SILION ONE

Tuvatu Gold ProjectNavilawa Alkaline Gold SystemFiji IslandsMarch 2021



DISCLAIMER

The information provided in this presentation is not intended to be a comprehensive review of all matters and developments concerning the Company and should be read in conjunction with all other disclosure documents of the Company. The information contained herein is not a substitute for detailed investigation or analysis. No securities commission or regulatory authority has reviewed the accuracy or adequacy of the information presented.

FORWARD-LOOKING STATEMENTS

This presentation contains statements and information that constitute forward-looking information within the meaning of Canadian securities legislation, referred to herein as "forward-looking statements", include statements regarding proposed exploration and development activities and their timing, resource estimates, exploration potential and the PEA, including estimates of capital and sustaining costs, anticipated internal rates of return, mine production, estimated recoveries, mine life, estimated payback period and net present values, opportunities to enhance the value of the Tuvatu Gold Project and other plans and objectives of the Company. In making the forward-looking statements herein, the Company has applied several material assumptions, including that (1) required approvals, permits and financing will be obtained; (2) the proposed exploration and development of the Company's properties will proceed as planned and that actual results will be consistent management's expectations; (3) with respect to mineral resource estimates, the key assumptions and parameters on which such estimates are based; (4) market fundamentals will result in sustained metals and minerals prices; and (5) with respect to the PEA, the assumptions underlying the PEA, that the proposed mine plan and recoveries will be achieved, that capital costs and sustaining costs will be as estimated and that no unforeseen accident, fire, ground instability, flooding, labor disruption, equipment failure, metallurgical, environmental or other events that could delay or increase the cost of development will occur.

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TECHNICAL DISCLOSURE

The technical information in this presentation has been approved by Stephen Mann, P.Geo., Managing Director of the Company and a Qualified Person as defined by National Instrument "NI" 43-101 Standards of Disclosure for Mineral Projects.

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HIGHLIGHTS: HIGH GRADE GOLD ASSETS IN FIJI

Rare 7km-wide high grade alkaline gold complex with vast structural network mapped at >1.2km depth.

Extremely high grade depth extensions of current resource recently discovered in Tuvatu mining lease permit area.

Fully permitted for production through the granted Tuvatu Mining Lease.

Only alkaline deposit with comparable characteristics owned by a junior.

Lion One continues to develop production infrastructure, starting with the Assay Lab at Nadi HQ and on-site civil earthworks in 2019.

Debt free, with over \$62M working capital.

LEADERSHIP AND TECHNICAL TEAM HAVE A LONG HISTORY OF SUCCESS

Walter Berukoff Chief Executive Officer

Founder and CEO of notable gold mining startups:

- Northern Orion Resources acquired by Yamana Gold in 2007 for \$1.1B Miramar Mining acquired by Newmont Mining in 2008 for \$1.5B
- La Mancha Resources acquired by Weather Investments in 2012 for \$600M
- **Emperor Gold Mines** Fiji Gold Assets (Vatukoula & Tuvatu) purchased in 2008

Stephen Mann

Managing Director

Formerly BHP, Newcrest, Cogema/AREVA, La Mancha, Avocet Resources

Kevin Li Project Manager - Tuvatu

Formerly Fluor, SNC-Lavalin, Saskpower, Project Controls, Pretium Resources

Dr. Quinton Hennigh

Economic Geologist

Chairman of Novo Resources. Formerly Homestake, Newcrest, Newmont

INVESTMENT PROFILE: \$65M WORKING CAPITAL

ISSUED & OUTSTANDING CAPITAL

Shares:	155,654,393
Warrants:	11,340,337
Broker units:	1,303,010
<u>Options:</u>	7,997,500
Fully Diluted:	176,295,240
Share Price:	\$1.50
Market Cap:	\$232 million

Market Cap (FD): \$264 million \$62 million Nil

ANALYST COVERAGE

Eight Capital

Cash:

Debt:

David Talbot

SILION ONE



TOP INSTITUTIONAL SHAREHOLDERS

Donald Smith & Co. Franklin Precious Metals Fund **Regal Funds Management** Invesco Oppenheimer Gold & Special Minerals Fund





Greenfield exploration upside coupled with brownfield development opportunity

First company to consolidate the Navilawa Gold System

Tuvatu mining lease (SML62) located at center of 200 km² exploration license area

Significant unexplored land holding within bounds of exploration license likely to yield further large deposits

DUAL EXPL-DEV OPPORTUNITY NAVILAWA ALKALINE GOLD SYSTEM TUVATU HIGH GRADE GOLD PROJECT



OUR FOCUS IS ON HIGH GRADE DEPTH EXTENSION

over 30 geochemical anomalies in excess of 5 g/t Au along 7km strike



USING SCIENCE TO REALISE THE POTENTIAL OF THE NAVILAWA CALDERA

Potassium radiometrics reveals scale of fluid migration through system in Navilawa caldera, Radiometrics reveal gold-enriched mineralizing system over 7km in diameter.



BLEG Sampling of catchments highlights prospectivity of entire Navilawa Caldera



USING SCIENCE TO REALISE THE POTENTIAL OF THE NAVILAWA CALDERA

CSAMT/ DEEP DRILLING PROGRAM

2020 drilling program targets CSAMT gradients to confirm deep-rooted feeder pathways



Ongoing diamond drilling program has extended the known resource to 750m depth and remains open

Results include:

TUDDH493: 4.29m @ 33.2 g/t Au

TUDDH500: 2.0m @ 46 g/t Au 12.7m @ 55.4 g/t Au

TUDDH 500w1: 3.3m @ 85.7 g/t Au

TUDDH500w2: 6.5m @ 7.32 g/t Au 5.4m @ 5.32 g/t Au



HIGH GRADE DEPTH EXTENSIONS DEEP ROOTED FEEDER STRUCTURES



DISTRIBUTION OF ALKALINE SYSTEMS IN THE SOUTH PACIFIC

Associated with deep crustal alkaline magmas and expansive structural networks

Valued for high grades, large endowments, deep vertical profiles

Prized by major mining companies – rarely held by juniors

Notable alkaline systems throughout world include Cripple Creek, Macassa, Porgera and Lihir, Cadia, Cowal, Springpole



WORLD CLASS EXAMPLES OF ALKALINE GOLD SYSTEMS IN THE REGION HIGHLIGHTS POTENTIAL YIELD

Tier 1 mines in the South Pacific region with geologically similar alkaline complexes can exceed 40M oz, highlighting the potential yield of the Tuvatu project once fully explored.



Disc 1960's >90% explored Prod commenced 1990



Disc 1982– >80% explored Prod commenced 1997



Disc 1932 – >70% explored Prod commenced 1934



Disc 1990's– 5% explored Prod to commence

"...Tuvatu has similarities not only to Vatukoula and other large alkaline systems in the South Pacific, but also to several multi-million oz. alkaline gold systems in North America including Newmont's Cripple Creek...."

Quinton Hennigh, Technical Advisor to Lion One



ROSCOELITE: INDICATOR MINERAL DIAGNOSTIC FOR ALKALINE SYSTEMS

High-grade (~300 g/t) visible gold vein with Roscoelite

(Tuvatu, Fiji)

High-grade gold bearing vein with Roscoelite

(Porgera, PNG)

got roscoelite?

TUVATU: UPDATED ECONOMIC STUDY

High grade, low cost, fully permitted production opportunity



After-tax economics at US\$2000/oz gold price initial five year mine life

Cash flow: Production: Operating Cost: AISC: IRR NPV5%

\$309 million on US\$66.8 million CAPEX 331,369 oz Au at average of 8.6 g/t Au US\$543/oz US\$626/oz 85% US\$243 million

TUVATU MINING LEASE: ONGOING DEVELOPMENT

Evaluating Configuration for Pilot Plant and Starter Mine Operation; Bulk Earthworks Substantially Complete



While instructive as to the size and scale of project that the Tuvatu resource might support, the 2015 Tuvatu PEA is now outdated and cannot be relied upon. The PEA is preliminary in nature, 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, and there is no certainty that the preliminary economic assessment will be realized.

2019-2020 KEY MILESTONES



In 2019-20 Lion One raises funds to accelerate exploration and plans to aggressively pursue development progress to continue its vision of establishing itself as one of the world's significant gold producers.



KEY DEVELOPMENTS & ADAPTATIONS DURING COVID-19

Remain committed to accelerating exploration and development program to deliver maximum value to shareholders

Protected staff and community health through the implementation of Lion One's CovidSafe guidelines before first documented case of Covid-19 in Fiji, in line with international best practice

Continue to engage community leaders, educational institutions and government bodies to proactively empower the community and uphold common values.

Refocus and reaffirm investor support through progress updates and investor presentations via virtual conferences

Maintained company personnel growth (30% gain) and employee health (zero employee Covid-19 cases) throughout Covid-19 with pre-emptive operational assessments and health policies.

Furthered our pledge to environmental health by banning the use of high-sulphur diesel for all activities and reducing projected diesel consumption by 50% through the planned construction of solar arrays

As we continue to fight Covid-19 across the world, Lion One remains committed to ensuring the health and safety of our workforce whilst our Tuvatu project moves towards production. Stephen Mann, Managing Director

REFINING OUR VISION POST-COVID: KEY OUTCOMES FROM 2021 AND BEYOND



Acceleration of exploration schedule through Tuvatu and the Navilawa Caldera through deep diamond drilling, geophysical and geochemical analyses and spatial mapping. Target of 20,000m of core drilling pa. Further activities as needed to support >10M oz gold deposit hypothesis.

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