

INVESTOR PRESENTATION

High Growth, Low Cost Gold Developer

September 2021

ASX : TGM | OTC : TGMGF | FSE: 3LM

THETA
GOLD MINES

- ✓ AISC \$905 USD
- ✓ 580 koz Mining Reserve & growing
- ✓ Targeting organic 160 kozpa production
- ✓ 620 km2 of pregnant goldfield
- ✓ South Africa a real home of Gold
- ✓ Top 3 undeveloped gold resource on the ASX not owned by majors

Forward looking and cautionary statements

This announcement or presentation may refer to the intention of Theta Gold Mines regarding estimates or future events which could be considered forward looking statements. Forward looking statements are typically preceded by words such as "Forecast", "Planned", "Expected", "Intends", "Potential", "Conceptual", "Believes", "Anticipates", "Predicted", "Estimated" or similar expressions. Forward looking statements, opinions and estimates included in this announcement are based on assumptions and contingencies which are subject to change without notice, and may be influenced by such factors including but not limited to funding availability, market-related forces (commodity prices, exchange rates, stock market indices and the like) and political, environmental or economic events (including government or community issues, land owners, global or systemic events). Forward looking statements are provided as a general reflection of the intention of the Company as at the date of release of the document, however are subject to change without notice, and at any time. Future events are subject to risks and uncertainties, and as such results, performance and achievements may in fact differ from those referred to in this announcement. Mining, by its nature, and related activities including mineral exploration, are subject to a large number of variables and risks, many of which cannot be adequately addressed, or be expected to be assessed, in this document. Work contained within or referenced in this report may contain incorrect statements, errors, miscalculations, omissions and other mistakes. For this reason, any conclusions, inferences, judgments, opinions, recommendations or other interpretations either contained in this announcement, or referencing this announcement, cannot be relied upon. There can be no assurance that future results or events will be consistent with any such opinions, forecasts or estimates. The Company believes it has a reasonable basis for making the forward looking statements contained in this document, with respect to any production targets, resource statements or financial estimates, however further work to define Mineral Resources or Reserves, technical studies including feasibility, and related investigations are required prior to commencement of mining. No liability is accepted for any loss, cost or damage suffered or incurred by the reliance on the sufficiency or completeness of the information, opinions or beliefs contained in this announcement.

The Feasibility Study referred to in this announcement is based on technical and economic assessments to support the estimation of Ore Reserves. There is no assurance that the intended development referred to will proceed as described, and will rely on access to future funding to implement. Theta Gold Mines believes it has reasonable grounds the results of the Feasibility Study. At this stage there is no guarantee that funding will be available, and investors are to be aware of any potential dilution of existing issued capital. The production targets and forward looking statements referred to are based on information available to the Company at the time of release, and should not be solely relied upon by investors when making investment decisions. Theta Gold cautions that mining and exploration are high risk, and subject to change based on new information or interpretation, commodity prices or foreign exchange rates. Actual results may differ materially from the results or production targets contained in this release. Further evaluation is required prior to a decision to conduct mining being made. The estimated Mineral Resources quoted in this release have been prepared by Competent Persons as required under the JORC Code (2012). Material assumptions and other important information are contained in this release.

NOTE BUSINESS ARRANGEMENT

Theta Gold Mines holds 100% issued capital of its South African subsidiary Theta Gold SA (Pty) Ltd ("TGSA"). TGSA holds a 74% shareholding in both Transvaal Gold Mining Estates Limited ("TGME") and Sabie Mines (Pty) Ltd ("Sabie Mines"). TGME holds the various exploration and mining permits. The balance of shareholding is held by Black Economic Empowerment ("BEE") entities. The South African Mining Charter requires a minimum of 26% meaningful economic participation by the historically disadvantaged South Africans ("HDSAs"). The BEE shareholding in TGME and Sabie Mines is comprised of a combination of local community trusts, an employee trust and a strategic entrepreneurial partner.

Disclaimer and Competent Persons Statement

DISCLAIMER

This announcement or presentation has been prepared by and issued by Theta Gold Mines Limited (ASX:TGM | OTCQB: TGMGF) to assist in informing interested parties about the Company and should not be considered as an offer or invitation to subscribe for or purchase any securities in the Company or as an inducement to make an offer or invitation with respect to those securities. No agreement to subscribe for securities in the Company will be entered into on the basis of this announcement.

This announcement or presentation may contain forward looking statements. Whilst Theta Gold Mines has no reason to believe that any such statements and projections are either false, misleading or incorrect, it does not warrant or guarantee such statements. Nothing contained in this announcement constitutes investment, legal, tax or other advice. This overview of Theta Gold Mines does not purport to be all inclusive or to contain all information which its recipients may require in order to make an informed assessment of the Company's prospects. Before making an investment decision, you should consult your professional adviser, and perform your own analysis prior to making any investment decision. To the maximum extent permitted by law, the Company makes no representation and gives no assurance, guarantee or warranty, express or implied, as to, and take no responsibility and assume no liability for, the authenticity, validity, accuracy, suitability or completeness of, or any errors in or omissions, from any information, statement or opinion contained in this announcement. This announcement contains information, ideas and analysis which are proprietary to Theta Gold.

COMPETENT PERSONS STATEMENT

The information in this report relating to mineral resources and ore reserves is based on, and fairly reflects, the information and supporting documentation compiled by Mr Uwe Engelmann (BSc (Zoo. & Bot.), BSc Hons (Geol.), Pr.Sci.Nat. No. 400058/08, MGSSA), a director of Minxcon (Pty) Ltd and a member of the South African Council for Natural Scientific Professions and Mr Daniel van Heerden (B.Eng (Mining M.Com (Business Management)), member of Engineering Council of South Africa (Pr.Eng. Reg. No. 20050318)), a director of Minxcon (Pty) Ltd and a fellow of the South African Institute of Mining and Metallurgy (FSAIMM Reg. No. 37309).

The original reports titled "Theta Gold Increases Mineral Resource to over 6Moz" dated 16 May 2019, "Optimised Mine Schedule for Theta Open Pit Starter Project Delivers Significant Improvements" dated 20 April 2020 and "Initial Maiden Underground Mining Reserve 419,000 oz Gold" dated 8 April 2021 were released to the Australian Securities Exchange (ASX) on those dates. The Company confirms that:

- it is not aware of any new information or data that materially affects the information included in the ASX announcements; and
- all material assumptions and technical parameters underpinning the estimates in the ASX announcements continue to apply and have not materially changed.

AUTHORISATION

This announcement was authorised for release by the Board of Theta Gold Mines Limited.

COMPANY OVERVIEW



Theta Gold Mines Limited controls the Eastern Transvaal Gold Fields, where South Africa's gold mining industry began almost 130 years ago.

The Transvaal Gold System sits geological on the eastern side of Bushveld Complex the largest igneous intrusion on earth (Figure 1), where 40-50% of world's gold production came out of the globally-known Witwatersrand Goldfield.



Controls over
62,000 hectares of
gold mining rights



Initiating the
operationalisation
of its development-
ready 6m oz initial
resource base



Incorporating only
6 of more than 40
previously developed
mines



Rapid production
ramp-up over the
next five years to
+160koz/a



Low initial
development capital



Can be self-funded
due to early net cash
generation



A high growth
investment
opportunity

SOUTH AFRICA - AN ATTRACTIVE INVESTMENT DESTINATION

SOUTH AFRICA - 16% OF THE AFRICAN CONTINENT'S GDP

Logistical Advantages

- Largest road system network in Africa
- Local commercial airports
- Water

Jurisdiction Benefits

- English Common Law
- Democratic society government by the elected parliament

Labor Force and Talent Pool

- 460,000 miners currently employed
- A-Grade mining and geological schools
- Self-sufficient with all mining supplies

Mining Sector

- Mining production up 10.3% y/y in July
- South Africa's mining industry production increased by 10.3% year-on-year in July
- The largest positive contributors came from the production of iron ore (42.9 percent), PGMs (10.3 percent), chromium ore (45.8 percent) and gold (13.4 percent)

Note: 1. The extracts were from "The Case For Investing in South Africa" compiled by the Industrial Development Corporation (IDC) and InvestSA published in October 2019.

2. Mining industry in South Africa - Statistics & Facts published on Stats SA in August 2021.

CAPITAL STRUCTURE & INFORMATION



Ordinary Shares
Dual-listed on ASX: TGM |
OTC: TGMGF

516.86m

Unlisted options and
management performance
rights

60.77m

Market Capitalisation
(29 September 2021,
undiluted)

~A\$98M
(~US\$69M)

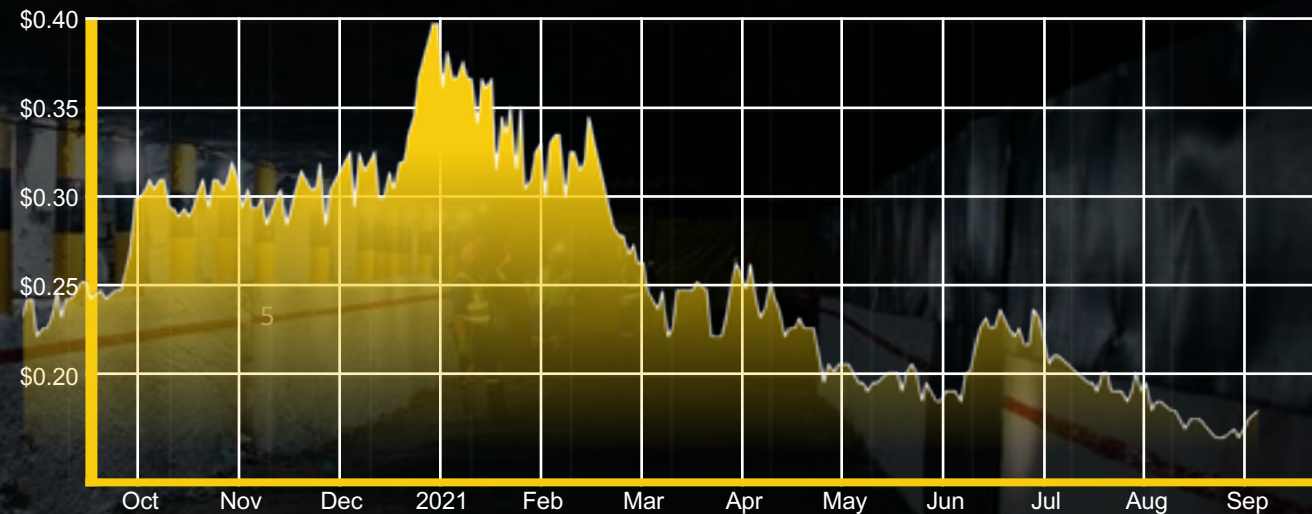
68%

Top 10
shareholding

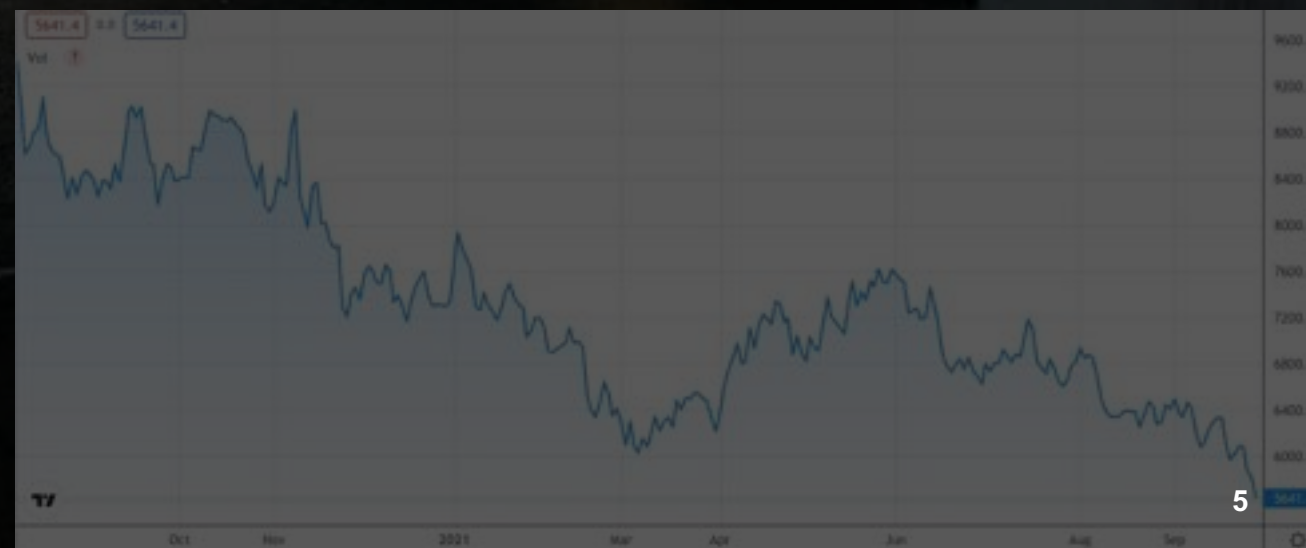
9%

Directors &
Management

TGM CHART



XGD – ASX All Ordinary Gold Index (during same trading period)



CORE TEAM



THOTA Plant Office



Trial Mining Opening Up

COO / CEO / Mine Manger / Chairman / SA Director / SA Director

**Jacques Du Trio / Mitford Mundell / Freddy Leshoto Mocketla / Bill Guy / Terrence Mokale / Finn Behken
(ex-Harmony / ex-Harmony / ex-Harmony / ex-Jupiters / Sibanye-Stillwaters & Glencor / Auramet Intl.)**

SOUTH AFRICA's "GOLDEN TRIANGLE"

Theta Gold – 6.1Moz Au Developer – to produce >160Kozpa



South Africa host the 3rd largest gold reserves in the world (~6,000t Au)



Theta's Eastern Transvaal Goldfields



Witwatersrand Goldfields



Barberton Greenstone Goldfields

West Wits Mining (ASX), Au
(MC: A\$73m)

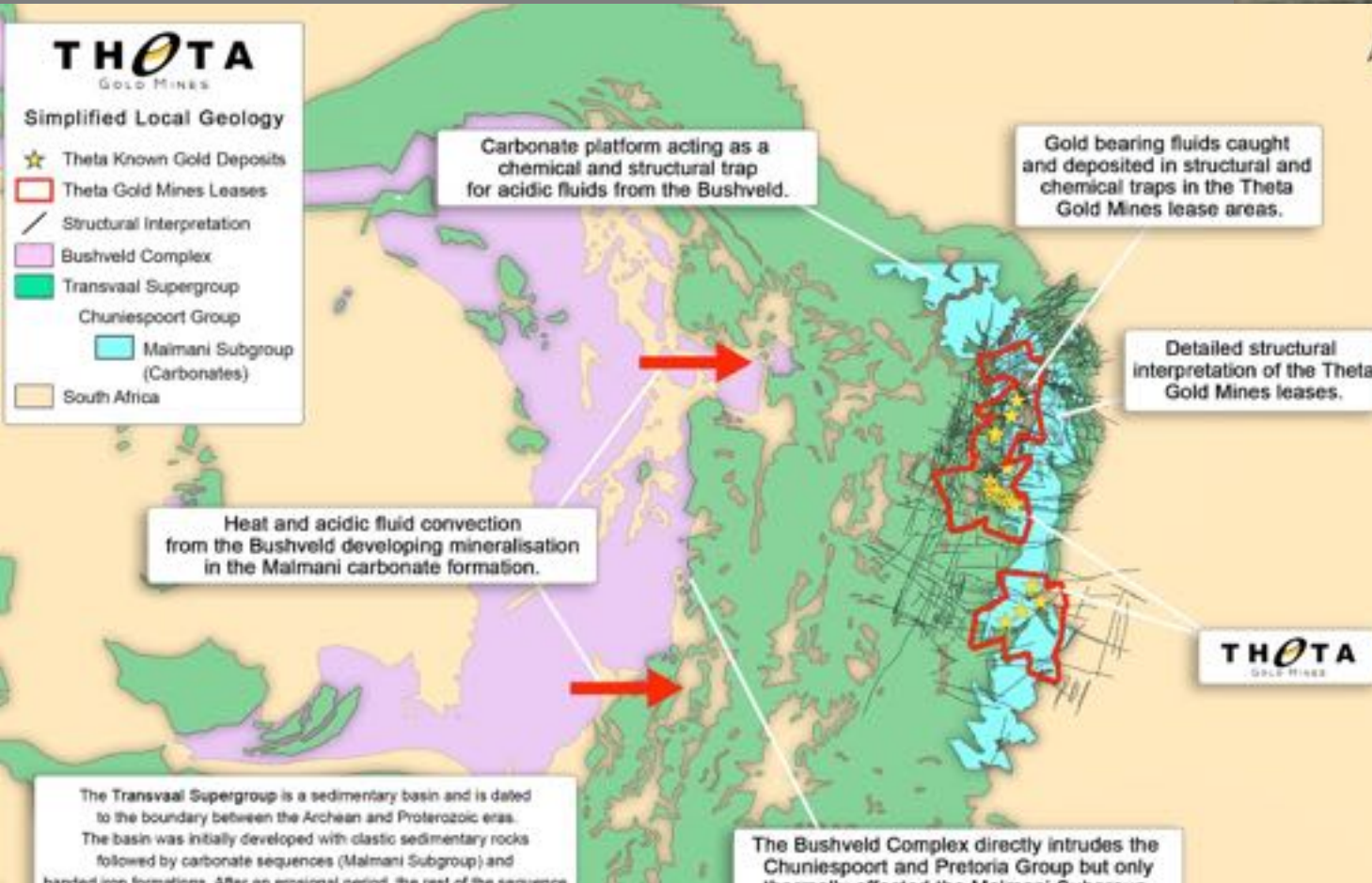
DRD Gold (NYSE/JSE), Au
(MC: US\$773m)

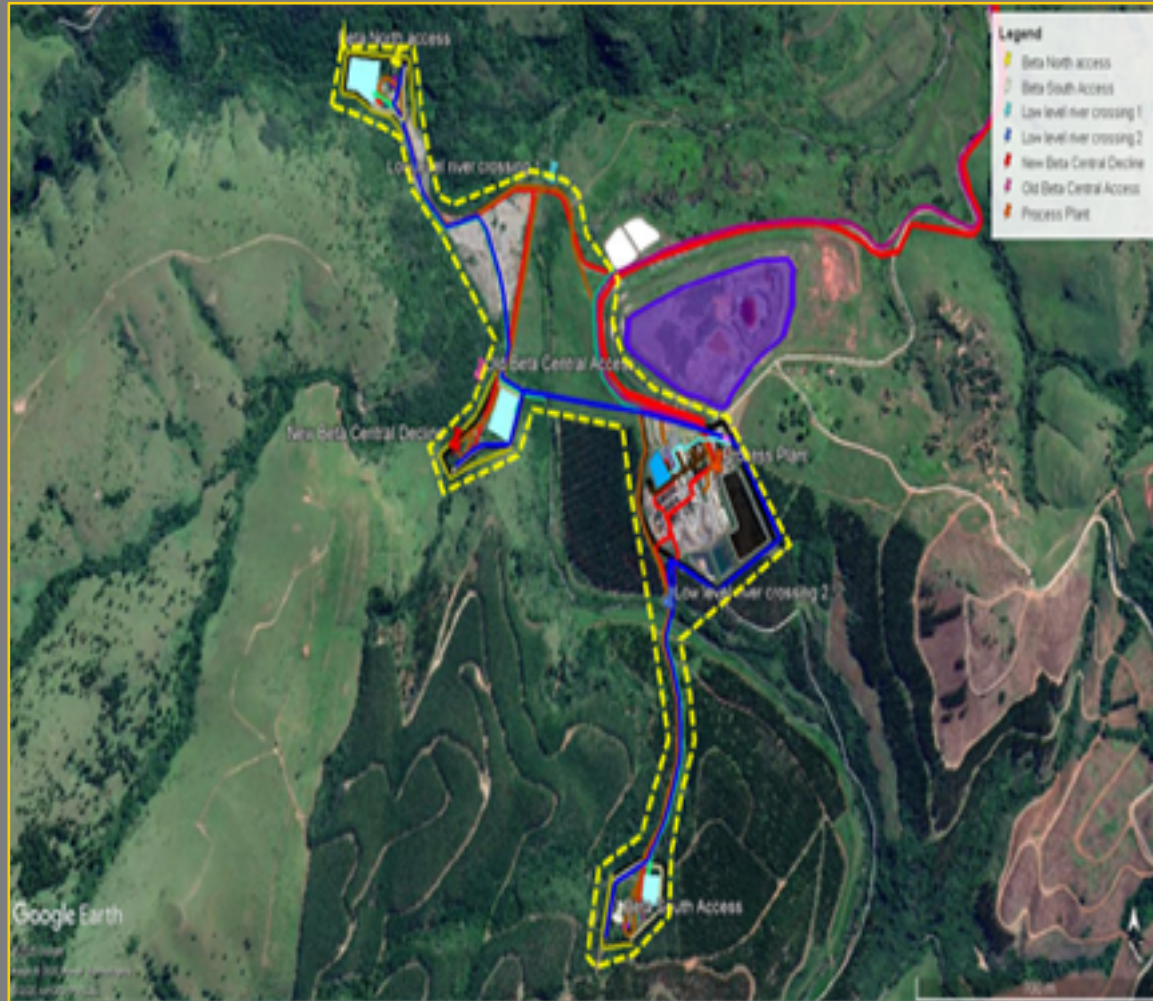
Pan African Resources (LSE/JSE), Au
(MC: GBP 270m)

Note: Market Capitalization data gathered on 28 September 2021

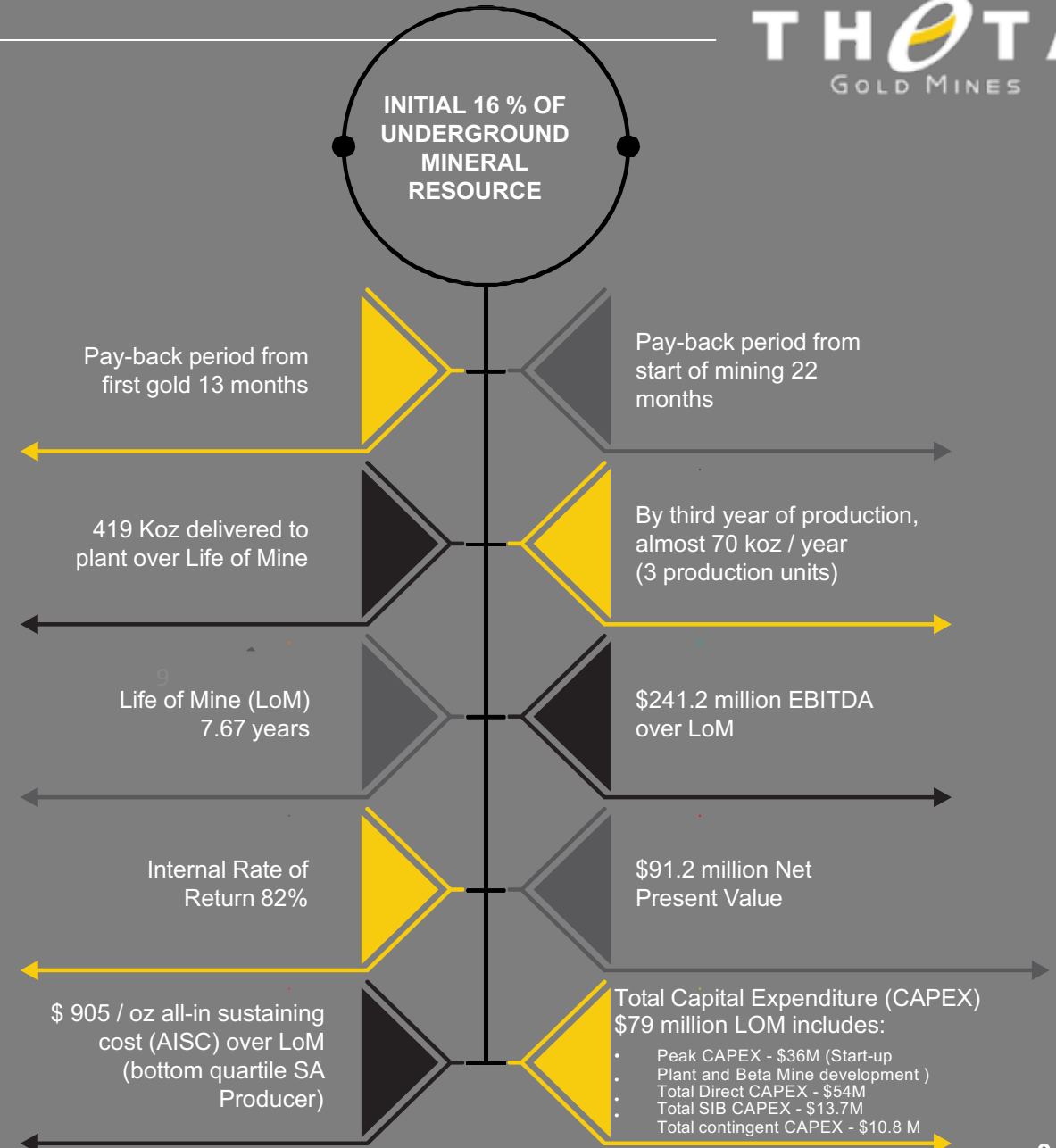
OUR GEOLOGY / OUR MINING RIGHTS

“Our Mining Leases, covering one of the most AMAZING geological structure where the gold is trapped between both the Chemical Traps & Structural Traps, all linked to the one-and-only Bushveld Complex”





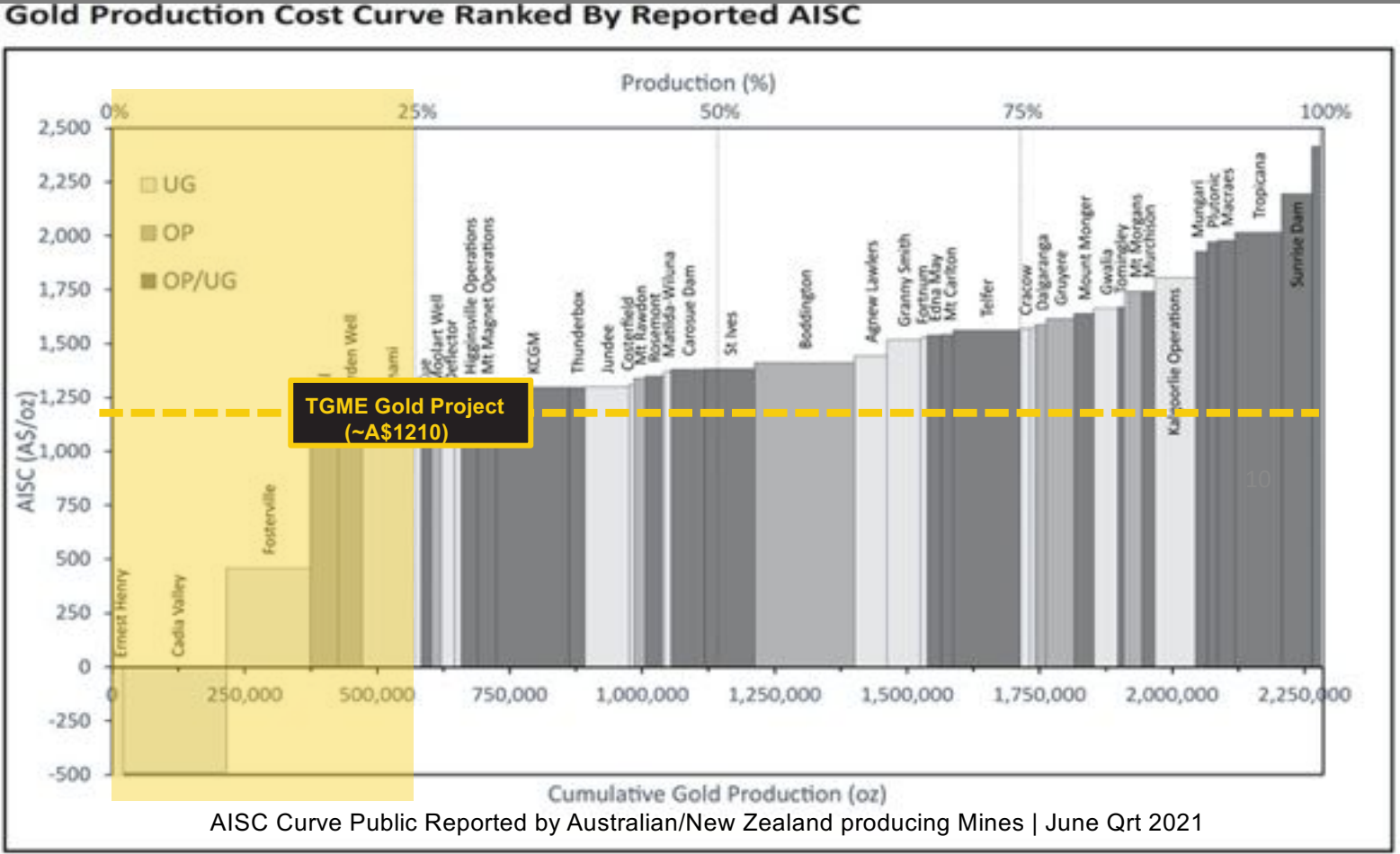
Surface infrastructure plan Beta Underground Mine and plant layout



LOW-COST SUSTAINABLE GOLD PRODUCER WITH HIGH MARGINS



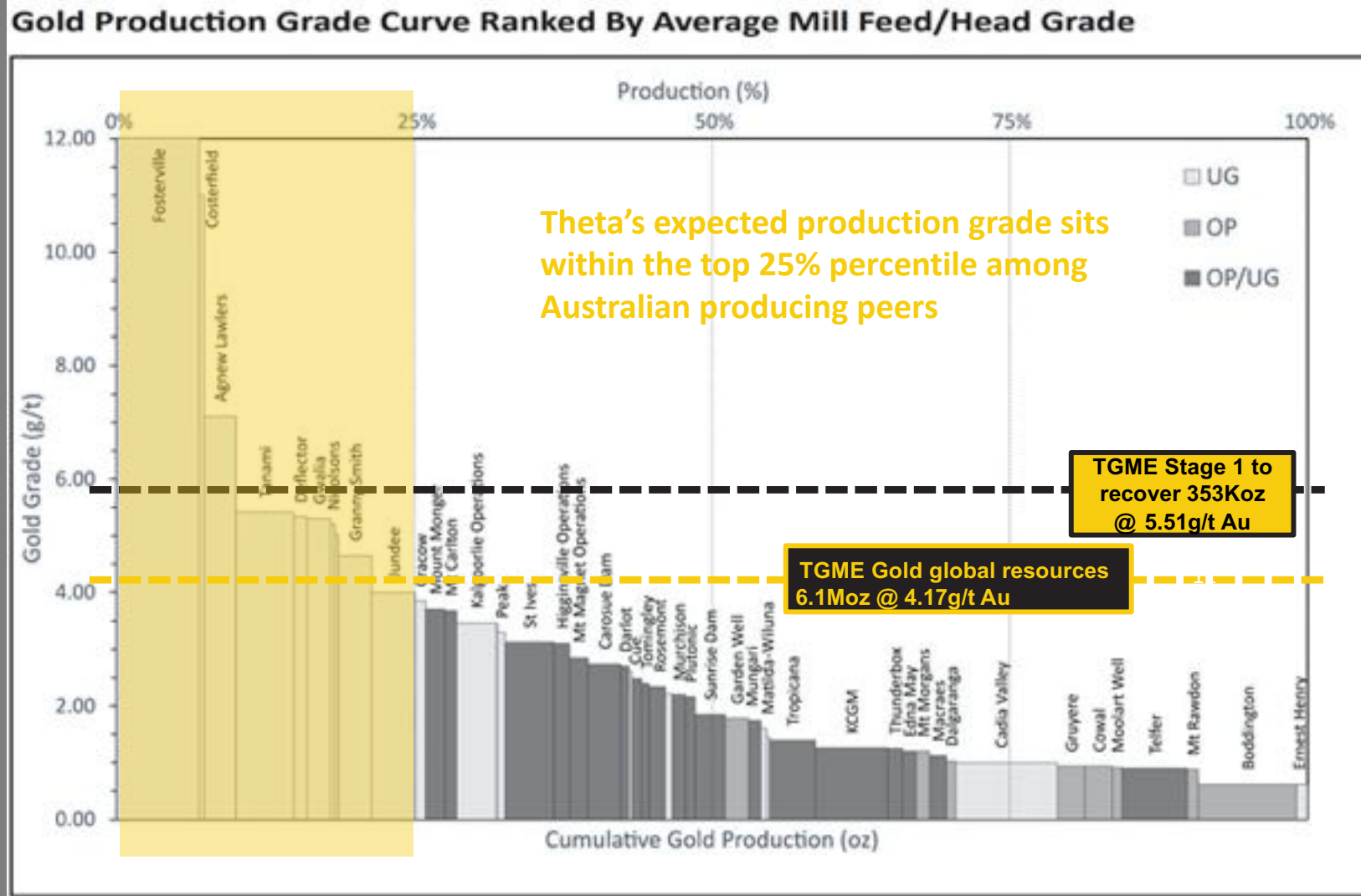
Theta’s initial production would sit comfortably at the bottom 25 percentile in the cost rankings



Source: Aurum Analytics’ Australia Producing Mines public reported



OPTIMISED RESOURCE USE PRODUCING HIGH GRADE ORE



Source: Aurum Analytics Report - Australia Producing Mines public reported.

TARGETING >160,000 OUNCES ANNUAL PRODUCTION



Now First Economic Studies completed

- First three-mine operation, central plant and tailings facility >60koz/a @ 30-37kt/m
- Three Mining Production Units
- Modern mining and treatment methodologies enable low-cost operations (AISC US\$900/oz) and reserve expansion



Future Solid Growth Potential

- Develop multiple mines, reaching >160koz/a within five years, from the resource base of +6mil ounces
- Seven Mining production Units
- Expand to >160koz/a - 6 mine operation @ 80kt/m
- Various expansion opportunities to increase production and the resource base for >3 decades



Development Drill Rig



Long Hole Drill Rig



Old Days
Beta pay limit was 18.7g/t,

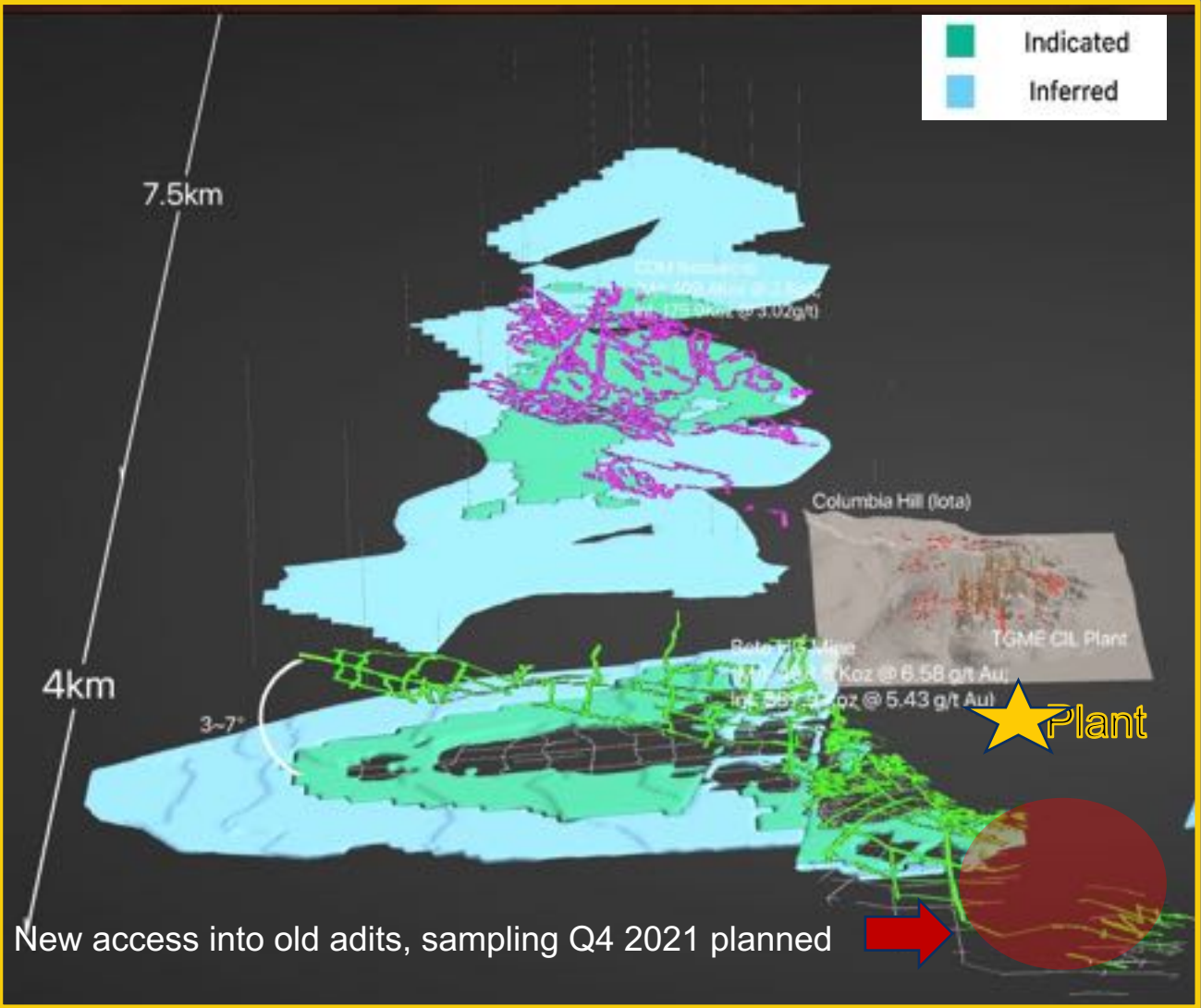
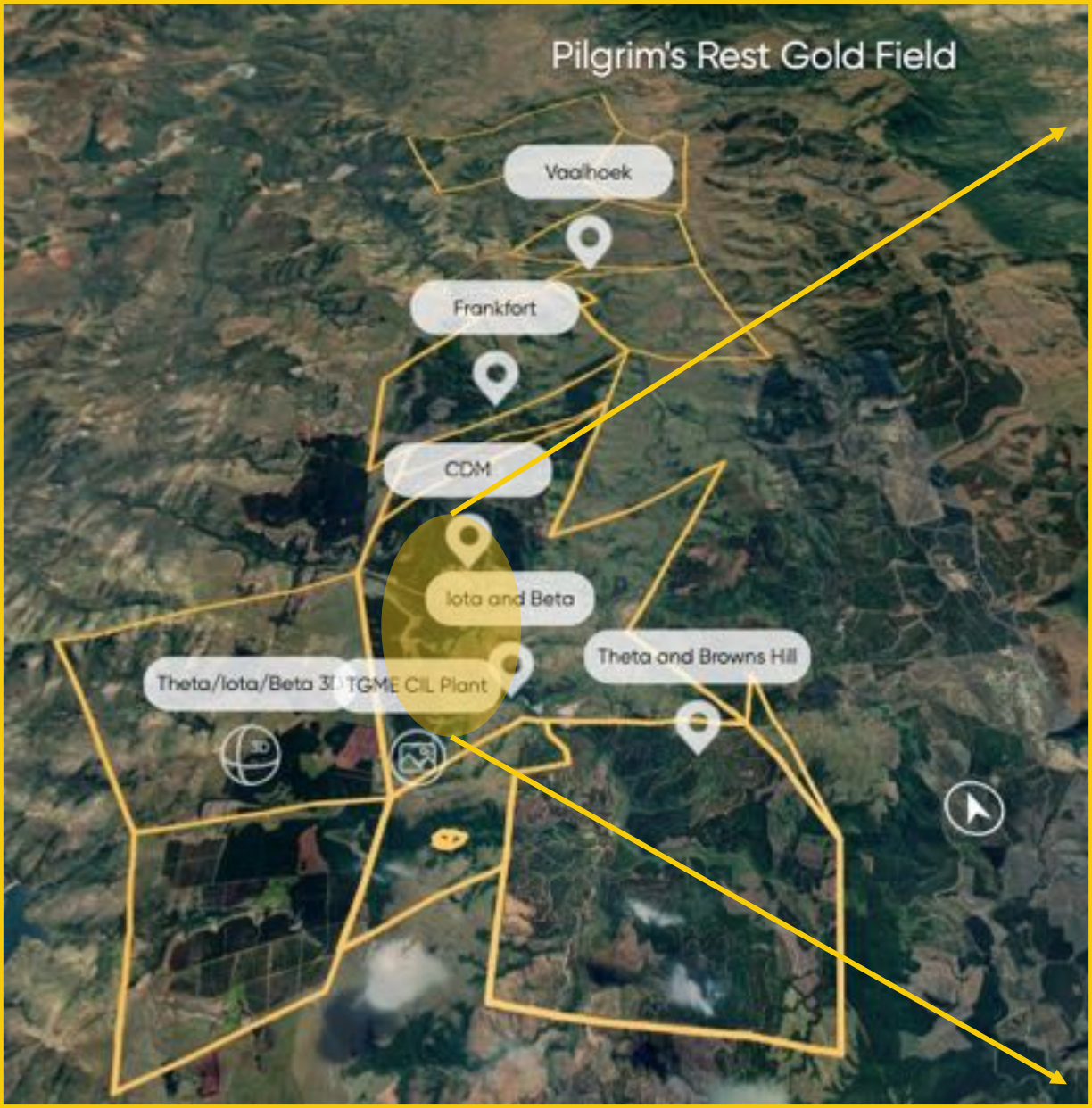
CORPORATE PRESENTATION – SEPTEMBER 2021 (ASX: TGM | OTC: TGMGF | FSE: TGMGF)



Now
Beta pay limit now 1+g/t,



LHD



ESG IS INTEGRAL TO THE DEVELOPMENT STRATEGY AND IS BASED ON:

- Holistic risk management
- Zero harm approach to health and safety
- Environmental stewardship
- Conservation of biodiversity
- Responsible production practices
- Positive impact on host communities
- Transparent stakeholder engagement and reporting



ENVIRONMENT

- Creating regional Environmental Development Trusts for alien invasive plants removals
- Establish nature reserves and targeted environmental study programs



SOCIAL

- 26% of project ownership held by local labour force, host communities and strategic black entrepreneur partners
- Projects structured for broad based economic participation
- Alleviation of poverty
- TGME will be the biggest employer in the area

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GOVERNANCE

- Ethical business practices
- Culture of high ethical standards throughout the organisation

SEPTEMBER 2021 – A RATHER BUSY MONTH

- Mine site staff and labour Covid-19 vaccinations completed
- Covid-care training



- Underground safety training
- Frankfort Mine underground adit re-opening
- Adits support
- Trial mining and sampling preparations



FUNDING

Recently, Theta secured a A\$10 million funding package led by German based investor 2Invest AG (FSE: 2INV), a Deutsche Balaton AG (FSE: BBHK) group company,, released to market on 2 August 2021

RESOURCE UPDATE

Definitive feasibility Study for TGM Underground Q1 2022 for with Minxcon

**Q1
2022**

**Q3
2021**

Beta Mine South Sampling Program Q3 2021 – Beta southern section will be sampled during this period with an expectation to include this section of the Beta Mine into the Resource Statement

Trail Mining to start Q4 2021- Opening up trail mining at the Frankfort Bevetts will start during the next quarter focusing on drilling and blasting to refine the mining method. The planned drill holes will be with a Boart Longyear S26 drilling machine. Reputable explosives suppliers will participate in the explosive trail of pumpable emulsion explosives.

**Q4
2021**

Exploration drilling Q4 2021 - The current surface sources study will be completed during this quarter with a planned exploration drilling program from underground for Beta North, Frankfort Beverly Hills and Rietfontein

**Q4
2021**

Further metallurgical test work will continue on Sulphide ore from Frankfort Mine and free milling ore from Beta Mine

**Q4
2021**

PERMITTING

Permitting activities focused on the completion of the Mine works program, and biodiversity studies to strengthen the Mining rights and environmental authorisation application process

Detailed engineering designs for the integrated waste management system - support to the legislative applications, focusing on waste classification for the final tailings dam design



SIZE

+6Moz of Gold Resources, a top 3 undeveloped gold resource on the ASX not owned by majors



INVESTOR VALUE

Undervalued compared to similar size peers Bellevue (ASX: BGL); Nova (ASX: NVA); DRD Gold (NYSE/JSE: DRD)



POTENTIAL

Low-cost expansion based on >130years data (+40 old mines and exploration)



GROWTH

+160koz pa (within 5 years) from pre-developed near-surface gold resources



LOW-COST PRODUCER

Production costs significantly lower than current gold price (AISC)



EXPERIENCED TEAM

Resource optimisation specialists with over 250 years' combine experience



FLEXIBILITY

Multiple entry points provide optionality in the development strategy



POSITIVE SOCIO-ECONOMIC IMPACT

1,500 jobs created over 5 years, revitalization of Pilgrim's Rest tourism, knock-on positive effect on host community economy

The Lifecycle of a Mineral Discovery

Risks

Funding risk

Technical risk

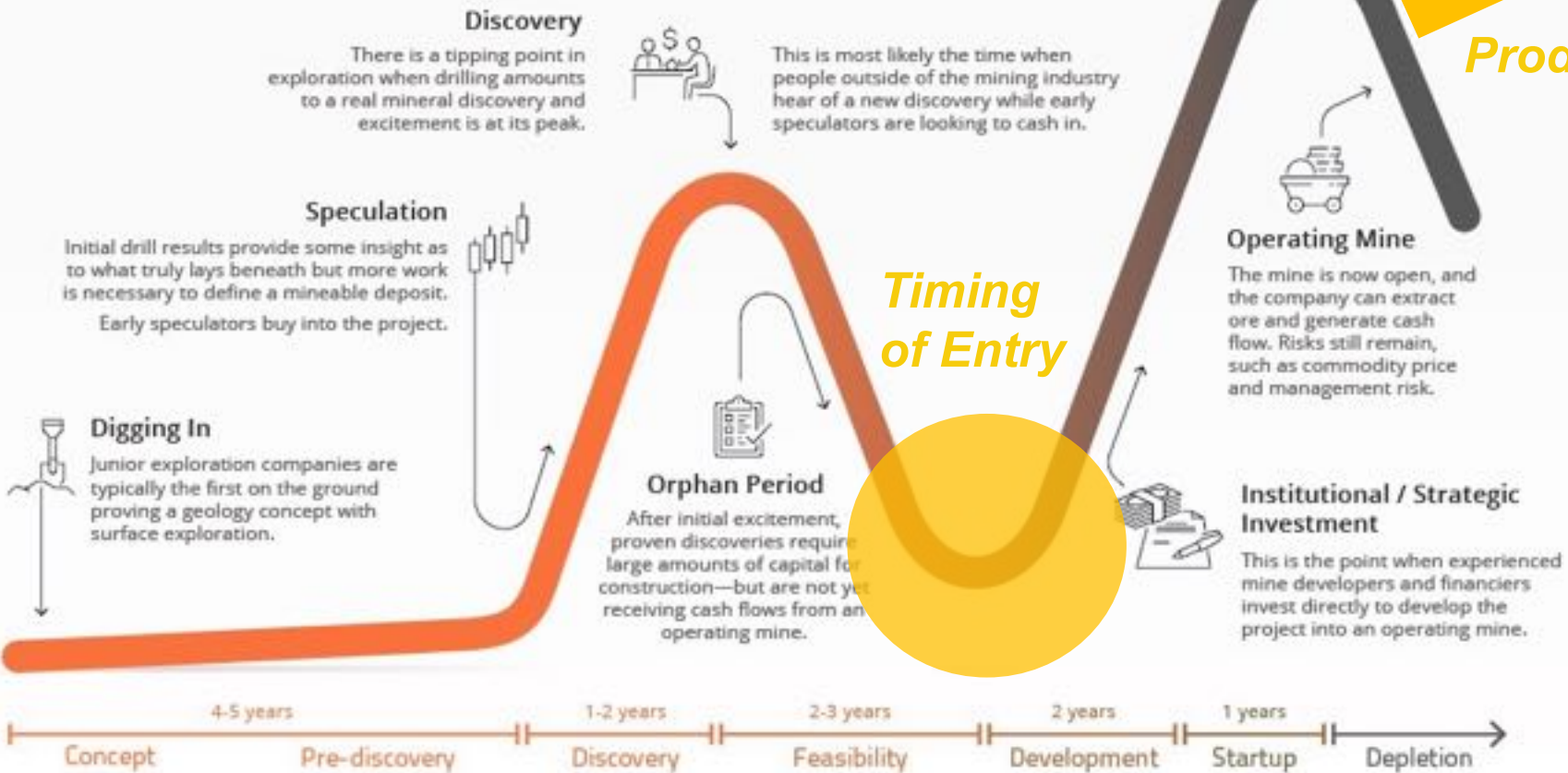
Exploration risk

HIGH
VALUE

LOW
VALUE

Life Cycle

Timeline





Question Time

Bill Guy – Chairman

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www.thetagoldmines.com

<https://twitter.com/ThetaGoldMines>



Ticker: TGM (trade in AU\$)



Ticker: TGMGF (trade in US\$)



APPENDIX

COMBINED MINERAL RESOURCES STATEMENT (~6.1Moz)



Resource Classification	Type of Operation	Combined Mineral Resource			
		Tonnage	Gold Grade	Gold Content	
		Mt	g/t	Kg	koz
Measured	Underground	0.091	5.37	489	15.7
	Open pit				
	Tailings				
Total Measured		0.091	5.37	489	15.7
Indicated	Underground	4.774	6.21	29 661	953.7
	Open Pit	8.109	2.14	17 364	558.2
	Tailings	5.244	0.83	4 373	140.6
Total Indicated		18.128	2.84	51 398	1652.5
Inferred	Underground	21.452	5.22	111 880	3597.0
	Open pit	4.907	5.11	25 057	805.6
	Tailings	0.023	0.57	13	0.4
	Rock Dump	0.885	1.20	1 059	34.0
Total Inferred		27.267	5.06	138 009	4 437.0
Grand Total		45.485	4.17	189 896	6 105.2

Notes:

1. UG Mineral Resources are reported at a cut-off of 160 cm.g/t, open pit at 0.5 g/t and 0.35 g/t, tailings and rock dumps at 0.35 g/t.
2. Fault losses of 5% for Measured and Indicated, 10% for Inferred Mineral Resources.
3. Gold price used for the cut-off calculations is USD1,500/oz.
4. Mineral Resources are stated as inclusive of Ore Reserves.
5. Mineral Resources are reported as total Mineral Resources and are not attributed.

MINERAL RESOURCES STATEMENT - UNDERGROUND (~4.5Moz)



Mineral Resource Classification	Mine	Reef	Reef Grade	Stope Grade	Reef Width	Stope width	Content	Reef Tonnes	Stope Tonnes	Au Content	
			g/t	g/t	cm	cm	cm.g/t	Mt	Mt	kg	koz
Measured	Frankfort	Bevetts	7.13	5.37	73	103	520	0.069	0.091	489	15.7
Total Measured			7.13	5.37	73	103	520	0.069	0.091	489	15.7
Indicated	Frankfort	Bevetts	7.86	5.13	58	96	452	0.243	0.373	1,912	61.5
	CDM	Rho	13.19	3.80	23	90	307	0.258	0.895	3,401	109.4
	Beta	Beta	21.66	6.58	23	90	499	0.716	2.357	15,506	498.5
	Rietfontein	Rietfontein	14.57	8.20	52	92	755	0.517	0.919	7,534	242.2
	Vaalhoek	Vaalhoek	13.90	6.34	36	90	499	0.064	0.140	887	28.5
	Olifantsgeraamte	Olifantsgeraamte	16.97	4.62	25	90	416	0.026	0.091	422	13.6
Total Indicated			16.26	6.21	36	91	591	1.824	4.774	29,661	953.7
Total Measured & Indicated			15.93	6.20	38	91	600	1.893	4.865	30,150	969.4

Mineral Resource Classification	UG Mine	Reef	Reef Grade	Stope Grade	Reef Width	Stope width	Content	Reef Tonnes	Stope Tonnes	Au Content	
			g/t	g/t	cm	cm	cm.g/t	Mt	Mt	kg	koz
Inferred	Frankfort	Bevetts	7.41	4.27	48	93	356	0.343	0.596	2,543	81.8
	CDM	Rho	10.06	3.02	24	90	244	0.544	1.811	5,472	175.9
	Beta	Beta	16.51	5.43	25	90	414	1.107	3.367	18,285	587.9
	Rietfontein	Rietfontein	14.06	8.52	57	94	803	1.190	1.962	16,721	537.6
	Olifantsgeraamte	Olifantsgeraamte	18.33	4.68	23	90	422	0.059	0.248	1,162	37.3
	Vaalhoek	Vaalhoek	16.28	4.77	22	90	361	0.873	2.980	14,209	456.8
	Vaalhoek	Thelma Leaders	12.18	9.47	96	123	1166	0.023	0.030	284	9.1
	Glynns Lydenburg	Glynns	15.87	5.19	25	90	397	3.218	9.833	51,078	1 642.2
	Ponieskrantz*	Portuguese	13.26	3.99	22	90	287	0.064	0.213	849	27.3
	Frankfort Theta*	Theta	7.22	3.24	34	90	244	0.099	0.220	714	23.0
	Nestor*	Sandstone	5.54	2.92	41	90	225	0.101	0.193	562	18.1
Total Inferred			14.68	5.22	31	91	458	7.622	21.452	111,880	3,597 597.0

Notes:

1. Mineral Resource cut-off of 160 cm.g/t applied.
2. Fault losses of 5% for Measured and Indicated, 10% for Inferred Mineral Resources.
3. Gold price used for the cut-off calculations is USD1,500/oz.
4. cm.g/t and g/t figures will not back calculate due to variable densities in reef and waste rock.
5. Mineral Resources are stated as inclusive of Ore Reserves.
6. Mineral Resources are reported as total Mineral Resources and are not attributed.

MINERAL RESOURCES STATEMENT – OPEN PITS (~1.4Moz)



Mineral Resource Classification	Open Pit Mine	Reef	Reef Grade	Reef Width	Content	Reef Tonnes	Au Content	
			g/t	cm	cm.g/t	Mt	kg	koz
Indicated	Hermansburg	Eluvial	1.79	0	0	0.505	905	29.1
	DG1	Eluvial	2.24	0	0	0.640	1 432	46.0
	DG2	Eluvial	0.66	0	0	1.586	1 041	33.5
	Vaalhoek	Vaalhoek	17.25	33	574	0.111	1920	61.7
	Theta & Browns Hill	Shale	1.02	200	204	0.397	404	13.0
	Theta & Browns Hill	Bevett's	1.08	223	241	0.856	925	29.7
	Theta & Browns Hill	Upper Theta	2.41	100	241	0.651	1571	50.5
	Theta & Browns Hill	Lower Theta	3.79	100	379	0.839	3178	102.2
	Theta & Browns Hill	Beta	2.51	100	251	0.373	938	30.1
	Iota	Bevett's	2.98	114	340	0.108	323	10.4
	Iota	Upper Rho	2.33	402	937	0.897	2090	67.2
	Iota	Lower Rho	2.51	520	1306	0.981	2464	79.2
	Iota	Upper Theta	1.06	114	121	0.163	173	5.6
Total Indicated			2.14	168	360	8.109	17 364	558.2
Mineral Resource Classification	Open Pit Mine	Reef	Reef Grade	Reef Width	Content	Reef Tonnes	Au Content	
			g/t	cm	cm.g/t	Mt	kg	koz
Inferred	Hermansburg	Eluvial	0.88	0	0	0.110	97	3.1
	DG1	Eluvial	0.00	0	0	0.000	0	0.0
	DG2	Eluvial	0.00	0	0	0.000	0	0.0
	Vaalhoek	Vaalhoek	20.32	43	880	0.213	4 319	138.9
	Vaalhoek	Thelma Leaders	14.25	97	1 388	0.293	4 172	134.1
	Theta & Browns Hill	Shale	1.12	215	240	0.600	668	21.5
	Theta & Browns Hill	Bevett's	1.17	217	254	0.451	528	17.0
	Theta & Browns Hill	Upper Theta	1.86	100	186	0.948	1762	56.6
	Theta & Browns Hill	Lower Theta	8.06	100	806	1.384	11153	358.6
	Theta & Browns Hill	Beta	2.17	100	217	0.778	1686	54.2
	Iota	Upper Rho	5.12	134	687	0.131	673	21.6
Total Inferred			5.11	121	617	4.907	25 057	805.6

Notes:

1. Mineral Resource cut-off of 0.5 g/t and 0.35 g/t applied.
2. Fault losses of 5% for Measured and Indicated, 10% for Inferred Mineral Resources.
3. Gold price used for the cut-off calculations is USD1,500/oz.
4. Vaalhoek, Theta Hill, Browns Hill and Iota Mineral Resources stated utilising pit optimisation.
5. Mineral Resources are stated as inclusive of Ore Reserves.
6. Mineral Resources are reported as total Mineral Resources and are not attributed.

ORE RESERVE STATEMENT



Ore Reserve Classification	Operation	Grade	Tonnes	Au Content	
		g/t	kt	kg	koz
Proved	Frankfort	4,24	60	254	8,16
Total Proved		4,24	60	254	8,16
Probable	Beta	6,51	1 662	10 822	347,94
	Frankfort	4,11	259	1 063	34,16
	CDM	2,31	385	889	28,58
	Theta Project (MR 83)	2,31	2 164	4 996	160,61
Total Probable		3,98	4 470	17 770	571,29

Notes:

Underground Operations

1. An Ore Reserve cut-off of 170 cm.g/t has been applied for the Beta Mine.
2. An Ore Reserve cut-off of 150 cm.g/t has been applied for the Frankfort Mine.
3. An Ore Reserve cut-off of 121 cm.g/t has been applied for the CDM Mine.
4. A gold price of USD 1,465 / oz and exchange rate of 16 ZAR / USD was used for the cut- off calculation.
5. Ore Reserves are reported as total Ore Reserves and are not attributed.

Theta Project (Open Pit MR 83)

1. An Ore Reserve cut – off of 0.4 g/t was applied.
2. A gold price of USD 1,300 / oz was used for the cut - off calculation.