



1025 Connecticut Ave. NW, Suite 501
Washington, DC 20036

Testimony of Ryan Fitzpatrick
Deputy Director of the Clean Energy Program, Third Way
RE: Senate Bill 990
May 22, 2017

Dear Members of the House Committee on Energy and Environment:

In Oregon and across the country, we see remarkable innovation happening in the nuclear energy industry. Nuclear is already an important source of clean, reliable, and affordable energy, accounting for approximately 60 percent of America's clean power and supplying nearly 20 percent of our overall electricity needs. But new technologies are being developed that will help nuclear power reach new markets and achieve the same high safety and performance standards as today's reactors, and at an even lower cost.

For Third Way, climate change is the most compelling reason to support the development of these new reactors. The International Energy Agency estimates we will need to double global nuclear energy capacity by 2050 in order to hit our ambitious greenhouse gas emissions targets. But the odds of accomplishing that with today's gigantic reactors alone are slim. We need smaller reactors that can match the demand of smaller customers and isolated communities that rely on dirty diesel generators for power. We need reactors designed to operate more flexibly to balance grids with higher penetrations of variable renewables like wind and solar—a job that will otherwise be done by GHG emitting sources like natural gas plants. We need reactors that can nimbly provide emissions-free power as well as heat for industrial processes that currently use fossil fuels. And we need reactor designs that have a chance to drastically cut costs and allow nuclear to compete with cheap, carbon-heavy fossil plants, especially in developing economies.

The good news is, these technologies are within reach. In 2015, Third Way published a report showing nearly 50 projects underway in the U.S. and Canada, which had received a total of \$1.3 billion in private sector investment and could deliver enormous climate benefits—not to mention American jobs and export opportunities. The project closest to crossing the finish line belongs to an Oregon-based company called NuScale, which has made unprecedented strides toward commercializing its small modular reactor (SMR) design. The NuScale reactor still has many hurdles to overcome before it reaches the market, but it was promising enough to earn a 2014 award of \$217 million from the U.S. Department of Energy to keep moving forward, and it is helping pave the way for other advanced technologies as it continues.

Like NuScale, the State of Oregon also has an opportunity to lead in advanced nuclear by passing Senate Bill 990. This bill would allow companies to site and build advanced nuclear technology, specifically Small Modular Reactors (SMR's), in the state, contingent upon local approval. It would unlock potential opportunities for SMR development and drive the national conversation around advanced nuclear reactors and their ability to help in the climate fight. And it could serve to encourage additional investment and high-tech job creation in Oregon's clean energy industry.

I encourage you to support Senate Bill 990, and other efforts to unlock the new technologies the world will need to avoid the most damaging impacts of climate change. Thank you for the opportunity to offer my opinion on such a critical issue.

Sincerely,

Ryan Fitzpatrick
Third Way