



RIO2 COMPLETES FEASIBILITY STUDY FOR THE FENIX GOLD PROJECT

For Immediate Release

September 5, 2023

Vancouver, BC - Rio2 Limited ("**Rio2**" or the "**Company**") (TSXV: RIO; OTCQX: RIOFF; BVL: RIO) today announces the Feasibility Study ("**FS**") for its 100% owned Fenix Gold Project ("**Fenix Gold**" or the "**Project**") located in the Maricunga Mineral Belt of the Atacama Region, Chile. The FS, authored by international mining consultants Mining Plus, includes updated Mineral Resource and Mineral Reserve estimates (see Appendix), a run of mine heap leach (ROM) operational plan, and updated capital and operating cost estimates.

The deposit is interpreted as an intrusion related, low sulfidation, quartz-sulphide mineralization of deep epithermal type, lately remobilized by supergene processes facilitated by the permeable fine-grained matrix of the phreatomagmatic breccias. Gold mineralization is hosted mainly by the tuffs, breccias, and the dacitic subvolcanic intrusions from the Phreatomagmatic Unit and, in less extent, by andesites and dacitic domes of the same unit. The high-grade gold is commonly associated with low-temperature black banded quartz veins (BBV) which occur in sheeted veins, stockworks, in subangular fragments in phreatomagmatic breccias, and in hydrothermal injections of silica-magnetite. Extensive metallurgical test work supported by geo-metallurgical studies have shown that the oxide mineralization is amenable to cyanidation via ROM heap leaching.

All amounts in this news release are in US dollars unless otherwise indicated.

FS HIGHLIGHTS

- 1.77 million gold ounces ("oz") of Proven and probable Mineral Reserves grading 0.48 grams per tonne ("g/t") constrained within a \$1,650/oz Au gold price pit shell.
 - High-grade to leach pad – 81.2 million tonnes grading 0.55 g/t Au
 - Low-grade to stockpile – 33.5 million tonnes grading 0.31 g/t Au
- \$353.2 million after-tax life of mine ("LOM") cumulative cash flow (unlevered)
- \$1,237 / oz Au average LOM all-in sustaining costs ("AISC") – as defined by World Gold Council guidelines
- Life of Mine (LOM) strip ratio – 0.85:1
- Average gold recovery from ROM heap leaching – 75%
- 1.32 million oz Au LOM gold production (17 years)
- 91,000 oz average annual gold production during initial 12 years
- 54,000 oz average annual gold production during final 5 years (4 years 2 months)
- \$210.3 million after-tax net present value discounted at 5% ("**NPV5**")
- 28.5% after-tax internal rate of return ("IRR")

- After-tax payback after start of production - 2.8 years.
- A previously announced gold stream with Wheaton Precious Metals International Ltd. is included in the FS financial estimation.
- Initial capital costs of \$117 million with LOM sustaining capital costs of \$88 million, which includes adequate contingency at feasibility level.
- Construction timeline of approximately 14 months from receipt of relevant permits and contractor mobilization

Initial capex estimates exclude pre-construction activities completed to date which include construction of a 565-person camp, water loading infrastructure in Copiapó, the purchase of long-lead items such as electrical switchgear, electrical transformers, pumps, prefabricated components of the adsorption/desorption process plant, and preliminary earthworks. This pre-construction capex totaled approximately \$29 million.

Robust project economics have been confirmed reflecting a low capital intensity, long life conventional open pit mining and ROM heap leach operation, with moderate operating costs and high rate of return as noted in the FS highlights.

Project after-tax net present value (“NPV5”) (5% discount rate) is \$210.3 million with an after-tax internal rate of return (“IRR”) of 28.5% at a gold price of \$1,750 per ounce, and \$304.2 million and 37.2% at a gold price of \$1,900 per ounce.

A strategic development plan has focused on the shortest possible timeline to production along with an optimally configured mine plan, yielding a lower initial capex and higher grades being mined in the initial production years at a low stripping ratio. Ore mining is scheduled at a rate of 20,000 tonnes per day (“tpd”) with water for the Project being trucked from Copiapó (158 km). To maximize cash-flow, high-grade ore will be placed on the leach pad during the initial 12 years of production and low-grade ore will be stockpiled for leaching in the subsequent 5 years of production giving a total mine life of 17 years. Average annual gold production during the first 12 years is estimated to be 91,000 oz and 54,000 oz in years 13 – 17, the final years the stockpiled ore is processed.

Estimated Mineral Resources for Fenix Gold (including Mineral Reserves) which remain open at depth and along strike, are 4.76 million oz of gold in the measured and indicated category and 0.96 million oz of gold in the inferred category constrained within a \$1,800/oz gold price pit shell. This large, mineralized resource coupled with the potential for Mineral Resources growth through further drilling, provides an excellent opportunity to increase annual production and extend the mine life of the Fenix Gold Mine.

Rio2 is planning a two-stage development strategy for the Fenix Gold Mine, with this FS representing the first stage of production. Conceptually, the second stage will incorporate the expansion of ore mining from 20,000 tonnes per day to 80,000 – 100,000 tonnes per day with industrial water and/or desalinated water being transported to the site via a pipeline and project power being sourced from the nearby grid with estimated annual gold production rising to more than 250,000 oz. A study into the expansion of the mine will be launched during the construction of the first stage described in the

FS to determine the most optimal water sourcing option, the related opex and capex, and the timing of the proposed mine expansion.

EIA (ENVIRONMENTAL IMPACT ASSESSMENT) APPROVAL PROCESS

On June 22, 2022, the Technical Committee, made up of the SEA (Environmental Evaluation Service), two OAECAS (State Administration Agencies with Environmental Competences), CONADI and CONAF (The National Corporation for Indigenous Development and National Forest Corporation, respectively), and the SEREMI (Regional Representative of the relevant Ministry) of the Environment, met and issued the Consolidated Evaluation Report (ICE-Informe Consolidado de Evaluación) recommending a rejection of the Project's EIA. It should be noted that prior to the Technical Committee decision, 16 OAECAS had declared in writing their agreement with the contents of the Fenix Gold EIA.

On July 5, 2022, the Atacama Regional Evaluation Commission voted not to approve the Environmental Impact Assessment ("EIA") of the Fenix Gold Project indicating that while the Project complied with all the guides and environmental regulations, there was insufficient information supplied to rule out negative impacts to three species: Guanacos, Vicuñas, and Chinchillas.

On August 31, 2022, Fenix Gold decided to exercise its right to file an administrative appeal before the Committee of Ministers, as the EIA study was completed in accordance with the Chilean Environmental Assessment Service (SEA) Guidelines. The Committee of Ministers is comprised of the Ministers of Environment (Chairman), Health, Economy, Agriculture, and Energy and Mining. The national director of the SEA is the secretary of the Committee. The Committee of Ministers is currently evaluating the Project with a decision expected in 2023. To date, the company has not received confirmation from the Chilean authorities as to when the appeal will be heard.

NEXT STEPS AND TIMELINES

The Company will be progressing the following short-term activities in the lead-up to the commencement of construction at the Fenix Gold Project which is targeted for late 2023 pending a positive outcome in the committee of ministers expected in 2023:

- Conclusion of the financing package for the construction of the Project;
- Mobilization of key contractors like STRACON (civils and mining) & HLC (process plant);
- Conclusion of the regional permitting required for construction; and
- Restart construction plan.

In respect to the proposed stage two expansion of the mine, the company will:

- Continue to investigate the best water and power options for the project and select the most optimal solutions for the future of the Project; and
- Initiate a study for the Fenix Gold stage two expansion based on the water solution identified.



Management's principal focus will be achieving the Project's construction timeline and budget objectives to produce doré as set out in the 14-month project execution plan detailed in the FS.

Alex Black, Executive Chairman of Rio2, stated, "As everyone can imagine, the past twelve months have been particularly frustrating for the Company's management team as it has wound down pre-construction activities in Chile and directed its efforts to deal with the administrative appeal to overturn the Chilean authority's disapproval of the Fenix Gold EIA. The team has done a great job managing financial resources during this extremely difficult time whilst conducting many productive meetings with various ministries. We are hopeful that our collective efforts with our advisors and legal counsel will result in a positive outcome at the appeal hearing in the near term."

Andrew Cox, President & CEO of Rio2 also stated, "I am very proud of the way our management team has handled the challenge of dealing with the administrative appeal over the past twelve months and feel confident that the Company has covered all bases with its advisors and legal counsel to achieve a positive outcome. With the completion of the stage one feasibility study, we are now ready to finalize the financing package to fund the capex required and our technical team is ready to advance permitting and construction of the mine subject to the receipt of approval of the Fenix Gold EIA. Once the Fenix Gold Project achieves commercial production it will be the only gold oxide heap leach gold mine in operation in Chile and represents a significant investment in the gold mining business in Chile by a junior mining company of approximately \$205 million of initial and sustaining capital and will generate employment for at least 1,200 people during the construction phase and 550 people during its initial 12 years of operations."

RIO2 2022 ESG REPORT

Rio2 also announces the publication of its 2022 ESG Report. This report represents a comprehensive review of the Company's Environmental, Social, and Governance factors related to Rio2's development activities at its Fenix Gold Project in Chile for the year 2022.

Rio2 is committed to the principles of responsible mining and best practices in corporate governance.

The complete report is available at: https://onyen.com/published/RIO_2022_Annual_677.html

TECHNICAL INFORMATION

The scientific and technical content of this news release has been reviewed, approved, and verified by Ian Dreyer, B.App.Sc. MAIG, a consultant to Rio2 Limited, who is a QP under NI 43-101.

The Feasibility Study (FS) Report has been completed in accordance with NI 43-101, Canadian Institute of Mining, Metallurgy and Petroleum (CIM) standards, and best practices.

The qualified persons involved in the preparation of the FS summarized in this press release, and the related technical report, have followed industry accepted practices for verifying that the data used in



the study is suitable for the purposes used. The independent Qualified Persons for the FS, Erick Ponce (FAusIMM), Manager Open Pit South America of Mining Plus; Andres Beluzan, Chartered Professional, Mining Engineering and a registered member in good standing of the Chilean Mining Commission, REG# 215; Denys Parra, (Member SME) of ANDDES; and Anthony Maycock, (P.Eng.) of HLC, have prepared the scientific and technical information on the FS and reviewed the information that is summarized in this press release.

The NI 43-101 technical report, supporting the results of the FS included in this release, is in the process of being finalized and is expected to be filed under Rio2's profile on SEDAR+ within 45 days. For readers to fully understand the information in this news release they should read the FS technical report in its entirety when it is available on SEDAR+, including all qualifications, assumptions, exclusions, and risks that relate to the study. The technical report is intended to be read as a whole and sections should not be read or relied upon out of context.

ABOUT RIO2 LIMITED

Rio2 is a mining company with a focus on development and mining operations with a team that has proven technical skills as well as successful capital markets track record. Rio2 is focused on taking its Fenix Gold Project in Chile to production in the shortest possible timeframe based on a staged development strategy. Rio2 and its wholly owned subsidiary, Fenix Gold Limitada, are companies with the highest environmental standards and responsibility with the firm conviction that it is possible to develop mining projects that respect the three axes (Social, Environment, Economics) of sustainable development. As related companies, we reaffirm our commitment to apply environmental standards beyond those that are mandated by regulators, seeking to protect and preserve the environment of the territories that we operate in.

Forward-Looking Statements

This news release contains forward-looking statements and forward-looking information (collectively "forward-looking information") within the meaning of applicable securities laws relating to the FS including Rio2's plans, strategy, objectives, and other aspects of Rio2's anticipated future operations and financial, development and operating plans and results. In addition, without limited the generality of the foregoing, this news release contains forward-looking information pertaining to the following: the timing of the filing of the technical report relating to the FS, the financial results of the FS including the NPV and IRR, estimated mineral resources and reserves; timing of the commencement of construction at the Fenix Gold Project and associated construction timeline; estimated capital and operating costs, metal prices, mining and processing rates, metal production and resulting financial results for the Fenix Gold Project; the timing for the development of and production from the Fenix Gold Project; annual production and mine life; timing of environmental approval and permitting process and outcomes; ongoing engineering works and studies; the potential to secure water rights near to the Fenix Gold Project and the benefits of holding such rights; and other matters ancillary or incidental to the foregoing.



All statements included herein, other than statements of historical fact, may be forward-looking information and such information involves various risks and uncertainties. Forward-looking information is often, but not always, identified by the use of words such as “seek”, “anticipate”, “plan”, “continue”, “estimate”, “expect”, “may”, “will”, “project”, “predict”, “potential”, “targeting”, “intend”, “could”, “might”, “should”, “believe” and similar expressions. The forward-looking information is based on certain key expectations and assumptions made by Rio2’s management, including but not limited to: expectations concerning prevailing commodity prices, exchange rates, interest rates, applicable royalty rates and tax laws; capital efficiencies; legislative and regulatory environment of Chile; future production rates and estimates of capital and operating costs; estimates of reserves and resources; anticipated timing and results of capital expenditures; the sufficiency of capital expenditures in carrying out planned activities; results of operations; performance; the availability and cost of financing, labor and services; and Rio2’s ability to access capital on satisfactory terms.

Rio2 believes the expectations reflected in these forward-looking statements are reasonable, but no assurance can be given that these expectations will prove to be correct and such forward-looking statements in this news release should not be unduly relied upon. Assumptions used by Rio2 to develop forward-looking statements include the following assumptions, (i) the Fenix Gold Project will ultimately obtain all required environmental and other permits, (ii) Rio2’s estimates of mineral resources and mineral reserves will not change, (iii) Rio2 will be able to secure the financing required to develop the Fenix Project. A description of other assumptions used to develop such forward-looking information and a description of risk factors that may cause actual results to differ materially from forward-looking information can be found in Rio2’s disclosure documents on the SEDAR website at www.sedar.com. Forward-looking statements included in this news release are made as of the date of this news release and such information should not be relied upon as representing its views as of any date subsequent to the date of this news release. Rio2 has attempted to identify important factors that could cause actual results, performance or achievements to vary from those current expectations or estimates expressed or implied by the forward-looking information. However, there may be other factors that cause results, performance or achievements not to be as expected or estimated and that could cause actual results, performance or achievements to differ materially from current expectations. Rio2 disclaims any intention or obligation to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise, except as expressly required by applicable securities legislation.

To learn more about Rio2 Limited, please visit: www.rio2.com or Rio2's SEDAR+ profile at www.sedarplus.com.

ON BEHALF OF THE BOARD OF RIO2 LIMITED

Alex Black
Executive Chairman
Email: alex.black@rio2.com
Tel: +51 99279 4655



Kathryn Johnson
Executive Vice President, CFO & Corporate Secretary
Email: kathryn.johnson@rio2.com
Tel: +1 604 762 4720

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APPENDIX TO THE SEPTEMBER 5, 2023 NEWS RELEASE

Mineral Resource Estimate for the Fenix Gold Project – April 1, 2023

Mineral Resource Classification	Million metric tonnes	Au Grade (g/t)	Au Ounces (x1000)
Measured	123.3	0.42	1,671
Indicated	266	0.36	3,086
Total Measured + Indicated	389.2	0.38	4,757
Inferred	90.8	0.33	959

Notes:

1. Mineral Resources reported is inclusive of Mineral Reserves.
2. Metal price of \$1,800 per ounce gold was used to estimate Mineral Resources.
3. This table includes all Measured, Indicated, and Inferred Resources contained within the "Resource Pit", which represents the test for eventual extraction applied.
4. Mineral Resources were prepared by Independent Consultant Andres Beluzan Chartered Professional, Mining Engineering and a registered member in good standing of the Chilean Mining Commission, REG# 215.
5. Mineral Resources are not Mineral Reserves and do not have demonstrated economic viability. There is no certainty that all or any part of the Mineral Resources estimated will be converted into Mineral Reserves.
6. Mineral Resources are reported in accordance with Canadian Securities Administrators (CSA) National Instrument 43-101 (NI 43-101) and have been estimated in conformity with generally accepted Canadian Institute of Mining, Metallurgy and Petroleum (CIM) "Estimation of Mineral Resource and Mineral Reserves Best Practices" guidelines.
7. Mineral Resource tonnage and contained metal have been rounded to reflect the accuracy of the estimate, and numbers may not add due to rounding.
8. The quantity and grade of reported Inferred Resources in this estimation are uncertain in nature and there has been insufficient exploration to define these Inferred Resources as an Indicated or Measured Mineral Resource and it is uncertain if further exploration will result in upgrading them to an Indicated or Measured Mineral Resource category.

Mineral Reserve Estimate for the Fenix Gold Project – May 11, 2023

Mineral Reserve Classification	Million metric tonnes	Au Grade (g/t)	Au Ounces (x1000)
Proven	63.2	0.50	1,022
Probable	51.5	0.45	750
Total Ore (Proven+ Probable)	114.7	0.48	1,772

Notes:

1. Totals may not add up correctly due to rounding.
2. Metal price of \$1,650 per ounce gold was used to estimate Mineral Reserves.
3. Mineral reserves are estimated using a minimum cut-off grade of 0.235 g/t Au and assuming metallurgical recovery of 75% on average for the life of mine.
4. Mineral Reserves were prepared by Erick Ponce FAusIMM, Area Manager, Mining Plus.

5. *Mineral Reserves are reported in accordance with Canadian Securities Administrators (CSA) National Instrument 43-101 (NI 43-101) and have been estimated in conformity with generally accepted Canadian Institute of Mining, Metallurgy and Petroleum (CIM) "Estimation of Mineral Resource and Mineral Reserves Best Practices" guidelines.*