AVALON
Mining Corporation

PREPARED FOR

Environmental Protection Agency Guyana

Omai Gold Mine Project

Project Summary

DATE
23 September 2025

REFERENCE
0787707

DOCUMENT DETAILS

The details entered below are automatically shown on the cover and the main page footer. PLEASE NOTE: This table must NOT be removed from this document.

Document title	Omai Gold Mine Project
Document subtitle	Project Summary
Reference (PN)	0787707
Date	23 September 2025
Version	A.1
Author	Lauren Auclair
Client name	Avalon Gold Exploration Inc.

DOCUMENT HISTORY

				ERM APPROVAL TO ISSUE		
VERSION	REVISION	AUTHOR	REVIEWED BY	NAME	DATE	COMMENTS
01	000	L. Auclair, K. Misir	B. Summons	C. Leseigneur Torres	24/07/025	Draft for Avalon
01	001	As above	B. Summons	I. Bopp / C. Leseigneur Torres	27/08/25	Final Draft
01	002	As above	B. Summons	I. Bopp / C. Leseigneur Torres	04/09/25	Final Draft
A.1	n/a	R. Tarbuck	L. Auclair			Final

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ACRONYMS AND ABBREVIATIONS

AOI	Area of Influence
CIL	Carbon-in-Leach
EPA	Environmental Protection Agency
ERM	Environmental Resources Management
GGMC	Guyana Geology and Mines Commission
LOM	Life of Mine
MSMP	Mining Medium Scale Mining Permit
OMGL	Omai Gold Mine Limited
PEA	Preliminary Economic Assessment
PL	Prospecting License
SSMC	Small Scale Mining Claim
STP	Sewerage Treatment Plant
TSF	Tailings Storage Facility
TWSR	Treated Water Storage Reservoir
VOC	Volatile Organic Compounds
VOIP	Voice Over Internet Protocol
WSF	Waste Storage Facility
WTP	Water Treatment Plant

PROJECT SUMMARY

1. PROJECT SUMMARY

This Project Summary describes the development, operational, and closure stages of the Omai Gold Project, a mining exploration property planned to be developed in Region 7, the Cuyuni-Mazaruni region of Guyana ("the Project").

1.1 PROJECT BACKGROUND AND OVERVIEW

Mining at Omai began in the 1880s. A German mining syndicate was active at the site for more than a decade at the start of the 20th century. By 1911, over 115,000 ounces of gold had been produced. From 1993 to 2005, Omai became the largest gold mine in the Guiana Shield. This large mining and mineral processing operation produced 3.7 Moz of gold from 80 Mt of mineralized material at an average grade of 1.5 g/t Au, primarily from the Wenot and Fennel Pits. Peak annual production of 354,300 ounces of gold was reached in 2001 (Cambior Annual Report, 2005). Production ceased in 2005. Subsequent historical preliminary exploration in 2006 and 2012 below the Fennel (re-named Gilt Creek) pit and around the Wenot pit, demonstrated that much gold remains in the ground. A thick, shallow-dipping and younger mafic dike encountered at a 250 m depth at the bottom of the Gilt Creek Pit may affect the depth potential for new open pit discoveries in some areas. This mafic sill was only encountered recently in drilling at Wenot at a depth of between 480 m-530 m below surface at Wenot and is deeper to the west.

Exploration has been conducted on the Omai PL by Avalon Gold since 2019, resulting the identification of over six and one-half million ounces of gold resources, and achieving key milestones that have significantly advanced the project. The Company has conducted diamond drilling on the property for much of the last four years, as well as exploring several areas of the property with mapping, trenching, and sampling. Four successive Mineral Resource Estimates have been completed, verified by independent consultants and filed in compliance with the Canadian Securities Regulators.

Exploration across the Omai PL by Avalon Gold has identified three main additional target areas holding high potential for new economic satellite deposits that will be further pursued with the next work programs. There will be an underground mine, Gilt Creek, that is access via a ramp located within 200m of the planned Mill site, west of the past-producing Fennel pit.

The work programs are designed to advance the Wenot and Gilt Creek deposits towards a combined definitive mine plan and to work on the additional exploration targets to identify potential higher grade, near surface economic satellite open pit gold resources in new areas on the property.

1.2 PROJECT LOCATION

The Omai Prospecting License (PL) is in the Essequibo Region, Potaro Mining District, approximately 160 km SSW of Georgetown, 75 km SSW of Linden (Figure 1) and 48 km ENE of Mahdia.

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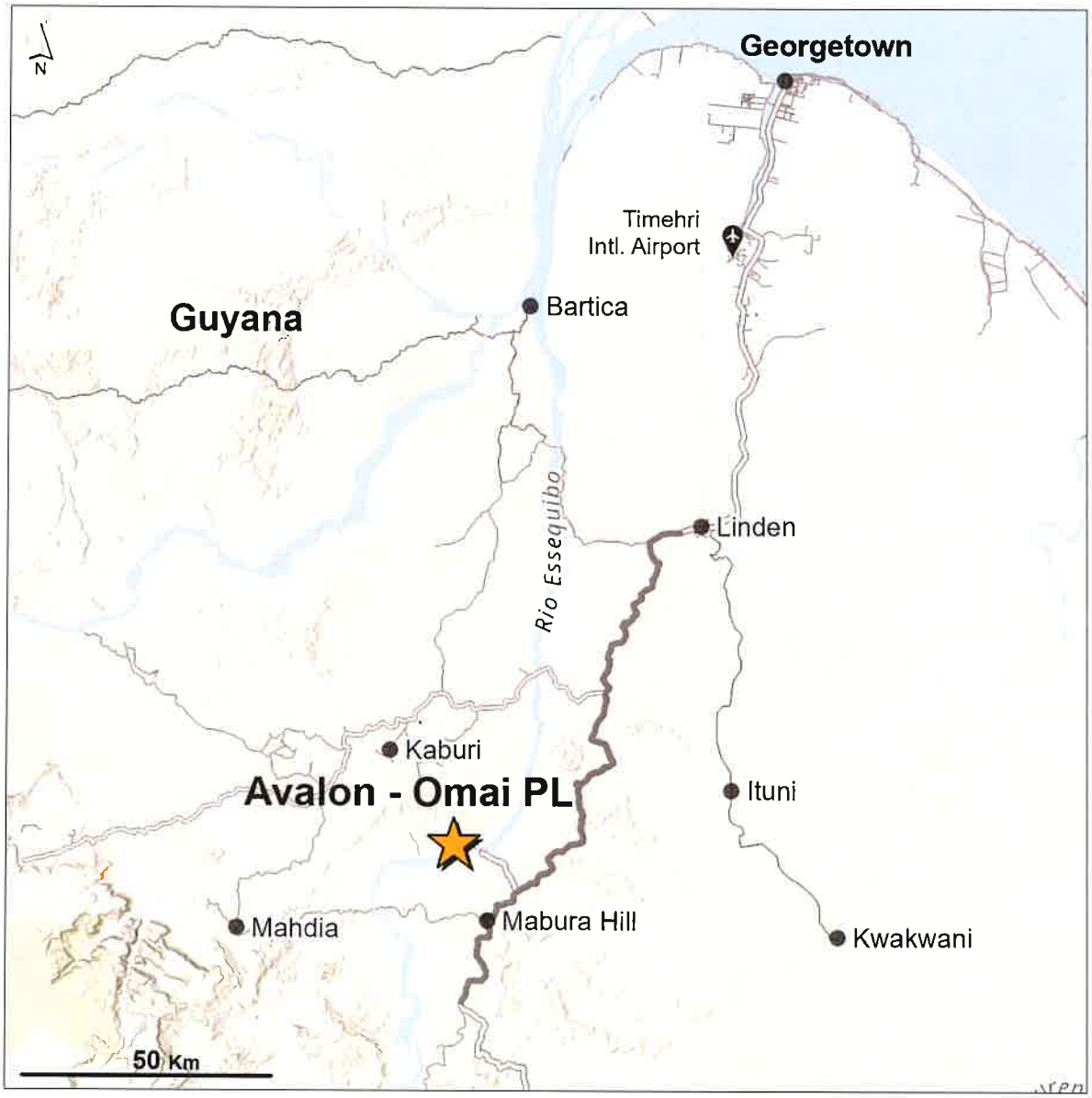
FIGURE 1 LOCATION OF THE OMAI PL



The PL is accessible by road from Georgetown by 4WD vehicle or truck in approximately 3.5 to 5.5 hours. The route is via asphalt road from Georgetown to Linden, then a laterite / sand trail to just past Mile 58 on the Linden to Mabura road, then an 8 km long side road that goes to the Omai Crossing where a pontoon barge, operated by Mekdeci ferries passengers and vehicles across the Essequibo River directly onto the Omai PL. With construction to upgrade the Linden-Mabura Road well underway, travel time by road has been reduced and there will be less frequent need for air travel. This will assist in the transportation of employees and supplies in the future and mobilization of equipment during the construction phase at the Omai property.

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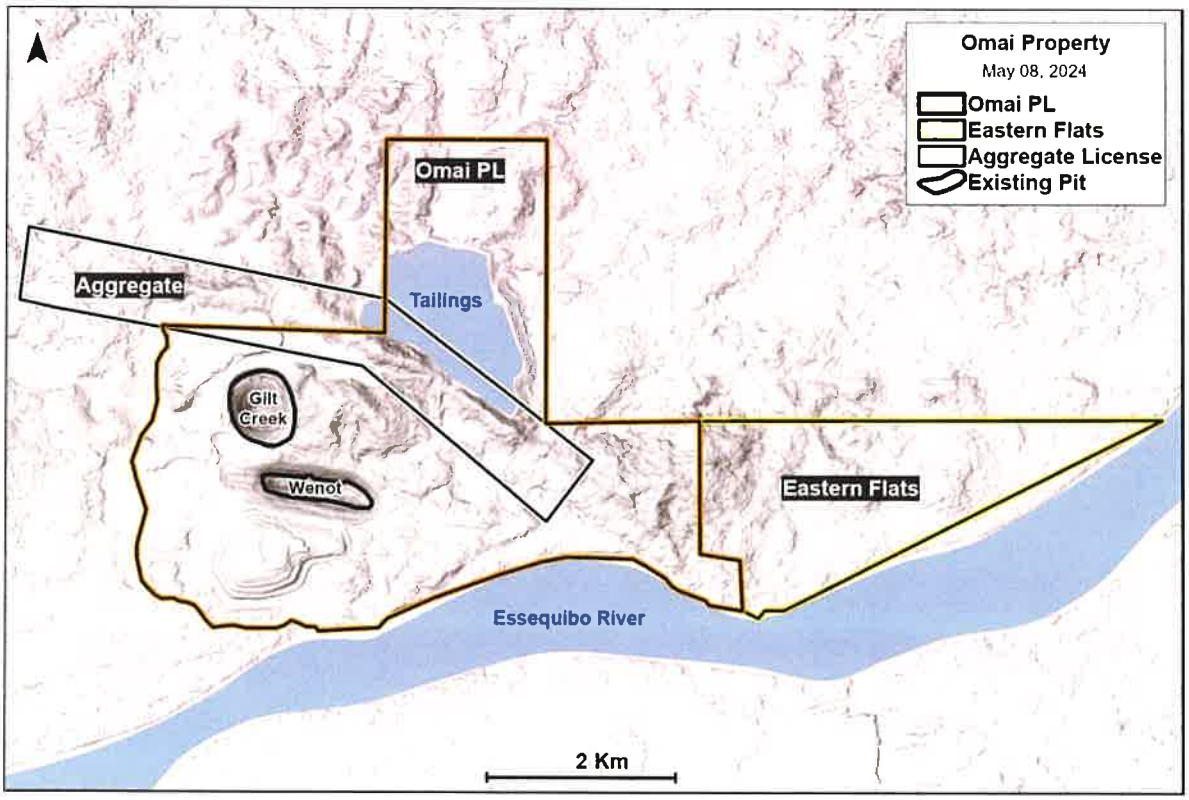
An alternative route to Georgetown is via a poor sand trail that connects northward to Bartica-Potaro Road through the PL. A 1-km long airstrip is located within the PL, east of the Wenot Pit. Omai is about a 40-minute flight from Georgetown from the Ogle Airport. This airstrip was officially re-certified in 2022 and continues to be inspected by the Guyana Civil Aviation Authority annually.

1.3 PROJECT DESCRIPTION

The Omai PL covers 4,590 acres (1,857.6 hectares) in the Potaro Mining District (Figure 2). An Omai PL was granted on April 25, 2019 (GGMC PL#01/2019 in file GS14: A-1001/000/18), pursuant to a Trust Deed signed December 24, 2018. It was renewed and replaced by GGMC PL#03/2024 in file GS14: A-1009/000/24, granted on April 29, 2024. It is described as a tract of state land in the Potaro Mining District No. 2 as shown on Terra Surveys Topographic Map 44NE at scale 1:50,000 located at the confluence of the Essequibo River and the Seballi Rivers with geographic coordinates of Longitude 58° 42'40.09" W and Latitude 5° 25'20.262"N, also known as the Omai Prospecting License ("Omai PL"). The Omai PL is shown in Figure 2 as it appears on the GGMC map, with several overlapping aggregate claims, the status of which is largely unconfirmed.

FIGURE 2 OMAI PROSPECTING LICENSE PL 01/2024



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The Project also includes the "Eastern Flats" area. The Eastern Flats consists of two Mining Permits – Medium Scale (MPs) adjoin the Omai PL to the east. They consist of 1,519 acres (614.7 hectares) along the main trend of mineralization seen in the Wenot Pit. These MPs are described as: GS23:G1039/000/2020 covering 719 acres and GS23:G1039/001/2020 covering 735 acres. They are bounded by the Essequibo River on the southern boundary. They were acquired December 22, 2021, held in trust through a Guyanese company.

The initial Omai PL granted April 25, 2019 was renewed for a one-year period prior to the initial April 25, 2022, expiry date and was subsequently permitted to renew the license for an additional one-year period in 2023 and the GGMC approved the license renewal on February 24, 2023, for the additional one-year period to April 27, 2024. In consideration for the license, Avalon agreed in 2019 to pay the GGMC an aggregate fee of US$4 million to secure the Omai PL and by April 26, 2022, the entire amount had been paid. The permit PL 01/2024 granted on April 29, 2024, is active until April 29, 2027, with two one-year possible extensions. The boundaries can be seen on Figure 2.

The Prospecting Licence covers the historical Wenot Pit and Gilt Creek (Fennel) Pit, the "Boneyard" and "Broccoli Hill", the historical stockpiles and most of the No. 2 tailings facility, and the areas of historical mine infrastructure and their immediate surroundings, including an airstrip. The licence covers all exploration activities as stated in Section 32(1) of the *Mining Act* (Act No. 20 of 1989).

The Omai Prospecting Licence, when granted, was overlapped by a Prospecting Licence ("PL") for aggregate that appears to have been converted to a Quarry Licence in 2021, held by Metallica Commodities Corp. Guyana ("Metallica"). Metallica has the right to quarry aggregates within the bounds of their Permit, so long as they have a legal permit to do so, and to use certain buildings within the bounds of the Omai PL without interference (GGMC et al., 2018). Metallica has made applications to GGMC for additional aggregate permits overlapping the Omai PL and including the historical tailings and tailings dams. Under the provisions of the Deed and written instructions GGMC provided to Metallica, the approval of such additional aggregate rights would require permission from the holder of the Omai PL. Such permission has not been requested, nor granted. GGMC approved the overlapping permits in August 2023, and the Company is contesting their validity.

The GGMC's Land Management Division refers to the Omai PL as Block A-1009/000/24. The licence grants Avalon the "exclusive right to occupy for the purpose of exploring for gold, base metals, precious metals and precious stones" (GGMC, 2024). This confers legal rights of access and occupation by the holder or their agents for the purpose of exploration; it does not confer any surface rights except occupation as described therein. According to Section 35(1) of the *Mining Act*, the Omai PL is valid for three years from the date of grant and can be extended for an additional two years (i.e., from April 29, 2027).

1.4 RESOURCE INFORMATION

The table below summarizes the indicated and inferred resources for the Wenot and Gilt Creek Deposits based on drilling. Work completed by the Company since 2020 has focused on the Wenot deposit as it is potentially amenable to open pit mining methods, with potential for later underground mining. Newly identified Wenot resources are almost exclusively fresh rock since historical large- and small-scale miners removed much of the surficial alluvium and saprolite

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material. The new gold resources at Wenot are mostly from a 50m depth extending to 500 m depth and most likely deeper, all inaccessible to small scale miners.

Gold mineralization of the Gilt Creek Gold Deposit is potentially amenable to underground mining methods, with unmined mineralization starting relatively shallow, at a depth of approximately 275 m below surface. A study of previous drill data was also completed from the Gilt Creek deposit (located beneath the past-producing Fennel pit) which re-examined the data, remaining core, and modelled the deposit. The first ever NI 43-101 Mineral Resource Estimate was published for Gilt Creek in 2022. More recently, a long 1,148 m drill hole through the Gilt Creek deposit was completed in late 2024 and a second long hole commenced in May 2025. These holes will provide verification of the mineralization but are also important for rock mechanic studies and metallurgy for underground mining. These drill results were very favourable but have not been integrated into an updated Mineral Resource Estimate as yet. The nature of the geology suggests that the Gilt Creek deposit may extend to much greater depths similar to Rory's Knoll which is much smaller in diameter but is known to 2 km depth still containing mineralization. The economics of extraction and processing of the Gilt Creek deposit at greater depths may exceed the value of the recoverable gold. The summary of resources is provided in Table 1.

TABLE 1 SUMMARY OF RESOURCES

Deposit	Indicated (tonnes)	Inferred (tonnes)	Grades (gt/Au)
Wenot Open Pit	20,700	63,400	1.46, 1.82
Gilt Creek Underground	11,123	6,186	3.22, 3.34

1.4.1 WENOT

A series of subparallel, vertically dipping gold zones extending along a strike of at least 2.4 km have been identified based on recent drilling combined with historical drilling and production data. The geology is consistent with an orogenic shear-hosted gold deposit. Combined with historical drilling data and blast hole data from the previously mined pit, a fourth Mineral Resource Estimate was completed in August 2025 which incorporates in total, results from 639 drill holes totalling 110,920 m and 12,028 assays within the mineralized wireframes. This is the fourth Mineral Resource Estimate completed since the permit was granted in 2019.

To complete the study, gold grades were interpolated into 2.5 m (z) x 1.25 (N-S) m x 2.5 (E-W) m three-dimensional model blocks from capped composites within wireframes constrained by a 0.30 g/t Au cut-off grade. Indicated Mineral Resources were interpolated from a minimum of two drill holes over a 50 m search ellipse and Inferred Mineral Resources were interpolated from a minimum of one drill hole over 150 m search ellipse parameters. Block model gold grades were validated against raw assays, composites, and Nearest Neighbour and Ordinary Kriging grade interpolations. Operating costs utilized in the cut-off grade calculations were taken from a comparable project. Process recovery was taken from documented historical production data. The MRE calculation used a US$2,500/oz gold price, an industry estimate of the long-term gold price. The additional 32,000 m of diamond drilling completed in 2024 and 2025 to date, resulted in a near-doubling of the gold resources within the Wenot deposit from 2.4 million ounces to 4.7 million ounces.

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1.4.2 GILT CREEK

The Gilt Creek gold deposit is the continuation at depth of the original gold deposit known as the "Omai Stock" that was mined by open pit, previously known as the "Fennel pit". The Omai Stock is an intrusive rock body, roughly in the form of a cylinder that can be expected to extend to great depths due to the geology. The historic open pit mining at the Fennel pit continued to a depth of 250 m, bottoming at a known diabase (dolerite) dike, as expected. After mining ceased, extensive drilling at depth below the dike identified the extension of the gold deposit, as expected. The Gilt Creek gold Deposit is currently known to extend from a depth of 275 m to at least 967 m. This can be accessed by a ramp from a low footprint portal at surface, to allow underground mining. The bulk of the current Gilt Creek Mineral Resource Estimate lies at depths between 275 m to 600 m.

The Gilt Creek Mineral Resource is made up of a total of 11 individual mineralized domains within the Omai Stock, based on combined historical drilling of this lower zone and production data from the overlying Fennel Pit. The Gilt Creek Mineral Resource Estimate incorporates 7,056 assay results from 46 diamond drill holes totalling 27,997 m within the mineralized wireframes. Gilt Creek drilling of this lower zone was completed between 2006 to 2008 with an additional deep hole drilled from surface in late 2024, and a second deep hole that is expected to be completed in September 2025.

Gold grades were interpolated into 5 m x 5 m x 2.5 m three-dimensional model blocks from capped composites within wireframes constrained by a 1.5 g/t Au cut-off grade. Indicated Mineral Resources were interpolated from a minimum of two drill holes over a 25 m search ellipse. Inferred Mineral Resources were interpolated from a minimum of one drill hole over 75 m search ellipse parameters. Block model gold grades were validated against raw assays, composites and Nearest Neighbour and Inverse Distance Squared grade interpolations. Operating costs utilized in the cut-off grade calculations were taken from a comparable project. Process recovery was taken from documented historical production data. A US$1,700/oz gold price was sourced from the Consensus Economics Inc. long-term nominal forecast in September 2022.

The Mineral Resource Estimates of Gilt Creek are reported with an effective date of February 2, 2024. The mineralization of the Gilt Creek Gold Deposit is therefore considered to be potentially amenable to underground mining methods. Access is by a small footprint portal to be located immediately north of the Mill complex with a spiral ramp to facilitate large stope underground mining. The underground access design for Gilt Creek can facilitate the later underground mining at depth below the nearby Wenot deposit, located only 500m to the south.

1.5 PROJECT ACTIVITIES CONDUCTED TO DATE

1.5.1 EXPLORATION HISTORY

The Omai Gold Property area has been subjected to exploration and production since at least the 1880s and Table 2 summarizes the history of exploration and mining to date.

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TABLE 22 HISTORICAL WORK CONDUCTED IN THE OMAI AREA

Period	Company	Work Completed
1889 to 1896		1,870 kg (60,000 oz) of gold recovered from saprolite and alluvium at Fennel (GGMC, 1990, Guyana Chronicle 1890).
1896 to 1907	"German Syndicate	Diamond drilling and tunnelling along quartz-scheelite veins of the "Arzuni Reef" (Harrison, 1908; probably in the Omai Stock; 19,000 kg (61,200 oz) of gold produced.
1911	Local Prospectors	460 kg (14,800 oz) of gold produced by local agents
1937	Ventures Ltd. (Toronto)	Exploration and possible production; no records available.
1947 to 1950	Anaconda British Guiana Mines Ltd.	Detailed surface and underground exploration; bulk sampling plant installed.
1950 to 1985		Few records of work at Omai during this period
1985 to 1987	Golden Star Resources Ltd.	Mapping, sampling and diamond drilling programs
1987 to 1990	Golden Star Resources Ltd. and Placer Guyana Ltd (Placer Dome Inc. subsidiary	Joint Venture ("JV") between Placer (Guyana) Ltd and Golden Star Resources Ltd. Investment in onsite infrastructure, including sample preparation facility, followed by exploration program and mineral resource evaluation. Mineral agreement negotiations led to end of JV; Golden Star approached Cambior (of Val-d'Or, Québec) to proceed with the development of the Property. Wenot Zone discovered in 1989 (GGMC, 1990)
1990 to 1994	Cambior Inc.	Cambior, exploration: stream sediment geochemistry, bank, profile, and grid auger sampling and MMI (Mobile Metal Ion) geochemical sampling around the Wenot and Fennel Pits and extending to the eastern border of the Omai licence. Cambior Inc. created Omai Gold Mines Ltd ("OGML") to have a Guyana-based company operating the Project. Production began in 1993. "Ore Reserves" at the start of production were given as 44.3 Mt at 1.60 g/t Au (2,270,000 oz) (GGMC, 1993)
1994 to 2006	Omai Gold Mines Ltd	OGML (Cambior) completed a "bankable feasibility study". 394 drill holes (60,486 m) were completed in the Fennel area and 3,800,000 oz of gold (80 Mt at 1.5 g/t Au) produced from Wenot and Fennel Pits. Tailings dam failure in 1995; six-month shut down during investigation period. Production continued until 2005. Wenot and Fennel Pits mined to maximum depths of ~190 m and ~250 m, respectively. Minimal exploration completed outside immediate pit environment due to low gold prices. Cambior acquired by IAMGOLD in 2006.
2006 to 2007	IAMGOLD Corporation	Exploration drilling of "Fennel Deep" target beneath Fennel Pit, including hydrogeological investigations. Resource calculated.
2012 to 2017	Mahdia Gold Corp.	LiDAR survey, drilling of Wenot Deep, Wenot West and Fennel Deep targets, and review of IAMGOLD drill core for exploration and to confirm IAMGOLD'S results. Joint Venture Agreement with Roraima Investment and Consulting Services Inc. to develop alluvial gold targets on Property.

Period	Company	Work Completed
2019 -2025	Avalon Gold Exploration Inc.	Exploration drilling focused on Wenot 'Superpit' expansion along strike, at depth, expanding new wide zones, drilling "gaps" within Wenot PEA Pit – high impact, high-grade, near-surface targets potential at-surface starter pits, drilling at Gilt Creek towards inclusion in updated PEA, Gilt Creek engineering, focused metallurgical test work planned, dewatering, tailings study and planning, and permitting process

1.5.2 DRILLING

1.5.2.1 WENOT

The main conclusions from the Omai Gold 2021, 2022,2023, 2024 and 2025 drill programs focused on Wenot are as follows:

- The Wenot shear-hosted gold deposit extends further along strike, on the flanks and at depth from the small historic open pit. The gold mineralization extends to far greater depths than previously known. Gold mineralization at economic grades have been identified along a strike of 2.5 km, across a width of up to 350m and down to depths of at least 500 m.
- Previous mining was constrained by a low gold price and a lack of exploration work to extend the operation. As a result, current drilling identified significant gold mineralization even at shallow depths between 50 m and 300 m depth in adjacent parallel zones. 60% of the 4.7-million-ounce gold resource at Wenot lie between 50m depth and 350m depth and in fresh rock, inaccessible by small scale miners, and requiring mill extraction.
- The overall size, grade and configuration of gold zones delineated at Wenot appear sufficient to sustain a very long-life, large scale gold operation, with the Company targeting an initial 18-to-20-year mine life, but likely extendable beyond this.
- Consistent with this type of gold deposit, the gold grades and widths of zones at Wenot appear to increase with depth which is beneficial as open pit mining costs increase as mining gets deeper. In late 2024, a body of higher grade, wide zones within the Wenot deposit suggest that it could support underground mining later during the mine life.
- Drilling has identified extensions to the east and west of Wenot but with lower concentrations of gold zones. Drilling will continue to explore the possibility of satellite pits in these areas, although the limited size of the property precludes work to the west and certain limitations to the east related to river dredgers and porknocker activities.

1.5.2.2 GILT CREEK

The main conclusions from the Gilt Creek drilling in 2024 and 2025 are as follows:

- Although the Gilt Creek gold deposit had been defined as hosting 1.8 million ounces of gold grading an average of 3.3 grams per tonne gold, drilling has already shown that the size and extent of the gold-bearing Omai stock is wider than previously known, even at relatively shallow depths.
- The majority of the Gilt Creek Mineral Resource Estimate is at depths between 275 m and 600 m and the historic drilling and known geological model support this continuing to greater depths. Drilling from surface to these greater depths is not economically viable so

this additional work to extend the Gilt Creek deposit deeper needs to be done during operations, once the underground mine access is developed.

- Similar to Rory's Knoll at the Aurora Mine (Zijin) that extends to a depth of 2 km, the Gilt Creek deposit will likely extend to great depths as well. Depending on gold price and gold grades within the deposit, Gilt Creek could be much larger than currently known and support a longer mine life. Gilt Creek has the advantage of being much larger at almost 500m across whereas Rory's Knoll is approximately 150m across.

1.5.3 DEWATERING

In order to re-start and expand operation of the historic Wenot Pit, the water level will need to be lowered as soon as possible to allow completion of feasibility stage work. This operation has been permitted by the EPA in November 2024 (Reference # 20240711 AGEME). Former mine roads on the property, now used for various overlapping industrial activities, preclude secure installation and operation of dewatering equipment and pipelines. Full engineering plans are completed, ready to proceed with dewatering.

Once the Wenot pit water level is significantly lowered, final feasibility work will be completed and later in the process, the tailings at the bottom will be removed and deposited in the Fennel pit, either by truck or slurry.

The Fennel Pit will also be dewatered to a significant extent to accommodate capacity needs for tailings deposition, with water removal using the same technique as applied in Wenot. Two recent comprehensive water studies show that both the Wenot and Fennel Pit water quality meet international and Guyana discharge criteria with no exceedances.

Some residual waste rock and embankment slumpage is expected in the bottom of the de-watered Wenot Pit and may not respond to dredging. This will be loaded and trucked out. The Wenot Pit tailings and other solid material, when settled out, are expected to occupy less than half of the volume of the Fennel Pit.

1.5.4 ENVIRONMENTAL STUDIES

Several gold mining operations were active at Omai over the last century. The most successful mining operation was that of Omai Gold Mines Ltd ("OGML"), which operated a high tonnage mining and processing operation from 1993 to 2005. OGML closed the site in 2006-2007 to standards acceptable to Guyana Government Agencies. The site was thereafter relinquished by IAMGOLD Corporation to the Guyanese government in 2007. The Omai site could be currently described as a significantly disturbed brownfield site, mainly as a result of the major mining and mineral processing activities (and partly because of the subsequent high-intensity small-scale artisanal mining).

In February 2012, preliminary water samples were collected from the Wenot and Fennel Pits and at the confluence of the Omai and Essequibo Rivers for chemical analysis (AMEC, 2012b). Results indicated no deleterious contents of cyanide, arsenic, cadmium, chromium, lead, mercury, or other metals that exceeded threshold concentrations of the International Finance Corporation ("IFC") Effluent Guidelines or Canadian Council of Ministers of the Environment ("CCME") Water Quality Guidelines for the Protection of Aquatic Life (AMEC, 2012b). Even though the samples were taken from various locations on the Omai Property, these initial results were not considered to be a comprehensive assessment of the entire Property.

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An initial Environmental Baseline Assessment was completed on the Property in January 2021 which included a flora and fauna study and also incorporated a surface water and sediment study. This study concluded that there were no recognized critically endangered and threatened species on the property. The extensive historical site disturbances leave a site without undisturbed natural environments over much of the property.

A comprehensive water study was contracted in late 2023, focused on the Wenot and Fennel Pits, with sampling of the nearby Essequibo River. Results again showed no concerning values and concluded results were well below accepted water quality objectives for the protection of aquatic life.

Sampling of the Wenot and Fennel pits was completed in 2023 resulting in an interim permit (Reference # 20240711 AGEME) being granted by the EPA in November 2024 for the dewatering of the Wenot pit and this permit is valid until October 2026. The permit conditions focus on authorizing the commencement of pit dewatering and related preparatory activities at the Wenot open pit. Essential conditions include clear water quality compliance, completion of an approved EIA, and community engagement. As stipulated by the permit, treated effluent at the permitted discharge points are expected to be in alignment with the Guidelines for Effluent Discharge into the Environment, US EPA Water Quality Criteria and IFC (World Bank) Water Quality standards and applicable GGMC guidelines. The parameters outlined along with accompanying acceptable levels consists of pH, Total Suspended Solids (TSS), Oil and Grease, Chemical Oxygen Demand (COD), Biological Oxygen Demand (BOD), Temperature, Turbidity, Ammonia (NH_3), Phosphorus (P), Total Iron (Fe), Arsenic (As), Zinc (Zn), Lead (Pb), Nickel (Ni), Cadmium (Cd), Copper (Cu) Chromium (Cr) and Cyanide limits.

The permit also outlines management of air, noise, fuel, soil and land, biodiversity and waste management and mitigation measures.

In late 2024 an additional systematic sampling and surveying was completed of the water in the Omai Wenot pit and other drainage systems on the Omai property and in particular along the Omai Creek that forms the western and southwestern boundaries of the PL. Additional samples were collected from the Essequibo River. This included sampling for an extensive suite of metals and in-situ water quality parameters, recorded with a submersed multi-parameter water quality analyser. In the 2023 study, the water chemistry of the Wenot and Fennel pit waters were characterized to depth by the collection and analysis of water at 7 sample stations and 36 depth interval locations, to a maximum depth of 190 m at the Fennel pit and 65 m at the Wenot pit. The water chemistry results, when compared to established surface water quality objectives show no exceedances. In particular, all arsenic, cadmium, chromium, cyanide, copper, lead, mercury, nitrate and sulphate results were well below accepted water quality objectives for the protection of aquatic life. All cyanide data was reported below the method detection limit of 0.002 mg/L. and all mercury data was reported to be <10 ng/L. Both the Wenot and Fennel pit waters, from surface to the bottom, are very clear (very low TSS and turbidity), well oxygenated, slightly alkaline (average pH=7.8) and contain very low concentrations of all deleterious metals.

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1.5.4.1 ENVIRONMENTAL BASELINE ASSESSMENT 2021

An initial Environmental Baseline Assessment was completed on the Property in January 2021 by L. Kalicharan. The study included gathering, analysing and quantifying environmental parameters (physical and biological) within the Project area. Water, sediment and biodiversity surveys were undertaken from January 3rd to 15th 2021 at the Omai Gold concession. Surface water and sediment sampling were conducted, and inventoried plants and animals (fishes, birds, herpes and mammals) to identify any endangered, rare and threatened species at six different localities. The biodiversity assessments show that the Omai Concession contains a rich biodiversity and did not exhibit any critically endangered and threatened species.

1.5.4.2 WATER QUALITY BASELINE ASSESSMENT 2021, 2023 AND 2024

The 2021 study also included a baseline water quality survey of surface waters. Eleven sites were sampled across the Omai PL. Both water and sediment samples were dispatched to Actlabs Guyana Inc. (ISO 9001: 2015) on January 16, 2021, for analyses.

The level of heavy metals (Hg, Cd, Zn, Pb, Cr, Ni, As, Cu and Co) detected in surface water samples were at concentrations below the IFC EHS effluent standards. Total suspended solids ("TSS") did exceed the IFC EHS standards at two sites in the Omai River basin, undoubtedly influenced by small-scale mining activities. The surface waters in the Wenot and Fennel Pits contained TSS and metals below the standards. No cyanide or hazardous organics measurements were reported.

In late 2023 and again in late 2024, systematic water sampling and surveying of the water in the Omai Wenot and Fennell pits was undertaken. This included sampling for an extensive suite of metals and in-situ water quality parameters, recorded with a submersed multi-parameter water quality analyser. Hence, the water chemistry of the Wenot and Fennell pit waters have been characterized to depth by the collection and analysis of water at 7 sample stations and 36 depth interval locations, to a maximum depth of 190 m at the Fennell pit and 65 m at the Wenot pit.

The water chemistry results, when compared to established surface water quality objectives show no exceedances. In particular, all arsenic, cadmium, chromium, cyanide, copper, lead, mercury, nitrate and sulphate results were well below accepted water quality objectives for the protection of aquatic life. All cyanide data was reported below the method detection limit of 0.002 mg/L. and all mercury data was reported to be <10 ng/L. Both the Wenot and Fennell pit waters, from surface to the bottom are very clear (very low TSS and turbidity), well oxygenated, slightly alkaline (average pH=7.8) and contain very low concentrations of all deleterious metals.

The Omai Creek, that demarks the western boundary of the Omai PL has seen previous and current aggressive alluvial mining by third parties. Also, the Omai Creek drains the area to the northwest, known as Grannies or Quartz Hill, an area currently the focus of extensive small-scale mining. However, the deleterious metals such as arsenic, cadmium, chromium, lead and cyanide in all water samples were either not detected or well below established water quality guidelines (WQGs) for the protection of aquatic life. The minor exceedances of WQGs for aluminium, copper, iron and zinc are probably related to the deeply weather landscape on the property and not of point source origin.

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The variation in many metal concentrations is likely mostly related to pH, which is typically acidic (average of 4.55). Omai Creek did however, return two mercury exceedances in water, out of 9 samples taken along the length of the creek. The average Hg concentration in water was 68 ng/L (compared to an average of 24 ng/L in other Omai area creeks). This is most likely caused by artisanal mining activities that are using Hg to capture gold. Otherwise, Omai creek water has naturally high Fe, Al, turbidity, but low concentrations of deleterious metals, with the exception of a few weak base metal (Cu and Zn) exceedances.

Omai Creek sediment chemistry largely reflects the deeply weathered saprolite and laterite landscape of the area, although contributions from artisanal mining activities (washings of fine sediment), and/or the tailings spill circa mid-1990s may be a component of the signal. However, on average, Omai Creek sediment contains lower concentrations of most metals, compared to other creeks on the Omai property. Deleterious metals, such as arsenic, cadmium, lead, mercury and zinc were all below established sediment quality guidelines (SQGs). The acidic water pH (average=4.55) of Omai Creek is a significant variable that keeps many metals in solution rather than precipitating or adsorbing onto sediment. Therefore, the metal loadings in sediment along the Omai Creek do not present a concern.

The results of the creek water chemistry on other creeks on the Omai property are largely considered a natural outcome from the deeply weather landscape. Average pH was 6.5, consequently, average metal concentrations in water were mostly lower than in Omai Creek, including significantly lower Hg, with an average of 24 ng/L. Arsenic, cadmium, chromium, lead and cyanide in all waters were either not detected or well below established water quality guidelines (WQGs) for the protection of aquatic life. The only metal exceedances were for iron, which returned an average of 1346 ug/L, which is slightly higher than determined in Omai Creek (Fe average = 767 ug/L).

It should be noted that most Omai property creeks, compared to Omai Creek, are much smaller in size, and have significantly smaller drainage catchments, many of which flow across gold mineralized zones or mafic rocks of the greenstone belt. The results of the creek sediment chemistry on the Omai property are largely considered a natural outcome from the deeply weather landscape. Cadmium, lead and zinc in all sediments were either not detected or well below established sediment quality guidelines (SQGs). Exceedances of SQGs were detected chromium, iron, manganese, mercury and nickel. However, there are only a handful of Fe, Mn, Cr and Ni exceedances along Omai Creek, therefore the metal signal in sediment along the Omai Creek is not concerning. Most of the Cr, Fe, Mn and Ni exceedances in sediment are from the samples collected from the smaller Omai property creeks. This is most likely due to the fact that these much smaller creeks (in comparison to Omai Creek) have smaller watersheds confined to mafic geology (and deeply weathered bedrock) that in many cases dissect mineralized areas prospective for gold. Thus, comparing these creeks to Omai Creek is not appropriate. Also not appropriate is comparison to the sediment quality guidelines from non-tropical jurisdictions, particularly for the metals Cr, Fe and Mn.

1.5.4.3 FLORA SURVEYS

A study of the flora on the Omai Prospecting License at six sites determined the vegetation to be classified as mixed seasonal, dry evergreen and secondary forest types. Large parts of the area have been cleared, and secondary forest growth indicates that the area had been disturbed. No significantly unique species of either understory or canopy species were recorded in the 2021 survey.

1.5.5 HISTORY AND OVERVIEW

Until recently, the Property had not been subject to any significant large-scale exploration or applications for large-scale mining licences. After mining ceased in 2005 and the Property was relinquished in 2007, a significant number of local, illegal, artisanal miners (aka "porknockers") occupied the site and actively mined the surface Berbice sands, alluvial channels and surficial saprolite. This unlicensed activity has created significant forest, stream and sediment disturbances and sediment dispersion. Many water-filled pits remain over large areas, particularly west of the Property in the Omai river basin.

The Omai River, which is a large creek, is west of the historical OGML operations, and was the receiver of a tailings spill in 1995. The cyanide-containing spillage generated national and international attention and resulted in a months-long mine shutdown and the application of strict performance criteria for permission to restore operations in 1996. The Omai River's receiver, the Essequibo River, was not measurably affected by any chemicals in the spillage, however, the visibility of red saprolite-sourced suspended solids down river raised significant public concerns.

During post-1995 OGML operations and during closure activity, pristine Omai River conditions were confirmed by rigorous water quality and biological monitoring. It is somewhat ironical that the Omai River has been allowed to be massively disturbed by artisanal activity. While most of the porknocker disturbances have been outside the boundary of the proposed new Omai Gold Project, however, some of the activities in the Omai River Channel, are within the Project boundaries.

1.5.5.1 SITE ENVIRONMENTAL CHARACTERISTICS AND CURRENT OVERVIEW

The Omai Gold Project can be described as a significantly disturbed brownfield site. The OGML mine site was closed out and reclaimed to Guyana EPA and reasonable international standards in 2007. Unfortunately, because of uncontrolled and environmentally destructive activity of small-scale miners, a small proportion of the closure and reclamation achievements were reversed. The main disturbances have been concentrated in the areas immediately east and west along the Wenot deposit and most notably in the Omai River Channel. A second area of major disturbance is at the southern boundary of the Omai PL which is along the bank of the Essequibo River. River dredgers and groups of porknockers continue incising the bank of the Essequibo River into the Omai PL.

There are two existing large water-filled open pits resulting from the historical large-scale mining. Mining in the Wenot open pit ceased in 2003 and for the last two years of production from the Fennel pit, the tailings were deposited into the Wenot pit. In total, an estimated 21.5 M tonnes of tailings were deposited into the Wenot pit. In 2005, mining had ended in the Fennel pit and excess pond water from the Wenot Pit was being discharged into Fennel. Later, after OGML operations had ended, the Fennel Pit was temporarily pumped out to permit exploration drilling from the pit bottom.

In addition to the recent exploration activity at the Project site, there exists the following nearby or onsite activities:

- Artisanal mining activity with heavy equipment in the Omai River Channel immediately west, adjacent to the Project and infringing on the westernmost area of the Omai PL Mining and processing on the Essequibo shoreline west of the Project zone

- Very active dredge action for gold recovery in the Essequibo River, east along strike of the Wenot deposit along the banks of the river, now within 50m of the access road and approaching the east end of the airstrip. (see photo).
- Excavation by Metallic CC and their subcontractors for aggregate supply and for constructing roads at other Guyana locations. The waste rock is excavated from rock piles and transported off site by truck. Aggregate extraction commenced in February 2023 with a number of overlapping permits granted by GGMC in August 2023.
- Regular road traffic along the historic Omai mine roads through to adjacent artisanal sites result in daily traffic of equipment and people. Although not historically a "public road", it has been assumed as a public road over the proposed mine site.
- Area forestry activity. There are several associations and groups conducting logging.

The past artisanal mining activity and related impacts are not expected to directly impact the Project permitting or operations. The Omai Gold Prospecting License, issued by the Government of Guyana, addressed this aspect with Article 5 – Environmental issues stating, *'AGE has full liability indemnification for all environmental issues and specifically cyanide spillage and mercury contamination caused by previous operators and artisanal miners at the Omai site'.*

The waste rock excavation and transport limits advancement of the project towards mining., GGMC has been informed of Avalon's objection to any activities that are not on legal permits, conforming to the provisions of the Deed. A similar waste rock recovery and transport operation was initiated during the latter OGML operating years.

1.5.6 TAILINGS MANAGEMENT

Tailings management at Omai was a major focus, which was significantly enhanced by the construction of a new #2 tailings facility following a dam failure of the #1 tailings embankment in 1995. The large 200 ha state-of-the-art #2 tailings facility was built in 1996 and used to manage tailings and to recycle tailings pond decant. Later, tailings were deposited in the Wenot Pit which was considered to have been mined out. Approximately 80% of process plant water requirement was met with reclaimed tailings pond water. Excess pond water was passed through a water treatment plant before being discharged via a diffuser into the Essequibo River. The treatment plant included both flocculation and peroxide capabilities. Peroxide was never used.

The #2 tailings facility will be refurbished and dams raised to accommodate the new production. An initial study confirmed that the #2 tailings dams were designed to accommodate 1 or 2 phases of dam raises. It also confirmed excess capacity within the current facility with refurbishment including the removal of embedded vegetation, which is not extensive. Evaluation work is underway and certain areas of the dams that have been disturbed by locals for road construction require drilling to test the integrity of the dams for re-use. Although most of the #2 tailings lies within the Omai PL, a small piece on the southwest corner is on "closed ground". Any refurbishment awaits confirmation that this ground is available to the Omai project; a separate submission to the EPA is being prepared by an independent firm regarding the significant environmental risks of extracting materials from the dams or contents for aggregate, as well as the cost of sterilizing the #2 tailing facility for future use. Regular monitoring is being done of third-party activities that may impact the integrity of the dams, and any concerns reported promptly to the EPA. While expansion work is being completed on the #2 tailings facility, tailings will be deposited into the Fennel pit that has capacity for approximately 45 million cubic metres.

PROJECT SUMMARY

1.6 SURROUNDING PROPERTIES

Adjacent properties contiguous with the Omai Gold Property are held by local companies and individuals. Many have active small to medium scale alluvial and saprolite gold mining activities. The Authors of this Report are not aware of any significant exploration activities in the area by other mineral exploration companies.

The closest third party gold projects of note in Guyana are: the Karouni Project (that was previously held and operated by Troy Resources Ltd; www.troyres.com.au),35 km northwest of the Omai Gold Property; the Eagle Mountain Project (Mako Mining Corp.; makominingcorp.com; previously Goldsource Mines Inc.; www.goldsourcemines.com) 35 km southwest of Omai; the Oko Project (G-Mining Ventures Corp.; www.gmin.gold; previously Reunion Gold Corporation) and (G2Goldfields; www.g2goldfields.com), 100 km northwest of Omai; and the Aurora Mine (Guyana Goldfields Inc. acquired by Zijin Mining Group Ltd. as of August 25, 2020; www.zijinmining.com), ~200 km north-northwest of Omai.

Figures 3 and 4 depict the Omai location relative to other active mining projects in Guyana which are currently in exploration or construction phases and the access route to the site along with surrounding Government projects in proximity to the PL.

Figure 5 shows the aggregate and artisanal mining activities near the PL.

FIGURE 3 OMAI PL LOCATION RELATIVE TO OTHER MINING PROJECTS

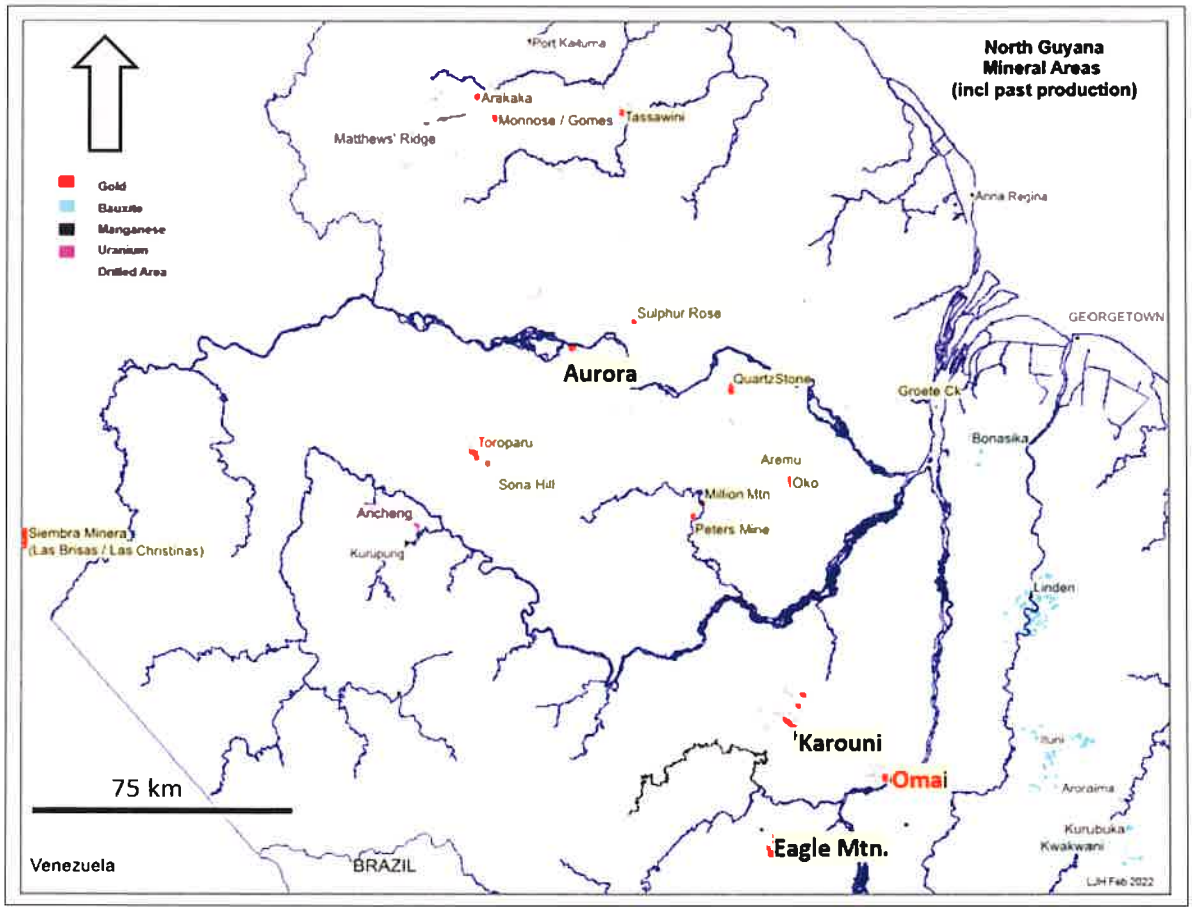

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FIGURE 4 SHOWING ACCESS ROUTE AND GOVERNMENT PROJECTS

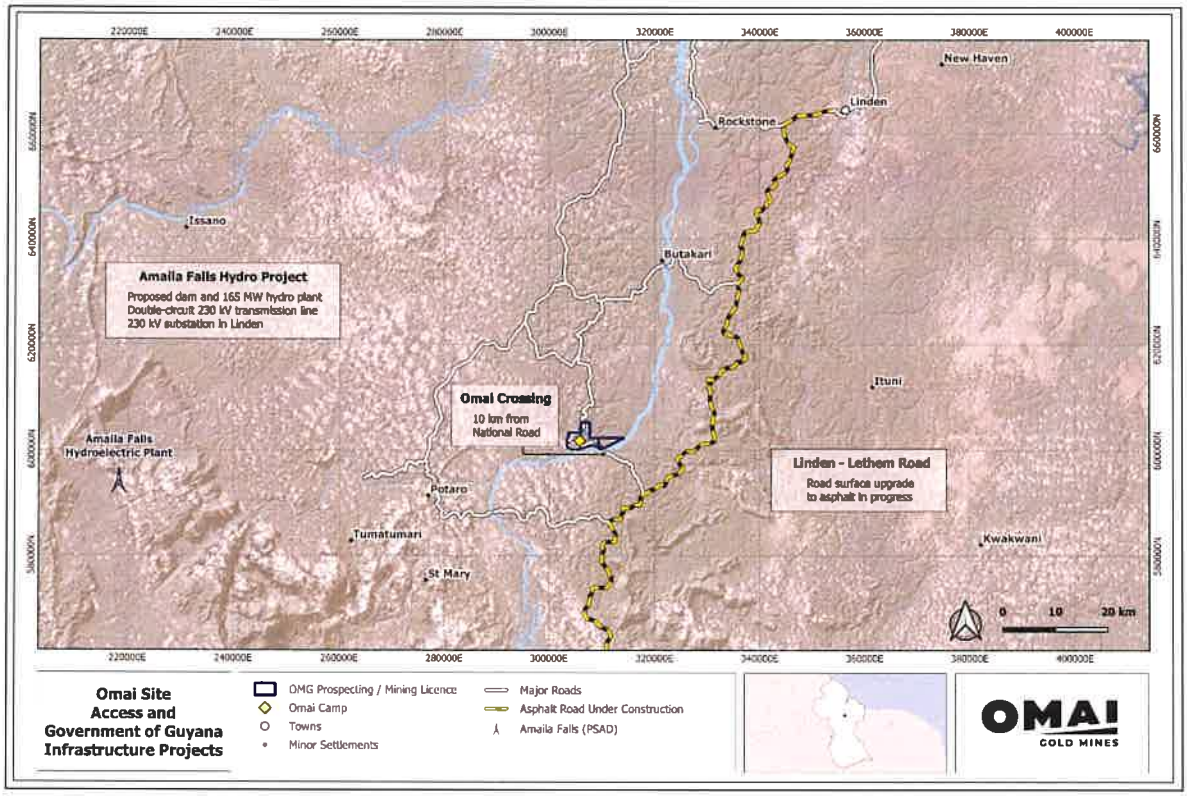
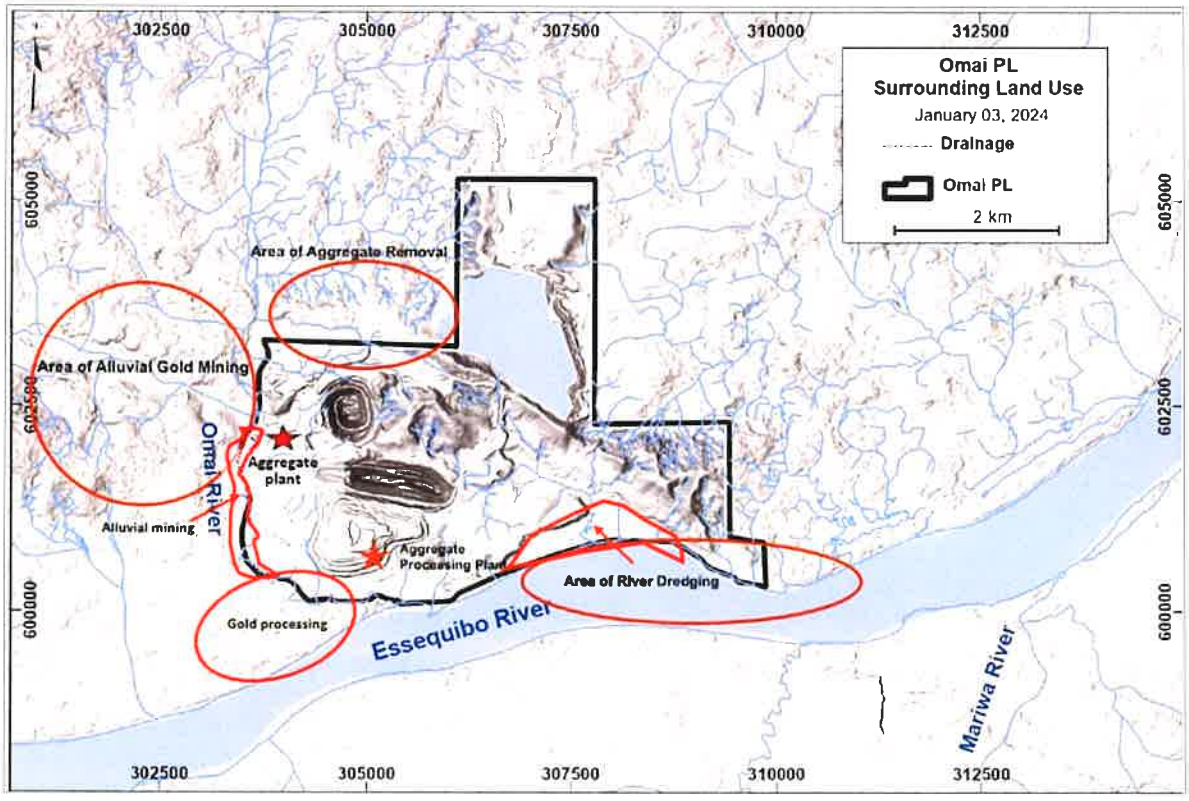


FIGURE 5 SURROUNDING LAND USE



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1.7 PRELIMINARY DESCRIPTION DETAILS AND EXISTING INFRASTRUCTURE

The local environment contains many legacy features from historical mine production and mineral processing at Omai, including the Wenot and Gilt Creek (formerly Fennel) open pit mines, tailings ponds, waste rock storage piles, concrete pads, and several buildings, including two surviving warehouses that have been re-purposed as offices, drill core logging facilities, and accommodation. A couple of adjacent buildings are occupied by Metallica. Although the processing plant and some buildings were removed, the foundation and skeleton for the office building and other buildings remain. Two barracks, a kitchen and laundry buildings were constructed in 2020, capable of housing an additional 36 workers. Additional accommodation and core storage facilities are under construction. Shallow excavations from artisanal mining activities are evident, most pronounced at the eastern and western ends, along the strike extensions of the Wenot deposit, as well as in and around the Omai Creek and extensive along the banks of the Essequibo River.

1.8 PROPOSED INFRASTRUCTURE

Major infrastructure for the Project will include a 15,000 tpd process plant with laboratory and generators for electrical power, the underground mine workings (portal, ramp and underground stope development), the Wenot Pit, the mined-out Fennel Pit for water management and storage of tailings, the #2 tailings facility (with dam raises) to be used once Fennel Pit is at capacity, East and Southwest stockpiles and waste rock storage facilities, and camp accommodation.

Other infrastructure to be installed by the Company includes an upgraded main access road and gatehouse, administration building for senior management, general and administration staff, technical staff, safety and training staff, warehouses for mechanical parts and process plant supplies, maintenance building with overhead crane for mining equipment, change room facility with showers, surface water management facility, with water and sewage treatment plants, bulk explosives storage and magazines, and a diesel fuel tank farm with a fueling station. The existing airstrip will be moved south, away from the expanded Wenot Pit, to be used for emergencies and time sensitive transport.

In summary, the new mining and processing infrastructure will be located at the Omai site includes items as listed in Table 3.

1.8.1 PROJECT PHASES

The Project includes three phases: pre-production (which includes construction, commissioning, and start-up), operations, and closure. The pre-production phase includes all activities required to build the mine and bring the processing plant into commercial operation. Operations is the phase during which the processing plant is producing gold. Closure describes the phase after production, during which the Project will stabilize the site so that it can be left in a sustainable state long-term; the closure phase ends when the Project moves into post-closure, when the Project no longer has the responsibility of maintaining or managing the site.

The key activities for the pre-production through closure phases are summarised in the generalized Project schedule presented in Table 4.

PROJECT SUMMARY

TABLE 3 MAIN INFRASTRUCTURE

Main Facilities	Other Infrastructure
• Wenot Pit; • Mined-out Fennel Pit (water management and tailings storage); • Underground mine workings (portal, ramp, underground drifts and stopes) • Process plant, laboratory with generators and electrical power distribution; • Tailings management facility ("TMF") #2 (with dam raises); • East and West waste rock storage facilities; and • New camp accommodation.	• Upgraded main access road and gatehouse; • Relocated road to replace access to Quartz Hill and Karouni – Bartica Road • Haul roads and service roads; • Relocated airstrip; • Administration building; • Mechanical parts warehouse; • Process plant supplies warehouse; • Maintenance building; • Personnel change room facility; • Surface water and sewage treatment plants; • Bulk explosives storage and magazines; and • Diesel fuel tank farm and fuelling station.

TABLE 4 GENERALIZED PROJECT SCHEDULE

Phase and Planned Timing	Activities
Pre-production (Construction, Commissioning and Start-Up) (Year 0-2)	• Creation of new camp • Relocation of "public" road crossing deposits and plant site • Relocation of airstrip • Push back of southern Wenot stockpile to accommodate expanded pit • Construction of the haul and access roads • Construction of the #2 Tailings storage facility (TSF) dam raises and Waste Rock Storage Facility (WSF) • Stripping of pit area, excavation and stockpiling of ore and soil • Dewatering of Fennel pit and slurry pumping Wenot Pit tailings to Fennel Pit • Construction of the processing plant, water treatment facilities, and supporting infrastructure • Construction of Portal and Ramp for Underground operation • Commissioning and start-up of processing plant • Construction of the explosive's storage facilities
Operations (Year 2-20)	• Mining at pit/s • Underground development works and mining • Operation of processing plant, WSF and TSF
Closure (after Operations are complete)	• Revegetation of WSF and other disturbed areas • Establishment of long-term water management at TSF • Decommissioning of processing plant and other facilities

Additional details regarding the Project phases are provided below. It should be noted that the following details are based on a preliminary conceptual design, and the design elements will be subject to further optimisation. Moreover, details on the design of mine infrastructure, specifications on equipment and machinery, and logistical plans for the Project are being studied and finalised.

1.8.1.1 PRE-PRODUCTION

The pre-production phase includes activities required to build the mine infrastructure and start-up the processing plant until it reaches at least 60 percent of its nameplate capacity, including:

- Recruitment and training.
- Construction of sediment control structures.
- Relocation and construction of roads
- Relocation of the airstrip
- Pushback of southern Wenot Stockpile.
- Stockpile preparations, etc.
- Preparation of the fuel tank storage facilities
- Earthworks and surface preparation of the WSF
- Construction of #2 TSF dam raises
- Dewatering of Fennel pit and slurry pumping Wenot Pit tailings to Fennel Pit
- Development of portal, ramp and underground development work at Gilt Creek
- Construction of the main camp, including offices and worker accommodations
- Construction of the processing plant;
- Import of major pieces of equipment such as mills, excavators, mine trucks, batch plants/crushers/conveyors/tanks; and
- Commissioning and start-up of the processing plant.

Pre-production activities will be conducted primarily with Omai Project equipment but will also utilise contractor equipment when required. As such, the Project will focus on recruiting and training supervisors, operators, and maintenance personnel to commence activities in the field as rapidly as possible.

Major earthworks will be conducted with the main mining fleet. This may include Omai's equipment and that of contractors. A smaller fleet is proposed for the construction of the temporary sediment ponds downstream of the initially disturbed areas. Part of the smaller fleet will also be working at the camp and mill site pads assisting the construction team with miscellaneous small jobs.

1.8.2 OPERATIONS

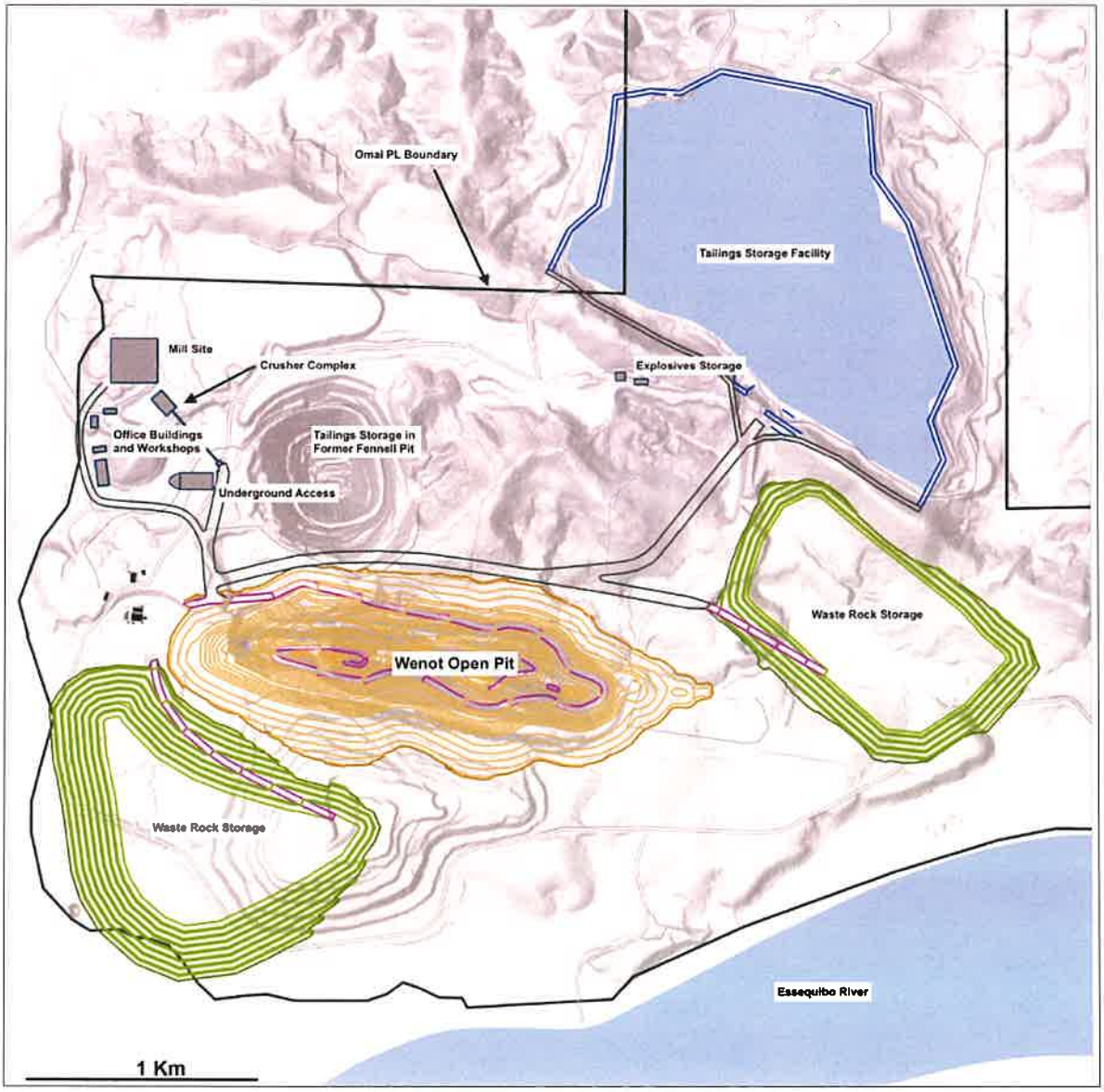
1.8.2.1 MINING

The Wenot Project consists of a historically mined near-surface gold deposit that recent work has shown extends from surface to depths of at least 500m and lends itself to conventional large-scale open pit mining methods. The PEA mine plan entails developing a large open pit to provide mostly fresh rock containing economic gold mineralization for a conventional Carbon-in-leach milling process plant. Underground mining of the adjacent Gilt Creek Deposit is also in the current Life of Mine plan. It is assumed that the Wenot open pit mine and adjacent Gilt Creek underground mine will be operated concurrently. Mining operations will be conducted 24 hours per day and 7 days per week throughout the entire year.

The Wenot open pit mine production schedule consists of one year of pre-production stripping, 18-months concurrent mill construction and commissioning, and 18-20 years of mine

production. The target crushing rate is 5.2 Mtpa, or approximately 15,000 tpd. The open pit will produce a total of 84.1 Mt of process plant feed at an average grade of 1.73 g/t Au, containing 4,787 koz over the LOM. 2.2 Mt of mineralized saprolite and 80.8 Mt of mineralized fresh rock will be mined within the Wenot Pit. The total annual mining rates of plant feed and waste rock combined will peak at approximately 45 Mtpa (130,000 tpd). Waste rock mined over the LOM is planned at 732 Mt and the LOM strip ratio is 8.7:1. The Wenot Pit will be approximately 2,400 m long, 900 m wide and 450 m deep. The open pit design is presented in Figure 6. The design is based on 55° hard rock inter-ramp slopes and 30° saprolite slopes and is mined in two pushback phases.

FIGURE 6 MINE SITE LAYOUT PLAN VIEW (ZOOMED IN VIEW)



1.8.2.2 PROCESSING

A processing rate of 5,325,000 tpa (15,000 tpd) of mineralized material is proposed for Omai Gold's Wenot Pit operation. The process plant will consist of gyratory crushing, a semi-autogenous ("SAG") mill with a pebble crusher, and a closed-circuit ball mill with cyclones to ensure consistent product size feed to a gravity concentration circuit. The cyclone overflow will be directed to a large thickener and then to six stirred leaching tanks. Activated carbon will be mixed with the slurry in a counter-current fashion and gold-loaded carbon will be screened out. The gold will be chemically stripped from the carbon, concentrated by electrolysis, and refined in an electric furnace to produce doré bars. Leached tailings will be sent to either the Fennel Pit or to an expanded #2 tailings facility. The decant from the settling tailings will be returned to the process plant and used to provide water for the SAG mill operation and process water.

1.8.2.3 CLOSURE

Closure is considered to begin once the processing plant is no longer operating. Closure activities will include those required to return the site to better than current conditions to the extent practicable. Activities will also be required to ensure public safety related to the post-operations TSF and pit areas. Closure activities will include:

- Pit lake management, if necessary;
- Any required site grading to ensure appropriate long-term site drainage;
- Stabilization of slopes;
- Establishment of a long-term water management system at the TSF, if necessary; and
- Environmental monitoring.

The closure phase ends after all closure works are completed in accordance with closure performance specifications (to be established in a closure plan), at which point the Project will move into post-closure, during which the site can be left in an unmaintained state.

1.9 PROJECT ALTERNATIVES

This section reviews the factors leading to the decisions regarding the selection of the primary alternatives for the development of Project mining operations, including the "No Project" alternative.

1.9.1 NO PROJECT ALTERNATIVE

The "No Project" alternative would result in the foregoing of economic benefits to Guyana derived from the revenues of the gold production and the creation of direct and indirect employment by the Project. This alternative would also lead to the necessity of further exploration in other concessions and would not leverage the findings of the exploration and prospecting carried out on the Property to date, therefore resulting in greater environmental impacts in areas presently not subject to such activities.

1.9.2 OTHER ALTERNATIVES

No alternative PL site is being considered. Within the PL, there will be some micro siting of facilities that will need to be confirmed. This information is not yet readily available but will be presented in the EIA.

2. POTENTIAL IMPACTS ON THE ENVIRONMENT AND PROPOSED MITIGATION MEASURES

The impact assessment process is a comparative process that identifies differences between existing physical, biological, and socioeconomic conditions and the projected conditions that are directly or indirectly attributable to the Project, as well as potential cumulative impacts that may result from the Project in combination with other past, present, and reasonably foreseeable future activities. The potential impacts, which are expected to be similar to impacts identified in previous mining Environmental Assessments and Management Plans in Guyana of similar scale and scope and could be directly and/or indirectly generated by the Project during the construction, operation and closure of the mine and potential impacts could be adverse or positive in nature.

The Omai project is a brownfield site and has already experienced significant physical and environmental impacts and there have been comprehensive environmental water quality studies conducted.

ERM has identified potential impacts from the proposed Project related to physical, biological, and socio-economic tenets. Potential impacts and proposed mitigation measures are outlined in Table 5.

TABLE 5 POTENTIAL IMPACTS

Discipline	Potential Impacts	Mitigation Measures
Physical Resources		
Noise and Vibrations	• Machinery and equipment onsite during construction and operation phases will generate some level of noise from waste rock and ore excavation, blasting, material loading and stockpiling which can potentially impact wildlife in the Project License (PL) area. Equipment such as dozers and generators can negatively affect wildlife. • Blasting will also cause vibrations which can impact wildlife within the PL if conducted for a prolonged period.	• Machinery to be equipped with noise attenuation devices such as mufflers as far as practical. Project equipment is to be maintained in good working conditions and as per equipment servicing guides. • Generators and other equipment that produce significant noise to be placed in enclosed areas to maintain compliance with appropriate noise levels at sensitive receptor locations. • Construction activity/blasting events undertaken during daytime hours only.
Air Quality and Climate	• Equipment and machinery onsite are also expected to generate dust and other airborne emissions during the various phases of the mine from fugitive dust emissions / vehicles and processing plant during operations. • Data will be collected and ongoing monitoring for appropriate ambient air quality parameters associated with expected emissions of this type of project and supporting baseline data, including dust fall, suspended particulates (total, PM_{10} and $PM_{2.5}$) and gases such as SO_2, NO_x, CO, and Volatile Organic Compounds (VOC).	• Conduct regular site inspections, enclose site/specific operations, cover/fence stockpiles. • Monitoring of PM_{10} and particulates as per EPA guidance. • Install hard surfaced haul routes and inspect regularly. • Implement wetting techniques such as application of water as dust suppressant especially during dry seasons along trails and around project site to minimize dust. • Cover stockpiles to reduce wind suspension of particulate, and progressive re-vegetation of disturbed areas.
Water quality- Surface Water (SW) and Sediments and Groundwater (GW)	• Identify sensitive areas such as ecological or otherwise importance which may be potentially affected by de-watering activities. • Surface and ground water will be impacted due to potential pollution and bolstering of the walls of the tailings pond. Risk of tailings ponds and dam breaks causing impacts to aquatic life and watercourses and potential for loss of human life. • Also increased runoff, land clearance construction activities further altering natural overland runoff, removing water from local hydrology cycle and altering surface water hydrology • Dewatering activities discharged to surface waterbodies; change in flow regimes and/or quantities of water available across the watershed. • Activities during construction and operations may also cause reduction in GW volume due to pit and dewatering of the mine; seepage from surface infrastructure and mining areas impacting GW quality; GW level drawdown and recovery impacting SW volumes. • In addition, there is potential for contaminant migration through the aquifers impacting SW quality and recovery of GW levels following discontinuation of mine dewatering increasing GW volume. • Contamination through aquifers to local creeks and nearby river such as the Essequibo; sewage; and spills through unplanned release of contaminants.	• Consistent and robust monitoring of tailings ponds and during dewatering exercises for water levels, flow rates, and water quality parameters to detect potential issues early. • Ditches, culverts and bridges to divert runoff to outflow locations. • Design water conveyance systems; installation and active management of sediment ponds downstream. • Engineering controls to minimize seepage of TSF dams; installation and operation of Waste Treatment Plant (WTP); surface water management plan; diversion of creeks and rivers to be considered after assessing impact on other potential users such as communities. • Establishment of a GW monitoring program; WSF at higher ground elevations to avoid pooling of runoff/seepage; development of sustainable water supply management plan; hydrocarbon management system and fuel storage constructed above ground with leak detection systems and secondary containment; install and maintain oil and grease traps and cyanide management.
Geology and Soils	• Main impacts will include disturbance / removal of soils both through direct excavation and grading, compaction of soils because of equipment/ vehicle operations, and loss of soils through erosion and sediment run off from increased soil erosion due to further removal of vegetation and topsoil loss which could result in and soil contamination (fuel storage, hazardous waste, accidental spills/chemical releases).	• *Soil erosion, sedimentation, topsoil loss*—limit clearing of vegetation and soil cover and stockpile earthworks materials for rehabilitation; install area drainage and sediment control structures, and construct sediment ponds, dams and diverted channels. • *Soil rutting and compaction*—limit off-road access. • *Soil contamination, accidental spills/chemical release*—approved storage areas and secondary containment systems for all hazardous materials and waste storage areas; emergency response kits; notification of relevant authorities/emergency responders; regular employee training programmes; develop and maintain emergency response plans. Use of buffer zones along creeks and streams to minimize spillage of contaminants into waterways.
Vegetation	• Much of the site is cleared or covered by grasses and shrubs. Further land clearance activities can potentially trigger further environmental impacts and cause disturbance to wildlife and habitats from construction activities and movement of heavy equipment etc. • It is noted that the habitat in the PL is heavily degraded by porknocker and aggregate developments. As such, the natural habitat is heavily fragmented / absent and modified habitats are found in the majority of the Project footprint.	• If any clearing is required, beyond the historical widespread clearing, proceed in phases or sections to allow wildlife a corridor to adapt to changes. • Enforce a no hunting, trapping and capturing of animals within the PL. Erect signage for same and educate staff and visitors about encountering wildlife.

Discipline	Potential Impacts	Mitigation Measures
Biological Resources		
Terrestrial Biodiversity		
Mammals and Birds	• As mentioned above, the PL is heavily degraded in terms of habitats, and the majority of the Project footprint would be modified habitat. • The main potential impacts may include loss and degradation of modified habitat used by birds; injury and mortality of terrestrial/aquatic species; disturbance of species from any vehicle traffic and sensory disturbance of mammals and birds from noise impacts.	• Limiting disturbance by conducting paced and sequential clearing. • Control dust, noise and light emissions. • Develop a Biodiversity Management Plan. • Ditches, culverts and bridges to divert runoff to outflow locations.
Reptiles and Amphibians	• As mentioned above, the PL is heavily degraded in terms of habitats, and the majority of the Project footprint would be modified habitat. • The main potential impacts include loss and degradation of aquatic habitat (in the creeks and river); injury and mortality of terrestrial/aquatic species; and disturbance of aquatic species from any vessel traffic.	• Implement an erosion and sediment control management plan and a site water management plan, long term water treatment. • Explore ways to conduct vegetation and habitat restoration. • Enforce the no hunting, trapping and capturing of animals within the PL. • Keep a record / log of areas which are cleared and species which may have been observed using specific areas in the PL.
Aquatic Biodiversity		
Fishes and Insects	• As mentioned above, the PL is heavily degraded in terms of habitats, and the majority of the Project footprint would be modified habitat. • The main potential impacts may include loss and degradation of aquatic habitat; injury and mortality of terrestrial/aquatic species; and disturbance of aquatic species from vessel traffic.	• Ditches, culverts and bridges to divert runoff to outflow locations. • Implement an erosion and sediment control management plan and a site water management plan; long term water treatment; vegetation and habitat restoration. • To prevent the accidental spillage of lubricants and discharge of fuels into waterways ensure that there is a buffer zone around creeks and streams and maintenance of vehicles are not to be conducted near to water bodies.
Socio-Economic and Cultural Resources		
Communities and Indigenous People	• The project and its associated activities can also potentially impact the following resources: • Employment and business: Increased government revenues, employment, and business activity and Competition for skilled workers and goods/services, increased income inequality • Land use and Governance: changes in land use may impact small and medium scale miners. • Community Health and Wellbeing including Vulnerable people: Increased strain on healthcare and medical services, increased risk of communicable disease transmission, disproportionate impacts in Amerindian communities. • Social Infrastructure such as transport, health and utilities such as water: Increased traffic volumes on rivers and roads, increased maintenance costs, potential safety hazards, and risk of accidents.	• Provide training to unskilled and semi-skilled workers. • Support workforce development programs through partnerships with local institutions. • Communicate Project-related employment opportunities and local procurement of goods and services. • Develop a Project grievance mechanism to capture and address community and stakeholder concerns. • Develop local employment plan which focuses on onboarding labour from Region 7. • Maintain an updated Stakeholder Engagement Plan to facilitate ongoing engagement in communities. • Develop traffic management plan. Maintain and upgrade access roads used within the Direct AoI.
Cultural Heritage	• Main potential impacts include ground disturbance due to earthworks; indirect impacts from changes to physical setting impacting the experience of the site/landscape or conservation environment. • An archaeological survey has been conducted for the Project in the footprint of the new proposed development. It is noted that no cultural heritage / archaeology resources were observed.	• Provided this area is a brownfield, has historic porknocker disturbance, and has completed an archaeological survey, a full Cultural Heritage Management Plan may not be required. • However, it is good industry practise to develop a chance finds procedure which outlines steps which should be followed if any item of archaeological significance is found during construction and operation of the mine.
Small and Medium scale Artisanal miners	• The project may potentially impact any small or medium scale artisanal mining operations in close proximity to the PL.	• It is recommended that stakeholder engagement sessions be conducted to understand any concerns, feedback from artisanal miners.

3. NON-TECHNICAL EXPLANATION OF THE PROPOSED PROJECT

The Omai Gold Project is located in Region 7 (Cuyuni-Mazaruni) Guyana, at the site of the former Omai Gold Mine, which was in operation from 1993 to 2005. This area has a long history of gold mining and already has infrastructure such as access roads, an airstrip, a tailings facility and other ancillary facilities. The current project focuses on restarting mining activities at the Wenot deposit, using open-pit methods and at the adjacent Gilt Creek deposit, using underground methods.

The Project is expected to operate for approximately 18-20 years, with a total estimated production of over 5.5 million ounces over the life of the mine.

The key parts of the project will include the open pit mine, underground mine, a modern gold processing plant, waste rock storage areas, upgraded tailings storage, and other supporting facilities such as workshops, fuel storage, and accommodation for workers. The project is designed to reuse and improve existing infrastructure as much as possible, which helps to reduce its environmental footprint.

Keen focus will be placed on managing water quality, controlling dust and noise, and protecting local biodiversity. The updated tailings storage facility will be designed to safely contain mining waste and prevent contamination of surrounding land and waterways. The project will also include environmental monitoring programs throughout the different phases of the mine such as construction, operation and closure.

The Omai Gold Project is considered a brownfield redevelopment, which means it is taking place in an area that was previously disturbed and significantly impacted by mining. This helps reduce the need to clear new land. The company also is in the process of exploring nearby gold deposits, such as Gilt Creek, which could extend the life of the mine and involve underground mining.

4. DURATION OF THE PROJECT

Contingent upon the receiving of relevant approvals, it is anticipated that the Omai gold mine project will be producing gold for a period of 18-20 years from 2027 through 2046. Pre-production construction activities are estimated to occur over 24 months.

Table 6 provides a summary of the various phases of the project.

TABLE 6 PROJECT SCHEDULE

Phase 1	Phase 2	Phase 3
Pre-Production (construction, commissioning and start up)	Operations	Closure
24 months	Year 1 – Year 20	Year 21+

5. REFERENCES

Brandfield.A, Barry.J, Burga.D et.al. 2024. *Updated Mineral Resource Estimate and Preliminary Economic Assessment of the Omai Gold Property, Potaro Mining District No .2 Guyana, NI 43-101 and 43-101FI Technical Report, May 2024*.