

January 16, 2024

Dear IperionX Shareholders & Stakeholders,

As we embark on a new year and reflect on the remarkable accomplishments made over the past 12 months, I am pleased to confirm that the IperionX team have already turned their focus and dedication to delivering another year of significant growth, innovation and success. Before I begin, I would like to provide some historical context for why this year is expected to be a critical inflection point for our company and why we have so much conviction in the exceptional potential for IperionX.

For nearly 3,000 years, steel was a niche product, primarily because it was significantly more expensive than iron. In 1853, the inventor Henry Bessemer began research in alternate steelmaking methods, which ultimately led him to discover a new low-cost process for producing steel in 1856. It took two more years of testing and development for Bessemer to be in a position to commercialize his new process, by opening the Bessemer Steel Works in Sheffield, U.K. in 1858. The first commercial Bessemer steel plant in the U.S. was built in 1864 and between 1867 and 1882, U.S. production of Bessemer steel grew 53% annually. Over the same period, the breakthrough Bessemer steel technology led to a cost reduction of over 70% and ushered in a new age in steel production that continued for over 150 years. Commercialization of the technology was the critical inflection point. The new production technology radically lowered the cost of steel production, allowing Bessemer to scale quickly, profitably capturing market share and making the Bessemer Process a driving force of the Industrial Revolution.

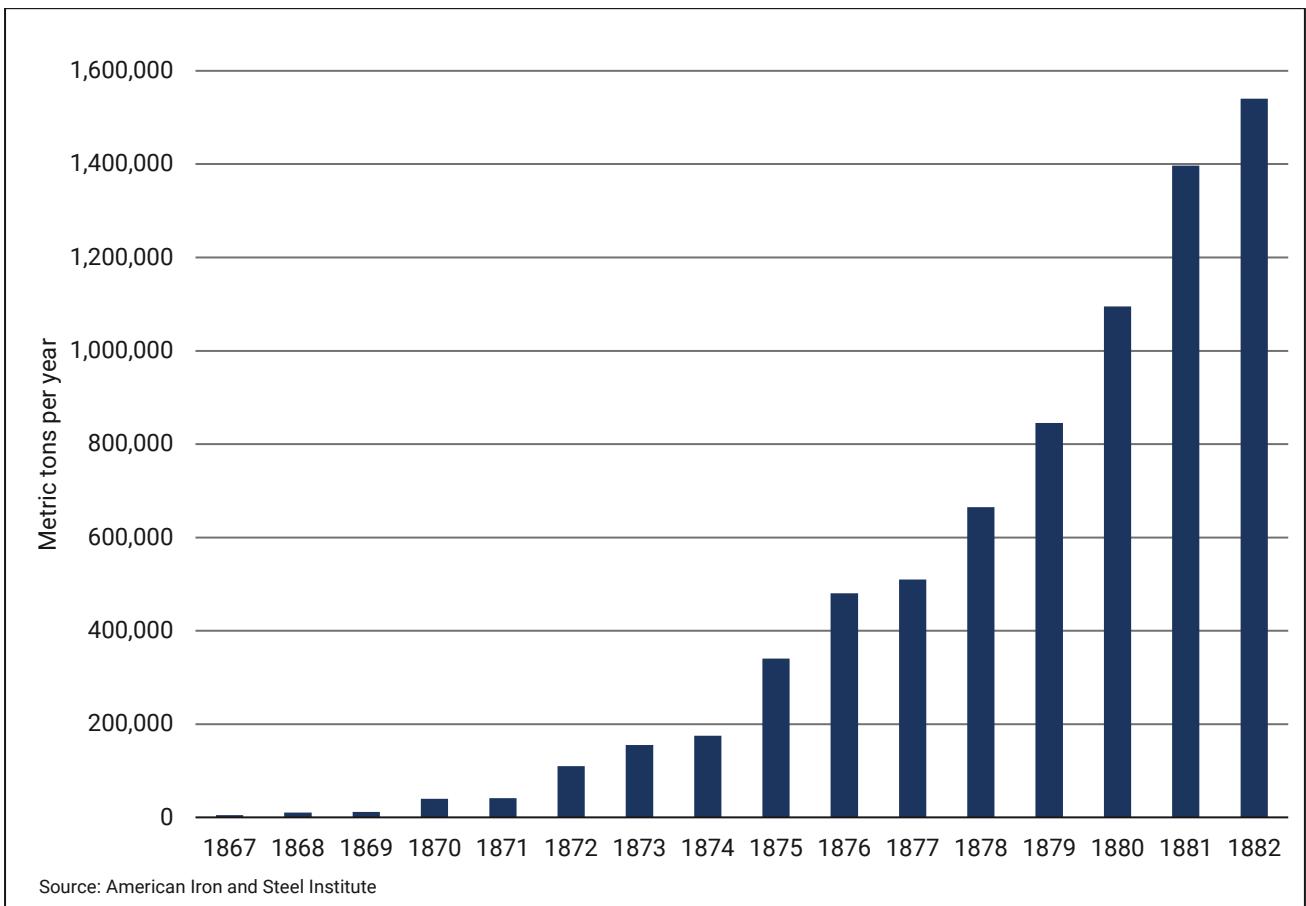


Figure 1: Bessemer steel production in the U.S. 1867-1882

Our core titanium refining and processing technologies, Hydrogen Assisted Metallothermic Reduction (HAMR) & Hydrogen Sintering & Phase Transformation (HSPT), were first patented by Dr. Z Zak Fang in 2016 and 2011 respectively. IperionX now aims to successfully reach its own “Bessemer Moment” as we commission our first commercial titanium production facility, using the HAMR process, in Virginia in 2024. Our noteworthy

North Carolina

129 W Trade Street, Suite 1405
Charlotte, NC 28202

Tennessee

279 West Main Street
Camden, TN 38320

Virginia

1080 Confroy Drive
South Boston, VA 24592

Utah

1782 W 2300 S
West Valley City, UT 84119

accomplishments in 2023 have set a solid foundation for a successful commercialization in 2024 and we expect this milestone to be a critical inflection point for the future of IperionX.

A summary of our most significant achievements in 2023:

Building our Titanium Metal Commercial Facility in Virginia

We executed and expanded on our initial plans, announced in September 2022 by Virginia Governor Glenn Youngkin, to build the world's largest recycled titanium metal powder facility in South Boston, Virginia. In April 2023, we detailed our plans to build 1,000+ metric tonnes per annum of titanium metal production capacity in a 50,000 sq. ft. building within the Southern Virginia Technology Park (SVTP), located at 1080 Confroy Dr. (the "1080 Building"), which is now expected to reach full capacity by 2026. In November 2023, we bolstered our presence at the SVTP with a second 15,000 sq. ft. building located at 1092 Confroy Drive (the "1092 Building"), which is expected to be commissioned in the second quarter of 2024, and will utilize the titanium powder produced in the 1080 Building to:

- (1) use our forging technologies (HSPT) to produce traditional titanium mill products (plate, bar, wire, etc.) and near net shape titanium products; and
- (2) apply additive manufacturing to produce complex 3D printed titanium products.

Together, our 1080 & 1092 Buildings are expected to create an innovative titanium metal manufacturing campus, demonstrate the commercial scalability of our HAMR and HSPT technologies, and showcase how we plan to revolutionize the titanium value chain in a manner reminiscent of Bessemer's historic achievement.



Figure 2: 1092 Building (foreground) & 1080 Building (background)

Breakthrough Large Scale Commercial Test Runs of the HAMR Process

The HAMR process represents a revolutionary shift in titanium refinement and production. While the science is complex, we view its application as relatively straightforward as it uses conventional, off-the-shelf, low-cost furnace technology that we have already de-risked through comprehensive testwork in 2023. At our leading European furnace supplier, the IperionX team completed two successful furnace hot test runs which scaled the batch size by a factor of 10x, from ~40kg to over 400kg, while reducing cycle time by over 70%, surpassing the core assumptions that underpinned our engineering studies for the Virginia production facility. In light of these successful results, we are now advancing detailed engineering studies for our planned expansion in Virginia, which we believe has significant potential to deliver higher titanium productivity at materially lower costs.



Figure 3: HAMR furnace retorts

Advancing our Industrial Pilot Facility (IPF) in Utah

IperionX assumed ownership of the IPF in early 2022, and since then we have materially upgraded the facilities to increase the nameplate capacity and enhance the performance of the operation to produce high quality titanium metal powder for customer engagement. Simultaneously, our team worked on the design and engineering of the Virginia commercial titanium facility, which enabled us to secure permits for the Virginia facility in October 2023 and begin construction in December 2023.



Figure 4: The IperionX Team at the Industrial Pilot Facility in Utah

Customer Engagement with Global Leaders

We engaged with a wide range of potential customers including Ford, Lockheed Martin, Canyon, and GKN Aerospace. Our 3D printing capabilities yielded our first commercially available titanium product, an innovative Panerai x Brabus titanium timepiece. In addition, we engaged with Lockheed Martin, GKN Aerospace and the U.S. Army to replace traditional titanium mill products, in this case titanium plate, providing a new domestic and sustainable source to enhance their critical supply chains. Simultaneously, we secured new sources of titanium scrap feedstock, signing agreements with ELG Utica (part of the Aperam Group) and Heroux Devtek (a leading aerospace supplier).

Winning Government Contracts & Industry Awards

2023 began with IperionX winning the U.S. Air Force Research Laboratories Grand Challenge in recycling titanium scrap and powder. Our titanium technologies were then recognized by winning an R&D 100 Award, which is the pre-eminent science and technology award competition that recognizes new commercial products, technologies and materials for their technological significance. Important milestones also included UL validation of the 100% circularity of our titanium production process and the completion of the first peer reviewed and ISO compliant 'life cycle assessment' which highlighted our industry leading low-carbon footprint.

Securing Permits for our Titan Critical Minerals Project in Tennessee

We successfully secured all key permits for our 100% owned Titan Project, which is one of the largest titanium, zircon and rare-earth mineral resource in the United States. Permitting was completed in under 10 months – a testament to our sustainable approach to minerals extraction and our team's commitment to the communities where we operate. Discussions are ongoing with potential corporate partners regarding opportunities to accelerate Titan Project feasibility studies and development. While the Titan Project is integral to our long-term ambitions to build a fully integrated and circular U.S. titanium metal supply chain, our highest priority is to rapidly scale a profitable titanium scrap-to-metal business in Virginia.

Investment Capital for Commercialization

In June 2023, we raised ~US\$13.5 million in an equity placement led by our two largest shareholders, Fidelity Management & Research Company and Fidelity International. In October, we received a Letter of Interest from the U.S. Export-Import Bank for the provisional sum of US\$11.5 million. In November 2023, we were advised that we were awarded a US\$12.7 million grant from the U.S. Department of Defense under the Defense Production Act Title III for domestic titanium production and successfully raised an additional US\$16.7 million in equity from existing investors. Receipt of funding under the DoD grant and the successful equity raise is expected to fund our initial Virginia production scale up which is estimated to cost ~US\$21.5 million.

The Year Ahead

This year is set to be a transformative for IperionX as we aim to realize our own “Bessemer Moment”. We are not just aiming to replicate history but to create our own by disrupting the global titanium supply chain with low cost, sustainable and high-performance titanium products.

Our leading technologies, including HAMR and HSPT, have improved and progressed from a decade of advanced development and 2024 will see IperionX commission our large-scale industrial furnace and demonstrate these leading technologies at commercial scale. Our Virginia titanium facility is designed to apply our HAMR and HSPT technologies to produce sustainable, high-quality and high strength titanium metal products at low cost.

Our focus in 2024 will be on:

- **Launching our Commercial Operations:** The commissioning of our large-scale, industrial furnace in Virginia is an important step to demonstrate our leading technologies at commercial scale. We expect to accomplish this important milestone in the first half of 2024.
- **Successfully Commence Production at the 1092 Building:** This advanced titanium manufacturing facility is expected to be commissioned in the first half of 2024 and will showcase how we can use our innovative titanium powders to manufacture a wide range of low-cost and high-performance titanium products with powder metallurgy, HSPT forging and 3D printing.
- **Expanding Customer and Government Partnerships:** We will continue to build upon our existing partnerships and forge new ones, showcasing our innovative titanium solutions. We aim to continue our success with working closely with the U.S Government to deliver a low-cost, sustainable, U.S.-titanium industry.
- **Advancing the Titan Project:** Our efforts will focus on developing strategic partnerships to advance our Titan Critical Minerals project, reinforcing our commitment to a sustainable and integrated U.S. titanium supply chain from minerals to metal products.

I would like to thank the IperionX team for their relentless efforts and remarkable achievements in 2023. It is their exceptional teamwork and dedication that will drive our success in 2024. I also want to express our appreciation to all our stakeholders, including our long-term shareholders, our customers, suppliers and government associates. Your unwavering support and trust in IperionX have been instrumental in our performance in 2023 and we are committed to exceeding your expectations in 2024.

I wish everyone a Happy New Year and a very successful 2024.

Sincerely,



Anastasios Arima
CEO and Managing Director
IperionX Limited

Competent Persons Statement

The information in this document that relates to Exploration Results, Mineral Resources, Production Targets, Process Design, Mine Design, Cost Estimates, and Financial Analysis is extracted from IperionX's ASX Announcement dated June 30, 2022 ("Original ASX Announcement") which is available to view at IperionX's website at www.iperionx.com.

The Company confirms that a) it is not aware of any new information or data that materially affects the information included in the Original ASX Announcement; b) all material assumptions and technical parameters underpinning the Production Target, and related forecast financial information derived from the Production Target included in the Original ASX Announcement continue to apply and have not materially changed; and c) the form and context in which the relevant Competent Persons' findings are presented in this report have not been materially changed from the Original ASX Announcement.

Forward Looking Statements

Information included in this release constitutes forward-looking statements. Often, but not always, forward looking statements can generally be identified by the use of forward-looking words such as "may", "will", "expect", "intend", "plan", "estimate", "anticipate", "continue", and "guidance", or other similar words and may include, without limitation, statements regarding plans, strategies and objectives of management, anticipated production or construction commencement dates and expected costs or production outputs.

Forward looking statements inherently involve known and unknown risks, uncertainties and other factors that may cause the Company's actual results, performance, and achievements to differ materially from any future results, performance, or achievements. Relevant factors may include, but are not limited to, changes in commodity prices, foreign exchange fluctuations and general economic conditions, increased costs and demand for production inputs, the speculative nature of exploration and project development, including the risks of obtaining necessary licenses and permits and diminishing quantities or grades of reserves, the Company's ability to comply with the relevant contractual terms to access the technologies, commercially scale its closed-loop titanium production processes, or protect its intellectual property rights, political and social risks, changes to the regulatory framework within which the Company operates or may in the future operate, environmental conditions including extreme weather conditions, recruitment and retention of personnel, industrial relations issues and litigation.

Forward looking statements are based on the Company and its management's good faith assumptions relating to the financial, market, regulatory and other relevant environments that will exist and affect the Company's business and operations in the future. The Company does not give any assurance that the assumptions on which forward looking statements are based will prove to be correct, or that the Company's business or operations will not be affected in any material manner by these or other factors not foreseen or foreseeable by the Company or management or beyond the Company's control.

Although the Company attempts and has attempted to identify factors that would cause actual actions, events or results to differ materially from those disclosed in forward looking statements, there may be other factors that could cause actual results, performance, achievements, or events not to be as anticipated, estimated or intended, and many events are beyond the reasonable control of the Company. Accordingly, readers are cautioned not to place undue reliance on forward looking statements. Forward looking statements in these materials speak only at the date of issue. Subject to any continuing obligations under applicable law or any relevant stock exchange listing rules, in providing this information the Company does not undertake any obligation to publicly update or revise any of the forward-looking statements or to advise of any change in events, conditions or circumstances on which any such statement is based.