on the types of scenarios that one could envision in the Indo-Pacific and elsewhere.

The Army is also moving towards these multi-domain task forces. And then thinking

about how we're postured in the region so we are not quite as focused on just a handful of places and

overweighted in Northeast Asia, and really leveraging, you know, changing opinions in Japan, changing

opinions in Australia, and new relationships like AUKUS and the Quad and others, to really make sure

that we have a more diverse posture and set of relationships so that China understands that were they to

initiate a conflict, it would be to initiate a conflict with not just one or two countries, but a big chunk of the

global economy.

MR. O'HANLON: On the same China question, I've got -- I want to sort of get your gut

check on sort of who's ahead right now, if you will, and if that's even a meaningful question. And whether

we -- if we had dominance, you know, up to Taiwan and beyond in the '50s and '60s and '70s and '80s

and '90s, is it realistic to ever get close to that again, or is this just going to be a contested area in military

scenarios?

And related to that, what do you sense about the Chinese military's take on their own

capability and how far they've come? Do they really think that they are either now capable of defeating us

or that they will be soon, or maybe they think that our political will is such that we wouldn't intervene?

How do you assess the military balance today, and let's say 2027, based on what you can see happening

on both sides? And then how do you think the Chinese assess that military balance?

MR. KAHL: Yeah, that's a good question. I mean, obviously, I don't know, you know,

what Xi Jinping or his military leadership believes. China has unquestionably engaged in a breathtaking

modernization of their military. I mean, where they -- where their military is now compared to where it was

in the '90s or the aughts or even in the 2010s.

I mean, it's a -- and they've, you know, made a lot of investments in long-range fires, a lot

of investments in advanced aircraft. They've made enormous investments in cyber and space. And they

have built their entire military around being able to, you know, come after the United States and a

contingency. I mean, we have been their pacing challenge for a long time --

MR. O'HANLON: Right.

MR. KAHL: -- is another way to think about it. And they have constructed their military

around that. Where does the military balance reside now? The United States remains the most potent

military in the world, in the history of the world. And I'm confident that we will sustain that edge. The gap

has closed, you know, relative to the '90s or the aughts, but no one should doubt that the United States is

the most capable military in the world. And I don't think China doubts that actually, I think China is quite

aware of our capabilities.

And so, I think, you know, part of Xi Jinping giving his military, this kind of mark on the

calendar of 2027 is, in fact, recognition that they still have work, you know, to do. And our goal is to make

sure that, you know, that timeline goes to the right and to the right and to the right and to the right and to

long as possible.

I'll say one other thing that I think Chinese leaders are grappling with, because we're all

grappling with it, which is what are the lessons of Ukraine.

MR. O'HANLON: Right.

MR. KAHL: Because I think one of the lessons for Ukraine is you can look pretty darn

good on paper, and it doesn't mean you're going to fight very well. And the reality is that the Russian

military on paper looked like the second-best military in the world when they invaded Ukraine. They don't

look like the second-best military in the world, in practice. In fact, on any given day, they don't look like

the second-best military in the world in Ukraine.

So, I think that, you know, China's not fought a war since 1979. I wouldn't say the war

went great for them back then. The world has fundamentally changed. The type of conflict they're

contemplating, nobody has really fought. And if you're really thinking about an amphibious invasion

scenario, this is literally the hardest thing for any military to do logistically and in terms of execution.

And so, you know, it's one of those things where like -- I'm a football fan. it's like, you

know, we all spend all this time in the preseason. You look on, you know, who drafted who and who

traded who and who's got the best team on paper, and it never works out that way, right? Like, it turns

out, you got to play games. And the U.S. military has been at war for a quarter century, and there is an

intangible aspect to that.

We also have certain aspects of our military culture, the role that noncommissioned

officers play, the adaptability of our young officers, the sheer human capital, how we structure, how we

train, how we -- and it turns out, again, as we've seen in Ukraine, these things matter a lot. And so, you

ANDERSON COURT REPORTING
1800 Diagonal Road, Suite 600
Alexandria, VA 22314
Phone (703) 519-7180 Fax (703) 519-7190

know, my suspicion, I don't know -- my suspicion is that Xi Jinping probably thinks his military still has a

lot of work to do.

MR. O'HANLON: My last two questions, then I'll hand off to Melanie. Thank you for

these very illuminating and thoughtful responses so far. I'll put them both on the table and you could --

MR. KAHL: Sure.

MR. O'HANLON: One is just to compare the National Defense Strategy of 2022 in the

Biden administration and the Austin Pentagon to that of 2018 Undersecretary Mattis. There are certainly

a lot of parallels, and so, maybe one important parallel and one important difference, if you like.

And then the second question is this issue of how many conflicts do we need to be ready

for at once. You and I have been around through the debates over the decades. And for a long time

after the Cold War ended, we tried to have a two MRC, two -- you know, two-military regional contingency

kind of construct where Desert Storm was sort of the idealized model. But obviously, that's not what

we're talking about today.

So, now, we realize we probably shouldn't plan on fighting both Russia and China at the

same time, but we also can't rule out the possibility of opportunistic aggression by whichever one we're

not facing, not to mention Kim Jong-un, not to mention Iranians, or terrorists. So, how do you think about

the question of how many missions do we have to be able to do at once, and to the extent we're not able

to do all of them, how else do we deter if and when we're engaged in one major operation? So, those are

the two questions to ask you to comment on as you wish.

MR. KAHL: Sure. 2022 and 2018, I mean, here, I think -- you know, I think a lot of times

there can be, you know, a lot of pressure to really drive a big difference between the administrations from

different parties. And there are a lot of differences, obviously, between our administration and the

previous one.

But actually, as it relates to the National Defense Strategy, I think the 2022 document is

essentially the next natural iteration from the 2018 document. And I think the folks who were involved in

Secretary Mattis' document deserve a lot of credit for the kind of fundamental philosophical shift. It really

represented a change. It was kind of the move into the post-post 9/11 era where, you know, essentially,

Sunni Jihadist terrorism was our pacing challenge for 20 years.

MR. O'HANLON: Right, right.

MR. KAHL: And it led us to, you know, make massive investments in Iraq and

Afghanistan and elsewhere, and to really frame that military enterprise around a combination of

counterterrorism and counterinsurgency. The 2018 document, I think, recognized that terrorism remained

a significant challenge, but that it probably was now a secondary challenge relative to the re-emergence

of great power competition, and highlighting Russia and China, so a lot of credit to the team for doing

that. And in that aspect, there's a throughline between the 2018 and 2022 documents.

I want to point to a couple of places where there's some distinction. Even in recognition

of kind of the China and Russia challenges, I think the 2022 document -- and this is not a critique of the

2018 document -- the 2022 document just tries to differentiate the China and Russia challenges more.

MR. O'HANLON: Right.

MR. KAHL: This -- you know, we've already talked about pacing versus acute. Those

aren't just words. They actually are emblematic of the very different types of challenges and the

timeframes around those challenges. It's also -- just as it relates to certain capabilities, we are very self-

consciously pacing to China in certain areas. So, as we make investments in cyber, we make

investments in space, we make investments in maritime, long-range fires, aviation, we really are pacing to

the China modernization challenge.

Now, a lot of those investments would also pay dividends for Russia or North Korea or

Iran or others. There are other places where actually Russia, at least in the near-term, is driving some of

our investments. So, undersea, because Russia has a more capable undersea capability; nuclear, even

though Beijing is in the midst of this breathtaking nuclear expansion, obviously, Russia has the largest

nuclear arsenal in the world and a lower threshold probably for using that arsenal than any other country

in the world; also, in the land domain. So, there are ways in which we -- but we have tried to, I think, do

more differentiation between Russia and China.

The other two places I would just draw a distinction is this notion of resilience, which does

appear in the 2018 document, but is actually very front and center in the 2022 document, both because I

think we have even more clarity than we did in 2018 that our adversaries' theory of victory is to come after

our networks. And so, making our networks in cyber space and the informational domains resilient

against what we know they're going to try to do to us has to be central, therefore, to our theory of

deterrence, if that's their theory of victory.

But resilience also matters in the face of other challenges. COVID was a challenge to

resilience, and climate change is a massive challenge to resilience. You look at the number of American

bases that have been affected by extreme weather events, by flooding, you look at changes in the Arctic,

which is not only accelerating geopolitical competition, but putting real pressure on our infrastructure

there. You think about how climate change is going to challenge the resilience of whatever posture we

build in the western Pacific to deal with these problems, and you just think about the demand signal it's

putting on our own forces.

I use one datapoint -- some of you have heard me use this before. I know my military

aides hear me say this almost every day. But five years ago, the National Guard in the United States

spent 5,000 person days fighting wildfires. Last year, it was 175,000 person days fighting wildfires. So,

the demand signal on our military to respond to climate-induced emergencies at home and abroad is also

going up.

So, I think that's -- this is obviously -- the Trump administration was, to say the least, not

terribly comfortable about talking about climate change. They were very good about putting out Arctic

strategies that emphasized the changing environment in the Arctic, but very careful not to ascribe that to

human-induced climate change. So, I think that's another -- probably a difference that you see in the

document.

Oh, you say the opportunistic aggression, I'm sorry. And I'll be very brief. This is

something we think about a lot. I think we believe that the strategy is that we can walk and chew gum at

the same time. If we were to be engaged in any major contingency anywhere in the world, it would

obviously consume a lot of our resources, but we think we would have substantial residual combat-

credible forces in the other theaters where opportunistic aggression might occur.

We also feel like we have certain global strategic capabilities, not the least of which being

our nuclear deterrent, but also certain cyberspace and informational capabilities that could be brought to

bear to cover down in a second theater.

And then the other, you know, asymmetric advantage the United States has is our

unrivaled network of allies and partners. And so, one of the reasons the document puts so much emphasis on getting our allies and partners more capable, more interoperable, more integrated, is also a hedge against precisely a kind of two-war scenario that you talked about.

MR. O'HANLON: Excellent. With that, Melanie, over to you.

MS. SISSON: Great. Thanks, Mike. And thank you very much, Dr. Kahl, for being here and giving us the opportunity to really take a good comb-through of these important foundational documents.

I want to return us to a couple of the key concepts that you've already sort of touched on in the NDS, in particular, and return back to the question of integrated deterrence. And the way you described it was that this is, of course, not the United States trying to do less. In fact, it's the United States and the Department of Defense looking to do more. And one of the ways in which it seems to me that integrated deterrence will require more of us is because it's coordinated action across the interagency in particular. And so, I'm curious what the status is of the processes and the structures that are really needed for that kind of coordination.

MR. KAHL: It's a good question. Look, I can tell you how we've been dealing with it inside the department first, because I give Secretary Austin an enormous credit for -- and this really actually goes back to, you know, the crisis surrounding the NEO from Afghanistan -- but essentially running a set of what we call policy ops syncs where the secretary meets with the senior leadership in the building -- so, the chairman of the Joint Chiefs, the Vice, the Deputy Secretary, me, and a handful of other civilian and military leaders -- and then has every relevant combatant command on the screen to meet -- and during the Afghanistan evacuation, it was twice a day.

In the lead-up to the Russian invasion of Ukraine, we were meeting two or three times a week. And we've continued to pace on the Russia-Ukraine of meeting a couple of times a week on that issue in recognition -- not that we needed to micromanage things from Washington, but that the information flow needed to be flattened because decisions had to be made very, very rapidly and elevated very rapidly -- and leveraging, you know, essentially the ability to have secure video conferencing -- secret Zoom -- to connect in real-time across the entire span of the globe, leveraging the fact that we have, you know, with whether -- if it's in the Russia-Ukraine context, for example, obviously,

European Command is in the lead.

But there are real day-to-day actions by TRANSCOM that is working on the security assistance piece, by Strategic Command that is in charge of our nuclear deterrent, by Cyber Command, which is doing things every single day to help defend our networks and go on offense against Russian disinformation and other things, you know, our Special Operations Command, and our theater commanders in other parts of the world. So, we've been trying to leverage technology to try to flatten comms in the defense department and using this venue.

Interagency-wise, I mean, frankly, the interagency process that we have in the Biden administration would be recognizable to the interagency process, you know, probably with people who served at various points in the Trump administration or in the Obama administration or the Bush or Clinton administrations. So, I'm not sure that we've evolved our processes very much. Maybe we should. I leave that to smart folks and think tanks to help us think through.

I will say, I think -- I'm actually quite proud of how integrated we have been in the context of the Russia-Ukraine context. I think, actually, you know, we really -- we're kind of at the one-year anniversary of this crisis starting. You'll recall, it was at the end of October and early November where we had really started to firm up the intelligence picture that the Russians intended to do this.

We made, I think, the risky but right decision to downgrade a lot of that intelligence to share with not only our allies and partners, but to share with the world, and to use it to shape the information environment to try to get out ahead of what Vladimir Putin was doing. And the goal was really twofold. One was to make sure that our allies and partners were on our side so that we could respond rapidly diplomatically, economically, and militarily, and to back-foot Putin a little bit as he tried to do this.

And I think we were certainly successful on the first part. I think we are also successful in putting Putin on his back foot. I just think he miscalculated the will of the international community to actually execute the type of pressure that we've put on him militarily, economically, diplomatically, et cetera. And frankly, I think, in some ways, he continues to miscalculate that. But I actually think we did have a kind of whole-of-government response that will be the type of response that we will have to do in a future contingency.

MS. SISSON: Thanks for that. And I want to ask another sort of conceptual question.

I'm really also interested in learning more about this concept of campaigning that you have in the NDS.

And so, just simply, can you elaborate a bit on what it is and when we'll do it and why we'll do it and a little

bit about how we'll do it? Will I recognize campaigning when I see it?

MR. KAHL: Yes. It means going door to door and knocking on doors -- yeah, no that's

not it.

MS. SISSON: Different kind.

MR. KAHL: Different kind of campaigning. No. So, look, campaigning in part is an

admonishment to ourselves at the Department of Defense. One thing that we -- concern might not be the

right word. But when you put a concept like integrated deterrence on the table, there is, I think, a

tendency to think about it in terms of building and investing in capabilities, and then the capabilities kind

of speak for themselves. So, you kind of build things, you set them on the shelf, and the adversary sees

those scary things on the shelf and says, oh, I don't want to do that.

That's not actually how it works. There has to be a daily effort to shape the perceptions

of our competitors and adversaries so that they wake up every day, doubtful that they could achieve their

objectives if they engaged in direct aggression against, you know, the American homeland or against our

allies and partners.

And so, you -- to do that you have to be active. And so, what it really involves is a

reminder that as we are developing capabilities, what of those capabilities do we choose to reveal, and

how do we choose to reveal them to shape the perceptions of our adversaries? That could be a test, it

could be an experiment, it could be -- but also, as we're doing things like exercises, right?

So, we just had this exercise, it's still ongoing, on the Korean Peninsula called Vigilant

Storm that involves, you know, something like 240 U.S. and South Korean aircraft engaged in almost

2,000 air sorties in a single week to demonstrate how interoperable the United States is with South

Korea. We've had multi-carrier exercises where we've done a U.S. -- two U.S. carriers alongside a British

aircraft carrier and the Japanese equivalent of an aircraft carrier, you know, off the coast of, you know,

the Philippines, showing how interoperable we would be in a scenario in the western Pacific.

So, it's not just doing those exercises, it's also how those exercises are messaged. The

information kind of wrapping around it, and what you were messaging and the overt and the not-so-overt

ways towards adversaries to shape perceptions, it's things like that.

mentality of action.

The other part of campaigning, I would say, is in -- are in domains like cyberspace, where it's actually the day-to-day contact with competitors and adversaries. So, it's one thing to just build cyber tools, and they just sit there. It's another thing to actually develop tools and to constantly be in contact with the adversary. So, you do something, they react, you see how they react to adjust what you're doing, and you exploit that opportunity. You exploit that access. And it's that -- it's just a different

So, that's, you know -- so we see it as the way in which you do deterrence on a day-to-day basis, but also the way in which, day to day, you disrupt activities that could threaten our interests and where you compete in the gray zone. So, campaigning is really meant to kind of capture that.

MS. SISSON: Great. So, actually, I want to -- that's exactly what I wanted to ask next, which is, how do you think about the relationship between campaigning and the gray zone? And there's some language in the NDS about campaigning coming in response to, you know, acute forms of coercion carried out by a competitor. So, is Korea a current example of that kind of acute form of coercion and campaigning in the gray zone? Is that a reasonable way for me to sort of put those things together?

MR. KAHL: Yeah. I think there's a couple of things. I think, you know, one of the things we've seen a lot in the last year or so is the role of intelligence and information in shining a light on gray-zone activities in a way that makes those gray-zone activities less effective.

So, I'll give a couple of examples. You know, in the lead-up to the Russian invasion -further invasion of Ukraine, we outed a lot of the intelligence suggesting various false-flag activities that
Russia was planning. In a number of instances, they walked those off. But in other instances, they still
did it, but the effect of the false flag was already outed. And therefore, their effort to generate an incident
and then use that incident to justify something was complicated by the fact that we got out ahead of it in
the intelligence and information space. So, that's, that's an example of campaigning in the gray zone.

I think you've probably seen, you know, more recently, new stories about whether a country like Iran might be planning to attack Saudi Arabia, because they believe Saudi is stirring the pot inside of Iran. And the very fact of that information getting out in the public sphere has the possibility of convincing the adversary they can't get away with it. One of the things we've emphasized with our allies

and partners in this context is the role of domain awareness and pushing back against gray-zone activity.

So, you know, if countries like the PRC are going to use fishermen and maritime militia and other to do -- you know, making it clear that these are not independent fishermen doing things or not independent vessels, but are very clearly tied back to a conscious strategy, you know, and making sure that our allies and partners understand that, and that the world understands that and shining sunlight on it. So, a lot of it is kind of at that intersection of intelligence and information.

The other is through the activities to demonstrate your capability to deny the ultimate objective of gray-zone activity. So, to protect yourself, to defend yourself, and demonstrating those capabilities in a way to cast doubt in the eyes of the adversary that their gray-zone tactics will work. So, I don't know that it will -- it's not going to solve every problem, but a lot of competing in the gray zone is throwing a lot of sand in the gears on the other side, making it harder for them to get away with it and to be effective.

MS. SISSON: Thanks. So, I'm going to ask one last question, a relatively brief one, and then we'll turn to some audience questions. So, for those of you here in the room, start thinking now. If you haven't already written down your list of 20-or-so questions that you'd like to ask Dr. Kahl, this is a good time to start.

Dr. Kahl, the NDS is very specific about where the department will focus on deterring Russian attacks, and it is decidedly non-specific in the similar section about the PRC. Why the difference?

MR. KAHL: Well, I mean, I think -- first of all, I think the PRC challenge is more global than the Russia challenge. I think Russia's capability to engage in large-scale aggression is very focused on, you know, the eastern flank of NATO, and the other countries in the former Soviet space. But I mean, that said, I'm not sure I would make too much of it, frankly. I think, you know, when outlining the four NDS priorities, you know, priority three is deterring aggression. And if deterrence fails, prevailing in conflict with, you know, China -- Chinese aggression in the Indo-Pacific being our number one priority, and Russian aggression in Europe being our second priority.

And I think, you know, the most realistic scenarios for large-scale PRC aggression are in the in the Western Pacific. It could be something across the Taiwan Strait. It could be something in the

South China Sea. It could be something in the East China Sea. So, I think there is still a sense that the -- at least the regional conflict scenarios that are most likely to turn into a major contingency are either in Europe when you come to Russia, or in the Western Pacific when you're talking about China.

MS. SISSON: Great. Well, thanks. Thanks for entertaining the questions that Mike and I brought. We would like to turn to the audience. I will say that if the audience doesn't have enough questions, I'm sure Mike and I can find a few more as well. So, thanks. We'll start here. I'll start with Amy up here in the front, if we could, please.

MS. LIU: Thanks. Hi, Dr. Kahl. Thanks so much for your comments today, sharing your thoughts. A lot of language in the NDS about preventing escalation or deterring escalation from a conventional conflict to a nuclear one, but the language is -- alludes to the fact that we don't yet have an answer to this problem. Is there an answer out there? Similar to Melanie's question, will we know it when we see it? How is the department going to go about managing this problem? Thanks.

MR. KAHL: Yeah, I mean, it's -- and, you know, with my political scientist hat on, right? Deterrence is one of the thorniest questions that international security scholars have wrestled with, you know, for 50, 60 years, because it's essentially trying to prove why something didn't happen and under what circumstances things don't happen as opposed to showing, you know, what did happen. So, I don't think anybody's cracked the code on this.

I think a couple of things. I think, obviously, we want to deter conflict from happening, period. And then, of course, you want to keep conflict, you know, at its lowest possible level of violence, if possible, especially when you're dealing with a major nuclear power where the consequences of escalating from a indirect conflict to a direct conflict to a nuclear conflict, you know, suddenly take on kind of existential consequences.

I think we're -- I think there's going to be some learning by doing, frankly. I think the -- and I think we should have some confidence that our deterrence can operate. And I'll give you I'll give you an example. We are not direct party to the conflict in Ukraine. We are obviously helping Ukraine a lot. Russia knows we're helping Ukraine a lot. They also know that President Biden is 100 percent serious about defending every inch of NATO. And they know both the conventional and other capabilities we could bring to bear to make that commitment real, and deterrence is operated. Despite all of it's going

on in Ukraine, deterrence as it relates to coming after us, coming after NATO, has operated. And so, it is

possible.

I think that, you know -- we were talking about scenarios with the PRC earlier I think

deterrence is also operating there. I think the charge at the NDS gives us is the need to sustain and

strengthen that deterrence over time. But I think we will have to think, you know, more creatively about

how that works, especially when you're dealing with major conventional contingencies that involve a

nuclear power. And it's going to get even more complicated, because by the end of this decade and into

the early 2030s, for the first time in U.S. history, we will be dealing with not one, but two, you know, peer

nuclear `countries, as China, you know, quadruples their nuclear arsenal. So, we're going to have to

continue to work through this problem.

And, you know, part of it, it's going to be remembering lessons we learned from the Cold

War. You know, part of this is, you know, we're out of practice. This is something that we dealt with a lot

in the '50s, '60s, and '70s, and yet, we haven't dealt with it. So, there's a little bit of that Christopher

Columbus issue, which is just because it appears new to you, doesn't mean it's actually new. Like, a lot

of this stuff exists already, and we need to relearn those lessons. But then we need to identify those

areas where things are meaningfully different, and part of it could be that you're not dealing with just one

actor, but two.

I think the other issue that we have to think through and that the strategies are very

intentional about doing, about the NDS and the Nuclear Posture Review, is thinking about the cross-

domain implications of this, because I think one of the things that very much differentiates current

strategic stability equations from the Cold War is the prospect of stumbling into a nuclear war through

another domain.

From a cyber-attack through a massive attack in space, potentially undersea, there are a

number of scenarios where the commingling of conventional and nuclear capabilities or command and

control or other things, and the cross-domain implications of that, could lead one party to stumble across

a threshold they didn't even know was there. And so, I think we're trying to be very intentional about

thinking through those scenarios, in part, to understand how the adversary might do things to us, but also

where we need to be mindful that as we would conduct activities, we might -- we want to make sure we're

ANDERSON COURT REPORTING
1800 Diagonal Road, Suite 600
Alexandria, VA 22314
Phone (703) 519-7180 Fax (703) 519-7190

only sending the signals we intend to send, not the signals we don't intend to send in those domains.

MS. SISSON: Okay. Let's do the gentleman in the middle section here.

MR. POLZER: Oh, okay. I'm surprised. I'm Karl Polzer of Center on Capital & Social Equity. And the question here -- and your answer set up my question. So, I was thinking about as we -- like, the nuclear standoff has been a two-party game. And now, it's moving to a three, maybe four-party game. So, how does that change the -- it involves a preprogramed response that's communicated to the opponent. If you do this, I'll do that. So, is there a need to think, gee, should -- do we have to communicate an ancillary response to the third party that can also take over the world and the world economy that -- where the two main combatants have blown each other up? So, what kind of reserve do you need for that, and are you guys thinking about stuff like that? I mean, it sounds like you are.

MR. KAHL: Yeah, it's a really important question, and we are thinking about it deeply. I will say, I'm pretty sure what the answer is not. What the answer is, I think is still be determined. What I'm pretty sure the answer is not is that if one adversary has a thousand and the other adversary has 1500, that means you need 2,501, right? Like, it's not a game where, like, the person who dies with the most toys wins. Like, that's not how this is going to be determined.

And the reason I say that is because I worry a little bit that this emerging future of two nuclear peers, that there will be a lot of voices that basically say, well, if Russia has this and China has this, then we need this, plus this, plus one. It's going to happen. I just -- I don't think that's intellectually the right answer.

I think, intellectually, what the right answer is, is that you have to have enough capacity that is real, reliable, credible, so that if you had a contingency with one country -- and this goes really back to Mike's question on opportunistic aggression -- you would have enough residual capacity to deter them from engaging in the types of scenarios that could eventually escalate to the nuclear file.

And so, there's very much -- that's your residual conventional capacity, but also what your residual nuclear and other strategic capacities are. But then, also, to make sure that they understand that if they tried to take advantage of something that was going on over here to raise things to a nuclear level, that you still had the capability to generate unacceptable damage.

And the good news on that is, we do. I am quite confident that if we were in a major

contingency with any country in the world, we would have plenty of residual capacity to defend in the final

analysis the survival of the United States through a mix of all of our means. So, we have to be vigilant to

maintain that capacity, but I'm very confident in our ability to do that now. And we'll continue to have to

reassess that as the capabilities of our competitors change.

MS. SISSON: We'll go right here in the middle front. Thanks.

MR. PARK: First of all, thank you for joining this talk today. And my name is Jay Park

from Radio Free Asia. And actually, NDS emphasized cooperation with U.S. allies. So, in the situation

right now in North Korea and South Korea, there's a tension going on. And also, do you think this given

circumstance, General Security of Military Information Agreement between Korea and Japan should be

normalized because South Korea and Japan relationship was not that good before? So, I heard that also,

there are some difficulties to get accurate information when North Korea launched ICBM recently. So,

yeah, that's my question.

MR. KAHL: First, thanks for the question. And you're right that the NDS puts our allies

front and center. And obviously, you know, our treaty allies like the ROK and Japan, you know, are

central to our strategy and how it's implemented in the Indo-Pacific alongside other countries like

Australia and others.

I think one of the things we need to do is get back into a rhythm of making sure that our

forces and the ROK's forces are ready and interoperable. There was obviously -- you know, after the

series of exchanges between President Trump and Kim Jong-un, we significantly dialed back our

exercises. You know, I understand why that happened. I think that we need to get back into a normal

rhythm of exercising to not only demonstrate our readiness, which is important for deterrence, but just to

make sure that we're ready for any contingency. The exercise I alluded to earlier, Vigilant Storm, is an

example of that, I think you should expect.

Now, we shouldn't be doing things that are gratuitous. The goal is not to increase

tensions. The goal is to make sure in no uncertain terms that Pyongyang understands that the U.S. and

ROK militaries are extraordinarily capable and extraordinarily capable of operating together, so we'll

continue to do that.

The other -- but really, at the heart of your question is what the value of trilateral

cooperation is. And obviously, there's a long history between South Korea and Japan. I'm sure you've forgotten more about it than I will ever know. It does create political challenges. I think there is considerable scope in the military domain for meaningful trilateral actions. And in fact, after a number of North Korean provocations, you've seen instances in which the three countries have done things together, and instances where the United States has done things bilaterally with the ROK and Japan, but that they've been highly coordinated. And I suspect you're going to see more of that in the future.

I really do think that for all the, you know, meaningful historical and political differences between the ROK and Japan, you know, the threat picture, as it relates to the DPRK is very similar. And I think there's considerable scope to do more trilateral, and we'll lean into that as much as we can.

MS. SISSON: We have, I think, time for one more question, if we had a question from the young lady in the back there. Thanks.

QUESTIONER: Hi, I'm a grad student with the University of Maryland. Do you believe that China's Belt and Road Initiative is a direct threat and poses a risk to the U.S., especially with projects in Latin South America? How can the U.S. counter this initiative?

MR. KAHL: Yeah, I mean -- well, so first of all, is it a direct threat? I think it is an indirect threat. and I'm not trying to be a wise guy. I think that the mere existence of Chinese investments and infrastructure is not inherently threatening. Countries all over the world invest in infrastructure.

I think the thing that differentiates -- well, there are probably lots of things that differentiate the Belt and Road, but among them is that I think China has a very clear strategy to leverage its Belt and Road Initiative for multiple purposes, and some of them are military. And so, a port that could be useful for commerce and trade can also be useful as a power-projection vehicle. So, you know, I think we believe that, obviously, China has -- you know, they have a base in Djibouti, for example, but they have interest in building more facilities in Africa, in the Middle East, potentially elsewhere.

Other infrastructure -- so, when they invest in telecommunications infrastructure, for example, what type of access does that give them to sensitive data, and the ability to penetrate sensitive networks in the countries that they're operating in that can be a challenge to the information security of our allies and partners, but also a direct challenge to us.

You know, they do certain things, I think, under the scientific and commercial mantle. It

may or may not be associated with Belt and Road, but it might actually have military applications as well, to include, building infrastructure that supports their situational awareness and activities in space, building a telescope or a communications relay or things like that.

So, I think what we've -- you know, we're obviously not the department of infrastructure, we're the Department of Defense, so we're not in charge of pushing back against, you know, every Belt and Road Initiative elsewhere. I think we are very mindful, though, in the strategy to be aware of the places where China is trying to make significant inroads in the infrastructural domain that would have dual-use military applications, and then making sure that our allies and partners, the countries involved, actually understand the full implications of what they're getting into, because, I think, sometimes, they don't.

This is another example of pushing back in the gray zone, that actually sharing information and intelligence and really communicating what some of the security implications are actually plays a role in backing countries off. I actually give the Trump administration credit in the Huawei example of doing this with various allies and partners. So, we'll continue to do that.

The last point I will just make is -- and it really goes back to the very beginning -- one of the things that makes China the pacing challenge is that they have ambitions. And I do not think we should understate the fact that China wants to dominate the commanding heights of the technologies that will govern the rest of this century. They also want to dominate the underlying infrastructure of those technologies, the underlying supply chains associated with those technologies, and the underlying standards and rules that go along with those technologies. And they want to do it to make the world safe for the CCP. That is, to make the world conducive with the PRC's interest and the ideological preferences of the CCP. I don't actually think that's a secret.

And so, I think, one of the ways in which the China challenge is just different is that those decisions will impact our security, our prosperity, and our way of life in ways that are sometimes direct but sometimes are circuitous, but no less impactful. So, we just have to be vigilant about that.

MS. SISSON: Well, Dr. Kahl, on behalf of the Brookings audience, Brookings Institution, Mike and myself, thank you very much for joining us today to talk through the National Defense Strategy, as well as a number of other of the excellent questions that the audience raised today. We appreciate

your time. We thank you for the work that you do and wish you well. Thanks for joining us. (Applause)

MR. KAHL: Thanks, Melanie. Thanks, Mike.

MR. O'HANLON: I really appreciate it. It was awesome.

MS. SISSON: And for the audience, as Dr. Kahl departs, we'll take a moment for a transition into the next section where we're going to have the opportunity to hear from Bob Einhorn and

Amy Nelson who Suzanne Maloney introduced earlier to share some of their thoughts and expertise. So,

we'll see you in just a few moments.

MR. KAHL: Thank you so much.

MS. SISSON: Thank you very much. Really appreciate it. Nice to meet you in person.

I've seen you on --

(Recess)

MS. SISSON: All right. Thanks, everybody, I think we're going to go ahead and get

going with the next segment here. I'm delighted to be joined by our colleagues, Amy Nelson and Bob

Einhorn. We have a lot to cover, so it's a good thing that I know that they will have a lot to say. And

please, also, again remember to keep in mind that we'll love to have your questions towards the end. So,

if you find something particularly provocative or confusing, make sure to note it down so that you can ask

the appropriate person when the time comes.

So, I want to just dive right in. And Mike, I actually want to start with you, if I could. I'd

love for each of you to give sort of your reactions to what Dr. Kahl shared with us about the NDS, with the

NDS, generally, if there are areas of particular interest, particular confusion, things you think are very

important to be aware of, anything that really caught your attention.

MR. O'HANLON: Thanks, Melanie, and thanks for the questions you asked him, which

helped me answer that question in my own mind. I think just -- I'll focus on one issue, because it's the

issue that's troubled me a little bit with the National Security Strategy and U.S. foreign policy in general,

which is the potential to overdo our emphasis on the China threat. But I don't think that Secretary Kahl

did anything wrong. I don't think the National Defense Strategy does anything wrong. The choice of term

pacing challenge is, I think, right on. And he explained very clearly why you should think of China as the

pacing challenge. And he described enough specific scenarios that should worry us, that we do need to

take them very seriously, because if a Taiwan fight began and we got involved, as President Biden has said we likely would, preventing nuclear catastrophe becomes the overriding concern, and World War III is well underway -- or at least, you know, on the doorstep. So, I think he's right, from a Pentagon point of view, to take the China concern very seriously.

However, I am worried that the rest of Washington and on both sides of the aisle may overdo it, that, for example, when the national security strategy again accuses China of genocide in Xinjiang province, for example, I think that's the wrong term. It's severe human rights abuse. That's bad enough. Let's call it by that name like the UN High Commissioner for Human Rights did a few months ago.

That's not, you know -- I mean, China doesn't go around threatening nuclear weapons use on a almost daily basis or claiming some right to the territory of U.S. treaty allies, but Vladimir Putin does. And so, getting this balance right of which is the greater threat, I think, is quite important.

Again, Secretary Kahl, I think, convincingly argues that the Pentagon has to worry about both in different ways. But I think the overall National Security Strategy and the overall tone of Washington verge on overdoing it. I've had people on the stage in recent months who have called China an adversary, for example. I don't think that's the right term. I think China is a serious rival. But we should be trying, as Mike Green has recently argued in the pages of *Foreign Affairs* -- Mike Green, the former Bush administration official -- we should be working with our allies in the region to try to steer China back towards greater compliance with the rules-based order. That should be the purpose of our competition, as opposed to competition for its own sake.

So, I just -- I think we slightly overdue the anti-China rhetoric, not so much in these documents we discussed today, but in the broader structure of U.S. government policy and where the debate in Washington seems to be going with Republicans as well as Democrats.

MS. SISSON: Great. And not to put too fine a point on it -- I mean, you sort of addressed it there at the end, but the concern is that to a certain extent, the rhetoric, the sort of general sentiment behind it, could drive policy in unhelpful directions in terms of the U.S.-China relationship more broadly?

MR. O'HANLON: Yes, and also that the Pentagon itself could feel pressure to overreact

in a crisis. Let's -- you know, I've written about this before. Let's say China takes one Senkaku Island,

uninhabited pieces of rock in the East China Sea. And Japan claims those as well. Japan administers

those -- although, as I've said before, what does it mean to administer islands where no one lives, and

nothing happens. But we're sworn -- and we've clarified from the White House that we feel the obligation

to defend Japan's claims to those islands, even though we have no official U.S. government position on

whose islands they should be.

So, if a scenario begins over a Senkaku Island, how strongly do we react in the military

domain? That's the kind of thing where I think the temperature of the relationship could be relevant. And

I'm interested in trying to keep that temperature calm and coolish even as we are also resolute in our core

policy preparations.

MS. SISSON: Great. Thank you. I want to leave the door open for both of you also to

sort of offer some comments on the NDS. But while I have your, you know, attention directly, I also am

very curious, given your expertise about the Nuclear Posture Review, the NPR, and what you see there

that stands out to you or is notable.

MR. EINHORN: A very striking feature to me was the extent of commonality in the

nuclear policies and enforced postures recommended from one U.S. administration to another. If you

look at the 2010 NPR, the 2018 NPR, and the 2022, sure, there are some differences. The Obama

administration canceled the nuclear sea-launched cruise missile, the Trump NPR reinstated it, the Biden

one cancelled it again. And there are number of nuanced differences, but by and large, there's

tremendous commonality.

Each of these administrations recommended the replacement of each leg of the U.S.

nuclear triad, recommended an upgrading of the U.S. nuclear command, control, and communication

system, recommended the refurbishment of the U.S. nuclear weapons production complex. Each of

these administrations, each of these NPRs, rejected a shift in U.S. policy on the use of nuclear weapons.

You can go through them, there's a whole lot of commonality.

I would characterize the Biden Nuclear Posture Review as a centrist mainstream

document. Strategic hawks will have criticisms. They'll say that the United States needs to do more to

take on the challenge from two near-peer or peer nuclear competitors. Progressives will also have

criticisms. They'll say if the U.S. went ahead with all of these programs, we'll get into a costly and destabilizing arms race. But I think the NPR -- the 2022 NPR is -- represents, I think, a broad consensus in U.S. thinking. I think it will achieve bipartisan support in the U.S. Congress. I think the programs recommended will be well funded.

And I think one -- a key reason why there's so much commonality between 2018 and 2022 is because of the external environment, the international security environment. This is not 2010 and Obama's international security environment. Things have really deteriorated. And I think the emphasis in both 2018 and 2022 on deterrence is a result -- an understandable and natural result of this change in the international security environment.

MS. NELSON: Great, thanks. Well, first, I sort of want to respond to something Mike has said, which is that Russia and China are not the same, and when the Trump National Security Strategy came out, there was a response to it led by the academic community, saying stop calling China a threat, right? Like, we're going to manifest this if we keep talking about and treating China like a threat. And I think that's something that distinguishes this national -- these set of policy documents, is the lack of equivalence between Russia and China, the extent to which they are not mentioned in the same paragraph, and the distinctions made about the types of threats versus challenges that they pose.

And then, something that Bob said that this is sort of -- this national -- these sets of national security documents are marked by continuity, especially the NPR. And I couldn't agree more that that's exactly what it's called for in the current climate, that anything that smacked of significant change could potentially be very stabilizing in this environment. And while this isn't the classified or complete version, these documents are also signals we send to our allies and to our adversaries and will be read as such.

A couple of things that struck me from the NPR is that we're kind of dealing with a new -it identifies something like what Bob Jervis would call like an apples -- would have called an apples-toorange problem, how many U.S. missiles equals how many Soviet missiles. Except, in one breath, it
mentions novel systems, emerging technologies, new and destabilizing, you know, military systems, and
that we have to figure out how to sort of create a stable balance, how to offset this, how to deter
escalation. And it's almost like the technology-infused novel, evolving systems are presented as a

problem in the NPR that don't have an obvious solution. And I think we're going to see the department

kind of wrestling with that going forward.

And finally, I wanted to note in the NPR multiple mentions of technology that appear as

sort of acknowledgments. We're aware that technologies are making weapons and systems more lethal.

We think investing in nuclear verification technology is important. We value investing in the next

generation of technologists and arms controllers. But it doesn't actually say how the department is going

to go about implementing this at a strategic level. And so, strategically speaking, it just -- it's lacking in

that way. Lots of language, lots of verbiage, lots of, we're mentioning this, and a lot less of how this is

going to operate as a strategy.

MS. SISSON: Well, let's stick with -- you mentioned arms control there at the end. And

Bob, I'm curious on your read about how this team addressed arms control given today's strategic

environment and the challenges in that particular policy area.

MR. EINHORN: Well, if you read the language of the NPR closely, you -- I think the

language reveals an administration that would really like to make further progress in arms control, that

would really like to reduce the role of U.S. nuclear weapons and U.S. national security and foreign policy.

But it's an administration that recognizes that current international conditions make those goals very

difficult to achieve.

And, you know, look, the world has changed very much since the heady days of Obama's

prog agenda, which looked forward to a world without nuclear weapons. Now, you know, many of the

senior officials who served in the Obama administration are serving in the Biden administration, but they

recognize that the world has changed. Russia and China are expanding their nuclear arsenals. They

seem to be increasing their reliance on nuclear weapons -- certainly, China -- I'm sorry, certainly, Russia

is increasing its reliance on nuclear weapons. And both are acting aggressively. And not just Russia and

China, but North Korea is acting aggressively in its own region.

Now, for arms control, you need a modicum of trust between the negotiators, but that

modicum of trust has been completely lost. And as Amy mentioned, you have emerging technologies that

are simply not amenable traditional, verifiable arms-control methods, which increases the challenges to

arms control.

Now, you know, the Biden administration, in its NPR, makes an effort to show its heart is

in the right place on arms control. It says, we will place renewed emphasis on arms control. But it then

goes on to explain why it has realistically low expectations about what can really be achieved. It's clear

that the focus now of the Biden administration is not going to be further nuclear arms reductions. It's

going to be to try to stabilize emerging nuclear arms competitions. It's going to be to try to reduce the

nuclear risks from these competitions to avoid nuclear escalation resulting from misperceptions, from

accidents, from miscalculations, and so forth.

In the near-term, I think the most practical thing the Biden administration can do is to

agree with the Russians on reinstating the inspections under the New START agreement. Because of

the pandemic, these inspections were suspended. I think that would be an important, small, but useful

first step, reinstate these inspections. And then, hopefully, eventually, discussions will begin between the

U.S. and Russia on finding a replacement for the New START Treaty before its expiration in 2026. Right

now, it's hard to conceive of Americans and Russians sitting down, but I think, eventually, it may be

possible. I think it's in the mutual interest of both countries to do that.

China, of course, is a different story. There's a crying need to sit down with China, try to

understand their strategic perspectives, allow them to understand our strategic perspectives, and to avoid

behaviors that could bring us into conflict with one another, even inadvertently. The U.S. will continue to

press a very stubborn China to engage in this kind of bilateral strategic stability dialogue, and I hope they

have success. But that's going to be a big priority for this administration. But, you know, traditional arms

control, additional formal agreements, and the limitation and reduction of nuclear arms, you're not going

to see that for quite some time.

MS. SISSON: Amy, given what Bob has described, do you see, with China, particular

portions of nuclear posture, nuclear enterprise, the -- in its entirety, areas where you would really pay

attention to trying to find those ways of risk reduction? Are there things that are particularly worrisome to

you that you think would be a good place to start?

MS. NELSON: Sure. Well, we have decades of history negotiating with the Soviets, and

now, the Russians. And many of those early conversations and even for years were just on fundamental

concepts like mutually assured destruction. What does deterrence mean? What is the critical nature of

second-strike capability? We don't have a history of sharing these concepts with the Chinese or even discussing them.

And at the same time, if you look at the U.S.-Russian history of arms control, the whole concept of verification evolved over time, not just with new technologies, but with greater trust, allowing the -- allowing leaders to sort of facilitate systems in place for onsite inspections, right? Which was something at the height of the Cold War that was -- it was inconceivable having, you know, an inspection team from your worst enemy looking at your nuclear weapons, right? So, we evolved to a point of having inspectors, inspection systems, inspection tools and technologies, and inspectors on the ground.

So, to even get to a point like that with China, we would have to -- there would have to be a lot more infrastructure in place on the Chinese side. And to my understanding, some of those conversations have begun between the U.S. and China in terms of maintaining, for example, you know, a secure stockpile, a nuclear -- maintaining a certain modicum of nuclear safeguards. And those conversations should definitely continue. China has been really clear it has no interest in entering into arms-control negotiations, and certainly, while its numbers are well below those of the United States and Russia. But I think this is a prime moment to continue the dialogue.

MS. SISSON: Well, so let's now put these two documents in a little bit closer conversation with each other, which is, as, of course, the department intended them to be. Mike, I want to go back to you, and I want to ask you -- and then move on to the remainder of the team here -- to talk a bit about what you see in the NDS and/or NPR, independently or together, what it suggests to you about force structure, and whether that's -- you know, you can take that broadly -- conventional, nuclear, together, all of the above.

MR. O'HANLON: Thank you, Melanie. I'll start by answering -- by also reflecting on a point Bob made about President Biden's own personal desire to see nuclear weapons have a smaller role in international politics. And I remember -- if you don't mind the personal -- semi-personal anecdote, Senator Biden, in 1990, tasked us at the Congressional Budget Office through the -- a young man you might have heard of, Jamie Rubin, who was then working for Senator Biden to do a study on U.S. and Soviet future nuclear force capabilities, now that the Cold War was over.

And I recall that -- I don't remember the details, and some of them were probably, you

know, private. But we had an option that postulated as few as 1,000 warheads on each side. And some

people thought that was absolutely crazy talk. But other people involved in the discussions, including

some people, I believe, close to Senator Biden liked the idea of thinking about how we could cut by 95

percent.

Now, everybody knew it probably wasn't going to happen right away, but that just gives

you a little sense of the history of this guy, our current president, and how he thinks about nuclear

weapons. So, I have no doubt he really would like to see them play a smaller role. But the reality is, it's

fairly hard to see how you scale back.

So, on force structure, you know, I don't think there's going to be a big debate about

change or reduction. I think we'll, you know, see if we can get some kind of an extension of New START,

but even that's problematic when you've got, you know, different kinds of weapons systems. The INF

Treaty is gone now, and so, we don't really know how to think about theater weapons. Russia has a lot

more of them than we do, China's building up. So, even just freezing where we are is going to be hard

enough.

You could have a debate about trying to delay ICBM replacement and use existing

Minuteman missiles to -- as test missiles to try to extend out the lifetime of the Minuteman program by a

few years, but that's about the biggest debate you can really have on that topic at the moment, I think.

We need the B-21 bomber for other reasons, so, I think that's a convenient -- and the submarines need to

be safe. So, I think in force structure terms, you're not going to see a big debate.

Where I would personally -- with apologies to our former colleague, Frank Rose, who now

is the deputy administrator at the National Nuclear Security Administration -- I don't think we need to have

the ability to make 80 to 100 nuclear weapons pits -- plutonium pits per year. Everything I learned about

the U.S. nuclear stockpile is the warheads are holding up quite well. And the likelihood that we're going

to need to have some kind of a crash program to replace existing warheads is awfully low. So, I would

think about saving some money there.

But otherwise, I don't know how to save money on triad except maybe delaying the ICBM

replacement a little. And I don't want to save money on command, control, and communications

modernization, because as Colin, I think, usefully said, and where the NDS and NPR reinforce, we need

those systems to be really resilient, better than they are today.

So, limited prospects for savings within the Department of Defense accounts in particular, limited prospects for force structure reductions, maybe some room to cut back on the Department of Energy National Nuclear Security Administration's ambitions for plutonium production -- or plutonium pit production capability.

MS. SISSON: And before I move on to Bob on that, what about the conventional force structure? Did you see anything in the NDS that makes you think that there's considerable changes? There's some mention of reductions. And in particular, in the context of his conversation on campaigning and the kinds of capabilities that will be useful for campaigning, anything in there that you think is suggestive of a particular direction or kind of change?

MR. O'HANLON: By the way, thank you for your question on that, and you drew out a very good answer. That was the best I had heard campaigning explained, and it was thanks to your question. So, that's -- I think that's a little bit of a missed opportunity, arguably, with this National Defense Strategy. And I guess maybe the term strategy is meant to suggest -- unlike the Quadrennial Defense Reviews that people used to do back in the '90s and 2000s and through 2014 -- that this is not meant to be a force structure or budget document, but I sort of think it should be a little bit more.

And the area that I would have most welcomed some new thinking would have been with the Navy, because if you think about the history of this debate, you know, back in the mid-2010s, the outgoing Obama administration, under the late great Ash Carter -- who we should say a word of commemoration for his service to this nation. We lost him far too soon, last week.

But he asked the combatant commanders to document how they were using their naval assets. And then what the Navy did was take that data and sum it up and say, well, we need a navy that's big enough to sustain this current level of operations at a pace that is reasonable for our equipment and sailors. And that's the way we built our vision for the 2040 Navy. I may be slightly oversimplifying. Apologies to the Navy if you don't think I'm right, but that's my understanding of basically how these ambitions were developed for the Navy of mid-century based on current operational requirements of 2015 or so. It's not the right way to do it.

Outgoing Secretary of Defense Mark Esper in 2020 gave a speech, I think at CSPA,

where he outlined a vision for a 500-ship navy. But in fairness to Secretary Esper, he was going to do that by scaling back some types of existing ships. And by the way, today, we have 300-or-so ships. The 2015-2016 analysis aspired to 355. That remains sort of the number of record. Esper put the number 500 out there, and I got to give him credit. As a former soldier, he probably felt a little bit sheepish, but as Secretary of Defense, he sort of had to. And it's still the most specific proposal on the books, but it's not

really official policy.

So, I could go on, but I've gone on long enough. I would say we could use some innovative thinking, because on the one hand, the Navy is thinking too ambitiously about going from 300 to 355 of the old types of ships based on requirements that really aren't requirements, they're based on operational patterns of the mid-2010s. On the other hand, we may want to go well above 355, if we count unmanned underwater systems and a lot of the newer robotic-spaced capabilities that we probably should have, including to station some of them perhaps in the western Pacific permanently with anti-ship missiles and sensors to make sure China doesn't think that it could take Taiwan before we can get there.

MS. SISSON: Yeah. That's great. And by the way, Mike, you know, I can never get enough of your personal anecdotes. So, yeah, keep those coming. Bob, I want to pick up exactly where Mike left off and combine the question for you about force structure and posture with a question about extended deterrence, and what you see in the NPR about extended deterrence in this version, please.

MR. EINHORN: Sure, but first, let me add to Mike's anecdote on a thousand. You talked about a thousand warheads in 1990. Okay. in June 2013, President Obama, undoubtedly with the strong support of Vice President Biden, proposed that the New START limit of 1550 strategic nuclear warheads be dropped to 1,000. And this was said publicly in a speech. It was rejected by the Russians. And I think, you know, given the difficulties today, I don't see that proposal being resurrected in the near future.

In terms of extended deterrence, if you look through the 2022 NPR, you see many, many references to extended deterrence. You see it in the National Defense Strategy as well. The U.S. allies are concerned whether the United States is going to be reliable in meeting its security commitments. In part, this is the result of the Trump administration's rather transactional approach -- dismissive approach to U.S. allies. They felt that they need reassurance that U.S. security assurances they could really bank on.

So, this has been a big priority for the Biden administration, and I think they've been

successful so far, especially in Europe. In Europe, there are a variety of modernization programs -- the F-

35A dual capable fighter, the B61-12 gravity bomb, it's an upgrade. And also, a new -- a program started

by the Trump administration, continued by Biden, of a low-yield warhead for a submarine-launched

ballistic missile.

I think those force modernizations -- but together with the post-Ukraine efforts by U.S.

and NATO to ensure its partners that we would be there for them, enhancements to U.S. and allied force

deployments, additional weapon systems, I think -- and in general, the very robust reaction under U.S.

leadership of support for Ukraine, I think all that has given a great confidence in Europe on U.S. extended

deterrence.

In East Asia, I think it's a little different story. Our main allies in Northeast Asia -- Japan

and South Korea -- have grown increasingly worried about the growing nuclear and missile capabilities of

China -- in particular, for Japan -- and North Korea for both Japan and South Korea. And they wonder if

the ability of China and North Korea to strike the U.S. homeland with nuclear weapons will weaken

American resolve to come to the defense of our allies as we are committed to do.

And politicians in South Korea and in the ruling party have various ways of strengthening

deterrence, but one way is to deploy U.S. -- to redeploy U.S. nuclear weapons in South Korea. We had

them until 1991, and they were withdrawn -- but to redeploy them. Another way is to adopt NATO-type

nuclear sharing arrangements with South Korea. And these arrangements involve training South Korean

pilots actually to deliver U.S. nuclear weapons in the event of war. A third way is to -- for South Korea

itself to develop its own indigenous nuclear weapons capability. The Biden administration doesn't like any

of these approaches. But what alternatives are there?

You can see in the NPR some ideas for reinforcing extended deterrence. One idea is to

maintain the capability to forward-deploy in a crisis dual capable aircraft, strategic bombers, and nuclear

weapons in a crisis, not on a day-to-day basis. And by the way, we haven't even exercised the capability

to deploy them forward in a crisis.

Also, the Biden administration says we should have more visible demonstrations of

resolve. We should have U.S. missile-carrying submarines call at South Korean ports. We should have

strategic bombers overfly the region, fighter dual-capable aircraft in a rotational deployment at South Korean airfields, and so forth. We should -- they have established and are implementing a bilateral consultative group to talk about ways of enhancing extended deterrence. That's all fine. But the question is, is that going to be enough for the Japanese and Koreans?

You know, I -- maybe I'm reading too much into it, but I look at the joint communique issued just yesterday between Secretary Austin and the South Korean minister of national defense, and, you know, I see the South Koreans urging us to go farther, and I think a relative sense which has been traditional in the United States to do more, to have more persistent deployment, more permanent deployment of these strategic assets in Japan and in South Korea.

For me, I think it's going to be important to give our allies, both Japan and South Korea, a much more responsible, a much more prominent role in the planning and execution in their region of the U.S. nuclear extended deterrent. I think we've been a bit too reticent to do that in the future. I think we need to be more flexible.

Look, if the choice is between giving our allies a more prominent role in their own defense, and, you know, affecting their vital security interests, that choice versus allowing them to go nuclear, to develop their own indigenous nuclear capabilities, I think it's a no-brainer. It's a no-brainer. We should be more flexible about that.

MS. SISSON: So, I'm going to press you a little bit on that. That's a very binary choice. Is it that binary between, you know, giving over some measure of control and independent nuclearization?

MR. EINHORN: Control? No. The only person in the world that's authorized to release U.S. nuclear weapons is the President of the United States, and we will not -- and that goes for NATO, that will go for East Asia, that will go for everybody in the future. Not control, but a voice in NATO councils. We have our NATO allies, especially the so-called nuclear basin countries where U.S. nuclear weapons are housed. We -- you know they discuss various contingencies, various kinds of targets, and so forth.

I think Japanese and South Koreans should be able to do that. I think, in the past, U.S. officials have tended to say, look, we understand your concerns, we're going to take care of it on your behalf. That's not -- that's no longer sufficient. I think for the governments of Japan and South Korea, to

reassure their own populations that their security is being protected -- they're going to have to tell their own people that they have a voice, a responsible voice, in decisions affecting their vital national interest.

I think that's going to be important going forward.

MS. SISSON: Great. Thank you. So, since we've covered all of the easy topics so far, let's move into some -- a bit of the tougher stuff. So, Amy, there's been a lot of attention to and worry about China's nuclear behaviors, and particularly, its expansion of its nuclear arsenal and the triad. And as Dr. Kahl mentioned and has been mentioned here, that means that in the not-distant future, the United States will be facing a new dilemma to fully nuclear-armed adversaries at the same time, and that this poses new kinds of dilemmas. Can you help me to think through what those dilemmas are and sort of where we are collectively in finding ways to address them?

MS. NELSON: Yeah, onto the easy questions for sure. Well, I think something that's reflected in the strategy documents is that the department is still grappling with this, what does this mean, and how do you differ Russia and China simultaneously, but perhaps differently, that nuance we were talking about before. They're very different nuclear-capable states, right? And so, for the U.S., what does this mean? I almost want to be like for arms control, what does this mean? And this means that the importance of risk reduction, risk reduction efforts is heightened even further, right?

We don't want to get to the point where we're thinking about how to prevent as the next step of escalation on the escalatory ladder, from conventional to nuclear. We want to stay at a really low level. We want to understand each other's capabilities and intentions, right? And capabilities, we've historically been able to regulate through arms control by placing limitations on those capabilities. And intentions, you know, fall in line once we have a handle on capabilities. We know what the adversary has, and we know what they can do.

And it's these other risk-reduction measures that really lower the uncertainty about intentions, right? Or a fear of what the other side intends to do. And so, even under these most difficult circumstances, in this most complex security landscape, the importance of maintaining dialogue and diplomatic efforts towards risk reduction, I think, is all the more important.

The documents also mention, in no uncertain terms, the need to accept certain risks, right? We're not going to tackle all the risks all the time -- and to prioritize threats. And so, I think a lot of

what we're going to see is a careful adjudication between various risks, threats, and the importance of all

of them. The department is not equipped to counter all threats all the time, and so, there will inevitably be

tradeoffs.

MS. SISSON: You mentioned that the NPR sort of acknowledges or transmits some

level of still working through this kind of problem of having these two nuclear competitors at the same

time. You know, another area where I think there may be some guestion marks remaining has to do with

an even more difficult topic, which we haven't had to think about as seriously in the past, as unfortunately

we do again today, which is nuclear employment. And so, I want to open back up to Mike and Bob too --

and Amy, please chime in -- about what do you see in the NPR about nuclear employment.

MR. O'HANLON: So, a couple of points, and building on the conversation and

specifically what Amy just said, you know, I agree that these goals of risk reduction are important. And I

think that at times, Russia and China will agree as well, but I'm not sure they do today, because they're

actually manipulating and managing and sometimes deliberately increasing risk in order to retaliate

against us, what they think we're doing to help their enemies or what they think we're doing by way of

reconnaissance near their territory. You know, Colin Kahl talked about that a little bit earlier.

So, for example, when Russia makes nuclear threats, or when Putin brags in speeches

about his new nuclear weapons, he actually wants us to be anxious. He's not necessarily trying to reduce

risk. No, he wants to control that process. So, I do ultimately agree with you, but there's just that sort of,

you know, asterisk or corollary to that. And so, that's one issue about nuclear risk and threat.

Another one, picking up on what Bob was talking about, I was struck -- even before we

heard from Colin today, just reading the documents the last couple of days -- the categorical statement by

the United States and Republic of Korea that if North Korea ever used nuclear weapons in a conflict, it

would mean the end of the regime. And I do not literally think that's true. What I mean by that is, you

know, we got to put our Strangelovian hats on and imagine different scenarios if -- and we've been doing

some of this in trying to figure out what Putin might do with nuclear weapons. So, we're sort of in the

habit.

If Kim Jong-un decided in the context or in the course of a Korean War to use a nuclear

weapon, a single nuclear weapon, let's say in a demonstration airburst -- or let's say he doesn't want to

ANDERSON COURT REPORTING 1800 Diagonal Road, Suite 600 Alexandria, VA 22314

do just a pure demonstration, because he wants us to be a little more scared than that. So, he destroys

one ship at sea carrying fuel, and there are 10 sailors on board who die from whatever country. You

know, name your scenario. I don't think that we then commit to end the regime necessarily, because he

still holds Seoul hostage with the rest of his nuclear force, and with not to mention everything else he

possesses.

Now, I do think we would have to retaliate in some way very robustly. And I think, at

some point, nuclear response and regime change become possibilities, if not likelihoods. But the

statement that categorically, no matter what kind of nuclear weapons use North Korea would consider,

that that will translate into the end of the regime, that's an exaggeration. It may be a useful one for the

purposes of this document, but I also don't really like the U.S. government to say things that it is not

prepared to back up.

And I don't want to make us be pre-committed to that policy, if and when, heaven forbid,

a war occurs in Korea, Kim Jong-un pops off a demonstration shot, and then somebody pulls out the

Nuclear Posture Review and says, well, if we don't now end his regime, our word will no longer be taken

seriously. It's like Obama's problem in Syria with chemical weapons times a hundred. So, those are just

two specific points that occurred to me. But I know Amy wanted to get back in.

MS. NELSON: Yeah, I just wanted to come back to this idea of risk reduction. I suppose

I meant outside the context of the current conflict. And clearly -- I mean, I would violently agree that Putin

is using nuclear weapons to manipulate risk perception.

The NPR also mentions that the Department of Defense has something like the

Department of Defense has to figure out how to counter Putin's new use of nuclear weapons in this --

strategically, in the current context. So, Putin is waging a conventional war, and periodically, he drops a

few lines about nuclear weapons. And it's presented as kind of a novel role of nuclear weapons and

strategic thinking, all the while the United States maintains the right to use nuclear weapons no longer as

a hedge against future uncertainty, but as a backstop. I don't know that they're actually that different.

MR. O'HANLON: Great point.

MS. NELSON: That's all.

MS. SISSON: Bob, please.

MR. EINHORN: Yeah, a comment on U.S. policies on the use of nuclear weapons. And I mentioned continuity before -- this is an area where there's been absolute continuity. The Obama, Trump, and Biden Nuclear Posture Reviews all reject the idea that the sole purpose of U.S. nuclear weapons should be to deter or respond to the use of nuclear weapons against the United States, its

All three administrations have decided that the United States needs to keep open, the option to consider the first use of nuclear weapons in response to a limited category of non-nuclear attacks. The language they use, all three administrations, is exactly the same. What are these limited circumstances? In extreme circumstances, to defend the vital interests of the U.S. and its allies and partners. They used exactly the same language.

allies, and partners.

So, you know, before this administration began its Nuclear Posture Review, there was hope, especially in the arms control and nonproliferation community in the U.S. and worldwide, that the U.S. would shift this so-called declaratory policy on the use of nuclear weapons. Why was there hope? Because in January 2017, in his last couple of weeks as Vice President, Joe Biden said that, you know, in his view, the sole purpose of U.S. nuclear weapons should be to deter or respond to nuclear use, not non-nuclear use against the United States, its allies, and partners.

So, this provided some hope, maybe even expectation, but those hopes were quickly dashed. And the reason is that the perceived growing conventional risks to the United -- U.S. forces and our allies, posed by mostly China and Russia.

You know, Undersecretary Kahl mentioned that the U.S. remains the number one, you know, power, globally, in conventional military strength, and that's undoubtedly true. But concerns were raised about regional conventional balances, especially in the western Pacific. And would we need to be able to threaten the first use of nuclear weapons in response to conventional threats, or not just conventional, but nonconventional, non-nuclear threats against our allies and partners?

And the administration -- and Joe Biden was persuaded that we couldn't give up those options, and also because of a number of emerging technologies that potentially pose strategic level threats: cyber, counterspace, and so forth. Because of these non-nuclear threats, Biden rejected the idea of going to a no-first-use or sole-purpose policy.

I think the principal reason was that U.S. allies strongly objected to it. And these were

U.S. allies along the NATO-Russia border, these were U.S. allies, Japan and South Korea. They

believed that if the U.S. renounced the ability to use nuclear weapons in response to non-nuclear attack,

they would be at the mercy of regional rivals that had impressive conventional military capabilities. And

so, that was -- it was rejected, to the disappointment of many.

I think the Biden administration decided to sweeten the blow a little bit by saying that the

U.S. goal should be to adopt sole purpose at some future time. And in fact, the United States should

work with its allies to put in place the conditions where we could adopt a sole-purpose or no-first-use

policy without risk to our allies.

So, the Obama administration also talked about this as the goal, let's work toward

achieving the goal. The Trump administration rejected it. It just simply omitted any idea that it should --

this should be a goal. But for the time being, this is off the table.

MS. SISSON: So, I want to ask all of you, if this document then, in light of that when it

comes to nuclear employment, does this document -- does the NPR help you to understand whether -- or

under what conditions the administration would or would not use a nuclear weapon in the context of the

Russian invasion of Ukraine and the ongoing war there?

MR. EINHORN: I say no. I say we don't know. We don't have a clue what the U.S.

would do in -- well, you know, we're facing this now with Russia and Ukraine. In other words, how would

we respond to it?

MS. SISSON: Mm-hmm.

MR. EINHORN: I think the current policy is not that we would use nuclear weapons

against these large, non-nuclear threats, we would reserve the right to do it. We might consider the use,

and we say might consider the use for deterrent purposes. We want to maintain an ambiguous position,

whether or not we would ever, in the event, actually use nuclear weapons. And in many of these cases, I

don't think we would, but we want to keep opponents -- potential opponents guessing.

MR. O'HANLON: Just to back that up -- and Bob gave a very nice explanation of the

language. The other point to add is that the only category of countries that we'd promised never to use

nuclear weapons against are non-nuclear countries in compliance with their nuclear obligations --

ANDERSON COURT REPORTING 1800 Diagonal Road, Suite 600 Alexandria, VA 22314

MR. EINHORN: Parties to the NPT.

MR. O'HANLON: Parties to the NPT. And so, when you think about who that means, that means with that line, you said nothing about Russia, China, North Korea -- Iran, for that matter -- because they're not in compliance, even though we don't think they have nuclear weapons. Pakistan and India -- I mean, we could go down the list, but that is pretty much the list, apart from the allies. But those are mostly the trouble spots we worry about. And so, we're pretty much making it clear that we're not making it clear. (Laughter)

MS. SISSON: Well, I want to -- on exactly that note, I'm going to ask a question that I will admit ahead of time that I'm at risk of getting the exact same response in return for. But I have heard some smart people be very uncomfortable with the fact that our declaratory policy includes not just the United States and allies, but also the United States, allies, and partners with whom we do not have legally binding defensive commitments. What is your view both on why that is the case and the wisdom of it?

MR. O'HANLON: I'll just mention the -- Bob can answer the actual hard part. The interesting case has become Taiwan -- a partner, not an ally.

MS. SISSON: Mm-hmm.

MR. O'HANLON: Not even a diplomatic recognition of the United States. Singapore, Israel -- we don't have any we don't have any have formal allies in the Middle East at all. They're all security partners. So, anybody in that region who might be threatened, this is where you might bring in that kind of language.

MS. SISSON: And I would have thought that that partner language was introduced for Ukraine, but Bob, you said that language was always in there. Is that right?

MR. EINHORN: You will never -- if you listen to Undersecretary Kahl carefully, whenever he says allies, he says partners. Allies and partners. It's almost as if, you know, it's a composite ID. You never separate them. And that's been the case for decades, I think.

And the reason is this, allies are -- we have a treaty obligation to defend them. We have that with NATO. We have that with Japan. We have that with South Korea. We are obliged. We also have security relationships with countries that don't receive these legally binding commitments. And, you know, we -- but Mike mentioned enough of them, that -- there's Israel, Saudi Arabia, Taiwan -- Ukraine, at

this point, would be considered.

Now, look, how important are these security assurances to them? In some cases, really

important. You know, in Desert Storm, a long predecessor to Vigilant Storm -- in Desert Storm, the

United States sent 500,000 troops, flowed them to the Middle East because of Irag's occupation of Kuwait

and its threat to Saudi Arabia. There's no question that it was going to invade Saudi Arabia. And we

made this incredible commitment to defend Saudi Arabia, and they were -- we had no treaty obligation to

do that.

Similarly with Israel. You know, Israel, often people -- non-U.S. government people who

are trying to do otherwise, but other people talk about Israel as an ally. Well, they're not an ally in the

formal treaty sense, but no one believes we wouldn't come to support of Israel if it was in a mortal threat

situation. And now, you have the cases of Taiwan and Ukraine. But I think it's very important -- I mean,

whenever we just say -- if a U.S. government person makes a mistake of just saying allies, you know, one

of our partners will come and say, hey, what about us?

MS. SISSON: Mm-hmm.

MR. EINHORN: You know, don't -- you know, aren't you going to, you know, help us, you

know, ensure our own security? So, that's why, you know, the official term is allies and partners. And we

have -- you know, we don't have a legal -- they don't have a legal claim on us, but they have a political

and moral claim on us in a number of cases. And I think it's -- they can take it to the bank. It's just as

reliable as if we had a treaty obligation to come to their defense.

MS. SISSON: Do you have anything you want to add, Amy?

MS. NELSON: Yeah. I mean, I'll just say, I think that that's really interesting, Bob, what

you say about any time Colin said allies, he said allies and partners. And infused throughout all these

strategy documents -- I haven't counted, but the words, allies, multi-lateralism, partners, consultations, I

mean, it's heavily laden.

MR. EINHORN: It's always there. (Laughter)

MS. NELSON: But that said, the United States is leaning into these kinds of mini-laterals,

and increasingly relies on alliances and partnerships -- things like, you know, AUKUS and the Quad -- to

achieve its security ends. And I think the language is reflecting a -- you know, maybe it's like alliance

creep, like it's an expansive view of what it means to be friendly with the United States.

MR. EINHORN: Right, right.

MS. SISSON: Well, I will just flag that some of the creep and the expansion and the sort of sensibilities that go with that, in terms of obligations, moral or otherwise, can start to make me a little bit

uncomfortable and nervous, you know, if we start having those kinds of relationships more broadly.

MS. NELSON: Because you're a realist, or --

MS. SISSON: Well, no one has to --

MR. EINHORN: But, you know, Biden made that distinction clearly on Ukraine.

MS. SISSON: Yeah.

MR. EINHORN: It was very clear from the beginning that Biden was saying we have no

obligation to protect Ukraine. Ukraine's sovereignty is important to us.

MS. SISSON: Mm-hmm.

MR. EINHORN: And that's why we're going to provide massive material support to help it

defend itself. But we have no obligation. And a few weeks later, at the Madrid NATO Summit, the

leaders got together and said, we are going to defend every inch of NATO territory. And Biden really

sees that distinction.

MS. SISSON: Well, thank you all for tolerating so many of my questions. I do want to

open it up now to the audience and see what kinds of questions are on their minds. So, it looks like

there's a gentleman over here in the back.

MR. NOVAK: Hi, thank you the panel for being here today. My name is Rita Novak. I'm

a public service scholar at Johns Hopkins SAIS across the street. Can you explain some effective

options available to the United States to deter the use of non-strategic nuclear weapons, specifically in a

scenario over Taiwan? And should this have been detailed in the NPR?

MS. NELSON: It's a Mike question.

MR. O'HANLON: Well, I'll try. It's a good question. You know, I think that Melanie and

Caitlin Talmadge and I wrote about nuclear deterrence in the context of Taiwan scenarios in a paper we

published this year. And there are just a -- there are a few points to make.

One is that historically, of course, the United States has used nuclear threats in previous

Taiwan crises, mostly before China had nuclear weapons. But nonetheless, even in the modern era, when China's had nuclear weapons, we've always had overwhelming superiority conventionally and in the nuclear realm. And we've been more than willing to brandish that to try to convince China there was no

useful escalatory path that it should embark on. So, that's the history.

To me, that's a big part of why China's probably pursuing a thousand nuclear weapons.

They want to sort of checkmate our ability to make nuclear threats against them in the event that they're

winning a conventional fight, and our only option is then to go nuclear. At least I'm trying to give China

some degree of fair, you know, interpretation. There may be other motives, too. They may want to raise

the nuclear specter against us and make us think that because they care more about Taiwan than they

do, at least as they see it, that therefore, their nuclear threat becomes more credible than ours.

So, I'm not suggesting that they're always -- the good guys are the defensive players in

these crises, but it's possible that they want a thousand warheads to have achieved rough parity with

what we can bring to bear, so that therefore, we can't make the nuclear threats first in a credible way, like

we have in the past.

If you actually got into the war itself, I don't think that nuclear weapons are very useful for

most of the specific military missions I can think of. The David Ochmanek RAND scholar agenda that I

referred to earlier when I was interviewing Secretary Kahl, that's a package of sensors and anti-ship

missiles that would be forward-stationed in the Western Pacific, either underwater or on land mobile

rocket launchers, essentially, on Okinawa or elsewhere, that wouldn't require big aircraft carriers or

runways -- in other words, things that China could target with its conventionally-armed precision missiles -

- so that you have, in a way to -- both with our own arsenal -- and hopefully, Taiwan buys this kind of stuff

too, and they would own the ability to sink those ships before they reach the Chinese shores. But there's

no particular benefit to doing that with nuclear weapons. Anti-ship missiles are pretty darn good with

conventional warheads, as long as it's modern vintage, and you get them there in time.

So, I know I'm bringing a couple of dimensions into this, but I -- my bottom line would be,

again, the reason why China wants more nuclear weapons could be, in part, to make sure we don't have

escalation dominance in that realm in a future Taiwan contingency. And for us, even though, you know, I

do favor at least maintaining nuclear parity or better against China, I don't think that's going to be the

decisive weaponry in most of the -- at least amphibious assault scenarios that I can think of.

With a blockade scenario, again, you're talking about individual ships at sea. And if you

have a nuclear weapon to shoot at them, it makes it a little bit easier. You don't have to get quite as close

to detonate the thing. But the main question is, can you find the ship in the first place? And if you can,

you probably don't need a nuclear weapon to destroy it, given the current balance between anti-ship

missiles and missile defense.

So, it's a long way of saying that it's a great question. There are nuclear dimensions to it,

but I don't think they're likely to be the decisive ones in the scenarios that I can think of.

MS. SISSON: Let's do the question over here on the right.

QUESTIONER: Thank you. Dr. Kahl mentioned how Putin miscalculated the global

response to his invasion of Ukraine, and how the U.S. and its allies did a lot to try to get ahead and deter

that from happening, but Putin decided to invade anyways. And I was curious, your thoughts on the

lessons that we can learn from that effort to enhance our deterrence efforts in the future. Thank you.

MS. SISSON: Any immediate takers?

MR. O'HANLON: I've got thoughts as well, but I don't want to dominate. I can begin with

a mea culpa. I didn't think he would invade.

MS. NELSON: Yeah, I was going to say, most people just didn't think he was going to do

it.

MR. O'HANLON: I thought he was smart enough to know what he was getting into. But

it's seductive when you're a leader of a powerful country with -- that's been modernizing its military for 10

years to think that maybe shock and awe can win this time. You know, we fell prey to that thinking in the

Iraq invasion a little bit.

And so, you know -- and for that -- and plus, they just -- they were careless. They were

sloppy in so many ways in terms of not understanding the logistical pathways, the limited number of roads

that were available, what Ukrainians could do to them with modern anti-tank weapons. It was just really

poor military planning, as well as just the sort of human tendency to always think that new weapons and

fancy war plans may allow you to win fast next time in a way that historically people don't. So, that's why

-- you know, that's part of why perhaps they made the mistake of invading.

But on the other hand, Putin seems willing to suffer a lot. You know, as Jung Pak used to

say, he has a high tolerance for other people's pain, and including those of his own soldiers and their

mothers. And maybe he would have been willing to launch this terrible war as a war of attrition, even if he

knew what he was getting into, which is soberous about, you know, the difficulties of deterrence in

general.

MR. EINHORN: It's another reminder, I think, that deterrence is not a question of

calculating what might deter you, it's what is going to deter your adversary. And, you know, that's so

subjective, and you can't get into the mind of your adversary. It's just -- it's a question of being kind of

less confident about what you know about deterrence than many people assume.

MS. SISSON: Yeah. Amy, go.

MS. NELSON: Yeah, I was just going to say, this was less of a case of the West failed to

deter Putin from invading and more just a question of, like, when someone has designs on territorial

expansion, the deterrence toolkit we have isn't really geared towards that problem. And there was a

really big debate about did deterrence fail here, or has deterrence held because no one's dropped a nuke.

And at the end of the day, deterrence is, A, a concept, and nothing more, and B, subject to psychology of

individuals and the exchange that goes on between those psychologies. And so, you know, as Dr. Kahl

alluded to, like, we don't -- we think that when something doesn't happen, deterrence held, but it's a really

difficult problem.

MR. O'HANLON: By the way, Jung Pak was saying that about Kim Jong-un. I should

clarify so I don't misquote her. But the same principle may apply.

MS. SISSON: Well, I'll just sort of pull all of those things into one place. And where it

lands in my head is, the thing we should learn is that deterrence fails sometimes. It is probabilistic. And

so, we should judge the strategy of deterrence on the merits of the analysis that preceded it, as Bob was

saying. How much did we think we know about the person or polity that we're trying to influence, and did

we align all of the tools at our disposal in ways that were appropriate and maybe increase the likelihood

that deterrence will work?

But again, it's probabilistic. It can fail. So, the other lesson is, we always have to know

what we'll do when it fails. If it doesn't work, what do we have with us that we know we're going to move

out on next? Let's see. Let's go on to another question. The young lady here in the middle, please.

QUESTIONER: Hi, good afternoon. My name is Damona, and I'm a graduate student at Georgetown University. And sort of jumping off of your points that you just said on deterrence and deterring your adversary, my question is, in the Missile Defense Review, there's this discussion of integrated deterrence missile defense and nuclear capabilities are supposed to be complimentary.

Mike, I was -- I wanted to get your thoughts on that, because from context, when we pulled out of the anti-ballistic -- the ABM Treaty, and that -- and told Russia that we're actually building these defenses for -- to account for countering-terrorism purposes, but then that spurred them to develop their own defenses. So, I just wanted to get your thoughts on is it actually -- are these concepts actually complementary, or are they intentioned, like ballistic missile defenses and nuclear capabilities?

MS. NELSON: I mean, I will say, I agree that pulling out of the ABM Treaty tipped off a, you know, kind of decades-long set of consequences that work at cross purposes with a lot of the original intention of stability implemented by arms control, and that we have -- you know, now, we're offsetting defenses, and now we have to have, you know, defenses that are better than the offsetting capabilities that are designed to penetrate them. And I think, you know, there's an arms race component of this that's deeply unsettling.

MS. SISSON: Any other thoughts?

MR. O'HANLON: The other point to make is that we make it clear in the Missile Defense Review and the Nuclear Posture Review that we're not trying to stop China's arsenal from having a secure second-strike capability against us.

MS. SISSON: Mm-hmm.

MR. O'HANLON: Chinese don't necessarily believe that, but that was stated quite emphatically and clearly. I thought that was actually noteworthy. But we do try to use missile defense against the North Korean threat and the hypothetical potential Iranian threat. And those are the systems that we've been trying to build.

So, they're not necessarily complimentary when you're dealing with a high-end power, because the whole logic is if you try to use missile defense as a partial solution to Russia's arsenal, you just create arms race dynamics. And that, of course, is what produced the ABM Treaty in the first place, a

fear of that.

But with China, historically, we've been ambivalent. Now, apparently, we're conceding

that we don't have the capability to prevent them from, you know, having a secure second strike. But with

North Korea, and perhaps, someday, Iran, we definitely want to compete. We would like to have as good

of a defense system and shield as we could possibly build.

MR. EINHORN: But I ask you, Mike, at what point are we going to concede that we can't

defeat North Korea's increasingly robust missile capability? For years, we could, with our planned missile

defense systems, we were pretty confident that North Korea would not be able to penetrate our defenses

with missiles. Now, with all their testing with the probable production that's going on -- we don't even

know about the production of missiles. We don't have a handle on that. But at some point, is it going to

be difficult to stop a North Korean missile threat? Will they be easily able to overwhelm our missile

defenses? I think we're going to reach that point pretty soon.

MR. O'HANLON: That's part of why you and I have advocated for a partial deal with

North Korea, rather than going for complete nuclear disarmament, which is I think, a fairy tale or a dream.

And even though it's official U.S. government policy under both Democrats and Republicans, go for an

interim deal with North -- you put aside the nuclear weapons they have now, you prevent them from

building more by verifiably dismantling their production capability, and you have a permanent ban on

nuclear testing and ICBM testing -- because I don't think the North Koreans today have a reliable way to

strike North America. They might be able to do it. Probably not. I want to freeze that rather than risk the

world that you're talking about.

MR. EINHORN: That's right.

MS. SISSON: Another question over here, please. The gentleman in the gray tie. Yep,

that's you.

QUESTIONER: Thank you to each of you for such insightful comments today. My

question is, undoubtedly, as we're talking about needing to have China as a pacing threat and pacing

challenge, right, in deterring, what is the likelihood of the United States and China or another third-party

walking into, say, a cycle of action-reaction cycle, and what credible reassurances can we give to either

prevent that or lessen than that from happening? Thank you.

MS. SISSON: That's a question about just how scary is the world right now to you all.

MS. NELSON: Over Taiwan specifically?

QUESTIONER: I would say -- well, I would say -- yeah, I would say -- I think Taiwan's a

good -- yeah, over Taiwan or over Korean Peninsula.

MS. NELSON: And cycle action-reaction in the conventional space, or --

QUESTIONER: Either one. Either conventional or unconventional.

MS. NELSON: Mike, you got anything?

MR. O'HANLON: Melanie may want to.

MS. SISSON: Well, so I think first of all, she was trying to get you to answer your own question. But, you know, if your question is, is that can I envision any number of ways that that could happen and we could unintentionally end up in a conflict, an overt kind of shooting war with China,

absolutely. I think that's possible. Do I think it's probable right now? No, I don't.

You know, I think that Dr. Kahl had mentioned that there are some dangerous practices in the commons, in this sort of shared spaces where our militaries operate. And I know that the department is working on making those kinds of interactions less frequent, more manageable, and have

more communication about them. And so, I think there is mutual awareness of that kind of risk.

So, you know, I think that while it's always possible, I don't think it's being overlooked or neglected in any way by the department. And could a Taiwan contingency or some other emerge? Yes, which is part of why I think that -- you know, using Nancy Pelosi's visit to the island in August and the Chinese response to it, what you saw was Taiwan and the United States, I think, both being very calm and measured and being acutely aware of not engaging in behaviors that would ratchet up the immediate risk. And I think that kind of behavior will probably continue. Yeah, thanks.

We are just about at the end here. So, I will take one last question. There's a gentleman in the middle who's been patient.

QUESTIONER: To build on what was said earlier --

MS. SISSON: May I ask for that mic, and if you could --

QUESTIONER: To build on what was said earlier about force structure -- and the Marine Corps over the last few years has embarked on a pretty radical reform of the way it's internally organized.

And when you read through the national security document, you don't really see evidence of that

anywhere at that level of kind of internal analysis anywhere else in either the other services or the DoD as

a whole, in terms of things like balance of resources between the various services and whatnot.

And what do you think it would take to actually get the rest of the DoD to undergo a

similar level of kind of self-examination and self-assessment? Because I think we can all agree that if,

you know, we were to take care of the DoD budget, we'd probably be moving things around, and I don't

think we're seeing a ton of that actually happening. I've seen some but, you know, not as much as you

would think, given we're supposed to be reordering our whole security policy around this new pacing

threat.

MS. SISSON: Thanks. You want to take that?

MR. O'HANLON: It's a very good question. I alluded to earlier in -- you said what could

be done. Well, I tried to do my part by telling the Navy we need a better plan than 355-ship navy based

on practices of 10 years ago. But the other point I would make is, I agree with your overall assessment.

However, the Space Force and other parts of DoD that are operating in space, they have been making

huge changes. The way we use satellites today is much different from when I first got into this field.

And that allows me in my final 30 seconds to say yet another note of tribute to Ash

Carter, who we lost way too soon last week. And I learned from him over the years a lot. I remember

articles and things he wrote about the kinds of satellite constellations we had in the 1980s and '90s.

Really just big things, a few of them, easy to find, easy to hit. And we've gotten to a much more

dispersed concept for many, if not most, satellite operations. And I think we continue to reinforce that

tendency as Colin Kahl had mentioned. So, that's the one other area besides the Marine Corps where I

do think we are getting pretty assertive and ambitious.

MS. SISSON: Well, thank you very much to the audience for coming for another round of

really excellent questions. And to the panel here, thank you very much. It's with great appreciation, and

it's great fun to work with you, for bringing this sort of really impressive collection of expertise and ability

to articulate complexity and simplicity at the same time. So, thanks for joining us, and I hope everybody

enjoys the remainder of your day. Thank you. (Applause)

ANDERSON COURT REPORTING 1800 Diagonal Road, Suite 600 Alexandria, VA 22314

53

* * * * *

CERTIFICATE OF NOTARY PUBLIC

I, Carleton J. Anderson, III do hereby certify that the forgoing electronic file when

originally transmitted was reduced to text at my direction; that said transcript is a true record of the

proceedings therein referenced; that I am neither counsel for, related to, nor employed by any of the

parties to the action in which these proceedings were taken; and, furthermore, that I am neither a relative

or employee of any attorney or counsel employed by the parties hereto, nor financially or otherwise

interested in the outcome of this action.

Carleton J. Anderson, III

(Signature and Seal on File)

Notary Public in and for the Commonwealth of Virginia

Commission No. 351998

Expires: November 30, 2024