IVANHOE MINES

September 12, 2022

Ivanhoe and Gécamines host ceremony commemorating the start of construction activities at the historic Kipushi Mine

Production from Kipushi's ultra-high-grade Big Zinc deposit targeted for late 2024, marking one hundred years since the mine first opened

Ceremony attended by DRC Prime Minister and other DRC national and provincial dignitaries

Memorandum of understanding signed with Province of Haut-Katanga to study upgrade of the Kipushi border crossing

KIPUSHI, DEMOCRATIC REPUBLIC CONGO – Ivanhoe Mines (TSX: IVN; OTCQX: IVPAF) President Marna Cloete is pleased to announce that Kipushi Corporation SA (KICO), a joint venture between Ivanhoe and DRC state-owned mining company Gécamines, recently hosted a breaking-ground ceremony to commemorate the start of construction of the processing plant at the historic Kipushi zinc-copper-germanium-silver mine. In addition, Ivanhoe signed a memorandum of understanding (MOU) with the provincial government of Haut-Katanga to study options for upgrading the DRC-Zambia border crossing in the town of Kipushi for commercial imports and exports.

The ground-breaking ceremony was attended by His Excellency Jean-Michel Sama Lukonde, Prime Minister of the Democratic Republic of the Congo, Her Excellency Adèle Kayinda Mahina, Minister of State and Minister of Portfolio, Her Excellency Antoinette N'Samba Kalambayi, Minister of Mines, members of the provincial government of the Haut-Katanga Province and other national, provincial and local dignitaries, in addition to representatives from Ivanhoe, Gécamines and the town of Kipushi.

Watch a short video of the breaking-ground ceremony: https://vimeo.com/747988477/f35f2f8911



The delegation was presented with the development plan for returning the Kipushi mine to production by late 2024 – one hundred years since it was first opened and 30 years since it was placed on care and maintenance.

The ceremony follows the outstanding results of the Kipushi 2022 Feasibility Study, announced in February 2022, as well as the agreement signed between Ivanhoe Mines and Gécamines to bring the Kipushi mine back into production.

Jean-Michel Sama Lukonde, Prime Minister of the Democratic Republic of the Congo (right) and the government delegation were welcomed by Marna Cloete, President of Ivanhoe Mines (centre), and Louis Watum, General Manager of KICO (left).



The Kipushi 2022 Feasibility Study evaluates the development of an 800,000-tonne-perannum concentrator and underground mine, producing on average of 240,000 tonnes per annum of zinc contained in concentrate over a 14-year life of mine. The successful commencement of commercial production would establish Kipushi as the world's highest-grade major zinc mine, with an average head grade of 36.4% zinc over the first five years of production.

Existing, rehabilitated surface and underground infrastructure allow for significantly lower capital costs than comparable development projects. The estimated preproduction capital cost, including contingency, is \$382 million. This infrastructure also allows for a relatively short construction timeline of two years, with the principal development activities being the construction of a conventional concentrator facility and supporting infrastructure, together with the restart of mining activities underground. At a zinc price of \$1.40 per pound, the after-tax net present value (NPV) at an 8% real discount rate is \$1.4 billion, with an after-tax real internal rate of return (IRR) of 54%. The current spot zinc price is \$1.46 per pound.

Life-of-mine average C1 cash costs of \$0.65 per pound of zinc are expected to rank Kipushi, once in production, in the second quartile of the cash cost curve for zinc producers globally.

Ordering of long-lead equipment is underway and early construction activities have commenced. Financing and offtake discussions, including a pre-payment facility of \$250 million, are well advanced with several interested parties.

Unveiling the ceremonial plaque: (L-R) Jacques Kyabula Katwe, Governor Haut-Katanga Province; Antoinette N'Samba Kalambayi, Minister of Mines of the Democratic Republic of Congo; Adèle Kayinda Mahina, Minister of State and Minister of Portfolio of the Democratic Republic of Congo; Jean-Michel Sama Lukonde, Prime Minister of the Democratic Republic of Congo; Marna Cloete, President of Ivanhoe Mines; Louis Watum, General Manager of KICO; Calixte Mukasa, National Member of Parliament; and Alphonse Kaputo Kalubi, Chairman of Gécamines.



Breaking of ground: (L-R) Alphonse Kaputo Kalubi, Chairman of Gécamines; Olivier Binyingo Chairman of KICO; Calixte Mukasa, National Member of Parliament; Jean-Paul Mwenge, Provincial Member of Parliament for Haut-Katanga Province; Marna Cloete, President of Ivanhoe Mines; Jean-Michel Sama Lukonde, Prime Minister of the Democratic Republic of Congo; Jacques Kyabula Katwe, Governor of Haut-Katanga Province; Adèle Kayinda Mahina, Minister of State and Minister of Portfolio of the Democratic Republic of Congo; Antoinette N'Samba Kalambayi, Minister of Mines of the Democratic Republic of Congo; Grand Chef Kaponda, Paramount Chief of the Kaponda Chiefdom; and Louis Watum, General Manager of KICO.



Ivanhoe Mines' President, Marna Cloete commented:

"Kipushi is exceptional, not only because of the renowned Big Zinc deposit, which is one of the world's richest orebodies, but more importantly because of the people of Kipushi and the unique partnerships that make today's ceremony possible. I would like to express our sincere thanks to His Excellency the Prime Minister and the assembled dignitaries, our partners Gécamines, the hard-working employees of KICO, and the people of Kipushi town for being the architects of the future for the world-class Kipushi Mine. We now have our sights clearly set on the re-start of production in 2024. The rebirth of the historic Kipushi Mine will be a great achievement for Ivanhoe Mines, our partners and shareholders, and the Democratic Republic of Congo." His Excellency Jean-Michel Sama Lukonde, DRC Prime Minister, commented:

"It is with great satisfaction we now see the path toward the revival of this historic mine. Kipushi started production almost one hundred years ago in 1924, and I believe today is a sign of things to come. We can make Kipushi great again! This will benefit not only KICO, but also the citizens of Kipushi and the entire Democratic Republic of Congo. This partnership also aligns well with the vision of our President, His Excellency Mr. Felix Tshisekedi."

Memorandum of understanding signed with Province of Haut-Katanga to study the upgrade of the Kipushi border crossing

The Kipushi Mine is strategically located less than one kilometre from the DRC-Zambia border, which will be the gateway for Kipushi's products to global export markets.

On August 24, 2022, Ivanhoe Mines and the Province of Haut-Katanga signed a MOU concerning the construction of a dedicated, commercial border post for the Kipushi Mine, together with the upgrading of the existing border post in the town of Kipushi, which currently only serves local traffic between DRC and Zambia.

The MOU signing ceremony was attended by (L-R), His Excellency Miguel Katemb, Minister of Infrastructure for Haut-Katanga Province; Jacques Kyabula Katwe Governor of Haut-Katanga Province; Marna Cloete, President, Ivanhoe Mines and Olivier Binyingo, Chairman of KICO and Vice President, Public Affairs, Ivanhoe Mines.



This new commercial border crossing will provide a significant advantage to the Kipushi Mine as a direct means of importing materials and consumables, as well as

clearing customs and exporting products from the mine, and will provide socioeconomic benefits to the town and Province of Haut-Katanga.

The opening of the Kipushi border crossing also is anticipated to provide ancillary benefits to Kamoa-Kakula, where work is underway to improve processes for clearing copper products for export and to open alternative export border crossings between the DRC and Zambia, in order to alleviate congestion at the existing border crossings at Kasumbalesa and Sakania in Haut-Katanga Province.

The re-birth of a mining legend; Kipushi is a significant past producer of copper, zinc, germanium and precious metals

The Kipushi Mine has a long and storied history as a major producer of copper and zinc. Built and then operated by Union Minière for 42 years, Kipushi began mining a reported 18% copper deposit from a surface open pit in 1924. It was the world's richest copper mine at the time. The Kipushi Mine then transitioned to become Africa's richest underground copper, zinc and germanium mine. State-owned Gécamines gained control of Kipushi in 1967 and operated the mine until 1993, when it was placed on care and maintenance due to a combination of economic and political factors.

Over a span of 69 years, Kipushi produced a total of 6.6 million tonnes of zinc and 4.0 million tonnes of copper from 60 million tonnes of ore grading 11% zinc and approximately 7% copper. It also produced 278 tonnes of germanium and 12,673 tonnes of lead between 1956 and 1978. There is no formal record of the production of precious metals as the concentrate was shipped to Belgium and the recovery of precious metals remained undisclosed during the colonial era. However, drilling by Ivanhoe Mines has encountered significant silver values within Kipushi's current zinc- and copper-rich deposits.

Germanium is considered a technology-critical element, and is used as a semiconductor in transistors and many other electronic devices and technologies.

Currently, major end uses for germanium include fibre-optic systems, infrared optics, high-efficiency photovoltaic solar panels, and light-emitting diodes (LEDs). Germanium compounds are also used for polymerization catalysts and have most recently found use in the production of nanowires, as well as in the development of ultrafast quantum computing applications and communication technologies.

Most of Kipushi's historical production was from the Fault Zone, a steeply-dipping ore body rich in copper and zinc that was initially mined as an open pit. The Fault Zone extends to a depth of at least 1,800 metres below surface, along the intersection of a fault in carbonaceous dolomites. In 1924 Kipushi began mining 18% copper from a surface open pit, before transitioning to Africa's richest underground copper and zinc mine. This picture shows the Kipushi open pit in November 1928.



Before Kipushi was idled in 1993, Gécamines discovered the Big Zinc deposit at a depth of approximately 1,250 metres below surface and adjacent to the producing Fault Zone. The Big Zinc Deposit has not been mined and is the initial target for production as outlined in the 2022 Feasibility Study.

Since acquiring its interest in the Kipushi Mine in 2011, Ivanhoe's drilling campaigns have upgraded and expanded the mine's zinc-rich Measured and Indicated Mineral Resources by more than double to an estimated 11.78 million tonnes grading 35.34% zinc, 0.80% copper, 23 grams/tonne (g/t) silver and 64 g/t germanium, at a 7% zinc cut-off, containing 9.2 billion pounds of zinc, 8.7 million ounces of silver and 24.4 million ounces of germanium.

In addition, Ivanhoe's drilling expanded Kipushi's copper-rich Measured and Indicated Mineral Resources to an additional 2.29 million tonnes at grades of 4.03% copper, 2.85% zinc, 21 g/t silver and 19 g/t germanium, at a 1.5% copper cut-off – containing 144 million pounds of copper.

The Kipushi Mine, once in operation, will be powered by clean, renewable hydrogenerated electricity and is set to be among one of the world's lowest Scope 1 and 2 greenhouse gas emitters per tonne of zinc metal produced. Picture of the headframes for Kipushi shafts 1, 2 and 3, and the Kipushi concentrator in February 1966.



Qualified Persons

Disclosures of a scientific or technical nature on the Kipushi Project in this news release have been reviewed and approved by Stephen Torr, P.Geo., Ivanhoe Mines' Vice President, Geosciences, a Qualified Person under the terms of NI 43-101. Mr. Torr is not considered independent under NI 43-101 as he is the Vice President, Geosciences of Ivanhoe Mines. Mr. Torr has verified the technical data disclosed in this news release.

Ivanhoe has also prepared an independent, NI 43-101-compliant technical report for the Kipushi Project, which is available on the company's website and under the company's SEDAR profile at www.sedar.com:

• The Kipushi 2022 Feasibility Study dated February 14, 2022, prepared by OreWin Pty Ltd., MSA Group (Pty) Ltd., SRK Consulting (South Africa) (Pty) Ltd, and METC Engineering.

The technical report includes relevant information regarding the effective dates and the assumptions, parameters and methods of the mineral resource estimates on the Kipushi Project cited in this news release, as well as information regarding data verification, exploration procedures, sample preparation, analyses and security, and other matters relevant to the scientific and technical disclosure contained in this news release in respect of the Kipushi Project.

About Ivanhoe Mines

Ivanhoe Mines is a Canadian mining company focused on advancing its three principal projects in Southern Africa: the major new, mechanized, underground mines at the Kamoa-Kakula Mining Complex in the Democratic Republic of Congo, the development

of the Platreef palladium-rhodium-platinum-nickel-copper-gold discovery in South Africa; and the restart of the historic Kipushi zinc-copper-germanium-silver mine, also in the Democratic Republic of Congo.

Kamoa-Kakula Mining Complex is one of the highest grade and fastest growing major copper mining operations in the world. Copper concentrates were first produced in May 2021 and, through on-going phased expansions, it is positioned to become one of the world's largest copper producing operations by Q4 2024. The Kamoa-Kakula Mining Complex is powered by clean, renewable hydro-generated electricity and is among one of the world's lowest greenhouse gas emitters per tonne of copper metal produced. Ivanhoe Mines has pledged to achieve net-zero operational greenhouse gas emissions (Scope 1 and 2) at the Kamoa-Kakula Mining Complex.

Ivanhoe Mines also is exploring for new copper discoveries across its circa 2,400km² of exploration licences in the Western Foreland region in the Democratic Republic of Congo, which are located in close proximity to the Kamoa-Kakula Mining Complex.

Information contact

Investors

Vancouver: Matthew Keevil +1.604.558.1034

London: Tommy Horton +44 7866 913 207

<u>Media</u>

Tanya Todd +1.604.331.9834

Website www.ivanhoemines.com

Forward-looking statements

Certain statements in this release constitute "forward-looking statements" or "forward-looking information" within the meaning of applicable securities laws. Such statements and information involve known and unknown risks, uncertainties and other factors that may cause the actual results, performance or achievements of the company, its projects, or industry results, to be materially different from any future results, performance or achievements expressed or implied by such forward-looking statements or information. Such statements can be identified by the use of words such as "may", "would", "could", "will", "intend", "expect", "believe", "plan", "anticipate", "estimate", "scheduled", "forecast", "predict" and other similar terminology, or state that certain actions, events or results "may", "could", "would", "might" or "will" be taken, occur or be achieved. These statements reflect the company's current expectations regarding future events, performance and results and speak only as of the date of this release.

Such statements include without limitation, the timing and results of: (i) statements regarding a two year development timeline to bring Kipushi to commercial production; (ii) statements regarding successful commencement of commercial production would establish Kipushi as the world's highest-grade major zinc mine with average grade of 36.4% over the first five years of production; (iii) statements regarding Kipushi having an after-tax net present value at an 8% real discount rate of \$1.4 billion, with an after-tax real internal rate of return of 54%, at a zinc

price of 1.40/lb.; (iv) statements regarding pre-production capital estimated at US\$382 million; (v) statements regarding future mine production including life-of-mine average annual zinc production of 240,000 tonnes with C1 cash costs of US\$0.65/lb of payable zinc; (vi) statements regarding a mine life of 14 years; (vii) statements regarding financing and offtake discussions, including a pre-payment facility of \$250 million; (viii) statements regarding the memorandum of understanding signed with Province of Haut-Katanga for the upgrade of the Kipushi border crossing; (ix) statements regarding expected methods of mining and processing.

As well, all of the results of the Kipushi 2022 feasibility study, constitute forward-looking statements or information, and include future estimates of internal rates of return, net present value, future production, estimates of cash cost, proposed mining plans and methods, mine life estimates, cash flow forecasts, metal recoveries, estimates of capital and operating costs and the size and timing of development of the project. Furthermore, with respect to this specific forward-looking information concerning the development of the Kipushi Project, the company has based its assumptions and analysis on certain factors that are inherently uncertain. Uncertainties include: (i) the adequacy of infrastructure; (ii) geological characteristics; (iii) metallurgical characteristics of the mineralization; (iv) the ability to develop adequate processing capacity; (v) the price of copper; (vi) the availability of equipment and facilities necessary to complete development; (vii) the cost of consumables and mining and processing equipment: (viii) unforeseen technological and engineering problems; (ix) accidents or acts of sabotage or terrorism; (x) currency fluctuations; (xi) changes in regulations; (xii) the compliance by joint venture partners with terms of agreements; (xiii) the availability and productivity of skilled labour; (xiv) the regulation of the mining industry by various governmental agencies; (xv) the ability to raise sufficient capital to develop such projects; (xvi) changes in project scope or design; (xvi) political factors; (xvii) unforeseen delays or stoppages in shipping and transportation of goods and equipment; and (xix) that the new Kipushi joint venture agreement is executed on anticipated timelines.

Forward-looking statements and information involve significant risks and uncertainties, should not be read as guarantees of future performance or results and will not necessarily be accurate indicators of whether or not such results will be achieved. A number of factors could cause actual results to differ materially from the results discussed in the forward-looking statements or information, including, but not limited to, the factors discussed below and under "Risk Factors", and elsewhere in this release, as well as unexpected changes in laws, rules or regulations, or their enforcement by applicable authorities; the failure of parties to contracts with the company to perform as agreed; social or labour unrest; changes in commodity prices; and the failure of exploration programs or studies to deliver anticipated results or results that would justify and support continued exploration, studies, development or operations.

Although the forward-looking statements contained in this release are based upon what management of the company believes are reasonable assumptions, the company cannot assure investors that actual results will be consistent with these forward-looking statements. These forward-looking statements are made as of the date of this release and are expressly qualified in their entirety by this cautionary statement. Subject to applicable securities laws, the company does not assume any obligation to update or revise the forward-looking statements contained herein to reflect events or circumstances occurring after the date of this release.

The company's actual results could differ materially from those anticipated in these forwardlooking statements as a result of the factors set forth below in the "Risk Factors" section in the company's 2022 Q2 MD&A and its current annual information form.