Ur-Energy Files S-K 1300 Initial Assessments for the Lost Creek ISR Uranium Property and the Shirley Basin ISR Uranium Project

written by Raj Shah | March 10, 2022

March 9, 2022 (Source) – **Ur-Energy Inc.** (NYSE American:URG) (TSX:URE) (the "Company" or "Ur-Energy") is pleased to announce that it has filed S-K 1300 Initial Assessment Technical Report Summaries for its Lost Creek Property and Shirley Basin Project. The reports are filed as exhibits to the Company's Annual Report on Form 10-K, filed March 9, 2022, with the U.S. Securities and Exchange Commission on EDGAR at www.sec.gov/edgar.shtml. Both reports were prepared by Qualified Person, Western Water Consultants, Inc., d/b/a WWC Engineering ("WWC").

John Cash, Ur-Energy CEO, noted, "We are very pleased that WWC has confirmed the ongoing viability of the operating Lost Creek Project and Property. We are also proud to report that the Shirley Basin Project continues to show excellent potential as our second operating project. With these two properties, we stand ready to quickly ramp-up and supply a domestically produced, clean energy solution to our customers and America's communities."

Initial Assessment of Lost Creek ISR Uranium Property, Sweetwater County, Wyoming, USA

We filed an Initial Assessment Technical Report Summary on our Lost Creek Property, Sweetwater County, Wyoming, USA (the "Lost

Creek Report," March 7, 2022), which was prepared by WWC. The Lost Creek Report not only provides the most recent resource update, but also calculates the Property's economics assuming a near immediate restart of wellfield development activities and the subsequent ramp-up to a one million pound per year production rate.

The mineral resource estimate for the property is 11.9 million pounds eU_3O_8 in the Measured and Indicated categories, and 6.6 million pounds eU_3O_8 in the Inferred category. Lost Creek has produced 2.7 million pounds U_3O_8 as of December 31, 2021. The mineral resource estimate was reduced to account for production to date.

	Measured			Indicated			Inferred		
Project	Avg Grade % eU_3O_8	Short Tons (X 1000)	Pounds (X 1000)	Avg Grade % eU_3O_8	Short Tons (X 1000)	Pounds (X 1000)	Avg Grade % eU_3O_8	Short Tons (X 1000)	Pounds (X 1000)
LOST CREEK	0.048	8,572	**8,173**	0.048	3,412	**3,295**	0.046	3,261	**3,013**
Production through 12/31/2021	0.048	-2,849	**-2,735**						
LC EAST	0.052	1,392	**1,449**	0.041	1,891	**1,567**	0.042	2,954	**2,484**
LC NORTH	-----	-----	-----	-----	-----	-----	0.045	644	**580**
LC SOUTH	-----	-----	-----	0.037	220	**165**	0.039	637	**496**
LC WEST	-----	-----	-----	-----	-----	-----	0.109	16	**34**
EN	-----	-----	-----	-----	-----	-----	-----	-----	-----
Lost Creek Property GRAND TOTAL	**0.048**	**7,115**	**6,887**	**0.046**	**5,523**	**5,027**	**0.044**	**7,512**	**6,607**
			MEASURED + INDICATED =		**12,638**	**11,914**			

Notes:

Sum of Measured and Indicated tons and pounds may not add to the reported total due to rounding.

1. % eU_3O_8 is a measure of gamma intensity from a decay product of uranium and is not a direct measurement of uranium. Numerous comparisons of eU_3O_8 and chemical assays of Lost Creek rock samples, as well as PFN logging,indicate that eU_3O_8 is a reasonable indicator of the chemical concentration of uranium.

2. Table shows resources based on grade cutoff of 0.02 % eU_3O_8 and a grade x thickness cutoff of 0.20 GT.
3. Measured, Indicated, and Inferred MineralResources as definedin S-K 1300.
4. Resources are reported through December 31, 2021.
5. All reported resources occur below the static water table.
6. 2.735 million lbs. of U_3O_8 have been produced from the Lost Creek Project HJ Horizon as of December 31,2021.
7. Mineral resources that are not mineral reserves do not have demonstrated economic viability.

The economic analyses within the Lost Creek Report continue to support the potential viability of the Property. Total future life of mine (LoM) production (without additional exploration) is modeled to be 12.3 million pounds from 2022 to 2036 with LoM operating costs estimated to be $16.34 per pound. All in, the estimated total costs per pound, including royalties and extraction taxes, is estimated at $33.61 per pound before income tax of $8.72 per pound. Pricing used in the analysis ranged from $50.80 to $66.04 per pound.

Excluding sunk costs which occurred prior to December 31, 2021, the Property is estimated to generate LoM net cash flow of $376.4 million before income taxes, and $267.1 million after income taxes. Payback of the initial capital investments, including $23.7 million in sunk costs which occurred prior to the beginning of the analysis, is estimated during the second quarter of 2024. The Property has a calculated before tax internal rate of return (IRR) of 72.2 percent and a before tax net present value (NPV) of $210.9 million applying an eight percent discount rate. When income taxes are included in the calculation, the after-tax IRR is 66.8 percent and the after tax NPV is $156.8 million.

Because inferred resources are mineral resources that are

considered too speculative geologically to have modifying factors applied to them that would enable them to be categorized as mineral reserves, under relevant U.S. standards, there is no certainty that this economic assessment, which includes inferred resources, will be realized. To account for the chance that the inferred resources are not upgraded as the Company collects additional drilling data while mining progresses at Lost Creek, a second economic analysis was prepared which excludes inferred resources, as required by S-K 1300. The estimated LoM production excluding the inferred resources is modeled to be 8.6 million pounds from 2022 to early 2032. All in, the estimated total costs per pound, including royalties and extraction taxes, is estimated at $36.23 per pound before income tax of $6.69 per pound. Excluding inferred resources, the Property is estimated to generate net cash flow over its life of $234.8 million before income taxes, and $175.3 million after income taxes. Excluding inferred resources, the Property has a calculated before tax IRR of 71.7 percent and a before tax NPV of $153.4 million applying an eight percent discount rate. When income taxes are included in the calculation, the after-tax IRR is 67.0 percent and the after tax NPV is $120.0 million.

Lost Creek Project Update

Controlled production continued at Lost Creek throughout 2021 in recognition of market conditions. The Company has all required permits for operations within the first three mine units at Lost Creek and expects to have the final permit to allow operations within the HJ and KM Horizon at LC East and additional mine units at Lost Creek this year. Well installation and construction of Header House 2-4 (HH2-4) in Mine Unit 2 (MU2) was initiated in 2021 Q4 with the objective of expediting ramp up when market conditions warrant. Good progress is being made and the header house is expected to be production-ready in 2022 Q2. Additionally, and in conjunction with HH2-4 work, a

delineation drill program is planned to assist with subsequent wellfield design within MU2. This program includes approximately 120 planned holes.

Initial Assessment of Shirley Basin ISR Uranium Project, Carbon County, Wyoming, USA

We filed an Initial Assessment Technical Report Summary on Shirley Basin ISR Uranium Project, Carbon County Wyoming, USA (the "Shirley Basin Report," March 7, 2022), which was prepared by WWC. The report reaffirms the mineral resources as well as the economic analysis on the Shirley Basin Project from a prior NI 43-101 Preliminary Economic Assessment.

Based upon data from the historical and confirmation drilling at the site, the Shirley Basin Report confirms the project's mineral resource estimate of 8.8 million pounds eU_3O_8 in the Measured and Indicated categories, of which approximately 6.4 million pounds are expected to be recovered. Due to the very high level of density in drilling at the project, all resources within the three proposed mine units are classified as Measured or Indicated. There are no resources in the Inferred category.

The mineral resources estimated at the project are as follows:

Shirley Basin ISR Uranium Project Resource Summary (December 31, 2021)

RESOURCE AREA	MEASURED			INDICATED		
	AVG GRADE % eU_3O_8	SHORT TONS (X 1000)	POUNDS U_3O_8 (X 1000)	AVG GRADE % eU_3O_8	SHORT TONS (X 1000)	POUNDS U_3O_8 (X 1000)
FAB TREND	0.280	1,172	6,574	0.119	456	1,081

AREA 5	0.243	195	947	0.115	93	214
TOTAL	**0.275**	**1,367**	**7,521**	**0.118**	**549**	**1,295**
MEASURED & INDICATED				**0.230**	**1,915**	**8,816**

Notes:

1. Sum of Measured and Indicated tons and pounds may not add to the reported total due to rounding.
2. Based on grade cutoff of 0.020 % eU_3O_8 and a grade x thickness (GT) cutoff of 0.25 GT.
3. Measured and Indicated mineral resources as defined in S-K 1300.
4. All reported resources occur below the historical, pre-mining static water table.
5. Average grades are calculated as weighted averages.
6. The point of reference for mineral resources is in-situ at the Project.
7. Mineral resources that are not mineral reserves do not have demonstrated economic viability.

Total LoM production (without additional exploration) is modeled to be 6.4 million pounds from years 1 to 9 with LoM operating costs estimated to be $15.86 per pound. All in, the estimated total costs per pound, including royalties, and extraction and income taxes, is estimated at $33.04 per pound.

Using the estimated capital expenditures (CAPEX), operating expenditures (OPEX) and closure costs presented in the Shirley Basin Report, and projected variable long-term price ranging from $61.68 to $66.04 per pound, a cash flow statement was generated in which the project is estimated to generate LoM net cash flow of $192.8 million before income taxes. After tax calculations are not included as Ur-Energy USA Inc. does not anticipate paying federal income taxes on this project until the existing, and any future, tax loss carry forwards are utilized.

Payback is estimated during the fourth quarter of Year 2. The project has a calculated before tax IRR of 105.6% and NPV of $129.7 million applying an eight percent discount rate. The results are based on a nominal production rate of one million pounds U_3O_8 per year with construction and drilling occurring in Year -1, and production starting in Year 1 and ending in Year 9.

Shirley Basin Project Update

All major permits for the Shirley Basin Project, including the BLM Plan of Operations, Land Quality Division Permit to Mine and associated aquifer exemption, and Uranium Recovery Program License have been received. Additional minor projects are ongoing to ensure the project is construction ready.

NOTE: We are required by applicable Canadian Securities Administrators to file in Canada a National Instrument 43-101 (“NI 43-101”) compliant report at the same time we file an S-K 1300 technical report summary. The NI 43-101 reports can be found on SEDAR at www.sedar.com. The NI 43-101 and S-K 1300 reports (for each of the Lost Creek Property and Shirley Basin Project) are substantively identical to one another except for internal references to the regulations under which the report is made, and certain organizational differences.

Qualified Persons at WWC have reviewed and approved the technical disclosure contained in this news release.

The Initial Assessment Technical Report Summaries for each of the Lost Creek Property and Shirley Basin may also be accessed on the Company’s website at www.ur-energy.com.

Cautionary statement: The Technical Report Summaries reported are preliminary in nature and, in the case of the Lost Creek

Report, includes inferred mineral resources that are considered too speculative geologically to have the economic considerations applied to them that would enable them to be categorized as mineral reserves. Mineral resources that are not mineral reserves do not have demonstrated economic viability. The estimated mineral recovery used in these reports is based on recovery data from wellfield operations to date at Lost Creek in the case of the Lost Creek Report, and Company personnel and industry experience at similar facilities in the case of the Shirley Basin Report. There can be no assurance that recovery at this level will be achieved.

FOR FURTHER INFORMATION, PLEASE CONTACT

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About Ur-Energy

Ur-Energy is a uranium mining company operating the Lost Creek *in-situ* recovery uranium facility in south-central Wyoming. We have produced, packaged, and shipped approximately 2.6 million pounds U_3O_8 from Lost Creek since the commencement of operations. Ur-Energy now has all major permits and authorizations to begin construction at Shirley Basin, the Company's second *in situ* recovery uranium facility in Wyoming and is in the process of obtaining remaining amendments to Lost Creek authorizations for expansion of Lost Creek. Ur-Energy is engaged in uranium mining, recovery and processing activities, including the acquisition, exploration, development, and operation of uranium mineral properties in the United States. The primary trading market for Ur-Energy's common shares is on the NYSE American under the symbol "URG." Ur-Energy's common shares also trade on the Toronto Stock Exchange under the symbol

“URE.” Ur-Energy’s corporate office is located in Littleton, Colorado and its registered office is located in Ottawa, Ontario.

Cautionary Note Regarding Forward-Looking Information

This release may contain “forward-looking statements” within the meaning of applicable securities laws regarding events or conditions that may occur in the future (*e.g.,* the technical and economic viability, including mineral resource estimates, life of mine, costs and production results for Lost Creek, including as set forth in the TRS Initial Assessment for the project; the technical and economic viability, including mineral resource estimates, life of mine, costs and production results for Shirley Basin, including as set forth in the TRS Initial Assessment for the project; our ability to control production operations at lower levels at Lost Creek in a safe and compliant manner; the timing to determine future development and construction priorities for Lost Creek and Shirley Basin, including the progression and completion of the recently-commenced development and delineation programs at Lost Creek; the ability to readily ramp up and transition in a timely and cost-effective manner to full production operations when conditions warrant) and are based on current expectations that, while considered reasonable by management at this time, inherently involve a number of significant business, economic, technical and competitive risks, uncertainties and contingencies. Generally, forward-looking statements can be identified by the use of forward-looking terminology such as “plans,” “expects,” “does not expect,” “is expected,” “is likely,” “estimates,” “intends,” “anticipates,” “does not anticipate,” or “believes,” or variations of the foregoing, or statements that certain actions, events or results “may,” “could,” “might” or “will be taken,” “occur,” “be achieved” or “have the potential to.” All statements, other than statements

of historical fact, are considered to be forward-looking statements. Forward-looking statements involve known and unknown risks, uncertainties and other factors which may cause the actual results, performance or achievements of the Company to be materially different from any future results, performance or achievements express or implied by the forward-looking statements. Factors that could cause actual results to differ materially from any forward-looking statements include, but are not limited to, capital and other costs varying significantly from estimates; fluctuations in commodity prices; failure to establish estimated resources; the grade and recovery of mineral resources which are mined varying from estimates; production rates, methods and amounts varying from estimates; delays in obtaining or failures to obtain required governmental, environmental or other project approvals; changes in regulatory and legislative requirements; inflation; changes in exchange rates; delays in development and other factors described in the public filings made by the Company at www.sedar.com and www.sec.gov. Readers should not place undue reliance on forward-looking statements. The forward-looking statements contained herein are based on the beliefs, expectations and opinions of management as of the date hereof and Ur-Energy disclaims any intent or obligation to update them or revise them to reflect any change in circumstances or in management's beliefs, expectations or opinions that occur in the future.

SOURCE: Ur-Energy