March 6, 2020

The Honorable Nita M. Lowey Chair Committee on Appropriations House of Representatives Washington, D.C. 20515

The Honorable Richard Shelby Chair Committee on Appropriations United States Senate Washington, D.C. 20510 The Honorable Kay Granger Ranking Member Committee on Appropriations House of Representatives Washington, D.C. 20515

The Honorable Patrick Leahy Ranking Member Committee on Appropriations United States Senate Washington, D.C. 20510

Dear Chair Lowey, Ranking Member Granger, Chair Shelby, and Ranking Member Leahy:

We are writing to urge you to provide the highest possible fiscal year (FY) 2021 allocation for the Commerce-Justice-Science (CJS) Appropriations Subcommittees, at least equal to the FY 2020 allocation and sufficient to fully fund the basic and applied research programs in the CJS portfolio. The bill includes agencies and departments that are vital to the advancement of science, technology, economic development, and criminal justice. These include the National Science Foundation (NSF), the National Aeronautics and Space Administration (NASA), the National Oceanic and Atmospheric Administration (NOAA), the National Institute for Standards and Technology (NIST), the Office of Science and Technology Policy (OSTP), the Department of Commerce statistical agencies, and the Department of Justice (DOJ) Office of Justice Programs.

Strong funding for the CJS bill is necessary for the United States to maintain its global lead in science and technology. According to the 2020 *Science and Engineering Indicators* report, while the US remains at the forefront of research, spending \$548 billion on research and development (R&D) in 2017, other nations have dramatically increased their investments in science. For example, between 2010 and 2017, China's R&D enterprise grew by 13 percent annually and South Korea's grew by 8 percent annually. In comparison, U.S. R&D expenditures increased by only about 4 percent per year over this same period. China is now likely to surpass us in total spending, threatening our science and technology leadership in fields such as artificial intelligence, space exploration, quantum computing, and other areas.

In addition to increased competition in the realm of science and technology, our nation faces immense environmental challenges. The CJS research agencies play a central role in understanding and predicting global and regional changes; developing new technologies to improve resilience; and providing life-saving weather forecasts. NSF, NASA, and NOAA together fund over 60 percent of our nation's federal investments in environmental research and development as well as funding a large portion of our civilian observational capabilities. Additionally, there is an ever-increasing need for the disaster resilience research headed by NIST, including investment in post-disaster impact research and pre-impact mitigation, whether from high-winds, fire, or flood.

A robust CJS allocation will also allow the Commerce Department to provide vital funding to offices that support the U.S. economy. Commerce Department programs produce detailed analyses that are indispensable for understanding our multitrillion-dollar economy. Our nation must sustain these and other efforts, including successful conclusion of the 2020 Census and the dissemination of high quality socioeconomic and demographic decennial census data that scientists will use throughout the next decade to inform basic, clinical, and applied research and research training activities.

The CJS bill includes critical research that supports law enforcement and criminal justice. In recent years, there has been increased demand for objective research regarding policing, prison and sentencing reform, mental health, addiction and community-trust building activities. Research funded by DOJ is central to our understanding of these issues and sound policymaking. Increasing the allocation for CJS will help to provide additional resources for these essential DOJ research programs.

In sum, the federal government has a unique role in funding the R&D crucial for our national needs, but the federal share of R&D spending as a percentage of GDP is now at its lowest point since the 1950s. The CJS bill is singularly responsible for determining over 50 percent of the annual federal investment in non-defense, non-biomedical research – research that is essential for our long-term economic growth, security, and prosperity.

Given the importance of federal support for R&D and the vital role played by the CJS Subcommittees in funding a substantial portion of this research, we urge you and your colleagues to do everything you can to ensure a sufficient CJS 302(b) allocation. Doing so will allow the Subcommittees to support the R&D investments necessary to meet our nation's challenges and opportunities.

Sincerely,

Coalition for National Science Funding