United States Senate
WASHINGTON, DC 20510-0908

July 1, 2020

The Honorable Wilbur Ross
Secretary
U.S. Department of Commerce
1401 Constitution Avenue NW
Washington, D.C. 20591

The Honorable Mark Esper
Secretary
U.S. Department of Defense
1000 Defense Pentagon
Washington, D.C. 20230

Dear Secretary Ross and Secretary Esper:

We write today to ask that the Administration take immediate measures to bring the most advanced digital semiconductor manufacturing capabilities to the United States. As you know, semiconductors are critical to our American economic and national security and while our nation leads in the design of semiconductors, we rely on international manufacturing for advanced semiconductor fabrication.

As is the case with other key industries, the United States once enjoyed a powerful market position, boasting the world's most advanced semiconductor fabrication factories. However, this is no longer the case, and the United States relies on international manufacturing for advanced digital semiconductors. It is critical to do what is necessary to bring the most advanced manufacturing to our shores, and to create the ecosystem for the United States to be a leader now, and into the future. The highly concentrated nature of the semiconductor industry poses unique and significant risks for our national and economic prosperity. This challenge would be significantly mitigated by the presence of domestic production.

The Administration has taken bold and necessary steps to revitalize American manufacturing and strengthen our nation's industrial base in critical areas, including pharmaceuticals and advanced microchip manufacturing. To that end, we welcome the recent announcement that Taiwan Semiconductor Manufacturing Corporation (TSMC) will build a multi-billion dollar manufacturing facility in the United States. However, it is vital not to lose sight of the fact that, as a nation, we have fallen behind on the capacity to produce the most advanced digital chips that power both our weapons systems and so much of our economy. Simply put, the TSMC announcement, while welcome, does not change the reality that the United States is running out of time to regain leadership in this all-important space.

Due to the complexity and cost of the manufacturing process, it is difficult for a new entrant or an industry competitor to enter the market, especially when foreign governments heavily subsidize existing market leaders. Moreover, many vertically integrated U.S. semiconductor companies manufacture most of their products outside the United States, due in part to the significant incentives provided by countries predominantly in Asia. To our detriment, the current trajectory of the market is likely to lead to a scenario in which there will be only one choice for many of the digital products that power the modern economy and our defense technologies. The resulting security and economic risks cannot be overstated.

This pattern of offshoring, aided by foreign government industrial policy, has already played out in the telecommunications equipment industry with devastating consequences. In that industry, Huawei was supported by industrial policy, while American leaders decreased in market dominance to the point at which the United States is no longer home to a single end-to-end telecommunications equipment manufacturer. This cautionary tale illustrates the need for America to act decisively to ensure that we retain access to the most advanced digital semiconductor technologies, including for sensitive applications.

The current landscape requires more than international firms locating certain facilities in the Unites States. We must utilize our leverage to create partnerships between these leading companies and American interests to ensure that the latest technology upgrades and significant production volumes are available to support American industry. These partnerships should have creative solutions for defense access, start-up ecosystem support and investment in new domestic semiconductor companies.

It is critical that we quickly establish the framework for American companies and the defense supply chain to ensure uninterrupted domestic access to the most advanced digital semiconductor technology. We must develop and retain a talented workforce trained in the technologies of advanced digital fabrication. It is indeed a matter of national security to retain access to these technologies, factories and the talented workforce required to support them.

This Administration continues to recognize the unacceptable national security risks posed by foreign dominance of critical infrastructure and manufacturing capacity, such as Huawei's government-supported position in 5G, and has responded with decisive action. We encourage you to take the same bold action to develop a partnership model for U.S. based semiconductor companies to work with American interests and avoid a future in which many of the most complex microchips are only available from non-U.S. sources in geopolitically precarious regions of the world.

Thank you for your consideration.

Sincerely,

Marco Rubio
U.S. Senator

Christopher A. Coons
U.S. Senator

John Cornyn
U.S. Senator

James E. Risch
U.S. Senator