

Wheaton Precious Metals

Streaming explained

After publishing its prospectus on Friday 23 October, Wheaton Precious Metals' (WPM) first day of trading on the LSE was Wednesday 28 October 2020. While perhaps not perfectly timed in the sense that this was the day that the Dow Jones fell 943 points, or 3.4%, as resurgent coronavirus fears gripped world markets, it nevertheless marks the completion of WPM's next step in its quest to become a truly global mining company. From the perspective of investors, WPM will be the second largest precious metals company listed in London (after Polyus), one of the top 40 largest companies listed in London and the largest listing since Glencore (filling the void left by Randgold among other things). This is at a time when WPM is increasingly focused on its dividend pay-out to investors, which is on track to reach 40–60% of cash flows in the longer term (currently 30%). It also introduces a truly exceptional, and almost unique, business model to the London market, which insulates investors from operating cost risks in particular and which this report explains in detail.

Year end	Revenue (US\$m)	PBT* (US\$m)	EPS* (c)	DPS (c)	P/E (x)	Yield (%)
12/18	794.0	203.1	48	36	93.4	0.8
12/19	861.3	242.7	56	36	80.0	0.8
12/20e	1,127.3	526.9	115	43	39.1	1.0
12/21e	1,487.0	799.3	178	70	25.2	1.6

Note: *PBT and EPS are normalised, excluding amortisation of acquired intangibles and exceptional items.

Sophisticated investors for sophisticated companies

WPM's underlying operations are long-life in the sense that attributable reserves are sufficient to support production for c 33 years, while incremental measured and indicated resources could add a further seven years to this and inferred resources a further 26 years. In addition, WPM has a broad range of sustainability initiatives and significantly increased disclosure around environmental, social and governance (ESG) risk management. For WPM therefore, its London listing will simultaneously broaden its investor base and provide it with access to generalist investors that are relatively sophisticated in their approach towards ESG matters.

Valuation: C\$69.82/share rising to C\$99.40

In the absence of any material changes to FY21 and longer-term forecasts, our valuation of WPM remains ostensibly unchanged relative to our last note (see [Q320 earnings expectation refinements](#), published on 12 October), which is that, ordinarily, we would forecast a value per share of US\$52.44, or C\$69.82 in FY21. However, given its peers' valuations as well as the current precious metals investing environment, we believe that WPM is capable of supporting a premium valuation of US\$74.65 or C\$99.40 per share. From a relative perspective, it is notable that WPM has a lower valuation than the average of its royalty/streaming 'peers' on all but one of six valuation measures on our estimates (see Exhibit 8). On an individual basis, it is cheaper than its peers on at least 66% (16 out of 24) of the same valuation measures used if our estimates are adopted or 58% of them if consensus forecasts are adopted. Among other things, this could be indicative of the market having more conservative precious metal pricing expectations than Edison.

London listing

Metals & mining

2 November 2020

Price **C\$59.68**

Market cap **C\$27bn**

C\$1.3314/US\$

Net debt (US\$m) at 30 June 2020* 508.7

*Excluding US\$3.8m lease liabilities

Shares in issue 449.0m

Free float 100%

Code WPM

Primary exchange TSX

Secondary exchange NYSE, LSE

Share price performance



% 1m 3m 12m

Abs (6.4) (14.0) 70.1

Rel (local) (3.2) (10.0) 80.1

52-week high/low C\$75.1 C\$33.5

Business description

Wheaton Precious Metals is the world's pre-eminent pure precious metals streaming company, with 29 high-quality, precious metals streaming and early deposit agreements relating to assets in Mexico, Peru, Canada, Brazil, Chile, Argentina, Sweden, Greece, Portugal, the US and Guyana.

Next events

Q3 results 9 November 2020

4th quarterly dividend 9 November 2020

Q420/FY20 results March 2021

Q121 results May 2021

Analyst

Charles Gibson +44 (0)20 3077 5724

mining@edisongroup.com

[Edison profile page](#)

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Exceptional business plan

WPM is involved in precious metals streaming whereby it acquires the right to purchase a certain percentage of future precious metal production (a stream) from producing or near-producing mines in return for a combination of a fixed upfront payment (in US dollars, typically in either cash or WPM shares) and an agreed-upon ongoing payment (in US\$/oz). In general, it focuses on by-product precious metal streams as this offers the greatest arbitrage opportunity between the perceived value of the stream to the producer in the equity market and the perceived value of the stream to WPM. Specifically, however, it seeks to build long-term value by entering streaming agreements with large, relatively financially stable counterparties operating premium, high-margin projects in the lowest quartile (and certainly the lowest half) of the cost curve. As well as providing comfort regarding the sustainability of the underlying operation, this strategy of focusing on lowest cost quartile mines also helps to mitigate any geopolitical and/or operating risks. At the same time, stringent vetting of counterparties provides a degree of flexibility if projects are not developed according to plan (eg as evidenced by WPM's ability to successfully renegotiate a series of amendments with Barrick regarding the latter's Pascua-Lama project). Unlike a number of its peers, WPM has – to all intents and purposes – restricted itself solely to precious metal streaming agreements (with the single exception of one cobalt stream – see Exhibit 3) and does not otherwise participate in the base metal or oil and gas markets. This strategy has the beneficial side effect that it also exposes WPM to the traditional premium multiples afforded to precious metal companies compared to base metal ones. Notwithstanding its silver heritage, however, WPM describes itself as 'agnostic' in terms of its preference for either silver or gold streams, which formed the basis of its decision to change its name from Silver Wheaton to Wheaton Precious Metals in 2017.

Latterly, WPM has engaged in a number of 'early deposit' contracts whereby it has contracted to buy gold and silver streams from the Cotabambas and Toroparu mines in South America and the Kutcho mine in British Columbia, thereby effectively becoming a relatively low-cost financing component of these projects at a time when the availability of both debt and equity financing to junior mining companies was uncertain and their associated costs relatively high.

Streaming agreement characteristics

While royalty companies compete with WPM to some extent in the provision of capital to the mining industry, there are notable differences between the two business plans. Royalties are typically linked to tenement areas, for example, and also typically relate to a mine's primary output, whereas streaming arrangements are typically governed by a commercial agreement between two companies (albeit often relating to a single mine) and typically relate to a mine's secondary, or by-product, output. A summary of the unique features of WPM's streaming business plan and how it distinguishes itself from other investment opportunities in the mining industry is provided below.

Compared to exchange traded funds (ETFs), WPM:

- has exposure to exploration success in the form of extended mine lives;
- has exposure to levels of production;
- is operationally geared to changes in metals prices;
- balances costs and revenues, such that inventory held is minimal at the WPM level; and
- pays a dividend.

Compared to mining companies, WPM:

- has no exposure to capital cost overruns;
- has no exposure to operating cost overruns;
- is only exposed to grade fluctuations inasmuch as they affect production levels rather than margins;

- has a predetermined level of inflation applied to its own unit cash costs; and
- is unaffected by changes in a host country's mining tax and regulatory regimes.

Compared to royalty companies, WPM:

- has geared exposure to metals prices; and
- typically negotiates and exploits the value differential around a secondary, or by-product, metal stream, rather than being applied to all metals streams including the primary one.

A key advantage for WPM compared to potential competitors is its size, scale and valuation, which allows it to raise equity on a non-dilutive basis to fund new streams, or even to issue counterparties with equity in consideration of new streams.

Cornerstone assets

WPM has seven cornerstone assets (Salobo, Antamina, Sudbury, Penasquito, Constancia, Stillwater and San Dimas). The following is an analysis of the financial returns generated as a result of the application of WPM's investment criteria to one of its cornerstone assets: Penasquito.

Penasquito

A gold-silver-lead-zinc mine, located in Mexico and operated by Newmont (formerly Goldcorp), Penasquito has consistently been regarded as one of WPM's key cornerstone assets. The stream relating to this asset was acquired late in 2007 for US\$485m plus US\$3.56m in costs and US\$15.761m in capitalised interest. The first silver-bearing lead and zinc concentrate was delivered from the mine in 2009 after production at its first 50,000tpd sulphide process line was ramped up on schedule and on budget. During the ramp-up period, metal recoveries, concentrate grades and concentrate quality were within expected ranges. At the same time, construction of a second 50,000tpd sulphide process line was started. After exceeding ramp-up expectations, Penasquito became WPM's second largest contributor of silver production in 2010 and, after further expansions, it finally surpassed San Dimas to become WPM's largest contributor of silver production in 2012, by which time it held the title of Mexico's largest precious metals mine, one of the world's largest and lowest-cost gold-silver mines and one of Goldcorp's most significant cash flow generators. After adjusting the mine's production schedule to reflect a targeted mill throughput rate of 110,000tpd, rising to in excess of 115,000tpd beyond 2015, Penasquito is now forecast to yield average annual production attributable to WPM of c 7Moz Ag per year plus an additional 4–6Moz pa (of which 25% will be attributable to WPM) from the Pyrite Leach Project, which was commissioned in FY19.

Compared to a total initial investment of US\$504.3m, Penasquito has yielded the following historical and forecast cash flows to WPM:

Exhibit 1: Penasquito cash flows to WPM, 2008-26e (US\$m)

	Historical													Forecast					
Year	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Cash flow	2.3	6.9	52.2	126.8	162.2	105.2	106.0	85.1	54.1	67.0	57.2	55.3	131.0	218.0	217.7	217.3	216.9	216.6	228.7

Source: Edison Investment Research, Wheaton Precious Metals

Readers should note that, according to its operator, Newmont, Penasquito's reserves are sufficient to support production for 12 years from the start of 2020 (ie until the end of 2031), with the potential for additional expansions beyond that, supported by measured and indicated resources of 2.7Moz Au and 272.2Moz Ag and inferred resources of 2.1Moz Au and 161.6Moz Ag (source: Newmont, 31 December 2019). Edison's forecasts for cash flow attributable to WPM from Penasquito for these years averages US\$261.4m and are only not shown in Exhibit 1 for reasons of space.

With respect to the cash flows in Exhibit 1, on an undiscounted basis, Penasquito paid back WPM's initial investment in 2014. When discounted at Edison's standard mining discount rate of 10%, the mine will pay back WPM's initial investment this year in 2007 money terms, with an estimated

additional life of mine residual discounted cash flow value attributable to WPM of US\$1.5bn in 2020 money terms. Stated alternatively, we estimate that WPM paid US\$504.3m for an asset that will return US\$948.9m to it (using a 10% discount rate), with additional upside potential beyond that. Stated alternatively again, we estimate that Penasquito will generate a 16.6% internal rate of return to WPM over the course of its life (in 2007 money terms). Note that this compares with a figure of 15.2% when we last performed this calculation on Penasquito in August 2017, when the life of the Penasquito mine was only expected to officially last until 2026 (see our note [Still shining](#), published on 30 August 2017). In the meantime, there remains substantial underground potential beneath the current open pits at Penasquito, providing excellent opportunities for both further exploration growth and expanded and/or extended silver production.

The uplift in cash flows forecast by Edison from FY21 arises as a result of our expectation that the gold price will remain at US\$1,892/oz in nominal terms, but that the silver price will rise to US\$30.78/oz such that the ratio between the two is 61.5x, being the level implied by silver's long-term correlation with gold since the latter was demonetised in 1971. In the event that the silver price was to remain at current levels however (US\$23.34/oz at the time of writing), Edison estimates that the cash flows attributable to WPM from Penasquito would instead be as follows:

Exhibit 2: Penasquito cash flows to WPM (at US\$23.34/oz Ag), 2008-26e (US\$m)

	Historical													Forecast					
Year	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Cash flow	2.3	6.9	52.2	126.8	162.2	105.2	106.0	85.1	54.1	67.0	57.2	55.3	131.0	156.6	156.3	155.9	155.6	155.2	154.8

Source: Edison Investment Research, Wheaton Precious Metals

In this case, Edison's forecasts for cash flow attributable to WPM from Penasquito for 2027–31 (inclusive) years averages US\$153.7m and is similarly not shown in Exhibit 2 solely for reasons of space.

With respect to the cash flows in Exhibit 2, on an undiscounted basis, Penasquito still (obviously) paid back WPM's initial investment in 2014. Similarly, when discounted at Edison's standard mining discount rate of 10%, the mine will still pay back WPM's initial investment this year in 2007 money terms but, in this case, with an estimated additional life of mine residual discounted cash flow value attributable to WPM of US\$1.0bn in 2020 money terms. Stated alternatively, in this case, we estimate that WPM paid US\$504.3m for an asset that will return to it US\$804.1m (using a 10% discount rate), with additional upside potential still beyond that. Stated alternatively, we estimate that Penasquito will generate a 15.3% internal rate of return to WPM on this basis over the course of its life (in 2007 money terms). Obviously, the potential to expand and/or extend production as a result of successful exploration also remains intact.

WPM's assets

As at the current time, WPM has agreements over more than 20 major metals streams, summarised in Exhibit 3 below.

Exhibit 3: WPM precious metals streaming and early deposit agreements

Asset	Owner/ operator	Location	Attributable production to be purchased (%)			Per ounce cash payment* (US\$/oz)			Term of agreement
			Silver	Gold	Other	Silver	Gold	Other	
Penasquito	Newmont	Mexico	25	0		4.91			Life of mine
Constancia	Hudbay	Peru	100	50		5.90	400		Life of mine
Salobo	Vale	Brazil	0	75			404		Life of mine
Sudbury	Vale	Canada	0	70			400		20 years
Antamina***	Glencore	Peru	33.75/22.5	0		20% of spot			Life of mine
San Dimas	First Majestic	Mexico		Variable		4.28	600		Life of mine
Stillwater	Sibanye	USA		100	4.5%/2.25%/1 % of Pd		18%/22% of spot	18%/22% of Pd spot	Life of mine
Voisey's Bay					42.4%/21.2% of Co			18%/22% of Co spot	Life of mine
Other									
Los Filos	Equinox	Mexico	100	0		4.39			25 years
Zinkgruvan	Lundin	Sweden	100	0		4.39			Life of mine
Yauliyacu	Glencore	Peru	100	0		8.89			Life of mine
Stratoni	Eldorado	Greece	100	0		9.31			Life of mine
Neves-Corvo	Lundin	Portugal	100	0		4.30			50 years
Aljustrel	Almina	Portugal	100	0		Variable			50 years
Minto	Pembroke	Canada	100	100		4.27	Variable		Life of mine
Keno Hill	Alexco	Canada	25	0		Variable			Life of mine
Pascua-Lama	Barrick	Chile/Argentina	25	0		3.90			Life of mine
Rosemont	Hudbay	USA	100	100		3.90	450		Life of mine
Loma de La Plata (Navidad)	Pan American Silver	Argentina	12.5	0		4.00			Life of mine
777	Hudbay	Canada	100	50		6.14	416		Life of mine
Marmato	Caldas Gold	Colombia	100/50	6.5/3.25		20% of spot	20% of spot		Life of mine
Early deposit									
Toroparu	Sandspring	Guyana	50	10		3.90	400		Life of mine
Cotabambas	Panoro	Peru	100/66.67	25/16.67		5.90	450		Life of mine
Kutcho	Desert Star	Canada	100/66.67	100/66.67		20% of spot	20% of spot		Life of mine

Source: Wheaton Precious Metals, Edison Investment Research. Note: *As at 31 December 2019; subject to an annual inflationary adjustment with the exception of Loma de La Plata and Sudbury; all amounts are measured on a per oz basis, with the exception of cobalt (Co), which is measured on a per lb basis.

In addition, WPM has a 0.5% net smelter royalty interest in the Metates properties located in Mexico and operated by Chesapeake Gold for the life of the mine. It also has a right of first refusal on any silver streaming, royalty or any other transaction on the Metates properties.

While every effort has been made to reflect as much pertinent information as possible in Exhibit 3, readers should be aware that, for reasons of space, it has not been possible to include all of the details of all of the precious metal purchase agreements (PMPA) featured. For the Marmato project, for example (disclosed to the market on 22 June), WPM announced that it had signed a non-binding term sheet with Caldas Gold to enter into a PMPA whereby WPM will acquire 6.5% of the gold production and 100% of the silver production of Marmato until such time as 190,000oz gold and 2.15Moz silver have been delivered, after which the stream will drop to 3.25% of gold production and 50% of silver production for the remainder of the life of the mine in consideration of which WPM will make ongoing delivery payments equal to approximately 20% of spot prices in addition to a total cash consideration of US\$110m, of which US\$38m will be payable upon closing and the remainder during the construction of the Marmato Deep Zone project. Full details regarding WPM's portfolio of agreements with its counterparties are available in its [2019 Annual Report & Accounts](#), available on WPM's website on pages 7, 9 and 31, among others.

Market potential

WPM is effectively exposed to two different types of market within the mining industry: that of 'balance sheet repair' and that of 'development'. Typically, development opportunities are smaller than 'balance sheet repair' type opportunities (eg in the range US\$100–400m), but more numerous (eg between 2014 and 2017, WPM estimates that it saw around 150 development opportunities, on which it concluded deals over three).

With the caveat that COVID-19 has inevitably slowed the pace of progress, WPM reports that it has nevertheless been busy on the corporate development front. Whereas potential deals in FY19 were generally reported to be with development companies in the US\$100–350m range, more recent overtures are reported to have been from producing companies – especially within the base metals sub-sector – looking to strengthen their balance sheets with mooted transactions in the >US\$1bn range, which WPM would fund, in the first instance, via the US\$1,359.5m available under its revolving credit facility, plus US\$131.8m in cash (as at end-Q220) and, potentially, its US\$300m at-the-market equity programme.

Considering only the silver component of its investible universe, WPM estimates the size of the potential market open to it to be the lower half of the cost curve of the 70% of global silver production of c 837Moz in CY19 (down from 894Moz in CY15) that was produced as a by-product of either gold or base metal mines (ie approximately 300Moz pa silver vs WPM's attributable production of 22.6Moz Ag in FY19). Inevitably, WPM's investible universe may be further refined by the requirement for the operations to be located in good mining jurisdictions, with relatively low political risk. Nevertheless, such figures serve to illustrate the fact that WPM's marketplace is very far from being either saturated or mature.

Q320e and FY20e

WPM's Q320 results are scheduled to be released on 9 November, after the market closes. As per our last report on the company (see [Q320 earnings expectation refinements](#), published on 12 October 2020), our forecasts for FY20 silver and gold production of 21.6Moz and 375.6koz compare with guidance of 21.5–22.5Moz and 365–385koz, respectively. Our resulting detailed operational and financial forecasts for WPM for FY20, by quarter, are then as follows:

Exhibit 4: WPM FY20 forecast, by quarter*

US\$000s (unless otherwise stated)	FY19	Q120	Q220	Q320e	Q420e	FY20e
Silver production (koz)	22,562	6,704	3,650	5,275	5,926	21,555
Gold production (oz)	406,675	94,707	88,631	93,187	99,044	375,569
Palladium production (koz)	21,993	5,312	5,759	5,938	5,938	22,946
Silver sales (koz)	17,703	4,928	4,729	4,617	5,926	20,200
Gold sales (oz)	389,086	100,405	92,804	81,538	99,007	373,754
Palladium sales (oz)	20,681	4,938	4,976	5,177	5,914	21,004
Avg realised Ag price (US\$/oz)	16.29	17.03	16.73	24.36	24.03	20.69
Avg realised Au price (US\$/oz)	1,391	1,589	1,716	1,911	1,904	1,774
Avg realised Pd price (US\$/oz)	1,542	2,298	1,917	2,172	2,375	2,199
Avg Ag cash cost (US\$/oz)	5.02	4.50	5.23	5.49	5.51	5.19
Avg Au cash cost (US\$/oz)	421	436	418	422	424	422
Avg Pd cash cost (US\$/oz)	273	402	353	391	428	395
Sales	861,332	254,789	247,954	279,533	344,987	1,127,263
Cost of sales						
Cost of sales, excluding depletion	258,559	66,908	65,211	61,801	77,215	271,134
Depletion	256,826	64,841	58,661	55,473	69,831	248,805
Total cost of sales	515,385	131,748	123,872	117,274	147,046	519,940
Earnings from operations	345,947	123,040	124,082	162,259	197,941	607,324
Expenses and other income						
– General and administrative**	54,507	13,181	21,799	13,627	13,627	62,234
– Foreign exchange (gain)/loss	0					0
– Net interest paid/(received)	48,730	7,118	4,636	4,009	2,450	18,213
– Other (income)/expense	(217)	(1,861)	234			-1,627
Total expenses and other income	103,020	18,438	26,669	17,636	16,076	78,819
Earnings before income taxes	242,927	104,602	97,413	144,623	181,865	528,505
Income tax expense/(recovery)	(9,066)	8,442	59	250	250	9,001
Marginal tax rate (%)	(3.7)	8.1	0.1	0.2	0.1	1.7
Net earnings	251,993	96,160	97,354	144,373	181,615	519,504
Ave. no. shares in issue (000s)	446,021	447,805	448,636	448,636	448,946	448,428
Basic EPS (US\$)	0.56	0.215	0.217	0.322	0.405	1.158
Diluted EPS (US\$)	0.56	0.214	0.216	0.321	0.404	1.156
DPS (US\$)	0.36	0.10	0.10	0.10	0.13	0.43

Source: Wheaton Precious Metals, Edison Investment Research. Note: *Excluding impairments and exceptional items. **Forecasts now include stock-based compensation costs. Totals may not add up owing to rounding.

Readers should note the slightly uncharacteristic Edison assumption in Q3 that there will be a 12.5% under-sale of both gold and silver, relative to production in order to allow inventories to recover by an approximate 20,000oz gold equivalent after they were drawn down in Q2 as a consequence of the coronavirus crisis. Otherwise, our (unchanged) basic EPS forecast of US\$1.158/share for FY20 is now almost exactly in line with consensus, compared with being 7.2% above it on 12 October and 23.4% above it on 18 August 2020, as the consensus has moved higher since Q2 results:

Exhibit 5: WPM FY20 consensus EPS forecasts, by quarter (US\$/share)

	Q120	Q220	Q320e	Q420e	Sum Q1–Q420	FY20e
Edison forecast	0.215	0.217	0.322	0.405	1.158	1.158
Mean consensus	0.215	0.217	0.330	0.390	1.152	1.130
High consensus	0.215	0.217	0.380	0.440	1.252	1.210
Low consensus	0.215	0.217	0.280	0.350	1.062	0.970

Source: Refinitiv, Edison Investment Research. Note: As at 28 October 2020.

In the meantime, our US\$1.78 basic EPS forecast for FY21 (see Exhibit 9) remains unchanged and compares with a consensus of US\$1.64/share (cf US\$1.43/share on 9 October and US\$1.20/share on 13 August) within a range of US\$1.19–2.29/share (source: Refinitiv, 28 October 2020). In this case, our estimate is, once again, predicated on an average gold price during the year of US\$1,892/oz and an average silver price of US\$30.78/oz, which assumes, among other things, that the silver price will revert to the long-term correlation that it has exhibited with gold since the latter

was demonetised in 1971. In the event that both metals instead remain at current levels however (US\$23.34/oz Ag and US\$1,879/oz Au at the time of writing), our forecast for WPM's EPS in FY21 moderates to US\$1.44 per share and our forecast for its DPS to US\$0.62/share.

Medium-term outlook

Prior to the coronavirus pandemic, WPM provided production guidance for FY20 of 390–410koz gold, 22.0–23.5Moz silver and 23.0–24.5koz of palladium to result in gold equivalent production of c 685–725koz (based on an assumed gold price of US\$1,500/oz, an assumed silver price of US\$18.00/oz and an assumed palladium price of US\$2,000/oz). WPM suspended its production guidance on 1 April in response to the coronavirus crisis. As its partners' previously furloughed mines have returned to production however, it has reinstated updated guidance, as shown in the exhibit below. Its long-term production forecast remains unchanged at 750,000oz gold equivalent per annum on average between 2020 and 2024. This compares with Edison's forecasts, as follows:

Exhibit 6: WPM precious metals production – Edison forecasts vs guidance						
	FY19	FY20e	FY21e	FY22e	FY23e**	FY24e
Current Edison forecast						
Silver production (Moz)		21.6	20.7	20.5	17.4	17.3
Gold production (koz)		375.6	393.6	382.6	374.3	319.3
Cobalt production (klb)		0	2,100	2,100	2,100	2,814
Palladium production (koz)		22.9	27.0	27.0	30.0	30.0
Gold equivalent (koz)		653.3	781.3	765.9	711.7	661.9
Reinstated WPM guidance						
Silver production (Moz)	*22.6	21.5–22.5				
Gold production (koz)	*406.7	365–385				
Cobalt production (klb)	*0	0				
Palladium production (koz)	*22.0	23.0–24.5				
Gold equivalent (koz)		655–685		750	750	750
Source: Wheaton Precious Metals, Edison Investment Research forecasts. Note: *Actual; **Edison forecast includes a contribution from Salobo III in FY23e.						

Readers should note that the major differences between Edison's gold equivalent production forecasts and Wheaton's can be attributed to the ratio of the gold price to the silver price. Whereas Wheaton assumes an 83.33x ratio (based on a gold price of US\$1,500/oz and a silver price of US\$18.00/oz), the current ratio is closer to 80.5x and Edison assumes that the ratio will revert closer to its long-term average of 61.5x from FY21. Note that, at WPM's prices, Edison's gold equivalent production forecast in FY20 is 700.7koz, rather than 653.3koz (which assumes a gold price of US\$1,904/oz for the balance of the year and a silver price of US\$24.03/oz). In addition, Edison is also expecting a production contribution from Salobo III from FY23 (albeit nothing from Rosemont).

In the medium term, First Majestic has announced plans to increase production at San Dimas by restarting mining operations at the past-producing Tayoltita mine and expects to ramp up production to add another 300tpd (12%) to throughput by the end of FY20. In addition, it intends to install a new 3,000tpd high-intensity grinding mill circuit and an autogenous grinding mill in Q221 (cf H220 previously) to further improve recoveries and reduce operating costs. Production of palladium and gold at Stillwater (operated by Sibanye-Stillwater) will similarly increase into FY21 under the influence of the Fill-the-Mill and Blitz projects.

By contrast, production is expected to remain at lower levels at Constancia, owing to delays in mining the Pampacancha satellite deposit (which hosts significantly higher gold grades than those mined hitherto). However, Hudbay reports that it has now secured the surface rights for the Pampacancha deposit and expects to begin mining ore from the satellite deposit in early FY21 (cf late FY20 previously). Nevertheless, in lieu of the delay, WPM is entitled to receive an additional 2,005oz gold per quarter from Hudbay during FY20 relative to its PMPA.

Longer-term outlook

Salobo

On 24 October 2018, Vale announced the approval of the Salobo III brownfields mine expansion, intended to increase processing capacity at Salobo from 24Mtpa to 36Mtpa, with start-up scheduled for H122 and an estimated ramp-up time of 15 months. According to its agreement with Vale, depending on the grade of the material processed, WPM will be required to make a payment to Vale in respect of this expansion, which WPM estimates will be in the range US\$550–650m in FY23, in return for which it will be entitled to its full 75% attributable share of expanded gold production. Note: this compares to its purchase of a 25% stream in August 2016 for a consideration of US\$800m (see our note, [Silver Wheaton: Going for gold](#), published on 30 August 2016), the US\$900m it paid for a similar stream in March 2015 (when the gold price averaged US\$1,179/oz) and the US\$1.33bn that it paid for its original 25% stream in February 2013.

According to Vale's Q220 performance report, the Salobo III mine expansion is now 62% complete (cf 54% at the end of Q220, 47% at the end of Q120, 40% at the end of Q419 and 27% at the end of Q319) and remains on schedule for start-up in H122.

Pascua-Lama

Wheaton's contract with Barrick provides for a completion test that, if unfulfilled by 30 June 2020, results in WPM being entitled to the return of its upfront cash consideration of US\$625m less a credit for any silver delivered up to that date from three other Barrick mines (at which point it would have no further streaming interest in the mine). Given that the test was unfulfilled, Edison calculates that WPM has the right to an estimated US\$252.3m (the carrying value of Pascua-Lama in WPM's accounts) repayment from Barrick in FY20. Given the long-term optionality provided by the Pascua-Lama project however, Wheaton has indicated that it is unlikely to enforce the repayment of its entitlement and that it prefers instead to maintain its streaming interest in the project (which was originally expected to deliver an attributable 1.7–12.0Moz silver pa, averaging 5.2Moz Ag pa, to WPM at a cost of US\$3.90/oz (inflating at 1% per annum).

Rosemont

Another major project with which WPM has a streaming agreement for attributable gold and silver production is Rosemont copper in Arizona.

The proposed Rosemont development is located near a number of large porphyry-type producing copper mines and would be one of the largest three copper mines in the US, with output of c 112,000t copper in concentrate per year and accounting for c 10% of total US copper production. Total by-product production of silver and gold attributable to WPM is estimated to be c 2.7Moz Ag pa and c 16,100oz Au pa.

Rosemont's operator Hudbay has received both a Section 404 Water Permit from the US Army Corps of Engineers and a Mine Plan of Operations (MPO) from the US Forest Service. The Section 404 permit regulates the discharge of fill material into waterways according to the Clean Water Act and was effectively the final material administrative step before the mine could be developed. Subsequently, Hudbay indicated it would seek board approval to commence construction work by the end of CY19, which would have enabled first production 'by the end of 2022'. In the meantime, it commenced early works to run concurrently with financing activities (including a potential joint venture partner).

On 31 July 2019 however, the US District Court for the District of Arizona issued a ruling relating to a number of lawsuits challenging the US Forest Service's issuance of the Final Record of Decision effectively halting construction, saying that:

- The US Forest Service 'abdicated its duty to protect the Coronado National Forest' when it failed to consider whether the mining company held valid unpatented mining claims; and
- The Forest Service had 'no factual basis to determine that Rosemont had valid unpatented mining claims' on 2,447 acres and that the claims were invalid under the Mining Law of 1872.

In its reaction to the ruling, Hudbay said that it believed that the ruling was without precedent and that the court had misinterpreted federal mining laws and Forest Service regulations as they apply to Rosemont. It pointed out that the Forest Service issued its decision in 2017 after a 'thorough process of ten years involving 17 co-operating agencies at various levels of government, 16 hearings, over 1,000 studies, and 245 days of public comment resulting in more than 36,000 comments' and with a long list of studies that have examined the potential effects of the proposed mine on the environment. Hudbay also pointed out that various agencies had accepted that the company could operate the mine in compliance with environmental laws. As a result, Hudbay is in the process of appealing the ruling to the Ninth Circuit Court of Appeals – a process in which it has stated that it expects to be successful, not least as a result of there being legal precedents to its waste disposal plan. As an alternative however, it is also able to adapt its plan to accommodate its waste dumps on patented land alone, if necessary.

Once in production, Edison estimates that Rosemont could contribute an average c US\$0.21 per share (11.6%) to WPM's basic EPS in its first five years of its official 18-year life from FY22–30 for an upfront payment of US\$230m (equivalent to US\$0.512/share) in two instalments of US\$50m and US\$180m (of which neither has yet been paid). Nevertheless, in the light of the uncertainty about the timing and development of the project we have, for the moment at least, removed any contribution from Rosemont from our forecasts.

Other potential future growth

WPM is ostensibly a precious metals streaming company (plus one cobalt stream). While it is difficult, or impossible, to predict potential future stream acquisition targets with any degree of certainty, it is perhaps possible to highlight two that may be of interest to WPM in due course for which it already has strong, existing counterparty relationships:

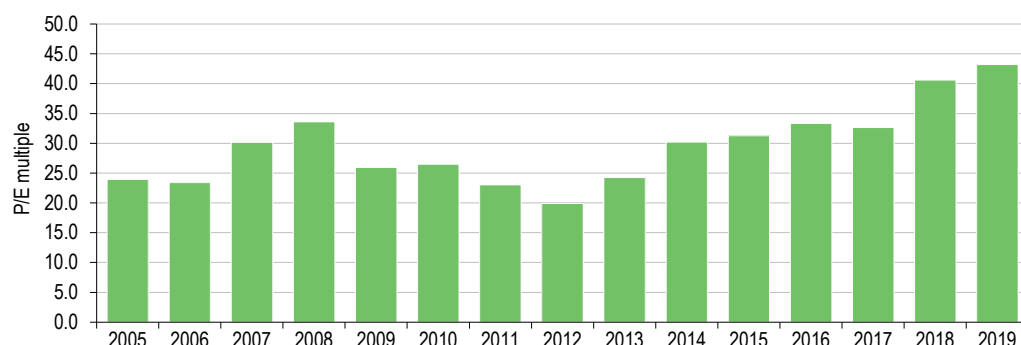
- the platinum group metal (PGM) by-product stream at Sudbury (operated by Vale); and
- the 50% of the gold output at Constancia that is currently not subject to any streaming arrangement.

Otherwise, WPM also has streaming agreements with other potential producing mines, including (but not limited to) Navidad, Keno Hill (at which the operator, Alexco, has announced its intent to recommence mining operations from Q420) and Cotabambas. Note that during its most recent period in production, Keno Hill typically produced in the order of 150–200koz silver attributable to Wheaton per annum.

Valuation

Excluding FY04 (part-year), WPM's shares have historically traded on an average P/E multiple of 29.5x current year basic underlying EPS, excluding impairments (cf 39.1x Edison or 39.8x Refinitiv consensus FY20e, currently – see Exhibit 8).

Exhibit 7: WPM's historical current year P/E multiples, 2005–19



Source: Edison Investment Research

Applying this 29.5x multiple to our EPS forecast of US\$1.78 in FY21 would ordinarily imply a potential value per share for WPM of US\$52.44 or C\$69.82 in that year. However, the graph above suggests that the current year multiple has been on a broadly upward trend since FY12 and we would therefore argue that a multiple in excess of 40x (as evidenced by the last two completed years) can be supported, notwithstanding the fact that these years were not subject to the extraordinary trials and tribulations being experienced in FY20. In this case, applying a 42.0x earnings multiple (the average of FY18 and FY19) to our updated EPS forecast of US\$1.78 in FY21 implies a potential value per share for WPM of US\$74.65 or C\$99.40 in that year and/or for as long as precious metals prices remain at higher levels and/or the current coronavirus crisis persists. Even at such elevated levels however, a multiple of over 42.0x would still leave WPM's shares at no more than on a par with respect to the likes of Franco-Nevada (see Exhibit 8).

Note that neither of these valuations include the value of 20.2m shares in First Majestic currently held by WPM, with an immediate value (28 October) of C\$268.0m, or US\$0.45 per WPM share.

In the meantime, from a relative perspective, it is notable that WPM has a lower valuation than the average of its royalty/streaming 'peers' on all but one of six valuation measures if our forecasts are used or all but two if consensus forecasts are used. On an individual basis, it is cheaper than its peers on at least 66% (16 out of 24) of the valuation measures used in Exhibit 8 if our estimates are adopted or 58% of the same valuation measures if consensus forecasts are adopted. Among other things, this could possibly indicate the market has more conservative precious metal pricing expectations than Edison.

Exhibit 8: WPM comparative valuation vs a sample of operating and royalty/streaming companies

	P/E (x)		Yield (%)		P/CF (x)	
	Year 1	Year 2	Year 1	Year 2	Year 1	Year 2
Royalty companies						
Franco-Nevada	55.6	42.6	0.8	0.8	35.6	26.8
Royal Gold	33.0	32.4	0.9	0.9	17.6	17.7
Sandstorm Gold	61.0	39.2	0.0	0.0	20.8	15.7
Osisko	52.7	28.0	1.3	1.4	21.8	14.7
Average	50.6	35.6	0.8	0.8	24.0	18.7
WPM (Edison forecasts)	39.1	25.2	1.0	1.6	24.2	18.1
WPM (consensus)	39.8	27.3	0.9	1.3	25.7	19.0

Source: Refinitiv, Edison Investment Research. Note: Peers priced on 28 October 2020.

Exhibit 9: Financial summary

	US\$'000s	2014	2015	2016	2017	2018	2019	2020e	2021e
Year end 31 December		IFRS	IFRS	IFRS	IFRS	IFRS	IFRS	IFRS	IFRS
PROFIT & LOSS									
Revenue		620,176	648,687	891,557	843,215	794,012	861,332	1,127,263	1,487,014
Cost of Sales		(151,097)	(190,214)	(254,434)	(243,801)	(245,794)	(258,559)	(271,134)	(306,538)
Gross Profit		469,079	458,473	637,123	599,414	548,218	602,773	856,129	1,180,476
EBITDA		431,219	426,236	602,684	564,741	496,568	548,266	793,896	1,118,242
Operating Profit (before amort. and except.)		271,039	227,655	293,982	302,361	244,281	291,440	545,090	805,096
Intangible Amortisation		0	0	0	0	0	0	0	0
Exceptionals		(68,151)	(384,922)	(71,000)	(228,680)	245,715	(165,855)	2,336	0
Other		(1,830)	(4,076)	(4,982)	8,129	(5,826)	217	1,627	0
Operating Profit		201,058	(161,343)	218,000	81,810	484,170	125,802	549,053	805,096
Net Interest		(2,277)	(4,090)	(24,193)	(24,993)	(41,187)	(48,730)	(18,213)	(5,753)
Profit Before Tax (norm)		268,762	223,565	269,789	277,368	203,094	242,710	526,878	799,343
Profit Before Tax (FRS 3)		198,781	(165,433)	193,807	56,817	442,983	77,072	530,841	799,343
Tax		1,045	3,391	1,330	886	(15,868)	9,066	(13,859)	(1,000)
Profit After Tax (norm)		267,977	222,880	266,137	286,383	181,400	251,993	514,646	798,343
Profit After Tax (FRS 3)		199,826	(162,042)	195,137	57,703	427,115	86,138	516,982	798,343
Average Number of Shares Outstanding (m)		359.4	395.8	430.5	442.0	443.4	446.0	448.4	448.6
EPS - normalised (c)		75	53	62	63	48	56	115	178
EPS - normalised and fully diluted (c)		74	53	62	63	48	56	115	178
EPS - (IFRS) (c)		56	(41)	45	13	96	19	115	178
Dividend per share (c)		26	20	21	33	36	36	43	70
Gross Margin (%)		75.6	70.7	71.5	71.1	69.0	70.0	75.9	79.4
EBITDA Margin (%)		69.5	65.7	67.6	67.0	62.5	63.7	70.4	75.2
Operating Margin (before GW and except.) (%)		43.7	35.1	33.0	35.9	30.8	33.8	48.4	54.1
BALANCE SHEET									
Fixed Assets		4,309,270	5,526,335	6,025,227	5,579,898	6,390,342	6,123,255	5,876,450	5,565,304
Intangible Assets		4,270,971	5,494,244	5,948,443	5,454,106	6,196,187	5,768,883	5,522,078	5,210,932
Tangible Assets		5,427	12,315	12,163	30,060	29,402	44,615	44,615	44,615
Investments		32,872	19,776	64,621	95,732	164,753	309,757	309,757	309,757
Current Assets		338,493	105,876	128,092	103,415	79,704	154,752	741,548	1,541,857
Stocks		26,263	1,455	1,481	1,700	1,541	43,628	2,024	2,670
Debtors		4,132	1,124	2,316	3,194	2,396	7,138	3,088	4,074
Cash		308,098	103,297	124,295	98,521	75,767	103,986	736,435	1,535,113
Other		0	0	0	0	0	0	0	0
Current Liabilities		(16,171)	(12,568)	(19,057)	(12,143)	(28,841)	(64,700)	(79,648)	(83,140)
Creditors		(16,171)	(12,568)	(19,057)	(12,143)	(28,841)	(63,976)	(78,924)	(82,416)
Short term borrowings		0	0	0	0	0	(724)	(724)	(724)
Long Term Liabilities		(1,002,856)	(1,468,908)	(1,194,274)	(771,506)	(1,269,289)	(887,387)	(887,387)	(887,387)
Long term borrowings		(998,518)	(1,466,000)	(1,193,000)	(770,000)	(1,264,000)	(878,028)	(878,028)	(878,028)
Other long term liabilities		(4,338)	(2,908)	(1,274)	(1,506)	(5,289)	(9,359)	(9,359)	(9,359)
Net Assets		3,628,736	4,150,735	4,939,988	4,899,664	5,171,916	5,325,920	5,650,962	6,136,633
CASH FLOW									
Operating Cash Flow		434,582	435,783	608,503	564,187	518,680	548,301	856,125	1,120,103
Net Interest		(2,277)	(4,090)	(24,193)	(24,993)	(41,187)	(41,242)	(18,213)	(5,753)
Tax		(204)	(208)	28	(326)	0	(5,380)	(9,001)	(1,000)
Capex		(146,249)	(1,791,275)	(805,472)	(19,633)	(861,406)	10,571	(2,000)	(2,000)
Acquisitions/disposals		0	0	0	0	0	0	0	0
Financing		6,819	761,824	595,140	1,236	1,279	37,198	0	0
Dividends		(79,775)	(68,593)	(78,708)	(121,934)	(132,915)	(129,986)	(194,462)	(312,672)
Net Cash Flow		212,896	(666,559)	295,298	398,537	(515,549)	419,462	632,449	798,677
Opening net debt/(cash)		902,313	690,420	1,362,703	1,068,705	671,479	1,188,233	774,766	142,317
HP finance leases initiated		0	0	0	0	0	0	0	0
Other		(1,003)	(5,724)	(1,300)	(1,311)	(1,205)	(5,995)	0	0
Closing net debt/(cash)		690,420	1,362,703	1,068,705	671,479	1,188,233	774,766	142,317	(656,361)

Source: Company sources, Edison Investment Research

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