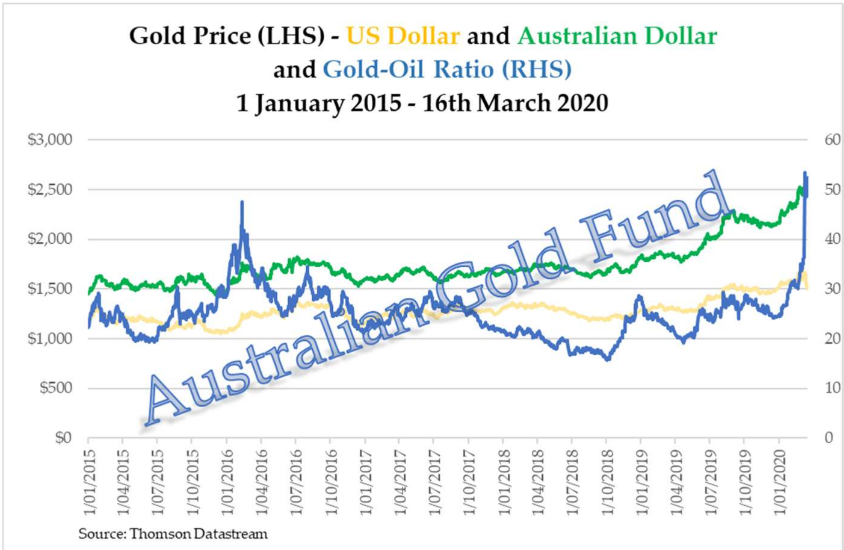
Australian Gold Fund

2019 December Quarter Summary

Summary



The Australian Gold Fund has released its 2019 December quarterly report much later than anticipated owing to the author being very busy attending to other matters relating to other work. 25 companies were included in this report, with Millennium Minerals being removed as they have transferred all their assets to creditors in the liquidation process. The report has selected 16th March as the reference date given that the gold producers saw their price bottom on that date and hence allows one to gauge the companies' resilience in testing times. As at that date, 14 out of the 25 companies (56%) were deemed undervalued and 6 (24%) were overvalued. 14 (56%) companies reported an increase in production compared to the previous quarter and 12 (48%) saw their AISC decrease compared to the previous quarter. 8 companies (32%) delivered production ahead of their annualised target with 7 companies out of 23 (30%) upgraded their performance targets for the financial year.

This quarter saw a number of larger companies embarking on pivotal acquisitions that would be major game-changers for them. Most notably, Newmont-Goldcorp sold their Kalgoorlie Super Pit to Northern Star Resources (ASX: NST) and Saracen Mineral Holdings (ASX: SAR), Newmont-Goldcorp also selling their legendary Red Lake mine (what transformed Goldcorp into a major player in the days when Rob McEwen founded the company) to Evolution Mining (ASX: EVN) and Kirkland Lake Gold (ASX: KLA) acquiring Detour Gold. With these acquisitions, the ASX-listed gold mining companies are seeing two more companies join Newcrest Mining (ASX: NCM) in the ranks of major producers once their acquisitions have been completed.

Despite favourable market conditions for gold mining companies given the strong gold price and moderate level of the oil price, two companies showed signs of trouble, namely Millennium Minerals (ASX: MOY) and Dacian Gold (ASX: DCN). Millennium Minerals filed for voluntary administration on 25th November 2019 and the deed of company arrangement to transfer ownership of the company's assets to the creditors executed on 21st January 2020 with no residual payment to shareholders. Dacian Gold filed to have their stocks suspended from trading on 3rd February 2020 as they sought to update the market on their resources and reserves and recapitalise following an updated life of mine plan.

Readers are reminded once again that our valuation metric is the Enterprise Value divided by AISC-Adjusted Production and does not take into account the company's resources and reserves. While we do consider the resources and reserves in our decision to invest, we discount resources and reserves in an undeveloped mine property due to the inherent risks associated with mine development.

Key Events and Transactions

This report no doubt covers a period that has been, to say the least, historically significant. In the five months since the last quarterly report was released, the world has witnessed much monumental events in both geopolitics and also the financial markets. These include the following:

- The United Kingdoms Parliament sought an extension with the European Union regarding their membership in the union on 31st October 2019 to 31st January 2020 in order to hold an early election on 12th December.
- The incumbent Conservative Party, led by Prime Minister Boris Johnson, won a landslide victory in the December election, securing a clear majority and thus being able to pass the European Union Withdrawal Agreement by 31st January 2020 and hence commencing the process to leave the European Union by 31st January 2021.
- Two months following the Event 201 crisis management exercise on a global pandemic led by the Bill and Melinda Gates Foundation, a novel coronavirus outbreak originated in Wuhan, China in around December 2019 and began to spread quickly. The US reported their first case on 15th January 2020 and then by early March 2020 was declared a pandemic. By late April, global cases of infection are at 2.33 million with number of deaths being just under 161 000. Most countries entered into lockdown conditions with restrictions on international, interstate and even local travel.
- Middle East tensions escalated in late December 2019 in the wake of the Iraqi October Revolution that commenced on 1st October 2019 leading to instability of the nation. Iranian involvement was suspected and confirmed when on 3rd January 2020, the Head of the Iranian Revolutionary Guard Corps, Qassim Suleimani, was killed in a convoy near Baghdad International Airport by US drones. The oil price spiked upon this report, as speculation of another Middle East all-out war was expected but this did not occur. A Ukrainian passenger jet leaving Tehran bound for Ukraine was shot down on 8th January 2020. Sporadic missile strikes by both the US and Iran occurred, but no major skirmishes were recorded.
- After the US House motioned to impeach President Trump on 18th December 2019, the Senate began the trial on 16th January 2020 and voted to acquit the President on 5th February by a vote of 48-52 and 47-53 to both Articles.

- The financial markets continued to rally till 12th February when it began to decline slowly as fears regarding the Wuhan coronavirus began to spread around the world, with China, US, Italy, Spain and the UK being most affected. Markets commenced their month-long crash on 24th February with indices falling around 2-4% and by end of the week, most of the indices had fallen around 10%. The days where the markets fell the most were 9th March, 12th March and 16th March. Gold during this period was able to stand relatively strong, trading at US$1 520/oz at the start of the year, rising to above US$1 700/oz in late February and early March on intra-day trading and then falling to US$1 470/oz on 19th-20th March before recovering to US$1 686/oz at the time of writing. The gold price has not traded at this level since 2012, although for most other currencies, the gold price has broken all-time historical records. For Australia, the gold price peaked at A$2 800/oz and currently is at A$2 650/oz.
- In the midst of the financial markets crashing, the Organisation of Petroleum Exporting Countries (OPEC) met in early March and negotiations between Saudi Arabia and Russia regarding production cuts failed, leading to the oil price falling over 30% on 9th March. The oil price fell further as continual efforts to reconcile production targets failed, even as the US and Canada joined to form OPEC+. The oil price decline was further exacerbated by the dumping of oil by many countries, especially by China that is one of the world's largest consumer of petrol, in the wake of the global pandemic decreasing industrial and consumer demand. At the time of release of this report, the oil price stands at US$18.12/bbl, down 70.3% from the start of year price of US$61.08/bbl.

The December quarter also saw a number of ASX-listed gold producing companies expand their operations with acquisitions. Operations have remained comparable to the previous quarter with no significant trends in either direction. However, when taking into account the Australian dollar gold price decline and also the gold-oil ratio falling over the quarter, the gold producing companies have performed rather solidly. In terms of the stock price performance, this report considers the price movement up to 16th March 2020, the day where the gold mining companies have hit the bottom. None of the companies saw their stock price rise from the beginning of the year to this date, showing how violent the market downturn was during this global market crash for which virtually no asset was spared.

During the quarter ending 31st December 2019 and further to our coverage of events in the last summary report, the following major events occurred:

- Alkane Resources (ASX: ALK) raised $54.8m on 28th November to fund their exploration in the Tomingley corridor and Boda deposits.
- Aurelia Metals (ASX: AMI) appointed on 23rd October Dan Clifford as the CEO and Peter Trout as COO.
- Dacian Gold (ASX: DCN) implemented management succession plan with Executive Chairman and Managing Director Rohan Williams stepping down and former Doray Minerals CEO Leigh Junk replacing him as Managing Director and Ian Cochrane becoming Non-Executive Chairman, effective on 6th January 2020.
- Evolution Mining (ASX: EVN) acquired on 26th November the Red Lake mine from Newmont-Goldcorp for US$375m (A$580m) cash and a contingent US$100m (A$155m) upon discovery of additional resources.

- Gold Road Resources (ASX: GOR) achieved commercial production status in the Gruyere mine on 9th October.
- Kirkland Lake Gold (ASX: KLA) acquired on 26th November Detour Gold for C$4.9 billion (A$5.4 billion).
- Kingsrose Mining (ASX: KRM) appointed Karen O'Neill as CEO on 21st November.
- Newcrest Mining (ASX: NCM) approved on 15th October the Stage 1 expansion of the Cadia mine whereby the mill processing capacity would increase to 33Mt p.a. The project is expected to cost A$685m.
- Northern Star Resources (ASX: NST) completed on 6th December the acquisition of Echo Resources (ASX: EAR) for approximately A$242m. The company also acquired 50% of the Kalgoorlie Super-Pit and the power producing assets from Newmont-Goldcorp on 17th December for US$800m (A$1.168 billion). To finance this acquisition, they raised A$765m in equity capital.
- Perseus Mining (ASX: PRU) entered into a 65 month mining services contract with EPSA commencing in November 2020 on their Yaoure mine, with construction of the mine already commenced in the September 2019 quarter.
- Red 5 (ASX: RED) provided an update on the timeline to the development of their King of the Hills project, with the Final Feasibility Study expected to be ready by the September 2020 quarter.
- Ramelius Resources (ASX: RMS) reported a major upgrade in the Eridanus deposit, with resources increasing 226% to 490koz.
- Resolute Mining (ASX: RSG) saw their Syama sulfide roaster being out of operation for six weeks while it was being repaired, completed in mid-December. The company also reported that Stage 1 of the Ravenswood Plant expansion was completed at the end of December, allowing for the processing capacity to increase to 5Mt p.a. The company also appointed Stuart Gale as CFO.
- Saracen Mineral Holdings (ASX: SAR) acquired the Kalgoorlie Super-Pit mine in late November for A$1.1 billion and financed it with $796m equity capital raised at $2.95 and $450m in debt.
- Silver Lake Resources (ASX: SLR) completed the acquisition of Egan Street Resources (ASX: EGA), closing this at 13th December. The value of the acquisition was $83m.
- Troy Resources (ASX: TRY) suspended operations at the Karouni mine on 10th October by government order following a fatality on 9th October on the mine. They also sold the 30% remaining interest of the Casposo mine to Austral Gold (ASX: AGD) for $0.2m on 25th November.
- Westgold Resources (ASX: WGX) demerged their non-gold exploration assets to Castile Resources (ASX: CST) on 13th December.

Subsequent to the end of the December quarter, these major events and transactions occurred:

- Aurelia Metals (ASX: AMI) commissioned on 11th March their upgraded ore circuit at Peak Mine that cost $53m to build.

- Blackham Resources (ASX: BLK) announced a $52m rights issue on 26th February to finance their Stage 1 Wiluna Sulfide development project. Combined with a potential $40m debt financing package, this would raise $92m.
- Dacian Gold (ASX: DCN) entered into a trading halt on 3rd February and then announced an updated Resources and Reserves statement and a downgrade to their operations in a Three-Year Life of Mine plan on 27th February, but remained until 11th April to resume trading after a recapitalisation plan on 8th April.
- Gascoyne Resources (ASX: GCY) continues to remain in voluntary administration but the December quarterly results suggest some improvement in operations with substantial decline in the AISC.
- Medusa Mining (ASX: MML) reported a 4-day suspension to operations on 13th February due to one of their shaft winders needing to be repaired. The Co-O mine also experienced a rockfall incident in which one worker died and another seriously injured on 27th February. The mine continued operations but the shaft in which the rockfall occurred has been suspended.
- Newcrest Mining (ASX: NCM) entered into an agreement on 31st January to sell their 75% stake of the Gosowong mine to Indotan for $90m, with the transaction to close by 30th June.
- Northern Star Resources (ASX: NST) closed the acquisition of the Kalgoorlie Super-Pit mine on 3rd January.
- Oceanagold Corporation (ASX: OGC) reported on 18th March that the CEO Michael Wilkes would resign immediately and the COO Michael Holmes would assume the role of Acting CEO.
- Pantoro Limited (ASX: PNR) appointed Director Wayne Zekulich as Chairman on 21st January.
- Red 5 Limited (ASX: RED) reported on 10th February an upgrade of the Darlot mine resources and reserves of approximately 20% after depletion. The company upgraded the resources at King of the Hills deposit to 4.1Moz and they downgraded the March quarterly production by around 20% on 12th March. The company also announced a $125m capital raising on 31st March to fund the King of the Hills infrastructure development that is expected to commence construction at the end of this year.
- Ramelius Resources (ASX: RMS) reported on 28th January that the environmental permits for the Greenfinch project have been received. On 10th February, the company announced they will acquire Spectrum Minerals (ASX: SPX) with an implied value of just over $200m.
- Resolute Mining (ASX: RSG) announced on 15th January that they will sell the Ravenswood mine to EMR Capital and Golden Energy and Resources for up to $300m, with $150m being received upon transaction to be closed at the end of March. The company also undertook on 21st January a capital raising for up to $196m to repay the bridging loan used to acquire Toro Gold. Almost $195m was raised in this issue.
- Saracen Mineral Holdings (ASX: SAR) announced on 30th January they had sold their 10.5% holdings in Red 5 (ASX: RED) for $0.30 each in order to generate cash to partially repay the debt arising from the acquisition of the Kalgoorlie Super-Pit mine.

- St Barbara Mines (ASX: SBM) reported on 2nd March an upgrade of the Simberi mine resources and reserves.
- Silver Lake Resources (ASX: SLR) upgraded their 2020 full-year guidance in the December quarterly report released on 20th January, with the annual production to be at 240 000-250 000oz, up from 215 000-230 000oz.
- Troy Resources (ASX: TRY) resumed mining operations at the end of January.
- Westgold Resources (ASX: WGX) announced on 4th March that they have commenced sub-level caving operations at the Big Bell mine.

The Big Picture

ASX Code	Category	Market Capitalisation	Net Cash	Cumulative NCF-Capex	Production	% Annual Guidance	Rise/Fall?	AISC	Rise/Fall?
ALK	E	$290.020	$78.431	-$9.716	6,929	21.32%	Fall	$1,441.000	Rise
AMI	D	$196.650	$63.571	-$0.646	22,864	25.40%	Fall	$1,369.988	Rise
AQG*	C	$1,485.730	-$158.301	$306.185	80,869	30.18%	Fall	$1,038.610	Fall
BLK	D	$48.120	-$6.898	-$6.081	20,003	26.67%	Rise	$1,527.000	Rise
DCN	D	$319.800	-$51.600	$3.320	33,235	23.57%	Fall	$1,737.000	Rise
EVN	B	$5,726.800	-$429.640	$245.403	170,890	23.57%	Fall	$1,069.000	Rise
GCY	D	$39.190	-$105.999	-$6.750	16,655	22.21%	Fall	$1,488.000	Fall
GOR ^	C	$707.520	-$99.043	-$7.752	35,012	26.18%	Rise	$1,102.000	Rise
KLA*	B	$11,202.360	$1,004.042	$665.820	279,742	18.59%	Rise	$748.969	Fall
KRM	E	$18.980	$26.360	$16.467	10,950	40.56%	Rise	$678.753	Fall
MML	D	$90.390	$26.855	$9.793	20,792	20.79%	Fall	$1,968.970	Rise
NCM	A	$16,691.590	-$1,900.562	$614.879	551,115	22.45%	Rise	$1,256.572	Fall
NST	A	$6,801.050	$761.705	$169.068	212,571	21.69%	Rise	$1,421.000	Fall
OGC*	C	$1,176.190	-$247.386	$98.514	108,151	29.23%	Rise	$1,433.574	Fall
PNR	D	$85.840	$10.706	-$5.849	9,403	19.80%	Fall	$1,940.000	Rise
PRU	C	$841.000	$48.938	-$103.240	69,155	24.26%	Rise	$1,407.243	Rise
RED	D	$255.240	$1.191	$21.400	23,346	20.30%	Fall	$1,628.000	Rise
RMS	C	$553.230	$87.748	-$11.220	47,902	22.28%	Rise	$1,245.000	Rise
RRL	C	$1,478.800	$163.742	$56.158	90,849	25.59%	Rise	$1,219.000	Fall
RSG	C	$655.400	-$468.063	-$71.909	78,132	18.17%	Fall	$1,340.000	Fall
SAR	B	$3,209.410	-$149.877	$73.336	120,127	19.86%	Rise	$1,098.000	Rise
SBM	C	$1,164.100	-$58.462	$4.376	94,159	24.46%	Rise	$1,364.000	Fall
SLR	C	$919.440	$185.940	$58.602	68,519	27.97%	Rise	$1,192.000	Fall
TRY	D	$39.820	$3.978	-$3.499	683	0.17%			
WGX	C	$597.850	$9.888	-$17.493	62,655	21.79%	Rise	$1,361.000	Fall

* Denotes companies trading in 2019 Q4

^ Gold Road Resources reached commercial production in the December quarter so cumulative AISC is based only on the most recent quarter's production

The table and figures above provide key information relating to the 25 ASX-listed gold mining companies for the December quarter of 2019. Further discussion of each major aspect of interest will be covered in this report.

The December quarter saw 14 out of 25 (56%) of the companies increase their production level compared to the previous quarter and 12 out of 25 (48%) reporting a decrease in the AISC. The increases are concentrated more towards larger producing companies, some driven by acquisitions made. 14 out of 25 (56%) of the companies delivered an increase in their operating cashflows after accounting for maintenance capital expenditure, suggesting that their operations are sustainable. The same proportion of companies report a positive net cash position. However, these are not the same companies. Compared to last quarter, less companies delivered a positive operating cashflow and less companies have a positive net cash position. This may be due to incomplete information for the September quarter results on operating cashflows as well as the fact that several larger companies have made major acquisitions funded by debt.

8 out of 25 (32%) of the companies have met or exceeded their guidance for the quarter based on their pro-rated annual guidance, although this is concentrated on the smaller scale mining companies. The average production for the quarter was 89 388oz (compared to 85 640oz at AISC of $1 321/oz last quarter) at AISC of $1 336/oz. Weighting it by the companies' scale, the average production was 92 419oz at $1 219/oz (compared to 89 955oz at AISC of $1 265/oz).

Taking into account that the gold-oil ratio fell during the December quarter, the aggregate performance of the ASX-listed gold mining companies should not be an issue. Rather, given the substantial acquisitions made by the larger companies, this could bode positive for the industry since further takeover and consolidation activities may be on the way. This is especially the case as the larger companies face depleting resources that they need to replenish and exploration is more fortuitous and costly than acquiring a cash-strapped exploration or development company instead.

As a result of acquisitions made, we have reclassified Northern Star to be a major producer, while Saracen Mineral Holdings has been upgraded to a large producer. We plan to reclassify Kirkland Lake Gold as a major producer for the March quarter due to the timing of the closing of their acquisition of Detour Gold. Oceanagold has been downgraded to a mid-tier producer while both Aurelia Metals and Dacian Gold have been downgraded to junior producers. We have removed Millennium Minerals from our study as they will cease to exist.

Before proceeding, refer to the Glossary section to better understand the data and also customised definitions used in this report. The data is collected from the quarterly reports and the quarterly cashflow reports, and then interpreted or organised to produce various tables and figures. The net cash position includes cash and bullion relative to debt but excludes trade credit. A number of companies do not disclose their cashflow movements over the quarter. Where takeover activity occurs during the quarter, the amount reported is based on what is given in the quarterly reports. Some companies may not have completed the transaction before the end of the quarter. Our report does not make any adjustments where this is the case.

The Resources and Reserves are recorded to take into account any updates as they occur. Some companies have also reported maiden resources and reserves prior to the Resources and Reserves Statement. Where this is the case, we attempt to incorporate this, so our figures may disagree with official tables that may feature in company announcements. We have also added resources and reserves for any acquisitions or upgrades that have been completed at the time of the report. The 2020 production guidance is based on the most recent announcement up to the end of the quarter.

Stock Price Performance

ASX Code	Category	Price - 16th Mar	Price - 1st Jan	Quarter Returns	YTD Returns
ALK	E	$0.50	$0.585	-14.5%	-14.5%
AMI	D	$0.225	$0.435	-48.3%	-48.3%
AQG	C	$5.040	$7.650	-34.1%	-34.1%
BLK	D	$0.007	$0.012	-41.7%	-41.7%
DCN	D	$1.400	$1.590	-11.9%	-11.9%
EVN	B	$3.360	$3.800	-11.6%	-11.6%
GCY	D	$0.039	$0.039	0.0%	0.0%
GOR ^	C	$0.805	$1.340	-39.9%	-39.9%
KLA	B	$39.000	$63.000	-38.1%	-38.1%
KRM	E	$0.026	$0.029	-10.3%	-10.3%
MML	D	$0.435	$0.790	-44.9%	-44.9%
NCM	A	$21.710	$30.250	-28.2%	-28.2%
NST	A	$9.190	$11.310	-18.7%	-18.7%
OGC	C	$1.890	$2.780	-32.0%	-32.0%
PNR	D	$0.073	$0.155	-52.9%	-52.9%
PRU	C	$0.720	$1.160	-37.9%	-37.9%
RED	D	$0.205	$0.330	-37.9%	-37.9%
RMS	C	$0.840	$1.235	-32.0%	-32.0%
RRL	C	$2.910	$4.340	-32.9%	-32.9%
RSG	C	$0.620	$1.260	-50.8%	-50.8%
SAR	B	$2.910	$3.310	-12.1%	-12.1%
SBM	C	$1.665	$2.720	-38.8%	-38.8%
SLR	C	$1.045	$1.340	-22.0%	-22.0%
TRY	D	$0.063	$0.090	-30.0%	-30.0%
WGX	C	$1.495	$2.290	-34.7%	-34.7%

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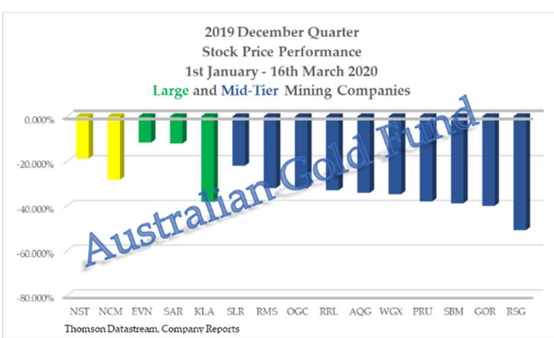

The stock market during November 2019 to March 2020 saw a steady increase till mid-February before a sharp and violent decline affecting almost all assets arising from the global fears over the coronavirus pandemic. The gold mining companies were not spared the onslaught as they erased their YTD gains made up to 24th February and entered into significantly negative territory.

The prices reached a bottom at around 16th March, which we have selected in our study in order to assist us in observing which companies are the strongest amidst such challenging times. Those experiencing the least decline as at this time are likely the safe haven companies to which gold mining investors may retreat to in times of trouble.

Based on our analysis, the companies that saw their YTD returns falling less than 15% include Kingsrose Mining (-10.3%), Evolution Mining (-11.6%), Saracen (-12.1%) and Alkane (-14.5%). Those that fell the most were Pantoro (-52.9%), Resolute Mining (-50.8%), Aurelia Metals (-48.9%), Medusa Mining (-44.9%) and Blackham Resources (-41.7%). Both Dacian Gold and Gascoyne Resources have been excluded in this case due to them being suspended from trading on 16th March. While Kingsrose Mining fell the least, the company is a classified as a mini-cap company and the stock price had been very weak even at the start of the year.

Operational Performance

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RRL	C	$1,478.800	$163.742	$56.158	90,849	25.59%	Rise	$1,219.000	Fall
RSG	C	$655.400	-$468.063	-$71.909	78,132	18.17%	Fall	$1,340.000	Fall
SAR	B	$3,209.410	-$149.877	$73.336	120,127	19.86%	Rise	$1,098.000	Rise
SBM	C	$1,164.100	-$58.462	$4.376	94,159	24.46%	Rise	$1,364.000	Fall
SLR	C	$919.440	$185.940	$58.602	68,519	27.97%	Rise	$1,192.000	Fall
TRY	D	$39.820	$3.978	-$3.499	683	0.17%			
WGX	C	$597.850	$9.888	-$17.493	62,655	21.79%	Rise	$1,361.000	Fall

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Over the December quarter, we have mentioned that more than half the companies saw their production increase over the previous quarter with slightly less than half of them deliver lower AISC in their production.

Looking at the AISC cost curve, we see unsurprisingly that the AISC increases as the company size reduces. However, interestingly, the two micro producers have reported relatively low

AISC compared to their scope. In particular, Kingsrose Mining actually reported AISC of less than A$750/oz as a result of them processing more of their high-grade stockpiles from their mines in Indonesia, which also enjoy silver by-product credits. However, they are expecting to cease production from their Talang Santo, awaiting further exploration and development after July.

What is worth mentioning about the production costs for what used to be low-cost companies such as Regis Resources, St Barbara Mines and Oceanagold is that in recent times, their costs have risen due to a combination of lower grade, lower processing volume or, in the case of Oceanagold, the forced suspension of operations in their low-cost Didipio mine. Furthermore, the AISC of the ASX-listed gold mining companies in general have been on a rising trend. Part of this may be explainable by the weakening Australian dollar even as the WTI crude oil prices have been falling. One aspect that may be missed by many is that petrol companies do not sell oil using the spot market, and neither do refineries operate using the spot market. As Macrovoices hosts, Erik Townsend and Patrick Ceresna, discussed with Josh Crumb in an episode dated in early April that the crude oil futures with longer expiry dates matter. These futures contracts are often trading at a substantial premium to the spot, creating a contango position. It is possible that during the last two years, even as the crude oil spot prices have fallen, the longer-dated futures prices have not fallen much and may have even risen. In addition to that, increasing demand for mining and engineering staff in Australia may also have pushed up wage expenses.

Further to the issue of the falling Australian dollar, a number of companies on the ASX report their operating performance figures in US dollar – for example, Newcrest, Kirkland Lake, Alacer, Oceanagold, Perseus, Troy and Kingsrose. The AISC may appear higher in Australian dollar terms while they have remained constant in the US dollar terms.

Cumulative Progress

ASX Code	Category	Cumulative Production	2020 Midpoint Guidance	Guidance Change	% Annual Guidance	Cumulative AISC
ALK	E	14,426	32,500	Maintain	44.39%	$1,351.09
AMI	D	52,171	90,000	Maintain	57.97%	$1,155.41
AQG*	C	312,971	268,000	Downgrade	96.60%	$1,023.37
BLK	D	37,568	75,000	Maintain	50.09%	$1,523.26
DCN	D	75,237	141,000	Downgrade	53.36%	$1,561.71
EVN	B	362,857	725,000	Downgrade	50.05%	$1,042.02
GCY	D	33,665	75,000	Maintain	44.89%	$1,807.84
GOR ^	C	49,565	133,750		37.06%	$1,102.00
KLA*	B	974,614	1,505,000	Upgrade	99.96%	$811.51
KRM	E	16,999	27,000	Upgrade	62.96%	$880.36
MML	D	48,307	100,000	Maintain	48.31%	$1,675.56
NCM	A	1,062,751	2,455,000	Maintain	43.29%	$1,282.75
NST	A	400,746	980,000	Upgrade	40.89%	$1,454.81
OGC*	C	470,600	370,000	Downgrade	100.13%	$1,526.44
PNR	D	20,034	47,500	Maintain	42.18%	$1,720.31
PRU	C	134,980	285,000	Upgrade	47.36%	$1,376.63
RED	D	51,995	115,000	Maintain	45.21%	$1,544.25
RMS	C	92,084	215,000	Maintain	42.83%	$1,239.72
RRL	C	178,482	355,000	Maintain	50.28%	$1,226.36
RSG*	C	357,570	430,000	Upgrade	83.16%	$1,378.35
SAR	B	216,451	605,000	Upgrade	35.78%	$1,038.37
SBM	C	181,728	385,000	Downgrade	47.20%	$1,391.47
SLR	C	127,807	245,000	Upgrade	52.17%	$1,223.54
TRY	D	10,725				$1,876.00
WGX	C	120,127	287,500	Maintain	41.78%	$1,384.44

* Denotes companies trading in 2019 Q4, wherein production guidance relates to 2019 full year

^ Gold Road Resources reached commercial production in the December quarter so cumulative AISC is based only on the most recent quarter's production

For most ASX-listed gold producing companies, the 2019 December quarter is the half year for the 2020 financial year. 7 out of 23 companies (30%) (Troy Resources yet to provide their 2020 guidance due to their mine suspension and Gold Road commencing commercial level of production) upgraded their production guidance during the quarter. Of these seven companies, four (Kirkland Lake, Northern Star, Resolute and Saracen) had upgraded their guidance as a result of an acquisition of a mine in the recent three months leading up to and including the December quarter. 5 out of 23 companies (22%) downgraded their guidance, with two companies (Alacer and Oceanagold) downgrading for the 2020 financial year as the 2019 financial ended for them in the December quarter. The average cumulative AISC for these companies was $1 344/oz ($1 373/oz last quarter), while the weighted average AISC when taking into account the company’s cumulative production was $1 222/oz ($1 254/oz last quarter).

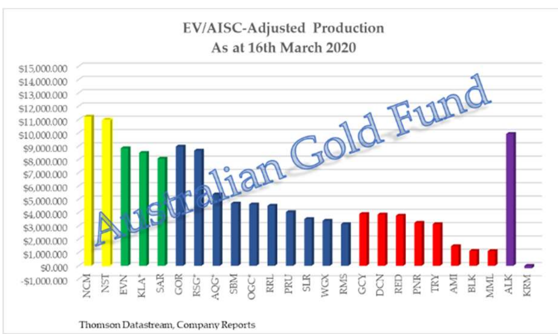
Confirming what many experienced mining investors know for a fact, mining companies do not face a smooth road in their operations, even if the prevailing commodity prices are moving in their favour. While the gold price has been rising, the stock price for some gold producers have not moved in the same direction due to operational and financial troubles. Many mining companies, especially those with one producing mine, may be one disruption away from suspending their operations and thereby leading to investors selling down the stock. This is because mining companies are essentially capital-intensive operations. A company with mines that have operational issues or need to cease operating can easily become a cash drain, either because the costs associated with repairs can be expensive or the amount needed to get a mine from care and maintenance to operation can be substantial.

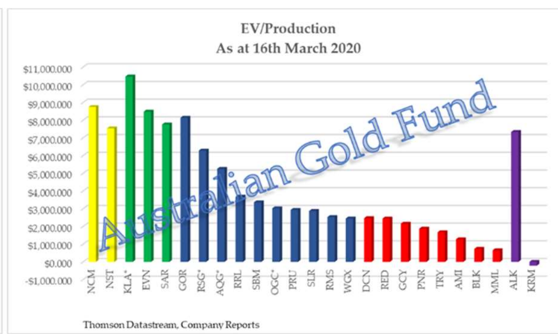
Valuation

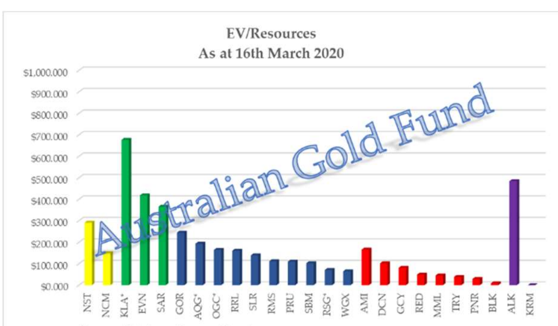
ASX Code	Category	EV/AISC-Adjusted Production	Valuation	EV/Production	EV/Resources	EV/Reserves
ALK	E	$9,908.383	Overvalued	$7,333.599	$484.185	$1,679.278
AMI	D	$1,473.619	Undervalued	$1,275.412	$165.405	$403.180
AQG*	C	$5,375.725	Fair Value	$5,252.983	$192.803	$292.797
BLK	D	$1,115.400	Undervalued	$732.246	$8.622	$39.868
DCN	D	$3,854.602	Overvalued	$2,468.200	$101.893	$267.387
EVN	B	$8,839.744	Undervalued	$8,483.287	$418.094	$825.592
GCY	D	$3,898.383	Overvalued	$2,156.379	$80.415	$289.336
GOR ^	C	$8,966.331	Overvalued	$8,136.417	$244.413	$411.512
KLA*	B	$8,491.556	Undervalued	$10,463.956	$676.281	$1,772.388
KRM	E	-$191.102	Undervalued	-$217.072	-$21.516	-$20.136
MML	D	$1,101.871	Undervalued	$657.613	$44.768	$181.527
NCM	A	$11,220.405	Fair Value	$8,747.182	$148.710	$303.620
NST	A	$10,962.168	Fair Value	$7,535.128	$290.927	$1,123.808
OGC*	C	$4,617.526	Undervalued	$3,025.023	$164.006	$239.277
PNR	D	$3,225.864	Fair Value	$1,875.162	$28.921	$419.743
PRU	C	$4,039.042	Undervalued	$2,933.997	$108.994	$242.147
RED	D	$3,772.621	Fair Value	$2,443.014	$49.244	$119.331
RMS	C	$3,133.380	Undervalued	$2,527.486	$111.306	$531.372
RRL	C	$4,517.937	Undervalued	$3,684.007	$160.588	$325.994
RSG*	C	$8,661.361	Overvalued	$6,283.877	$70.348	$184.780
SAR	B	$8,057.657	Undervalued	$7,759.925	$365.140	$1,017.966
SBM	C	$4,680.495	Undervalued	$3,363.714	$102.153	$205.784
SLR	C	$3,511.035	Undervalued	$2,869.561	$138.605	$878.443
TRY	D	$3,134.709	Fair Value	$1,670.956	$38.432	$301.193
WGX	C	$3,388.080	Undervalued	$2,447.252	$64.462	$224.499

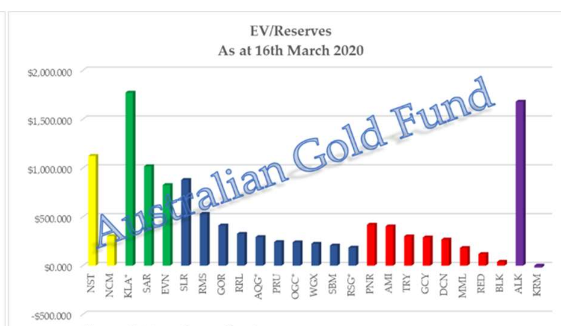
* Denotes companies trading in 2019 Q4

^ Gold Road Resources reached commercial production in the December quarter so cumulative AISC is based only on the most recent quarter's









This edition of the report selected the day where the gold producers faced the bottom in order to show how the companies stand against the market onslaught. We classify 14 out of the 25 (56%) companies to be undervalued at the recent market bottom, 6 to be overvalued (24%) and the remainder to be fairly valued. Our classifications are largely based on the EV/AISC-Adjusted Production metric, but we also take into account the company's resources and reserves to a lesser extent. The fair value ranges are given in the Investment Thesis section that is at the end of this report.

During the steep market selldown, the gold mining companies were no exception. However, opportunities started to appear across all classes – whether major to micro producers. The most undervalued of the gold producers, after taking into account their class, were hence Ramelius Resources, Westgold Resources, Silver Lake Resources, Medusa Mining and Kingsrose Mining. However, for Kingsrose Mining, this report has already highlighted that they will cease production in one of their two small mine operations by middle of this year so they have been conserving cash for further exploration and development. Ramelius Resources and Silver Lake Resources have been deemed very undervalued at this date largely by virtue of their significant cash reserves and having no debt, while Westgold Resources has been undervalued due to investors still not warming up to their operational transformation. Medusa Mining was deemed undervalued largely due to their operations being in the Philippines, which has been increasingly difficult for foreign mining companies to operate in as Red 5 and Oceanagold have attested to from their mines being placed in suspension due to disputes with the government.

Saracen, Evolution, Perseus and Kirkland Lake are also worth mentioning, given they have either made substantial acquisitions or are in the process of developing mines to increase their production. All of these companies were sold off to the point that they became undervalued. Surprisingly, Kirkland Lake was sold to below $40, falling almost 40% since the start of the year despite being recognised as a safe haven gold producer given its substantial cash generating potential. The acquisition of Detour Gold, with a high processing capacity of low-grade ore, may have been seen with skepticism by investors who thought this to be a strange fit to their existing high-grade operations. For Saracen and Evolution, both companies stood strongly against the selling wave and maintained their ground compared to the other producers. One reason for this could be due to the low AISC mines they have and the longstanding reputation of being able to generate solid cashflows. As for Perseus, investors sold down Perseus heavily but the company's future operations remain sound and they are fully funded for the Yaoure mine that is expected to commence pouring gold at the end of the year. The discount on Perseus relative to their production may be due to their operations being in West Africa, a region that is regarded as high risk due to political and social instability.

In terms of the companies that are classified by our fund to be overvalued, these are due to the large net debt positions and high operating costs. The exceptions are Alkane Resources and Gold Road, which are overvalued due to different reasons. Investors have been excited about Alkane due to the discovery of substantial intercepts in the Boda deposit and also their high cash balance that is enough to fund further development of their Tomingley underground operations as well as potentially their Dubbo project comprising rare earths and other base metals. Regarding Gold Road, investors may have recognised its 50% of the low-cost Gruyere mine that offers substantial economies of scale. Resolute Mining was deemed overvalued even as it traded at $0.62 on 16th March because they had substantial debt and the company's Syama and Ravenswood mines have been underperforming. The high AISC and continual delay in the ramp-up of the Syama underground mine have left many investors feeling sour. However, signs are pointing to a potential turnaround in the March quarter and could gain momentum in the second half of the year.

Regarding the gold producers that are deemed fairly valued, this report highlights Northern Star, Alacer Gold and Red 5 for mention. Northern Star managed to go against the trend in their share purchase plan post-acquisition of the Super Pit mine as the stock price actually traded to as high as $14, or 55% over the share purchase plan price of $9. The excitement over the future operations of the company, coming off of a period of shareholder disappointment over the underperformance of the Pogo mine, may have boosted the stock price. Even as the gold producers followed the market in declining, Northern Star stocks fell for a short period to less than the share purchase plan price. The company has since recovered sharply and entering into overvalued territory based on current operational metrics.

Red 5 is an interesting case. The company's current operations at Darlot have been largely steady but unimpressive, with the March quarter performance being downgraded. However, much of the enthusiasm is with regards to their King of the Hills deposit that is seeing resources and reserves swell to make it a formidable deposit by international standards. Based on the company's current operations, they should be overvalued as at 16th March but their large resources and reserves and the proximity to developing the King of the Hills mine lead us to deem the company fairly valued instead.

Finally, regarding Alacer Gold, the company experienced a similar treatment as Kirkland Lake whereby investors sold down quite sharply as the market crash caught momentum. The low-cost Copler mine has been operating reliably and the company generates strong operating cashflows while reducing their debt balance at a brisk pace. However, taking into account that the company is expecting a 20% reduction in production for 2020, this has possibly cooled investor sentiment as the company stock price adjusted to being fairly valued.

Valuation Thesis

The gold mining companies are classified based on their production level on an annual basis. The classification used in this report is as follows – **A** (major producer – 1Moz p.a. or more), **B** (large producer – 0.5-1Moz p.a.), **C** (mid-tier producer – 150 000-500 000oz p.a.), **D** (junior producer – 50 000-150 000oz p.a.) and **E** (micro producer – less than 50 000oz p.a.).

We use the **EV/AISC-Adjusted Annual Production** as a *comparative measure* to evaluate the companies we study. This metric is able to standardise the production and production costs and hence allow for comparison across all classes of producers. The **Enterprise Value** is the sum of the market value of equity (stock price multiplied by number of issued stocks) and net debt (total borrowings less cash and gold bullion, but excluding gold in circuit and ore stockpiles). The **AISC-Adjusted Annual Production** is measure whereby the annual production of gold per oz is divided by the AISC adjusted by a factor of 1 000. The intuition behind this measure is to value the company by taking into account annual production but giving favourable treatment for lower AISC and penalising for higher AISC. The factor of 1 000 is arbitrarily chosen. As an illustration, if a company produces 250 000oz p.a. at AISC of $1 250, the AISC-adjusted production is 200 000.

The **Price Range** determines a reasonable range for which the company stock price should be trading at. This range is relatively wide as it considers the *margin of safety*. A company whose stock price is currently outside the fair value range is significantly over or undervalued and investors should look more deeply into the company's operations, financial performance and recent market announcements. This range should not be taken as the sole driver for investment decisions, but as a starting point for further research to identify the potential causes for the current stock price.

Given the rise in gold price in the recent months, we see reason to re-rate the gold mining companies' valuation metrics upwards to reflect their improving profitability as well as increased enthusiasm from investors. As a rough guide, the fair value ranges for different mining company classes are as follows:

Major and Large Companies *- $8 000-$12 000/oz*

Mid-Tier Companies *- $4 000-$7 000/oz*

Micro and Junior Companies *- $1 500-$4 000/oz*

The metric is by no means perfect and other factors should be considered including reserve and resource life, projected production volume and costs, management quality and geographic location. Further, it is of a retrospective nature, focusing on past performance and this may not be a good indicator for future performance.

Glossary

The **All-in Sustaining Cost (AISC)** is a measure adopted by the World Gold Council as a standardised measure of production costs. This cost includes typically the **Cash Cost** associated with the direct production (extraction, transportation, processing and refining costs, staff salary and wages and relevant corporate costs) as well as **Sustaining Expenditure** that may include maintenance of mine equipment and infrastructure, insurance and administration costs over its production life. Companies may still have discretion in apportioning their expenses.

The **Net Cash/Debt** is the net amount of cash and bullion the company holds after their borrowings and interest-bearing debt are paid. This represents the liquidity position of the company, although this measure does not consider whether the debt is current (due within the next twelve months) or not. A company in a significant net debt position is owing more than they currently have in cash and bullion, which may potentially put them in financial distress if the debt is due soon.

The **Net Cashflow from Operations Excluding Maintenance Capital Expenditure** measures to what extent the company can generate cashflows from its operations after paying for its operating costs as well as Cash Paid for Purchases of Property, Plant and Equipment and the Cash Paid for Development Expenditure in the Investing Cashflows section of the Statement of Cash Flows. It does not include Cash Paid for Exploration and Evaluation, which is assumed to be growth capital expenditure. This is by no means a stable and comparable measure as different companies may have discretionary interpretation of what constitutes as Operating Activities and Investing Activities or Development, Exploration and Evaluation expenditures.

Disclaimer

Information in this report is not intended to be financial advice and should not be used as such. While every effort is made to ensure the information is reliable and accurate, errors and omissions may still exist. The interpretation of financial reports, market announcements and management commentary is subject to personal views and discretion. Users of this report are highly advised to seek professional financial advice before making their decisions.