

FAQs: The CNSC's memorandum of cooperation with the U.S. Nuclear Regulatory Commission on Small Modular Reactors

Q1. What does the joint CNSC–U.S. NRC memorandum of cooperation mean for the NRC and to Americans?

A1. On August 15, 2019, the Canadian Nuclear Safety Commission and the United States Nuclear Regulatory Commission (U.S. NRC) signed a joint CNSC–U.S. NRC memorandum of cooperation (MOC). This MOC is intended to supplement and strengthen the existing memorandum of understanding between the two parties signed in August 2017.

This MOC will help us ensure the safe development of small modular reactor and advanced reactor technologies in the U.S. and the efficient deployment of these technologies, now and in the future. It is a testament to our successful relationship with our Canadian counterparts and our mutual commitment to excellence in nuclear safety regulation.

The NRC is strongly committed to engaging in international cooperation activities that foster relationships, strengthen frameworks and help share best practices to improve safety.

The CNSC and the NRC are mature and agile nuclear regulatory bodies that jointly recognize the need for leadership to ensure the efficient and effective oversight of activities that involve advanced reactor technologies.

Q2. What will this enhanced cooperation mean for future and ongoing reviews in both countries?

A2. CNSC–NRC cooperation will provide opportunities for both agencies to share scientific information about technical matters that could support more efficient reviews of small modular reactors and advanced reactor technologies.

The CNSC may take NRC review results into account when an applicant proposes to build and operate a reactor design that is currently under review or that has been previously reviewed by the U.S. NRC. Likewise, the U.S. NRC may consider insights gleaned from the CNSC's [pre-licensing vendor design reviews](#) and licensing review process.

The CNSC and the NRC could leverage information to streamline the review process. For example, they could:

- develop shared approaches to conducting technical reviews of small modular reactors and advanced reactors in order to resolve common technical questions and facilitate regulatory reviews that address our respective national regulations
- collaborate on pre-licensing activities to ensure mutual preparedness to efficiently review small modular reactor and advanced reactor designs
- cooperate on research, training and the development of regulatory approaches for unique or novel technical considerations to ensure the safety of small modular reactors and advanced reactors

Q3. How do the NRC and CNSC decide which designs will be subject of collaborative work with both regulators?

A3. The decision to propose cooperative activities between the CNSC and the NRC is that of the vendors, made with consideration for their commercial plans in each country. Vendors have their own commercial timelines for completing regulatory interactions and activities in each country. As a result, these timelines and the scope and depth of their interactions with the regulators may differ considerably. In addition, cooperation must acknowledge the differences in the Canadian and U.S. regulatory frameworks and licensing processes but leverage the fundamental scientific and engineering findings in other reviews to the extent that it is practical to do so.

In general, a request by vendors to participate in NRC/CNSC cooperation is made because they have already substantially engaged with at least one of the two regulators and that they have known plans to engage with the other regulator on the same design.

The decision of CNSC and NRC to cooperate in activities that concern specific reactors is not a statement of technology selection or preference. The decision will depend on the design and be based on the following factors which the vendor must address in a proposed work plan that both regulators accept:

1. To what extent is the vendor engaging in meaningful pre-licensing activity with each regulator?
2. How are the vendor's engagement activities in each country similar, such that the outcome of cooperation will be useful? For example, the objectives of the CNSC's vendor design review process are different than those of the U.S. NRC's certification and pre-licensing engagement processes, yet opportunities exist for leveraging information between the two regulators.
3. What are the timelines for engaging with each regulator?
4. How is the vendor sharing information about their design with both regulators to enable cooperation to occur?