Full Year Operational Update

23 August 2023

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Highlights for the year ended 30 June 2023

- The Company made significant progress in the execution of its technology commercialisation projects during the year, with a key focus on activities to accelerate the commercialisation of the SILEX laser-based uranium enrichment technology;
- Global Laser Enrichment LLC (GLE) - the jointly-controlled venture between Silex and Cameco Corporation, with 51% and 49% ownership interest respectively, is uniquely positioned to address the 'Triple Opportunity' that has emerged in the global nuclear fuel supply chain, being driven by global climate change and geopolitical issues:
    1) Production of natural grade uranium in the form of converted UF_6;
    2) Production of low enriched uranium (LEU) for existing and future nuclear power plants; and
    3) Production of high assay LEU (HALEU) fuel for next-generation advanced reactors, including SMRs[1];
- In February 2023, GLE's owners agreed to a plan and budget for CY2023 that accelerates activities in the commercial-scale pilot demonstration project for the SILEX uranium enrichment technology to leverage this Triple Opportunity;
- Acceleration of GLE's commercialisation activities preserves the option of commencing commercial operations at the planned Paducah Laser Enrichment Facility (PLEF) as early as 2028 (up to three years earlier than originally planned);
- GLE's commercialisation strategy is underpinned by the planned tails enrichment project (the first of the Triple Opportunity), which has the potential to become a 'Tier 1' uranium resource producing up to 5 million pounds U_3O_8 equivalent per year for approximately 30 years and which would rank in the top 10 of current uranium mines by production volume, potentially the largest source of uranium within the US;
- Silex and GLE continue to accelerate construction of full-scale laser and separator equipment being deployed in GLE's Test Loop facility in Wilmington, NC, with the aim of completing a commercial-scale pilot demonstration (TRL-6) of the SILEX technology as early as mid-2024;
- GLE signed a non-binding Letter of Intent (LOI) with US nuclear utility Dominion Energy in April 2023, following two similar LOIs signed with Constellation Energy Generation and Duke Energy in 2022;
- In July 2023, GLE also executed a lease for a new facility in Wilmington that provides significant new space for the planned growth of the GLE team, the construction of in-house manufacturing capability to support GLE's engineering operations and an increase in commercial activities;
- In addition to the establishment of the US Department of Energy's HALEU Availability Program in August 2022, various additional nuclear fuel funding initiatives are currently before the US Congress, a number of which may have relevance for GLE. GLE will explore opportunities to participate in these programs as they unfold;

[1] Advanced Small Modular Reactors (SMRs) produce up to 300MWe power

- In April 2023, the Company announced the completion of the Zero-Spin Silicon (ZS-Si) Project. The Project achieved all key target enrichment objectives during extensive testing with the pilot demonstration facility. The facility confirmed the production of ZS-Si in the form of enriched silicon-28 at the highest purity of ~99.998% and identified a path to production scalability;
- On 17 August 2023, Silex announced, in collaboration with Silicon Quantum Computing (SQC) and UNSW Sydney (UNSW), the award of $5.1m in funding from the Federal Government's Defence Trailblazer Program for the design and construction of the first full-scale Quantum Silicon commercial production module. This also includes facilities for the conversion of the SILEX process output (ZS-Si) into two different product forms required by potential customers: gaseous Quantum Silane and solid Quantum Silicon;
- In February 2023, the Company announced the MIST opportunity and the commencement of the MIST Project, initially focused on identifying a process to economically produce enriched Ytterbium (Yb-176), which is the precursor isotope required for Lutetium (Lu-177), a breakthrough development for the diagnosis and treatment of aggressive metastatic cancers;
- The Company held cash and cash equivalents at 30 June 2023 of ~$138.1m, with no corporate debt.

Our Strategy

We are committed to the commercialisation of our innovative SILEX laser enrichment technology across multiple markets, with a priority focus on contributing to the reliable and sustainable supply of nuclear fuel for the world's clean energy needs and quantum materials for next generation quantum computing technology.

The execution of our strategy is being pursued through the following activities:

- Pursuit of the 'Triple Opportunity' that has emerged in the global nuclear fuel supply chain for the SILEX uranium enrichment technology through our ownership of a 51% interest in exclusive uranium technology licensee, GLE;
- Developing the SILEX technology for the production of Quantum Silicon products based on Zero-Spin Silicon (ZS-Si) – a key enabling material required for silicon quantum computer chip fabrication; and
- Further diversifying the business case for the SILEX technology through potential production of medical isotopes, initially focusing on enrichment of Ytterbium-176 - a key enabling material for a breakthrough nuclear medicine cancer treatment.

SILEX Uranium Enrichment Technology

The SILEX technology is the only third-generation laser-based uranium enrichment technology known to be under commercial development today. Subject to the successful completion of the commercialisation project, market conditions and other factors, the SILEX technology could become a major contributor to nuclear fuel production for the world's current and future nuclear reactor fleet, through the production of uranium in several different forms, including:

- **natural grade uranium (U_{nat}) as UF_6**
- **low enriched uranium (LEU) and LEU+**
- **high assay LEU (HALEU)**

Uranium production and enrichment are the two largest value drivers of the nuclear fuel supply chain, accounting for nearly 80% of the value of a reactor fuel bundle. Importantly, commercialisation of the SILEX uranium enrichment technology through licensee GLE could enable the SILEX technology to become a unique nuclear fuel production platform for existing and emerging nuclear power generation systems.

The 'Triple Opportunity' for GLE and SILEX Technology

Two key factors are driving potential transformation of the global nuclear fuel supply chain, presenting GLE with a 'Triple Opportunity' to produce three different grades of nuclear fuel – all via the deployment of SILEX laser-based uranium enrichment technology at the proposed PLEF Production Plant:

i) the growing shift towards utilisation of nuclear power by many countries around the world in response to heightened concerns over global climate change;

ii) the impact of the Russian invasion of Ukraine, which threatens to disrupt the significant supply of Russian nuclear fuel to the US and other Western markets.

The Triple Opportunity could involve:

1) **PLEF UF_6 Production:** Production of natural grade UF_6 (with U-235 assay of 0.7%) via processing of depleted tails (U-235 assays of 0.25% to 0.5%) with the SILEX technology (the original PLEF project), which would come in the form of already converted uranium, thereby also helping to alleviate UF_6 conversion supply pressure;

2) **PLEF LEU Production:** Production of LEU (U-235 assays up to 5%) and LEU+ (assays from 5% to 10%) from natural grade UF_6 with additional SILEX enrichment capacity – to supply fuel for existing reactors;

3) **PLEF HALEU Production:** Production of HALEU (U-235 assays up to ~20%) via enrichment with the SILEX technology to supply fuel for next generation advanced reactors, including SMRs.

Western nuclear fuel markets have been highly dependent on Russian nuclear fuel supply, as summarised in the table below. This has created urgency in establishing alternative supply sources to replace Russian-sourced fuel in the medium to long term.

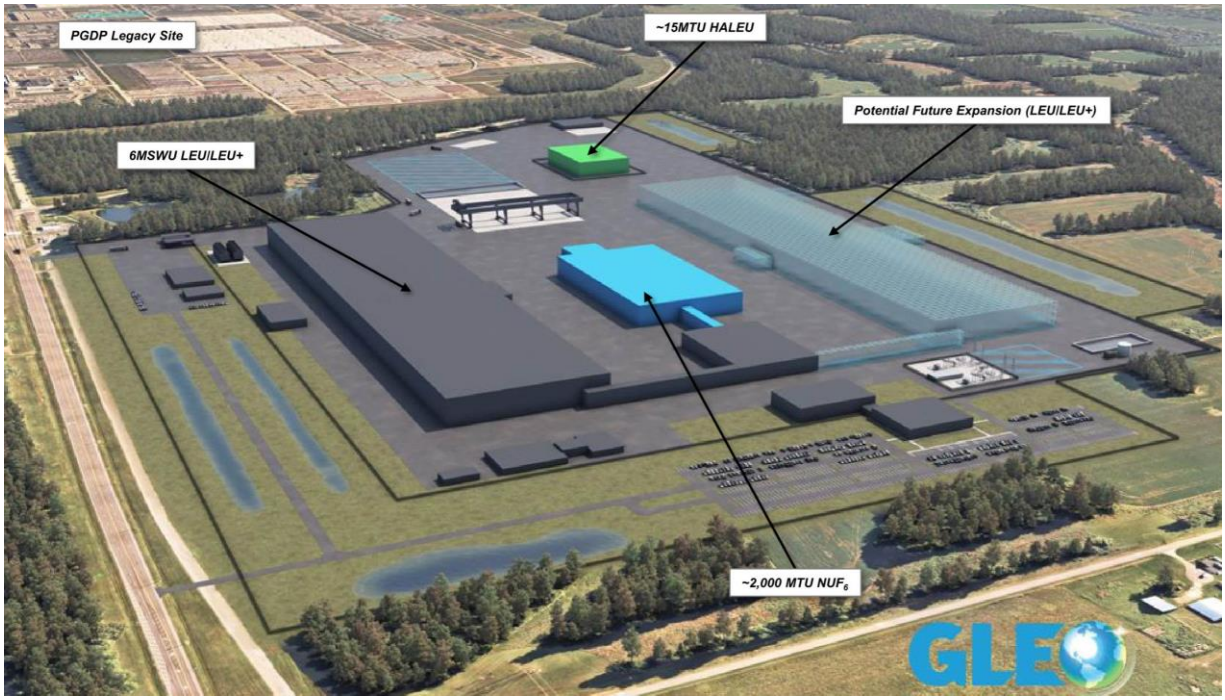
The Influence of Russian Nuclear Fuel Supply:

	Russian Share of Global Production Capacity[1]	EU Nuclear Fuel Supplied by Russia[2]	US Nuclear Fuel Supplied by Russia[1,3]
Uranium (U_3O_8)	~14%	~20%	~14%
Conversion	~27%	~25%	~18%
Enrichment (SWU)	~45%	~31%	~24%

1. WNA and UxC various sources 2023
2. Euratom Supply Agency Annual Report 2021
3. EIA, 2022 Uranium Marketing Annual Report, June 2023

*GLE could be well positioned to help address the nuclear fuel supply chain issues that have emerged, with the unique potential to produce all three grades of nuclear fuel required for current and future nuclear power plants – described as the '**Triple Opportunity**'.*

PLEF Multi-purpose Production Plant (conceptual)



Source: GLE, Multi-purpose PLEF (conceptual)

The PLEF project opportunities are underpinned by the 2016 agreement between GLE and the DOE, which, through the acquisition of over 200,000 metric tonnes of depleted tails owned by the DOE, provides the feedstock for the production of natural grade uranium hexafluoride (UF_6) over three decades. The output of the proposed plant would be sold into the global uranium market at an expected production rate equivalent to a uranium mine with an annual output of up to 5 million pounds of uranium oxide, which would rank in the top 10 of today's uranium mines by production volume. Preliminary analysis by Silex of PLEF UF_6 Production indicates it could rank equal to a 'Tier 1' uranium project based on current estimates of longevity and low cost of production.

With Russia currently holding around 45% of the world's uranium enrichment capacity, there is an urgent need for the Western nuclear industry to minimise or eliminate reliance on the sourcing of enriched nuclear fuel from Russia. This opens up the second opportunity for the PLEF facility – for the production of LEU fuel for the existing nuclear power reactor fleet.

Potential production of HALEU at the PLEF has emerged as a third opportunity as Western nuclear fuel supply chains prepare for the exclusion of Russian-sourced HALEU. HALEU will be required to fuel many advanced reactor designs, including a number of SMRs.

*Preliminary analysis by Silex of the PLEF UF_6 Production Project indicates that, if current commercialisation project market metrics hold firm, it could attain a rank equivalent to a '**Tier 1' uranium resource** based on estimates of longevity and low cost of production.*

Commercialisation Timeline[1]:

The accelerated timeline currently anticipates completion of the pilot demonstration program as early as mid-2024, which preserves the option of commencing commercial operations as early as 2028, depending on market factors and the level of support available from various government and industry initiatives. This could also involve bringing forward a commercial feasibility assessment and NRC licensing activities for the proposed PLEF project. The diagram below shows the original baseline and accelerated timelines for commercialisation activities:

1. Timelines subject to technology demonstration outcomes, market conditions, licensing, commercial support and other factors
2. Includes achievement of Technology Readiness Level 6 (TRL-6) as defined by DOE Technology Readiness Assessment Guide (G 413.3-4A)
3. PLEF: Paducah Laser Enrichment Facility
4. Engineering, Procurement and Construction (EPC) of commercial plant
5. Potential acceleration remains subject to due diligence assessment and may vary according to differing scenarios

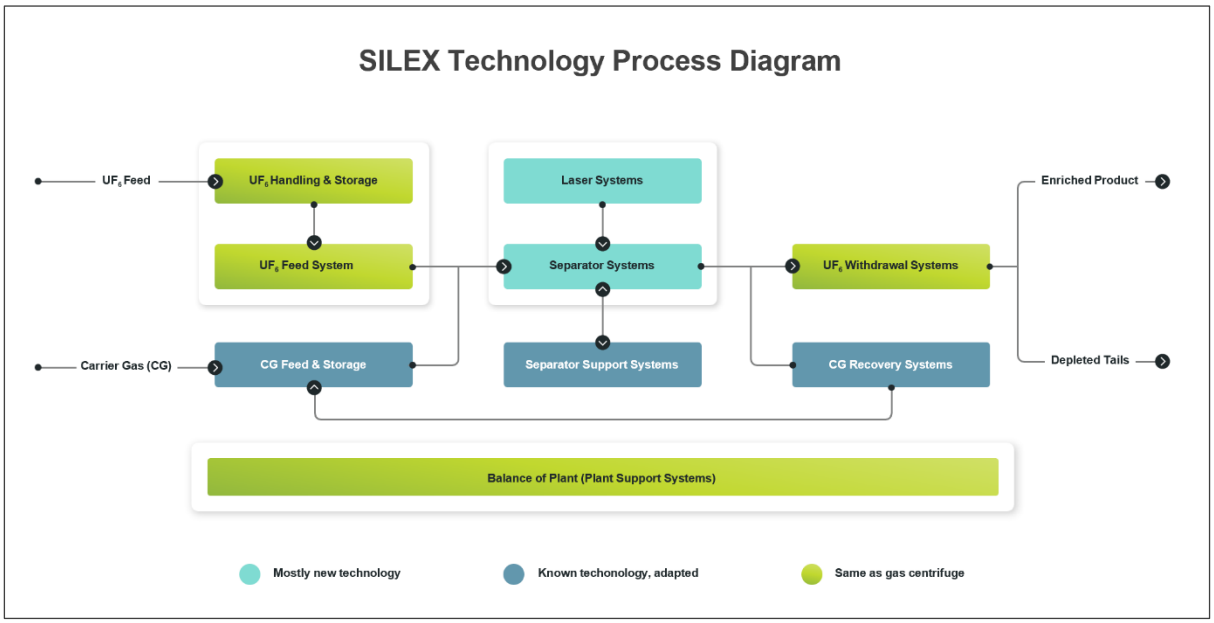
GLE is continuing with its preliminary activities for the engineering design of the PLEF with the hiring of in-house plant and systems engineering specialists. GLE also engaged a third-party contractor to undertake the PLEF front-end engineering design (FEED). In addition to advancing the facility design, along with the engineering cost model and plant economic study, GLE's current efforts are focused on preparing for regulatory licensing and site acquisition activities for the PLEF.

In July 2023, GLE also executed a lease for a new facility in Wilmington that provides significant new space for the planned growth of the GLE team, the construction of in-house manufacturing capability to support GLE's engineering operations and an increase in commercial activities.

Commercial-Scale Pilot Demonstration Program Update:

The primary focus of the commercial-scale pilot demonstration program being conducted jointly by Silex and GLE is the construction and testing of full-scale laser systems, separator systems and the associated gas handling equipment. Construction and integration of the pilot systems are currently on track to be completed around the end of CY2023, with commissioning to commence as early as Q1 CY2024. Following commissioning activities, the full SILEX technology pilot demonstration facility is expected to be put into service as early as Q2 CY2024.

At the core of the SILEX technology are the laser systems and separator systems that form the vast majority of the classified intellectual property licensed to GLE, as depicted below:



*Successful completion of the pilot demonstration project in mid-2024 would result in the technology reaching **TRL-6 level – a key milestone in the de-risking of the technology** before the focus turns to the commercial feasibility assessment and construction of the first commercial SILEX uranium enrichment plant.*

An update on progress with these key technology systems follows:

Laser Systems

The first full-scale laser system module, designed and built at Silex's Lucas Heights laser technology development centre, has been installed in GLE's Test Loop facility in Wilmington and is currently being commissioned in preparation for enrichment operations.

Development of the Beam Control System (BCS), which controls all the individual laser beam components between the laser sub-systems and the separator, has been completed and has also been shipped to, and installed in the Wilmington Test Loop. The BCS is a unique state-of-the-art, fully automated, industrial-grade control system, which aims to enable reliable 24/7 operation of the commercial plant laser system.

Construction of a second, identical laser system module required for the pilot demonstration project has recently been completed. This second commercial-scale laser system module was shipped to the Wilmington Test Loop earlier this month.

Separator Systems

The joint GLE-Silex engineering team based at the Test Loop facility in Wilmington has been making solid progress scaling up the separator and gas handling systems required for the pilot demonstration program. Component testing is well advanced and integrated system assembly is progressing rapidly. Additionally, GLE is in the process of significantly expanding its in-house manufacturing capability, as well as expanding the engineering and operations teams.

Industry and Government Support:

GLE's business strategy includes active engagement with industry and government organisations, aimed at developing areas of collaboration and support that will help to expedite and de-risk GLE's commercialisation of the SILEX technology.

US Nuclear Utility Support

In April 2023, a non-binding Letter of Intent (LOI) between GLE and Dominion Energy Services Inc. was executed for the purpose of developing areas of mutual interest and potential cooperation in the nuclear fuel supply chain. This follows similar LOIs signed with Constellation Energy Generation and Duke Energy in mid-2022. The LOIs identify a number of key areas of potential cooperation, including supporting the acceleration of GLE's deployment of the SILEX laser enrichment technology in the US and additional activities related to the planned PLEF. The LOIs reflect the broader support of the US nuclear industry to establish greater diversification in the supply of nuclear fuel.

GLE is heavily engaged in the industry and continues to explore opportunities to partner with various industry stakeholders to seek support for its commercialisation plans and the planned PLEF multi-purpose facility.

US Government Initiatives

In response to the continuing geopolitical issues, energy security concerns, and focus on the need for carbon-free electricity generation, the US Congress has moved to provide clear bipartisan legislative signals that will support the establishment of new nuclear fuel production capacity in the country and the Western nuclear industry more broadly.

Congress also hopes that the efforts that it is making will re-establish American nuclear industry leadership globally and will lead to more secure supply chains for the US and its partners and allies.

The US Congress passed the Inflation Reduction Act in August 2022, which included a US$700m funding package for the DOE's HALEU Availability Program. The Inflation Reduction Act also provided a series of tax credits for existing nuclear power reactors and sought to incentivise the development and deployment of advanced reactors, including SMRs.

The DOE released its draft Request for Proposal (RFP) in relation to the HALEU Availability Program on 5 June 2023. The issuance of the draft RFP was intended to allow interested parties to provide feedback to the DOE prior to the release of the final RFP. Submissions in response to the draft RFP were due in July 2023, and GLE provided a response.

To further drive investment and activity in the US nuclear industry, and in a significant show of bipartisan support, in July 2023, the Nuclear Fuel Security Act and the Accelerating Deployment of Versatile, Advanced Nuclear for Clean Energy Act of 2023 (ADVANCE Act) were both passed through the Senate, as part of amendments to the National Defense Authorization Act for Fiscal Year 2024. Other bills being considered by Congress with bipartisan support include: the potential banning of imports of nuclear fuel and enriched uranium products from Russia; Nuclear Regulatory Commission licensing and regulatory reform; and strengthening and assurance of US nuclear industry competitiveness globally.

GLE is exploring opportunities to participate in the various US government programs as they unfold.

Fuel Market Update and Nuclear Power Outlook

Nuclear Power Outlook:

Nuclear power plays an increasingly important role in the supply of carbon-free base load electricity and is anticipated to play a much greater role in the energy mix as countries around the world adopt energy policies to meet more urgent net-zero emissions targets. Today's operating nuclear reactor fleet currently generates ~10% of the world's electricity supply, which could rise significantly over the next decade as governments strive to address the key issues of climate change and energy security. We are seeing many countries' government policies shifting in favour of nuclear energy as an ideal companion to renewable energy sources.

According to the World Nuclear Association (WNA), there are currently 436 operable nuclear reactors globally, with significant growth in nuclear power expected from the additional 59 reactors under construction and with hundreds more planned. Notwithstanding bold nuclear construction programs in China, India and the Middle East, the US remains the world's largest producer of nuclear power with 93 operable reactors. The US currently accounts for more than 30% of worldwide nuclear generation of electricity and is expected to remain the largest nuclear power generator for years to come.

Growth in demand for nuclear power is also being evidenced in life extensions for existing reactors. In the US, nearly all of the operable reactors have been granted operating licence extensions from 40 to 60 years, with some potentially planning to operate for 80 years or more.

There is also growing interest and significant international investment being made into the development of next generation advanced reactor technologies, including SMRs. Many advanced reactors, including SMRs, are being designed to operate with HALEU fuel, whilst others will use conventional LEU fuel or, in some cases, LEU+ fuel.

With significant growth forecast in nuclear power generation around the world and the ever-increasing awareness of the potential contribution of nuclear energy to mitigate the adverse effects of climate change, we remain encouraged by the various opportunities for the SILEX uranium enrichment technology and GLE in the global nuclear industry.

*We believe the **SILEX technology, the only third-generation laser enrichment technology being commercialised today**, could help make nuclear power a more efficient and cost-effective solution for resilient and sustainable carbon-free base load electricity generation.*

Fuel Market Update:

With many countries prioritising government policy initiatives to address the climate crisis and to ensure energy security by supporting sovereign energy platforms, we expect to see nuclear power form a more meaningful part of energy mix for a growing number of countries. These factors, coupled with potential near-term disruptions in the Western nuclear fuel supply chain precipitated by the Russian invasion of Ukraine, have resulted in market conditions and opportunities that have not previously been seen in the nuclear industry.

With Russia currently providing the global nuclear industry with ~14% of its uranium requirements, ~27% of its conversion services and ~45% of enrichment capacity, Western governments and utilities are seeking to establish secure nuclear fuel production capabilities free of Russian (and Chinese) influence, particularly in light of the growing threat of sanctions on Russian-sourced enriched uranium. As the global nuclear industry bifurcates, Western utilities are under the growing threat of sanctions on Russian-sourced uranium and enriched nuclear fuel.

As a consequence, the global nuclear fuel markets for uranium, conversion services and uranium enrichment services have continued to tighten, with price increases being witnessed across all components of the fuel cycle in recent years. From 2017, when the term price of uranium traded at ~US$30 per pound, the term price of uranium has rallied to ~US$56 per pound. Term conversion prices have increased from ~US$12/kg to ~US$30/kg and term enrichment prices from ~US$45/SWU to ~US$146/SWU over the same period.

In addition to the traditional fuel markets, which provide LEU for today's reactor fleet, there is significant supply risk in the emerging market for HALEU fuel, required for next generation advanced reactors, including SMRs. With no sizeable HALEU production capability available anywhere in the West in the short-term, several developers were planning to purchase Russian-sourced HALEU over the next decade or longer.

This has given rise to some urgency around the world to establish Western HALEU production capability as soon as possible. The abovementioned HALEU Availability Program, being established by the US DOE, is seeking to address this issue.

In summary, we believe Western nuclear fuel markets will undergo a fundamental realignment over the next 12 to 24 months towards a more resilient and sustainable footing, with the aim of becoming less dependent, or free of, reliance on Russian and other State-Owned nuclear fuel suppliers. We believe this realignment could endure for decades, given the renewed focus on long-term energy security.

*The realignment of global fuel markets provides a **'Triple Opportunity'** for GLE to become a unique and versatile supplier of three nuclear fuel products: i) natural uranium (in the form of UF_6); ii) LEU and LEU+; and iii) HALEU.*

Quantum Silicon for Quantum Computing Processor Chips

In late 2019, Silex launched an R&D project in conjunction with project partners Silicon Quantum Computing Pty Ltd (SQC) and UNSW Sydney (UNSW) to develop a process for the commercial production of high-purity 'Zero-Spin Silicon' (ZS-Si) using a variant of the SILEX laser isotope separation (LIS) technology. The project was successfully completed during the year and demonstrated efficient production of gram quantities of ZS-Si (in the form of halo-silane), with enrichment of silicon-28 up to ~99.998% purity. Additionally, a path to production scalability was verified. Significantly, this is the first time that the SILEX laser enrichment technology has been demonstrated at TRL-6 through a commercial-scale pilot facility demonstration.

ZS-Si is a unique form of isotopically enriched silicon, which is a key enabling material for the fabrication of next generation processor chips that will power silicon-based quantum computers. Until recently, most of the world's supply of enriched silicon came from Russia, produced with conventional centrifuge technology. The Russian invasion of Ukraine has disrupted this supply, which has given rise to some urgency in establishing alternative supply. Silex aims to provide a secure and resilient alternative source of enriched silicon for users around the world.

*The SILEX silicon pilot demonstration facility confirmed the capability to produce ZS-Si in the form of enriched silicon-28 at the highest purity of **~99.998%** and verified a path to production scalability.*

Quantum Silicon Production Project:

The launch of the new Quantum Silicon Production Project was announced on 17 August 2023, and is being undertaken in conjunction with partners SQC and UNSW. The new Project's objective is to establish the first Quantum Silicon Production Plant and to develop the skills and capability to manufacture commercial 'Quantum Silicon' (Q-Si) products, produced from ZS-Si halo-silane, in multiple product forms at commercial scale.

The new 3.5-year Project has been awarded $5.1m in funding from the Defence Trailblazer for Concept to Sovereign Capability Program, a strategic partnership between The University of Adelaide and UNSW, supported by the Department of Education through the Trailblazer Universities Program. The Project has a total budget of ~$16m, with Silex currently resolving other avenues of financial support for the Project.

If successful, the Quantum Silicon Production Project will establish an end-to-end manufacturing facility at the Company's Lucas Heights technology centre. It is anticipated that the first production module will produce between 5kg to 10kg annually of ZS-Si (in the form of halo-silane), which will then be converted to multiple Q-Si product forms required by potential customers in the global silicon-based quantum computing industry.

The Production Plant will include significant additional equipment for conversion of ZS-Si into two different product forms that are compatible with quantum chip fabrication technologies utilised by manufacturers, namely:

1) **Quantum Silane gas** – used in chemical vapour deposition (CVD) based processes utilised for quantum chip fabrication
2) **Quantum Silicon solid** – used in atomic and molecular beam epitaxy (ABE / MBE) based processes utilised for quantum chip fabrication.

A key benefit of the SILEX laser isotope separation technology is its modular nature, allowing for the Production Plant to be scaled up with additional modules, based on market demand and other factors.

The new 3.5-year Q-Si Production Project will focus on achieving four key outcomes:

1) Scaling of ZS-Si production capability to commercial-scale output (i.e., TRL-7, 8, & 9)
2) Scaled production of gaseous Q-Si product in the form of Quantum Silane
3) Production of solid Q-Si product in the form of Quantum Polysilicon and/or Quantum Monosilicon
4) Development of a customer base and commercial arrangements for global sales of Q-Si in commercial product forms.

Silex will retain ownership of the ZS-Si/Q-Si production technology and related intellectual property developed through the Project.

Quantum Computing and Q-Si Outlook:

Australia is at the forefront of global efforts to develop and commercialise quantum computing and associated quantum technologies, which have the potential to underpin transformational technological advancements in many fields, including artificial intelligence, robotics, advanced communications, and sensing, and in complex global industries, such as defence and aerospace, finance, biomedical science, chemicals, and logistics. UNSW and its commercial spin out, SQC, are world leaders in developing silicon-based quantum computing technology, which, if successful, will allow Australia to establish sovereign capability in a key strategic technology that will advance the country's future defence, national security, and economic competitiveness in the emerging quantum technology era.

Many other countries around the world are also investing heavily in the development of quantum computing technology, with governments and key corporates (such as Intel, IBM, Google, Microsoft, Amazon, and others) vying for leadership in this emerging strategic industry.

Silicon-based quantum computing technology is reliant on the production of enriched silicon. Current methods for production of enriched silicon are limited and costly, with only small quantities produced annually, mostly using gas centrifuge technology in Russia. Due to the Russian-Ukrainian conflict, this fragile supply chain has been disrupted, which could threaten the viability of silicon quantum computing. Should the Q-Si Production Project be successful, it could potentially enable Australia to establish itself as a world-leader in Q-Si production.

*If the market for Quantum Silicon evolves as anticipated, this could create a significant and strategic new business for Silex, and a **new value-added export market for Australia**.*

Medical Isotope Separation Technology (MIST) Project

In February 2023, the Company announced the MIST opportunity and the commencement of the MIST Project. The MIST Project is initially focused on identifying a process to economically produce enriched Ytterbium (Yb-176), which is the precursor isotope required for Lutetium (Lu-177) production. The Lu-177 radioisotope has enabled a breakthrough development, called targeted beta therapy, for the diagnosis and treatment of aggressive metastatic cancers and is currently facing global supply disruption due to the supply of enriched Yb-176 previously being almost entirely sourced from Russia.

The three-year MIST Project has the aim of verifying capability for enrichment of Yb-176 in a commercially scalable process. Silex is currently undertaking Stage 1 of the Project, the proof-of-concept assessment, at the Company's Lucas Heights facility, to investigate a viable process for the production of high purity Yb-176. Stage 1 is due for completion at the end of CY2023. The proof-of-concept program involves lab-scale verification of the MIST process in custom-built test equipment.

Assuming viable economic enrichment of Yb-176 can be demonstrated in the MIST Project, the potential to partner with the global pharmaceutical industry will be explored. The MIST Project also has the potential to provide a technology platform for application to other high-value medical isotopes.

Financial Overview

During the year, the Company completed an equity raise by way of a placement, which was followed by a Share Purchase Plan (SPP). The net proceeds from the placement and SPP were $114.7m. As at 30 June 2023, the Company held ~$138.1m in cash and term deposits, with no corporate debt. The Company's net cash outflows (excluding net equity raising proceeds) for the year ending 30 June 2023 were $19.2m, an increase of $9.3m from the prior year, largely resulting from the increase in GLE funding contributions in support of the decision to accelerate the CY2023 Pilot Demonstration Program.

Workplace Health and Safety

The health, safety and well-being of our people is paramount. We have a constant focus on the health, safety and well-being of our team members across all sites and we reported no lost time injuries or reportable incidents on our project sites during the last year.

Authorised for release by the Silex Board of Directors.

Further information on the Company's activities can be found on the Silex website: www.silex.com.au or by contacting:

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Forward Looking Statements and Risk Factors:

About Silex Systems Limited (ASX: SLX) (OTCQX: SILXY)

Silex Systems Limited ABN 69 003 372 067 (Silex) is a technology commercialisation company whose primary asset is the SILEX laser enrichment technology, originally developed at the Company's technology facility in Sydney, Australia. The SILEX technology has been under development for uranium enrichment jointly with US-based exclusive licensee Global Laser Enrichment LLC (GLE) for a number of years. Success of the SILEX uranium enrichment technology development program and the proposed Paducah commercial project remain subject to a number of factors including the satisfactory completion of the engineering scale-up program and nuclear fuel market conditions and therefore remains subject to associated risks.

Silex is also at various stages of development of additional commercial applications of the SILEX technology, including the production of 'Zero-Spin Silicon' for the emerging technology of silicon-based quantum computing. The 'Quantum Silicon' project remains dependent on the outcomes of the project and the viability of silicon quantum computing and is therefore subject to various risks. Silex is also conducting research activities in its Medical Isotope Separation Technology (MIST) Project, which is early-stage and subject to numerous risks. The commercial future of the SILEX technology in application to uranium, silicon, medical and other isotopes is therefore uncertain and any plans for commercial deployment are speculative.

Additionally, Silex has an interest in a unique semiconductor technology known as 'cREO®' through its 100% ownership of subsidiary Translucent Inc. The cREO® technology developed by Translucent has been acquired by IQE Plc based in the UK. IQE has paused the development of the cREO® technology until a commercial opportunity arises. The future of IQE's development program for cREO® is very uncertain and remains subject to various technology and market risks.

Forward Looking Statements

The commercial potential of these technologies is currently unknown. Accordingly, no guarantees as to the future performance of these technologies can be made. The nature of the statements in this announcement regarding the future of the SILEX technology as applied to uranium enrichment, Zero-Spin Silicon production, medical and other isotope separation projects, the cREO® technology and any associated commercial prospects are forward-looking and are subject to a number of variables, including but not limited to, unknown risks, contingencies and assumptions which may be beyond the control of Silex, its directors and management. You should not place reliance on any forward-looking statements as actual results could be materially different from those expressed or implied by such forward-looking statements as a result of various risk factors. Further, the forward-looking statements contained in this Announcement involve subjective judgement and analysis and are subject to change due to management's analysis of Silex's business, changes in industry trends, government policies and any new or unforeseen circumstances. The Company's management believes that there are reasonable grounds to make such statements as at the date of this Announcement. Silex does not intend, and is not obligated, to update the forward-looking statements except to the extent required by law or the ASX Listing Rules.

Risk Factors

Risk factors that could affect future results and commercial prospects of Silex include, but are not limited to: ongoing economic and social uncertainty, including in relation to the impacts of the COVID-19 pandemic; geopolitical risks, in particular relating to Russia's invasion of Ukraine and tensions between China and Taiwan which may impact global supply chains, among other risks; uncertainties related to the effects of climate change and mitigation efforts; the results of the GLE/SILEX uranium enrichment pilot demonstration program; the market demand for natural uranium and enriched uranium; the outcome of the project for the production of Zero-Spin Silicon for the emerging technology of silicon-based quantum computing; the outcome of the MIST program; the potential development of, or competition from alternative technologies; the potential for third party claims against the Company's ownership of Intellectual Property; the potential impact of prevailing laws or government regulations or policies in the USA, Australia or elsewhere; whether IQE's commercialisation program for cREO® is resumed, the results from the program and the market opportunities for cREO® products; actions taken by the Company's commercialisation partners and other stakeholders that could adversely affect the technology development programs and commercialisation strategies; and the outcomes of various strategies and projects undertaken by the Company.