

**WRITTEN STATEMENT
BY STEPHEN G. BURNS, CHAIRMAN
UNITED STATES NUCLEAR REGULATORY COMMISSION
TO THE
SENATE APPROPRIATIONS COMMITTEE
SUBCOMMITTEE ON ENERGY AND WATER DEVELOPMENT
MARCH 4, 2015**

Good morning, Chairman Alexander, Ranking Member Feinstein and distinguished Members of the Subcommittee. My colleagues and I appreciate the opportunity to appear before you today to discuss the U. S. Nuclear Regulatory Commission's (NRC) Fiscal Year (FY) 2016 budget request.

As you know, the NRC is an independent Federal agency established to license and regulate the Nation's civilian use of radioactive materials to ensure adequate protection of public health and safety, promote the common defense and security, and protect the environment.

The resources that we are requesting for FY 2016 will allow the NRC to continue to ensure the safe and secure use of radioactive materials in the United States. The NRC's principal regulatory functions are to: establish regulatory requirements; issue licenses consistent with those requirements to facility operators and those who own, possesses, and use, radioactive materials; oversee these licensees to ensure they operate safely and securely, and are in compliance with NRC requirements; conduct research to support the NRC's safety and security mission; and respond to emergencies involving regulated activities. The NRC also participates in international work that is integral to the agency's mandate.

The NRC regulates every aspect of the civilian use of radioactive materials. This includes all of the steps and the facilities involved in the nuclear fuel cycle, including extraction of uranium from ore, conversion of the uranium into a form suitable for enrichment, enrichment of uranium

to a level and type suitable for nuclear fuel, and fabrication of uranium into fuel assemblies for use in reactors. When the fuel assemblies can no longer sustain efficient reactor operations, they are removed from the reactors and stored as waste.

In FY 2016, the NRC will continue licensing and oversight activities for 100 operating commercial nuclear power reactors, including the anticipated operation of the Watts Bar Unit 2 nuclear power station. The resources that we have requested for FY 2016 also support completion of the highest-priority actions on the lessons learned from the Fukushima Daiichi Nuclear Power Plant accident, including seismic and flooding hazard reevaluations.

I would like to take a moment to emphasize the significant progress the NRC and the industry continue to make in implementing post-Fukushima safety enhancements at nuclear facilities across the United States. The NRC's primary focus throughout this effort has been on the highest-priority, most safety-significant enhancements to maximize the safety impact for nuclear power plants. The NRC's expectation is that most licensees will complete implementation of the most safety-significant enhancements by, or before, 2016.

A key element of the post-Fukushima safety enhancements is the NRC's 2012 Mitigating Strategies Order, which required licensees to ensure that sites are prepared to respond to beyond-design-basis events. These requirements include procuring additional equipment to maintain or restore core cooling, containment integrity, and spent fuel pool cooling for all units at a site. Last year, the first plants completed implementation of all mitigating strategies requirements. More than half of nuclear power plants are scheduled to achieve full implementation by the end of 2015, with the remaining plants to be completed by 2016. The one exception to this schedule is that some boiling water reactors are requesting schedule extensions for those parts of the mitigating strategies affected by the NRC's revision to the order

on containment venting. During and after implementation of the mitigating strategies requirements, the NRC will conduct inspections to verify that nuclear power plants have put appropriate strategies in place to mitigate beyond-design-basis events.

In the past year, both of the industry's National Response Centers (in Phoenix, Arizona and in Memphis, Tennessee) have become operational. Both centers contain multiple sets of emergency diesel generators, hoses, and other backup equipment that can be delivered to any nuclear power plant in the United States within 24 hours. These response centers address a key element of the 2012 Mitigation Strategies Orders, which was to provide sufficient offsite resources to sustain plant safety functions indefinitely.

New reactor licensing and oversight activities are expected to continue during FY 2016. In FY 2016, the NRC planned to review nine new reactor combined license applications and to complete three of these reviews. Additionally, the NRC will continue to conduct inspections for new reactors under construction, namely, the Vogtle Electric Generating Plants, Units 3 and 4; and Virgil C. Summer, Units 2 and 3. The NRC also expects to receive and will begin to review a small modular reactor application. In FY 2016, the NRC expects to complete the review of one construction permit application for a medical isotope production facility and conduct environmental and safety reviews of construction permits for two additional medical isotope production facilities.

The NRC takes regulatory actions to ensure the safety and security of radioactive materials by licensing and overseeing medical, academic, and industrial and research users; nuclear waste and spent fuel storage facilities; certifying storage and transportation containers; responding to events; and overseeing decontamination and decommissioning activities. In addition, under authority provided in the Atomic Energy Act of 1954, as amended, the agency has agreements

with 37 states under which those states assume regulatory responsibility for the use of certain radioactive materials. Combined, the NRC and the Agreement States oversee over 21,000 material licensees. The NRC further enhances its regulatory program through coordination and cooperation with other Federal agencies, States, Tribes, and international organizations and foreign governments.

THE CHANGING REGULATORY ENVIRONMENT

Before I get into the specifics of the NRC's FY 2016 budget request, I would like to take a moment to address the NRC's efforts to address the changing environment in which we now find ourselves. Since 2001, the agency has grown significantly to enhance security and incident response and to prepare for the projected growth in the use of nuclear power in the United States. That forecast in growth has been adjusted downward in response to changes in the nuclear industry. As is appropriate, the NRC is being scrutinized by its stakeholders for its responsible use of resources. The Congress has charged the NRC with a critical mission to ensure adequate protection of public health and safety and the common defense and security, and the NRC can never lose sight of this mission. Still, the agency can and should maintain focus on our mission while also taking a responsible and hard look at whether it is effectively using resources.

The NRC has proactively taken steps to address these issues in its regulatory processes, budget, and fee collections.

I start with the NRC's budget. The NRC's FY 2016 proposed budget reflects the NRC's efforts to demonstrate its responsiveness to the new environment in which we find ourselves.

Continuing with trends that began in FY 2014, the FY 2016 budget request reflects a reduction in both dollars and full time equivalents from budget proposals in recent years.

In addition, the NRC's proposed FY 2015 fee rule, which will be published for public comment in the coming weeks, will include estimates for reductions in licensee annual and hourly fees that we expect in our final fee rule. For power reactors, the estimated annual fees will be \$4.75 million per reactor which is down 5 percent from FY 2014. The NRC hourly rate is estimated at \$268 in FY 2015, a drop from \$279 in FY 2014. These decreases are primarily due to a reduced FY 2015 Enacted Budget which allows the NRC to utilize prior year carryover funds providing available resources to meet the NRC's mission requirements. The FY 2015 Enacted Budget also decreases 26.5 FTE from FY 2014. These savings were realized from projected workload reductions and overhead efficiency measures. The FY 2015 proposed fee rule will also reflect a positive increase in the agency's staff productivity assumption of 1,375 hours in FY 2014 to 1,420 hours in FY 2015.

The NRC continues to focus on the transparency of the NRC Fee Rule and has recently received a benchmarking report to assist us in looking at the fee practices of other regulatory agencies. The NRC will hold a public meeting on the FY 2015 proposed fee rule during the comment period to engage with stakeholders on our methodology and presentation of license fees. This is a priority for our Chief Financial Officer.

Perhaps the most significant NRC undertaking with respect to the changing regulatory environment is Project Aim 2020. The NRC launched Project Aim 2020 in June 2014 to enhance the agency's ability to plan and execute its mission while adapting in a timely and effective manner to a dynamic environment.

The Project Aim 2020 team gathered perspectives from internal and external stakeholders to forecast the future workload and operating environment in 2020. Based on analysis of these

perspectives, and an evaluation of the NRC's current state compared to the anticipated future state, the staff identified key strategies and recommendations to transform the agency over the next five years to improve the effectiveness, efficiency, and agility of the NRC. The staff's efforts are reflected in its report that was provided to the Commission on January 30, 2015.

The Commission considers this report to be the beginning of a dialogue about the future of the NRC. In that spirit, and in an effort to emphasize the NRC's seriousness, the Commission made the report available to the public on February 18. In addition, the Commission was also briefed by the NRC staff on the report in a public meeting that occurred on the same day. Advance copies of the report were also provided directly to our Congressional appropriations and oversight committees.

I will not go into great detail on the Project Aim 2020 report except to note that it concludes that the NRC needs to function more efficiently by: right-sizing the agency while retaining appropriate skill sets needed to accomplish its mission; streamlining agency processes to use resources more wisely; improving timeliness in regulatory decision making and responding quickly to changing conditions; and promoting unity of purpose with clearer agency-wide priorities.

I speak for my colleagues when I tell you that each member of the Commission wants to be timely in acting on this report, but it also wants to do so deliberately and smartly. Although the NRC recognizes the need for change, it also is keenly aware that major organizational change, if not done wisely, can have a detrimental effect on the agency's mission and on the morale of its employees. The NRC has a critical mission and some of the most dedicated, knowledgeable, and highly-respected employees in the Federal government. I can tell you from my own recent international experience, the NRC is respected as a world-class organization.

I cannot emphasize enough that the NRC's ability to protect public health and safety and the common defense and security will always be our main concern. Nevertheless, we can and should take a hard look at how to ensure the agency carries out its mission effectively while also being more efficient and fiscally responsible.

Project Aim 2020 is but one part of the self-assessment the NRC has undertaken in recognition of the changing environment. For instance, over the last several years, the Commission has revised its rulemaking processes to understand, and if possible reduce, the cumulative effects of regulations. These new processes include increased opportunities for stakeholder interactions and feedback, publishing draft supporting guidance concurrent with proposed rules, requesting specific comment on the cumulative effects of regulations in proposed rules, and developing better-informed implementation timeframes.

In addition, the NRC has sought industry volunteers to perform case studies on the accuracy of cost and schedule estimates used in NRC's regulatory analyses. Based on those results, additional regulatory analysis process enhancements are planned to improve cost estimating. We believe that applying these process enhancements will result in a better understanding of the implementation costs associated with new regulations for operating reactors.

With respect to cost benefit analysis, I note that the Government Accountability Office (GAO) recently completed a report that concluded the NRC needs to improve its cost estimating practices. Although the NRC did not agree with all of GAO's specific recommendations, it did agree generally that the NRC's regulatory analyses practices could be improved, and has started to take steps, as described above, to do so.

In sum, as these examples have shown, the Commission is very cognizant of our changing environment and is committed to taking a hard look at itself to ensure that it is prepared for the future as it now appears to exist.

FY 2016 BUDGET REQUEST

The NRC's FY 2016 budget request provides the necessary resources for to carry out the agency's mission for the American public. The NRC's proposed FY 2016 budget is \$1,032.2 million, including 3,754 full-time equivalents (FTE).

To fully understand the FY 2016 proposed budget in relation to the FY 2015 Enacted Budget one must consider the unique funding scenario for the NRC in the Consolidated and Further Continuing Appropriations Act of 2015. The FY 2015 Appropriation Act reduced the FY 2015 budget request for salaries and expenses by \$44.2 million to account for fee-based unobligated carryover and a recognition of reduced workload and agency productivity and efficiency gains. It also authorized the Commission to reallocate the agency's unobligated prior-year carryover to supplement its FY 2015 appropriations. As a result, while the FY 2016 Budget represents a \$16.9 million increase over the FY 2015 Enacted Budget, the NRC's total available resources in FY 2015 are \$1,049.5 million. For essentially the same workload with the exception of the University Grants program, the NRC's FY 2016 budget request is \$17.3 million less (including a reduction of 37.5 FTE) compared to the total available FY 2015 resources.

The NRC Office of Inspector General (OIG) component of the FY 2016 proposed budget is \$12.1 million, including 63 FTE. The OIG budget includes approximately \$11.2 million for auditing and investigation activities for NRC programs, and \$1.0 million for the auditing and

investigations activities of the Defense Nuclear Facilities Safety Board (DNFSB). These resources will allow the OIG to carry out the Inspector General's mission to independently and objectively conduct audits and investigations to ensure the efficiency and integrity of NRC and DNFSB programs and operations, to promote cost-effective management and to prevent and detect fraud, waste, and abuse.

Under the provisions of the Omnibus Budget Reconciliation Act of 1990, as amended, the NRC's FY 2016 budget request provides for 90 percent fee recovery, less the amounts appropriated for, (1) waste incidental to reprocessing activities under Section 3116 of the Ronald W. Reagan National Defense Authorization Act for Fiscal Year 2005, (2) generic homeland security activities, and (3) DNFSB activities. Accordingly, approximately \$910 million of the FY 2016 budget request will be recovered from fees assessed to NRC licensees. This will result in a net appropriation of \$122 million.

The NRC continues to look for cost savings at the agency and has taken cuts in overhead for the last five years. While the available resources are comparable for FY 2015 and FY 2016, the NRC's FY 2016 workload changes and efficiency savings allows the agency to fund fact-of-life increases without an increase to the overall budget. The NRC's FY 2016 budget request reflects the Office of Management and Budget guideline of a 1.3 percent increase in salaries and benefits for a cost of living increase and accommodates routine contract cost escalations.. The budget also adheres to commitments to the House Committee on Transportation and Infrastructure for NRC space usage. In FY 2016, all NRC Headquarters employees will be located in the three buildings of the White Flint Campus and the Food and Drug Administration will occupy eight floors of the newest building. NRC will continue to occupy five floors including the Operations Center, Professional Development Center for staff training courses, and the Data Center as well as office space to support those programs.

I would now like to highlight the following portions of the FY 2016 Budget Request.

NUCLEAR REACTOR SAFETY

Operating Reactors

The Operating Reactors Business Line encompasses the regulation of 100 operating civilian nuclear power reactors and 31 research and test reactors. The FY 2016 budget request for Operating Reactors is \$601.7 million, which represents an overall funding decrease of \$10.4 million when compared with the FY 2015 Available Resources.. This funding level supports completing work related to implementation of the lessons learned from the nuclear accident at the Fukushima nuclear power plant in Japan, work on topical reports, and reducing the number of pending licensing actions.

New Reactors

The New Reactors Business Line is responsible for the regulatory activities associated with locating, licensing, and overseeing construction of new nuclear power reactors. The FY 2016 budget request for New Reactors is \$191.7 million, which represents an overall funding decrease of \$5 million when compared with the FY 2015 Available Resources. The decrease is a result of delays in application submittals, and project slowdowns or suspensions.

NUCLEAR MATERIALS AND WASTE SAFETY

Fuel Facilities

The Fuel Facilities Business Line supports licensing, oversight, rulemaking, international activities, research, generic homeland security, and event response associated with the safe and secure operation of various operating and new fuel facilities such as conversion, enrichment, and fuel fabrication facilities, and nuclear fuel research and pilot facilities.

The FY 2016 budget request for Fuel Facilities is \$51.5 million, which represents an overall funding increase of \$0.8 million when compared with the FY 2015 Available Resources.

Nuclear Materials Users

The Nuclear Materials Users Business Line supports the safe and secure possession, processing, handling, and the many diverse uses of nuclear materials, along with associated licensing, oversight, rulemaking, international activities, research, generic homeland security, event response, and State, Tribal, and Federal Program activities.

The FY 2016 budget request for Nuclear Material Users is \$87.4 million, which represents an overall funding decrease of \$1.7 million when compared with the FY 2015 Available Resources.

Spent Fuel Storage and Transportation

The Spent Fuel Storage and Transportation Business Line supports licensing, oversight, rulemaking, international activities, research, and generic homeland security associated with the safe and secure storage and transportation of spent nuclear fuel and other radioactive materials.

The FY 2016 budget request for Spent Fuel Storage and Transportation is \$43.8 million, which represents an overall funding decrease of \$2.4 million when compared with the FY 2015 Available Resources. The decrease is in the oversight, research, and rulemaking areas and does not represent a significant change in work scope.

Decommissioning and Low-Level Waste

The Decommissioning and Low-Level Waste Business Line supports licensing, oversight, rulemaking, international activities, and research associated with the safe and secure operation of uranium recovery facilities, removal of nuclear facilities from service and reduction of residual radioactivity to a level that permits release of the property and termination of the NRC license, and disposition of low-level radioactive waste from all civilian sources.

The FY 2016 budget request for Decommissioning and Low-Level Waste is \$44.1 million, which represents an overall funding increase of \$1.5 million when compared with the FY 2015 Available Resources. The increase reflects greater resource needs to support oversight of decommissioning of power reactors and uranium recovery facilities licensing activities.

CLOSING

Chairman Alexander, Ranking Member Feinstein, and distinguished Members of the Subcommittee, this concludes my formal testimony on the NRC's FY 2016 budget request. On behalf of the Commission, I thank you for the opportunity to appear before you. I look forward to continuing to work with you to advance the NRC's important safety and security missions. I would be pleased to respond to any questions that you may have. Thank you.