



Dear Members of Congress,

On behalf of the America First Policy Institute, we write to urge you to closely review forthcoming regulation from the Nuclear Regulatory Commission (NRC). Specifically, the NRC's recently finalized rule under 10 C.F.R. Part 53 and an in-progress framework for microreactors should be assessed to determine if further action from Congress is needed to secure the reforms that advanced nuclear deployment requires. The NRC has described Part 53 as seeking to create a risk-informed, technology-inclusive licensing pathway that would make advanced-reactor licensing faster, simpler, and more cost-effective. Congress should welcome this approach and stand ready to ensure that nuclear entrepreneurs are empowered to match high safety standards with quick timelines to build.

America's power demand is surging while reliability challenges mount as dependable generators retire. Our 94-reactor nuclear fleet, which provides 19% of U.S. electricity at a 91% capacity factor, is one of our most valuable strategic assets. SMRs and microreactors can expand on this foundation by delivering firm, reliable power to grid-scale applications, retired coal and nuclear plant sites, process-heat users, data centers, and remote military installations.

The NRC's existing frameworks (10 CFR Parts 50 and 52) were built for large light-water reactors, and they have ultimately become inadequate to the task of building nuclear power safely, efficiently, and at scale. Costs for Vogtle Units 3 and 4 reached roughly \$16,000/kW, compared to under \$5,000/kW in South Korea and ~\$2,000/kW in China for comparable projects. Congress recognized this problem and through NEIMA instructed the NRC to create a new framework, 10 CFR Part 53.

We urge you to appraise frameworks for licensing advanced nuclear reactors and related rulemaking against these three principles.

- 1. Calibrate Regulation to Risk.** A 10 MWe microreactor with passive or physics-based safety features poses a categorically different risk than a gigawatt-scale plant. Requirements, including emergency planning and security, should be risk-informed and performance-based, scaled to each design's actual risk profile, and technology-inclusive across both light-water and non-light-water concepts.
- 2. Allow for Scalability.** The promise of SMRs and microreactors is modular, factory-built components replicated across many sites to drive down costs. Similarly, standardized designs must be matched with standardized and streamlined regulatory review processes, and timelines for review must be enforceable with clear standards for accountability.





- 3. Ground Radiation Standards in Current Science.** Key assumptions underlying radiation risk regulation, such as the “Linear-No-Threshold” (LNT) model and the “As Low As Reasonably Achievable” (ALARA) standard, were accepted decades ago but are now seriously in question. LNT assumes no safe dose of radiation despite public dose limits set much higher than demonstrated safety thresholds; ALARA then ratchets costs upward whenever nuclear gets cheaper. Future frameworks should ensure radiation-safety standards for advanced reactors reflect current science.

Reformed frameworks for small modular reactors and microreactors would drive economic revival: existing nuclear and retired coal sites could host 188–269 GW of new capacity and thousands of well-paying jobs. New reactors would further the energy dominance agenda, fulfilling the President's goal of 400 GW of nuclear power by 2050 at a time when advanced nuclear power has real potential to be a scalable, cost-effective option. New licensing pathways would advance national security by facilitating the development of microreactors deployable to forward military bases and de-risking vulnerable fuel supply lines. And it would create export opportunities by making U.S.-built SMRs and microreactors the prime choices before Russian and Chinese state enterprises lock in global markets.

We call on Congress to ensure that America’s nuclear entrepreneurs receive the comprehensive reform that advanced nuclear requires: enabling scalability, grounding radiation standards in science, and calibrating regulation to actual risk.

Sincerely,

America First Policy Institute

