Virtual Open House Transcript

Slide 1: Welcome

Welcome to the virtual open house for Global First Power's Micro Modular Reactor at Chalk River Project. Thank you for joining us! My name is Eric McGoey; I'm the Director of Engagement and Communications for Global First Power.

Navigating the Virtual Open House

This presentation provides information about the Project and its environmental assessment process. You can pause or stop the presentation at any time.

In addition to this presentation, additional materials are available to be viewed or downloaded from the virtual open house website at www.gfpcleanenergy.com including:

- **The audio-video version of this presentation**
- **A copy of the slides shown in this presentation, and a transcript of this presentation (with French translation available of the transcript and the slides).**
- **The virtual open house site also provides links to a comment form, contact information, fact sheets and information about the Project and its environmental assessment process.**

We invite you to submit your feedback through the online comment form on the website following your review of the materials. A printable version of the comment form is available for download if preferred, which can be submitted by email to (info@globalfirstpower.com). Should you wish to submit comments by mail or phone, or require any other assistance please contact us and we would be happy to help. Contact information can be found at the end of this presentation and on the project website.

This virtual open house will be hosted on the website from February 24 to March 10. We appreciate your online comment forms being returned by March 10 however you can still submit comments and feedback after this date via email or phone.

Slide 2: What is the Purpose of this Virtual Open House?

We are here to present to you the work underway on the development of Canada's first small modular reactor (or SMR). Global First Power is proposing to build an SMR demonstration facility at the Chalk River site owned by Atomic Energy of Canada Limited (or AECL) and managed by Canadian Nuclear Laboratories (or CNL). A Micro Modular Reactor™ designed by the Ultra Safe Nuclear Corporation is the proposed project technology. The Project will serve to demonstrate how the Micro Modular Reactor's advanced clean energy technology can provide new energy options for remote mines and communities and help support Canada's climate change goals.

An environmental assessment (or EA) is underway to evaluate and mitigate effects to the environment that may occur as a result of the project. We are hosting this virtual open house to provide project background, project progress and to share the next steps in the EA, including opportunities for public participation. Due to restrictions on public gatherings because of COVID-19, we are hosting this event virtually to keep everyone safe and in adherence with public health advice.

We look forward to hearing from you, gathering feedback and answering any questions you may have.

Slide 3: Acknowledgement of Indigenous Communities

GFP is committed to building mutually beneficial working relationships with Indigenous communities located near its project sites and operations.

The Chalk River site is built on unceded Algonquin Anishinabe Territory – Anishinabe Aki. The Anishinabeg have lived on this territory for millennia. Their culture and presence have nurtured and continue to nurture this land. GFP honours

the peoples and land of the Algonquin Anishinabe Nation. GFP also recognizes all First Nations and Métis peoples and their valuable past and present contributions to this land.

GFP is committed to engagement with all Indigenous communities with treaty and Aboriginal rights as well as those with interests in the vicinity of the Project site. Engagement with identified Indigenous communities began at the onset of our licence application process and we commit to ongoing engagement throughout all phases of the Project.

Slide 4: Global First Power – Who We Are

At Global First Power (GFP) we are in the business of developing and deploying small modular reactor technology as an alternative to fossil-fuel generation.

We intend to lead the way in providing a new form of safe, clean, reliable, and commercially-viable energy through our ownership and operation of the next generation of nuclear technology.

Slide 5: A Joint Partnership

Global First Power Limited Partnership (GFP) is a joint venture between Global First Power Limited, Ontario Power Generation (OPG) and USNC-Power, a wholly owned Canadian subsidiary of Ultra Safe Nuclear Corporation (USNC). GFP is proposing to construct, own and operate Canada's first small modular reactor, a UNSC-designed Micro Modular Reactor™ (MMR). On June 3rd, 2020, the three companies announced a joint venture partnership which will build, own and operate the proposed Project at the Chalk River site.

USNC will supply the Micro Modular Reactor technology. OPG will coordinate licensing the facility and lead engagement, building on their experience of over 50 years in the nuclear field in Ontario.

Slide 6: Why Small Modular Reactors?

Small Modular Reactors (SMRs) are a form of clean nuclear energy that can be constructed and shipped already assembled. Since SMRs do not need to be connected to the electrical grid, they can be used by remote mines and communities who aren't connected to provincial electricity grids.

The demonstration facility at Chalk River is intended to show how SMR technology may be part of the solution in reaching Canada's climate change targets by providing an alternative to fossil fuels as an energy source.
The image on this slide shows a cross section of a typical small modular reactor, using the MMR technology as an example. Here you can see the reactor technology and heat transfer system located below ground level as well as support buildings.

Slide 7: MMR Project at Chalk River

The facility will consist of two main parts – the nuclear plant and the adjacent plant. The nuclear plant includes the building where the reactor is located, generating the heat which is transferred to the adjacent plant, where the heat can be converted to electricity or other forms of heat for either district heating or industrial purposes. The adjacent plant will also include offices and a visitor and training centre.

The entire facility is expected to be approximately 31,000 square meters which is roughly the size of 2 Olympic size running tracks.

Slide 8: Typical Site Layout

The image on this slide shows a typical site layout for a single unit facility, including the facilities that comprise the nuclear plant, adjacent plant, and the visitor and training centre. The layout shown is similar to that planned for the Chalk River site.

Slide 9: The Chalk River Site

CNL's long-term plan for the Chalk River site includes creating opportunity for innovative developments such as SMRs at the site. To support this goal, CNL undertook feasibility studies to identify potential candidate sites within the Chalk River site to host a demonstration facility. Considerations included criteria such as availability of land, proximity to infrastructure (such as water for non-industrial/ domestic uses) and minimizing proximity to habitat for threatened or endangered species and of archaeological resources. This map shows the resulting three most suitable sites, which GFP has assessed to determine the preferred site for our Project.

Slide 10: Identification of a Preferred Site

Site C, as noted on the previous map, is currently used as a parking lot near the built-up area at the Chalk River site, was assessed by GFP as our preferred location. As Site C is currently used as a parking lot, this site can be developed in a way that minimizes disturbance to the natural environment and allows connection to CNL's existing services, including power lines to deliver generated electricity. Studies will continue at the site during 2021 to confirm the below ground conditions at the site are appropriate.

The planned orientation of the Project at Site C is shown overlain on the current parking lot.

Slide 11: Safely Managing Wastes

During the 20-year life of the Project, regular operation and maintenance of the nuclear plant will generate a small amount of waste materials as compared with a traditional nuclear reactor. This may include low and intermediate level materials such as rags or mops. As the reactor will operate on a single load of fuel for the lifetime of the facility, the used fuel will be removed and managed at the end of end of its operational life. Radioactive materials resulting from project activities will be managed on-site prior to disposal at appropriate, licensed facilities.

Other conventional solid wastes will be managed at off-site landfill or disposal facilities. Sewage wastes will be managed through existing systems at the Chalk River site.

Slide 12: MMR™ Technology- Fast Facts

MMRs do not require external process water for safe operation of the reactor and are designed to operate for 20 years without refueling. The MMR technology is designed with advanced safety systems which do not require any operator interaction in order to safely shut down the reactor, in the unlikely event of a malfunction.

This facility will be the first of its kind in Canada however similar designs are in operation in China and Japan and demonstrations have taken place in the USA and Germany.

More information about the MMR and its features is available through the links on the virtual open house site.

Slide 13: Timeline for Planning Purposes

This diagram shows the proposed timeline for this project. Currently we are in the preliminary stages of the Environmental Assessment. Throughout the life of the project, we will be engaging with Indigenous communities, the public and stakeholders to share information and seek feedback.

Slide 14: Approvals Process

In 2019, GFP submitted an application for a licence to prepare site, along with a Project Description for the Project to the Canadian Nuclear Safety Commission (CNSC). GFP is working through the CNSC's integrated process for environmental assessment and licensing. Our EA is proceeding in accordance with the *Canadian Environmental Assessment Act, 2012* (CEAA, 2012) supported by our consultant team at Calian.

Slide 15: Overview of the Environmental Assessment Process

This diagram demonstrates how the EA and the licensing process for the project will proceed in an integrated way, with engagement occurring throughout the process, including through sessions such as this, documents being made available for review and comment and through a combined EA and licensing hearing at the end of the process.

Slide 16: EA Scope

The CNSC confirmed in August 2020 that the EA for the Project should consider the factors in paragraph 19 of the Canadian Environmental Assessment Act, 2012 with no additional factors. Beyond these scope requirements, GFP plan to address the sustainability of the project and consideration of effects through gender-based analysis plus in response to feedback from Indigenous communities.

The EA must demonstrate that the Project is not likely to cause significant adverse environmental effects considering available mitigation measures.

Slide 17: Aspects of the Environment to be Considered

To consider potential effects of the Project on the environment within the scope of an environmental assessment, aspects of the physical, biological and human environment are defined, and important components of each aspect are defined to focus the assessment. For the aspects of the environmental identified here, proposed Valued Components to focus this environmental assessment have been identified. The proposed Valued components are shared for viewing and download through the virtual open house main webpage at the link shown. We invite you to share your input on the Valued Components through the comment form.

Slide 18: EA Process

The EA process follows a step-wise approach to focus the assessment on potential interaction points between the environment, specifically the Valued Components identified and the Project, then to understand and reduce or mitigate the effect of potential impacts. Indigenous knowledge shared to support the project will be integrated throughout the assessment process, along with feedback received through engagement.

Further information on the steps in the CEAA 2012 EA process and opportunities for participation are shared for viewing and download through the virtual open house main webpage at the link shown.

Slide 19: Phases of the Project

There are four main phases in the Project's development considered in the environmental assessment: Site preparation, construction, operations and decommissioning and restoration of the site. The activities within these phases are linked to the CNSC licenses require for development, operation and closure of nuclear power plants in Canada. Further detail on the activities within each of the project phases will be documented and assessed through the environmental assessment.

Slide 20: Next Steps

Currently, we are seeking for your feedback on our proposed Valued Components as well as understanding how you would like to be engaged on the project going forward. Later this year, further engagement is planned when we will share the preliminary findings of our effects assessment. We look forward to continued engagement with you as we progress through the EA and licensing process and we welcome your input in helping to shape the direction of this exciting project.

Slide 21: How to get involved

Comments and questions are always welcome and GFP is committed to keeping you informed. On March 2nd at 7pm, we will be hosting a “live and interactive” telephone town hall session, where we will address questions from the public. More information on this event can be found on the virtual open house website.

We appreciate your comments. A comment form is available until March 10, 2021 and can be found on this virtual open house website. Feedback and questions can also be submitted anytime through the contact information on our website. If you need any assistance completing the comment form please call us at 1-800-892-9504 and we will be happy to help. For more information on the project please visit our website (www.globalfirstpower.com) or twitter account.

Slide 22: Thank you

Thank you for visiting our virtual open house!