THE HANFORD SITE

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Hanford Tank Waste Mission Advances with Heat up of Second Melter

RICHLAND, Wash. – The U.S. Department of Energy today announced the safe and successful heat up of the second of the two world's largest melters at the Waste Treatment and Immobilization Plant (WTP) at the Hanford Site in Washington state. This achievement marks a significant milestone in the Department's ongoing effort to address chemical and radioactive waste stored in underground tanks at the Hanford Site.

"Heating up the second melter is an important achievement for Hanford and critical in our journey to advance tank waste treatment to immobilization and ultimately disposal," said Brian Vance, DOE Office of River Protection Manager. "This success is the culmination of years of employee expertise, ingenuity and commitment to advancing the cleanup mission and providing real return on taxpayer investment."

With both melters now at their operational temperature, the Hanford team will next begin running nonradioactive simulants through the WTP systems over the next several months prior to performing environmental performance testing. This achievement builds on significant progress in the Direct-Feed Low-Activity Waste (DFLAW) program.

The two 300-ton WTP melters are the heart of the vitrification process, which will immobilize Hanford tank waste in glass. During vitrification, treated waste will be fed to the melters where it will be mixed with glass forming materials, heated to 2,100 degrees Fahrenheit and poured into specially designed stainless-steel containers for disposal at the Integrated Disposal Facility.

"We are immensely proud of the successful heat up of Melter 2 at the Vit Plant. This milestone reflects the dedication, expertise, and collaborative spirit of our employees, contractors, and our partner, the Department of Energy," said Brian Hartman, Bechtel Senior Vice President and Project Director of the Hanford Vit Plant. "By incorporating the lessons learned from the first melter, we have reached this historic milestone safely and efficiently, underscoring our commitment to excellence and safety."

With the operating temperature successfully attained and a molten glass pool established, the next phase involves the removal of startup heaters. They will be replaced with bubblers, specialized equipment designed to introduce air into the molten glass, circulating it and maintaining an even temperature.

Hanford contractor Bechtel National, Inc. is responsible for designing, constructing, and commissioning WTP. Once completed, the plant will process and stabilize millions of gallons of

legacy tank waste using the vitrification process. Information on the commissioning process is available on the Journey to Melter Heatup website. The plant facilities can be viewed using the self-guided Hanford Virtual Tour available at www.Hanford.gov.

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The Department of Energy (DOE) is engaged in one of the great public works of this century at the Hanford Site near Richland, Washington. Responsible for the federal government's cleanup of the legacy of more than 40 years of producing plutonium through the 1980s, DOE is transforming the site back into a 24/7 operations mode to treat tank waste from the production era. The DOE Office of River Protection (ORP) is responsible for the safe and efficient retrieval, treatment and disposal of the 56 million gallons of chemical and radioactive waste stored in Hanford's 177 underground tanks. The mission includes building and commissioning the world's largest radioactive waste treatment plant, which will immobilize the legacy tank waste through vitrification. The DOE Richland Operations Office is responsible for all remaining Hanford cleanup and is currently focused on stabilizing and demolishing former plutonium production structures, excavating and disposing of contaminated soil and waste, treating contaminated groundwater, and configuring Hanford Site infrastructure for the future, with an emphasis on supporting the tank waste mission. Hanford Site work is conducted by a federal and contractor workforce of approximately 10,000 personnel. Visit www.hanford.gov for more information about the Hanford Site.

U.S. DEPARTMENT OF ENERGY

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