

# CLIMATE CHANGE IS A NATIONAL SECURITY PRIORITY

## A CALL TO ACTION

Climate change impacts the world and the way the US Military operates in it, both abroad and at home. Climate change:

- threatens critical infrastructure;
- increases global instability;
- devalues U.S. leadership;
- serves as a significant threat multiplier.

Climate effects impact our military readiness and climate change is currently threatening more than two-thirds of our critical operation infrastructure.[1]

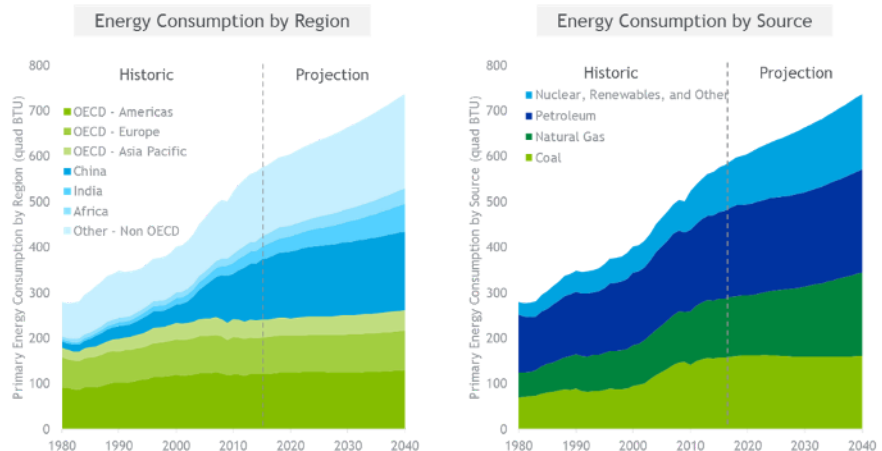
These effects are seen in how the Department of Defense handles many aspects of operation from training, supply chains, construction, equipment and deployments. The effects of climate change impact operations when the military confronts changing sea routes in the Arctic, natural disasters such as floods, droughts and wildfires, increasing refugee movement and political instability due to climate change.

*The Department will immediately take appropriate policy actions to prioritize climate change considerations in our activities and risk assessments, to mitigate this driver of insecurity...It is a national security issue, and we must treat it as such.*

**Secretary of Defense, Lloyd Austin**

## The Global Need for Energy

The roots of climate issues are in the global need for energy. As commercial industry reckons with the need to clean that energy as demand continues to grow, they do not always consider the national security implications of major capital decisions. For example, the first fleetwide fuel efficiency standards in the US were put in place to reduce America's dependence on foreign oil; effectively.



Source: U.S. Energy Information Administration, International Energy Outlook 2017, International Energy Statistics 1980-2017

Yet today, we are deciding to tilt decisively to electrics, inducing significant supply chain dependencies as only one of many unintended consequences of clean.

[1] Report on Effects of a Changing Climate to the Department of Defense – January 2019  
[https://partner-mco-archive.s3.amazonaws.com/client\\_files/1547826612.pdf](https://partner-mco-archive.s3.amazonaws.com/client_files/1547826612.pdf)

## How Should We Respond?

The Department of Defense has a leadership role to synthesize an inclusive response that addresses known threats and proactively works to reduce and eliminate harmful climate emissions and effects, while guiding and educating industry on the national security implications of their investments and policy.

Comprehensive Carbon Impact (CCI) is working decisively with Department of Defense to deliver two prototypes in 2021 CY to assist the Pentagon in this engagement.

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### Carbon Assessment Program

The next step is to address where the Department of Defense spends its resources, and how to improve the climatic footprint of operations by building out a carbon assessment program for all Department of Defense contracts.

The Department of Defense awards hundreds of billions<sup>[2]</sup> of dollars' worth of contracts every year, these contracts should require a carbon assessment. and those that have not achieved net zero carbon emissions should be required to pay a small fee – a percentage of the total value of the contract – the money will be used to shore up military infrastructure, invest in carbon and climate related technology, and ensure that Department of Defense contractors are acting in a way that supports the safety and mission of the U.S. armed forces across the globe.

Projects are currently underway, funded in the 2021 Congressional budget, to develop a carbon assessment program for the Department of Defense. Working with the Ground Vehicle Systems Command in Michigan, two contracts are being identified for a pilot program to review and assess the environmental and carbon footprint of the contract. This work is being managed by CCI, with support from LIFT and SAFE, with the goal to develop a robust system that can be implemented more broadly.

### Diversity of Energy Portfolio and Resources

Just as the growth of renewables and vehicle efficiency was driven in part by global security concerns and availability of oil and gas from foreign nations, our climate policies and actions need to assess the availability of key materials and resources as well as the threat to supply chains, and economic disruption from foreign nations.

Materials to build lithium-ion battery technology are sourced globally, often times from unstable countries and those that may not operate with the best economic or security intentions to the United States. An over-reliance on one technology, e.g. lithium-ion batteries, has potential to lead to increased military conflict overseas, as well as adversely impact trade negotiations.

A diverse energy portfolio, and economy is beneficial to the security and safety of the United States. By continuing to invest in improving technology essential to our continued operation – engines, etc. – the US will reduce the opportunity for adversaries (both economic and military) to negatively impact operations and security.

CCI is developing a vehicle technology readiness and impact report that can help guide investments, across vehicle ranges from B-size commercial vehicles to tanks, based on their assessed technology readiness level. This prototype will be useful on its own, and will also be a guide for additional reports in the future.

[2] Defense Acquisitions: How and Where Department of Defense Spends Its Contracting Dollars Congressional Research Service, July 2, 2018. <https://fas.org/sgp/crs/natsec/R44010.pdf>