



Solitario Announces Golden Crest Draft Environmental Assessment Released by United States Forest Service

DENVER, CO – May 11, 2023 - Solitario Zinc Corp. (“Solitario”) (NYSE American: XPL; TSX: SLR) is pleased to report that the Black Hills National Forest (“BHNF”), Northern Hills Ranger District (U.S. Forest Service) has released the draft Environmental Assessment (“EA”) for exploration drilling on Solitario’s Golden Crest exploration drilling project.

In the BHNF announcement of the EA, the proposed project is described as follows: *“This project includes up to 25 core drilling sites for gold mineralization, access road maintenance (as needed), and reclamation activities. One staging area would be used to store equipment and supplies. Drill sites are primarily located in previously disturbed sites along existing roads and trails. No new road or trail construction is proposed. No mining, milling, or processing is proposed as part of the project.”*

The 30-day comment period will end on June 8, 2023. The draft EA is available upon request and on-line at: <http://www.fs.usda.gov/project/?project=62590>.

Chris Herald, President and CEO of Solitario, stated: *“We are pleased that the U.S. Forest Service has completed the EA and that the document is quite exhaustive in its analysis of our proposed drilling program. This is an important milestone in securing drilling permits to test this exciting new gold project. Solitario is committed to a “best practices” policy for all of its exploration activities on Forest Service lands. For example, all proposed drill hole locations are located on existing logging roads or other logging related surface disturbances. In this way drill hole sites eliminate new surface disturbance on public lands.”*

Project Overview

Solitario’s 100%-owned South Dakota properties collectively total over 33,000 acres and constitute strategic land holdings along the western and southwestern extensions of the Homestake-Wharf mining district that has produced approximately 52 million ounces of gold and contains another 30 million ounces in historical resources. The project area is in a politically safe jurisdiction with highly developed infrastructure, an unbroken 145-year record of continuous gold mining, a skilled mining workforce, and a history of high-grade, underground mineable gold deposits.

About Solitario

Solitario is a natural resource exploration company focused on high-quality Tier-1 gold and zinc projects. The Company is traded on the NYSE American (“XPL”) and on the Toronto Stock Exchange (“SLR”). In addition to its South Dakota property holdings, Solitario holds a 50% joint venture interest (Teck Resources 50%) in the high-grade Lik zinc deposit in Alaska and a 39%

joint venture interest (Nexa Resources holds the remaining 61% interest) on the high-grade Florida Canyon zinc project in Peru. Solitario is carried to production through its joint venture arrangement with Nexa. Solitario's Management and Directors hold approximately 9.2% (excluding options) of the Company's 65 million shares outstanding. Solitario's cash balance and marketable securities stand at approximately US\$4.8 million. Additional information about Solitario is available online at www.solitariozinc.com.

Solitario has a long history of committed Environmental, Social and Responsible Governance ("ESG") of its business. We realize ESG issues are also important to investors, employees, and all stakeholders, including communities in which we work. We are pledged to operate our business in a manner that supports environmental and social initiatives and responsible corporate governance. Importantly, we select joint venture partners that not only value the importance of ESG issues in the conduct of their business on our joint venture projects but are leaders in the industry in this important segment of our business.

For More Information Please Contact:

Christopher E. Herald
President & CEO
(303) 534-1030, Ext. 14

Cautionary Statement Regarding Forward Looking Information

This press release contains forward-looking statements within the meaning of the U.S. Securities Act of 1933 and the U.S. Securities Exchange Act of 1934, and as defined in the United States Private Securities Litigation Reform Act of 1995 (and the equivalent under Canadian securities laws), that are intended to be covered by the safe harbor created by such sections. Forward-looking statements are statements that are not historical facts. They are based on the beliefs, estimates and opinions of the Company's management on the date the statements are made and address activities, events or developments that Solitario expects or anticipates will or may occur in the future, and are based on current expectations and assumptions. Forward-looking statements involve numerous risks and uncertainties. Consequently, there can be no assurances that such statements will prove to be accurate and actual results and future events could differ materially from those anticipated in such statements. Solitario's Golden Crest land position does not cover any of the areas of historical gold production or historical unmined resources. Certain historical information concerning exploration and gold production in the Black Hills region has been obtained through both public and private sources and are believed to be substantially factual, but Solitario can give no assurances of the accuracy of such information. The existence of historic mines and resources adjacent to Solitario's land position do not necessarily support the existence economic mineral deposits on Solitario's land position. Such forward-looking statements include, without limitation, statements regarding the Company's expectation of the projected timing and outcome of engineering studies; expectations regarding the receipt of all necessary permits and approvals to implement a mining plan, if any, at any of its mineral properties. Important factors that could cause actual results to differ materially from those in the forward-looking statements include, among others, risks relating to risks that Solitario's and its joint venture partners' exploration and property advancement efforts will not be successful; risks relating to fluctuations in the price of zinc, gold, lead and silver; the inherently hazardous nature of mining-related activities; uncertainties concerning reserve and resource estimates; availability of outside contractors, and other activities; uncertainties relating to obtaining approvals and permits from governmental regulatory authorities; the possibility that environmental laws and regulations will change over time and become even more restrictive; and availability and timing of capital for financing the Company's exploration and development activities, including uncertainty of being able to raise capital on favorable terms or at all; risks relating to the impacts of Covid-19 or similar variants; as well as those factors discussed in Solitario's filings with the U.S. Securities and Exchange Commission (the "SEC") including Solitario's latest Annual Report on Form 10-K and its other SEC filings (and

Canadian filings) including, without limitation, its latest Quarterly Report on Form 10-Q. The Company does not intend to publicly update any forward-looking statements, whether as a result of new information, future events, or otherwise, except as may be required under applicable securities laws.